COUNCIL MEMBERS
JIM JOLLY, President
LAURA M. TOY, Vice President
SCOTT BAHR
ROB GJONAJ DONOVIC
BRANDON McCULLOUGH
KATHLEEN E. McINTYRE
SCOTT MORGAN

33000 CIVIC CENTER DRIVE
LIVONIA, MICHIGAN 48154-3097
(734) 466-2250
citycouncil@livonia.gov

OFFICE OF THE COUNCIL

ELECTRONIC AGENDA PACKET FOR THE REGULAR MEETING OF MONDAY, JUNE 17, 2024 7:00 P.M.

The electronic agenda is compiled, produced and distributed by the City Council Staff.
(734) 466-2250

The official documents are on file in the City Clerk's office.

1995th Regular Meeting Agenda of the Council of the City of Livonia
Monday, June 17, 2024 - Revised

7:00 p.m. - City Hall Auditorium
33000 Civic Center Drive, Livonia, Michigan

CALL TO ORDER

INVOCATION/PLEDGE OF ALLEGIANCE

ROLL CALL

PRESENTATION OF MINUTES – Regular Meeting Minutes of June 3, 2024

AUDIENCE COMMUNICATION

REPORTS FROM THE MAYOR AND OTHER CITY OFFICIALS

a) Communication from the Department of Finance, dated May 31, 2024, re: forwarding Retirement System Annual Report - Fiscal Year 2023.

b) Communication from the Department of Finance, dated May 31, 2024, re: forwarding various financial statements of the City of Livonia for the month ending February 29, 2024.

c) Communication from the Department of Finance, dated May 31, 2024, re: forwarding various financial statements of the City of Livonia for the month ending March 31, 2024.

CONSENT AGENDA

1. REQUEST TO WAIVE THE CITY'S NOISE ORDINANCE: Joseph Coogan, re: to host a graduation party with a DJ in the backyard of the home located at 19291 Lathers St, on Saturday, June 22, 2024, from 1:00 p.m. until 10:00 p.m.

2. REQUEST TO WAIVE THE CITY'S NOISE ORDINANCE: Ashley Morris, Community Opportunity Center, NPHC, re: to hold a company family picnic with a DJ at Rotary Park, on Thursday, September 19, 2024, from 4:00 p.m. to 6:00 p.m.

3. REAPPOINTMENT OF JAMES BARINGHAUS TO THE ZONING BOARD OF APPEALS: Laura M. Toy, Councilmember, re: for a three-year term which will expire on July 12, 2027.

4. REAPPOINTMENT OF GREGORY G. COPPOLA TO THE ZONING BOARD OF APPEALS: Rob Gjonaj Donovic, Councilmember, re: for a three-year term which will expire on July 12, 2027.

5. REAPPOINTMENT OF MARC ROTONDO TO THE ZONING BOARD OF APPEALS: Scott Morgan, Councilmember, re: for a three-year term which will expire on July 12, 2027.

6. REQUEST TO APPROVE SUPPORT FOR LEGISLATION FOR THE GROUND EMERGENCY MEDICAL TRANSPORTATION (GEMT) program: Livonia Fire & Rescue, re: in order to enhance our emergency medical transportation services and potentially secure significant additional funding for the Fire Department.

7. REQUEST TO EXECUTE THE 2024 AGREEMENT BETWEEN THE CITY OF LIVONIA AND SMART: Livonia Housing Commission, re: to allow the Livonia Community Transit Program to receive the Municipal and Community Credits in the amount of $89,424.

8. REQUEST TO APPROVE SPECIALIZED SERVICES OPERATING ASSISTANCE PROGRAM THIRD PARTY CONTRACT FOR THE PERIOD OF OCTOBER 1, 2023, THROUGH SEPTEMBER 30, 2024, BETWEEN THE CITY OF LIVONIA AND SMART: Livonia Housing Commission, re: with grant funds to be used for the Livonia Community Transit Program to provide lift-equipped transportation to the senior and disabled residents of the City.

9. REQUEST FOR AUTHORIZATION TO WAIVE THE SEALED BID PROCESS AND PURCHASE FROM SOLE SOURCE PROVIDER: Department of Public Works, re: for the purchase of stormwater, water main and sanitary manhole-related items in an amount not to exceed $150,000.00 annually, for the period of July 1, 2024, to June 30, 2025.

10. REQUEST TO AMEND THE CONTRACT WITH OHM ADVISORS: Engineering Division, re: for Construction Engineering Services for the 2024 Water Main Replacement Project (Harrison Road and Westfield Avenue) from the Unexpended Fund Balance of the Water and Sewer Fund to be reimbursed by the proceeds of the Drinking Water Revolving Fund Revenue Bonds. (CR 336-21)

11. AWARD OF CONTRACT: Engineering Division, re: for the interior renovations at the Robert and Janet Bennett Civic Center Library, from the Unexpended Fund Balance of the Library Fund. (CR 378-20)

12. AWARD OF CONTRACT: Engineering Division, re: for Phase 3 of the DPW Security Camera Installation, from budgeted funds. (CR 148-22 and 273-23)

13. REQUEST TO AMEND COUNCIL RESOLUTION 017-24: Department of Law, re: to designate the Director of Finance, Debra Peck Lichtenberg, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority.

UNFINISHED BUSINESS

14. AWARD OF CONTRACT: Inspection Department, re: for BS&A Cloud-based software, licensing and training, for a total amount of $249,480.00, with a not-to-exceed annual increase of 5%, from budgeted funds.

15. REQUEST FOR AUTHORIZATION TO PURCHASE TWO (2) DUMP TRUCKS THROUGH THE ROCHESTER HILLS CO-OP AWARD AGREEMENT: Public Works Division, re: for use by the Roads Department, from budgeted funds.

16. AWARD OF CONTRACT: Department of Public Works, re: for a maintenance service contract for sanitary sewer rehabilitation for a period of three (3) years with an option to renew for an additional two (2) year period, from budgeted funds.

17. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinances, as amended: Department of Parks and Recreation, re: to amend Chapter 8.24.050 (Keeping wild animals, birds and bees) in order to allow for introducing bee hives on park property for educational purposes.
First Reading given by Councilmember Jim Jolly on June 3, 2024.

18. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinances, as amended: Department of Law, re: to Title 2, Chapter 23 (Department of Information Systems), in order to remove the role of the Director of Finance in the responsibility for management of the Director of Information Systems.
First Reading given by Councilmember Jim Jolly on June 3, 2024.

19. ROLL CALL: Proposed Amendment to the Livonia Zoning Ordinance, as amended: Department of Law, re: Petition 2024-01-01-01 submitted by SR&D Development, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).
First Reading given by Councilmember Rob Gjonaj Donovic on June 3, 2024.

20. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 040 of Title 13, Chapter 08 (Water Services Rates and Revenues) to provide for changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

21. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 050 of Title 13, Chapter 08 (Water Service Rates and Revenues) to provide changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.
First reading given by Council Vice President Martha Ptashnik on June 3, 2024.

22. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 050 of Title 13, Chapter 28 (Industrial Waste Surcharge) to provide for changes in the industrial waste surcharge rate to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

23. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 120 of Title 13, Chapter 20 (Livonia Sewage Disposal System) to provide for changes to the sewer disposal and maintenance rates to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

24. ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: Section 130 of Title 13, Chapter 20 (Livonia Sewage Disposal System) to provide for changes to the special rates for designated uses to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

NEW BUSINESS

25. ADOPTION OF A RESOLUTION PLACING SPECIAL ASSESSMENTS UPON REFERENCED PROPERTIES WHOSE OWNERS HAVE NOT PAID CHARGES CONNECTED WITH THE 2022 DELAYED SIDEWALK PROGRAM (CONTRACT 22-G) AND/OR THE 2023 SIDEWALK PROGRAM (CONTRACT 23-G), SINGLE LOT ASSESSMENTS: Office of the Treasurer, re: same. (CR 400-23 and CR 401-23)

AUDIENCE COMMUNICATION

NOTICE(S)

In accordance with Title II of the American with Disabilities Act as it pertains to access to Public Meetings, the City Clerk's Office of the City of Livonia, upon adequate notice, will make reasonable accommodations for persons with disabilities. Please call (734) 466-2236 or email clerk@livonia.gov as soon as possible if you need assistance. Council agendas are available on the City's website www.livonia.gov - under Your Government, City Council, Agendas & Minutes.

LORI L. MILLER, CITY CLERK

LETTER TO THE LIVONIA CITY COUNCIL

Finance
May 31, 2024

MEETING DATE	PRESENTED BY
R061724	Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

a. Communication from the Department of Finance, dated May 31, 2024, re: forwarding Retirement System Annual Report - Fiscal Year 2023.

BACKGROUND DETAILS

Public Act 202 of 2017, the Protecting Local Government Retirement and Benefits Act, includes reporting requirements to the Michigan Department of Treasury for pension and retiree healthcare plans. Attached are the completed Forms 5572, which have been transmitted to Treasury.

The Act also requires that the report be posted on the City website and transmitted to City Council.

As you can note from these reports, the plans are sufficiently funded and do not trigger "underfunded status" as defined by the Act. Therefore, no further action is required.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

It is respectfully requested that City Council receive and file these reports.

ATTACHMENTS

1. Form 5572 - Pension and OPEB-PA 202 of 2017-FYE2023

APPROVED BY

Debra A. Lichtenberg

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 31, 2024

Maureen Miller Brosnan

Maureen Miller Brosnan, Mayor

Date: May 31, 2024

Michigan Department of Treasury
Form 5572 (7-20)

The Protecting Local Government Retirement and Benefits Act (PA 202 of 2017) & Public Act 530 of 2016 Pension Report

Enter Local Government Name	City of Livonia	Instructions: For a list of detailed instructions on how to complete and submit this form, visit michigan.gov/LocalRetirementReporting.
Enter Six-Digit Municode	822190	
Unit Type	City	
Fiscal Year End Month	November	
Fiscal Year (four-digit year only, e.g. 2019)	2023	
Contact Name (Chief Administrative Officer)	Debra Lichtenberg	Questions: For questions, please email LocalRetirementReporting@michigan.gov. Return this original Excel file. Do not submit a scanned image or PDF.
Title if not CAO	Finance Director	
CAO (or designee) Email Address	dlichtenberg@livonia.gov	
Contact Telephone Number		

Pension System Name (not division) 1	City of Livonia Employees Retirement System	If your pension system is separated by divisions, you would only enter one system. For example, one could have different divisions of the same system for union and non-union employees. However, these would be only one system and should be reported as such on this form.
Pension System Name (not division) 2	City of Livonia Police & Fire Revised Retirement Plan	
Pension System Name (not division) 3		
Pension System Name (not division) 4		
Pension System Name (not division) 5		

Line	Descriptive Information	Source of Data	System 1	System 2	System 3	System 4	System 5
1	Is this unit a primary government (County, Township, City, Village)?	Calculated	YES	YES	YES	YES	YES
2	Provide the name of your retirement pension system	Calculated from above	City of Livonia Employees Retirement System	City of Livonia Police & Fire Revised Retirement			
3	**Financial Information**						
4	Enter retirement pension system's assets (system fiduciary net position ending)	Most Recent Audit Report	199,699,919	8,211,239			
5	Enter retirement pension system's liabilities (total pension liability ending)	Most Recent Audit Report	233,181,713	9,102,686			
6	Funded ratio	Calculated	85.6%	90.2%			
7	Actuarially Determined Contribution (ADC)	Most Recent Audit Report	1,786,885	2,585,480			
8	Governmental Fund Revenues	Most Recent Audit Report	123,782,530	123,782,530			
9	All systems combined ADC/Governmental fund revenues	Calculated	3.5%	3.5%			
10	**Membership**						
11	Indicate number of active members	Actuarial Funding Valuation used in Most Recent Audit Report	13	163			
12	Indicate number of inactive members	Actuarial Funding Valuation used in Most Recent Audit Report	3	20			
13	Indicate number of retirees and beneficiaries	Actuarial Funding Valuation used in Most Recent Audit Report	555	1			
14	**Investment Performance**						
15	Enter actual rate of return - prior 1-year period	Actuarial Funding Valuation used in Most Recent Audit Report or System Investment Provider	10.02%	7.67%			
16	Enter actual rate of return - prior 5-year period	Actuarial Funding Valuation used in Most Recent Audit Report or System Investment Provider	8.47%	0.00%			
17	Enter actual rate of return - prior 10-year period	Actuarial Funding Valuation used in Most Recent Audit Report or System Investment Provider	7.27%	0.00%			
18	**Actuarial Assumptions**						
19	Actuarial assumed rate of investment return	Actuarial Funding Valuation used in Most Recent Audit Report	7.00%	7.00%			
20	Amortization method utilized for funding the system's unfunded actuarial accrued liability, if any	Actuarial Funding Valuation used in Most Recent Audit Report	Level Dollar	Level Percent			
21	Amortization period utilized for funding the system's unfunded actuarial accrued liability, if any	Actuarial Funding Valuation used in Most Recent Audit Report	11	16			
22	Is each division within the system closed to new employees?	Actuarial Funding Valuation used in Most Recent Audit Report	Yes	No			
23	**Uniform Assumptions**						
24	Enter retirement pension system's actuarial value of assets using uniform assumptions	Actuarial Funding Valuation used in Most Recent Audit Report	199,699,919	8,211,238			
25	Enter retirement pension system's actuarial accrued liabilities using uniform assumptions	Actuarial Funding Valuation used in Most Recent Audit Report	236,336,927	9,329,782			
26	Funded ratio using uniform assumptions	Calculated	84.5%	88.0%			
27	Actuarially Determined Contribution (ADC) using uniform assumptions	Actuarial Funding Valuation used in Most Recent Audit Report	2,713,979	2,952,208			
28	All systems combined ADC/Governmental fund revenues	Calculated	4.6%	4.6%			
29	**Pension Trigger Summary**						
30	Does this system trigger "underfunded status" as defined by PA 202 of 2017?	**Primary government triggers:** Less than 60% funded AND greater than 10% ADC/Governmental fund revenues. **Non-Primary government triggers:** Less than 60% funded	NO	NO	NO	NO	NO

Requirements (For your information, the following are requirements of P.A. 202 of 2017)
Local governments must post the current year report on their website or in a public place.
The local government must electronically submit the form to its governing body.
Local governments must have had an actuarial experience study conducted by the plan actuary for each retirement system at least every 5 years.
Local governments must have had a peer actuarial audit conducted by an actuary that is not the plan actuary OR replace the plan actuary at least every 8 years.

By emailing this report to the Michigan Department of Treasury, the local government acknowledges that this report is complete and accurate in all known respects.

Michigan Department of Treasury
Form 5572 (7-20)

The Protecting Local Government Retirement and Benefits Act (PA 202 of 2017) Health Care (OPEB) Report

Enter Local Government Name	City of Livonia	Instructions: For a list of detailed instructions on how to complete and submit this form, visit michigan.gov/LocalRetirementReporting.
Enter Six-Digit Municode	822190	
Unit Type	City	
Fiscal Year End Month	November	
Fiscal Year (four-digit year only, e.g. 2019)	2023	
Contact Name (Chief Administrative Officer)	Debra Lichtenberg	Questions: For questions, please email LocalRetirementReporting@michigan.gov. Return this original Excel file. Do not submit a scanned image or PDF.
Title if not CAO	Finance Director	
CAO (or designee) Email Address	dlichtenberg@livonia.gov	
Contact Telephone Number		

OPEB System Name (not division) 1	City of Livonia Retiree Health and Disability	If your OPEB system is separated by divisions, you would only enter one system. For example, one could have different divisions of the same system for union and non-union employees. However, these would be only one system and should be reported as such on this form.
OPEB System Name (not division) 2		
OPEB System Name (not division) 3		
OPEB System Name (not division) 4		
OPEB System Name (not division) 5		

Line	Descriptive Information	Source of Data	System 1	System 2	System 3	System 4	System 5
1	Is this unit a primary government (County, Township, City, Village)?	Calculated	YES	YES	YES	YES	YES
2	Provide the name of your retirement health care system	Calculated from above	City of Livonia Retiree Health and Disability				
3	**Financial Information**						
4	Enter retirement health care system's assets (system fiduciary net position ending)	Most Recent Audit Report	129,152,659				
5	Enter retirement health care system's liabilities (total OPEB liability)	Most Recent Audit Report	131,432,743				
6	Funded ratio	Calculated	98.3%				
7	Actuarially determined contribution (ADC)	Most Recent Audit Report	5,956,424				
7a	Do the financial statements include an ADC calculated in compliance with Numbered Letter 2018-3?	Most Recent Audit Report	YES				
8	Governmental Fund Revenues	Most Recent Audit Report	123,782,530				
9	All systems combined ADC/Governmental fund revenues	Calculated	4.8%				
10	**Membership**						
11	Indicate number of active members	Actuarial Funding Valuation used in Most Recent Audit Report	459				
12	Indicate number of inactive members	Actuarial Funding Valuation used in Most Recent Audit Report	31				
13	Indicate number of retirees and beneficiaries	Actuarial Funding Valuation used in Most Recent Audit Report	696				
14	Provide the amount of premiums paid on behalf of the retirants	Most Recent Audit Report or Accounting Records	7,821,179				
15	**Investment Performance**						
16	Enter actual rate of return - prior 1-year period	Actuarial Funding Valuation used in Most Recent Audit Report or System Investment Provider	9.89%				
17	Enter actual rate of return - prior 5-year period	Actuarial Funding Valuation used in Most Recent Audit Report or System Investment Provider	7.44%				
18	Enter actual rate of return - prior 10-year period	Actuarial Funding Valuation used in Most Recent Audit Report or System Investment Provider	6.87%				
19	**Actuarial Assumptions**						
20	Assumed Rate of Investment Return	Actuarial Funding Valuation used in Most Recent Audit Report	7.00%				
21	Enter discount rate	Actuarial Funding Valuation used in Most Recent Audit Report	7.00%				
22	Amortization method utilized for funding the system's unfunded actuarial accrued liability, if any	Actuarial Funding Valuation used in Most Recent Audit Report	Level Percent				
23	Amortization period utilized for funding the system's unfunded actuarial accrued liability, if any	Actuarial Funding Valuation used in Most Recent Audit Report	24				
24	Is each division within the system closed to new employees?	Actuarial Funding Valuation used in Most Recent Audit Report	Yes				
25	Health care inflation assumption for the next year	Actuarial Funding Valuation used in Most Recent Audit Report	8.00%				
26	Health care inflation assumption - Long-Term Trend Rate	Actuarial Funding Valuation used in Most Recent Audit Report	4.50%				
27	**Uniform Assumptions**						
28	Enter retirement health care system's actuarial value of assets using uniform assumptions	Actuarial Funding Valuation used in Most Recent Audit Report	129,152,658				
29	Enter retirement health care system's actuarial accrued liabilities using uniform assumptions	Actuarial Funding Valuation used in Most Recent Audit Report	131,999,703				
30	Funded ratio using uniform assumptions	Calculated	97.8%				
31	Actuarially Determined Contribution (ADC) using uniform assumptions	Actuarial Funding Valuation used in Most Recent Audit Report	7,407,565				
32	All systems combined ADC/Governmental fund revenues	Calculated	6.0%				
33	**Summary Report**						
34	Did the local government pay the retiree insurance premiums for the year?	Accounting Records	YES				
35	Did the local government pay the normal cost for employees hired after June 30, 2018?	Accounting Records	N/A				
36	Does this system trigger "underfunded status" as defined by PA 202 of 2017?	**Primary government triggers**: Less than 40% funded AND greater than 12% ARC/Governmental fund revenues. **Non-Primary government** triggers: Less than 40% funded	NO	NO	NO	NO	NO

Requirements (For your information, the following are requirements of P.A. 202 of 2017)
Local governments must post the current year report on their website or in a public place
The local government must electronically submit the form to its governing body.
Local governments must have had an actuarial experience study conducted by the plan actuary for each retirement system at least every 5 years
Local governments must have had a peer actuarial audit conducted by an actuary that is not the plan actuary OR replace the plan actuary at least every 8 years.

By emailing this report to the Michigan Department of Treasury, the local government acknowledges that this report is complete and accurate in all known respects.

LETTER TO THE LIVONIA CITY COUNCIL

Finance
May 31, 2024

MEETING DATE	PRESENTED BY
R061724	Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

b. Communication from the Department of Finance, dated May 31, 2024, re: forwarding various financial statements of the City of Livonia for the month ending February 29, 2024.

BACKGROUND DETAILS

Attached hereto are the various financial statements of the City of Livonia for the month ending February 29, 2024. These statements are summarized so that you may make a quick financial overview of the various funds. Detailed statements, in support of the summarized statements, have been forwarded electronically to the Council Office.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

We respectfully request that City Council receive and file this report.

ATTACHMENTS

1. BUDGET TO ACTUAL - COUNCIL SUMMARY - FEBRUARY 2024

APPROVED BY

Debra A. Lichtenberg

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 31, 2024

Maureen Miller Brosnan

Maureen Miller Brosnan, Mayor

Date: May 31, 2024

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization		Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund	**101 - GENERAL FUND**									
REVENUE										
Department	**000 - ACCOUNT BALANCES**	71,521,472.00	.00	71,521,472.00	3,500,987.93	.00	46,837,614.57	24,683,857.43	65	42,220,217.61
	REVENUE TOTALS	$71,521,472.00	$0.00	$71,521,472.00	$3,500,987.93	$0.00	$46,837,614.57	$24,683,857.43	65%	$42,220,217.61
EXPENSE										
Department	**101 - CITY COUNCIL**	334,005.00	.00	334,005.00	23,052.92	.00	62,500.33	271,504.67	19	55,807.40
Department	**173 - MAYOR'S OFFICE**	584,792.00	.00	584,792.00	48,570.11	.00	133,693.36	451,098.64	23	115,691.80
Department	**174 - COMMUNICATIONS**	429,649.00	.00	429,649.00	29,410.94	.00	86,694.87	342,954.13	20	74,159.01
Department	**175 - GOVERNMENT AFFAIRS**	13,801.00	94,000.00	107,801.00	1,150.09	.00	3,450.27	104,350.73	3	10,271.89
Department	**191 - ACCOUNTING**	326,094.00	.00	326,094.00	(16,528.24)	.00	27,920.72	298,173.28	9	18,358.88
Department	**192 - FINANCE DEPARTMENT**	534,554.00	(13,000.00)	521,554.00	29,684.24	.00	88,122.60	433,431.40	17	99,136.32
Department	**215 - CITY CLERK**	633,636.00	.00	633,636.00	46,069.51	.00	129,742.43	503,893.57	20	125,158.69
Department	**223 - INDEPENDENT AUDIT**	54,512.00	.00	54,512.00	(1,566.00)	.00	(4,698.00)	59,210.00	-9	25,682.74
Department	**228 - INFORMATION SYSTEMS**	1,605,679.00	.00	1,605,679.00	81,732.05	140,429.34	379,263.84	1,085,985.82	32	386,493.44
Department	**236 - ETHICS BOARD**	550.00	.00	550.00	.00	.00	.00	550.00	0	.00
Department	**247 - BOARD OF REVIEW**	3,545.00	.00	3,545.00	.00	.00	344.48	3,200.52	10	344.48
Department	**253 - TREASURER**	679,921.00	.00	679,921.00	39,210.78	.00	140,510.78	539,410.22	21	132,715.84
Department	**257 - ASSESSING**	756,439.00	.00	756,439.00	52,425.73	.00	167,600.94	588,838.06	22	152,020.99
Department	**261 - UTILITIES AND SUPPLIES**	546,613.00	.00	546,613.00	24,465.96	.00	116,808.78	429,804.22	21	89,875.30
Department	**262 - ELECTION COMMISSION**	679,174.00	.00	679,174.00	42,968.16	.00	124,129.44	555,044.56	18	73,520.17
Department	**263 - INSURANCE-GENERAL**	102,452.00	.00	102,452.00	(4,378.00)	.00	270,596.71	(168,144.71)	264	332,230.72
Department	**264 - INSURANCE-WORKERS COMP**	435,194.00	.00	435,194.00	36,597.72	.00	301,379.02	133,814.98	69	316,897.60
Department	**265 - NON DEPARTMENTAL**	4,000.00	.00	4,000.00	.00	.00	.00	4,000.00	0	.00
Department	**266 - LAW DEPARTMENT**	980,880.00	.00	980,880.00	75,975.50	.00	203,608.16	777,271.84	21	186,172.68
Department	**267 - EMPLOYEE BENEFITS CONTROL**	42,000.00	.00	42,000.00	162,689.39	.00	(286,820.46)	328,820.46	-683	(668,836.39)
Department	**268 - NON-DEPT CAPITAL PROJECTS**	5,000.00	.00	5,000.00	.00	.00	.00	5,000.00	0	.00
Department	**269 - CIVIL SERVICE**	959,897.00	.00	959,897.00	41,196.84	513.01	168,229.85	791,154.14	18	137,740.70
Department	**270 - TERMINATION PAY**	2,395,000.00	.00	2,395,000.00	57,181.84	.00	57,181.84	2,337,818.16	2	217,987.68
Department	**271 - LABOR RELATIONS**	92,500.00	.00	92,500.00	182.00	.00	11,999.00	80,501.00	13	8,950.00
Department	**272 - DUES AND SUBSCRIPTIONS**	58,000.00	.00	58,000.00	.00	.00	.00	58,000.00	0	5,269.00
Department	**286 - 16TH DISTRICT COURT**	3,502,513.00	.00	3,502,513.00	262,181.28	.00	756,648.95	2,745,864.05	22	688,104.35
Department	**302 - TRAFFIC BUREAU**	1,262,039.00	.00	1,262,039.00	95,286.75	.00	241,472.09	1,020,566.91	19	213,189.15
Department	**304 - POLICE ADMINISTRATION**	3,010,074.00	.00	3,010,074.00	214,604.93	.00	561,778.37	2,448,295.63	19	518,063.85
Department	**306 - POLICE DATA PROCESSING**	999,901.00	.00	999,901.00	125,370.83	36,380.05	249,926.01	713,594.94	29	140,553.49
Department	**307 - DETECTIVE BUREAU**	3,357,544.00	.00	3,357,544.00	224,608.42	.00	596,257.51	2,761,286.49	18	666,879.71
Department	**309 - AUTOMOTIVE SERVICE**	586,150.00	.00	586,150.00	19,593.48	.00	67,357.15	518,792.85	11	111,587.01
Department	**310 - POLICE COMMUNICATIONS**	1,014,332.00	.00	1,014,332.00	77,026.73	.00	195,129.00	819,203.00	19	170,464.51
Department	**313 - CROSSING GUARDS**	81,488.00	.00	81,488.00	7,444.00	.00	15,911.77	65,576.23	20	15,330.53
Department	**316 - SCHOOL LIAISON**	578,567.00	.00	578,567.00	45,347.07	.00	121,114.86	457,452.14	21	107,614.38
Department	**318 - OFFICE OF EMERG PREP**	184,118.00	.00	184,118.00	12,129.47	.00	51,212.90	132,905.10	28	47,583.43
Department	**319 - RESERVE POL/SPECIAL EVENT**	407,969.00	.00	407,969.00	28,120.04	.00	65,208.43	342,760.57	16	57,377.19

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Fund **101 - GENERAL FUND**									
EXPENSE									
Department **325 - POLICE PATROL BUREAU**	14,764,790.00	.00	14,764,790.00	1,010,489.37	.00	2,663,027.79	12,101,762.21	18	2,399,344.64
Department **329 - INTELLIGENCE BUREAU**	2,582,175.00	.00	2,582,175.00	174,707.86	.00	503,526.15	2,078,648.85	20	396,517.20
Department **336 - FIRE ADMINISTRATION**	1,440,863.00	.00	1,440,863.00	97,782.77	2,776.29	289,939.64	1,148,147.07	20	297,283.60
Department **338 - FIRE FIGHTING**	14,759,162.00	.00	14,759,162.00	990,258.02	.00	2,724,123.26	12,035,038.74	18	2,828,377.97
Department **341 - FIRE PREVENTION**	865,073.00	.00	865,073.00	63,190.54	.00	169,378.41	695,694.59	20	177,565.67
Department **371 - INSPECTION**	2,007,116.00	.00	2,007,116.00	128,316.95	.00	337,592.76	1,669,523.24	17	314,198.14
Department **381 - BLDG CODE BD OF APPEALS**	1,361.00	.00	1,361.00	.00	.00	.00	1,361.00	0	.00
Department **435 - TRAFFIC COMMISSION**	2,353.00	.00	2,353.00	145.32	.00	435.98	1,917.02	19	462.88
Department **441 - PUBLIC SERV ADMIN**	85,450.00	.00	85,450.00	838.03	.00	(48,058.20)	133,508.20	-56	(50,811.59)
Department **443 - PUBLIC SERV-EQUIP MAINT**	108,602.00	.00	108,602.00	6,013.96	.00	(143,989.75)	252,591.75	-133	(137,855.17)
Department **447 - ENGINEERING**	43,534.00	.00	43,534.00	(21,900.98)	.00	(84,316.56)	127,850.56	-194	(71,124.01)
Department **448 - STREET LIGHTING**	266,328.00	.00	266,328.00	23,785.55	.00	71,573.21	194,754.79	27	72,190.82
Department **463 - MAINTENANCE-STREET**	600,843.00	.00	600,843.00	108,954.46	3,300.00	24,565.71	572,977.29	5	82,515.37
Department **523 - PUBLIC SERV-BLDG MAINT**	2,026,738.00	.00	2,026,738.00	115,774.83	15,740.85	318,281.64	1,692,715.51	16	291,886.28
Department **524 - PARKS**	1,726,526.00	.00	1,726,526.00	93,886.87	5,333.57	185,891.55	1,535,300.88	11	185,769.75
Department **701 - PLANNING**	726,556.00	(49,500.00)	677,056.00	36,736.16	.00	126,314.61	550,741.39	19	135,031.75
Department **702 - ZONING BOARD OF APPEALS**	53,825.00	(31,500.00)	22,325.00	2,087.94	.00	8,474.71	13,850.29	38	8,370.98
Department **752 - RECREATION ADMINISTRATION**	352,803.00	.00	352,803.00	25,509.60	.00	56,107.88	296,695.12	16	11,514.33
Department **758 - RECREATION FACILITIES**	54,189.00	.00	54,189.00	1,255.07	.00	1,704.73	52,484.27	3	758.25
Department **759 - RECREATION ATHLETICS**	144,447.00	.00	144,447.00	4,993.50	.00	5,949.48	138,497.52	4	8,182.88
Department **820 - PARKS & REC - SENIOR SERVICES**	564,761.00	.00	564,761.00	46,082.36	.00	122,515.63	442,245.37	22	131,675.45
Department **821 - P&R - GREENMEAD AND CULTURAL**	1,099,726.00	.00	1,099,726.00	64,466.81	41,393.65	180,733.51	877,598.84	20	192,197.46
EXPENSE TOTALS	$71,519,803.00	$0.00	$71,519,803.00	$4,855,179.53	$245,866.76	$12,618,048.14	$58,655,888.10	18%	$11,906,449.19
Fund **101 - GENERAL FUND** Totals									
REVENUE TOTALS	71,521,472.00	.00	71,521,472.00	3,500,987.93	.00	46,837,614.57	24,683,857.43	65%	42,220,217.61
EXPENSE TOTALS	71,519,803.00	.00	71,519,803.00	4,855,179.53	245,866.76	12,618,048.14	58,655,888.10	18%	11,906,449.19
Fund **101 - GENERAL FUND** Totals	$1,669.00	$0.00	$1,669.00	($1,354,191.60)	($245,866.76)	$34,219,566.43	($33,972,030.67)		$30,313,768.42

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Fund **202 - MAJOR STREET FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	9,344,198.00	.00	9,344,198.00	988,539.30	.00	1,012,756.11	8,331,441.89	11	953,833.01
REVENUE TOTALS	$9,344,198.00	$0.00	$9,344,198.00	$988,539.30	$0.00	$1,012,756.11	$8,331,441.89	11%	$953,833.01
EXPENSE									
Department **448 - STREET LIGHTING**	668,359.00	.00	668,359.00	44,500.00	.00	133,500.00	534,859.00	20	119,001.00
Department **451 - CONST-STREET AND BRIDGES**	60,000.00	.00	60,000.00	.00	.00	.00	60,000.00	0	.00
Department **463 - MAINTENANCE-STREET**	1,133,076.00	255,226.00	1,388,302.00	33,612.12	.00	181,350.24	1,206,951.76	13	101,964.72
Department **475 - MAINTENANCE-TRAFFIC SERV**	.00	.00	.00	.00	.00	.00	.00	+++	.00
Department **478 - MAINT-FREEWAY LIGHTING**	20,000.00	.00	20,000.00	1,579.63	.00	4,743.74	15,256.26	24	4,488.50
Department **479 - SNOW AND ICE REMOVAL**	327,061.00	.00	327,061.00	27,255.00	.00	81,765.00	245,296.00	25	80,307.00
Department **483 - ADMIN, ENGIN RECORD KEEPI**	138,700.00	.00	138,700.00	11,558.00	.00	34,674.00	104,026.00	25	36,801.00
Department **484 - FUND TRANSFERS**	7,600,000.00	.00	7,600,000.00	633,333.00	.00	1,899,999.00	5,700,001.00	25	1,674,999.99
EXPENSE TOTALS	$9,947,196.00	$255,226.00	$10,202,422.00	$751,837.75	$0.00	$2,336,031.98	$7,866,390.02	23%	$2,017,562.21
Fund **202 - MAJOR STREET FUND** Totals									
REVENUE TOTALS	9,344,198.00	.00	9,344,198.00	988,539.30	.00	1,012,756.11	8,331,441.89	11%	953,833.01
EXPENSE TOTALS	9,947,196.00	255,226.00	10,202,422.00	751,837.75	.00	2,336,031.98	7,866,390.02	23%	2,017,562.21
Fund **202 - MAJOR STREET FUND** Totals	($602,998.00)	($255,226.00)	($858,224.00)	$236,701.55	$0.00	($1,323,275.87)	$465,051.87		($1,063,729.20)

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Fund **203 - LOCAL STREET FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	11,149,971.00	.00	11,149,971.00	1,009,221.12	.00	2,285,847.89	8,864,123.11	21	2,038,758.98
REVENUE TOTALS	$11,149,971.00	$0.00	$11,149,971.00	$1,009,221.12	$0.00	$2,285,847.89	$8,864,123.11	21%	$2,038,758.98
EXPENSE									
Department **448 - STREET LIGHTING**	137,000.00	.00	137,000.00	11,416.00	.00	34,248.00	102,752.00	25	32,499.00
Department **451 - CONST-STREET AND BRIDGES**	125,000.00	.00	125,000.00	.00	.00	.00	125,000.00	0	.00
Department **463 - MAINTENANCE-STREET**	1,959,694.00	.00	1,959,694.00	146,119.00	.00	438,357.00	1,521,337.00	22	394,545.00
Department **475 - MAINTENANCE-TRAFFIC SERV**	.00	.00	.00	.00	.00	.00	.00	+++	.00
Department **479 - SNOW AND ICE REMOVAL**	450,169.00	.00	450,169.00	37,514.00	.00	112,542.00	337,627.00	25	112,290.00
Department **483 - ADMIN, ENGIN RECORD KEEPI**	769,870.00	.00	769,870.00	64,154.00	.00	192,462.00	577,408.00	25	177,408.00
Department **484 - FUND TRANSFERS**	7,800,000.00	.00	7,800,000.00	650,000.00	.00	1,950,000.00	5,850,000.00	25	1,787,499.00
EXPENSE TOTALS	$11,241,733.00	$0.00	$11,241,733.00	$909,203.00	$0.00	$2,727,609.00	$8,514,124.00	24%	$2,504,241.00
Fund **203 - LOCAL STREET FUND** Totals									
REVENUE TOTALS	11,149,971.00	.00	11,149,971.00	1,009,221.12	.00	2,285,847.89	8,864,123.11	21%	2,038,758.98
EXPENSE TOTALS	11,241,733.00	.00	11,241,733.00	909,203.00	.00	2,727,609.00	8,514,124.00	24%	2,504,241.00
Fund **203 - LOCAL STREET FUND** Totals	($91,762.00)	$0.00	($91,762.00)	$100,018.12	$0.00	($441,761.11)	$349,999.11		($465,482.02)

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Fund **204 - ROAD - SIDEWALK & TREE**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	13,033,702.00	.00	13,033,702.00	666,603.09	.00	6,600,448.22	6,433,253.78	51	6,546,220.21
REVENUE TOTALS	$13,033,702.00	$0.00	$13,033,702.00	$666,603.09	$0.00	$6,600,448.22	$6,433,253.78	51%	$6,546,220.21
EXPENSE									
Department **441 - PUBLIC SERV ADMIN**	33,338.00	.00	33,338.00	2,778.00	.00	8,334.00	25,004.00	25	7,740.00
Department **447 - ENGINEERING**	2,700,196.00	90,366.00	2,790,562.00	44,763.50	.00	253,954.12	2,536,607.88	9	394,282.52
Department **463 - MAINTENANCE-STREET**	10,880,000.00	78,480.00	10,958,480.00	.00	.00	.00	10,958,480.00	0	6,983.20
Department **530 - FORESTRY**	150,000.00	9,855.00	159,855.00	10,581.12	.00	10,581.12	149,273.88	7	.00
EXPENSE TOTALS	$13,763,534.00	$178,701.00	$13,942,235.00	$58,122.62	$0.00	$272,869.24	$13,669,365.76	2%	$409,005.72
Fund **204 - ROAD - SIDEWALK & TREE** Totals									
REVENUE TOTALS	13,033,702.00	.00	13,033,702.00	666,603.09	.00	6,600,448.22	6,433,253.78	51%	6,546,220.21
EXPENSE TOTALS	13,763,534.00	178,701.00	13,942,235.00	58,122.62	.00	272,869.24	13,669,365.76	2%	409,005.72
Fund **204 - ROAD - SIDEWALK & TREE** Totals	($729,832.00)	($178,701.00)	($908,533.00)	$608,480.47	$0.00	$6,327,578.98	($7,236,111.98)		$6,137,214.49

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Fund **208 - COMMUNITY RECREATION**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	9,239,176.00	.00	9,239,176.00	465,136.15	.00	5,408,973.11	3,830,202.89	59	5,289,402.07
REVENUE TOTALS	$9,239,176.00	$0.00	$9,239,176.00	$465,136.15	$0.00	$5,408,973.11	$3,830,202.89	59%	$5,289,402.07
EXPENSE									
Department **755 - RECREATION CENTER**	7,557,580.00	496,262.00	8,053,842.00	450,158.97	300,353.33	1,230,217.13	6,523,271.54	19	1,150,187.62
Department **756 - OTHER RECREATION**	172,100.00	324,298.00	496,398.00	15,006.36	118,817.50	22,887.94	354,692.56	29	34,538.08
Department **757 - ICE RINK**	390,446.00	.00	390,446.00	52.25	.00	52.25	390,393.75	0	52.25
Department **776 - SPECIAL EVENTS**	168,611.00	.00	168,611.00	2,892.60	.00	13,042.45	155,568.55	8	11,560.13
Department **795 - SWIMMING POOL - BOTSFORD**	165,492.00	51,665.00	217,157.00	272.96	168.00	2,770.23	214,218.77	1	1,047.01
Department **796 - SWIMMING POOL - CLEMENT C**	551,775.00	(143,000.00)	408,775.00	531.00	45,688.00	4,870.97	358,216.03	12	1,520.90
Department **797 - SWIMMING POOL - SHELDON**	97,736.00	.00	97,736.00	152.40	168.00	491.91	97,076.09	1	415.85
EXPENSE TOTALS	$9,103,740.00	$729,225.00	$9,832,965.00	$469,066.54	$465,194.83	$1,274,332.88	$8,093,437.29	18%	$1,199,321.84
Fund **208 - COMMUNITY RECREATION** Totals									
REVENUE TOTALS	9,239,176.00	.00	9,239,176.00	465,136.15	.00	5,408,973.11	3,830,202.89	59%	5,289,402.07
EXPENSE TOTALS	9,103,740.00	729,225.00	9,832,965.00	469,066.54	465,194.83	1,274,332.88	8,093,437.29	18%	1,199,321.84
Fund **208 - COMMUNITY RECREATION** Totals	$135,436.00	($729,225.00)	($593,789.00)	($3,930.39)	($465,194.83)	$4,134,640.23	($4,263,234.40)		$4,090,080.23

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Fund **211 - DESIGNATED PURPOSE**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	150,000.00	.00	150,000.00	9,382.50	.00	26,377.75	123,622.25	18	25,171.20
REVENUE TOTALS	$150,000.00	$0.00	$150,000.00	$9,382.50	$0.00	$26,377.75	$123,622.25	18%	$25,171.20
EXPENSE									
Department **000 - ACCOUNT BALANCES**	180,000.00	.00	180,000.00	5,954.96	.00	14,770.72	165,229.28	8	44,137.48
EXPENSE TOTALS	$180,000.00	$0.00	$180,000.00	$5,954.96	$0.00	$14,770.72	$165,229.28	8%	$44,137.48
Fund **211 - DESIGNATED PURPOSE** Totals									
REVENUE TOTALS	150,000.00	.00	150,000.00	9,382.50	.00	26,377.75	123,622.25	18%	25,171.20
EXPENSE TOTALS	180,000.00	.00	180,000.00	5,954.96	.00	14,770.72	165,229.28	8%	44,137.48
Fund **211 - DESIGNATED PURPOSE** Totals	($30,000.00)	$0.00	($30,000.00)	$3,427.54	$0.00	$11,607.03	($41,607.03)		($18,966.28)

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Fund **219 - SP ASSESS-LIGHTING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	17,000.00	.00	17,000.00	1,720.62	.00	9,754.11	7,245.89	57	5,073.58
Department **457 - STREETLIGHTING**	1,086,610.00	.00	1,086,610.00	.00	.00	1,086,651.52	(41.52)	100	1,154,117.51
REVENUE TOTALS	$1,103,610.00	$0.00	$1,103,610.00	$1,720.62	$0.00	$1,096,405.63	$7,204.37	99%	$1,159,191.09
EXPENSE									
Department **000 - ACCOUNT BALANCES**	.00	.00	.00	.00	.00	.00	.00	+++	.00
Department **457 - STREETLIGHTING**	1,158,452.00	.00	1,158,452.00	92,836.55	.00	291,022.92	867,429.08	25	278,795.00
EXPENSE TOTALS	$1,158,452.00	$0.00	$1,158,452.00	$92,836.55	$0.00	$291,022.92	$867,429.08	25%	$278,795.00
Fund **219 - SP ASSESS-LIGHTING** Totals									
REVENUE TOTALS	1,103,610.00	.00	1,103,610.00	1,720.62	.00	1,096,405.63	7,204.37	99%	1,159,191.09
EXPENSE TOTALS	1,158,452.00	.00	1,158,452.00	92,836.55	.00	291,022.92	867,429.08	25%	278,795.00
Fund **219 - SP ASSESS-LIGHTING** Totals	($54,842.00)	$0.00	($54,842.00)	($91,115.93)	$0.00	$805,382.71	($860,224.71)		$880,396.09

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Fund **226 - MUNICIPAL REFUSE FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	14,062,303.00	.00	14,062,303.00	49,981.62	.00	12,666,504.74	1,395,798.26	90	12,905,790.11
REVENUE TOTALS	$14,062,303.00	$0.00	$14,062,303.00	$49,981.62	$0.00	$12,666,504.74	$1,395,798.26	90%	$12,905,790.11
EXPENSE									
Department **521 - SANITATION**	1,452,031.00	.00	1,452,031.00	93,527.13	.00	299,751.75	1,152,279.25	21	300,249.56
Department **528 - PUBLIC SERVICE**	14,524,078.00	355,217.00	14,879,295.00	946,771.14	.00	3,032,629.82	11,846,665.18	20	2,456,313.47
Department **529 - ANIMAL CONTROL**	410,048.00	.00	410,048.00	21,211.71	.00	50,650.72	359,397.28	12	56,020.16
EXPENSE TOTALS	$16,386,157.00	$355,217.00	$16,741,374.00	$1,061,509.98	$0.00	$3,383,032.29	$13,358,341.71	20%	$2,812,583.19
Fund **226 - MUNICIPAL REFUSE FUND** Totals									
REVENUE TOTALS	14,062,303.00	.00	14,062,303.00	49,981.62	.00	12,666,504.74	1,395,798.26	90%	12,905,790.11
EXPENSE TOTALS	16,386,157.00	355,217.00	16,741,374.00	1,061,509.98	.00	3,383,032.29	13,358,341.71	20%	2,812,583.19
Fund **226 - MUNICIPAL REFUSE FUND** Totals	($2,323,854.00)	($355,217.00)	($2,679,071.00)	($1,011,528.36)	$0.00	$9,283,472.45	($11,962,543.45)		$10,093,206.92

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Fund **242 - LIVONIA BROWNFIELD - LSRRF**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	180,000.00	.00	180,000.00	1,307.65	.00	89,447.94	90,552.06	50	68,695.53
REVENUE TOTALS	$180,000.00	$0.00	$180,000.00	$1,307.65	$0.00	$89,447.94	$90,552.06	50%	$68,695.53
EXPENSE									
Department **000 - ACCOUNT BALANCES**	38,300.00	.00	38,300.00	2,775.00	.00	8,325.00	29,975.00	22	7,920.00
EXPENSE TOTALS	$38,300.00	$0.00	$38,300.00	$2,775.00	$0.00	$8,325.00	$29,975.00	22%	$7,920.00
Fund **242 - LIVONIA BROWNFIELD - LSRRF** Totals									
REVENUE TOTALS	180,000.00	.00	180,000.00	1,307.65	.00	89,447.94	90,552.06	50%	68,695.53
EXPENSE TOTALS	38,300.00	.00	38,300.00	2,775.00	.00	8,325.00	29,975.00	22%	7,920.00
Fund **242 - LIVONIA BROWNFIELD - LSRRF** Totals	$141,700.00	$0.00	$141,700.00	($1,467.35)	$0.00	$81,122.94	$60,577.06		$60,775.53

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Fund **243 - LIVONIA BROWNFIELD REDEV AUTH**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	1,170,000.00	.00	1,170,000.00	.00	.00	520,689.87	649,310.13	45	293,895.84
REVENUE TOTALS	$1,170,000.00	$0.00	$1,170,000.00	$0.00	$0.00	$520,689.87	$649,310.13	45%	$293,895.84
EXPENSE									
Department **000 - ACCOUNT BALANCES**	1,170,000.00	.00	1,170,000.00	.00	.00	.00	1,170,000.00	0	.00
EXPENSE TOTALS	$1,170,000.00	$0.00	$1,170,000.00	$0.00	$0.00	$0.00	$1,170,000.00	0%	$0.00
Fund **243 - LIVONIA BROWNFIELD REDEV AUTH** Totals									
REVENUE TOTALS	1,170,000.00	.00	1,170,000.00	.00	.00	520,689.87	649,310.13	45%	293,895.84
EXPENSE TOTALS	1,170,000.00	.00	1,170,000.00	.00	.00	.00	1,170,000.00	0%	.00
Fund **243 - LIVONIA BROWNFIELD REDEV AUTH** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$520,689.87	($520,689.87)		$293,895.84

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **244 - ECONOMIC DEVEL CORP**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	1,000.00	.00	1,000.00	67.86	.00	329.81	670.19	33	181.37
REVENUE TOTALS	$1,000.00	$0.00	$1,000.00	$67.86	$0.00	$329.81	$670.19	33%	$181.37
EXPENSE									
Department **000 - ACCOUNT BALANCES**	107.00	.00	107.00	.00	.00	.00	107.00	0	.00
EXPENSE TOTALS	$107.00	$0.00	$107.00	$0.00	$0.00	$0.00	$107.00	0%	$0.00
Fund **244 - ECONOMIC DEVEL CORP** Totals									
REVENUE TOTALS	1,000.00	.00	1,000.00	67.86	.00	329.81	670.19	33%	181.37
EXPENSE TOTALS	107.00	.00	107.00	.00	.00	.00	107.00	0%	.00
Fund **244 - ECONOMIC DEVEL CORP** Totals	$893.00	$0.00	$893.00	$67.86	$0.00	$329.81	$563.19		$181.37

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Fund **248 - PLYMOUTH RD DEV AUTHORITY**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	799,117.00	.00	799,117.00	381.55	.00	1,226.21	797,890.79	0	1,013.22
REVENUE TOTALS	$799,117.00	$0.00	$799,117.00	$381.55	$0.00	$1,226.21	$797,890.79	0%	$1,013.22
EXPENSE									
Department **000 - ACCOUNT BALANCES**	842,524.00	.00	842,524.00	16,883.18	.00	34,110.36	808,413.64	4	16,005.05
EXPENSE TOTALS	$842,524.00	$0.00	$842,524.00	$16,883.18	$0.00	$34,110.36	$808,413.64	4%	$16,005.05
Fund **248 - PLYMOUTH RD DEV AUTHORITY** Totals									
REVENUE TOTALS	799,117.00	.00	799,117.00	381.55	.00	1,226.21	797,890.79	0%	1,013.22
EXPENSE TOTALS	842,524.00	.00	842,524.00	16,883.18	.00	34,110.36	808,413.64	4%	16,005.05
Fund **248 - PLYMOUTH RD DEV AUTHORITY** Totals	($43,407.00)	$0.00	($43,407.00)	($16,501.63)	$0.00	($32,884.15)	($10,522.85)		($14,991.83)

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **260 - MIDC GRANT**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	362,299.00	.00	362,299.00	.00	.00	259,543.80	102,755.20	72	418,643.64
REVENUE TOTALS	$362,299.00	$0.00	$362,299.00	$0.00	$0.00	$259,543.80	$102,755.20	72%	$418,643.64
EXPENSE									
Department **000 - ACCOUNT BALANCES**	362,299.00	.00	362,299.00	31,619.34	.00	70,172.68	292,126.32	19	46,816.63
EXPENSE TOTALS	$362,299.00	$0.00	$362,299.00	$31,619.34	$0.00	$70,172.68	$292,126.32	19%	$46,816.63
Fund **260 - MIDC GRANT** Totals									
REVENUE TOTALS	362,299.00	.00	362,299.00	.00	.00	259,543.80	102,755.20	72%	418,643.64
EXPENSE TOTALS	362,299.00	.00	362,299.00	31,619.34	.00	70,172.68	292,126.32	19%	46,816.63
Fund **260 - MIDC GRANT** Totals	$0.00	$0.00	$0.00	($31,619.34)	$0.00	$189,371.12	($189,371.12)		$371,827.01

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **261 - PUB. SAFETY COMMUNICATION**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	623,000.00	.00	623,000.00	12,117.18	.00	275,232.21	347,767.79	44	253,277.23
REVENUE TOTALS	$623,000.00	$0.00	$623,000.00	$12,117.18	$0.00	$275,232.21	$347,767.79	44%	$253,277.23
EXPENSE									
Department **000 - ACCOUNT BALANCES**	1,258,000.00	2,314,579.00	3,572,579.00	25,931.10	2,335,905.04	37,069.57	1,199,604.39	66	25,432.90
EXPENSE TOTALS	$1,258,000.00	$2,314,579.00	$3,572,579.00	$25,931.10	$2,335,905.04	$37,069.57	$1,199,604.39	66%	$25,432.90
Fund **261 - PUB. SAFETY COMMUNICATION** Totals									
REVENUE TOTALS	623,000.00	.00	623,000.00	12,117.18	.00	275,232.21	347,767.79	44%	253,277.23
EXPENSE TOTALS	1,258,000.00	2,314,579.00	3,572,579.00	25,931.10	2,335,905.04	37,069.57	1,199,604.39	66%	25,432.90
Fund **261 - PUB. SAFETY COMMUNICATION** Totals	($635,000.00)	($2,314,579.00)	($2,949,579.00)	($13,813.92)	($2,335,905.04)	$238,162.64	($851,836.60)		$227,844.33

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Fund **262 - ADJUDICATED FORFEITURES**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	297,500.00	.00	297,500.00	11,771.60	.00	67,792.10	229,707.90	23	27,019.59
REVENUE TOTALS	$297,500.00	$0.00	$297,500.00	$11,771.60	$0.00	$67,792.10	$229,707.90	23%	$27,019.59
EXPENSE									
Department **333 - STATE/LOCAL FORFEITURE EX**	1,199,527.00	.00	1,199,527.00	(693.39)	.00	(17,083.61)	1,216,610.61	-1	14,347.32
Department **334 - FEDERAL FORFEITURE EXP**	53,750.00	36,004.00	89,754.00	.00	36,004.00	.00	53,750.00	40	.00
Department **335 - CONTINUING CRIMINAL ENTERPRISE**	212,500.00	.00	212,500.00	.00	.00	.00	212,500.00	0	.00
EXPENSE TOTALS	$1,465,777.00	$36,004.00	$1,501,781.00	($693.39)	$36,004.00	($17,083.61)	$1,482,860.61	1%	$14,347.32
Fund **262 - ADJUDICATED FORFEITURES** Totals									
REVENUE TOTALS	297,500.00	.00	297,500.00	11,771.60	.00	67,792.10	229,707.90	23%	27,019.59
EXPENSE TOTALS	1,465,777.00	36,004.00	1,501,781.00	(693.39)	36,004.00	(17,083.61)	1,482,860.61	1%	14,347.32
Fund **262 - ADJUDICATED FORFEITURES** Totals	($1,168,277.00)	($36,004.00)	($1,204,281.00)	$12,464.99	($36,004.00)	$84,875.71	($1,253,152.71)		$12,672.27

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Fund **270 - HISTORICAL COMMISSION**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	107,700.00	.00	107,700.00	6,982.02	.00	31,234.62	76,465.38	29	17,557.82
REVENUE TOTALS	$107,700.00	$0.00	$107,700.00	$6,982.02	$0.00	$31,234.62	$76,465.38	29%	$17,557.82
EXPENSE									
Department **000 - ACCOUNT BALANCES**	106,000.00	.00	106,000.00	1,069.76	.00	12,105.14	93,894.86	11	17,644.25
EXPENSE TOTALS	$106,000.00	$0.00	$106,000.00	$1,069.76	$0.00	$12,105.14	$93,894.86	11%	$17,644.25
Fund **270 - HISTORICAL COMMISSION** Totals									
REVENUE TOTALS	107,700.00	.00	107,700.00	6,982.02	.00	31,234.62	76,465.38	29%	17,557.82
EXPENSE TOTALS	106,000.00	.00	106,000.00	1,069.76	.00	12,105.14	93,894.86	11%	17,644.25
Fund **270 - HISTORICAL COMMISSION** Totals	$1,700.00	$0.00	$1,700.00	$5,912.26	$0.00	$19,129.48	($17,429.48)		($86.43)

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Fund **271 - LIBRARY FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	5,028,550.00	.00	5,028,550.00	26,278.32	.00	4,327,650.88	700,899.12	86	4,402,818.30
REVENUE TOTALS	$5,028,550.00	$0.00	$5,028,550.00	$26,278.32	$0.00	$4,327,650.88	$700,899.12	86%	$4,402,818.30
EXPENSE									
Department **778 - CIVIC CENTER LIBRARY**	4,427,071.00	1,380,836.00	5,807,907.00	290,401.88	5,250.00	713,352.95	5,089,304.05	12	675,821.00
Department **779 - NOBLE LIBRARY**	15,000.00	(6,500.00)	8,500.00	436.54	.00	1,200.61	7,299.39	14	1,062.04
Department **780 - SANDBURG LIBRARY**	1,055,083.00	33,091.00	1,088,174.00	64,382.69	.00	161,492.61	926,681.39	15	174,622.69
EXPENSE TOTALS	$5,497,154.00	$1,407,427.00	$6,904,581.00	$355,221.11	$5,250.00	$876,046.17	$6,023,284.83	13%	$851,505.73
Fund **271 - LIBRARY FUND** Totals									
REVENUE TOTALS	5,028,550.00	.00	5,028,550.00	26,278.32	.00	4,327,650.88	700,899.12	86%	4,402,818.30
EXPENSE TOTALS	5,497,154.00	1,407,427.00	6,904,581.00	355,221.11	5,250.00	876,046.17	6,023,284.83	13%	851,505.73
Fund **271 - LIBRARY FUND** Totals	($468,604.00)	($1,407,427.00)	($1,876,031.00)	($328,942.79)	($5,250.00)	$3,451,604.71	($5,322,385.71)		$3,551,312.57

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Fund **272 - ARTS COMMISSION FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	6,000.00	.00	6,000.00	211.99	.00	1,058.07	4,941.93	18	652.64
REVENUE TOTALS	$6,000.00	$0.00	$6,000.00	$211.99	$0.00	$1,058.07	$4,941.93	18%	$652.64
EXPENSE									
Department **000 - ACCOUNT BALANCES**	17,700.00	.00	17,700.00	.00	.00	.00	17,700.00	0	.00
EXPENSE TOTALS	$17,700.00	$0.00	$17,700.00	$0.00	$0.00	$0.00	$17,700.00	0%	$0.00
Fund **272 - ARTS COMMISSION FUND** Totals									
REVENUE TOTALS	6,000.00	.00	6,000.00	211.99	.00	1,058.07	4,941.93	18%	652.64
EXPENSE TOTALS	17,700.00	.00	17,700.00	.00	.00	.00	17,700.00	0%	.00
Fund **272 - ARTS COMMISSION FUND** Totals	($11,700.00)	$0.00	($11,700.00)	$211.99	$0.00	$1,058.07	($12,758.07)		$652.64

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Fund **284 - OPIOID SETTLEMENT FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	105,153.00	.00	105,153.00	966.43	.00	4,761.76	100,391.24	5	338.80
REVENUE TOTALS	$105,153.00	$0.00	$105,153.00	$966.43	$0.00	$4,761.76	$100,391.24	5%	$338.80
EXPENSE									
Department **000 - ACCOUNT BALANCES**	100,765.00	.00	100,765.00	8,856.00	.00	18,366.80	82,398.20	18	.00
EXPENSE TOTALS	$100,765.00	$0.00	$100,765.00	$8,856.00	$0.00	$18,366.80	$82,398.20	18%	$0.00
Fund **284 - OPIOID SETTLEMENT FUND** Totals									
REVENUE TOTALS	105,153.00	.00	105,153.00	966.43	.00	4,761.76	100,391.24	5%	338.80
EXPENSE TOTALS	100,765.00	.00	100,765.00	8,856.00	.00	18,366.80	82,398.20	18%	.00
Fund **284 - OPIOID SETTLEMENT FUND** Totals	$4,388.00	$0.00	$4,388.00	($7,889.57)	$0.00	($13,605.04)	$17,993.04		$338.80

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Fund **286 - TRANSIT & CAPITAL IMPR**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	2,776,240.00	.00	2,776,240.00	593.76	.00	2,586,304.62	189,935.38	93	2,647,432.85
REVENUE TOTALS	$2,776,240.00	$0.00	$2,776,240.00	$593.76	$0.00	$2,586,304.62	$189,935.38	93%	$2,647,432.85
EXPENSE									
Department **000 - ACCOUNT BALANCES**	2,776,240.00	.00	2,776,240.00	.00	.00	2,776,240.00	.00	100	2,608,950.00
EXPENSE TOTALS	$2,776,240.00	$0.00	$2,776,240.00	$0.00	$0.00	$2,776,240.00	$0.00	100%	$2,608,950.00
Fund **286 - TRANSIT & CAPITAL IMPR** Totals									
REVENUE TOTALS	2,776,240.00	.00	2,776,240.00	593.76	.00	2,586,304.62	189,935.38	93%	2,647,432.85
EXPENSE TOTALS	2,776,240.00	.00	2,776,240.00	.00	.00	2,776,240.00	.00	100%	2,608,950.00
Fund **286 - TRANSIT & CAPITAL IMPR** Totals	$0.00	$0.00	$0.00	$593.76	$0.00	($189,935.38)	$189,935.38		$38,482.85

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Fund **288 - COMMUNITY TRANSIT PROGRAM**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	716,445.00	.00	716,445.00	11,067.42	.00	532,298.62	184,146.38	74	680,856.20
REVENUE TOTALS	$716,445.00	$0.00	$716,445.00	$11,067.42	$0.00	$532,298.62	$184,146.38	74%	$680,856.20
EXPENSE									
Department **606 - COMM TRANSIT DISPATCHERS**	109,938.00	.00	109,938.00	7,634.45	.00	19,635.20	90,302.80	18	19,417.51
Department **607 - COMMUNITY TRANSIT ADMIN**	166,398.00	55,801.00	222,199.00	24,806.76	.00	42,482.09	179,716.91	19	34,070.28
Department **608 - COMMUNITY TRANSIT**	977,513.00	(5,401.00)	972,112.00	34,677.60	.00	224,372.55	747,739.45	23	383,354.60
EXPENSE TOTALS	$1,253,849.00	$50,400.00	$1,304,249.00	$67,118.81	$0.00	$286,489.84	$1,017,759.16	22%	$436,842.39
Fund **288 - COMMUNITY TRANSIT PROGRAM** Totals									
REVENUE TOTALS	716,445.00	.00	716,445.00	11,067.42	.00	532,298.62	184,146.38	74%	680,856.20
EXPENSE TOTALS	1,253,849.00	50,400.00	1,304,249.00	67,118.81	.00	286,489.84	1,017,759.16	22%	436,842.39
Fund **288 - COMMUNITY TRANSIT PROGRAM** Totals	($537,404.00)	($50,400.00)	($587,804.00)	($56,051.39)	$0.00	$245,808.78	($833,612.78)		$244,013.81

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Fund **297 - CABLE TELEVISION FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	378,200.00	.00	378,200.00	81,894.13	.00	86,456.05	291,743.95	23	95,914.44
REVENUE TOTALS	$378,200.00	$0.00	$378,200.00	$81,894.13	$0.00	$86,456.05	$291,743.95	23%	$95,914.44
EXPENSE									
Department **806 - CABLE TELEVISION**	569,659.00	.00	569,659.00	49,737.89	9,509.31	107,591.65	452,558.04	21	95,373.81
EXPENSE TOTALS	$569,659.00	$0.00	$569,659.00	$49,737.89	$9,509.31	$107,591.65	$452,558.04	21%	$95,373.81
Fund **297 - CABLE TELEVISION FUND** Totals									
REVENUE TOTALS	378,200.00	.00	378,200.00	81,894.13	.00	86,456.05	291,743.95	23%	95,914.44
EXPENSE TOTALS	569,659.00	.00	569,659.00	49,737.89	9,509.31	107,591.65	452,558.04	21%	95,373.81
Fund **297 - CABLE TELEVISION FUND** Totals	($191,459.00)	$0.00	($191,459.00)	$32,156.24	($9,509.31)	($21,135.60)	($160,814.09)		$540.63

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **372 - D/S 2015 MBA REFUNDING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0	.00
REVENUE TOTALS	$181,984.00	$0.00	$181,984.00	$0.00	$0.00	$0.00	$181,984.00	0%	$0.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0	.00
EXPENSE TOTALS	$181,984.00	$0.00	$181,984.00	$0.00	$0.00	$0.00	$181,984.00	0%	$0.00
Fund **372 - D/S 2015 MBA REFUNDING** Totals									
REVENUE TOTALS	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0%	.00
EXPENSE TOTALS	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0%	.00
Fund **372 - D/S 2015 MBA REFUNDING** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00		$0.00

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **373 - D/S 2016 MBA REFUNDING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	548,600.00	.00	548,600.00	.00	.00	.00	548,600.00	0	.00
REVENUE TOTALS	$548,600.00	$0.00	$548,600.00	$0.00	$0.00	$0.00	$548,600.00	0%	$0.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	548,600.00	.00	548,600.00	.00	.00	.00	548,600.00	0	.00
EXPENSE TOTALS	$548,600.00	$0.00	$548,600.00	$0.00	$0.00	$0.00	$548,600.00	0%	$0.00
Fund **373 - D/S 2016 MBA REFUNDING** Totals									
REVENUE TOTALS	548,600.00	.00	548,600.00	.00	.00	.00	548,600.00	0%	.00
EXPENSE TOTALS	548,600.00	.00	548,600.00	.00	.00	.00	548,600.00	0%	.00
Fund **373 - D/S 2016 MBA REFUNDING** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00		$0.00

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **374 - D/S 2017 MBA REFUNDING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	1,994,850.00	.00	1,994,850.00	500.00	.00	500.00	1,994,350.00	0	500.00
REVENUE TOTALS	$1,994,850.00	$0.00	$1,994,850.00	$500.00	$0.00	$500.00	$1,994,350.00	0%	$500.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	1,994,850.00	.00	1,994,850.00	500.00	.00	500.00	1,994,350.00	0	500.00
EXPENSE TOTALS	$1,994,850.00	$0.00	$1,994,850.00	$500.00	$0.00	$500.00	$1,994,350.00	0%	$500.00
Fund **374 - D/S 2017 MBA REFUNDING** Totals									
REVENUE TOTALS	1,994,850.00	.00	1,994,850.00	500.00	.00	500.00	1,994,350.00	0%	500.00
EXPENSE TOTALS	1,994,850.00	.00	1,994,850.00	500.00	.00	500.00	1,994,350.00	0%	500.00
Fund **374 - D/S 2017 MBA REFUNDING** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00		$0.00

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **401 - CAPITAL PROJECTS**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	2,672,240.00	.00	2,672,240.00	29,824.77	.00	2,432,962.83	239,277.17	91	2,630,605.12
REVENUE TOTALS	$2,672,240.00	$0.00	$2,672,240.00	$29,824.77	$0.00	$2,432,962.83	$239,277.17	91%	$2,630,605.12
EXPENSE									
Department **000 - ACCOUNT BALANCES**	3,755,000.00	6,497,959.00	10,252,959.00	539,372.99	315,386.89	1,048,517.72	8,889,054.39	13	922,927.19
EXPENSE TOTALS	$3,755,000.00	$6,497,959.00	$10,252,959.00	$539,372.99	$315,386.89	$1,048,517.72	$8,889,054.39	13%	$922,927.19
Fund **401 - CAPITAL PROJECTS** Totals									
REVENUE TOTALS	2,672,240.00	.00	2,672,240.00	29,824.77	.00	2,432,962.83	239,277.17	91%	2,630,605.12
EXPENSE TOTALS	3,755,000.00	6,497,959.00	10,252,959.00	539,372.99	315,386.89	1,048,517.72	8,889,054.39	13%	922,927.19
Fund **401 - CAPITAL PROJECTS** Totals	($1,082,760.00)	($6,497,959.00)	($7,580,719.00)	($509,548.22)	($315,386.89)	$1,384,445.11	($8,649,777.22)		$1,707,677.93

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **409 - GOLF COURSE CAPITAL IMPR**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	461,000.00	.00	461,000.00	2,603.07	.00	186,007.12	274,992.88	40	(14,340.44)
REVENUE TOTALS	$461,000.00	$0.00	$461,000.00	$2,603.07	$0.00	$186,007.12	$274,992.88	40%	($14,340.44)
EXPENSE									
Department **000 - ACCOUNT BALANCES**	335,234.00	.00	335,234.00	2,400.00	100,000.00	3,900.00	231,334.00	31	8,580.00
EXPENSE TOTALS	$335,234.00	$0.00	$335,234.00	$2,400.00	$100,000.00	$3,900.00	$231,334.00	31%	$8,580.00
Fund **409 - GOLF COURSE CAPITAL IMPR** Totals									
REVENUE TOTALS	461,000.00	.00	461,000.00	2,603.07	.00	186,007.12	274,992.88	40%	(14,340.44)
EXPENSE TOTALS	335,234.00	.00	335,234.00	2,400.00	100,000.00	3,900.00	231,334.00	31%	8,580.00
Fund **409 - GOLF COURSE CAPITAL IMPR** Totals	$125,766.00	$0.00	$125,766.00	$203.07	($100,000.00)	$182,107.12	$43,658.88		($22,920.44)

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **418 - BUILDING IMPROVEMENT FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	330,000.00	.00	330,000.00	28,556.53	.00	138,955.04	191,044.96	42	68,464.51
REVENUE TOTALS	$330,000.00	$0.00	$330,000.00	$28,556.53	$0.00	$138,955.04	$191,044.96	42%	$68,464.51
EXPENSE									
Department **000 - ACCOUNT BALANCES**	150,000.00	50,000.00	200,000.00	50,105.81	.00	51,543.31	148,456.69	26	14,479.69
EXPENSE TOTALS	$150,000.00	$50,000.00	$200,000.00	$50,105.81	$0.00	$51,543.31	$148,456.69	26%	$14,479.69
Fund **418 - BUILDING IMPROVEMENT FUND** Totals									
REVENUE TOTALS	330,000.00	.00	330,000.00	28,556.53	.00	138,955.04	191,044.96	42%	68,464.51
EXPENSE TOTALS	150,000.00	50,000.00	200,000.00	50,105.81	.00	51,543.31	148,456.69	26%	14,479.69
Fund **418 - BUILDING IMPROVEMENT FUND** Totals	$180,000.00	($50,000.00)	$130,000.00	($21,549.28)	$0.00	$87,411.73	$42,588.27		$53,984.82

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **419 - SENIOR CENTER CONSTRUCTION FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	140,000.00	.00	140,000.00	10,680.99	.00	52,055.30	87,944.70	37	29,156.95
REVENUE TOTALS	$140,000.00	$0.00	$140,000.00	$10,680.99	$0.00	$52,055.30	$87,944.70	37%	$29,156.95
EXPENSE									
Department **000 - ACCOUNT BALANCES**	.00	1,044,337.00	1,044,337.00	18,764.28	.00	35,351.33	1,008,985.67	3	2,134.40
EXPENSE TOTALS	$0.00	$1,044,337.00	$1,044,337.00	$18,764.28	$0.00	$35,351.33	$1,008,985.67	3%	$2,134.40
Fund **419 - SENIOR CENTER CONSTRUCTION FUND** Totals									
REVENUE TOTALS	140,000.00	.00	140,000.00	10,680.99	.00	52,055.30	87,944.70	37%	29,156.95
EXPENSE TOTALS	.00	1,044,337.00	1,044,337.00	18,764.28	.00	35,351.33	1,008,985.67	3%	2,134.40
Fund **419 - SENIOR CENTER CONSTRUCTION FUND** Totals	$140,000.00	($1,044,337.00)	($904,337.00)	($8,083.29)	$0.00	$16,703.97	($921,040.97)		$27,022.55

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **470 - COURT BUILDING IMPROVEMENTS**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	600,000.00	.00	600,000.00	62,010.43	.00	164,223.32	435,776.68	27	94,666.70
REVENUE TOTALS	$600,000.00	$0.00	$600,000.00	$62,010.43	$0.00	$164,223.32	$435,776.68	27%	$94,666.70
EXPENSE									
Department **000 - ACCOUNT BALANCES**	548,600.00	.00	548,600.00	.00	.00	.00	548,600.00	0	.00
EXPENSE TOTALS	$548,600.00	$0.00	$548,600.00	$0.00	$0.00	$0.00	$548,600.00	0%	$0.00
Fund **470 - COURT BUILDING IMPROVEMENTS** Totals									
REVENUE TOTALS	600,000.00	.00	600,000.00	62,010.43	.00	164,223.32	435,776.68	27%	94,666.70
EXPENSE TOTALS	548,600.00	.00	548,600.00	.00	.00	.00	548,600.00	0%	.00
Fund **470 - COURT BUILDING IMPROVEMENTS** Totals	$51,400.00	$0.00	$51,400.00	$62,010.43	$0.00	$164,223.32	($112,823.32)		$94,666.70

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **536 - NEWBURGH VILLAGE**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	900,200.00	.00	900,200.00	71,341.18	.00	219,359.44	680,840.56	24	220,804.47
REVENUE TOTALS	$900,200.00	$0.00	$900,200.00	$71,341.18	$0.00	$219,359.44	$680,840.56	24%	$220,804.47
EXPENSE									
Department **677 - NEWBURGH VILLAGE**	1,101,864.00	183,143.00	1,285,007.00	44,870.30	13,525.00	349,461.92	922,020.08	28	140,112.76
EXPENSE TOTALS	$1,101,864.00	$183,143.00	$1,285,007.00	$44,870.30	$13,525.00	$349,461.92	$922,020.08	28%	$140,112.76
Fund **536 - NEWBURGH VILLAGE** Totals									
REVENUE TOTALS	900,200.00	.00	900,200.00	71,341.18	.00	219,359.44	680,840.56	24%	220,804.47
EXPENSE TOTALS	1,101,864.00	183,143.00	1,285,007.00	44,870.30	13,525.00	349,461.92	922,020.08	28%	140,112.76
Fund **536 - NEWBURGH VILLAGE** Totals	($201,664.00)	($183,143.00)	($384,807.00)	$26,470.88	($13,525.00)	($130,102.48)	($241,179.52)		$80,691.71

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **538 - SILVER VILLAGE FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	750,780.00	.00	750,780.00	60,621.62	.00	194,937.73	555,842.27	26	173,857.83
REVENUE TOTALS	$750,780.00	$0.00	$750,780.00	$60,621.62	$0.00	$194,937.73	$555,842.27	26%	$173,857.83
EXPENSE									
Department **676 - SILVER VILLAGE**	724,020.00	104,516.00	828,536.00	60,914.06	.00	141,188.13	687,347.87	17	137,836.71
EXPENSE TOTALS	$724,020.00	$104,516.00	$828,536.00	$60,914.06	$0.00	$141,188.13	$687,347.87	17%	$137,836.71
Fund **538 - SILVER VILLAGE FUND** Totals									
REVENUE TOTALS	750,780.00	.00	750,780.00	60,621.62	.00	194,937.73	555,842.27	26%	173,857.83
EXPENSE TOTALS	724,020.00	104,516.00	828,536.00	60,914.06	.00	141,188.13	687,347.87	17%	137,836.71
Fund **538 - SILVER VILLAGE FUND** Totals	$26,760.00	($104,516.00)	($77,756.00)	($292.44)	$0.00	$53,749.60	($131,505.60)		$36,021.12

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **584 - GOLF COURSE FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	2,289,051.00	.00	2,289,051.00	20,278.11	.00	67,420.49	2,221,630.51	3	48,516.67
REVENUE TOTALS	$2,289,051.00	$0.00	$2,289,051.00	$20,278.11	$0.00	$67,420.49	$2,221,630.51	3%	$48,516.67
EXPENSE									
Department **000 - ACCOUNT BALANCES**	250,000.00	.00	250,000.00	.00	.00	250,000.00	.00	100	.00
Department **773 - WHISPERING WILLOWS**	790,311.00	.00	790,311.00	69,144.61	.00	130,469.50	659,841.50	17	107,800.08
Department **774 - IDYL WYLD**	645,211.00	.00	645,211.00	52,632.80	.00	116,989.68	528,221.32	18	107,149.06
Department **775 - FOX CREEK**	810,581.00	.00	810,581.00	54,082.46	3,192.00	120,373.55	687,015.45	15	116,111.90
EXPENSE TOTALS	$2,496,103.00	$0.00	$2,496,103.00	$175,859.87	$3,192.00	$617,832.73	$1,875,078.27	25%	$331,061.04
Fund **584 - GOLF COURSE FUND** Totals									
REVENUE TOTALS	2,289,051.00	.00	2,289,051.00	20,278.11	.00	67,420.49	2,221,630.51	3%	48,516.67
EXPENSE TOTALS	2,496,103.00	.00	2,496,103.00	175,859.87	3,192.00	617,832.73	1,875,078.27	25%	331,061.04
Fund **584 - GOLF COURSE FUND** Totals	($207,052.00)	$0.00	($207,052.00)	($155,581.76)	($3,192.00)	($550,412.24)	$346,552.24		($282,544.37)

BUDGET TO ACTUAL - COUNCIL SUMMARY - 2/29/2024

Through 02/29/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **592 - WATER AND SEWER FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	45,909,967.00	.00	45,909,967.00	3,233,079.25	.00	9,828,219.53	36,081,747.47	21	9,155,697.64
Department **558 - W & S FINANCIAL ADMIN**	.00	.00	.00	.00	.00	.00	.00	+++	.00
REVENUE TOTALS	$45,909,967.00	$0.00	$45,909,967.00	$3,233,079.25	$0.00	$9,828,219.53	$36,081,747.47	21%	$9,155,697.64
EXPENSE									
Department **558 - W & S FINANCIAL ADMIN**	35,408,704.00	.00	35,408,704.00	2,793,401.67	1,000.00	8,619,955.61	26,787,748.39	24	8,463,218.79
Department **559 - W & S FIELD OPERATIONS**	9,236,819.00	1,900,243.00	11,137,062.00	575,792.03	178,163.65	1,461,469.39	9,497,428.96	15	1,124,487.38
EXPENSE TOTALS	$44,645,523.00	$1,900,243.00	$46,545,766.00	$3,369,193.70	$179,163.65	$10,081,425.00	$36,285,177.35	22%	$9,587,706.17
Fund **592 - WATER AND SEWER FUND** Totals									
REVENUE TOTALS	45,909,967.00	.00	45,909,967.00	3,233,079.25	.00	9,828,219.53	36,081,747.47	21%	9,155,697.64
EXPENSE TOTALS	44,645,523.00	1,900,243.00	46,545,766.00	3,369,193.70	179,163.65	10,081,425.00	36,285,177.35	22%	9,587,706.17
Fund **592 - WATER AND SEWER FUND** Totals	$1,264,444.00	($1,900,243.00)	($635,799.00)	($136,114.45)	($179,163.65)	($253,205.47)	($203,429.88)		($432,008.53)
Grand Totals									
REVENUE TOTALS	198,934,308.00	.00	198,934,308.00	10,364,708.19	.00	98,003,595.38	100,930,712.62	49%	92,454,811.20
EXPENSE TOTALS	205,240,767.00	15,106,977.00	220,347,744.00	13,024,210.74	3,708,997.48	39,456,870.91	177,181,875.61	20%	36,438,271.67
Grand Totals	($6,306,459.00)	($15,106,977.00)	($21,413,436.00)	($2,659,502.55)	($3,708,997.48)	$58,546,724.47	($76,251,162.99)		$56,016,539.53

LETTER TO THE LIVONIA CITY COUNCIL

Finance
May 31, 2024

MEETING DATE	PRESENTED BY
R061724	Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

c. Communication from the Department of Finance, dated May 31, 2024, re: forwarding various financial statements of the City of Livonia for the month ending March 31, 2024.

BACKGROUND DETAILS

Attached hereto are the various financial statements of the City of Livonia for the month ending March 31, 2024. These statements are summarized so that you may make a quick financial overview of the various funds. Detailed statements, in support of the summarized statements, have been forwarded electronically to the Council Office.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

We respectfully request that City Council receive and file this report.

ATTACHMENTS

1. BUDGET TO ACTUAL - COUNCIL SUMMARY - MARCH 2024

APPROVED BY

Debra A. Lichtenberg

Debra Peck Lichtenberg, CPA, Finance Director

Date: June 04, 2024

Maureen Miller Brosnan

Maureen Miller Brosnan, Mayor

Date: June 06, 2024

BUDGET TO ACTUAL - COUNCIL SUMMARY - 03/31/2024

Through 03/31/24

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Organization		Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund	**101 - GENERAL FUND**									
REVENUE										
Department	**000 - ACCOUNT BALANCES**	71,521,472.00	.00	71,521,472.00	1,192,528.56	.00	48,030,143.13	23,491,328.87	67	43,857,108.00
	REVENUE TOTALS	$71,521,472.00	$0.00	$71,521,472.00	$1,192,528.56	$0.00	$48,030,143.13	$23,491,328.87	67%	$43,857,108.00
EXPENSE										
Department	**101 - CITY COUNCIL**	334,005.00	.00	334,005.00	32,636.82	.00	95,137.15	238,867.85	28	86,371.96
Department	**173 - MAYOR'S OFFICE**	584,792.00	.00	584,792.00	61,285.91	.00	194,979.27	389,812.73	33	171,038.88
Department	**174 - COMMUNICATIONS**	429,649.00	.00	429,649.00	49,287.16	.00	135,982.03	293,666.97	32	108,704.17
Department	**175 - GOVERNMENT AFFAIRS**	13,801.00	94,000.00	107,801.00	6,926.51	.00	10,376.78	97,424.22	10	14,018.14
Department	**191 - ACCOUNTING**	326,094.00	.00	326,094.00	56,961.50	.00	84,882.22	241,211.78	26	68,228.32
Department	**192 - FINANCE DEPARTMENT**	534,554.00	(13,000.00)	521,554.00	56,134.76	.00	144,257.36	377,296.64	28	140,827.29
Department	**215 - CITY CLERK**	633,636.00	.00	633,636.00	57,247.70	.00	186,990.13	446,645.87	30	179,223.88
Department	**223 - INDEPENDENT AUDIT**	54,512.00	.00	54,512.00	77,098.55	.00	72,400.55	(17,888.55)	133	24,412.74
Department	**228 - INFORMATION SYSTEMS**	1,605,679.00	.00	1,605,679.00	86,334.49	152,657.90	465,598.33	987,422.77	39	571,156.28
Department	**236 - ETHICS BOARD**	550.00	.00	550.00	.00	.00	.00	550.00	0	.00
Department	**247 - BOARD OF REVIEW**	3,545.00	.00	3,545.00	.00	.00	344.48	3,200.52	10	344.48
Department	**253 - TREASURER**	679,921.00	.00	679,921.00	62,420.82	.00	202,931.60	476,989.40	30	191,570.62
Department	**257 - ASSESSING**	756,439.00	.00	756,439.00	76,452.57	.00	244,053.51	512,385.49	32	224,563.43
Department	**261 - UTILITIES AND SUPPLIES**	546,613.00	.00	546,613.00	16,814.24	.00	133,623.02	412,989.98	24	106,059.60
Department	**262 - ELECTION COMMISSION**	679,174.00	.00	679,174.00	157,187.69	.00	281,317.13	397,856.87	41	90,986.66
Department	**263 - INSURANCE-GENERAL**	102,452.00	.00	102,452.00	138,137.46	.00	408,734.17	(306,282.17)	399	332,293.67
Department	**264 - INSURANCE-WORKERS COMP**	435,194.00	.00	435,194.00	18,069.01	.00	319,448.03	115,745.97	73	370,744.79
Department	**265 - NON DEPARTMENTAL**	4,000.00	.00	4,000.00	.00	.00	.00	4,000.00	0	.00
Department	**266 - LAW DEPARTMENT**	980,880.00	.00	980,880.00	101,461.89	.00	305,070.05	675,809.95	31	276,486.18
Department	**267 - EMPLOYEE BENEFITS CONTROL**	42,000.00	.00	42,000.00	197,953.77	.00	(88,866.69)	130,866.69	-212	(301,002.01)
Department	**268 - NON-DEPT CAPITAL PROJECTS**	5,000.00	.00	5,000.00	2,240.90	.00	2,240.90	2,759.10	45	.00
Department	**269 - CIVIL SERVICE**	959,897.00	.00	959,897.00	101,217.26	513.01	269,447.11	689,936.88	28	211,657.03
Department	**270 - TERMINATION PAY**	2,395,000.00	.00	2,395,000.00	247,120.98	.00	304,302.82	2,090,697.18	13	402,832.51
Department	**271 - LABOR RELATIONS**	92,500.00	.00	92,500.00	392.00	.00	12,391.00	80,109.00	13	9,475.00
Department	**272 - DUES AND SUBSCRIPTIONS**	58,000.00	.00	58,000.00	.00	.00	.00	58,000.00	0	5,909.00
Department	**286 - 16TH DISTRICT COURT**	3,502,513.00	.00	3,502,513.00	319,877.99	.00	1,076,526.94	2,425,986.06	31	952,929.22
Department	**302 - TRAFFIC BUREAU**	1,262,039.00	.00	1,262,039.00	145,313.97	.00	386,786.06	875,252.94	31	319,574.33
Department	**304 - POLICE ADMINISTRATION**	3,010,074.00	.00	3,010,074.00	289,899.88	12,789.84	851,678.25	2,145,605.91	29	766,184.49
Department	**306 - POLICE DATA PROCESSING**	999,901.00	.00	999,901.00	91,173.04	14,955.71	341,099.05	643,846.24	36	202,797.36
Department	**307 - DETECTIVE BUREAU**	3,357,544.00	.00	3,357,544.00	322,521.64	.00	918,779.15	2,438,764.85	27	1,013,882.41
Department	**309 - AUTOMOTIVE SERVICE**	586,150.00	.00	586,150.00	19,346.79	.00	86,703.94	499,446.06	15	163,256.24
Department	**310 - POLICE COMMUNICATIONS**	1,014,332.00	.00	1,014,332.00	102,655.98	.00	297,784.98	716,547.02	29	267,198.17
Department	**313 - CROSSING GUARDS**	81,488.00	.00	81,488.00	12,804.95	.00	28,716.72	52,771.28	35	25,406.58
Department	**316 - SCHOOL LIAISON**	578,567.00	.00	578,567.00	60,982.16	.00	182,097.02	396,469.98	31	162,528.34
Department	**318 - OFFICE OF EMERG PREP**	184,118.00	.00	184,118.00	12,358.33	.00	63,571.23	120,546.77	35	58,310.16
Department	**319 - RESERVE POL/SPECIAL EVENT**	407,969.00	.00	407,969.00	39,178.23	.00	104,386.66	303,582.34	26	89,263.78

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Fund **101 - GENERAL FUND**									
EXPENSE									
Department **325 - POLICE PATROL BUREAU**	14,764,790.00	.00	14,764,790.00	1,433,871.13	5,482.00	4,096,898.92	10,662,409.08	28	3,606,753.17
Department **329 - INTELLIGENCE BUREAU**	2,582,175.00	.00	2,582,175.00	239,163.53	.00	742,689.68	1,839,485.32	29	646,191.33
Department **336 - FIRE ADMINISTRATION**	1,440,863.00	.00	1,440,863.00	139,722.13	2,776.29	429,661.77	1,008,424.94	30	440,933.26
Department **338 - FIRE FIGHTING**	14,759,162.00	.00	14,759,162.00	1,363,415.74	.00	4,087,539.00	10,671,623.00	28	4,219,113.39
Department **341 - FIRE PREVENTION**	865,073.00	.00	865,073.00	102,549.34	.00	271,927.75	593,145.25	31	270,256.10
Department **371 - INSPECTION**	2,007,116.00	.00	2,007,116.00	180,690.94	.00	518,283.70	1,488,832.30	26	484,747.42
Department **381 - BLDG CODE BD OF APPEALS**	1,361.00	.00	1,361.00	60.00	.00	60.00	1,301.00	4	20.00
Department **435 - TRAFFIC COMMISSION**	2,353.00	.00	2,353.00	145.32	.00	581.30	1,771.70	25	581.29
Department **441 - PUBLIC SERV ADMIN**	85,450.00	.00	85,450.00	25,187.07	.00	(22,871.13)	108,321.13	-27	(22,009.65)
Department **443 - PUBLIC SERV-EQUIP MAINT**	108,602.00	.00	108,602.00	(5,837.93)	.00	(149,827.68)	258,429.68	-138	(100,148.91)
Department **447 - ENGINEERING**	43,534.00	.00	43,534.00	18,500.87	.00	(65,815.69)	109,349.69	-151	(45,287.89)
Department **448 - STREET LIGHTING**	266,328.00	.00	266,328.00	203,401.57	.00	274,974.78	(8,646.78)	103	96,354.03
Department **463 - MAINTENANCE-STREET**	600,843.00	.00	600,843.00	63,115.99	3,300.00	87,681.70	509,861.30	15	360,422.63
Department **523 - PUBLIC SERV-BLDG MAINT**	2,026,738.00	.00	2,026,738.00	219,034.29	35,583.20	537,315.93	1,453,838.87	28	484,961.76
Department **524 - PARKS**	1,726,526.00	.00	1,726,526.00	137,553.28	5,333.57	323,444.83	1,397,747.60	19	400,035.92
Department **701 - PLANNING**	726,556.00	(49,500.00)	677,056.00	71,161.23	.00	197,475.84	479,580.16	29	202,937.27
Department **702 - ZONING BOARD OF APPEALS**	53,825.00	(31,500.00)	22,325.00	3,068.41	.00	11,543.12	10,781.88	52	8,468.66
Department **752 - RECREATION ADMINISTRATION**	352,803.00	.00	352,803.00	35,879.52	.00	91,987.40	260,815.60	26	38,341.84
Department **758 - RECREATION FACILITIES**	54,189.00	.00	54,189.00	1,378.66	.00	3,083.39	51,105.61	6	1,429.78
Department **759 - RECREATION ATHLETICS**	144,447.00	.00	144,447.00	25,383.65	.00	31,333.13	113,113.87	22	8,826.68
Department **820 - PARKS & REC - SENIOR SERVICES**	564,761.00	.00	564,761.00	69,474.43	.00	191,990.06	372,770.94	34	190,684.41
Department **821 - P&R - GREENMEAD AND CULTURAL**	1,099,726.00	.00	1,099,726.00	91,713.37	33,393.65	272,446.88	793,885.47	28	278,603.43
EXPENSE TOTALS	$71,519,803.00	$0.00	$71,519,803.00	$7,438,127.49	$266,785.17	$20,056,175.63	$51,196,842.20	28%	$18,879,449.62
Fund **101 - GENERAL FUND** Totals									
REVENUE TOTALS	71,521,472.00	.00	71,521,472.00	1,192,528.56	.00	48,030,143.13	23,491,328.87	67%	43,857,108.00
EXPENSE TOTALS	71,519,803.00	.00	71,519,803.00	7,438,127.49	266,785.17	20,056,175.63	51,196,842.20	28%	18,879,449.62
Fund **101 - GENERAL FUND** Totals	$1,669.00	$0.00	$1,669.00	($6,245,598.93)	($266,785.17)	$27,973,967.50	($27,705,513.33)		$24,977,658.38

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Fund **202 - MAJOR STREET FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	9,344,198.00	.00	9,344,198.00	726,087.64	.00	1,738,843.75	7,605,354.25	19	1,699,648.51
REVENUE TOTALS	$9,344,198.00	$0.00	$9,344,198.00	$726,087.64	$0.00	$1,738,843.75	$7,605,354.25	19%	$1,699,648.51
EXPENSE									
Department **448 - STREET LIGHTING**	668,359.00	.00	668,359.00	44,500.00	.00	178,000.00	490,359.00	27	158,668.00
Department **451 - CONST-STREET AND BRIDGES**	60,000.00	.00	60,000.00	.00	.00	.00	60,000.00	0	.00
Department **463 - MAINTENANCE-STREET**	1,133,076.00	255,226.00	1,388,302.00	67,703.54	.00	249,053.78	1,139,248.22	18	143,463.42
Department **475 - MAINTENANCE-TRAFFIC SERV**	.00	.00	.00	.00	.00	.00	.00	+++	.00
Department **478 - MAINT-FREEWAY LIGHTING**	20,000.00	.00	20,000.00	1,579.63	.00	6,323.37	13,676.63	32	5,990.45
Department **479 - SNOW AND ICE REMOVAL**	327,061.00	.00	327,061.00	27,255.00	.00	109,020.00	218,041.00	33	107,076.00
Department **483 - ADMIN, ENGIN RECORD KEEPI**	138,700.00	.00	138,700.00	11,558.00	.00	46,232.00	92,468.00	33	49,068.00
Department **484 - FUND TRANSFERS**	7,600,000.00	.00	7,600,000.00	633,333.00	.00	2,533,332.00	5,066,668.00	33	2,233,333.32
EXPENSE TOTALS	$9,947,196.00	$255,226.00	$10,202,422.00	$785,929.17	$0.00	$3,121,961.15	$7,080,460.85	31%	$2,697,599.19
Fund **202 - MAJOR STREET FUND** Totals									
REVENUE TOTALS	9,344,198.00	.00	9,344,198.00	726,087.64	.00	1,738,843.75	7,605,354.25	19%	1,699,648.51
EXPENSE TOTALS	9,947,196.00	255,226.00	10,202,422.00	785,929.17	.00	3,121,961.15	7,080,460.85	31%	2,697,599.19
Fund **202 - MAJOR STREET FUND** Totals	($602,998.00)	($255,226.00)	($858,224.00)	($59,841.53)	$0.00	($1,383,117.40)	$524,893.40		($997,950.68)

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Fund **203 - LOCAL STREET FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	11,149,971.00	.00	11,149,971.00	909,784.98	.00	3,195,632.87	7,954,338.13	29	2,881,290.52
REVENUE TOTALS	$11,149,971.00	$0.00	$11,149,971.00	$909,784.98	$0.00	$3,195,632.87	$7,954,338.13	29%	$2,881,290.52
EXPENSE									
Department **448 - STREET LIGHTING**	137,000.00	.00	137,000.00	11,416.00	.00	45,664.00	91,336.00	33	43,332.00
Department **451 - CONST-STREET AND BRIDGES**	125,000.00	.00	125,000.00	.00	.00	.00	125,000.00	0	.00
Department **463 - MAINTENANCE-STREET**	1,959,694.00	.00	1,959,694.00	146,119.00	.00	584,476.00	1,375,218.00	30	526,060.00
Department **475 - MAINTENANCE-TRAFFIC SERV**	.00	.00	.00	.00	.00	.00	.00	+++	.00
Department **479 - SNOW AND ICE REMOVAL**	450,169.00	.00	450,169.00	37,514.00	.00	150,056.00	300,113.00	33	149,720.00
Department **483 - ADMIN, ENGIN RECORD KEEPI**	769,870.00	.00	769,870.00	64,154.00	.00	256,616.00	513,254.00	33	236,544.00
Department **484 - FUND TRANSFERS**	7,800,000.00	.00	7,800,000.00	650,000.00	.00	2,600,000.00	5,200,000.00	33	2,383,332.00
EXPENSE TOTALS	$11,241,733.00	$0.00	$11,241,733.00	$909,203.00	$0.00	$3,636,812.00	$7,604,921.00	32%	$3,338,988.00
Fund **203 - LOCAL STREET FUND** Totals									
REVENUE TOTALS	11,149,971.00	.00	11,149,971.00	909,784.98	.00	3,195,632.87	7,954,338.13	29%	2,881,290.52
EXPENSE TOTALS	11,241,733.00	.00	11,241,733.00	909,203.00	.00	3,636,812.00	7,604,921.00	32%	3,338,988.00
Fund **203 - LOCAL STREET FUND** Totals	($91,762.00)	$0.00	($91,762.00)	$581.98	$0.00	($441,179.13)	$349,417.13		($457,697.48)

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Fund **204 - ROAD - SIDEWALK & TREE**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	13,033,702.00	.00	13,033,702.00	682,628.06	.00	7,283,076.28	5,750,625.72	56	7,447,962.68
REVENUE TOTALS	$13,033,702.00	$0.00	$13,033,702.00	$682,628.06	$0.00	$7,283,076.28	$5,750,625.72	56%	$7,447,962.68
EXPENSE									
Department **441 - PUBLIC SERV ADMIN**	33,338.00	.00	33,338.00	2,778.00	.00	11,112.00	22,226.00	33	10,320.00
Department **447 - ENGINEERING**	2,700,196.00	90,366.00	2,790,562.00	54,381.19	.00	308,335.31	2,482,226.69	11	452,727.85
Department **463 - MAINTENANCE-STREET**	10,880,000.00	78,480.00	10,958,480.00	.00	.00	.00	10,958,480.00	0	58,563.60
Department **530 - FORESTRY**	150,000.00	9,855.00	159,855.00	.00	.00	10,581.12	149,273.88	7	.00
EXPENSE TOTALS	$13,763,534.00	$178,701.00	$13,942,235.00	$57,159.19	$0.00	$330,028.43	$13,612,206.57	2%	$521,611.45
Fund **204 - ROAD - SIDEWALK & TREE** Totals									
REVENUE TOTALS	13,033,702.00	.00	13,033,702.00	682,628.06	.00	7,283,076.28	5,750,625.72	56%	7,447,962.68
EXPENSE TOTALS	13,763,534.00	178,701.00	13,942,235.00	57,159.19	.00	330,028.43	13,612,206.57	2%	521,611.45
Fund **204 - ROAD - SIDEWALK & TREE** Totals	($729,832.00)	($178,701.00)	($908,533.00)	$625,468.87	$0.00	$6,953,047.85	($7,861,580.85)		$6,926,351.23

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Fund **208 - COMMUNITY RECREATION**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	9,239,176.00	.00	9,239,176.00	438,789.71	.00	5,847,762.82	3,391,413.18	63	5,638,072.81
REVENUE TOTALS	$9,239,176.00	$0.00	$9,239,176.00	$438,789.71	$0.00	$5,847,762.82	$3,391,413.18	63%	$5,638,072.81
EXPENSE									
Department **755 - RECREATION CENTER**	7,557,580.00	496,262.00	8,053,842.00	524,746.92	301,489.40	1,754,964.05	5,997,388.55	26	1,601,308.66
Department **756 - OTHER RECREATION**	172,100.00	324,298.00	496,398.00	.00	130,567.50	22,887.94	342,942.56	31	56,806.92
Department **757 - ICE RINK**	390,446.00	.00	390,446.00	.00	.00	52.25	390,393.75	0	52.25
Department **776 - SPECIAL EVENTS**	168,611.00	.00	168,611.00	3,151.77	.00	16,194.22	152,416.78	10	14,362.98
Department **795 - SWIMMING POOL - BOTSFORD**	165,492.00	51,665.00	217,157.00	8,980.54	168.00	11,750.77	205,238.23	5	2,035.10
Department **796 - SWIMMING POOL - CLEMENT C**	551,775.00	(143,000.00)	408,775.00	934.20	45,688.00	5,805.17	357,281.83	13	2,569.08
Department **797 - SWIMMING POOL - SHELDON**	97,736.00	.00	97,736.00	725.58	168.00	1,217.49	96,350.51	1	1,315.58
EXPENSE TOTALS	$9,103,740.00	$729,225.00	$9,832,965.00	$538,539.01	$478,080.90	$1,812,871.89	$7,542,012.21	23%	$1,678,450.57
Fund **208 - COMMUNITY RECREATION** Totals									
REVENUE TOTALS	9,239,176.00	.00	9,239,176.00	438,789.71	.00	5,847,762.82	3,391,413.18	63%	5,638,072.81
EXPENSE TOTALS	9,103,740.00	729,225.00	9,832,965.00	538,539.01	478,080.90	1,812,871.89	7,542,012.21	23%	1,678,450.57
Fund **208 - COMMUNITY RECREATION** Totals	$135,436.00	($729,225.00)	($593,789.00)	($99,749.30)	($478,080.90)	$4,034,890.93	($4,150,599.03)		$3,959,622.24

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Fund **211 - DESIGNATED PURPOSE**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	150,000.00	.00	150,000.00	20,131.00	.00	46,508.75	103,491.25	31	36,349.70
REVENUE TOTALS	$150,000.00	$0.00	$150,000.00	$20,131.00	$0.00	$46,508.75	$103,491.25	31%	$36,349.70
EXPENSE									
Department **000 - ACCOUNT BALANCES**	180,000.00	.00	180,000.00	18,786.08	.00	33,556.80	146,443.20	19	58,870.82
EXPENSE TOTALS	$180,000.00	$0.00	$180,000.00	$18,786.08	$0.00	$33,556.80	$146,443.20	19%	$58,870.82
Fund **211 - DESIGNATED PURPOSE** Totals									
REVENUE TOTALS	150,000.00	.00	150,000.00	20,131.00	.00	46,508.75	103,491.25	31%	36,349.70
EXPENSE TOTALS	180,000.00	.00	180,000.00	18,786.08	.00	33,556.80	146,443.20	19%	58,870.82
Fund **211 - DESIGNATED PURPOSE** Totals	($30,000.00)	$0.00	($30,000.00)	$1,344.92	$0.00	$12,951.95	($42,951.95)		($22,521.12)

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Fund **219 - SP ASSESS-LIGHTING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	17,000.00	.00	17,000.00	2,275.68	.00	12,029.79	4,970.21	71	7,800.66
Department **457 - STREETLIGHTING**	1,086,610.00	.00	1,086,610.00	.00	.00	1,086,651.52	(41.52)	100	1,154,117.51
REVENUE TOTALS	$1,103,610.00	$0.00	$1,103,610.00	$2,275.68	$0.00	$1,098,681.31	$4,928.69	100%	$1,161,918.17
EXPENSE									
Department **000 - ACCOUNT BALANCES**	.00	.00	.00	.00	.00	.00	.00	+++	.00
Department **457 - STREETLIGHTING**	1,158,452.00	.00	1,158,452.00	92,836.55	.00	383,859.47	774,592.53	33	310,331.94
EXPENSE TOTALS	$1,158,452.00	$0.00	$1,158,452.00	$92,836.55	$0.00	$383,859.47	$774,592.53	33%	$310,331.94
Fund **219 - SP ASSESS-LIGHTING** Totals									
REVENUE TOTALS	1,103,610.00	.00	1,103,610.00	2,275.68	.00	1,098,681.31	4,928.69	100%	1,161,918.17
EXPENSE TOTALS	1,158,452.00	.00	1,158,452.00	92,836.55	.00	383,859.47	774,592.53	33%	310,331.94
Fund **219 - SP ASSESS-LIGHTING** Totals	($54,842.00)	$0.00	($54,842.00)	($90,560.87)	$0.00	$714,821.84	($769,663.84)		$851,586.23

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Fund **226 - MUNICIPAL REFUSE FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	14,062,303.00	.00	14,062,303.00	84,392.45	.00	12,750,897.19	1,311,405.81	91	13,016,810.68
REVENUE TOTALS	$14,062,303.00	$0.00	$14,062,303.00	$84,392.45	$0.00	$12,750,897.19	$1,311,405.81	91%	$13,016,810.68
EXPENSE									
Department **521 - SANITATION**	1,452,031.00	.00	1,452,031.00	138,510.95	.00	438,262.70	1,013,768.30	30	405,548.79
Department **528 - PUBLIC SERVICE**	14,524,078.00	355,217.00	14,879,295.00	1,036,197.32	153,166.96	4,068,827.14	10,657,300.90	28	2,943,817.62
Department **529 - ANIMAL CONTROL**	410,048.00	.00	410,048.00	27,302.65	.00	77,953.37	332,094.63	19	85,363.88
EXPENSE TOTALS	$16,386,157.00	$355,217.00	$16,741,374.00	$1,202,010.92	$153,166.96	$4,585,043.21	$12,003,163.83	28%	$3,434,730.29
Fund **226 - MUNICIPAL REFUSE FUND** Totals									
REVENUE TOTALS	14,062,303.00	.00	14,062,303.00	84,392.45	.00	12,750,897.19	1,311,405.81	91%	13,016,810.68
EXPENSE TOTALS	16,386,157.00	355,217.00	16,741,374.00	1,202,010.92	153,166.96	4,585,043.21	12,003,163.83	28%	3,434,730.29
Fund **226 - MUNICIPAL REFUSE FUND** Totals	($2,323,854.00)	($355,217.00)	($2,679,071.00)	($1,117,618.47)	($153,166.96)	$8,165,853.98	($10,691,758.02)		$9,582,080.39

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Fund **242 - LIVONIA BROWNFIELD - LSRRF**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	180,000.00	.00	180,000.00	2,050.96	.00	91,498.90	88,501.10	51	70,862.12
REVENUE TOTALS	$180,000.00	$0.00	$180,000.00	$2,050.96	$0.00	$91,498.90	$88,501.10	51%	$70,862.12
EXPENSE									
Department **000 - ACCOUNT BALANCES**	38,300.00	.00	38,300.00	2,775.00	.00	11,100.00	27,200.00	29	10,560.00
EXPENSE TOTALS	$38,300.00	$0.00	$38,300.00	$2,775.00	$0.00	$11,100.00	$27,200.00	29%	$10,560.00
Fund **242 - LIVONIA BROWNFIELD - LSRRF** Totals									
REVENUE TOTALS	180,000.00	.00	180,000.00	2,050.96	.00	91,498.90	88,501.10	51%	70,862.12
EXPENSE TOTALS	38,300.00	.00	38,300.00	2,775.00	.00	11,100.00	27,200.00	29%	10,560.00
Fund **242 - LIVONIA BROWNFIELD - LSRRF** Totals	$141,700.00	$0.00	$141,700.00	($724.04)	$0.00	$80,398.90	$61,301.10		$60,302.12

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **243 - LIVONIA BROWNFIELD REDEV AUTH**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	1,170,000.00	.00	1,170,000.00	.00	.00	520,689.87	649,310.13	45	293,895.84
REVENUE TOTALS	$1,170,000.00	$0.00	$1,170,000.00	$0.00	$0.00	$520,689.87	$649,310.13	45%	$293,895.84
EXPENSE									
Department **000 - ACCOUNT BALANCES**	1,170,000.00	.00	1,170,000.00	.00	.00	.00	1,170,000.00	0	.00
EXPENSE TOTALS	$1,170,000.00	$0.00	$1,170,000.00	$0.00	$0.00	$0.00	$1,170,000.00	0%	$0.00
Fund **243 - LIVONIA BROWNFIELD REDEV AUTH** Totals									
REVENUE TOTALS	1,170,000.00	.00	1,170,000.00	.00	.00	520,689.87	649,310.13	45%	293,895.84
EXPENSE TOTALS	1,170,000.00	.00	1,170,000.00	.00	.00	.00	1,170,000.00	0%	.00
Fund **243 - LIVONIA BROWNFIELD REDEV AUTH** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$520,689.87	($520,689.87)		$293,895.84

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **244 - ECONOMIC DEVEL CORP**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	1,000.00	.00	1,000.00	106.95	.00	436.76	563.24	44	326.14
REVENUE TOTALS	$1,000.00	$0.00	$1,000.00	$106.95	$0.00	$436.76	$563.24	44%	$326.14
EXPENSE									
Department **000 - ACCOUNT BALANCES**	107.00	.00	107.00	.00	.00	.00	107.00	0	.00
EXPENSE TOTALS	$107.00	$0.00	$107.00	$0.00	$0.00	$0.00	$107.00	0%	$0.00
Fund **244 - ECONOMIC DEVEL CORP** Totals									
REVENUE TOTALS	1,000.00	.00	1,000.00	106.95	.00	436.76	563.24	44%	326.14
EXPENSE TOTALS	107.00	.00	107.00	.00	.00	.00	107.00	0%	.00
Fund **244 - ECONOMIC DEVEL CORP** Totals	$893.00	$0.00	$893.00	$106.95	$0.00	$436.76	$456.24		$326.14

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **248 - PLYMOUTH RD DEV AUTHORITY**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	799,117.00	.00	799,117.00	395.38	.00	1,621.59	797,495.41	0	1,508.84
REVENUE TOTALS	$799,117.00	$0.00	$799,117.00	$395.38	$0.00	$1,621.59	$797,495.41	0%	$1,508.84
EXPENSE									
Department **000 - ACCOUNT BALANCES**	842,524.00	.00	842,524.00	67,995.91	.00	102,106.27	740,417.73	12	47,392.32
EXPENSE TOTALS	$842,524.00	$0.00	$842,524.00	$67,995.91	$0.00	$102,106.27	$740,417.73	12%	$47,392.32
Fund **248 - PLYMOUTH RD DEV AUTHORITY** Totals									
REVENUE TOTALS	799,117.00	.00	799,117.00	395.38	.00	1,621.59	797,495.41	0%	1,508.84
EXPENSE TOTALS	842,524.00	.00	842,524.00	67,995.91	.00	102,106.27	740,417.73	12%	47,392.32
Fund **248 - PLYMOUTH RD DEV AUTHORITY** Totals	($43,407.00)	$0.00	($43,407.00)	($67,600.53)	$0.00	($100,484.68)	$57,077.68		($45,883.48)

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **260 - MIDC GRANT**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	362,299.00	.00	362,299.00	.00	.00	259,543.80	102,755.20	72	418,643.64
REVENUE TOTALS	$362,299.00	$0.00	$362,299.00	$0.00	$0.00	$259,543.80	$102,755.20	72%	$418,643.64
EXPENSE									
Department **000 - ACCOUNT BALANCES**	362,299.00	.00	362,299.00	24,168.00	.00	94,340.68	267,958.32	26	74,473.32
EXPENSE TOTALS	$362,299.00	$0.00	$362,299.00	$24,168.00	$0.00	$94,340.68	$267,958.32	26%	$74,473.32
Fund **260 - MIDC GRANT** Totals									
REVENUE TOTALS	362,299.00	.00	362,299.00	.00	.00	259,543.80	102,755.20	72%	418,643.64
EXPENSE TOTALS	362,299.00	.00	362,299.00	24,168.00	.00	94,340.68	267,958.32	26%	74,473.32
Fund **260 - MIDC GRANT** Totals	$0.00	$0.00	$0.00	($24,168.00)	$0.00	$165,203.12	($165,203.12)		$344,170.32

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **261 - PUB. SAFETY COMMUNICATION**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	623,000.00	.00	623,000.00	19,262.28	.00	294,494.49	328,505.51	47	303,003.00
REVENUE TOTALS	$623,000.00	$0.00	$623,000.00	$19,262.28	$0.00	$294,494.49	$328,505.51	47%	$303,003.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	1,258,000.00	2,314,579.00	3,572,579.00	2,139.32	2,314,578.63	39,208.89	1,218,791.48	66	31,683.30
EXPENSE TOTALS	$1,258,000.00	$2,314,579.00	$3,572,579.00	$2,139.32	$2,314,578.63	$39,208.89	$1,218,791.48	66%	$31,683.30
Fund **261 - PUB. SAFETY COMMUNICATION** Totals									
REVENUE TOTALS	623,000.00	.00	623,000.00	19,262.28	.00	294,494.49	328,505.51	47%	303,003.00
EXPENSE TOTALS	1,258,000.00	2,314,579.00	3,572,579.00	2,139.32	2,314,578.63	39,208.89	1,218,791.48	66%	31,683.30
Fund **261 - PUB. SAFETY COMMUNICATION** Totals	($635,000.00)	($2,314,579.00)	($2,949,579.00)	$17,122.96	($2,314,578.63)	$255,285.60	($890,285.97)		$271,319.70

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **262 - ADJUDICATED FORFEITURES**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	297,500.00	.00	297,500.00	17,982.37	.00	85,774.47	211,725.53	29	87,974.56
REVENUE TOTALS	$297,500.00	$0.00	$297,500.00	$17,982.37	$0.00	$85,774.47	$211,725.53	29%	$87,974.56
EXPENSE									
Department **333 - STATE/LOCAL FORFEITURE EX**	1,199,527.00	.00	1,199,527.00	883.72	.00	(16,199.89)	1,215,726.89	-1	14,289.67
Department **334 - FEDERAL FORFEITURE EXP**	53,750.00	36,004.00	89,754.00	36,153.13	.00	36,153.13	53,600.87	40	.00
Department **335 - CONTINUING CRIMINAL ENTERPRISE**	212,500.00	.00	212,500.00	.00	.00	.00	212,500.00	0	.00
EXPENSE TOTALS	$1,465,777.00	$36,004.00	$1,501,781.00	$37,036.85	$0.00	$19,953.24	$1,481,827.76	1%	$14,289.67
Fund **262 - ADJUDICATED FORFEITURES** Totals									
REVENUE TOTALS	297,500.00	.00	297,500.00	17,982.37	.00	85,774.47	211,725.53	29%	87,974.56
EXPENSE TOTALS	1,465,777.00	36,004.00	1,501,781.00	37,036.85	.00	19,953.24	1,481,827.76	1%	14,289.67
Fund **262 - ADJUDICATED FORFEITURES** Totals	($1,168,277.00)	($36,004.00)	($1,204,281.00)	($19,054.48)	$0.00	$65,821.23	($1,270,102.23)		$73,684.89

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Fund **270 - HISTORICAL COMMISSION**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	107,700.00	.00	107,700.00	40,663.33	.00	71,897.95	35,802.05	67	32,785.45
REVENUE TOTALS	$107,700.00	$0.00	$107,700.00	$40,663.33	$0.00	$71,897.95	$35,802.05	67%	$32,785.45
EXPENSE									
Department **000 - ACCOUNT BALANCES**	106,000.00	.00	106,000.00	3,049.17	.00	15,154.31	90,845.69	14	18,326.53
EXPENSE TOTALS	$106,000.00	$0.00	$106,000.00	$3,049.17	$0.00	$15,154.31	$90,845.69	14%	$18,326.53
Fund **270 - HISTORICAL COMMISSION** Totals									
REVENUE TOTALS	107,700.00	.00	107,700.00	40,663.33	.00	71,897.95	35,802.05	67%	32,785.45
EXPENSE TOTALS	106,000.00	.00	106,000.00	3,049.17	.00	15,154.31	90,845.69	14%	18,326.53
Fund **270 - HISTORICAL COMMISSION** Totals	$1,700.00	$0.00	$1,700.00	$37,614.16	$0.00	$56,743.64	($55,043.64)		$14,458.92

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Fund **271 - LIBRARY FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	5,028,550.00	.00	5,028,550.00	89,387.65	.00	4,417,038.53	611,511.47	88	4,475,483.01
REVENUE TOTALS	$5,028,550.00	$0.00	$5,028,550.00	$89,387.65	$0.00	$4,417,038.53	$611,511.47	88%	$4,475,483.01
EXPENSE									
Department **778 - CIVIC CENTER LIBRARY**	4,427,071.00	1,380,836.00	5,807,907.00	354,074.26	80,255.00	1,067,427.21	4,660,224.79	20	1,036,785.76
Department **779 - NOBLE LIBRARY**	15,000.00	(6,500.00)	8,500.00	321.35	.00	1,521.96	6,978.04	18	1,577.84
Department **780 - SANDBURG LIBRARY**	1,055,083.00	33,091.00	1,088,174.00	79,763.69	420.00	241,256.30	846,497.70	22	242,126.41
EXPENSE TOTALS	$5,497,154.00	$1,407,427.00	$6,904,581.00	$434,159.30	$80,675.00	$1,310,205.47	$5,513,700.53	20%	$1,280,490.01
Fund **271 - LIBRARY FUND** Totals									
REVENUE TOTALS	5,028,550.00	.00	5,028,550.00	89,387.65	.00	4,417,038.53	611,511.47	88%	4,475,483.01
EXPENSE TOTALS	5,497,154.00	1,407,427.00	6,904,581.00	434,159.30	80,675.00	1,310,205.47	5,513,700.53	20%	1,280,490.01
Fund **271 - LIBRARY FUND** Totals	($468,604.00)	($1,407,427.00)	($1,876,031.00)	($344,771.65)	($80,675.00)	$3,106,833.06	($4,902,189.06)		$3,194,993.00

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Fund **272 - ARTS COMMISSION FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	6,000.00	.00	6,000.00	334.18	.00	1,392.25	4,607.75	23	1,157.01
REVENUE TOTALS	$6,000.00	$0.00	$6,000.00	$334.18	$0.00	$1,392.25	$4,607.75	23%	$1,157.01
EXPENSE									
Department **000 - ACCOUNT BALANCES**	17,700.00	.00	17,700.00	.00	.00	.00	17,700.00	0	.00
EXPENSE TOTALS	$17,700.00	$0.00	$17,700.00	$0.00	$0.00	$0.00	$17,700.00	0%	$0.00
Fund **272 - ARTS COMMISSION FUND** Totals									
REVENUE TOTALS	6,000.00	.00	6,000.00	334.18	.00	1,392.25	4,607.75	23%	1,157.01
EXPENSE TOTALS	17,700.00	.00	17,700.00	.00	.00	.00	17,700.00	0%	.00
Fund **272 - ARTS COMMISSION FUND** Totals	($11,700.00)	$0.00	($11,700.00)	$334.18	$0.00	$1,392.25	($13,092.25)		$1,157.01

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Fund **284 - OPIOID SETTLEMENT FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	105,153.00	.00	105,153.00	1,468.69	.00	6,230.45	98,922.55	6	1,884.15
REVENUE TOTALS	$105,153.00	$0.00	$105,153.00	$1,468.69	$0.00	$6,230.45	$98,922.55	6%	$1,884.15
EXPENSE									
Department **000 - ACCOUNT BALANCES**	100,765.00	.00	100,765.00	8,242.00	.00	26,608.80	74,156.20	26	.00
EXPENSE TOTALS	$100,765.00	$0.00	$100,765.00	$8,242.00	$0.00	$26,608.80	$74,156.20	26%	$0.00
Fund **284 - OPIOID SETTLEMENT FUND** Totals									
REVENUE TOTALS	105,153.00	.00	105,153.00	1,468.69	.00	6,230.45	98,922.55	6%	1,884.15
EXPENSE TOTALS	100,765.00	.00	100,765.00	8,242.00	.00	26,608.80	74,156.20	26%	.00
Fund **284 - OPIOID SETTLEMENT FUND** Totals	$4,388.00	$0.00	$4,388.00	($6,773.31)	$0.00	($20,378.35)	$24,766.35		$1,884.15

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **286 - TRANSIT & CAPITAL IMPR**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	2,776,240.00	.00	2,776,240.00	429.83	.00	2,586,734.45	189,505.55	93	2,647,891.66
REVENUE TOTALS	$2,776,240.00	$0.00	$2,776,240.00	$429.83	$0.00	$2,586,734.45	$189,505.55	93%	$2,647,891.66
EXPENSE									
Department **000 - ACCOUNT BALANCES**	2,776,240.00	.00	2,776,240.00	.00	.00	2,776,240.00	.00	100	2,608,950.00
EXPENSE TOTALS	$2,776,240.00	$0.00	$2,776,240.00	$0.00	$0.00	$2,776,240.00	$0.00	100%	$2,608,950.00
Fund **286 - TRANSIT & CAPITAL IMPR** Totals									
REVENUE TOTALS	2,776,240.00	.00	2,776,240.00	429.83	.00	2,586,734.45	189,505.55	93%	2,647,891.66
EXPENSE TOTALS	2,776,240.00	.00	2,776,240.00	.00	.00	2,776,240.00	.00	100%	2,608,950.00
Fund **286 - TRANSIT & CAPITAL IMPR** Totals	$0.00	$0.00	$0.00	$429.83	$0.00	($189,505.55)	$189,505.55		$38,941.66

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **288 - COMMUNITY TRANSIT PROGRAM**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	716,445.00	.00	716,445.00	18,694.51	.00	550,993.13	165,451.87	77	694,480.17
REVENUE TOTALS	$716,445.00	$0.00	$716,445.00	$18,694.51	$0.00	$550,993.13	$165,451.87	77%	$694,480.17
EXPENSE									
Department **606 - COMM TRANSIT DISPATCHERS**	109,938.00	.00	109,938.00	11,560.62	.00	31,195.82	78,742.18	28	30,138.04
Department **607 - COMMUNITY TRANSIT ADMIN**	166,398.00	55,801.00	222,199.00	14,006.23	.00	56,488.32	165,710.68	25	49,654.18
Department **608 - COMMUNITY TRANSIT**	977,513.00	(5,401.00)	972,112.00	113,818.33	105,173.00	338,190.88	528,748.12	46	422,571.73
EXPENSE TOTALS	$1,253,849.00	$50,400.00	$1,304,249.00	$139,385.18	$105,173.00	$425,875.02	$773,200.98	41%	$502,363.95
Fund **288 - COMMUNITY TRANSIT PROGRAM** Totals									
REVENUE TOTALS	716,445.00	.00	716,445.00	18,694.51	.00	550,993.13	165,451.87	77%	694,480.17
EXPENSE TOTALS	1,253,849.00	50,400.00	1,304,249.00	139,385.18	105,173.00	425,875.02	773,200.98	41%	502,363.95
Fund **288 - COMMUNITY TRANSIT PROGRAM** Totals	($537,404.00)	($50,400.00)	($587,804.00)	($120,690.67)	($105,173.00)	$125,118.11	($607,749.11)		$192,116.22

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Fund **297 - CABLE TELEVISION FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	378,200.00	.00	378,200.00	1,667.85	.00	88,123.90	290,076.10	23	99,974.04
REVENUE TOTALS	$378,200.00	$0.00	$378,200.00	$1,667.85	$0.00	$88,123.90	$290,076.10	23%	$99,974.04
EXPENSE									
Department **806 - CABLE TELEVISION**	569,659.00	.00	569,659.00	59,998.16	.00	167,589.81	402,069.19	29	190,460.87
EXPENSE TOTALS	$569,659.00	$0.00	$569,659.00	$59,998.16	$0.00	$167,589.81	$402,069.19	29%	$190,460.87
Fund **297 - CABLE TELEVISION FUND** Totals									
REVENUE TOTALS	378,200.00	.00	378,200.00	1,667.85	.00	88,123.90	290,076.10	23%	99,974.04
EXPENSE TOTALS	569,659.00	.00	569,659.00	59,998.16	.00	167,589.81	402,069.19	29%	190,460.87
Fund **297 - CABLE TELEVISION FUND** Totals	($191,459.00)	$0.00	($191,459.00)	($58,330.31)	$0.00	($79,465.91)	($111,993.09)		($90,486.83)

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **372 - D/S 2015 MBA REFUNDING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0	.00
REVENUE TOTALS	$181,984.00	$0.00	$181,984.00	$0.00	$0.00	$0.00	$181,984.00	0%	$0.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0	.00
EXPENSE TOTALS	$181,984.00	$0.00	$181,984.00	$0.00	$0.00	$0.00	$181,984.00	0%	$0.00
Fund **372 - D/S 2015 MBA REFUNDING** Totals									
REVENUE TOTALS	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0%	.00
EXPENSE TOTALS	181,984.00	.00	181,984.00	.00	.00	.00	181,984.00	0%	.00
Fund **372 - D/S 2015 MBA REFUNDING** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00		$0.00

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **373 - D/S 2016 MBA REFUNDING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	548,600.00	.00	548,600.00	500.00	.00	500.00	548,100.00	0	500.00
REVENUE TOTALS	$548,600.00	$0.00	$548,600.00	$500.00	$0.00	$500.00	$548,100.00	0%	$500.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	548,600.00	.00	548,600.00	500.00	.00	500.00	548,100.00	0	500.00
EXPENSE TOTALS	$548,600.00	$0.00	$548,600.00	$500.00	$0.00	$500.00	$548,100.00	0%	$500.00
Fund **373 - D/S 2016 MBA REFUNDING** Totals									
REVENUE TOTALS	548,600.00	.00	548,600.00	500.00	.00	500.00	548,100.00	0%	500.00
EXPENSE TOTALS	548,600.00	.00	548,600.00	500.00	.00	500.00	548,100.00	0%	500.00
Fund **373 - D/S 2016 MBA REFUNDING** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00		$0.00

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **374 - D/S 2017 MBA REFUNDING**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	1,994,850.00	.00	1,994,850.00	.00	.00	500.00	1,994,350.00	0	500.00
REVENUE TOTALS	$1,994,850.00	$0.00	$1,994,850.00	$0.00	$0.00	$500.00	$1,994,350.00	0%	$500.00
EXPENSE									
Department **000 - ACCOUNT BALANCES**	1,994,850.00	.00	1,994,850.00	.00	.00	500.00	1,994,350.00	0	500.00
EXPENSE TOTALS	$1,994,850.00	$0.00	$1,994,850.00	$0.00	$0.00	$500.00	$1,994,350.00	0%	$500.00
Fund **374 - D/S 2017 MBA REFUNDING** Totals									
REVENUE TOTALS	1,994,850.00	.00	1,994,850.00	.00	.00	500.00	1,994,350.00	0%	500.00
EXPENSE TOTALS	1,994,850.00	.00	1,994,850.00	.00	.00	500.00	1,994,350.00	0%	500.00
Fund **374 - D/S 2017 MBA REFUNDING** Totals	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00		$0.00

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **401 - CAPITAL PROJECTS**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	2,672,240.00	.00	2,672,240.00	44,193.31	.00	2,477,156.14	195,083.86	93	3,194,366.28
REVENUE TOTALS	$2,672,240.00	$0.00	$2,672,240.00	$44,193.31	$0.00	$2,477,156.14	$195,083.86	93%	$3,194,366.28
EXPENSE									
Department **000 - ACCOUNT BALANCES**	3,755,000.00	6,497,959.00	10,252,959.00	785,562.34	320,212.59	1,834,080.06	8,098,666.35	21	1,564,320.18
EXPENSE TOTALS	$3,755,000.00	$6,497,959.00	$10,252,959.00	$785,562.34	$320,212.59	$1,834,080.06	$8,098,666.35	21%	$1,564,320.18
Fund **401 - CAPITAL PROJECTS** Totals									
REVENUE TOTALS	2,672,240.00	.00	2,672,240.00	44,193.31	.00	2,477,156.14	195,083.86	93%	3,194,366.28
EXPENSE TOTALS	3,755,000.00	6,497,959.00	10,252,959.00	785,562.34	320,212.59	1,834,080.06	8,098,666.35	21%	1,564,320.18
Fund **401 - CAPITAL PROJECTS** Totals	($1,082,760.00)	($6,497,959.00)	($7,580,719.00)	($741,369.03)	($320,212.59)	$643,076.08	($7,903,582.49)		$1,630,046.10

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **409 - GOLF COURSE CAPITAL IMPR**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	461,000.00	.00	461,000.00	7,526.22	.00	193,533.34	267,466.66	42	(18,075.92)
REVENUE TOTALS	$461,000.00	$0.00	$461,000.00	$7,526.22	$0.00	$193,533.34	$267,466.66	42%	($18,075.92)
EXPENSE									
Department **000 - ACCOUNT BALANCES**	335,234.00	.00	335,234.00	12,056.00	118,929.00	15,956.00	200,349.00	40	16,580.00
EXPENSE TOTALS	$335,234.00	$0.00	$335,234.00	$12,056.00	$118,929.00	$15,956.00	$200,349.00	40%	$16,580.00
Fund **409 - GOLF COURSE CAPITAL IMPR** Totals									
REVENUE TOTALS	461,000.00	.00	461,000.00	7,526.22	.00	193,533.34	267,466.66	42%	(18,075.92)
EXPENSE TOTALS	335,234.00	.00	335,234.00	12,056.00	118,929.00	15,956.00	200,349.00	40%	16,580.00
Fund **409 - GOLF COURSE CAPITAL IMPR** Totals	$125,766.00	$0.00	$125,766.00	($4,529.78)	($118,929.00)	$177,577.34	$67,117.66		($34,655.92)

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **418 - BUILDING IMPROVEMENT FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	330,000.00	.00	330,000.00	44,872.21	.00	183,827.25	146,172.75	56	122,924.11
REVENUE TOTALS	$330,000.00	$0.00	$330,000.00	$44,872.21	$0.00	$183,827.25	$146,172.75	56%	$122,924.11
EXPENSE									
Department **000 - ACCOUNT BALANCES**	150,000.00	50,000.00	200,000.00	.00	.00	51,543.31	148,456.69	26	15,449.04
EXPENSE TOTALS	$150,000.00	$50,000.00	$200,000.00	$0.00	$0.00	$51,543.31	$148,456.69	26%	$15,449.04
Fund **418 - BUILDING IMPROVEMENT FUND** Totals									
REVENUE TOTALS	330,000.00	.00	330,000.00	44,872.21	.00	183,827.25	146,172.75	56%	122,924.11
EXPENSE TOTALS	150,000.00	50,000.00	200,000.00	.00	.00	51,543.31	148,456.69	26%	15,449.04
Fund **418 - BUILDING IMPROVEMENT FUND** Totals	$180,000.00	($50,000.00)	$130,000.00	$44,872.21	$0.00	$132,283.94	($2,283.94)		$107,475.07

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **419 - SENIOR CENTER CONSTRUCTION FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	140,000.00	.00	140,000.00	16,668.98	.00	68,724.28	71,275.72	49	52,376.30
REVENUE TOTALS	$140,000.00	$0.00	$140,000.00	$16,668.98	$0.00	$68,724.28	$71,275.72	49%	$52,376.30
EXPENSE									
Department **000 - ACCOUNT BALANCES**	.00	1,044,337.00	1,044,337.00	166,449.09	.00	201,800.42	842,536.58	19	22,671.03
EXPENSE TOTALS	$0.00	$1,044,337.00	$1,044,337.00	$166,449.09	$0.00	$201,800.42	$842,536.58	19%	$22,671.03
Fund **419 - SENIOR CENTER CONSTRUCTION FUND** Totals									
REVENUE TOTALS	140,000.00	.00	140,000.00	16,668.98	.00	68,724.28	71,275.72	49%	52,376.30
EXPENSE TOTALS	.00	1,044,337.00	1,044,337.00	166,449.09	.00	201,800.42	842,536.58	19%	22,671.03
Fund **419 - SENIOR CENTER CONSTRUCTION FUND** Totals	$140,000.00	($1,044,337.00)	($904,337.00)	($149,780.11)	$0.00	($133,076.14)	($771,260.86)		$29,705.27

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **470 - COURT BUILDING IMPROVEMENTS**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	600,000.00	.00	600,000.00	68,001.15	.00	232,224.47	367,775.53	39	136,476.82
REVENUE TOTALS	$600,000.00	$0.00	$600,000.00	$68,001.15	$0.00	$232,224.47	$367,775.53	39%	$136,476.82
EXPENSE									
Department **000 - ACCOUNT BALANCES**	548,600.00	.00	548,600.00	500.00	.00	500.00	548,100.00	0	500.00
EXPENSE TOTALS	$548,600.00	$0.00	$548,600.00	$500.00	$0.00	$500.00	$548,100.00	0%	$500.00
Fund **470 - COURT BUILDING IMPROVEMENTS** Totals									
REVENUE TOTALS	600,000.00	.00	600,000.00	68,001.15	.00	232,224.47	367,775.53	39%	136,476.82
EXPENSE TOTALS	548,600.00	.00	548,600.00	500.00	.00	500.00	548,100.00	0%	500.00
Fund **470 - COURT BUILDING IMPROVEMENTS** Totals	$51,400.00	$0.00	$51,400.00	$67,501.15	$0.00	$231,724.47	($180,324.47)		$135,976.82

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Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **536 - NEWBURGH VILLAGE**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	900,200.00	.00	900,200.00	72,678.48	.00	292,037.92	608,162.08	32	299,029.42
REVENUE TOTALS	$900,200.00	$0.00	$900,200.00	$72,678.48	$0.00	$292,037.92	$608,162.08	32%	$299,029.42
EXPENSE									
Department **677 - NEWBURGH VILLAGE**	1,101,864.00	183,143.00	1,285,007.00	58,571.87	13,525.00	408,033.79	863,448.21	33	211,106.32
EXPENSE TOTALS	$1,101,864.00	$183,143.00	$1,285,007.00	$58,571.87	$13,525.00	$408,033.79	$863,448.21	33%	$211,106.32
Fund **536 - NEWBURGH VILLAGE** Totals									
REVENUE TOTALS	900,200.00	.00	900,200.00	72,678.48	.00	292,037.92	608,162.08	32%	299,029.42
EXPENSE TOTALS	1,101,864.00	183,143.00	1,285,007.00	58,571.87	13,525.00	408,033.79	863,448.21	33%	211,106.32
Fund **536 - NEWBURGH VILLAGE** Totals	($201,664.00)	($183,143.00)	($384,807.00)	$14,106.61	($13,525.00)	($115,995.87)	($255,286.13)		$87,923.10

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Fund **538 - SILVER VILLAGE FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	750,780.00	.00	750,780.00	64,703.82	.00	259,641.55	491,138.45	35	237,978.96
REVENUE TOTALS	$750,780.00	$0.00	$750,780.00	$64,703.82	$0.00	$259,641.55	$491,138.45	35%	$237,978.96
EXPENSE									
Department **676 - SILVER VILLAGE**	724,020.00	104,516.00	828,536.00	80,959.10	.00	222,147.23	606,388.77	27	198,912.78
EXPENSE TOTALS	$724,020.00	$104,516.00	$828,536.00	$80,959.10	$0.00	$222,147.23	$606,388.77	27%	$198,912.78
Fund **538 - SILVER VILLAGE FUND** Totals									
REVENUE TOTALS	750,780.00	.00	750,780.00	64,703.82	.00	259,641.55	491,138.45	35%	237,978.96
EXPENSE TOTALS	724,020.00	104,516.00	828,536.00	80,959.10	.00	222,147.23	606,388.77	27%	198,912.78
Fund **538 - SILVER VILLAGE FUND** Totals	$26,760.00	($104,516.00)	($77,756.00)	($16,255.28)	$0.00	$37,494.32	($115,250.32)		$39,066.18

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Fund **584 - GOLF COURSE FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	2,289,051.00	.00	2,289,051.00	62,456.17	.00	129,876.66	2,159,174.34	6	67,975.09
REVENUE TOTALS	$2,289,051.00	$0.00	$2,289,051.00	$62,456.17	$0.00	$129,876.66	$2,159,174.34	6%	$67,975.09
EXPENSE									
Department **000 - ACCOUNT BALANCES**	250,000.00	.00	250,000.00	.00	.00	250,000.00	.00	100	.00
Department **773 - WHISPERING WILLOWS**	790,311.00	.00	790,311.00	71,280.51	.00	201,750.01	588,560.99	26	164,856.85
Department **774 - IDYL WYLD**	645,211.00	.00	645,211.00	65,288.86	.00	182,278.54	462,932.46	28	156,745.78
Department **775 - FOX CREEK**	810,581.00	.00	810,581.00	72,869.91	3,192.00	193,243.46	614,145.54	24	178,314.30
EXPENSE TOTALS	$2,496,103.00	$0.00	$2,496,103.00	$209,439.28	$3,192.00	$827,272.01	$1,665,638.99	33%	$499,916.93
Fund **584 - GOLF COURSE FUND** Totals									
REVENUE TOTALS	2,289,051.00	.00	2,289,051.00	62,456.17	.00	129,876.66	2,159,174.34	6%	67,975.09
EXPENSE TOTALS	2,496,103.00	.00	2,496,103.00	209,439.28	3,192.00	827,272.01	1,665,638.99	33%	499,916.93
Fund **584 - GOLF COURSE FUND** Totals	($207,052.00)	$0.00	($207,052.00)	($146,983.11)	($3,192.00)	($697,395.35)	$493,535.35		($431,941.84)

BUDGET TO ACTUAL - COUNCIL SUMMARY - 03/31/2024

Through 03/31/24

Prior Fiscal Year Activity Included

Organization	Adopted Budget	Budget Amendments	Amended Budget	Current Month Transactions	YTD Encumbrances	YTD Transactions	Budget - YTD Transactions	% Used/ Rec'd	Prior Year YTD
Fund **592 - WATER AND SEWER FUND**									
REVENUE									
Department **000 - ACCOUNT BALANCES**	45,909,967.00	.00	45,909,967.00	3,241,720.91	.00	13,069,940.44	32,840,026.56	28	12,248,259.90
Department **558 - W & S FINANCIAL ADMIN**	.00	.00	.00	.00	.00	.00	.00	+++	.00
REVENUE TOTALS	$45,909,967.00	$0.00	$45,909,967.00	$3,241,720.91	$0.00	$13,069,940.44	$32,840,026.56	28%	$12,248,259.90
EXPENSE									
Department **558 - W & S FINANCIAL ADMIN**	35,408,704.00	.00	35,408,704.00	3,170,120.38	1,000.00	11,790,075.99	23,617,628.01	33	11,202,143.32
Department **559 - W & S FIELD OPERATIONS**	9,236,819.00	1,900,243.00	11,137,062.00	901,051.39	138,083.40	2,362,520.78	8,636,457.82	22	1,936,098.05
EXPENSE TOTALS	$44,645,523.00	$1,900,243.00	$46,545,766.00	$4,071,171.77	$139,083.40	$14,152,596.77	$32,254,085.83	31%	$13,138,241.37
Fund **592 - WATER AND SEWER FUND** Totals									
REVENUE TOTALS	45,909,967.00	.00	45,909,967.00	3,241,720.91	.00	13,069,940.44	32,840,026.56	28%	12,248,259.90
EXPENSE TOTALS	44,645,523.00	1,900,243.00	46,545,766.00	4,071,171.77	139,083.40	14,152,596.77	32,254,085.83	31%	13,138,241.37
Fund **592 - WATER AND SEWER FUND** Totals	$1,264,444.00	($1,900,243.00)	($635,799.00)	($829,450.86)	($139,083.40)	($1,082,656.33)	$585,940.73		($889,981.47)
Grand Totals									
REVENUE TOTALS	198,934,308.00	.00	198,934,308.00	7,872,383.31	.00	105,875,978.69	93,058,329.31	53%	101,211,341.66
EXPENSE TOTALS	205,240,767.00	15,106,977.00	220,347,744.00	17,206,749.75	3,993,401.65	56,663,620.66	159,690,721.69	28%	51,367,719.50
Grand Totals	($6,306,459.00)	($15,106,977.00)	($21,413,436.00)	($9,334,366.44)	($3,993,401.65)	$49,212,358.03	($66,632,392.38)		$49,843,622.16

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

1. REQUEST TO WAIVE THE CITY'S NOISE ORDINANCE: Joseph Coogan, re: to host a graduation party with a DJ in the backyard of the home located at 19291 Lathers St, on Saturday, June 22, 2024, from 1:00 p.m. until 10:00 p.m.

   Joseph Coogan, petitioner, presented the request to Council.

   Councilmember Donovic offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

1.

Clerk
May 24, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	

AGENDA ITEM

REQUEST TO WAIVE THE CITY'S NOISE ORDINANCE: Joseph Coogan re: to host a graduation party with a DJ in the backyard of the home located at 19291 Lathers St, on Saturday, June 22, 2024, from 1:00 p.m. until 10:00 p.m.

BACKGROUND DETAILS

This will be for a graduation party in the home's backyard with approximately 50-100 in attendance.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Approve as submitted.

ATTACHMENTS

1. S060324 Noise Waiver Joseph Coogan

APPROVED BY

_____ Date: May 24, 2024
Doris DeMarco, Deputy Clerk

REQUEST FOR NOISE WAIVER BLOCK PARTY and/or BARRICADING OF CITY STREETS

Send to: Livonia City Council, c/o City Clerk, 33000 Civic Center Drive, Livonia, MI 48154-3097
or hand deliver to the City Clerk's Office **at least 8 weeks prior to the planned event**

PLEASE PRINT

Date of Application: 5/23/24 Date to appear at a Council Meeting: 6/3/24

Name of Neighborhood Representative: Joseph Coogan

Address (please include zip code): 19291 Lathers St, Livonia MI 48152

Telephone Number with area code: Home: 313-300-7065 Office: _____

Email: cooganj9@gmail.com

Please circle what is being requested – **"BLOCK PARTY"** and/or **"STREET BARRICADING"**

6/22/24	none	1PM -10PM
Date of Block Party and/or Barricading	Rain Date	Start/end time of Block Party and/or Barricading **End time is no later than 10:00 p.m.**

Location of Block Party and/or Barricading: (Be specific. Indicate which streets and between which boundaries).

Backyard of address listed above

Type of Event: Briefly (Describe activities planned. Music, barbecue, games, etc.) DJ for grad party

How many barricades are you requesting (max. 10)? Zero

Approximate Number Attending: 50-100

Date of Council Approval/Denial: _____

Council Resolution Number: _____

RECEIVED
OFFICE OF THE CITY CLERK
2024 MAY 23 PM 1:19

City Council Office Document
Revised August 2021
A:Block Party Form

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

2. REQUEST TO WAIVE THE CITY'S NOISE ORDINANCE: Ashley Morris, Community Opportunity Center, NPHC, re: to hold a company family picnic with a DJ at Rotary Park, on Thursday, September 19, 2024, from 4:00 p.m. to 6:00 p.m.

   Ashley Morris, petitioner, presented the request to Council.

   Councilmember Jolly offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

2.

Clerk
May 14, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	

AGENDA ITEM

REQUEST TO WAIVE THE CITY'S NOISE ORDINANCE: Ashley Morris, Community Opportunity Center, NPHC, re: to hold a company family picnic with a DJ at Rotary Park, on Thursday, September 19, 2024, from 4:00 p.m. to 6:00 p.m.

BACKGROUND DETAILS

Community Opportunity Center NPHC will be hosting a Company Family Picnic for adults with developmental disabilities to be held at Rotary Park. One of the attendees is a DJ and would like to play music from 4:00 p.m. - 6:00 p.m. Requesting a noise waiver to be able to do this. No rain date is scheduled. They are expecting approximately 120 people.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Approve as submitted.

ATTACHMENTS

1. R060324 Noise Waiver Ashley Morris

APPROVED BY

_____ Date: May 14, 2024
Doris DeMarco, Deputy Clerk

REQUEST FOR NOISE WAIVER BLOCK PARTY and/or BARRICADING OF CITY STREETS

Send to: Livonia City Council, c/o City Clerk, 33000 Civic Center Drive, Livonia, MI 48154-3097
or hand deliver to the City Clerk's Office **at least 8 weeks prior to the planned event**

PLEASE PRINT

Date of Application: 5/10/2024 Date to appear at a Council Meeting: _____

Name of Neighborhood Representative: Ashley Morris / Community Opportunity Center NPHC

Address (please include zip code): 14147 Farmington Rd, 48154

Telephone Number with area code: Home: 734-578-6836 Office: 734-838-0537

Email: amorris@cochomes.net

Please circle what is being requested – **"BLOCK PARTY"** and/or **"STREET BARRICADING"**

SEPT 2024 ~~FRI~~	9-19-2024	4p-6pm
Date of Block Party and/or Barricading	Rain Date	Start/end time of Block Party and/or Barricading **End time is no later than 10:00 p.m.**

Location of Block Party and/or Barricading: (Be specific. Indicate which streets and between which boundaries).

Rotary Park

Type of Event: Briefly (Describe activities planned. Music, barbecue, games, etc.) Company family picnic for adults with developmental disabilites

How many barricades are you requesting (max. 10)? _____

Approximate Number Attending: 120

Date of Council Approval/Denial: _____

Council Resolution Number: _____

RECEIVED
OFFICE OF THE CITY CLERK
2024 MAY 10 PM 3:23

City Council Office Document
Revised August 2021
A:Block Party Form

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

3. REAPPOINTMENT OF JAMES BARINGHAUS TO THE ZONING BOARD OF APPEALS: Laura M. Toy, Councilmember, re: for a three-year term which will expire on July 12, 2027.

   Councilmember Jolly presented the request to Council.

   Councilmember Jolly offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

4.

Council Office
May 9, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	

AGENDA ITEM

REAPPOINTMENT OF JAMES BARINGHAUS TO THE ZONING BOARD OF APPEALS: Laura M. Toy, Councilmember, re: for a three-year term which will expire on July 12, 2027.

BACKGROUND DETAILS

May 9, 2024

Honorable Members of the City Council
City of Livonia, Michigan

RE: REAPPOINTMENT OF JAMES BARINGHAUS TO THE ZONING BOARD OF APPEALS

Dear Honorable Members of the City Council:

I am herewith submitting to you, for your consideration and approval, the reappointment of James Baringhaus, 37195 Weymouth, Livonia, MI 48152, to the Zoning Board of Appeals for a three-year term of office to expire July 12, 2027.

Your favorable consideration of this appointment would be greatly appreciated.

Sincerely,

Laura M. Toy, Councilmember

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

To approve the reappointment of James Baringhaus to the Zoning Board of Appeals.

ATTACHMENTS

None

APPROVED BY

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

4. REAPPOINTMENT OF GREGORY G. COPPOLA TO THE ZONING BOARD OF APPEALS: Rob Gjonaj Donovic, Councilmember, re: for a three-year term which will expire on July 12, 2027.

   Councilmember Donovic presented the request to Council.

   Councilmember Donovic offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

3.

Council Office
May 9, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	

AGENDA ITEM

REAPPOINTMENT OF GREGORY G. COPPOLA TO THE ZONING BOARD OF APPEALS: Rob Gjonaj Donovic, Councilmember, re: for a three-year term which will expire on July 12, 2027.

BACKGROUND DETAILS

May 9, 2024

Honorable Members of Council
City of Livonia

RE: REAPPOINTMENT OF GREGORY G. COPPOLA TO THE ZONING BOARD OF APPEALS Dear Honorable Members of the City Council:

I am herewith submitting to you, for your consideration and approval, the reappointment of Gregory G. Coppola, 17268 McNamara, Livonia, MI 48152, to the Zoning Board of Appeals for a three-year term of office to expire July 12, 2027.

Your favorable consideration to this appointment will be appreciated.

Thank you.

Sincerely,

Rob Gjonaj Donovic, Councilmember

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

To approve the reappointment of Gregory G. Coppola to the Zoning Board of Appeals.

ATTACHMENTS

None

APPROVED BY

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

5. REAPPOINTMENT OF MARC ROTONDO TO THE ZONING BOARD OF APPEALS: Scott Morgan, Councilmember, re: for a three-year term which will expire on July 12, 2027.

   Councilmember Morgan presented the request to Council.

   Councilmember Morgan offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

5.

Council Office
May 9, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	

AGENDA ITEM

REAPPOINTMENT OF MARC ROTONDO TO THE ZONING BOARD OF APPEALS: Scott Morgan, Councilmember, re: for a three-year term which will expire on July 12, 2027.

BACKGROUND DETAILS

May 9, 2024

Honorable Members of the City Council
City of Livonia, Michigan

RE: REAPPOINTMENT OF MARC ROTONDO TO THE ZONING BOARD OF APPEALS

Dear Honorable Members of the City Council:

I am herewith submitting to you, for your consideration and approval, the reappointment of Marc Rotondo, 33135 Pickford, Livonia, MI 48152, to the Zoning Board of Appeals for a three-year term of office to expire July 12, 2027.

Your favorable consideration of this appointment would be greatly appreciated.

Sincerely,

Scott Morgan, Councilmember

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

To approve the reappointment of Marc Rotondo to the Zoning Board of Appeals.

ATTACHMENTS

None

APPROVED BY

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

6. REQUEST TO APPROVE SUPPORT FOR LEGISLATION FOR THE GROUND EMERGENCY MEDICAL TRANSPORTATION (GEMT) program: Livonia Fire & Rescue, re: in order to enhance our emergency medical transportation services and potentially secure significant additional funding for the Fire Department.

   Livonia Fire Chief Jennison presented the request to Council.

   Vice President Ptashnik offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

6.

Fire
April 29, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Robert Jennison, Fire Chief

AGENDA ITEM

REQUEST TO APPROVE SUPPORT FOR LEGISLATION FOR THE GROUND EMERGENCY MEDICAL TRANSPORTATION (GEMT) program: Livonia Fire & Rescue, re: in order to enhance our emergency medical transportation services and potentially secure significant additional funding for the Fire Department.

BACKGROUND DETAILS

Honorable Members of the Livonia City Council,

I am writing to bring to your attention the Ground Emergency Medical Transportation (GEMT) program and to seek your support through a Council Resolution, see attached. The GEMT program offers a vital opportunity for Livonia Fire & Rescue to enhance our emergency medical transportation services and potentially secure significant additional funding for our department.

The GEMT program, a voluntary enrollment initiative, provides reimbursement to eligible healthcare providers for emergency medical transportation services rendered to Medicaid beneficiaries. Through our internal survey, we have determined that Livonia Fire & Rescue could potentially collect an additional $365,000 from Medicaid annually through participation in the GEMT program. This represents a substantial opportunity to bolster the resources we provide for our community through additional funding for services the department is already providing.

I am requesting the Livonia City Council's support for current legislation through a resolution endorsing our potential participation if HB-5695 is adopted, see attached. This endorsement will not only strengthen the position of the GEMT coalition, but also underscore our commitment to enhancing emergency medical services for Livonia residents.

I am available to provide additional information or answer any questions regarding this initiative. Your support of the GEMT program will be instrumental in advancing the legislation, and our mission of providing exceptional emergency medical care to our community.

Thank you for considering this important matter.

Sincerely,

Robert Jennison
Fire Chief

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Approve the following resolution~

Resolution of Support Implementation of the Ground Emergency Medical Transportation Program in Michigan

WHEREAS, the City of Livonia provides Ground Emergency Medical Transportation (GEMT) service for city residents, which includes many Medicaid beneficiaries; AND

WHEREAS, the GEMT program available through the United States Centers for Medicare & Medicaid Services provides reimbursement to public providers for service providers to Medicaid patients; AND

WHEREAS, the State of Michigan is not currently participating in the GEMT program, which is a voluntary enrollment program at both the state and local levels; AND

WHEREAS, implementation of the GEMT program in the State of Michigan may yield hundreds of thousands of federal reimbursement for the City of Livonia annually; AND

WHEREAS, the emergency services sector has struggled with workforce retention and recruiting in the wake of the COVID-19 pandemic, and the GEMT program will help Michigan public agencies, including the City of Livonia, retain and hire employees; AND

WHEREAS, the GEMT program has shown to expand access, quality, and sustainability of emergency services for Medicaid recipients for public providers; AND

WHEREAS, the MI-GEMT coalition is advocating for the passage of legislation directing the Michigan Department of Health and Human Services to enroll in the GEMT program; AND

WHEREAS, the MI-GEMT coalition includes the Michigan Association of Fire Chiefs, Michigan Municipal League, Michigan Townships Association; AND

NOW THERFORE BE IT RESOLVED THAT, the Livonia City Council hereby conveys its support for efforts of the MI-GEMT coalition; and,

BE IT FURTHER RESOLVED THAT, the City of Livonia urges the Michigan State Legislation to adopt legislation directing the Michigan Department of Health and Human Services to enroll in the GEMT program through the Centers for Medicare and Medicaid Services State Plan Amendment process.

ATTACHMENTS

1. City Council - GEMT Letter
2. GEMT_Advocacy_MML-etal_02062024

3. Resolution of Support
4. 2024-HIB-5695

APPROVED BY

Robert Jennison, Fire Chief

Date: May 03, 2024

Carter Fisher, City Attorney

Date: May 03, 2024

Maureen Miller Brosnan, Mayor

Date: May 13, 2024

DEPARTMENT OF PUBLIC SAFETY
LIVONIA FIRE & RESCUE

ROBERT JENNISON
FIRE CHIEF

MAUREEN MILLER BROSNAN
MAYOR

14910 FARMINGTON ROAD
LIVONIA, MICHIGAN 48154-5419
734-466-2444
734-466-2082 fax

April 22, 2024

Honorable Members of the Livonia City Council,

I am writing to bring to your attention the Ground Emergency Medical Transportation (GEMT) program and to seek your support through a Council Resolution, see attached. The GEMT program offers a vital opportunity for Livonia Fire & Rescue to enhance our emergency medical transportation services and secure significant additional funding for our department.

The GEMT program, a voluntary enrollment initiative, provides reimbursement to eligible healthcare providers for emergency medical transportation services rendered to Medicaid beneficiaries. Through our internal survey, we have determined that Livonia Fire & Rescue could potentially collect an additional $365,000 from Medicaid annually through participation in the GEMT program. This represents a substantial opportunity to bolster the resources we provide to our community through additional funding, for services the department is already providing.

I am requesting the Livonia City Council's support through a resolution endorsing our potential participation. This endorsement will not only strengthen the position of the GEMT coalition, but also underscore our commitment to enhancing emergency medical services for Livonia residents.

I am available to provide additional information or answer any questions regarding this initiative. Your support of the GEMT program will be instrumental in advancing our mission of providing exceptional emergency medical care to our community.

Thank you for considering this important matter.

Sincerely,

Robert Jennison
Fire Chief

MI-GEMT

Ground Emergency Medical Transportation Program (GEMT)

January 8, 2024

Michigan Association of Fire Chiefs

Michigan Townships Association

michigan municipal league

City of Sterling Heights
Innovating Living

Mark Vanderpool
City of Sterling Heights City Manager

- 35 years of municipal management experience.
- 2023 Lifetime Achievement Award Winnerby the American Society for Public Administration (ASPA) Detroit Metropolitan Chapter.
- Key advocate for implementing GEMT in the State of Michigan.

MI-GEMT

Charter Partners

- Michigan Association of Fire Chiefs (MAFC)
- Michigan Municipal League (MML)
- Michigan Townships Association (MTA)
- City of Sterling Heights
- City of Madison Heights

Activities

- Legislative advocacy
- Develop legislation and policy
- Communicate importance of this program to local elected leaders

GEMT Overview

Voluntary enrollment program.

To participate in the GEMT program, healthcare providers must meet specific criteria.

Reimburses eligible healthcare providers for their emergency medical transportation services to Medicaid beneficiaries.

GEMT programs have helped reduce health disparities among Medicaid beneficiaries.

MI-GEMT

GEMT Overview

$50-70 million per year for Michigan providers (estimate).

$63 of each 100 spent of potential reimbursement.

EXAMPLE CALCULATION

Average Cost per Transport	$1,500
Average Medicaid Reimbursement	- $300
Uncompensated Cost per Transport	**$1,200**
Number of Transports (managed care and fee for service)	* 500
Total Uncompensated Costs	**$600,000**
GEMT Reimbursement Rate (63%)	* .63

^Medicaid Transports Only

MI-GEMT

GEMT Overview

$50-70 million per year for Michigan providers (estimate).

$63 of each 100 spent of potential reimbursement.

EXAMPLES*

Community	Population	Percent Medicaid	Potential Reimbursement
Southfield	76,759	14%	$1,052,100
Wayne (City)	17,335	15%	$188,187
Ogemaw County	20,671	18%	$450,716
Royal Oak	59,441	8%	$178,344
Kinross EMS	14,008	29%	$172,688

*based on figures provided in voluntary survey

MI-GEMT

GEMT Overview

Expands access to care.

Enhances *quality* of care.

Improves sustainability of care.

Promotes workforce retention and attraction.

Perceived Challenges to Implementation

MDHHS Information Technology systems and staff are not in place to administer the program.

Funding source for staff and technology to administer the program is needed.

Cost-reporting capacity and proficiency

State Best Practices

- **Most states have adopted a cost reporting model developed by CMS.**
  - *Some states require participants to go through cost report training.*
  - *Training is often provided by advocacy organizations.*
- **Many states use Intergovernmental Transfer (IGT) agreements.**
  - *Establishes the transfer of the non-federal share of funds from GEMT providers to the agency responsible for administration.*
- **State agencies/stakeholder providing annual training opportunities for cost report process and program updates.**
- **States have utilized independent private consultants to aid state agencies responsible for administering GEMT programs.**
  - *These consultants also often provide cost reporting, auditing, policy development, and training for providers, as well.*
  - *In some states, a municipal entity or authority provides administration on behalf of the state*

What is Needed to Implement?

Pass Legislation

Work with MDDHS on program implementation

DHHS Submits Medicaid Annual Plan Amendment

Cost-reporting training

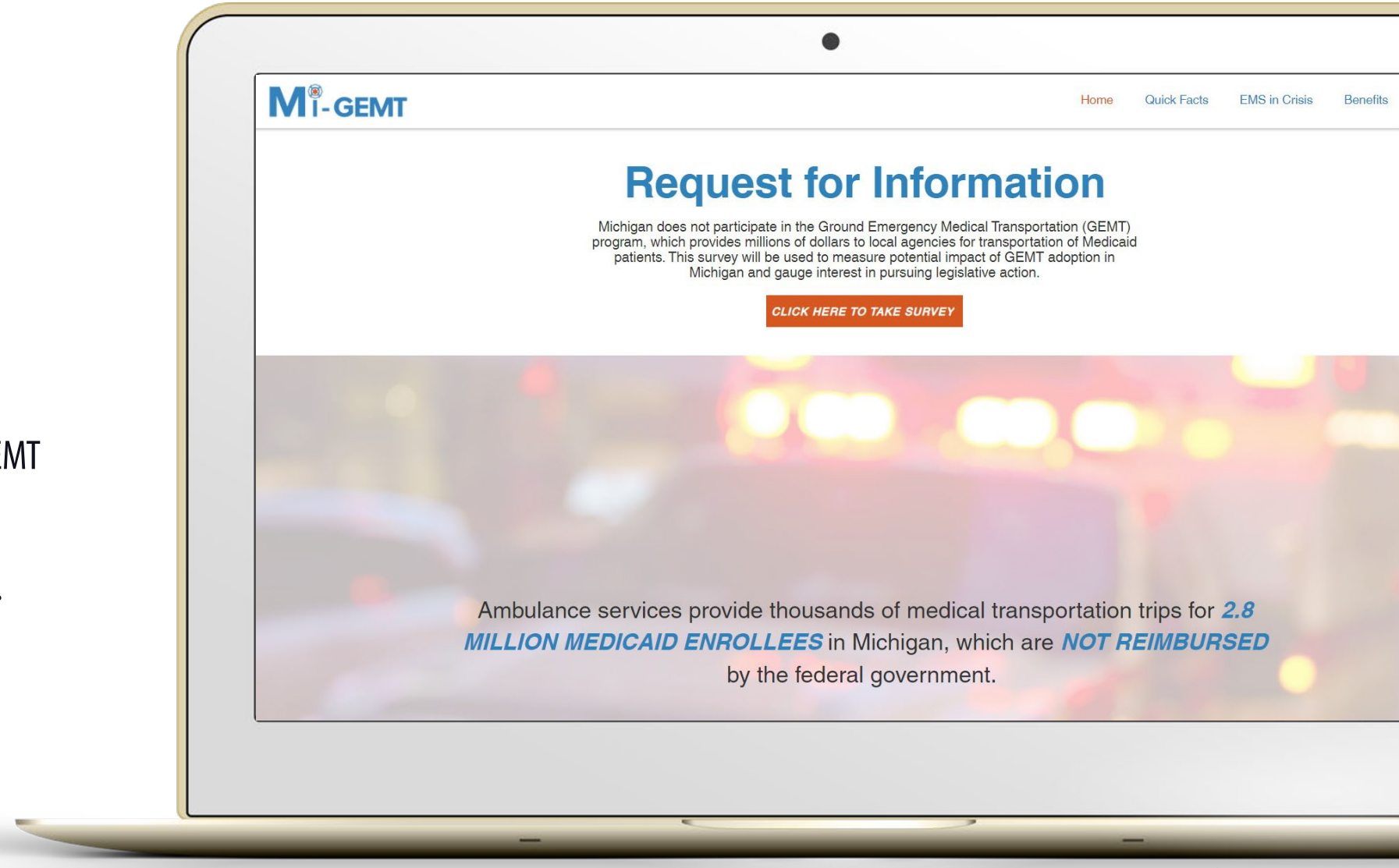
Chief Kevin Edmond
City of Sterling Heights Fire Department

- Used Illinois' GEMT Program as the Fire Chief of Collinsville Fire Department.
- Led development of the City's cost reporting approach.
- Key advocate for implementing GEMT in the State of Michigan.

Next Steps

Take our Survey

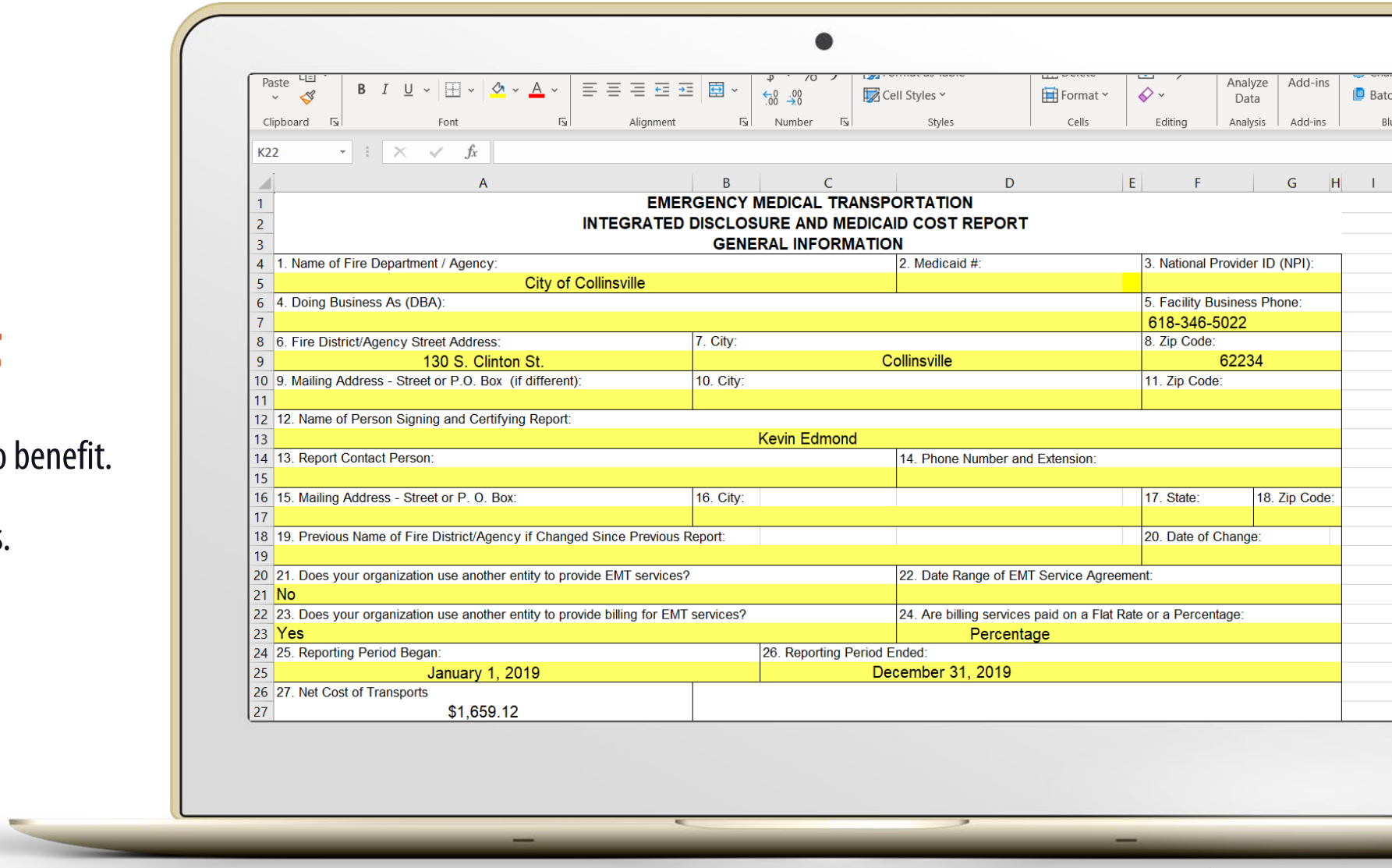
- Determine agency benefit from the GEMT program.
- Help us determine aggregate benefits.
- Enlist more advocates for GEMT.



Next Steps

Complete a Cost Report

- Know how much your agency stands to benefit.
- Help demonstrate impact to legislators.
- Provide feedback on cost reporting.



EMERGENCY MEDICAL TRANSPORTATION
INTEGRATED DISCLOSURE AND MEDICAID COST REPORT
GENERAL INFORMATION

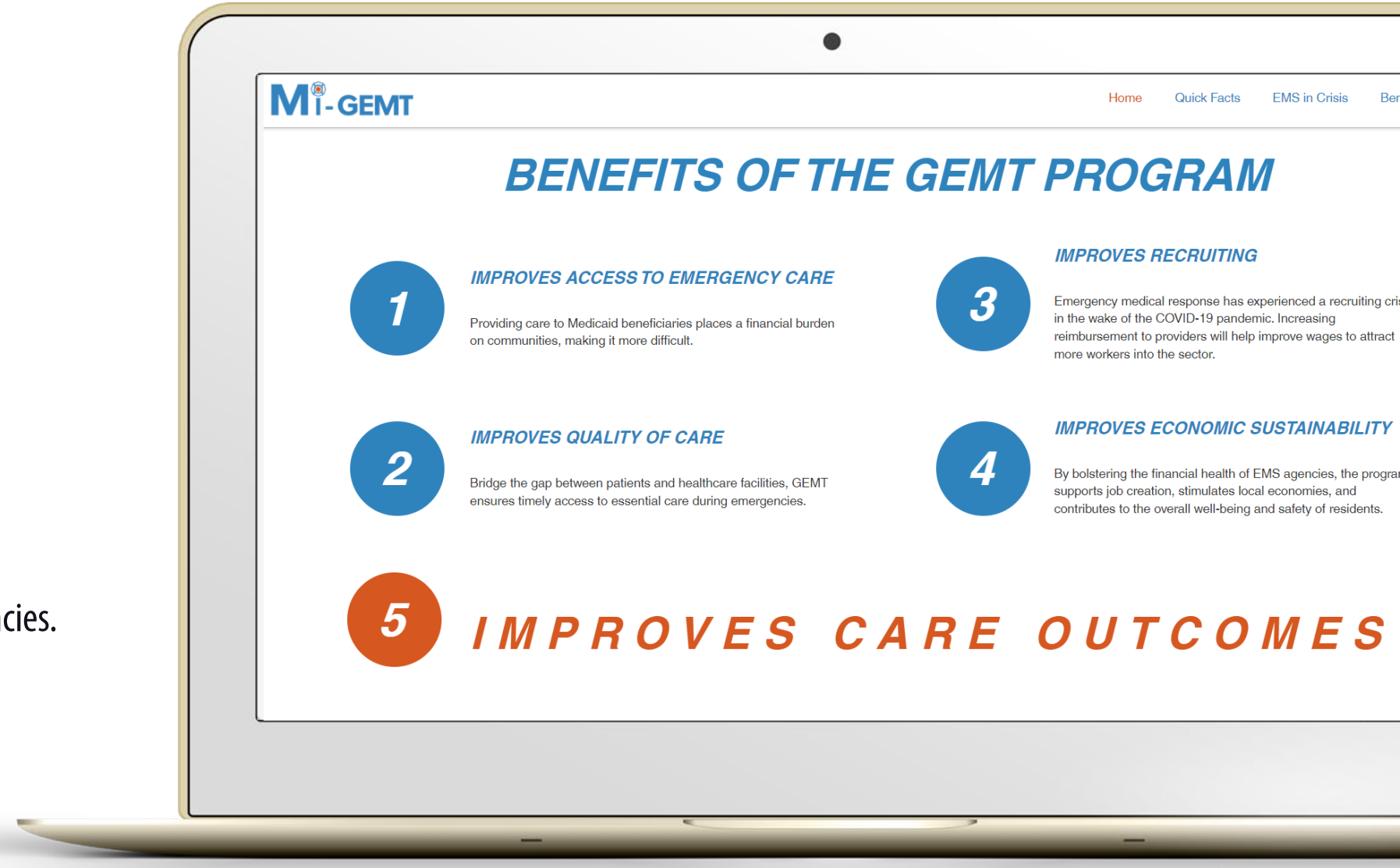
1. Name of Fire Department / Agency: City of Collinsville	2. Medicaid #:	3. National Provider ID (NPI):
4. Doing Business As (DBA):		5. Facility Business Phone: 618-346-5022
6. Fire District/Agency Street Address: 130 S. Clinton St.	7. City: Collinsville	8. Zip Code: 62234
9. Mailing Address - Street or P.O. Box (if different):	10. City:	11. Zip Code:
12. Name of Person Signing and Certifying Report: Kevin Edmond		
13. Report Contact Person:	14. Phone Number and Extension:	
15. Mailing Address - Street or P. O. Box:	16. City:	17. State: / 18. Zip Code:
19. Previous Name of Fire District/Agency if Changed Since Previous Report:		20. Date of Change:
21. Does your organization use another entity to provide EMT services? No	22. Date Range of EMT Service Agreement:	
23. Does your organization use another entity to provide billing for EMT services? Yes	24. Are billing services paid on a Flat Rate or a Percentage: Percentage	
25. Reporting Period Began: January 1, 2019	26. Reporting Period Ended: December 31, 2019	
27. Net Cost of Transports $1,659.12		

MI-GEMT

Next Steps

Be an Advocate

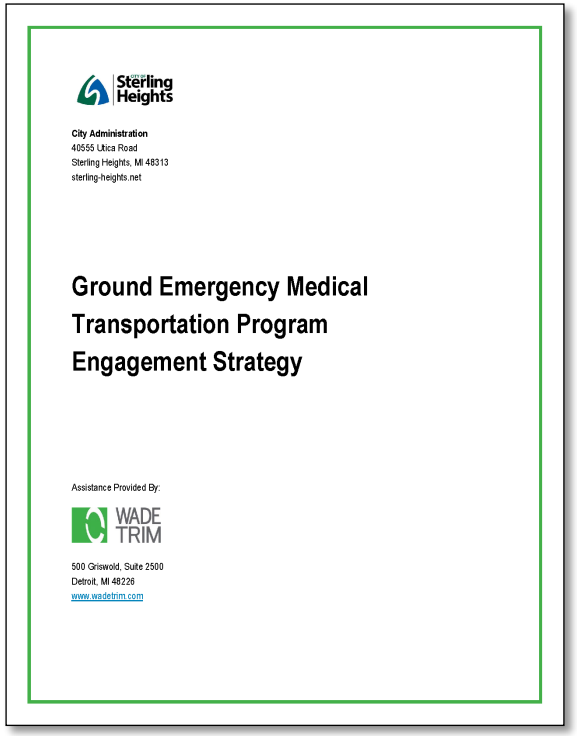
- Talk to your legislator!
- Pass a resolution of support
- Help us spread the word to other agencies.
- Participate in one of our committees.



How Will We Help?

Advocacy Resources

- Messaging and Information Support
- Case Support
- Draft Legislation



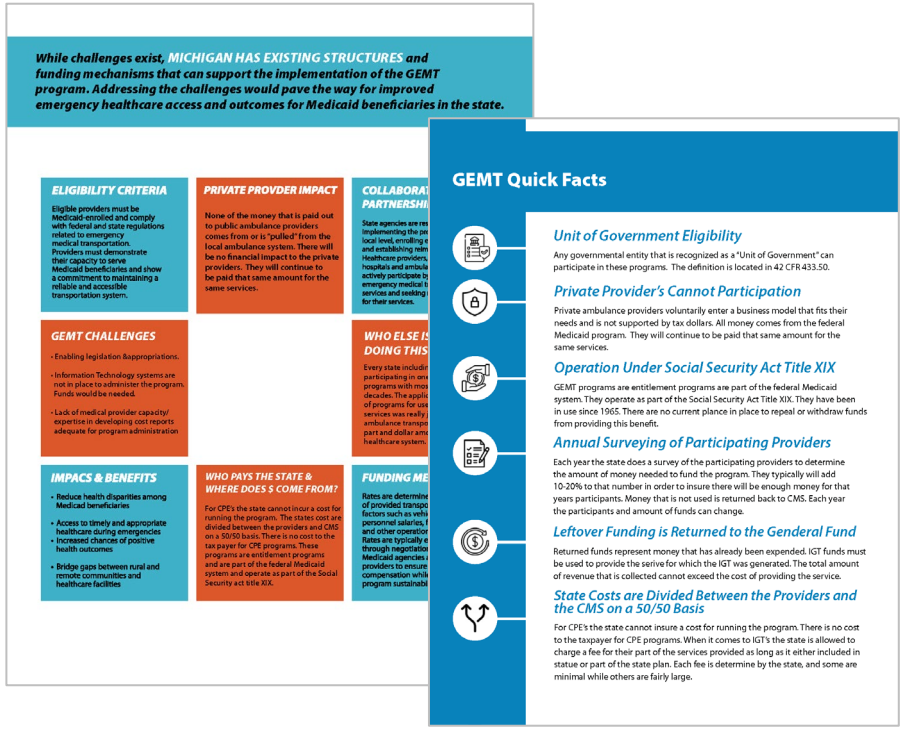
City Administration
40555 Utica Road
Sterling Heights, MI 48313
sterling-heights.net

Ground Emergency Medical Transportation Program Engagement Strategy

Assistance Provided By:

WADE TRIM

500 Griswold, Suite 2500
Detroit, MI 48226
www.wadetrim.com



While challenges exist, MICHIGAN HAS EXISTING STRUCTURES and funding mechanisms that can support the implementation of the GEMT program. Addressing the challenges would pave the way for improved emergency healthcare access and outcomes for Medicaid beneficiaries in the state.

ELIGIBILITY CRITERIA

Eligible providers must be Medicaid-enrolled and comply with federal and state regulations related to emergency medical transportation. Providers must demonstrate their capacity to serve Medicaid beneficiaries and show a commitment to maintaining a reliable and accessible transportation system.

PRIVATE PROVDER IMPACT

None of the money that is paid out to public ambulance providers comes from or is "pulled" from the local ambulance system. There will be no financial impact to the private providers. They will continue to be paid that same amount for the same services.

GEMT CHALLENGES

- Enabling legislation &appropriations.
- Information Technology systems are not in place to administer the program. Funds would be needed.
- Lack of medical provider capacity/ expertise in developing cost reports adequate for program administration

IMPACS & BENEFITS

- Reduce health disparities among Medicaid beneficiaries
- Access to timely and appropriate healthcare during emergencies
- Increased chances of positive health outcomes
- Bridge gaps between rural and remote communities and healthcare facilities

WHO PAYS THE STATE & WHERE DOES $ COME FROM?

For CPE's the state cannot incur a cost for running the program. The states cost are divided between the providers and CMS on a 50/50 basis. There is no cost to the tax payer for CPE programs. These programs are entitlement programs and are part of the federal Medicaid system and operate as part of the Social Security act title XIX.

GEMT Quick Facts

Unit of Government Eligibility

Any governmental entity that is recognized as a "Unit of Government" can participate in these programs. The definition is located in 42 CFR 433.50.

Private Provider's Cannot Participation

Private ambulance providers voluntarily enter a business model that fits their needs and is not supported by tax dollars. All money comes from the federal Medicaid program. They will continue to be paid that same amount for the same services.

Operation Under Social Security Act Title XIX

GEMT programs are entitlement programs are part of the federal Medicaid system. They operate as part of the Social Security Act Title XIX. They have been in use since 1965. There are no current plance in place to repeal or withdraw funds from providing this benefit.

Annual Surveying of Participating Providers

Each year the state does a survey of the participating providers to determine the amount of money needed to fund the program. They typically will add 10-20% to that number in order to insure there will be enough money for that years participants. Money that is not used is returned back to CMS. Each year the participants and amount of funds can change.

Leftover Funding is Returned to the Genderal Fund

Returned funds represent money that has already been expended. IGT funds must be used to provide the serive for which the IGT was generated. The total amount of revenue that is collected cannot exceed the cost of providing the service.

State Costs are Divided Between the Providers and the CMS on a 50/50 Basis

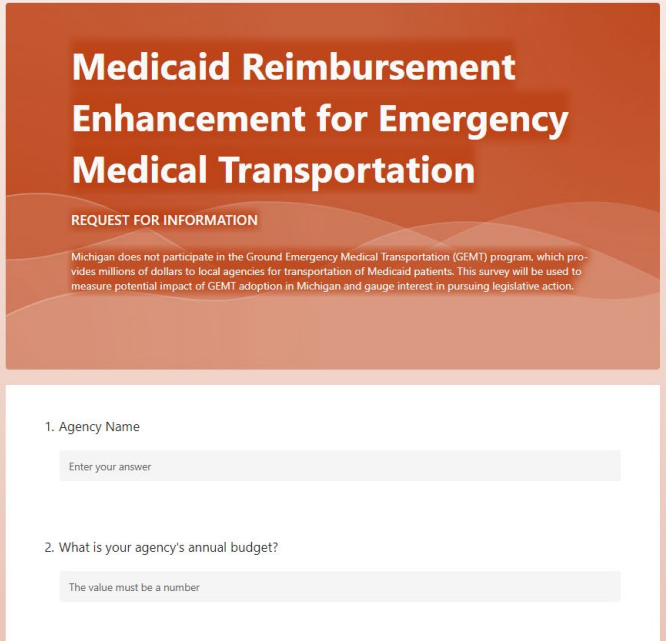
For CPE's the state cannot insure a cost for running the program. There is no cost to the taxpayer for CPE programs. When it comes to IGT's the state is allowed to charge a fee for their part of the services provided as long as it either included in statue or part of the state plan. Each fee is determine by the state, and some are minimal while others are fairly large.

Table 2 Comparison of State Legislation/Rules Governing GEMT

State	Defines Eligible Providers	Establishes Reimbursement Calculation	Prohibits Expenditure from State General Fund	Requires Local Cost Share Agreement with Administering Agency	Provider Fee	QAF/ CPE	IGT	Non-State Administrator	Excludes Private Providers
California	X	X	X	X			X	X	X
Washington	X	X	X	X			X		X
Iowa	X*	X*			X*				X*
Idaho	X	X	X						+
Oregon	X		X	X			X		+
Nebraska	X	X	X	X			X		X
Missouri	X			X			X	X	+
Oklahoma	X	X	X						+

**Not addressed in legislation but defined by administrative rule.*

+Private providers that are contracted by public providers are eligible for reimbursement.



Medicaid Reimbursement Enhancement for Emergency Medical Transportation

REQUEST FOR INFORMATION

Michigan does not participate in the Ground Emergency Medical Transportation (GEMT) program, which provides millions of dollars to local agencies for transportation of Medicaid patients. This survey will be used to measure potential impact of GEMT adoption in Michigan and gauge interest in pursuing legislative action.

1. Agency Name

Enter your answer

2. What is your agency's annual budget?

The value must be a number

Wayne Hofmann
MI-GEMT Coalition Manager

info@mi-gemt.com

mi-gemt.com

989.529.2913

MI-GEMT

MI-GEMT

Questions?

MICHIGAN ASSOCIATION OF FIRE CHIEFS

MICHIGAN TOWNSHIPS ASSOCIATION

michigan municipal league

CITY OF Sterling Heights
Innovating Living

City of Livonia

<u>Resolution of Support</u>
Implementation of the Ground Emergency Medical Transportation Program in Michigan

WHEREAS, the City of Livonia provides Ground Emergency Medical Transportation (GEMT) service for city residents, which includes many Medicaid beneficiaries; AND

WHEREAS, the GEMT program available through the United States Centers for Medicare & Medicaid Services provides reimbursement to public providers for service providers to Medicaid patients; AND

WHEREAS, the State of Michigan is not currently participating in the GEMT program, which is a voluntary enrollment program at both the state and local levels; AND

WHEREAS, implementation of the GEMT program in the State of Michigan may yield hundreds of thousands of federal reimbursement for the City of Livonia annually; AND

WHEREAS, the emergency services sector has struggled with workforce retention and recruiting in the wake of the COVID-19 pandemic, and the GEMT program will help Michigan public agencies, including the City of Livonia, retain and hire employees; AND

WHEREAS, the GEMT program has shown to expand access, quality, and sustainability of emergency services for Medicaid recipients for public providers; AND

WHEREAS, the MI-GEMT coalition is advocating for the passage of legislation directing the Michigan Department of Health and Human Services to enroll in the GEMT program; AND

WHEREAS, the MI-GEMT coalition includes the Michigan Association of Fire Chiefs, Michigan Municipal League, Michigan Townships Association; AND

NOW THERFORE BE IT RESOLVED THAT, the Livonia City Council hereby conveys its support for efforts of the MI-GEMT coalition; and,

BE IT FURTHER RESOLVED THAT, the City of Livonia urges the Michigan State Legislation to adopt legislation directing the Michigan Department of Health and Human Services to enroll in the GEMT program through the Centers for Medicare and Medicaid Services State Plan Amendment process.

AYES:
NAYES:
ABSENT:

MOTION APPROVED:

HOUSE BILL NO. 5695

April 30, 2024, Introduced by Reps. McFall, Tsernoglou, Harris, Mentzer, MacDonell, Andrews, Jaime Greene, Price, Arbit, Steckloff, Liberati, Wilson, Snyder, Haadsma, Paiz, Shannon, Grant, Coffia, Breen, Hope, Brixie, Tyrone Carter, Dievendorf, McKinney, Glanville, Conlin, Martus, Weiss, Young, Byrnes, Brenda Carter and Hoskins and referred to the Committee on Insurance and Financial Services.

A bill to amend 1939 PA 280, entitled

"The social welfare act,"

(MCL 400.1 to 400.119b) by adding section 109p.

THE PEOPLE OF THE STATE OF MICHIGAN ENACT:

Sec. 109p. (1) No later than 180 days after the effective date of the amendatory act that added this section, the department shall apply to the United States Department of Health and Human Services for an amendment to this state's Medicaid state plan to establish and administer a program to provide supplemental reimbursement to

eligible ground emergency medical transportation providers that provide ground emergency medical transportation services to medical assistance recipients.

(2) The department shall promptly seek any necessary federal approvals for the implementation of subsection (1). The department may limit the program described under subsection (1) to those costs that are allowable expenditures under title XIX of the social security act, 42 USC 1396 to 1396w-7. The department shall do both of the following:

(a) Submit claims for federal financial participation for the expenditures for services that are allowable expenditures under federal law.

(b) Submit necessary materials to the federal government to provide assurances that claims for federal financial participation will include only those expenditures that are allowable under federal law. The department may utilize intergovernmental transfers or certified public expenditures to implement this subdivision.

(3) A ground emergency medical transportation provider is eligible for supplemental reimbursement if the ground emergency medical transportation provider meets all of the following conditions during the period reimbursement is being claimed:

(a) Provides ground emergency medical transportation services to medical assistance recipients.

(b) Is enrolled as a Medicaid provider for the period reimbursement is being claimed.

(c) Is owned or operated by an eligible governmental entity.

(4) A supplemental reimbursement claimed under this section must be calculated and paid as follows:

(a) Except as otherwise provided in subdivision (b), the

supplemental reimbursement to an eligible provider is equal to the amount of federal financial participation received for the eligible provider's cost for the emergency medical transportation services under subdivision (c).

(b) The amount certified, when combined with the amount received from all other sources of reimbursement from the medical assistance program, must not exceed or be less than 100% of actual cost incurred, as determined under this state's Medicaid state plan for ground emergency medical transportation services.

(c) The supplemental reimbursement must be distributed exclusively to eligible providers under a payment methodology that is based on ground emergency medical transportation services provided to medical assistance recipients by eligible providers.

(5) An eligible provider shall make readily available to the department documentation, data, and certification, as prescribed by the department, that are necessary to establish that the emergency medical services expenditures qualify for federal financial participation in order to calculate the amount of supplemental reimbursement that is due.

(6) The department shall pay supplemental reimbursements to eligible providers for services provided on a fee-for-services basis and managed care program recipients in this state's Medicaid state plan.

(7) The department shall establish the uniform percentage of the eligible provider's net patient revenues so that the total amount of fees collected from an eligible provider in a fiscal year is an amount that is not less than 1/4 of 1% lower than the maximum limit for a provider's fee under 42 CFR 433.68(f) but does not exceed the maximum limit.

(8) Participation in the program described under subsection (1) is voluntary.

(9) As used in this section:

(a) "Eligible governmental entity" includes this state, a city, a county, a fire authority, a federally recognized Indian tribe, or a local unit of government.

(b) "Eligible ground emergency medical transportation provider" or "eligible provider" means a public provider that provides ground emergency medical transportation services to medical assistance recipients and meets the conditions described under subsection (3).

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

8. REQUEST TO EXECUTE THE 2024 AGREEMENT BETWEEN THE CITY OF LIVONIA AND SMART: Livonia Housing Commission, re: to allow the Livonia Community Transit Program to receive the Municipal and Community Credits in the amount of $89,424.

   Felicia Cross, Community Transit Program Supervisor, presented the request to Council.

   Councilmember Budzinski offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

8.

Housing
May 10, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Felicia Cross, Program Supervisor

AGENDA ITEM

REQUEST TO EXECUTE THE 2024 AGREEMENT BETWEEN THE CITY OF LIVONIA AND SMART: Livonia Housing Commission, re: to allow the Livonia Community Transit Program to receive the Municipal and Community Credits in the amount of $89,424.

BACKGROUND DETAILS

The Livonia Community Transit program has received Municipal Credit from the Suburban Mobility Authority for Regional Transportation (SMART) in the amount of $89,424. This resource will be used to support the operating needs of Livonia Community Transit program.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Authorize the Mayor and City Clerk to execute the funding agreement between the City of Livonia and the Suburban Mobility Authority for Regional Transportation (SMART) for FY 2024 so that the Livonia Community Transit program can receive Municipal Credits and to do all the things necessary or incidental to the full performance of this resolution.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Municipal Credit Contract for FY 2024

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

$89,424 for fiscal year July 1, 2023 through June 30, 2024

DETAILED WORK BEING PERFORMED

The Livonia Community Transit program would like approval to enter into a third-party contract with the Suburban Mobility Authority for Reginal Transportation (SMART) to receive operating assistance funding in the amount of $89,424.

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

Funds to be deposited to Community Transit account 288.000.582.000

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact

person, full address)

These funds support the efforts of the Livonia Community Transit program.

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Bid process not necessary

ATTACHMENTS

1. 2024 Municipal Credit Contract

APPROVED BY

Jim Inglis, Director of Housing — Date: May 13, 2024

Debra Peck Lichtenberg, CPA, Finance Director — Date: May 16, 2024

Mike Fisher, Chief Assistant City Attorney — Date: May 24, 2024

Maureen Miller Brosnan, Mayor — Date: May 24, 2024

MUNICIPAL CREDIT and COMMUNITY CREDIT CONTRACT FOR FY2024

I, Maureen Brosnan, as the Mayor of **the City of Livonia** (hereinafter, the "Community") hereby apply to SMART and agree to the terms and conditions herein, for the receipt and expenditure of **Municipal Credits** available for the period July 1, 2023 through June 30, 2024 (Section 1 below), and **Community Credits** available for the period July 1, 2023 to June 30, 2024 (Section 2 below); and further agree that the **Municipal and Community Credits Master Agreement** between the parties is incorporated herein by reference. A description of the service the Community shall provide hereunder is set forth in **Exhibit A**, and the operating budget for that service is set forth in **Exhibit B**, both of which are attached hereto and incorporated herein.

1. The Community agrees to use **$89,424** in **Municipal Credit** funds as follows:

(a) Transfer to _____ Funding of: $ **89,424.00**

TRANSFEREE COMMUNITY

(b) Van/Bus Operations At the cost of: $ _____

(Including Charter and Taxi services)

(c) Services Purchased from SMART At the cost of: $ _____

(Including Tickets, Shuttle Services/Dial-a-Ride)

(d) Services Purchased from Subcontractor At the cost of: $ _____

_____

(NAME OF SUBCONTRACTOR)

(See attached Subcontractor Service Agreement)

Total $89,424

SMART intends to provide Municipal Credit funds under this contract to the extent funds for the program are made available to it by the Michigan Legislature pursuant to Michigan Public Act 51 of 1951. Municipal Credit funds made available to SMART through legislative appropriation are based on the State's approved budget. In the event that revenue actually received is insufficient to support the Legislature's appropriation, it will result in an equivalent reduction in funding provided to the Community pursuant to this Contract. In such event, SMART reserves the right, without notice, to reduce the payment of Municipal Credit funds by the amount of any reduction by the legislature

to SMART. All Municipal Credit funding must be spent by June 30, 2026; all funds not spent by that date will revert back to SMART pursuant to Michigan Public Act 51 of 1951, for expenditure consistent with Michigan law and SMART policy.

2. The Community agrees to use **$0** in **Community Credit** funds available as follows:

(a) Transfer to _____ Funding of: $ _____

TRANSFEREE COMMUNITY

(b) Van/Bus Operations At the cost of: $ _____

(Including Charter and Taxi services)

(c) Services Purchased from SMART At the cost of: $ _____

(Including Tickets, Shuttle Services/Dial-a-Ride)

(d) Capital Purchases At the cost of: $ _____

(e) Services Purchased from Subcontractor At the cost of: $ _____

_____

(NAME OF SUBCONTRACTOR)

(See attached Subcontractor Service Agreement)

Total $0

To the extent that this Contract calls for a payment of funds directly from SMART to a subcontractor, Community hereby acknowledges that it is the party entitled to receive such funds and is affirmatively authorizing and directing SMART to pay such funds directly to the subcontractor on its behalf. Capital purchases permitted with Community Credits are subject to applicable state and federal regulations, and SMART policy, including procurement guidelines. When advantageous, SMART may make procurements directly. Reimbursement for purchases made by Community requires submission of proper documentation to support the purchase (i.e. purchase orders, receiving reports, invoices, etc.). Community Credit dollars available in FY 2024, may be required to serve local employer transportation needs per the coordination requirements set forth in the aforementioned Master Agreement. All Community Credit funds must be spent by June 30, 2027; any funds not spent by that date may revert back to SMART for expenditure consistent with SMART policy.

The Parties acknowledge and agree that this Agreement may be executed by electronic signature, which shall be considered as an original signature for all purposes and shall have the same force and effect as an original signature. The Parties agree that the electronic signatures appearing on this Agreement are the same as handwritten signatures for the purposes of validity, enforceability and admissibility. Without limitation, "electronic signature" shall include faxed versions of an original signature or electronically scanned and transmitted versions (e.g., via pdf) of an original signature.

This Agreement shall be binding once signed by both parties.

SUBURBAN MOBILITY AUTHORITY FOR REGIONAL TRANSPORTATION	**CITY OF LIVONIA**
Signature	Signature
Printed Name	Maureen Miller Brosnan Printed Name
Title	Mayor Title
Date	Date
Signature	Signature
Susan Nash Printed Name	Debra Lichtenberg Printed Name
City Clerk Title	Director of Finance Title
Date	Date

EXHIBIT A

PROJECT DESCRIPTION

Overall Project Description (Provide a descriptive narrative): Livonia Community Transit (LCT) serves senior and disabled residents of Livonia by providing transportation between any two points within the city of Livonia. Reservations are strongly recommended. Riders must have the exact fare or a bus ticket. Vehicles are a combination of small buses and vans. In addition to our senior and disabled service, there is also shuttle service from SMART and D-DOT.

Service Area (Provide geographic boundaries): City of Livonia. Buses will go within one-mile outside the city limits for medical appointments only.

Service Times (Provide days and hours of service): Monday – Friday, 7:00 a.m. to 6:30 p.m.

Eligible User Groups (Users eligible to use the service): Residents of Livonia who are 60 years and older, and the disabled. The disabled must be at least 18 years of age.

Fare Structure: (Cost to use service) $2.00 per ride, $4.00 round trip

Service Mode (Describe the amount and type of vehicles available, and whether they are wheelchair lift-equipped): Vehicles are a combination of 13-passenger buses and 7-passenger vans. All vehicles are wheelchair equipped.

EXHIBIT B

PROJECT OPERATING BUDGET

Municipality: City of Livonia

Contract Period: July 1, 2023 through June 30, 2024

Account Number: 48140

OPERATING EXPENSES:

Administrative Fee: *(All employees other than drivers and dispatchers)* (10% max. of MC & CC funds)	121,942	incl audit & acct services
Driver Wages	386,200	
Fringe Benefits	36,772	both drivers & dispatchers
Gasoline & Lubricants	169,000	
Vehicle Insurance	60,000	
Parts, Maintenance Supplies	Incl w/gasoline & lub	
Mechanic Wages	Incl w/gasoline & lub	
Fringe Benefits	0	
Dispatch Wages	102,125	
Other (Specify)	5,354	ofc supl, uniforms, tools & supl, medical, training, custodial
Sub-Total (Operating Expenses)	881,393	

PURCHASED SERVICE:

Taxi Service	0
Charter Service	0
SMART Bus Tickets	0
SMART Shuttle Service	0
SMART Dial-A-Ride	0

Other (Specify) _____	0	
Sub-Total (Purchased Service)	0	

CAPITAL EQUIPMENT:

(Only list purchases to be made with Community Credits)

Computer Equipment		
Software	70,940	
Vehicle	98,005	
Maintenance Equipment		
Other (Specify)	0	
Sub-Total (Capital Equipment)	168,945	
	1,050,338	

TOTAL EXPENSES _____Operating Expenses, Purchased Service, and Capital Equipment:

EXHIBIT B, continued (Page 2)

REVENUES:

Municipal Credit Funds	89,424	
Community Credit Funds	0	
Specialized Services Funds	22,103	
General Funds	908,615	Local millage
Farebox Revenue	30,196	
In-Kind Service		
Special Fares (Contracted Service)		
Other (Specify)		
	1,050,338	

TOTAL REVENUE: _____

(Note: *TOTAL EXPENSES* must equal *TOTAL REVENUE*)

Suburban Mobility Authority for Regional Transportation

EEO COMPLIANCE REPORT A

COMMUNITY PARTNERSHIP FORM

Agency/Community Information		
Program Type: Community Partnership Program (CPP) ☒ Specialized Service ☒ New Freedom ☐ JARC ☐ 5310 ☒		
Name of Agency/Community: Livonia Community Transit		
Address: 15218 Farmington Road		
City: Livonia	State: Michigan	Zip: 48154
Agency/Community Data		
1) Has your agency/community completed in excess of $1,000,000 in DOT federally-funded contracts from SMART in the past year?		Yes ☐ No ☒
2) Does your agency/community employ over fifty (50) transit related employees?		Yes ☐ No ☒
If the answers to the previous two questions were both "Yes", Please forward your agency's/community's Affirmative Action plan to the address below: Buhl Building 535 Griswold Street, Suite 600 Detroit, MI 48226 Attn: EEO Coordinator		
Have all subcontractors been informed of their responsibility to file an EEO Compliance Report A form? Yes☐No☐N/A ☒		
Drug and Alcohol Testing Program Requirements		
Does your agency/community have a DOT Drug and Alcohol testing program for Safety-sensitive employees? (Vehicle operators, dispatchers, mechanics and armed security)		Yes ☒ No ☐
Name of drug and alcohol testing manager? Doug Moore		Title:
Phone Number: (734) 466-2617	Ext:	Email: dm@livonia.gov
Please Proceed to Employment Data Section on Back		

Suburban Mobility Authority for Regional Transportation

EEO COMPLIANCE REPORT A

COMMUNITY PARTNERSHIP FORM

Employment Data

Report **ONLY** employees directly involved in the operation of your non-emergency transportation program. Including permanent, temporary, or part-time employees. Enter the appropriate figures in the spaces below relating to each employee's race and gender.

Job Classification	Total				Race													
							Minority											
					White		African American		Hispanic		Asian		Pacific Islander		American Indian		Multi Race	
	Employees	Male	Female	Minority	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female
Officials/Managers	1		1	1														
Professionals																		
Technicians																		
Office and Clerical Staff	3		3		3													
Craftsmen (Skilled)																		
Operators (Semi-Skilled)	15		2	13	2		1											
Laborers (Unskilled)																		
Service Workers																		
Journey Workers																		
Apprentices																		
Total	19																	

Certification

How was this information obtained? Visual Survey: Yes ☐ No ☐ Employment Records: Yes ☐ No ☐

Name of Authorizing Official (Print): Felicia Cross Title: Program Supervisor

Signature: Date:

Contact person for report: Felicia Cross Title: Program Supervisor

Telephone: 734-466-2537 Ext: Email: fcross@livonia.gov

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

9. REQUEST TO APPROVE SPECIALIZED SERVICES OPERATING ASSISTANCE PROGRAM THIRD PARTY CONTRACT FOR THE PERIOD OF OCTOBER 1, 2023, THROUGH SEPTEMBER 30, 2024, BETWEEN THE CITY OF LIVONIA AND SMART: Livonia Housing Commission, re: with grant funds to be used for the Livonia Community Transit Program to provide lift-equipped transportation to the senior and disabled residents of the City.

   Felicia Cross, Community Transit Program Supervisor, presented the request to Council.

   Councilmember Budzinski asked for an update on the Transit program.

   Ms. Cross said there has been an increase in ridership but hasn't been any increase in drivers.

   Councilmember Budzinski offered an approving motion for the Consent Agenda.

   DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

9.

Housing
May 10, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Felicia Cross, Program Supervisor

AGENDA ITEM

REQUEST TO APPROVE SPECIALIZED SERVICES OPERATING ASSISTANCE PROGRAM THIRD PARTY CONTRACT FOR THE PERIOD OF OCTOBER 1, 2023, THROUGH SEPTEMBER 30, 2024, BETWEEN THE CITY OF LIVONIA AND SMART: Livonia Housing Commission, re: with grant funds to be used for the Livonia Community Transit Program to provide lift-equipped transportation to the senior and disabled residents of the City.

BACKGROUND DETAILS

Request to approve Specialized Services Operating Assistance Program Third Party Contract FY 2024

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

We ask the Council to approve the attached contract with SMART and authorize these funds to be used for the Livonia Community Transit program which provides lift-equipped transportation services to Livonia's senior and disabled residents.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Specialized Services Operating Assistance Program Third-Party Contract FY 2024

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

Contract Amount: $33,386
For FY October 1, 2023 to September 30, 2024

DETAILED WORK BEING PERFORMED

Award of this agreement will help fund Livonia Community Transit's transportation services for seniors and the disabled.

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

$33,386 to be deposited in account no. 288-000-582-000

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact

person, full address)

Bids not necessary

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Bids not necessary

ATTACHMENTS

1. 2024 Specialized Services Contract

APPROVED BY

Jim Inglis, Director of Housing — Date: May 13, 2024

Debra Peck Lichtenberg, CPA, Finance Director — Date: May 16, 2024

Mike Fisher, Chief Assistant City Attorney — Date: May 16, 2024

Maureen Miller Brosnan, Mayor — Date: May 16, 2024

SPECIALIZED SERVICES OPERATING ASSISTANCE PROGRAM
THIRD-PARTY CONTRACT- FY 2024

THIS AGREEMENT ("Agreement" or "Contract") is made and entered between the Suburban Mobility Authority for Regional Transportation (hereinafter referred to as "**AUTHORITY"**), whose address is 535 Griswold Suite 600, Detroit, Michigan 48226, and City of Livonia (hereinafter referred to as "**SUBRECIPIENT"**), whose address is _____.

SECTION 1. - DEFINITIONS

PROGRAM	Means the Michigan Specialized Services Operating Assistance Program designed primarily for seniors and persons with disabilities as defined under Section 10e(4)(c)(i) of Act 51, of the Public Acts of 1951, as amended; MCL 247.660e(4)(c)(i).
DEPARTMENT	Means the Michigan Department of Transportation.
BUREAU	Means the Bureau of Urban and Public Transportation of the Michigan Department of Transportation.
AUTHORITY	Means the Suburban Mobility Authority for Regional Transportation (SMART).
PROJECT	Means the providing of SPECIALIZED SERVICES.
SPECIALIZED SERVICES	Means public transportation services primarily designed for persons with disabilities or who are sixty-five (65) years of age or older.
STATE	Means the State of Michigan.
SUBRECIPIENT	Means City of Livonia which will provide the transit services with funds received under this Contract.
APPLICATION	Means the AUTHORITY's application, submitted in cooperation with the SUBRECIPIENT, for funding from this PROGRAM for the period from October 1, 2023, to September 30, 2024.

SECTION 2. - PURPOSE

The purpose of this Contract is to pass through operating assistance funding received from the DEPARTMENT PROGRAM, to the SUBRECIPIENT. The transit services provided shall be as described in the APPLICATION submitted by the SUBRECIPIENT through the AUTHORITY and approved for funding by the DEPARTMENT.

SECTION 3. - FUNDING

The AUTHORITY is only obligated to provide funds under this Contract to the extent that funds for the PROGRAM are made available to it and approved by the DEPARTMENT as outlined in the Contract Authorization provided to us by the DEPARTMENT.

The SUBRECIPIENT is eligible for contract costs in the amount of $33,386

The maximum amount of the AUTHORITY funds to be given the SUBRECIPIENT shall not be increased without a prior written amendment to this Contract. DEPARTMENT funds made available to the AUTHORITY, through legislative appropriation, are based on projected revenue estimates. In the event that revenue actually received is insufficient to support the appropriation, it may necessitate a reduction in the maximum amount of said funds available to the SUBRECIPIENT. In such event, the AUTHORITY reserves the right, without notice, to reduce the maximum obligation of funds for the SUBRECIPIENT by the amount of any reduction by the DEPARTMENT to the AUTHORITY.

SECTION 4. - BUDGET ADJUSTMENTS

Budget adjustments must be requested in writing by the SUBRECIPIENT. Upon receipt of the request, the AUTHORITY shall have thirty-five (35) business days to provide written approval or disapproval of the budget adjustment. If no action is taken within thirty-five (35) working days, the budget adjustment shall be deemed approved. Expenditure of funds in excess of any line-item will not be considered an eligible PROJECT cost. The addition of any new line-item, or any line-item changes which represent a deviation from the PROJECT as described in the APPLICATION, shall require a prior written amendment to this Contract.

SECTION 5. - PROJECT COSTS AND REVENUES

The SUBRECIPIENT shall complete and submit to the AUTHORITY the information required by the DEPARTMENT, on the quarterly reporting form (available online at SMARTbus.org), within ten (10) days after the end of each state of Michigan fiscal year quarter. Failure to provide the quarterly report within thirty (30) days after the end of each state of Michigan fiscal year quarter, may result in a loss of a portion of or all funding. The AUTHORITY reserves the right to withhold payment of PROJECT funds if the SUBRECIPIENT fails to file reports as required in this paragraph.

If the SUBRECIPIENT also receives funding under 1951 P.A. 51, Section 10e(4)(a); MCL 247.660e(4)(a), as amended as its cost allocation plans must be submitted to the BUREAU for

approval. Any PROJECT costs in excess of revenues reported on the quarterly reporting form will **not** be eligible under any other state and federal program administered by the AUTHORITY or the DEPARTMENT.

Section 6. - BILLING, PAYMENTS AND QUARTERLY REPORTS

Notwithstanding the provisions set-forth in Section 3 of this Contract, the AUTHORITY shall provide to the SUBRECIPIENT the STATE funds designated for the eligible project costs incurred in performance of this Contract within ten (10) business days of the receipt of said funds from the DEPARTMENT.

The AUTHORITY may appropriately reduce payments if written reports submitted by the SUBRECIPIENT as required under this section indicate that the level of service described in the APPLICATION has been reduced.

Actual reimbursement shall be based on a rate per mile, or one-way passenger trips of SPECIALIZED SERVICES up to the maximum amount provided for herein.

The actual reimbursement method selected by the SUBRECIPIENT is $5.08 per passenger but subject to change.

Should the per-mile rate method be selected by SUBRECIPIENT, actual reimbursement may be subject to change, per DEPARTMENT and/or BUREAU reimbursement rate modifications

SECTION 7. - TERMINATION OR SUSPENSION

For any violation of this Contract or legislative change, the AUTHORITY may, by thirty (30) days written notice, suspend any and all of the rights and obligations under this Contract until such time as the event or condition resulting in such suspension has ceased or been corrected, or the AUTHORITY may, by thirty (30) days written notice to the SUBRECIPIENT, terminate any and all of the rights and obligations under this Contract.

SECTION 8. - ACCOUNTING RECORDS, AUDITS, AND DOCUMENTATION

(a) Establishment and Maintenance of Accounting Records

The SUBRECIPIENT shall maintain books, records, documents, and other accounting records in accordance with generally accepted governmental accounting principles. Said records shall be sufficient to properly reflect all costs of whatever nature claimed to have been incurred or anticipated to be incurred in the performance of the identified PROJECT. To facilitate the administration of the PROJECT, separate records shall be established and maintained. The SUBRECIPIENT shall assure that the records to support the miles traveled and the passengers carried as reported pursuant to Section 6 of this Contract are established and maintained.

(b) Audit

The SUBRECIPIENT shall permit the AUTHORITY and/or the DEPARTMENT or the authorized representatives of the AUTHORITY to audit all data and records relating to the performance of this contract. The SUBRECIPIENT shall retain and allow access to, and require its contractors to retain and allow access to all data and records pertaining to the PROJECT for a period of not less than six (6) years after the final payment by the AUTHORITY pursuant to the Contract.

The period of access, examination, and retention of data and records which relate to litigation or the settlement, of claims arising out of the performance of this Contract, or costs of this Contract as to which exception has been taken by the AUTHORITY or the DEPARTMENT or the authorized representative of the AUTHORITY or the DEPARTMENT, shall continue until such litigation, claims, or exceptions have been disposed of.

(c) Costs Supported by Documentation

PROJECT costs shall be supported by properly executed canceled checks, invoices or vouchers evidencing the nature and propriety of the charges.

(d) Accuracy of Financial Documentation

If a third-party contract is required for rendering of the services herein, then the SUBRECIPIENT is responsible for the accuracy of the financial and non-financial data and reports submitted for reimbursement.

(e) Revenue Expense Guidelines

If the SUBRECIPIENT also receives funding under 1951 P.A. 51, Section 10e(4)(a); MCL 247.660e(4)(a), as amended, determination of PROJECT costs shall be in conformity with the criteria set forth in the DEPARTMENT'S Office of Passenger Transportation's "Local Public Transit Revenue and Expense Manual." All other providers of service shall use the "Specialized Services Manual" (effective October 1, 2015, and any subsequent revisions, amendments and replacements).

SECTION 9. - THIRD-PARTY CONTRACT PROCEDURE

The SUBRECIPIENT shall **not** enter into contracts with third parties for provision of services herein without prior written approval from the AUTHORITY; notice of potential third-party contracts shall be submitted to the AUTHORITY for approval in writing. Approval or denial of said third-party contract will be submitted, in writing, to SUBRECIPIENT by the AUTHORITY. The AUTHORITY shall approve any third-party contracts at its sole discretion.

Approval does not constitute an assumption of liability, a waiver or an estoppel to enforce any of the requirements of this Contract, nor shall any such approval by the AUTHORITY be construed as a warranty of the third-party's qualifications, professional standards, ability to perform the work being subcontracted, or financial integrity.

SECTION 10 - ACCESS

SUBRECIPIENT agrees to provide, and will require its contractors to provide, access by the AUTHORITY and/or the DEPARTMENT to all technical data, reports, documents and work in progress pertaining to the PROJECT. Copies of technical data and reports shall be provided by the SUBRECIPIENT or its contractors to the AUTHORITY upon request.

SECTION 11. - INDEMNIFICATION

Notwithstanding any other provision in this Agreement, SUBRECIPIENT shall indemnify, defend and save harmless AUTHORITY, its officers, agents, employees, and members of its Board of Directors from any and all claims, losses and damages, including costs and attorney fees, occurring or resulting from any act or omission the SUBRECIPIENT or its officers, agents, employees, subcontractors, successors or assigns arising out of and/or pursuant to this Agreement without regard to the negligence of the SUBRECIPIENT.

This Agreement is not intended to alter or increase SMART or SUBRECIPIENT's liability for tort claims, to other third-parties. Nor is this indemnity provision intended to be a third-party beneficiary contract, and therefore it confers no rights or third-party status on anyone other than the parties hereto.

SECTION 12. - ENTIRE AGREEMENT

This Contract, along with any exhibits, addendums, schedules, and amendments hereto, merges and concludes the entire agreement of SUBRECIPIENT and the AUTHORITY. Any previous communications, whether oral or written, are superseded through by this document. The SUBRECIPIENT and AUTHORITY acknowledge, by executing this document that said parties have not relied on any representation, assertion, guarantee, warranty, ancillary contract or other assurance, except those set out in this AGREEMENT. SUBRECIPIENT hereby waives all rights and remedies, at law or in equity, which may arise as the result of said party's reliance on such representation, assertion, guarantee, warranty, ancillary contract or other assurance, provided that no clause herein shall be construed as a restriction or limitation of said party's right to remedies associated with the gross negligence, willful misconduct or fraud of any person or party taking place prior to, or contemporaneously with, the execution of this Agreement.

SECTION 13. - PROHIBITED DISCRIMINATION

The SUBRECIPIENT shall not discriminate against any passenger because of race, color, sex, age, handicap, religion, ancestry, marital status, national origin, place of birth or sexual orientation in accordance with the State of Michigan provisions for "Prohibition of Discrimination in State Contracts", dated August of 1985, which is hereby incorporated by reference.

The SUBRECIPIENT shall not discriminate based upon race, color, creed, national origin, sex, age, disability, height, weight, familial status, marital status, or sexual orientation, in accordance with Civil Rights Act of 1964, being P.L. 88-352, 78 Stat. 241, as amended, being Title 42 U.S.C. Sections 1971, 1975a-1975d, and 2000a-2000h-6, Section 303 of the Age Discrimination Act of 1975, Section 202 of the Americans with Disabilities Act of 1990, 49 U.S.C. Section 5332, the Michigan Elliot-Larsen Civil Rights Act, MCLA 37.2101 et seq., and SMART policy.

The SUBRECIPIENT shall comply with FTA Circular C 9070.1G, as may be amended or updated, with respect to all provisions on Civil Rights and discrimination including, but not limited to, Chapter VIII, §9.

The SUBRECIPIENT shall require similar covenants on the part of any contractor or subcontractor employed in the performance of the PROJECT for which this Contract is made.

SECTION 14. - MBE/WBE

In accordance with 1980 P.A. 278, MCL 423.321 at seq; MCL 445.901 et seq, the SUBRECIPIENT, in the performance of this Agreement, shall not enter into a Contract with a subcontractor, manufacturer, or supplier listed in the register maintained by the STATE, Department of Labor, of employers who have been found in contempt of court by a federal court of appeals, on not less than three (3) occasions involving different violations during the preceding seven (7) years, for failure to correct an unfair labor practice, as prohibited by Section 8 of Chapter 372 of the National Labor Relations Act, 29 U.S.C. 158. The AUTHORITY may void this Contract if the name of the SUBRECIPIENT, or the name of a subcontractor, manufacturer, or supplier utilized by the SUBRECIPIENT in the performance of this Contract subsequently appears in the register during the performance period of this Contract.

SECTION 15. - MISCELLANELOUS PROVISIONS

(a) If any provision of this contact is held invalid, the remainder of this Contract shall not be affected, if any such remainder continues to conform to the provisions and requirements of applicable law.

(b) The SUBRECIPIENT shall commence, carry on, and complete the PROJECT in accordance with all applicable laws. Nothing in this Contract shall require the SUBRECIPIENT to observe, comply, or do any other thing in contravention of any STATE, Local or Federal law.

(c) The SUBRECIPIENT warrants that it has no interest and shall not acquire any interest, direct or indirect, which would conflict in any manner or degree with the performance of SPECIALIZED SERVICES required to be performed under this Contract. The SUBRECIPIENT further warrants that in the performance of this Contract, no person having any such interest shall be employed.

(d) None of the funds, materials, property, or services obtained by the AUTHORITY or the SUBRECIPIENT under this Contract shall be used for any partisan political activity, or to further the election or defeat of any political activity or candidate for public office.

(e) The SUBRECIPIENT shall not assign any interest in this Contract without the prior written approval of the AUTHORITY, however, that compensation due to the SUBRECIPIENT under this Contract may be assigned to a bank, trust company, or other financial institution without such approval. Notice of any such assignment shall be furnished promptly to the AUTHORITY in writing. Any such assignment does not relieve the SUBRECIPIENT of its obligations under this Contract.

(f) If the SUBRECIPIENT enters into any contracts with other governmental agencies for the purposes of providing SPECIALIZED SERVICES outside of its jurisdictional boundaries, as defined and provided by law, it shall immediately provide the BUREAU with a copy of any contracts and true copies of any resolutions passed by its governing board which relate to the providing of service under such contracts.

SECTION 16. - TERM OF CONTRACT

Upon execution, this Contract shall cover the period commencing October 1, 2023, and extending through September 30, 2024.

The SUBRECIPIENT agrees to notify the AUTHORITY of any event which may have significant potential impact on PROJECT progress, direction, control or cost.

SECTION 17. - EXECUTION

This Contract shall become binding on the parties hereto upon the execution thereof by the duly authorized official(s) for the SUBRECIPIENT and the AUTHORITY; and upon the adoption of a resolution approving said Contract and authorizing the signatures thereto of the respective official(s) of the SUBRECIPIENT, a certified copy of which resolution shall be attached to this Contract.

The Parties acknowledge and agree that this Agreement may be executed by electronic signature, which shall be considered as an original signature for all purposes and shall have the same force and effect as an original signature. The Parties agree that the electronic signatures appearing on this Agreement are the same as handwritten signatures for the purposes of validity, enforceability and admissibility. Without limitation, "electronic signature" shall include faxed versions of an original signature or electronically scanned and transmitted versions (e.g., via pdf) of an original signature.

THE PARTIES HEREBY ACKNOWLEDGE that they have read and understand this Agreement and that the signatories below have affixed their signatures and affirmed that they are authorized to execute this Agreement, for the purpose of binding their respective Parties.

SUBURBAN MOBILITY AUTHORITY FOR REGIONAL TRANSPORTATION

Signature

Printed Name

Title

Date

Signature

Susan Nash

Printed Name

City Clerk

Title

Date

INSERT

Signature

Maurine Miller Brosnan

Printed Name

Mayor

Title

Date

Signature

Debra Lichtenberg

Printed Name

Director of Finance

Title

Date

Suburban Mobility Authority for Regional Transportation

EEO COMPLIANCE REPORT A

COMMUNITY PARTNERSHIP FORM

Agency/Community Information		
Program Type: Community Partnership Program (CPP) ☐ Specialized Service ☐ New Freedom ☐ JARC ☐ 5310 ☐		
Name of Agency/Community:		
Address:		
City:	State:	Zip:
Agency/Community Data		
1) Has your agency/community completed in excess of $1,000,000 in DOT federally-funded contracts from SMART in the past year?		Yes ☐ No ☐
2) Does your agency/community employ over fifty (50) transit related employees?		Yes ☐ No ☐
If the answers to the previous two questions were both "Yes", Please forward your agency's/community's Affirmative Action plan to the address below: Buhl Building 535 Griswold Street, Suite 600 Detroit, MI 48226 Attn: EEO Coordinator		
Have all subcontractors been informed of their responsibility to file an EEO Compliance Report A form? Yes☐No☐N/A ☐		
Drug and Alcohol Testing Program Requirements		
Does your agency/community have a DOT Drug and Alcohol testing program for Safety-sensitive employees? (Vehicle operators, dispatchers, mechanics and armed security) Yes ☐ No ☐		
Name of drug and alcohol testing manager?		Title:
Phone Number:	Ext:	Email:
Please Proceed to Employment Data Section Below		

Suburban Mobility Authority for Regional Transportation

EEO COMPLIANCE REPORT A

COMMUNITY PARTNERSHIP FORM

Employment Data

Report **ONLY** employees directly involved in the operation of your non-emergency transportation program. Including permanent, temporary, or part-time employees. Enter the appropriate figures in the spaces below relating to each employee's race and gender.

Job Classification	Total				Race													
						Minority												
					White		African American		Hispanic		Asian		Pacific Islander		American Indian		Multi Race	
	Employees	Male	Female	Minority	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female
Officials/Managers																		
Professionals																		
Technicians																		
Office and Clerical Staff																		
Craftsmen (Skilled)																		
Operators (Semi-Skilled)																		
Laborers (Unskilled)																		
Service Workers																		
Journey Workers																		
Apprentices																		
Total																		

Certification

How was this information obtained? Visual Survey: Yes ☐ No ☐ Employment Records: Yes ☐ No ☐

Name of Authorizing Official (Print): Title:

Signature: Date:

Contact person for report: Title:

Telephone: Ext: Email:

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

10. REQUEST FOR AUTHORIZATION TO WAIVE THE SEALED BID PROCESS AND PURCHASE FROM SOLE SOURCE PROVIDER: Department of Public Works, re: for the purchase of stormwater, water main and sanitary manhole-related items in an amount not to exceed $150,000.00 annually, for the period of July 1, 2024, to June 30, 2025.

    Don Rohraff, Director of Public Works, presented the request to Council.

    Councilmember Donovic offered an approving motion for the Consent Agenda.

    DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

10.

DPW
May 15, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	

AGENDA ITEM

REQUEST FOR AUTHORIZATION TO WAIVE THE SEALED BID PROCESS AND PURCHASE FROM SOLE SOURCE PROVIDER: Department of Public Works, re: for the purchase of stormwater, water main and sanitary manhole-related items in an amount not to exceed $150,000.00 annually, for the period of July 1, 2024 to June 30, 2025.

BACKGROUND DETAILS

For many years, the Department of Public Works has made purchases from the above-referenced vendor. EJ USA, Inc. manufacturers and supplies fire hydrants, water main valves, sanitary and storm structure frames and covers (the manhole covers are cast at the foundry with the City logo and name). These items are manufactured in the State of Michigan and supplied solely by EJ USA, Inc.

We have checked the unit prices charged for these items and found them to be comparable with those paid by other municipalities. The quotation includes a 5% price increase on average over the previous quote. This pricing is the same across the board for all communities using comparable products. We note that the City would experience large up-front charges to go to another foundry and set up the City's complete casting specifications. In addition, there would be a large increase in the freight charges the City would encounter going to a new manufacturer located outside the State of Michigan on every order placed. EJ USA, Inc. has a distribution center located in Oak Park and has been very responsive in the past, meeting the City's needs.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

It is the request of the Department of Public Works that Council waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended, since no advantage to the City would result from competitive bidding in this situation. Further, authorize the Mayor and City Clerk to execute a one-year contract for and on behalf of the City of Livonia, with **EJ USA, Inc**., 13001 Northend Avenue, Oak Park, Michigan 48237, for the purchase of stormwater, water main and sanitary manhole related items, in an amount not to exceed $150,000.00 for the period of **July 1, 2024 through June 30, 2025**; FURTHER; the Council does hereby authorize an expenditure in an amount not to exceed $150,000.00 from funds already budgeted in Account Nos. 592-559-787-050 (Water Main Supply), 592-559-787-060 (Water Valves and Gate Wells), 592-559-787-070 (Hydrant Supply) and 592-559-796-000 (Sanitary Supply) for this purpose; FURTHER, the

Council does hereby authorize such action without competitive bidding for the reasons indicated in the aforesaid communication, and such action is taken in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Fire hydrants, water main valves, sanitary and storm structure frames and covers (the manhole covers are cast at the foundry with the City logo and name). Exact quantities vary from year-to-year, based on road projects, new subdivision builds, etc.

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

Contract pricing valid from July 1, 2024 to June 30, 2025

DETAILED WORK BEING PERFORMED

n/a

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

$150,000.00 from funds already budgeted in Account Nos. 592-559-787-050 (Water Main Supply), 592-559-787-060 (Water Valves and Gate Wells), 592-559-787-070 (Hydrant Supply) and 592-559-796-000 (Sanitary Supply)

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended since no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. EJ USA - 2024 Letter
2. EJ USA - Quote
3. EJ USA Pricing History 2024

APPROVED BY

Date: May 17, 2024

Don Rohraff, Director of Public Works

Date: May 22, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 22, 2024

Mike Fisher, Chief Assistant City Attorney

Date: May 22, 2024

Maureen Miller Brosnan, Mayor

EJ
301 Spring Street
PO Box 439
East Jordan, MI 49727-0439

+1 231 536 2261
800 874 4100
ejco.com

May 6, 2024

City of Livonia
Honorable Members of the Council
33000 Civic Center Drive
Livonia, MI 48150

Re: 2024-2025 Prices

Dear Council Members,

Please consider attached quote number 00676277 for your sole source supplier of castings, hydrants and valves beginning July 1, 2024 thru June 30, 2025.

As you may recall, in January 2012, East Jordan Iron Works, Inc., East Jordan, Michigan, and its affiliated global companies announced that all are now conducting business under the same name and brand, EJ. Company headquarters and ownership remain unchanged.

As we have since 1883, we will continue to provide the same quality products and excellent service that our customers have come to expect. One global identity reinforces the value that EJ provides by giving our customers immediate access to those who have the best knowledge and expertise in the industry.

EJ continues its commitment to working with the City of Livonia, in the manner that we have for numerous years. EJ has aided in the development of the current city specifications and custom logo covers and we remain committed to the City of Livonia in product and service.

We greatly value our relationship and appreciate your business. We look forward to working with you again to meet the challenges of the marketplace in 2024-2025.

Please feel free to contact me with questions, or any additional assistance you may need.

Regards,
EJ USA, INC.

Wesley Krum
Sales Representative

cc: Pat Pietsch, Branch Manager

Quotation

ejco.com
800 626 4653

Account Name	City of Livonia DPW	Quote Number	00676277
Ship to	WATER and SEWER FIELD OPERATION 12973 FARMINGTON ROAD, Livonia, MI, US, 48150	Quote Name	One Year Bid July 1 2024 - June 30 2025
Bill to	12973 Farmington Rd Off of Glendale, Livonia, MI, US, 48150	Created Date	5/2/2024
Full Name		Expiration Date	
Business Phone		Prepared by	Wesley Krum
Email		Email	wes.krum@ejco.com
Business Fax		Phone	2485462004
Close Date	5/2/2024	Fax	248-546-4612

Quantity	Product N°	Description	Notes	Line Charge	Sales Price (USD)	Total Price (USD)
1	INFO	-	Prices good for one year. 7-1-24 / 6-30-25		1.00	1.00
1	INFO	-	RW Valves		1.00	1.00
1	2200310	3" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			589.51	589.51
1	2200410	4" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			655.02	655.02
1	2200610	6" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			824.70	824.70
1	2200810	8" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			1327.89	1327.89
1	2201010	10" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			2070.83	2070.83
1	2201210	12" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			2620.06	2620.06
1	2201610	16" Resilient Wedge Gate Valve MJ 2" Operating Nut OR			8782.98	8782.98
1	INFO	-	RW Tapping Valves		1.00	1.00
1	2500410	4" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR			824.72	824.72
1	2500610	6" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR			1164.14	1164.14
1	2500810	8" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR			1728.34	1728.34

QUOTATION - EJ USA, Inc. Terms and Conditions apply, which are located at https://r.ejco.com/ustc. Material takeoff quantities not guaranteed. Price subject to change.

Quotation

ejco.com
800 626 4653

Quantity	Product N°	Description	Notes	Line Charge	Sales Price	Total Price
1	2501010	10" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR			2627.49	2627.49
1	2501210	12" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR			3930.08	3930.08
1	2501610	16" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR			10259.22	10259.22
1	INFO	-	Hydrants		1.00	1.00
1	54033D	5BR250 Hydrant 5'6" MJ 1 1/8" Pent Carroll 2DTP D Dome 2-1 3 3/4" Pumpers OL Red	Hydrant with a shoe		3153.07	3153.07
1	83401D	5BR250 DFD Conversion Hydrant 5'6" 1 1/8" Pent Carroll D Dome 2-1 3 3/4" Pumpers OL Red	DFD Spin In Hydrant		3761.03	3761.03
1	INFO	-	Valve Boxes and Parts for Valve Boxes		1.00	1.00
1	85604566	8560 Screw Type 3 Piece Valve Box Set D Box: #4 Base, 30B Bottom, 26T Top, Water Cover, Black Asphaltic Coated			279.91	279.91
1	85508009	8550 Screw Type Valve Box Extension Riser #69, 16-1/2" Tall for 2-1/2"-9" Height Adjustment, Black Asphaltic Coated			74.29	74.29
1	85508018	8550 Screw Type Valve Box Extension Riser 18A, 22-1/2" Tall for 2-1/2" - 15" Height Adjustment, Black Asphaltic Coated			85.85	85.85
1	85508024	8550 Screw Type Valve Box Extension Riser, 28-1/2" Tall for 2-1/2" - 21" Height Adjustment, Black Asphaltic Coated			90.80	90.80
1	85008010	8500H Solid Round Gray Iron 1" Valve Box Adjusting Riser for 5-1/4 Valve Boxes			28.63	28.63
		8500H Solid Round Gray Iron 1-1/2" Valve Box Adjusting Riser for 5-1/4"				

QUOTATION - EJ USA, Inc. Terms and Conditions apply, which are located at https://r.ejco.com/ustc. Material takeoff quantities not guaranteed. Price subject to change.

Quotation

ejco.com
800 626 4653

Quantity	Product N°	Description	Notes	Line Charge	Sales Price	Total Price
1	85008015	Valve Boxes, Cover 7-5/16" Dia x 2-1/16" Seat			34.67	34.67
1	85008020	8500H Solid Round Gray Iron 2" Valve Box Adjusting Riser for 5-1/4" Valve Boxes			39.19	39.19
1	85008030	8500H Solid Round Gray Iron 3" Valve Box Adjusting Riser for 5-1/4" Valve Boxes with Cover 7-5/16" Diameter x 2-1/16" Seat			49.74	49.74
1	85008040	8500H Solid Round Gray Iron 4" Valve Box Adjusting Riser for 5-1/4 Valve Boxes			60.29	60.29
1	85008060	8500H Solid Round Gray Iron 6" Valve Box Adjusting Riser for 5-1/4" Valve Boxes with Cover 7-5/16" Diameter x 2-1/16" Seat			79.89	79.89
1	INFO	-	DWS Seal Plates		1.00	1.00
1	INFO	-	3" Seal Plate		1.00	1.00
1	00942107	3D7 SEAL PLT			68.66	68.66
1	00942131	3D SEAL PLT GKT			3.40	3.40
1	00942139	O-RG I214 1/8 1			0.09	0.09
1	INFO	-	4" Seal Plate		1.00	1.00
1	00942230	4D7SEAL PLT BSHG ASY			360.63	360.63
1	00942231	4D SEAL PLT GKT			12.85	12.85
1	00946565	O-RG I-218 UL 1/8 1-1/4			3.63	3.63
1	INFO	-	6" Seal Plate		1.00	1.00
1	00942330	6D7SEAL PLT BSHG ASY			216.49	216.49
1	00942331	6D SEAL PLT GKT			7.37	7.37

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Quotation

ejco.com
800 626 4653

Quantity	Product N°	Description	Notes	Line Charge	Sales Price	Total Price
1	00944421	O-RG I-220 UL 1/8 1-3/8			4.09	4.09
1	INFO	-	8" Seal Plate		1.00	1.00
1	00942430	8D7SEAL PLT BSHG ASY			234.00	234.00
1	00942431	8D SEAL PLT GKT			11.04	11.04
1	00942538	O-RG I-222 UL 1/8,1-1/2			0.32	0.32
1	INFO	-	12" Seal Plate		1.00	1.00
1	00942630	12D7 SL PLT BSHG ASY			277.81	277.81
1	00942631	12D SEAL PLT GKT			4.25	4.25
1	00942639	O-RG I-225 1/8 1-7/8			2.55	2.55
1	INFO	-	16" Seal Plate		1.00	1.00
1	00942730	16D7 SL PLT BSHG ASY			412.13	412.13
1	00942731	16D SEAL PLT GKT			13.17	13.17
1	00942739	O-RG I-227 1/8 2-1/8			1.94	1.94
1	INFO	-	Castings		1.00	1.00
1	INFO	-	Manhole Risers		1.00	1.00
1	00100292	1000H Solid Round Gray Iron 1-1/2" Adjusting Riser for Cover with 23" Diameter x 1-1/4" Seat Thickness, Black Asphaltic Coated			187.03	187.03
1	00100293	1000H Solid Round Gray Iron 2" Adjusting Riser for Cover with 23" Diameter x 1-1/4" Seat Thickness, Black Asphaltic Coated			214.62	214.62
1	00100295	1000H Solid Gray Iron 2-1/2" Adjusting Riser for Cover 23" Diameter x 1-1/4" Seat Thickness, Black Coated			228.40	228.40

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Quotation

ejco.com
800 626 4653

Quantity	Product N°	Description	Notes	Line Charge	Sales Price	Total Price
1	00100296	1000H Solid Round Gray Iron 3" Adjusting Riser for Cover with 23" Diameter x 1-1/4" Seat Thickness, Black Asphaltic Coated			238.22	238.22
1	00100298	1000H Solid Round Gray Iron 4" Adjusting Riser for Cover with 23" Diameter x 1-1/4" Seat Thickness, Black Asphaltic Coated			350.47	350.47
1	00104298	1040H Solid Round Gray Iron 2" Adjusting Riser for Cover with 26" Diameter x 1-1/2" Seat Thickness, Black Asphaltic Coated			239.85	239.85
1	00103800	1040H Solid Round Gray Iron 3" Adjusting Riser for Cover with 26" Diameter x 1-1/2" Seat Thickness, Black Asphaltic Coated			252.36	252.36
1	INFO	-	Frames and Covers		1.00	1.00
1	00104010	1040Z 7" Tall Frame, Black Coated			315.90	315.90
1	00104258	1040C Vented 1 Hole Cover City of Livonia Logo Water, Black Coated			226.21	226.21
1	00104304	1040 7" Tall Bolted and Gasketed Watertight L1 Manhole Assembly City of Livonia Logo Sanitary, Black Coated			602.56	602.56
1	00104291	1040A Solid Cover City of Livonia Logo Sanitary, Black Coated			226.21	226.21
1	00101010	1010Z 7" Tall Frame, Black Asphaltic Coated			417.29	417.29
1	00100010	1000Z 7" Tall Frame, Black Coated			283.52	283.52
1	00100022	1000B Vented 20 Hole Cover, Black Asphaltic Coated			212.96	212.96
1	00100042	1000N Oval 2-5/8" Tall Beehive Style Grate, Dump no Waste! Drains to Waterways, Black Coated			200.78	200.78
1	00508010	5080Z 6-3/4" Tall Catch Basin Frame, Black Asphaltic Coated			314.33	314.33

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Quotation

ejco.com
800 626 4653

Quantity	Product N°	Description	Notes	Line Charge	Sales Price	Total Price
1	00500050	5000M1 Grate Dump No Waste! Drains to Waterways, Black Asphaltic Coated			172.39	172.39
1	001040074L01	ERGO 24 7" Tall Cam Locking Hinged Manhole Assembly City of Livonia Logo Sanitary Sewer, Black Asphaltic Coated			729.17	729.17
1	00104510	1045Z 7" Tall Frame, Black Coated			274.96	274.96
1	00104610	1046Z 4" Tall Frame, Black Asphaltic Coated			274.96	274.96
1	00104022	1040B Vented 16 Hole Cover, Black Asphaltic Coated			226.21	226.21
1	00104030	1040M1 Grate, Dump No Waste! Drains to Waterways, Black Coated			210.60	210.60
1	00104042	1040N 3-1/4" Tall Beehive Grate Dump No Waste! Drains to Waterways, Black Asphaltic Coated			220.35	220.35
1	00104045	1040 O2 6" Tall Beehive Grate, Black Coated			220.35	220.35
1	00500061B01	5000M4 6-3/4" Tall Bolted and Hinged Catch Basin Assembly with Round Base Flange Dump No Waste! Drains to Waterways			539.30	539.30

Subtotal	54170.76 USD
Grand Total	54170.76 USD

Notes and Comments

QUOTATION - EJ USA, Inc. Terms and Conditions apply, which are located at https://r.ejco.com/ustc. Material takeoff quantities not guaranteed. Price subject to change.

EJ USA - HYDRANTS, MAIN VALVES, MANHOLE COVERS & FRAMES

Price Comparison

			5%	4%	26%
			2024-2025	2023-2024	2022-2023
Product #	**Description**	**Incr / (Decr)**	**$ 54,155.76**	**$ 51,384.67**	**$ 49,621.00**
2200310	3" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 22.97	$ 589.51	$ 566.54	$ 543.58
2200410	4" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 25.52	$ 655.02	$ 629.50	$ 603.98
2200610	6" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 32.13	$ 824.70	$ 792.57	$ 760.44
2200810	8" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 51.74	$ 1,327.89	$ 1,276.15	$ 1,224.42
2201010	10" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 80.68	$ 2,070.83	$ 1,990.15	$ 1,909.47
2201210	12" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 102.08	$ 2,620.06	$ 2,517.98	$ 2,415.90
2201610	16" Resilient Wedge Gate Valve MJ 2" Operating Nut OR	$ 342.19	$ 8,782.98	$ 8,440.79	$ 8,098.59
2500410	4" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR	$ 32.13	$ 824.72	$ 792.59	$ 760.46
2500610	6" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR	$ 45.36	$ 1,164.14	$ 1,118.78	$ 1,073.43
2500810	8" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR	$ 67.34	$ 1,728.34	$ 1,661.00	$ 1,593.67
2501010	10" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR	$ 102.37	$ 2,627.49	$ 2,525.12	$ 2,422.75
2501210	12" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR	$ 153.12	$ 3,930.08	$ 3,776.96	$ 3,623.84
2501610	16" Resilient Wedge Gate Valve MJ x Tap 2" Operating Nut OR	$ 399.71	$ 10,259.22	$ 9,859.51	$ 9,459.80
54033D	5BR250 Hydrant 5'6" MJ Carroll 2 DTP 1 1/8" Pent 2-1 3 3/4" DFD Detroit Red OL w/shoe	$ 111.28	$ 3,153.07	$ 3,041.79	$ 2,893.41
83401D	5BR250 Hydrant 5'6" MJ Carroll 2 DTP 1 1/8" Pent 2-1 3 3/4" DFD Detroit Red OL DFD spin in	$ 132.74	$ 3,761.03	$ 3,628.29	$ 3,451.30
85604566	8560 Screw Type 3 Piece Valve Box Set D Box: #4 base, 30B bottom, 26T top, water cover, black asphaltic coated	$ 11.50	$ 279.91	$ 268.41	$ 268.41
85508009	8550 Screw Type Valve box extension Riser #69, 16-12" tall for 2-1/2"-9" height adjustment, black asphaltic coated	$ 3.05	$ 74.29	$ 71.24	$ 71.24

EJ USA - HYDRANTS, MAIN VALVES, MANHOLE COVERS & FRAMES

Price Comparison

			5%	4%	26%
			2024-2025	2023-2024	2022-2023
Product #	**Description**	**Incr / (Decr)**	**$ 54,155.76**	**$ 51,384.67**	**$ 49,621.00**
85508018	8550 Screw Type Valve box extension Riser #18A, 22-1/2" tall for 2-1/2"-15" height adjustment, black asphaltic coated	$ 3.53	$ 85.85	$ 82.32	$ 82.32
85508024	8550 Screw Type Valve box extension Riser, 28-1/2" tall for 2-1/2"-21" height adjustment, black asphaltic coated	$ 3.73	$ 90.80	$ 87.07	$ 87.07
85008010	8500H Solid Round gray iron 1" valve box adjusting riser for 5-1/4 valve boxes	$ 1.17	$ 28.63	$ 27.46	$ 27.46
85008015	8500H Solid Round gray iron 1-1/2" valve box adjusting riser for 5-1/4 valve boxes, cover 7-5/16" dia x 2-1/16" seat	$ 1.42	$ 34.67	$ 33.25	$ 33.25
85008020	8500H Solid Round gray iron 2" valve box adjusting riser for 5-1/4 valve boxes	$ 1.61	$ 39.19	$ 37.58	$ 37.58
85008030	8500H Solid Round gray iron 3" valve box adjusting riser for 5-1/4 valve boxes, cover 7-5/16" dia x 2-1/16" seat	$ 2.05	$ 49.74	$ 47.69	$ 47.69
85008040	8500H Solid Round gray iron 4" valve box adjusting riser for 5-1/4 valve boxes	$ 2.47	$ 60.29	$ 57.82	$ 57.82
85008060	8500H Solid Round gray iron 6" valve box adjusting riser for 5-1/4 valve boxes, cover 7-5/16" dia x 2-1/16" seat	$ 3.29	$ 79.89	$ 76.60	$ 76.60
942107	3D7 Seal Plate	$ 45.77	$ 68.66	$ 22.89	$ 22.89
942131	3D Seal Plate gasket	$ -	$ 3.40	$ 3.40	$ 3.40
942139	O-ring I214 1/8 1	$ -	$ 0.09	$ 0.09	$ 0.09
942230	4D7 seal plate bshg assy	$ 216.38	$ 360.63	$ 144.25	$ 144.25
942231	4D seal plate gasket	$ 8.57	$ 12.85	$ 4.28	$ 3.06
946565	O-ring I218 1/8 1-1/4	$ -	$ 3.63	$ 3.63	$ 3.63
942330	6D7 seal plate bshg assy	$ 108.25	$ 216.49	$ 108.24	$ 108.24
942331	6D seal plate gasket	$ 4.91	$ 7.37	$ 2.46	$ 2.27
944421	O-ring I-220 UL 1/8 1-3/8	$ -	$ 4.09	$ 4.09	$ 4.09
942430	8D7 Seal plate bshg assy	$ 117.00	$ 234.00	$ 117.00	$ 117.00
942431	8D seal plate gasket	$ 7.36	$ 11.04	$ 3.68	$ 1.45
942538	O-ring I-222 UL 1/8, 1-1/2	$ -	$ 0.32	$ 0.32	$ 0.28

EJ USA - HYDRANTS, MAIN VALVES, MANHOLE COVERS & FRAMES

Price Comparison

			5%	4%	26%
			2024-2025	**2023-2024**	**2022-2023**
Product #	**Description**	**Incr / (Decr)**	**$ 54,155.76**	**$ 51,384.67**	**$ 49,621.00**
942530	10D7 seal plate bshg assy	$ (126.30)		$ 126.30	$ 126.30
942531	10D seal plate gasket	$ (1.35)		$ 1.35	$ 1.35
942539	O-ring I-223 1/8 1-5/8	$ (1.54)		$ 1.54	$ 1.54
942630	12D7 Seal plate bshg assy	$ 138.90	$ 277.81	$ 138.91	$ 138.91
942730	16D7 seal plate bshg assy	$ 274.75	$ 412.13	$ 137.38	$ 137.38
942631	12D seal plate gasket	$ -	$ 4.25	$ 4.25	$ 4.25
942731	16D seal plate gasket	$ -	$ 13.17	$ 13.17	$ 13.17
942639	O-ring I-225 1/8 2-1/78	$ -	$ 2.55	$ 2.55	$ 2.55
942739	O-ring I-227 1/8 2-1/8	$ -	$ 1.94	$ 1.94	$ 1.94
100292	1000H Solid round gray iron 1-1/2" adjusting riser for cover with 23" dia x 1-1/4" seat thickness, black asphaltic coated	$ 7.68	$ 187.03	$ 179.35	$ 179.35
100293	1000H Solid round gray iron 2" adjusting riser for cover with 23" dia x 1-1/4" seat thickness, black asphaltic coated	$ 8.82	$ 214.62	$ 205.80	$ 205.80
100295	1000H Solid round gray iron 2-1/2" adjusting riser for cover with 23" dia x 1-1/4" seat thickness, black asphaltic coated	$ 9.38	$ 228.40	$ 219.02	$ 219.02
100296	1000H Solid round gray iron 3" adjusting riser for cover with 23" dia x 1-1/4" seat thickness, black asphaltic coated	$ (50.21)	$ 238.22	$ 288.43	$ 288.43
100298	1000H Solid round gray iron 4" adjusting riser for cover with 23" dia x 1-1/4" seat thickness, black asphaltic coated	$ 14.40	$ 350.47	$ 336.07	$ 336.07
104298	1040H Solid round gray iron 2" adjusting riser for cover with 26" dia x 1-1/2" seat thickness, black asphaltic coated	$ 9.85	$ 239.85	$ 230.00	$ 230.00
103800	1040H Solid round gray iron 3" adjusting riser for cover with 26" dia x 1-1/2" seat thickness, black asphaltic coated	$ 10.37	$ 252.36	$ 241.99	$ 241.99
104010	1040Z 7" tall frame, black coated	$ 12.99	$ 315.90	$ 302.91	$ 302.91
104258	1040C Vented 1 hole cover COL logo Water, black coated	$ 9.29	$ 226.21	$ 216.92	$ 216.92

EJ USA - HYDRANTS, MAIN VALVES, MANHOLE COVERS & FRAMES

Price Comparison

			5%	4%	26%
			2024-2025	2023-2024	2022-2023
Product #	**Description**	**Incr / (Decr)**	**$ 54,155.76**	**$ 51,384.67**	**$ 49,621.00**
104304	1040 7" tall bolted and gasketed watertight L1 manhole assembly COL logo Sanitary, black coated	$ 24.76	$ 602.56	$ 577.80	$ 577.80
104291	1040A solid cover COL logo Sanitary, black coated	$ 9.29	$ 226.21	$ 216.92	$ 216.92
101010	1010Z 7" tall frame, black asphaltic coated	$ 17.15	$ 417.29	$ 400.14	$ 400.14
100010	1000Z 7" tall frame, black asphaltic coated	$ 11.65	$ 283.52	$ 271.87	$ 271.87
100022	1000B vented 20 hole cover, black asphaltic coated	$ 8.75	$ 212.96	$ 204.21	$ 204.21
100042	1000N Oval 2-5/8 tall behive style grate, "Dump no waste! Drains to waterways" black coated	$ 8.25	$ 200.78	$ 192.53	$ 192.53
508010	5080Z 6-3/4" tall catch basin frame, black asphaltic coated	$ 12.91	$ 314.33	$ 301.42	$ 301.42
500050	5000M1 grate "Dump no waste! Drains to Waterways", black asphaltic coated	$ 7.09	$ 172.39	$ 165.30	$ 165.30
1040074L01	ERGO 24 7" tall cam locking hinged manhole assy COL logo Sanitary sewer, black asphaltic coated	$ 29.96	$ 729.17	$ 699.21	$ 721.90
104510	1045Z 7" tall frame, black coated	$ 11.30	$ 274.96	$ 263.66	$ 263.66
104610	1046Z 4" tall frame, black asphaltic coated	$ 11.30	$ 274.96	$ 263.66	$ 263.66
104022	1040B vented 16 hole cover, black asphaltic coated	$ 9.29	$ 226.21	$ 216.92	$ 216.92
104030	1040M1 grate "Dump no waste! Drains to waterways", black coated	$ 8.66	$ 210.60	$ 201.94	$ 201.94
104042	1040N 3-1/4" tall beehive "Dump no waste! Drains to waterways", black asphaltic coated	$ 9.06	$ 220.35	$ 211.29	$ 211.29
104045	1040 O2 6" tall beehive grate, black coated	$ 9.06	$ 220.35	$ 211.29	$ 211.29
500061B01	5000M4 6-3/4" tall bolted and hinged catch basin assy w/round base flange "Dump no waste! Drains to waterways"	$ 22.16	$ 539.30	$ 517.14	$ 517.14

2021-2022
$ 39,438.70
$ 421.08
$ 467.87
$ 589.07
$ 948.49
$ 1,479.16
$ 1,871.47
$ 6,273.56
$ 589.09
$ 831.53
$ 1,234.53
$ 1,876.78
$ 2,807.20
$ 7,328.01
$ 2,245.25
$ 2,678.18
$ 235.07
$ 62.39

2021-2022
$ 39,438.70
$ 72.09
$ 76.25
$ 24.05
$ 29.12
$ 32.91
$ 41.77
$ 50.63
$ 67.09
$ 22.89
$ 3.40
$ 0.09
$ 144.25
$ 3.06
$ 3.63
$ 108.24
$ 2.27
$ 4.09
$ 117.00
$ 1.45
$ 0.28

2021-2022
$ 39,438.70
$ 126.32
$ 1.35
$ 1.54
$ 138.91
$ 137.38
$ 4.25
$ 13.17
$ 2.55
$ 1.94
$ 157.07
$ 180.23
$ 191.81
$ 200.06
$ 294.32
$ 201.43
$ 211.93
$ 265.28
$ 189.97

2021-2022
$ 39,438.70
$ 506.02
$ 189.97
$ 350.43
$ 238.10
$ 178.84
$ 168.61
$ 263.97
$ 144.77
$ 632.22
$ 230.91
$ 230.91
$ 189.97
$ 201.94
$ 211.29
$ 185.05
$ 452.90

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

13. REQUEST TO AMEND THE CONTRACT WITH OHM ADVISORS: Engineering Division, re: for Construction Engineering Services for the 2024 Water Main Replacement Project (Harrison Road and Westfield Avenue) from the Unexpended Fund Balance of the Water and Sewer Fund to be reimbursed by the proceeds of the Drinking Water Revolving Fund Revenue Bonds. (CR 336-21)

    Todd Zilincik, City Engineer, presented the request to Council.

    Councilmember Donovic offered an approving motion for the Consent Agenda.

    DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

13.

Engineering
May 14, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Todd Zilincik, P.E., City Engineer

AGENDA ITEM

REQUEST TO AMEND THE CONTRACT WITH OHM ADVISORS: Engineering Division, re: for Construction Engineering Services for the 2024 Water Main Replacement Project (Harrison Road and Westfield Avenue) from the Unexpended Fund Balance of the Water and Sewer Fund to be reimbursed by the proceeds of the Drinking Water Revolving Fund Revenue Bonds. (CR 336-21)

BACKGROUND DETAILS

The City Council approved Qualification Based Selection (QBS) firms pursuant to Council Resolution No. 336-21, adopted November 22, 2021, to perform all professional engineering services on various federal, state and locally funded projects through fiscal year 2026. Under this procedure, we are recommending that OHM Advisors (OHM) serve as our construction engineering (CE) consultant for the 2024 Water Main Replacement Project (Harrison Road and Westfield Ave.), involving 10,400 lineal feet of 8" HDPE water main and 257 water services.

The OHM construction engineering services and administration services will include supporting the City during construction of Harrison Road and Westfield Avenue in Sections 35 and 36. The work consists of replacing 6-inch and 8-inch water mains with a new 8-inch water main. This is an effort to reduce water main breaks, improve reliability and water quality and increase fire hydrant coverage.

The construction cost for this project is estimated at $3,286,245.00.

In order to proceed with the construction phase, it is respectfully recommended that the City Council take the following actions:

- Award OHM Advisors (OHM), 34000 Plymouth Road, Livonia, Michigan 48150, the designation of construction engineering consultant to provide administration services for the 2024 Water Main Replacement Project (Harrison Road and Westfield Ave.).

- Authorize the Mayor and the City Clerk to execute an amendment to the Engineering contract with OHM Advisors in the not-to-exceed amount of $262,900.00 for the construction engineering services for the 2024 Water Replacement Project, Project (Harrison Road and Westfield Avenue).

- Authorize an appropriation and expenditure in the amount of $262,900.00 from the Unexpended Fund Balance of the Water and Sewer Fund to be reimbursed by the proceeds of the Drinking Water Revolving Fund Revenue Bonds.

- Authorize the City Engineer to approve minor adjustments to the work, as required

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

In order to proceed with the construction phase, it is respectfully recommended that the City Council take the following actions:

- Award OHM Advisors (OHM), 34000 Plymouth Road, Livonia, Michigan 48150, the designation of construction engineering consultant to provide administration services for the 2024 Water Main Replacement Project (Harrison Road and Westfield Ave.).

- Authorize the Mayor and the City Clerk to execute an amendment to the Engineering contract with OHM Advisors in the not-to-exceed amount of $262,900.00 for the construction engineering services for the 2024 Water Replacement Project, Project
(Harrison Road and Westfield Avenue).

- Authorize an appropriation and expenditure in the amount of $262,900.00 from the Unexpended Fund Balance of the Water and Sewer Fund to be reimbursed by the proceeds of the Drinking Water Revolving Fund Revenue Bonds.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

n/a

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

$262,900

DETAILED WORK BEING PERFORMED

Construction Engineering for the 2024 Water Main Replacement Project (Harrison Road and Westfield Avenue)

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

$262,900 from the Unexpended Fund Balance of the Water and Sewer Fund to be reimbursed by the proceeds of the Water and Sewer Fund

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Qualification Based Selection (QBS) Consultant

ATTACHMENTS

1. OHM Proposal - CE Services for 2024 WM (Harrison Westfield) 05.14.24
2. CR 336-21

APPROVED BY

Todd Zilincik, P.E., City Engineer — Date: May 15, 2024

Don Rohraff, Director of Public Works — Date: May 15, 2024

Debra Peck Lichtenberg, CPA, Finance Director — Date: May 16, 2024

Carter Fisher, City Attorney — Date: May 16, 2024

Maureen Miller Brosnan, Mayor — Date: May 16, 2024

ARCHITECTS. ENGINEERS. PLANNERS.

OHM Advancing Communities℠

May 14, 2024

Todd Zilincik, PE
City of Livonia
12973 Farmington Road
Livonia, MI 48150

Regarding: 2024 City of Livonia Water Main Replacement (Harrison & Westfield)
Proposal for Construction Engineering (CE) Services

Dear Mr. Zilincik,

It is our understanding that the City would like OHM to provide construction engineering (CE) and administration services to support the City during construction of Harrison Avenue and Westfield Avenue in Sections 35 and 36. The work consists of replacing 6-inch and 8-inch water mains with new 8-inch water main. This is an effort to reduce water main breaks, improve reliability and water quality and increase fire hydrant coverage.

We have worked with City staff to define the schedule for completing the proposed improvements. Based on that effort, we have prepared the attached Scope of Services, Schedule and Proposed Fees to assist the City with the effort necessary to deliver the improvements. We have based our proposal on the terms and conditions of the current Professional Services agreement. The proposed project Supplements (A-C) for this project, as well as a draft of the Exhibit A, are included.

We appreciate this opportunity to provide professional services to the City and look forward to executing the plan that continues to save the City money through long term capital investment. Should you find our proposal acceptable, please notify us and we will prepare the final documents for execution. Should you have any questions, please do not hesitate to give me a call at 734-466-4594.

Sincerely,
OHM Advisors

Jessica Katers

Jessica Katers, PE
Project Manager

CC: Donald Rohraff, Director of Public Works

OHM Advisors
34000 PLYMOUTH ROAD
LIVONIA, MICHIGAN 48150
T 734.522.6711
F 734.522.6427
OHM-Advisors.com

CITY OF LIVONIA

2024 CITY OF LIVONIA WATER MAIN REPLACEMENT (Harrison & Westfield)

PROJECT UNDERSTANDING

The CITY wishes to replace various sections of water main within Sections 35 and 36 of the City of Livonia to increase the system reliability. The new water main will be a minimum 8" diameter water main installed primarily by pipe-bursting and directional drilling with some open cut sections. This project will also include all new valves, hydrants, and water service connections. Any found lead service lines will be replaced per EGLE requirements. It is anticipated, where feasible, that new water main will be installed within the greenbelt area between the edge of the roadway and sidewalk.

No improvements to the existing sanitary sewer system or significant drainage improvements are included in this scope of work. There does not appear to be any regulated or non-regulated wetlands affected by this project. Wetland investigation and/or wetland permitting isn't included.

Existing driveway approaches impacted by the water main installation will be replaced. Concrete driveways will be replaced with concrete, asphalt driveways replaced with asphalt.

Concrete sidewalk will be replaced as needed to install the water main with provisions for the installation of ADA ramps at the intersections of streets disturbed within the project. The intent is to end construction at the end of radii and stay within the CITY'S rights-of-way when possible. Minimal soil erosion control measures are anticipated. Turf restoration is generally anticipated to be accomplished with topsoil, seed and mulch, with isolated use of sod.

The project is anticipated to be funded through City of Livonia water funds. The project's Bid Price less inspector days is $3,286,245 The work to be completed under this project will include the streets listed below:

<u>Water Main Replacement along Westfield Avenue:</u>
1) Westfield Avenue from Merriman Road to Middlebelt Road

<u>Water Main Replacement for Harrison Avenue:</u>
1) Harrison Avenue from Joy Road to Plymouth Road

CONSTRUCTION ADMINSTRATION AND ENGINEERING SERVICES

The **Construction Engineering and Administrative Services** shall include the following:

- **Contract Administration Services** shall consist of preparing monthly pay estimates based on quantities provided with field representative's daily reports to meet CITY deadlines for payment purposes Work shall also include assisting the CITY staff (i.e., Project Manager) in the resolution of claims, contract interpretations, and review of project schedules and deadlines. CONSULTANT will provide project closeout, consisting of final pay estimate preparation, closeout documentation from the contractor, and a balancing Change Order identifying adjustments to the construction contract. In addition, the CONSULTANT will make field visits to project sites to observe the work in

progress and assist in review of contractor's work in general compliance with the contract.

- **Stakeout Services** during the construction phase shall consist of the required staking for line and elevation of water main infrastructure. Staking for water main will be provided for hydrants, gate valves and wells, and connection points.

- **Public Notification** will consist of the CONSULTANT coordinating with the CITY to draft letters to the residents at the start of construction and, when needed, send out letters to residents when there are changes in construction sequences or schedule.

- **Informational Meetings** will consist of OHM attending up to two (2) informational meetings with residents to explain the proposed construction program and its impacts on the residents/businesses. Attendance shall be by the CONSULTANT project manager and construction engineer.

- **Construction Engineering Services** shall consist of a senior construction engineer/technician who will supervise and direct the CONSULTANT'S field staff to provide appropriate project documentation, shop drawing review, resolution of construction issues/problems that may arise, provide recommendations to the CITY as it relates to claims from the contractor(s) including preparation of change orders if required, responsive complaint resolution, review of project progress for compliance with approved schedule and recommendations to the CITY'S Project Manager for penalties and/or changes in the time of completion of projects. CONSULTANT shall coordinate with a local material testing agency and the CITY'S Project Manager for City to contract for any required material testing. The CONSULTANT shall lead the preconstruction conference and biweekly progress meetings.

CONSTRUCTION OBSERVATION SERVICES

The **Construction Observation Services** shall include the following:

- **Construction Observation** shall consist of full-time observation of the work progress by the contractor(s) on days when work is performed. Construction Daily Reports (CDR's) will be prepared documenting pay item quantities and the general work progress for the day. Checking line and elevation for compliance with the survey stakes will also be provided as part of the CONSULTANT'S regular responsibilities. The CONSULTANT will answer residents' questions and attempt to promptly resolve complaints during the course of construction. The CONSULTANT will also interact with the contractor's supervisory staff to notify them when work is unacceptable and in need of correction, or removal and replacement of specific work elements when necessary.

- **Complaint Resolution Services** is included as a part of observation. This may include notifying the CITY of:

  1) Violations of the CITY ordinance for construction traffic on roads within the CITY
  2) Concerns raised by property owners during the construction phase of the project

- **Construction Testing Services** is included as a part of this scope and will be SUBCONSULTED through G2 Consulting for the required materials testing through the duration on the project.

SERVICES NOT INCLUDED

Changes in scope by Owner will result in additional services and will be billed accordingly. We will provide a proposal for the work at the time of the changes prior to proceeding with the revisions.

- Additional Site Survey
- Additional Permit Packages
- Permit Fees
- Easement Documents
- Regulatory and client meetings not specifically referenced

CITY OF LIVONIA

2024 CITY OF LIVONIA WATER MAIN REPLACEMENT
(HARRISON & WESTFIELD)

CONSULTANT shall provide services for the Phases and Tasks outline on Supplement A according to the approximate timeframe below.

Key dates are shown in the following schedule:

Milestone	Date
Construction Contract Award	June 17, 2024
Construction State Date	July 1, 2024
Substantial Completion Date	October 1, 2024
Final Completion & Closeout Date	October 30, 2024

CITY OF LIVONIA

2024 CITY OF LIVONIA WATER MAIN REPLACEMENT
(HARRISON & WESTFIELD)

Construction Phase

The CITY agrees to pay the CONSULTANT for construction services on an hourly basis, billed monthly, per the 2024 Rate Schedule at the not-to-exceed amount of two hundred sixty-two thousand nine hundred dollars and zero cents ($262,900.00).

Construction Engineering Services* …… $262,900.00

*This amount is based on *Attachment A to QBS Contract: Engineering Fees by Construction Value and Type of Project*. (8% of the project's Bid Price less inspector days of $3,286,245.00 construction value). This includes construction testing services, contract administration, stakeout services, construction engineering, informational meeting attendance, and public notification.

Additional Services

Additional services, if approved by City Council, shall be paid at the current hourly rate schedule or at an agreed upon price between the CITY and CONSULTANT.

Notes

- Invoices shall be submitted monthly.
- 2024 Hourly Rate Schedule is attached for reference.

OHM Advancing Communities

OHM ADVISORS
2024 HOURLY RATE SCHEDULE

Professional Engineer IV / Architect IV / Senior Interior Designer IV	$200.00
Professional Engineer III / Architect III / Senior Interior Designer III	$182.00
Professional Engineer II / Architect II / Senior Interior Designer II	$168.00
Professional Engineer I / Architect I / Senior Interior Designer I	$156.00
Project Specialist III	$185.00
Project Specialist II	$165.00
Project Specialist I	$135.00
Graduate Engineer IV	$158.00
Graduate Engineer III	$150.00
Graduate Engineer II	$145.00
Graduate Engineer I	$135.00
Graduate Architect III / Landscape Architect III / Interior Designer III	$145.00
Graduate Architect II / Landscape Architect II / Interior Designer II	$128.00
Graduate Architect I / Landscape Architect I / Interior Designer I	$118.00
Technician IV	$153.00
Technician III	$135.00
Technician II	$120.00
Technician I	$102.00
Engineering / Architectural / Interior Design Aide	$80.00
Professional Surveyor III	$175.00
Professional Surveyor II	$162.00
Professional Surveyor I	$146.00
Graduate Surveyor	$132.00
Surveyor III	$135.00
Surveyor II	$120.00
Surveyor I	$105.00
Surveyor Aide	$80.00
Planner IV	$170.00
Planner III	$153.00
Planner II	$129.00
Planner I	$110.00
Planner Aide	$75.00
Graphic Designer	$125.00
Administrative Support	$95.00
Clerical Aide	$80.00
Principal	$235.00
Sr. Associate	$215.00
Associate	$205.00

Rates as reflected subject to review and adjustment on an annual basis.
2024 Public Rates 23-1219

EXHIBIT A

PROJECT SPECIFIC SCOPE OF SERVICES, PROJECT SCHEDULE, PAYMENTS TO CONSULTANT

The information contained in this Exhibit applies only to the following project:

Project Title:
2024 CITY OF LIVONIA WATER MAIN REPLACEMENT (Harrison & Westfield)

Dated:_____, 2024

This is an Exhibit to the Professional Services Contract dated December 1, 2016, and extended on November 22, 2021, between the City of Livonia, and Orchard, Hiltz & McCliment, Inc. (OHM Advisors), whose address is 34000 Plymouth Road, Livonia, MI 48150.

This Exhibit acts as a duly executed written instrument that amends, supplements, modifies, or cancels certain portions of the contract, as provided in Article 8.01 of the contract.

A. SCOPE OF SERVICES

CONSULTANT is requested to provide Construction Phase Services for the proposed improvements in accordance with attached Supplement A, dated May 14, 2024.

B. PROJECT SCHEDULE

The Project Schedule is attached as Supplement B, dated May 14, 2024.

C. PAYMENTS TO CONSULTANT

CONSULTANT shall be paid on an hourly basis up to an amount not-to-exceed two hundred sixty-two thousand nine hundred dollars and zero cents ($262,900.00) in accordance with the tasks and payment terms on Supplement C, dated May 14, 2024.

In Witness Whereof, the City and Consultant, by and through their duly authorized officers and representatives, have executed this Contract.

In the Presence of:

CITY OF LIVONIA, a Michigan Municipal Corporation

_____

By:_____
Maureen Miller Brosnan, Mayor

_____

By:_____
Lori Miller, City Clerk

In the Presence of:

OHM Advisors

Jessica Kotters
Witness

By: Rhett Gronevelt
Rhett A. Gronevelt, PE

Its: Principal

Approved:

_____
Donald R. Rohraff
Director of Public Works

Approved:

_____
Todd J. Zilincik, PE
City Engineer

Pursuant to Council Resolution

Approved:

No.:_____

_____
Michael Slater
Director of Finance

Adopted on:_____

Approved:

_____
Paul A. Bernier
Department of Law

AND BE IT FURTHER RESOLVED THAT the street is an approved public street and is open for public purposes; and FURTHER, that said street is accepted into the City's local street system and is located within a right-of-way under the control of the City of Livonia and that said street was open to the public as of December 31, 2021.

#336-21 RESOLVED, that having considered the report and recommendation of the City Engineer, dated October 26, 2021, submitted pursuant to Council Resolution No. 365-16, which bears the signatures of the Director of Public Works, the Director of Finance and the City Attorney, and is approved for submission by the Mayor, requesting to extend the Qualification-Based Selection (QBS) contracts with OHM Advisors, Hubbell, Roth and Clark, Inc., Spalding Dedecker Associates, Inc. and Anderson, Eckstein and Westrick, Inc., for a period of five (5) years, for future proposals relating to professional engineering consulting services, the Council does hereby accept the proposal to extend the qualification based-selection (qbs) contracts with OHM Advisors, 34000 Plymouth Road, Livonia, MI 48150, Hubbell, Roth and Clark, Inc., 555 Hulet Drive, Bloomfield Hills, MI 48303-0824, Spalding Dedecker Associates, Inc., 905 South Boulevard East, Rochester Hills, MI 48307-5358, and Anderson, Eckstein and Westrick, Inc., 51301 Schoenherr Road, Shelby Township, mi 48315, for a five (5) year period ending November 30, 2026, to perform Professional Engineering Services on various Federal, State and Locally funded roads, bridges, storm sewers, sanitary sewers, water mains, traffic signal modernization and pedestrian signal upgrades and other related projects; FURTHER, the Mayor and City Clerk are hereby authorized to execute contracts for and on behalf of the City of Livonia with the aforesaid companies and to do all other things necessary or incidental to the full performance of this resolution; and all QBS contracts based on scope and contract amount for each future individual project will be brought before the City Council for funding approval.

#337-21 RESOLVED, that having considered the report and recommendation of the City Engineer, dated October 29, 2021, which bears the signatures of the Director of Public Works and the Director of Finance, and is approved for submission by the Mayor, the Council does hereby approve the proposed 2022 Road Repair Program as proposed by the Department of Public Works and as reviewed by the Citizens Advisory Committee on Roads for the tenth year of the ten-year road paving millage approved by Livonia residents, as shown in the attachment to that report.

#338-21 WHEREAS, the Mayor and City Council of the City of Livonia believe quality roads are a vital part of any community; and

WHEREAS, the City of Livonia has a Citizens Advisory Committee on Roads which identifies City streets most in need of repair in order to

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

14. AWARD OF CONTRACT: Engineering Division, re: for the interior renovations at the Robert and Janet Bennett Civic Center Library, from the Unexpended Fund Balance of the Library Fund. (CR 378-20)

    David Lear, Assistant City Engineer, presented the request to Council.

    Councilmember Budzinski confirmed this is to include modifications to make restrooms ADA compliant. She also asked how this fits in with the roof and the chiller.

    Mr. Lear said the chiller is separate from the roof and renovations and explained the timelines.

    Vice President Ptashnik confirmed they plan to have family friendly restrooms and that the planning will be done by an ADA Certified Planner.

    Councilmember Donovic asked if the interior renovations will include technological advancements as well.

    Kristen Edson, Library Director, said adding additional power and data to the different floors allows flexibility to rearrange and provide improved services.

    Councilmember Budzinski offered an approving motion for the Consent Agenda.

    DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

14.

Engineering
May 22, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	David Lear, Assistant City Engineer

AGENDA ITEM

AWARD OF CONTRACT: Engineering Division, re: for the interior renovations at the Robert and Janet Bennett Civic Center Library, from the Unexpended Fund Balance of the Library Fund. (CR 378-20)

BACKGROUND DETAILS

The Robert and Janet Bennett Civic Center Library, located at 32777 Five Mile Road, was constructed in 1986 and encompasses approximately 65,000 s.f. (including a 4,300 s.f. atrium). Due to the age and design of the existing building, structural and functional upgrades are required to maintain the service level the community expects. Items such as the HVAC system and entrance improvements have been addressed in recent years, and most recently the Council has approved the award of design contracts for the atrium roof replacement.

In order to address the functional deficiencies and upgrade design elements to current standards, scope development services were assigned to the Architectural and Engineering firm DLZ. (one of the four as-needed Architectural firms for the City) DLZ has provided a proposal for the requested interior improvements based on the information provided by Library and DPW staff. (see attached proposal) Proposed renovations included within the design proposal are updating existing restrooms to make them ADA compliant, removing and replacing existing desks and millwork, repainting walls, replacing ceiling grid and tiles, providing upgraded electrical and data connections, acoustical mitigation and updating finishes throughout.

DLZ is currently under contract for the design and administration for the Atrium Roof replacement project, and we would like to add the interior redesign work to their contract to be able to minimize redundancies of having different Architecture firms working on related projects at the same time. During the roof replacement project, the library will be shut down for safety reasons, and it is our objective to have the interior renovations completed during the same closure to minimize downtime.

Based on the above information, it is recommended that the Council proceed as follows:

- Award a contract for Professional Architecture Services through the QBS process (CR 378-20) for the design/bid phase and construction contract administration in the not to exceed amount of $103,000.00 to DLZ Michigan, Inc., 607 Shelby Street, Suite 650, Detroit, Michigan 48226.

- Authorize an appropriation and expenditure in the amount of $103,000.00 for the Robert and Janet Bennett Civic Center Library Interior Renovations project from the unexpended fund balance

of the Library Fund (271).

- Authorize the City Engineer to approve minor adjustments in the work, as required.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Based on the above information, it is recommended that the Council proceed as follows:

- Award a contract for Professional Architecture Services through the QBS process (CR 378-20) for the design/bid phase and construction contract administration in the not to exceed amount of $103,000.00 to DLZ Michigan, Inc., 607 Shelby Street, Suite 650, Detroit, Michigan 48226.

- Authorize an appropriation and expenditure in the amount of $103,000.00 for the Robert and Janet Bennett Civic Center Library Interior Renovations project from the unexpended fund balance of the Library Fund (271).

- Authorize the City Engineer to approve minor adjustments in the work, as required.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

n/a

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

$103,000

DETAILED WORK BEING PERFORMED

Professional Architecture Services for the Interior Renovations at the Robert and Janet Bennett Civic Center Library

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

$103,000 from the Unexpended Fund Balance of the Library Fund (271)

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Qualification Based Selection (QBS) Architectural Firm

ATTACHMENTS

1. Livonia Civic Library Interior Renovation 05202024
2. CR 378-20

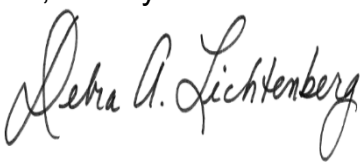
APPROVED BY

Date: May 22, 2024

David Lear, Assistant City Engineer

Date: May 22, 2024

Kristen Edson, Library Director



Date: May 22, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 22, 2024

Maureen Miller Brosnan, Mayor

May 20, 2024

Mr. David Lear
Assistant City Engineer
City of Livonia | Engineering
12973 Farmington Rd.
Livonia, MI 48150

RE: Letter Agreement for Additional Professional Architectural and Engineering Design Services
Interior Renovations for the Livonia Civic Center Library
DLZ Project: 2142-7258-06

Mr. Lear,

DLZ Michigan, Inc. (DLZ) is pleased to submit this Letter Agreement to the City of Livonia (CITY) for Professional Services for the above referenced project.

The following agreement between DLZ and the CITY, will confirm to all Terms and Conditions of the existing "Professional Architectural Services" agreement between DLZ and the CITY dated January 1, 2021

DESCRIPTION OF THE PROJECT

The City of Livonia is in the planning stages of renovating the interior of the Civic Center Library. The goal is to modernize the interior spaces by updating with new finishes, furniture, electrical and data, plumbing (restrooms), acoustics, and update to meet ADA compliancy to better serve the various users of the library. This includes the following scope of work:

Design Services Scope:

Restrooms

- Renovation of all ground level restrooms to include finishes, electrical, and plumbing.
- Upgrade to all present building code and ADA requirements.
  - Provide code assessment for occupancy/minimum fixture requirements.

Lobby Vestibule re-configuration

- Removal of mechanical shaft (infill floor) at south entry vestibule, reconfigure door locations to allow for a straight path access to main lobby.

Structural

- Infill of south vestibule floor openings.
- Provide framing to support vestibule glass top once bearing shaft walls are removed.

Millwork

- Removing old service desks and replacing them with flexible millwork service desks.

Finishes

- Provide material and finish solutions to modernize user experience within multi-story reading areas and stacks.
- Floors:
  - Replace carpeting on 1st & 2nd floors with carpet tile.
  - Flooring contractor to coordinate install with rack/book relocation contractor selected by City of Livonia.

- Ceilings:
  - Replace ceiling grid and acoustical tiles.
- Walls:
  - Wall covering removal (locations to be determined).
  - New paint selections (locations to be determined).
  - Rubber base for areas that have new carpet tile or where it is determined by Owner.

FF&E

- Coordinate with an FF&E firm for appropriate furnishing selections and finishes.
- Coordinate with Library Design consultant for removal and replacement of the stacks.

Mechanical

- Reroute return air grilles/ducts located in south lobby vestibule.

Electrical Power and Data

- Electrical Power:
  - Replace existing outlets in multi-story reading areas and stacks.
  - Add electrical outlets with usb ports in public areas (including atrium) as needed and required.
  - Coordination electrical with FF&E selections as needed.
  - Relocate south vestibule exit signage and ADA push plate actuators.
- Data Infrastructure:
  - Update 2nd-floor data connectivity.
  - Low-voltage coordination with Client's IT dept.

Acoustical Mitigation

- Investigate and provide solutions to mitigate noise transfer between floors.

Research Scope:

- Identify possible grants, if any, for ADA renovations for the restrooms.

Cost Opinion:

- Provide an Opinion of Probable Construction Costs.

(Note: No scope is included for the Auditorium or its adjacent Meeting Rooms, however the hall to the meeting rooms is included.)

SCOPE OF SERVICES

DATA COLLECTION

- Perform a site visit for existing conditions assessments and as-built dimensions, and conduct a review of existing operations.
- One (1) programming meeting with Library Director and owner's library design consultant to understand current operations and needs.

SCHEMATIC DESIGN

- Prepare schematic design drawings including architectural plans. The plans will graphically depict the general scope of work and design intent; however, many details will not be fully developed.
- Conduct a design review meeting with Library Director for design approval prior to proceeding with subsequent design development phase.
- Up to two (2) interior renderings to depict the nature of the space.

DESIGN DEVELOPMENT

- Provide cut sheets for preliminary material, product, and FF&E selections.
- Conduct design review meeting with Library Director for design approval prior to proceeding with subsequent design phase.
- Provide an Opinion of Probable Construction Costs based on design development documents.

CONSTRUCTION DOCUMENTS

- Prepare Construction Documents to include final architectural, plumbing mechanical, and electrical drawings.
- Prepare Project Manual, additional Division 02-33 Technical Specifications as required for new work.
- Construction Documents shall incorporate these drawings and specifications into the atrium and roof renovation project bid documents.
- Update Opinion of Probable Construction Costs based upon final design documents.
- Submit Construction Documents to local authority having jurisdiction (AHJ) for review. Application fee to be waived or billed as a direct reimbursable expense (not included in below fee).

BIDDING

- Conduct a pre-bid meeting on-site for prospective bidders to review the scope of work.
- Prepare and Advertisement of Bid for public application.
- Distribute .pdf format Contract Documents for access by prospective Bidders.
- Respond to Bidder's Requests for Information (RFI's) during bidding phase, in the form of an Addendum.
- Assist the City during the opening of Bids.
- Review Bids received and provide a recommendation letter for Award of Construction Contract.

CONSTRUCTION ADMINSTRATION

- Conduct a pre-construction meeting to outline roles, responsibilities, and lines of communications.
- Review shop drawings and submittals related to the design.
- Respond to Contractor's Request for Information (RFI's) during construction.
- Perform site visits an average of bi-weekly to review construction progress and overall conformance with the Contract Documents. Conduct up to eight (8) site visits during construction activity; prepare field observation reports for each site visit.
- Conduct progress meetings and prepare meeting minutes; average of two (2) meetings per month, up to eight (8) progress meetings are anticipated.
- Review Contractor Payment Applications and make recommendations for payment.
- Perform one Substantial Completion walk-through and one Final Completion walk-through.
- Review Contractor's Project Closeout documents including review of O&M Manuals, Warranties, and Contractor's "As-Built" Record Drawings prepared by the Contractor.

ADDITIONAL SERVICES: WORK TO BE PERFORMED UNDER A SEPARATE AGREEMENT

Professional services not specifically identified within the Scope of Work are outside the scope of this Project. Additional Services may be performed upon mutual agreement as an amendment to this Letter Agreement. The following work items are not within this Project's scope of services:

- Additional meetings or site visits beyond those defined in Scope of Services.
- Perform 3-D scanning and/or "as-built" documentation of the existing facility and equipment for the purposed of developing a detailed building inventory and background drawings.
- Detailed cost estimating. A construction manager or independent cost estimator may be engaged as an additional service if detailed cost estimating is necessary.
- Additional renderings beyond the quantity noted above.

ADDITIONAL INFORMATION

- Services will be consistent with those customarily performed for similar projects of this nature, as defined by an industry standard AIA B101-2017 Standard Form of Agreement Between Owner and Architect.
- Correspondence and documentation shall utilize AIA documents and/or DLZ format. Deliverables will be provided electronically in a .pdf format.
- Documented conditions are only valid at locations observed. DLZ makes no representation concerning conditions unless stated in writing.
- The City of Livonia shall provide a copy of all applicable documents related to the building including existing drawings, previous reports, and maintenance records.
- DLZ is not responsible for Contractor's safety compliance; jobsite safety will be solely the Contractor's responsibility.

SCHEDULE

For services as described herein, DLZ will proceed upon receipt of a signed Agreement. The following preliminary schedule has been developed as a general guideline:

Anticipated Project Schedule	
Description	**Duration**
Notice to Proceed	assumed +/- June 1, 2024
Data Collection	+/- 2 weeks
Schematic Design	+/- 6 weeks
Owner Review	+/- 1 week
Design Development	+/- 6 weeks
Owner Review	+/- 1 week
100% Construction Documents	+/- 8 weeks
Bidding & Award	+/- 6 weeks
Construction Administration	+/- 20 weeks
Final Completion and Project Closeout	+/- 4 weeks

COMPENSATION

DLZ will provide Professional Services as outlined for an amount not to exceed Ninety-one thousand dollars ($91,000.00) inclusive of all expenses. DLZ will submit invoices, on a monthly basis, for services rendered. Estimated construction budget of +/- $750,000 for interior renovation scope. In the event of scope/ budget/ schedule increase, DLZ would respectfully request proportionate increase in associated fee.

Task	Compensation Amount
Data Collection	$9,500.00
Schematic Design	$18,000.00
Design Development	$20,000.00
100% Construction Documents	$28,000.00
Construction Administration	$15,500.00
Total Compensation	**$91,000.00**

DESIGN OPTION - ALTERNATE 1

With the added scope of ground level staff bathrooms, DLZ recommends the second level bathrooms directly above be renovated/upgraded to ADA standards at the same time as a cost saving measure. ADA upgrades will require relocation of fixtures, and as a result the relocation of existing plumbing, shafts, and slab on grade modifications. Combining scope will offer substantial savings through construction by reducing duplication of efforts. DLZ will provide Professional Services for this option for an amount not to exceed Twelve Thousand dollars ($12,000.00) in addition to the above compensation.

Task	Compensation Amount
Data Collection	$1,500.00
Schematic Design	$3,000.00
Design Development	$3,500.00
100% Construction Documents	$4,000.00
Total Compensation	**$12,000.00**

☐ Accept ☐ Decline

_____
Initial & Date

ACCEPTANCE

If this Letter Agreement meets with your approval, please sign, date, and return one copy (pdf format is acceptable). An executed Letter Agreement shall serve as DLZ's Notice to Proceed with identified work. We look forward to working with you on this project. Please do not hesitate to contact us if you should have any questions.

DLZ MICHIGAN, INC.

_____
Manoj Sethi, P.E.
President

_____
Dan Swiontoniowski, AIA, NCARB
Department Manager

AGREED AND ACCEPTED
CITY OF LIVONIA, DEPT OF PUBLIC WORKS

_____
Name and Title

_____
Date

DLZ
ARCHITECTURE • ENGINEERING • PLANNING
SURVEYING • CONSTRUCTION SERVICES

INNOVATIVE IDEAS
EXCEPTIONAL DESIGN
UNMATCHED CLIENT SERVICE

FEE JUSTIFICATION

Firm Name: **DLZ Michigan, Inc.**

Facility Name: **City of Livonia - Civic Center Library**
Project Location/Description: **32777 Five Mile Rd Livonia MI 48154**
DLZ Project Number: **2142-7258-06**
Estimate Worksheet for Contract:
Scope of Services: *Interior Renovations*

	TITLE	TASK	BASE CONTRACT RATE	Hours	Cost
WG1	Arch Principal		$199.00		$0.00
WG1	Arch Project Manager		$157.00	80.00	$12,560.00
WG1	Arch Quality Manager		$178.00		$0.00
WG1	Arch Project Architect		$125.00	120.00	$15,000.00
WG1	Arch Architect		$115.00		$0.00
WG1	Arch Senior Designer		$125.00	200.00	$25,000.00
WG1	Arch Designer		$94.00		$0.00
WG1	Struct/Civil Engineer IV		$188.00	40.00	$7,520.00
WG1	Struct/Civil Engineer III		$146.00		$0.00
WG1	Struct/Civil Engineer II		$125.00		$0.00
WG1	Struct/Civil Engineer I		$94.00		$0.00
WG1	Mech/Elec/Plumb Engineer IV		$167.00		$0.00
WG1	Mech/Elec/Plumb Engineer III		$141.00	120.00	$16,920.00
WG1	Mech/Elec/Plumb Engineer II		$115.00	120.00	$13,800.00
WG1	Mech/Elec/Plumb Engineer I		$94.00		$0.00
WG1	Construction Observer Manager		$110.00		$0.00
WG1	Construction Observer		$94.00		$0.00
WG1	Tech Services CAD/GIS Tech		$84.00		$0.00
WG1	Tech Services BIM Coordinator		$115.00		$0.00

ADDED SCOPE AS OF 5.22.2024

1 Renovation of Staff Toilets adjacent to Childrens Department
- No basement - requires data collection for exist plumbing locations & partial slab removal for relocation of fixtures
- Existing does not meet ADA - requires complete redesign, walls/plumbing moved, fixture counts updated per occupancy study
- Toilets above in same condition - recommend relocating 2nd level plumbing/prior to finishing ground level **(SEE ADD BELOW)**

2 Reconfigure South Entrance Vesitbule
- Relocate 5000 CFM of return air grilles - recommend built in benches under adjacent windows/includes millwork add & Mech scope
- Demo maonsry enclosure and infill exist mech hole in floor (need structural to check/approve arch solution)
- Relocate Elec - Exit signage & ADA door acuators
- Vestibule top built into existing exterior curtain wall structure - Assume vestibule sloped glass top to remain
- No glazing revisions anticipated outside of door relocation
- cost does not anticipate any exterior work unless noted above

Labor Subtotal: 680.00 **$90,800.00**

Miscellaneous Expense Descriptions and Amounts		Cost
Geotechnical Investigation	N/A	
Topographic Survey	N/A	
Contractor's Pre-Construction Services	N/A	
Specialty Subconsultant	N/A	
	Misc. Subtotal:	**$0.00**

Travel Expenses		Rate	Units	Qty	# Trips	Cost
Per Diem (GSA rate)			Days			$0.00
Lodging (GSA per diem rate)			Nights			$0.00
Mileage (GSA rate)	24 trips during design, from DLZ Detroit MI office	0.67	Miles	40	24	$643.20

DATA COLLECTION (2 trips arch, 1 trip Mech/plumbing, 1 trip elec) = 4
SD - DD (3 trips arch) = 3
BIDDING (2 trips arch) = 2
C.A. (1 Pre-Con, 8 bi-weekly site visits/progress mettings, 1 Sub Comp arch, 1 Final Comp Arch) = 11
(1Sub Comp MP - 1 Final Comp MP) (1 Sub Comp Elec - 1 Final Comp Elec) = 4

Travel Subtotal: **$643.20**

(Above # of visits coordinated with Proposal dated 5.22.2024)

Total: **$91,443.20**

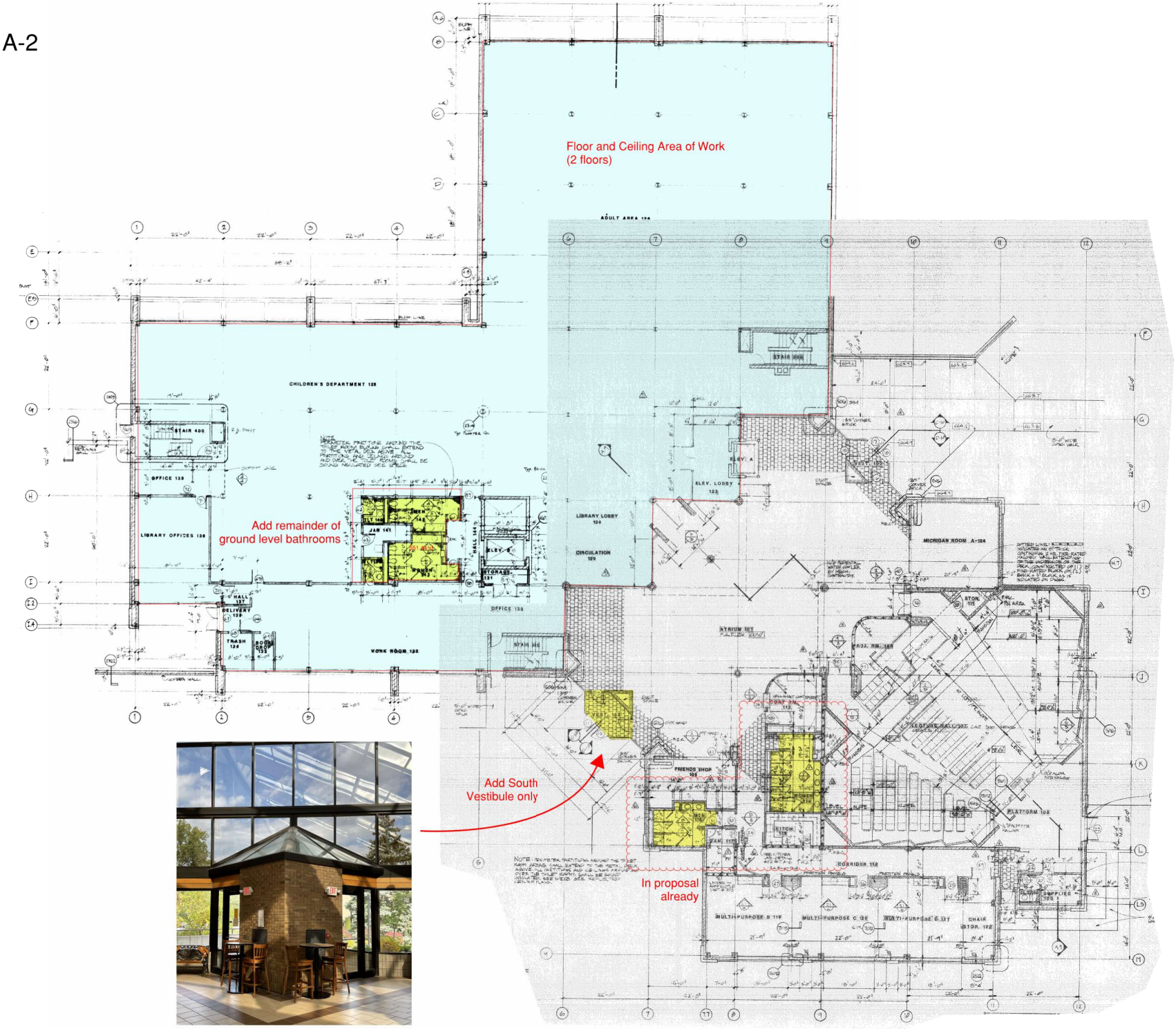
SUGGESTED ADD OPTION AS OF 5.22.2024

1 Renovation of Second Floor Toilets - directly above added scope (Column lines 4-6 / H-I)
- Toilets in same condition - recommend relocating 2nd level plumbing/prior to finishing ground level

WG1	Arch Project Architect	$125.00	15.00	$1,875.00
WG1	Arch Senior Designer	$125.00	35.00	$4,375.00
WG1	Mech/Elec/Plumb Engineer III	$141.00	40.00	$5,640.00
		Add Total:	90.00	**$11,890.00**

Total if Add Accepted **$103,333.20**

Exhibit A-2


Floor and Ceiling Area of Work
(2 floors)
Add remainder of
ground level bathrooms
Add South
Vestibule only
In proposal
already
CHILDREN'S DEPARTMENT 128
ADULT AREA 104
LIBRARY OFFICES 138
WORK ROOM 132
LIBRARY LOBBY
CIRCULATION
ELEV. LOBBY
MICHIGAN ROOM A-104
ATRIUM 101
FRIENDS SHOP
CORRIDOR 112
PLATFORM 108
MULTI-PURPOSE B 119
MULTI-PURPOSE C 120
MULTI-PURPOSE D 121

certain fees and charges for activities at the Livonia Senior Citizen Center and Greenmead, as well as league athletic play, and outdoor activities and rentals, the Council does hereby refer this item to the Committee of the Whole for its report and recommendation.

A communication from the Director of Finance, dated December 7, 2020, re: request to enter into agreements through Qualification Based Selection (QBS) Process for as-needed architectural services, was received and placed on file for the information of the Council.

On a motion by McCullough, supported by Toy, and unanimously adopted, it was:

#378-20 RESOLVED, that having considered a communication from the Director of Finance, dated November 13, 2020, which bears the signatures of the Superintendent of Public Service and the Director of Public Works, and is approved for submission by the Mayor, to which is attached four (4) proposed agreements to be entered into through the Qualification Based Selection (QBS) process between the City of Livonia and Detroit Architectural Group, DLZ Michigan, Inc., Hubbell, Roth & Clark, Inc., and OHM Advisers, to provide as-needed architectural services, THE COUNCIL DOES HEREBY DETERMINE AS FOLLOWS:

1. Authorize the Mayor and City Clerk to enter into agreements with the following architectural firms to provide as-needed architectural services:

   - Detroit Architectural Group, 1644 Ford Avenue, Wyandotte, MI 48192
   - DLZ Michigan, Inc., 607 Shelby Street, Detroit, MI 48226
   - Hubbell, Roth & Clark, Inc., 555 Hulet Drive, Bloomfield Hills, MI 48302
   - OHM Advisors, 34000 Plymouth Road, Livonia, MI 48150;

2. Approve fees for preparing the scope of work for each project to be based on the firm's hourly rates;

3. Authorize the administration to award design, bid and construction services to the firm submitting the low qualified not-to-exceed quote for each project, with the exception that City Council approval be obtained prior to any architectural design services being performed on all projects with an estimated construction cost exceeding $500,000; and

4. Authorize the Director of Public Works or his or her designee to request that any or all of these firms provide ad-hoc services such as capital

planning, budget prioritization, space needs analysis, programming and asset condition studies at their hourly rates, so long as the estimated construction cost does not exceed $500,000.

FURTHER, the Council does hereby determine that these services will be paid from budgeted funds allocated for each project. Ad-hoc services, if any, will be paid from the budgeted contractual services account of the appropriate Fund; and the Mayor and City Clerk are hereby authorized to execute the aforesaid agreements, approved as to form and substance by the Department of Law, for and on behalf of the City of Livonia, with Detroit Architectural Group, DLZ Michigan, Inc., Hubbell, Roth & Clark, Inc., and OHM Advisers and to do all things necessary or incidental to the full performance of this resolution.

A communication from Susan Harvey, Senior Vice President, Ashley Capital, dated November 19, 2020, re: enclosing a revised Brownfield Plan and a revised Disbursement and Reimbursement Agreement, was received and placed on file for the information of the Council.

Site drawings received by Ashley Capital, re: Livonia West Commerce Center – Building 2 (Amrhein Rd and Eckles Rd), were received and placed on file for the information of the Council.

On a motion by Jolly, supported by Toy, it was:

#379-20 RESOLVED, that having considered a communication from the Livonia Brownfield Redevelopment Authority, dated October 29, 2020, approved for submission by the Mayor, which transmits its resolution no. 12-2020, adopted on October 28, 2020, and a communication from Susan Harvey, Senior Vice President, Ashley Capital, dated November 19, 2020, and the Council having conducted a Public Hearing with regard to this matter on November 23, 2020, the Council does hereby approve the revised Brownfield Plan for the Livonia West Commerce Center 2 Redevelopment, 12950 and 13100 Eckles Road, dated November 18, 2020 (Version 1.9a), submitted by Ashley Capital, together with exhibits and schedules thereto, in the manner and form herein submitted, subject to approval as to form and substance by the City's Law Department.

President McIntyre passed the gavel to Vice President Bahr at 7:42 p.m. in order to speak on this matter.

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

15. AWARD OF CONTRACT: Engineering Division, re: for Phase 3 of the DPW Security Camera Installation, from budgeted funds. (CR 148-22 and 273-23)

    David Lear, Assistant City Engineer, presented the request to Council.

    Councilmember Jolly asked if there would be a direct feed to the Police Department.

    Mr. Lear said he believes it does but is not positive.

    Councilmember Jolly offered an approving motion for the Consent Agenda.

    DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

15.

Engineering
May 23, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	David Lear, Assistant City Engineer

AGENDA ITEM

AWARD OF CONTRACT: Engineering Division, re: for Phase 3 of the DPW Security Camera Installation, from budgeted funds. (CR 148-22 and 273-23)

BACKGROUND DETAILS

In an ongoing attempt to secure the City of Livonia DPW complex (12973 Farmington Road) from theft and vandalism, we have installed new fencing and security cameras over the past couple of years. Results from the first two phases of the security measures have seen a dramatic decrease in thefts and vandalism.

While the first two phases of the project focused on the DPW Administration building and the northern and western boundaries of the site (the areas abutting the commercial building parking lots) where we have seen the most breaches in the existing fencing, the next phase will focus on the southern boundary. We have already replaced most of the fencing along the southern boundary, and would now like to add the security cameras to monitor the fence line, as well as fill in blind spots within the complex.

Advanced Satellite Communications (ASC), a Livonia-based company, was selected as the vendor for the first two phases of camera installations due to their familiarity with the system, and to be able to seamlessly integrate with the systems already in use by the DPW as well as by other departments within the City. In support of the ASC work, RCI Electric Company (approved vendor for general electrical services #148-22) will be providing conduit and electrical services.

The proposed work will include the installation of 6 additional cameras and the associated hardware, cabling and programming needed to add the cameras to our existing systems. Total costs for the proposed installations will be $50,158.28, $40,513.28 for ASC and $9,645.00 for RCI, based on the included cost proposals.

Based on the above information, it is recommended that the Council proceed as follows:

- Waive the formal bidding process under Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended, since no advantage to the City would result from competitive bidding.

- Award a contract for $40,513.28 to Advanced Satellite Communications, 12137 Merriman Road, Livonia, Michigan 48150 for the installation of 6 new security cameras, as well as associated hardware and programming.

- Award a contract for $9,645.00 to RCI Electric Company, 4999 McCarthy Drive, Milford, Michigan 48381 for the conduit and cabling installation in support of the ASC work.

- Authorize an appropriation and expenditure in the amount of $50,158.28 for Phase 3 of the DPW Security Camera Installation project from budgeted funds in account No. 401-000-971-000.

- Authorize the City Engineer to approve minor adjustments in the work, as required.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Based on the above information, it is recommended that the Council proceed as follows:

- Waive the formal bidding process under Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended, since no advantage to the City would result from competitive bidding.

- Award a contract for $40,513.28 to Advanced Satellite Communications, 12137 Merriman Road, Livonia, Michigan 48150 for the installation of 6 new security cameras, as well as associated hardware and programming.

- Award a contract for $9,645.00 to RCI Electric Company, 4999 McCarthy Drive, Milford, Michigan 48381 for the conduit and cabling installation in support of the ASC work.

- Authorize an appropriation and expenditure in the amount of $50,158.28 for Phase 3 of the DPW Security Camera Installation project from budgeted funds in account No. 401-000-971-000.

- Authorize the City Engineer to approve minor adjustments in the work, as required.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

n/a

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

$50,158.28 ($40,513.28 for ASC and $9,645.00 for RCI)

DETAILED WORK BEING PERFORMED

Installation of six (6) additional cameras and the associated hardware, cabling and programming needed to add the cameras to our existing systems.

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

$50,158.28 from budgeted funds in Account No. 401-000-971-000

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Advanced Satellite Communications (ASC), a Livonia-based company, was selected as the vendor for the first two phases of camera installations due to their familiarity with the system, and to be able to seamlessly integrate with the systems already in use by the DPW as well as by other departments within the City and RCI Electric Company is the approved vendor for general electrical services. Per Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended and the above information, we believe that no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. ASC Quote 05-22-24
2. RCI Work Estimate 05232024
3. CR 148-22
4. CR 273-23

APPROVED BY

David Lear, Assistant City Engineer — Date: May 23, 2024

Don Rohraff, Director of Public Works — Date: May 23, 2024

Debra Peck Lichtenberg, CPA, Finance Director — Date: May 28, 2024

Maureen Miller Brosnan, Mayor — Date: May 28, 2024

Advanced Satellite Communications, Inc.
A.S.C. Security Systems

2024 Multisensor Security Camera Installation

Quote #002261 v3

Prepared For:	Prepared by:	Date Issued:
Livonia DPW	**Advanced Satellite Communications**	**05.22.2024**
Dave Lear 12973 Farmington Rd Livonia, MI 48150	Adam Barber 12137 Merriman Road Livonia, MI 48150	Expires: **07.31.2024**
P: (734) 466-2608 **E:** dlear@ci.livonia.mi.us	**P:** 734-793-1423 **E:** abarber@advancedsat.com	

Scope of Work

Purpose:

- Expand the Security Camera Coverage within the DPW Yard and Drive-ups

Project Summary:
This proposal provides for the installation of (5) Avigilon Multisensor Security Cameras and (1) Avigilon Dual Sensor Camera at various locations throughout the yard to see the drives and areas where vandalism and break-ins are common. For this installation, cabling will be run on the inside of the fleet maintenance building and the old DPW Building. The City's network will be utilized to connect the cameras to the existing Avigilon video server. A new camera pole will be installed in the yard to extend the camera coverage to areas susceptible to break-ins. The network drop at the Stark Rd. gate will be expanded with a hardened switch to accommodate additional camera coverage.

Scope of Work:

A.S.C. Technicians to complete the following installation tasks:

Pre-installation Site Survey:

- Walk-through site with to verify desired camera locations and views.
- Plan camera placement to cover the desired area effectively while considering factors like visibility, wiring accessibility, and potential obstructions.
- Determine position of network equipment.
- Verify that there is adequate power and network connectivity available for the chosen mounting locations.

Camera Network:

- Install (1) NEMA Enclosure with built-in cooling fan and 110VAC outlet.
- Install (1) 5-port Hardened Switch at Stark Rd. Gate Pole.
- Install (1) POE Extender (Camera, Base, and Power Supply)

Camera Mounting:

- Remove the existing analog cameras being replaced.
- Install (6) Avigilon IP Security Cameras
    - (1) 180-degree Dual Head Dome Camera Analytic Capable.
    - (4) Cameras have a 270 Degree Viewing angle (3 Camera Lenses)
    - (1) Camera has a 360 Degree Viewing angle (4 Camera Lenses)
- Securely mount the cameras using appropriate mounting brackets.

Camera Pole Installation

- Install (1) 16ft Strong Pole as show on the diagram along the North Fence line.

Advanced Satellite Communications, Inc.
A.S.C. Security Systems

Scope of Work

Cable Installation:

- Run (5) Cat6 cable drops from the cameras/Wireless Bridge to the nearest network POE Switch.
- Ensure proper cable management to prevent strain on connections and cable damage.
- Conceal cables where possible to prevent tampering and maintain aesthetics. Use cable clips or conduit to secure and protect cables along their path.

Camera Connection & Programming:

- Install (5) Avigilon ACC-7 Enterprise Licenses on the existing Recording Appliance.
- Connect the cameras to the recording device. Verify that the cameras are receiving power and are accessible on the network.
- Access the camera's management software to configure settings such as resolution, frame rate, motion detection, and recording preferences.
- Program Analytic rules to capture activity afterhours in the yard. (Analytic Alarms)

Testing:

- Perform a thorough functionality test to ensure that each camera is capturing footage correctly.
- Check for any issues with video quality, motion detection, or connectivity.
- Verify that the cameras are recording footage as expected.

Final Adjustments:

- Fine-tune camera angles and settings as necessary to optimize coverage and minimize blind spots.

Documentation:

- Document the installation details, including camera locations.
- Provide any necessary training to the end user on how to operate and maintain the camera system.

Cleanup:

- Remove any packaging materials, debris, or equipment from the installation site.
- Ensure that the area is left clean and orderly.

If you have any questions, please feel free to reach out to me at abarber@advancedsat.com

Customer's Responsibilities

Customer to provide:

- Clear paths for wire runs inside of buildings
- Network Connection in each building with cameras directly attached to the exterior
- Installation of a Camera Pole Footing where the camera will be installed along the north fence line and a cat6 cable run in conduit from the nearest building with a network connection.

Advanced Satellite Communications, Inc.
A.S.C. Security Systems

Network and Cabling

Product Description	Qty
CAT6 (Plenum Solid Yellow)	600
CAT6 Direct Burial 23/4PR SOL 550MHZ Black	1000
RJ45, CAT6 Connector	1
Velcro, 1/2 in X 50 FT, Black	1
Misc. Mounting Hardware	4
2" J Hooks with Spring BC Beam Clamp Swivel	50
SealTite Flex Conduit and Fittings	1
Lift Rental	1
Altelix 14x12x8 Fiberglass Vented & Heated Weather	1
Pole Mount / Flange Mount Kit for Altelix NEMA Enclosures	1
Switch (Ethernet, Hardened, 5 Port, POE+)	1
Power Supply (For Hardened Switch)	1
Subtotal:	**$3,417.63**

Advanced Satellite Communications, Inc.
A.S.C. Security Systems

Avigilon Camera Devices

Product Description	Qty
Avigilon 4X5MP H5 Multisensor Camera. 360 Degree. Analytic	1
Avigilon 3x5MP H5 Multisensor Camera. 270 Degree. Analytic	4
Pendant Mount Adapter for H4 Multisensor	5
Outdoor Dome Cover for H4 Multisensor	5
Wall Arm for H4 IRPTZ or H4 Multisensor	5
Multi Sensor IR Illuminator Ring, (100ft)	5
POE Injector (POE++, 60watt)	5
Corner mount adapter for use with multisensor camera	4
Avigilon 2X 5MP H5A Dual Head Outdoor Camera	1
Pendant Adapter for H5A Dual Head Camera	1
Wall Mount for H5A Dual Head Camera	1
ACC7 Enterprise Edition Camera License	6
Avigilon Pole Mount Adapter	2
Subtotal:	**$23,255.16**

Advanced Satellite Communications, Inc.
A.S.C. Security Systems

Camera Pole

Product Description	Qty
Security Camera Pole (16ft. Steel)	1
Pole Mounting Jig for Strong Poles	1
Misc. Materials	1
Veracity VPSU-57V-800 HIGHWIRE PowerStar BASE Power Supply,	1
Veracity Longspan Max Base Unit. POE Extender	1
Veracity Longspan Max Camera Unit with Ext. Housing. POE Ext	1
Subtotal:	**$3,606.49**

Installation Services

Product Description	Qty
Labor Fee: Installation, Configuration and Activation	**1**
Subtotal:	**$9,984.00**

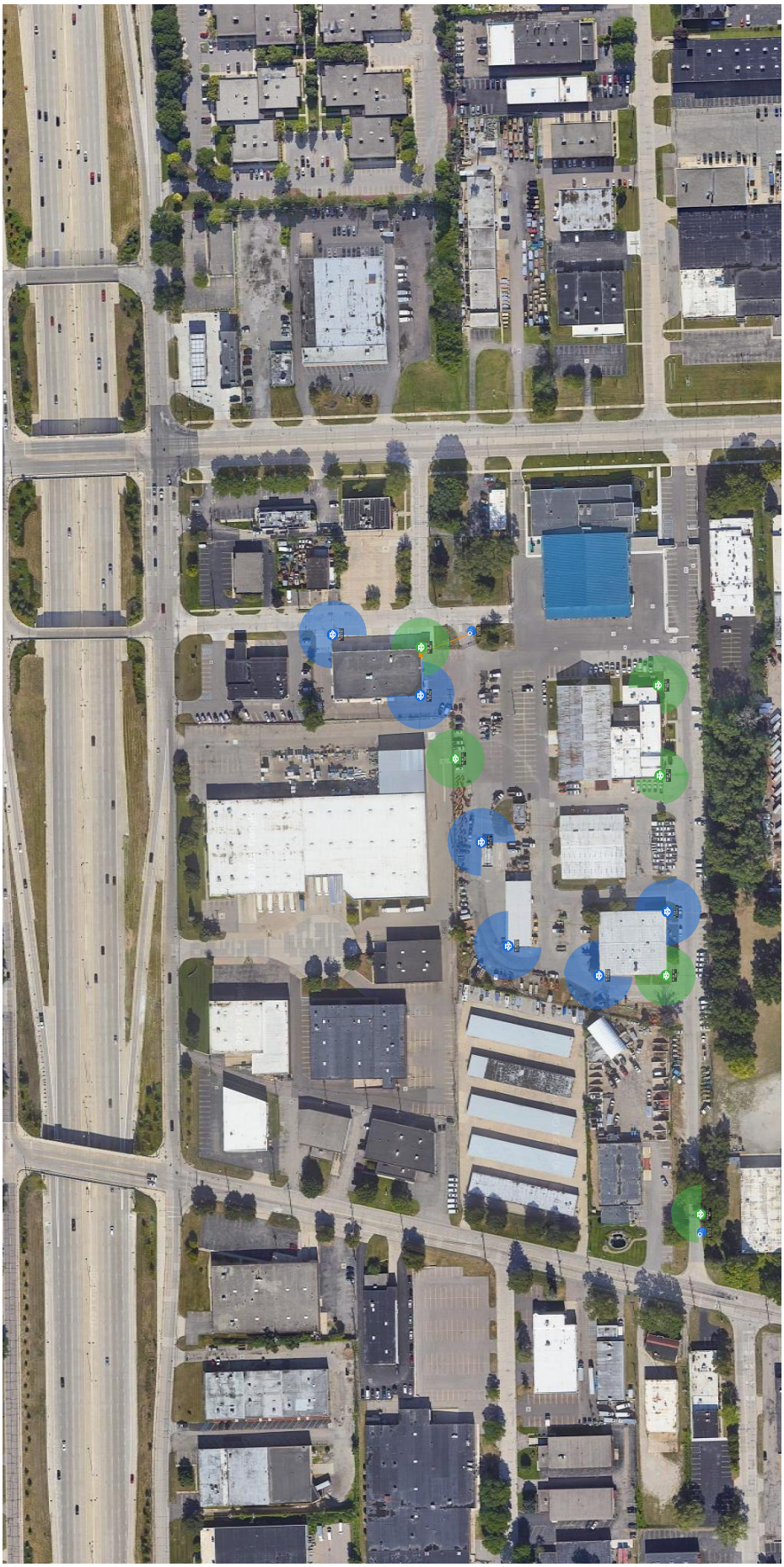
Quote Summary	Amount
Network and Cabling	$3,417.63
Avigilon Camera Devices	$23,255.16
Camera Pole	$3,606.49
Installation Services	$9,984.00
Subtotal:	**$40,263.28**
Shipping:	**$250.00**
Total:	**$40,513.28**

Customer understands that any additional fees that may be incurred to comply with all applicable building codes, zoning ordinances or any other permits needed for installation is their responsibility. Further, reference to Plug and Play is defined herein as utilization of pre-existing cable distribution system for entire property, as is. Delays or distractions caused by customer during installation or service may be billed additionally upon written order to customer. Any alteration or deviation from above quoted specifications involving extra cost will be executed only upon written orders and will become an extra charge over and above this quotation. This is the entire agreement, and no additional services or promise of performance is implied that is not contained herein. Acceptance of quotation - all terms and conditions as written are a part hereof and are binding upon the parties hereto. A.S.C. retains the right to substitute parts of equal or better value to complete a functional system. Upon clients written approval A.S.C. may access clients system(s) for virtual maintenance, trouble shooting and reporting functions. A.S.C. may refer to clients name in various marketing materials unless prohibited by client. A.S.C. shall have no liability for any personal injury, property damage or other loss based on any claim at all including a claim the product failed to perform. A.S.C. will bill after functional completion of the job and expect payment due within the terms stated on this proposal.The Company reserves the right to send the account to a third party for collection. It is understood and agreed that The Company may do so for the entire amount remaining on the contract plus any collection costs incurred in the process. Note: Finance charges of 1.5% per month added to past due invoices. All products shown herein remain the property of A.S.C. until paid in full. Prices contained in this quotation shall be considered firm for a period of (30) days from the date of quotation unless otherwise stated herein. A.S.C. will charge a restocking fee of 20% on all returned or cancelled merchandise. All purchases placed on a credit card for orders over $2,000. may incur a 2.5% service charge. ATTORNEYS' FEES. In the event of any litigation or arbitration between the parties with respect to this Agreement, the prevailing party shall be entitled to recover reasonable attorneys' fees and costs of litigation, as the court or tribunal may determine.

Acceptance

Advanced Satellite Communications	**Livonia DPW**
Adam Barber	Dave Lear
Signature / Name	Signature / Name Initials
05/22/2024	
Date	Date

Livonia DPW-Satellite View - May 9th, 2024



RCI ELECTRIC COMPANY

4999 McCarthy Dr.
Milford, Michigan 48381
(248) 471-2277 FAX (248) 471-6550

Estimate

Date: May 23, 2024 **Estimate #:** 2024007

Customer: City of Livonia

Attn: Dave Lear

Project Location: Livonia DPW Yard – Camera Installation Project Electrical Work

Description

Provide equipment, labor, and materials necessary for electrical work on the DPW Yard Camera Installation project per information provided. Specific items included in this estimate are as follows:

1. Verify (2) conduit sleeves installed by DPW from the vehicle maintenance building to the utility pole area are usable.
2. Provide and install (1) outdoor rated pull box on the vehicle maintenance building end of the (2) conduit sleeves, core wall and install a conduit sleeve through the wall to another pull box in the building interior. Install a conduit stub from the interior pull box to bar joist area.
3. Excavate conduits at the utility pole area, rework conduits as required, and install an outdoor pull box with support structure.
4. Provide equipment, labor and materials to trench +/- 50' to new camera pole location, install 1" conduit from the new utility pole area pull box to the new camera pole location, backfill trench, and remove any spoils. <u>This is base bid scope of work, see add cost option below for pole base work</u>.
5. Provide and install a 120 volt duplex receptacle, fed from a local circuit, for PoE extender power where / if required.

Base Project Cost: $5,340.00

<u>Add Cost Options</u>

1. Provide and install (1) pre-cast pole base for the new camera pole provided by others. Work includes auguring the pole base hole, installation of the pole base, stone backfill for the pole base and removal of spoils.

   Provide and Install Pole Base Cost: ADD $2,475.00

2. Provide and install OUTDOOR rated CAT6 cable, cable supports for the interior cable run, RJ45 terminations on each end of the cable and a lift required to access ceiling areas for cable installation. The ASC quote seemed to indicate that they wanted us to provide and install the CAT6 cable from the network connection point / PoE extender(?) to the pole.

   Provide and Install CAT6 Cable Cost: ADD $1,830.00

Estimated By: Frank Struble
RCI Electric

#148-22 RESOLVED, that having considered the report and recommendation of the Director of Public Works, dated March 31, 2022, which bears the signatures of the Director of Finance and the City Attorney, and is approved for submission by the Mayor, the Council does hereby authorize a two-year contract, for the period April 1, 2022 through March 31, 2024, with an optional third year extension upon mutual consent, with RCI Electric, 4999 McCarthy Dr., Milford, MI 48381, for completing all work required in connection with the street light and general electrical maintenance at all City buildings and facilities and parking lots and athletic and street light electrical maintenance at City-owned ball diamonds, parking lots, parks, and miscellaneous City facilities and along the Plymouth Road corridor, at the unit prices bid, at an estimated annual amount of $291,975.00, the same having been the sole bid received and meets all specifications; FURTHER, the Council does hereby authorize an expenditure in an amount not to exceed $291,975.00 from funds already budgeted in various departmental contractual services accounts for this purpose; and the Mayor and City Clerk are hereby authorized for and on behalf of the City of Livonia to execute a contract with RCI Electric, subject to approval as to form and substance by the Department of Law, and to do all other things necessary or incidental to the full performance of this resolution.

#149-22 RESOLVED, that having considered the report and recommendation of the Assistant Director of Public Works, dated April 7, 2022, which bears the signatures of the Director of Public Works and the Director of Finance, and is approved for submission by the Mayor, the Council does hereby accept the bid of Trugreen, 48932 Wixom Tech Dr., Wixom, MI 48393 for performing all services required in connection with the portion of the City of Livonia's 2022 and 2023 Vegetation Control Program relating to the major county road medians, the City buildings and sports fields, for a total amount not to exceed $29,025.08 ($14,512.54 annually); FURTHER, the Council does hereby accept the bid of Green World, 1401 Souter Blvd., Troy, MI 48083, for performing all services required in connection with the portion of the City of Livonia's 2022 and 2023 Vegetation Control Program relating to the maintenance of the Schoolcraft Fence Line and retention pond vegetation control, for a total amount not to exceed $10,500.00 ($5,250.00 annually); the same having been in fact the lowest bids received which meet all specifications; FURTHER, the Council does hereby authorize an annual expenditure in an amount not to exceed $14,512.54 from funds budgeted in Account No. 101-524-818-000 payable to Trugreen, 48932 Wixom Tech Dr., Wixom, MI 48393 and an annual expenditure in an amount not to exceed $4,670.00 from funds budgeted in Account No. 101-463-818-000 payable to Green World, 1401 Souter Blvd., Troy, MI 48083, for this purpose; and the Mayor and City Clerk are hereby authorized to execute contracts for and on behalf of the City of Livonia with Trugreen and Green World and to do all things necessary or incidental to the full performance of this resolution.

10. Pursuant to Section 13.13 of the Livonia Zoning Ordinance, this approval is valid for a period of one (1) year only from the date of approval by City Council, and unless a permit is obtained, this approval shall be null and void at the expiration of said period.

#272-23 RESOLVED, that having considered a communication from the City Planning Commission, dated July 31, 2023, which transmits its resolution #07-51-2023, adopted on July 25, 2023, with regard to Petition 2023-06-08-05 submitted by The Blain Group, requesting to install an array of ground-mounted solar panels in the parking lot of the Cambridge Office Center at 38777 Six Mile Road, located on the south side of Six Mile Road between the I-275/96 Expressway and Haggerty Road in the Northwest ¼ of Section 18, the Council does hereby waive Section 7.25(1)(b) of the Zoning Ordinance limiting total system production to 10kW.

#273-23 RESOLVED, that having considered the report and recommendation of the Director of Public Works, dated August 4, 2023, which bears the signature of the Director of Finance, and is approved for submission by the Mayor, the Council does hereby accept the quote submitted by Advanced Satellite Communications, Inc. (ASC), 12137 Merriman Road, Livonia, MI 48150 for the purchase and installation of six (6) Avigilon multi-sensor security cameras and one (1) video intercom for the Stark Road entrance to the DPW yard at a cost not to exceed $39,846.68, and the required electrical service upgrades by RCI Electric, 4999 McCarthy Dr., Milford, MI 48381 (the approved vendor for general electrical services pursuant to CR# 148-22, adopted on May 2, 2022) at a cost not to exceed $5,350.00, for a total amount not to exceed $45,196.68; FURTHER, the Council does hereby authorize an expenditure in an amount not to exceed $45,196.69 from Account No. 401-000-971-000 for this purpose; and the Mayor and City Clerk are hereby authorized to execute a contract, approved as to form and substance by the Department of Law, for and on behalf of the City of Livonia with the aforesaid vendors and to do all other things necessary or incidental to the full performance of this resolution; FURTHER, the Council does hereby authorize such action without competitive bidding for the reasons indicated in the aforesaid communication, and such action is taken in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended.

#274-23 RESOLVED, that having considered the report and recommendation of the City Engineer, dated August 9, 2023, which bears the signatures of the Director of Public Works, the Director of Finance and the City Attorney, and is approved for submission by the Mayor, the Council does hereby accept the unit price bid of Motor City Fence, 209 South Blvd. E., Rochester Hills, MI 48307 for performing all work required in connection with the DPW fencing replacement project in an amount not to exceed amount of $98,191.40, based on the Engineering Division's

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

16. REQUEST TO AMEND COUNCIL RESOLUTION 017-24: Department of Law, re: to designate the Director of Finance, Debra Peck Lichtenberg, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority.

    President McCullough presented the request to Council.

    Councilmember Jolly offered an approving motion for the Consent Agenda.

    DIRECTION APPROVING CONSENT

LETTER TO THE LIVONIA CITY COUNCIL

16.

Law
May 23, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Carter Fisher, City Attorney

AGENDA ITEM

REQUEST TO AMEND COUNCIL RESOLUTION 017-24: Department of Law, re: to designate the Director of Finance, Debra Peck Lichtenberg, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority.

BACKGROUND DETAILS

Honorable Members of the City Council,

In consideration of Mike Slater's retirement, Council Resolution No. 017-24 will need to be amended to designate the City's new Director of Finance, Debra Peck Lichtenberg, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority. Therefore, it is respectfully recommended that Council Resolution No. 017-24 be amended to read as follows:

RESOLVED, that having considered a communication from the Department of Law, dated May 23, 2024, which bears the signature of the Director of Finance, and is approved for submission by the Mayor, wherein it is requested that Council Resolution 017-24, adopted on January 17, 2024, be amended to designate the new Director of Finance, Debra Peck Lichtenberg, in place of Michael T. Slater, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority, the Council does hereby amend and revise Council Resolution 017-24, so as to read as follows:

(Designation of Council representative for MMRMA)

#017-24 RESOLVED, that having considered the report and recommendation of the Committee of the Whole, dated January 3, 2024, submitted pursuant to Council Resolution 498-05, regarding the Annual Meeting of the Michigan Municipal Risk Management Authority, THE COUNCIL DOES HEREBY DESIGNATE THE DIRECTOR OF FINANCE, DEBRA PECK LICHTENBERG, AS THE OFFICIAL REPRESENTATIVE AND VOTING REPRESENTATIVE OF THE CITY OF LIVONIA AND DOES FURTHER DESIGNATE LAURA M. TOY AS THE ALTERNATE ON A CONTINUING BASIS, OR UNTIL FURTHER ORDER OF THIS COUNCIL BY COUNCIL RESOLUTION.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

RESOLVED, that having considered a communication from the Department of Law, dated May 23, 2024, which bears the signature of the Director of Finance, and is approved for submission by the Mayor, wherein it is requested that Council Resolution 017-24, adopted on January 17, 2024, be amended to designate the new Director of Finance, Debra Peck Lichtenberg, in place of Michael T. Slater, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority, the Council does hereby amend and revise Council Resolution 017-24, so as to read as follows:

(Designation of Council representative for MMRMA)

#017-24 RESOLVED, that having considered the report and recommendation of the Committee of the Whole, dated January 3, 2024, submitted pursuant to Council Resolution 498-05, regarding the Annual Meeting of the Michigan Municipal Risk Management Authority, THE COUNCIL DOES HEREBY DESIGNATE THE DIRECTOR OF FINANCE, DEBRA PECK LICHTENBERG, AS THE OFFICIAL REPRESENTATIVE AND VOTING REPRESENTATIVE OF THE CITY OF LIVONIA AND DOES FURTHER DESIGNATE LAURA M. TOY AS THE ALTERNATE ON A CONTINUING BASIS, OR UNTIL FURTHER ORDER OF THIS COUNCIL BY COUNCIL RESOLUTION.

ATTACHMENTS

1. Letter to Council Re CR 017-24
2. CR 017-24

APPROVED BY

Carter Fisher, City Attorney — Date: May 23, 2024

Debra Peck Lichtenberg, CPA, Finance Director — Date: May 28, 2024

Maureen Miller Brosnan, Mayor — Date: May 28, 2024

DEPARTMENT OF LAW

JAMES CARTER FISHER
City Attorney

MICHAEL E. FISHER
Chief Assistant City Attorney

ERIC S. GOLDSTEIN
Assistant City Attorney

LEO D. NEVILLE
Assistant City Attorney

33000 CIVIC CENTER DRIVE
LIVONIA, MICHIGAN 48154-3097
(734) 466-2520
FAX: (734) 466-2072

MAUREEN MILLER BROSNAN
MAYOR

TO: Honorable Members of the City Council

FROM: Department of Law

DATE: May 23, 2024

SUBJECT: REQUEST TO AMEND COUNCIL RESOLUTION 017-24: Law Department, re: to designate the Director of Finance, Debra Peck Lichtenberg, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority

Dear Council Members:

In consideration of Mike Slater's retirement, Council Resolution No. 017-24 will need to be amended to designate the City's new Director of Finance, Debra Peck Lichtenberg, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority. Therefore, it is respectfully recommended that Council Resolution No. 017-24 be amended to read as follows:

RESOLVED, that having considered a communication from the Department of Law, dated May 23, 2024, which is approved for submission by the Mayor, wherein it is requested that Council Resolution 017-24, adopted on January 17, 2024, be amended to designate the new Director of Finance, Debra Peck Lichtenberg, in place of Michael T. Slater, as the official representative and voting representative of the City of Livonia at the Annual Meeting of the Michigan Municipal Risk Management Authority, THE COUNCIL DOES HEREBY AMEND AND REVISE COUNCIL RESOLUTION 017-24, SO AS TO READ AS FOLLOWS:

(Designation of Council representative for MMRMA)

#017-24 RESOLVED, that having considered the report and recommendation of the Committee of the Whole, dated January 3, 2024, submitted pursuant to Council Resolution 498-05, regarding the Annual Meeting of the Michigan Municipal Risk Management Authority, THE COUNCIL DOES HEREBY DESIGNATE THE DIRECTOR OF FINANCE, DEBRA PECK LICHTENBERG,

AS THE OFFICIAL REPRESENTATIVE AND VOTING REPRESENTATIVE OF THE CITY OF LIVONIA AND DOES FURTHER DESIGNATE LAURA M. TOY AS THE ALTERNATE ON A CONTINUING BASIS, OR UNTIL FURTHER ORDER OF THIS COUNCIL BY COUNCIL RESOLUTION.

#017-24 RESOLVED, that having considered the report and recommendation of the Committee of the Whole, dated January 3, 2024, submitted pursuant to Council Resolution 498-05, regarding the Annual Meeting of the Michigan Municipal Risk Management Authority, the Council does hereby designate the Director of Finance, Michael T. Slater, as the official representative and voting representative of the City of Livonia and does further designate Laura M. Toy as the alternate on a continuing basis, or until further order of this Council by council resolution.

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

7. AWARD OF CONTRACT: Inspection Department, re: for BS&A Cloud-based software, licensing and training, for a total amount of $249,480.00, with a not-to-exceed annual increase of 5%, from budgeted funds.

   Jerome Hanna, Director of Inspections, presented the request to Council.

   Vice President Ptashnik asked if we will be increasing cyber security and if there will be cost savings due to less server interaction.

   Steve Rennell, BS&A Software Account Executive, explained BS&A has cyber security experts and rely on Microsoft Cyber Security as well. He indicated it is their company's responsibility to provide cyber security.

   Casey O'Neil, Information Services Director, indicated this will take some burden off both city hardware and his staff.

   Councilmember Donovic offered an approving motion for the Regular Agenda.

   DIRECTION APPROVING REGULAR

LETTER TO THE LIVONIA CITY COUNCIL

7.

Inspection
May 20, 2024

MEETING DATE	PRESENTED BY
S060324	Jerome Hanna, Director of Inspection

AGENDA ITEM

AWARD OF CONTRACT: Inspection Department, re: for BS&A Cloud-based software, licensing and training, for a total amount of $249,480.00, with a not-to-exceed annual increase of 5%, from budgeted funds.

BACKGROUND DETAILS

I request that Council review and approve upgrading the City of Livonia Departments to BS&A Cloud-based software from the current BS&A software.

The Inspection Department contracted with BS&A software in 2002. This major change improved our record keeping, record retention, and efficiency. The Assessing Department, Clerks Department, and Treasurer Department currently use BS&A software. The Finance Department is also interested in using BS&A Cloud's financial management portion.

BS&A Cloud software offers a comprehensive suite of tools tailored specifically for municipal management, including financial management, property assessments and tax administration, permitting, licensing, utility billing, and more. By implementing this software, we can streamline our administrative processes, improve efficiency, and enhance the delivery of our services to our customers.

Furthermore, BS&A Cloud software is known for its user-friendly interface and great support services, which will facilitate a smooth transition for our staff and ensure maximum utilization of the software capabilities.

In addition to operational efficiencies, investing in BS&A Cloud software will enable us to manage our finances better, increase security and backup redundancy, and make better data-driven decisions for the benefit of our community. BS&A has continually worked to upgrade its system, which is another step forward in improving how we conduct business within the city and with our customers.

Following is a list of components and estimated costs as proposed:

Upgrade – Cloud Modules – Annual Fee	$126,120.00
New Purchase – Cloud Modules – Annual	$ 32,640.00

Fee	
Data Conversions/ Database Setup	$ 4,320.00
Project Management and Implementation Planning	$ 24,800.00
Implementation and Training	$ 52,800.00
Remote Post – Go Live Assistance	$ 4,800.00
Total Proposed	$ 249,480.00

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

1. Authorize the Mayor and City Clerk to execute a contract with BS&A Software, Inc., 14965 Abbey Lane, Bath, MI 48808, for software licensing and training for Inspection, Assessing, Treasurer, Clerk, and Finance Departments for an amount not to exceed $249,480.00.
2. Authorize expenditure of budgeted funds in the amount of $249,480.00 from account number 101-228-986-010, Capital Outlay Computer Software
3. Authorize the annual maintenance fee agreement with BS&A Software, Inc., 14965 Abbey Lane, Bath, MI 48808, for Inspection, Assessing, Treasurer, Clerk, and Finance Departments in the amount of $158,760.00, not to exceed a 5% annual increase.
4. Authorize the Director of Information Services to make minor adjustments as needed.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

BS&A Cloud Software

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

$249,480.00

DETAILED WORK BEING PERFORMED

.

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

$249,480.00 from Account number 101-228-986-010

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

Sole-Source Provider

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): It would be of no advantage to the City as BS&A is a sole source provider

ATTACHMENTS

1. Livonia City Wayne - CLOUD Upgrade AR.CD.Propert.BSAO New GL.CR 4.2.24_SR
2. Annual Maintnenance Fee Livonia City Wayne - Customer Terms and Conditions 5.2.24_SR (002)

APPROVED BY

Date: May 22, 2024

Jerome Hanna, Director of Inspection

Date: May 22, 2024

Casey O'Neil, Information Systems Director

Date: May 24, 2024

Linda Gosselin, City Assessor

Date: May 24, 2024

Lori Miller, MiPMC, City Clerk

Date: May 24, 2024

Susan Nash, City Treasurer

Date: May 24, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 24, 2024

Carter Fisher, City Attorney

Date: May 24, 2024

Maureen Miller Brosnan, Mayor

Proposal for:

City of Livonia, Wayne County MI

April 2, 2024

Quoted by: Steve Rennell

Software and Services for BS&A Cloud Upgrade

Thank you for the opportunity to quote our software and services.

At BS&A, we are focused on delivering unparalleled service, solutions, support, and customer satisfaction. You'll see this in our literature, but it's not just a marketing strategy… it's a mindset deeply embedded in our DNA. Our goal is to provide such remarkable customer service that our customers feel compelled to remark about it.

We are extremely proud of the many long-term customer relationships we have built. Our success is directly correlated with putting the customer first and consistently choosing to ***listen****. Delivering unparalleled customer service is the foundation of our company.*

BS&A Software
14965 Abbey Lane Bath MI 48808
(855) BSA-SOFT / fax (517) 641-8960
bsasoftware.com

Cost Summary

Software is licensed for use only by municipality identified on the cover page. If used for additional entities or agencies, please contact BS&A for appropriate pricing. Prices subject to change if the actual count is significantly different than the estimated count. Module fees are charged annually and include unlimited support.

Upgrade - Cloud Modules – *Annual Fee*

Financial Management	
Accounts Receivable	**$18,635**
Community Development	
Building Department	**$32,120**
Business Licensing	**$18,915**
Property	
Assessing	**$25,280**
Tax	**$17,245**
Special Assessment	**$8,265**
Delinquent Personal Property	**$5,660**
Subtotal	**$126,120**

BS&A Online - *Fees for BS&A Online subscription services will be charged at the next renewal period.*

Community Development

Public Records Search + Online Bill Pay
With use of integrated Credit Card Processor

New Purchase - Cloud Modules - *Annual Fee*

Financial Management	
General Ledger *(Limited License)*	**$11,755**
Cash Receipting	**$20,885**
Subtotal	**$32,640**

Data Conversions/Database Setup

Database Setup:	
General Ledger (Chart of Accounts/Balances/Budget as of a Specified Date. Each additional year of 'history' balances to be setup will be an additional $1,000)	**$2,520**
Cash Receipting (Setup of Receipt Items/Tender Types)	**$1,800**
Subtotal	**$4,320**

Project Management and Implementation Planning

Services include:

- *Analyzing customer processes to ensure all critical components are addressed.*
- *Creating and managing the project schedule in accordance with the customer's existing processes and needs.*
- *Planning and scheduling training around any planned process changes included in the project plan.*
- *Modifying the project schedule as needed to accommodate any changes to the scope and requirements of the project that are discovered.*
- *Providing a central contact between the customer's project leaders, developers, trainers, IT staff, conversion staff, and other resources required throughout the transition period.*
- *Installing the software and providing IT consultation for network, server, and workstation configuration and requirements.*
- *Reviewing and addressing the specifications for needed customizations to meet customer needs (when applicable).*

$28,800

Implementation and Training

- *$1,200/day*
- *Days quoted are estimates; you are billed for actual days used*

Services include:

- *Setting up users and user security rights for each application*
- *Performing final process and procedure review*
- *Configuring custom settings in each application to fit the needs of the customer*
- *Setting up application integration and workflow methods*
- *Onsite verification of converted data for balancing and auditing purposes*
- *Training and Go-Live*

Software Setup	Days:	10		**$12,000**
Financial Management Modules	Days:	8		**$9,600**
Community Development Modules	Days:	20		**$24,000**
Property Modules	Days:	6		**$7,200**
	Total:	44	Subtotal	**$52,800**

Remote Post-Go Live Assistance

- *Review and consult on streamlining day-to-day activities as they relate to the processes within the BS&A modules*
- *Assist customers with more detailed and advanced report options available within the BS&A modules*
- *Revisit commonly-used procedures discussed during training*
- *As needs arise, provide assistance with bank reconciliations*
- *$1,200/day*
- *Days quoted are estimates; you are billed for actual days used*

Post-Go Live for all modules for which training was performed	Days:	4	**$4,800**

Cost Totals

Upgrade Modules **- *Annual Fee***	$126,120
New Modules **- *Annual Fee***	$32,640
Data Conversion/Database Setup	$4,320
New Module Project Management and Implementation Planning	$28,800
New Modules Implementation and Training	$52,800
Remote Post-Go Live Assistance	$4,800
Total Proposed	**$249,480**
Travel Expenses	*$7,365*

Travel not expected for Upgrades. Any necessary travel to be billed at a per trip and/or per day cost.

Payment Schedule

1st Payment:	**$33,120** to be invoiced upon execution of this agreement.
2nd Payment:	**$158,760** to be invoiced at activation of customer's site.
3rd Payment:	**$64,965** to be invoiced upon completion of training.

Steve Rennell, Account Executive | (855) 272-7638 | srennell@bsasoftware.com

Prices good for a period of 120 days from date on proposal

Additional Information

Program Customization

BS&A strives to provide a flexible solution that can be tailored to each municipality's needs. However, in some cases, custom work may be required. Typical examples include:

- custom payment import/lock box import
- custom OCR scan-line
- custom journal export to an outside accounting system
- custom reports

If you require any custom work, please let us know so that we can better understand the scope of your request and include that in a separate proposal.

Cash Receipting Hardware

			Quantity		Cost
Epson THM-6000V Series Receipt Printer*	$925	x	____	=	$_____
APG Series 100Cash Drawer**	$275	x	____	=	$_____
Honeywell Hyperion 1300g Linear-Imaging Scanner	$275	x	____	=	$_____
Credit Card Reader (if using Invoice Cloud)	$75	x	____	=	$_____

This will add $_____ to the Total Proposed.

******IMPORTANT. The receipt printer must be plugged into the USB port on one workstation (not your server). This printer is not to be shared with other workstations. If more than one workstation will be used for receipting, please consider purchasing more than one receipt printer.*

Please provide the number of cash drawers that will be hooked up to the printer_____

Note: The availability, model numbers, and pricing for all third party hardware listed above is subject to availability from the manufacturers. In the event that the listed hardware is no longer available at the time of purchase, a comparable replacement will be available, at the then current cost. Returns require pre-approval, and all purchased equipment must be shipped back to BS&A in its original packaging. Returns are subject to a re-stocking fee of $50.00.

Additional Training - Building Department Report Designer

Most of our Building Department customers heavily use our Report Designer, which is included free with the program. Report Designer Training is not included in the training quoted on this proposal and is highly recommended. You may attend a class at our office in Bath Township, or we can train at your location. Report Designer Training is typically completed in one day.

Please check the option you are interested in. Report Designer Training will be scheduled after successful implementation and training of your Building Department software.

___ Classroom training, $205/person/day

___ On-site training (unlimited attendees), $1,200/day, travel not included

BS&A Online

Connection Requirements

BS&A Cloud modules require a high-speed internet connection (cable modem or DSL).

Payment Processing Requirements

Acceptance of online payments requires a contract with one of BS&A's approved Online Credit Card Processing companies. Please visit https://www.bsasoftware.com/solutions/bsaonline/public-records-search/ for information.

BS&A
CUSTOMER ORDER FORM

This Customer Order Form (this "**Order**") is entered into as of the "**Effective Date**" identified below between BS&A Software, LLC, a Delaware limited liability company with offices located at 14965 Abbey Lane, Bath, MI 48808 ("**BS&A**") and the "**Customer**" identified below. Capitalized terms used but not defined in this Order have the meanings given them elsewhere in the Agreement (as defined below). BS&A and Customer may be referred to herein collectively as the "**Parties**" or individually as a "**Party**". The Parties hereby agree as follows:

Customer Name: City of Livonia, Wayne County MI	**Sponsor Contact**: [__]
Billing Address: 33000 Civic Center Dr. Livonia, MI 48154	**Sponsor Phone**: [__]
Accounts Payable Email: [__]	**Sponsor Email**: [__]

Platform and Fee Information

Effective Date: [__]	
Platform Description: Those modules and feature packs of BS&A's proprietary hosted enterprise resource planning service for managing local government functions that are identified in the Pricing Sheet. "**Usage Limitations**": ☐ *Number of Authorized Users*: [INSERT # OF SEATS] ☐ *Other*: [INSERT OTHER USAGE LIMITATIONS, IF ANY]	
"**Initial Subscription Period**": [One (1) year]	**Subscription Fees**: $158,760, payable [annually].
Professional Services (if any): $98,085	**Service Fees (if any)**:
Other Customer Terms:	

The Customer Agreement (the "**Agreement**"), made and entered into as of the Effective Date between BS&A and Customer, includes and incorporates: (i) the above Order; (ii) any Orders previously or subsequently entered into by the Parties; and (iii) the Customer Terms and Conditions, which are attached to this Order (the "**Terms and Conditions**"); (iv) the Pricing Sheet attached to this Order (the "**Pricing Sheet**"); and (v) any Statements of Work (each an "**SOW**") entered into by the parties, a form of which is attached to this Order .

BS&A SOFTWARE, LLC	**CITY OF LIVONIA**
_____	_____
Name: _____	Name: _____
Title: _____	Title: _____

EXHIBIT A

CUSTOMER TERMS AND CONDITIONS

The Parties agree as follows:

1. Definitions.

1.1 "**Authorized User**" means Customer's employees, consultants, contractors, and agents: (i) who are authorized by Customer to access and use the Platform under this Agreement; and (ii) for whom access to the Platform has been purchased hereunder.

1.2 "**BS&A IP**" means the Platform and any and all intellectual property provided to Customer or any Authorized User in connection with the foregoing. For the avoidance of doubt, BS&A IP includes Usage Data and any information, data, or other content derived from BS&A's provision of the Platform but does not include Customer Data.

1.3 "**Business Contact Data**" means Personal Information that relates to BS&A's relationship with Customer, including, by way of example and without limitation, the names and contact information of Authorized Users and any other data BS&A collects for the purpose of managing its relationship with Customer, identity verification, or as otherwise required by applicable laws, rules, or regulations.

1.4 "**Customer Data**" means information, data, and other content, in any form or medium, that is submitted, posted, or otherwise transmitted by or on behalf of Customer or an Authorized User through the Platform, including Business Contact Data; provided that, for purposes of clarity, Customer Data as defined herein does not include Business Contact Data or Usage Data.

1.5 "**Documentation**" means Company's end user documentation relating to the Platform, including any user guides.

1.6 "**Harmful Code**" means any software, hardware, or other technology, device, or means, including any virus, worm, malware, or other malicious computer code, the purpose or effect of which is to permit unauthorized access to, or to destroy, disrupt, disable, distort, or otherwise harm or impede in any manner any (i) computer, software, firmware, hardware, system, or network; or (ii) any application or function of any of the foregoing or the security, integrity, confidentiality, or use of any data processed thereby.

1.7 "**Order**" means: (i) a purchase order, order form, or other ordering document entered into by the Parties that incorporates this Agreement by reference; or (ii) if Customer registered for the Platform through BS&A's online ordering process, the results of such online ordering process.

1.8 "**Personal Information**" means any information that, individually or in combination, does or can identify a specific individual or by or from which a specific individual may be identified, contacted, or located, including without limitation all data considered "personal data", "personally identifiable information", or something similar under applicable laws, rules, or regulations relating to data privacy.

1.9 "**Platform**" 'has the meaning set forth on the Order.

1.10 "**Professional Services**" means training, migration, implementation, integration, or other professional services that are memorialized in writing in a Statement of Work and provided to Customer in connection with its use of the Platform hereunder.

1.11 "**Statement of Work**" or "**SOW**" means a written statement of work for Professional Services executed by both Parties that incorporates this Agreement by reference.

1.12 "**Subscription Period**" means the time period identified on the Order during which Customer's Authorized Users may access and use the Platform.

1.13 "**Third-Party Products**" means any third-party products provided with, integrated with, or incorporated into the Platform.

1.14 "**Usage Data**" means usage data collected and processed by BS&A in connection with Customer's use of the Platform, including without limitation test configuration metadata, activity logs, and data used to optimize and maintain performance of the Platform, and to investigate and prevent system abuse. For purposes of clarity, Customer Data is not Usage Data and Usage Data does not contain Personal Information or any other Customer Data.

1.15 "**Usage Limitations**" means the usage limitations set forth in this Agreement and the Order, including without limitation any limitations on the number of Authorized Users (if any), and the applicable product, pricing, and support tiers agreed-upon by the Parties.

2. Access and Use.

2.1 Provision of Access. Subject to and conditioned on Customer's compliance with the terms and conditions of this Agreement, including without limitation the Usage Limitations, Customer may, solely through its Authorized Users, access and use the Platform during the Subscription Period on a non-exclusive, non-transferable (except in compliance with Section 15.9), and non-sublicensable basis. Such use is limited to Customer's internal business purposes and the features and functionalities specified in the Order. Each Authorized User must have its own unique account on the Platform and Authorized Users may not share their account credentials with one another or any third party. Customer will be responsible for all of the acts and omissions of its Authorized Users in connection with this Agreement and for all use of Authorized Users' accounts.

2.2 Documentation License. Subject to and conditioned on Customer's compliance with the terms and conditions of this Agreement, Company hereby grants to Customer a non-exclusive, non-transferable (except in compliance with Section 15.9), and non-sublicensable license to use the Documentation during the Subscription Period solely for Customer's internal business purposes in connection with its use of the Platform.

2.3 Use Restrictions. Customer shall not use the Platform for any purposes beyond the scope of the access granted in this Agreement. Customer shall not at any time, directly or indirectly, and shall not permit any Authorized Users to: (i) copy, modify, or create derivative works of any BS&A IP, whether in whole or in part; (ii) rent, lease, lend, sell, license, sublicense, assign, distribute, publish, transfer, or otherwise make available the Platform or Documentation to any third party; (iii) reverse engineer, disassemble, decompile, decode, adapt, or otherwise attempt to derive or gain access to any software component of the Platform, in whole or in part; (iv) remove any proprietary notices from any BS&A IP; (v) use any BS&A IP in any manner or for any purpose that infringes, misappropriates, or otherwise violates any intellectual property right or other right of any person, or that violates any applicable law; (vi) access or use any BS&A IP for purposes of competitive analysis of BS&A or the Platform, the development, provision, or use of a competing software service or product, or any other purpose that is to BS&A's detriment or commercial disadvantage; (vii) bypass or breach any security device or protection used by the Platform or access or use the Platform other than by an Authorized User through the use of valid access credentials; (viii) input, upload, transmit, or otherwise provide to or through the Platform any information or materials, including Customer Data, that are unlawful or injurious or that infringe or otherwise violate any third party's intellectual property or other rights, or that contain, transmit, or activate any Harmful Code; or (ix) use any BS&A IP for any activity where use or failure of the BS&A IP could lead to death, personal injury, or environmental damage, including life support systems, emergency services, nuclear facilities, autonomous vehicles, or air traffic control.

2.4 Reservation of Rights. BS&A reserves all rights not expressly granted to Customer in this Agreement. Except for the limited rights and licenses expressly granted under this Agreement, nothing in this Agreement grants, by implication, waiver, estoppel, or otherwise, to Customer or any third party any intellectual property rights or other right, title, or interest in or to the BS&A IP.

2.5 Suspension. Notwithstanding anything to the contrary in this Agreement, BS&A may temporarily suspend Customer's and any Authorized User's access to any portion or all of the Platform if: (i) BS&A reasonably determines that (a) there is a threat or attack on any of the BS&A IP; (b) Customer's or any Authorized User's use of the BS&A IP disrupts or poses a security risk to the BS&A IP or to any other customer or vendor of BS&A; (c) Customer, or any Authorized User, is using the BS&A IP for fraudulent or illegal activities; (d) subject to applicable law, Customer has ceased to continue its business in the ordinary course, made an assignment for the benefit of creditors or similar disposition of its assets, or become the subject of any bankruptcy, reorganization, liquidation, dissolution, or similar proceeding; (e) BS&A's provision of the Platform to Customer or any Authorized User is prohibited by applicable law; or (f) any Customer Data submitted, posted, or otherwise transmitted by or on behalf of Customer or an Authorized User through the Platform may infringe or otherwise violate any third party's intellectual property or other rights; (ii) any vendor of BS&A has suspended or terminated BS&A's access to or use of any Third-Party Products required to enable Customer to access the Platform; or (iii) in accordance with Section 7.1 (any such suspension described in subclauses (i), (ii), or (iii), a "**Service Suspension**"). BS&A shall use commercially reasonable efforts to provide written notice of any Service Suspension to Customer and to provide updates regarding resumption of access to the Platform following any Service Suspension. BS&A shall use commercially reasonable efforts to resume providing access to the Platform as soon as reasonably possible after the event giving rise to the Service Suspension is cured. BS&A will have no liability for any damage, liabilities, losses (including any

loss of data or profits), or any other consequences that Customer or any Authorized User may incur as a result of a Service Suspension.

2.6 Business Contact Data and Usage Data. Notwithstanding anything to the contrary in this Agreement, BS&A may process Business Contact Data: (i) to manage BS&A's relationship with Customer; (ii) to carry out BS&A's core business operations, such as, by way of example and without limitation, accounting, audits, tax preparation and for filing and compliance purposes; (iii) to monitor, investigate, prevent and detect fraud, security incidents and other misuse of the Platform, and to prevent harm to BS&A, Customer, and BS&A's other customers; (iv) for identity verification purposes; and (v) to comply with applicable laws, rules, and regulations relating to the processing and retention of Personal Information to which BS&A may be subject. BS&A may process Usage Data for any lawful purpose, including to monitor, maintain, and optimize the Platform. '

3. Customer Responsibilities.

3.1 General. Customer is responsible and liable for all uses of the Platform and Documentation resulting from access provided by Customer, directly or indirectly, whether such access or use is permitted by or in violation of this Agreement. Without limiting the generality of the foregoing, Customer is responsible for all acts and omissions of Authorized Users, and any act or omission by an Authorized User that would constitute a breach of this Agreement if taken by Customer will be deemed a breach of this Agreement by Customer. Customer shall use reasonable efforts to make all Authorized Users aware of this Agreement's provisions as applicable to such Authorized User's use of the Platform and shall cause Authorized Users to comply with such provisions.

3.2 Third-Party Products. BS&A may from time to time make Third-Party Products available to Customer or BS&A may allow for certain Third-Party Products to be integrated with the Platform to allow for the transmission of Customer Data from such Third-Party Products into the Platform. For purposes of this Agreement, such Third-Party Products are subject to their own terms and conditions. BS&A is not responsible for the operation of any Third-Party Products and makes no representations or warranties of any kind with respect to Third-Party Products or their respective providers. If Customer does not agree to abide by the applicable terms for any such Third-Party Products, then Customer should not install or use such Third-Party Products. By authorizing BS&A to transmit Customer Data from Third-Party Products into the Platform, Customer represents and warrants to BS&A that it has all right, power, and authority to provide such authorization.

3.3 Customer Control and Responsibility. Customer has and will retain sole responsibility for: (i) all Customer Data, including its content and use; (ii) all information, instructions, and materials provided by or on behalf of Customer or any Authorized User in connection with the Platform; (iii) Customer's information technology infrastructure, including computers, software, databases, electronic systems (including database management systems), and networks, whether operated directly by Customer or through the use of third-party platforms or service providers ("**Customer Systems**"); (iv) the security and use of Customer's and its Authorized Users' access credentials; and (v) all access to and use of the Platform directly or indirectly by or through the Customer Systems or its or its Authorized Users' access credentials, with or without Customer's knowledge or consent, including all results obtained from, and all conclusions, decisions, and actions based on, such access or use. For purposes of clarity, Customer Systems do not include BS&A's information technology infrastructure, including computers, software, databases, electronic systems (including database management systems, and networks operated directly by BS&A and its third-party service providers.

4. Support. Subject to and conditioned on Customer's compliance with the terms and conditions of this Agreement, including payment of applicable Fees, BS&A will use commercially reasonable efforts to provide Customer with basic customer support via BS&A's standard support channels during BS&A's normal business hours.

5. Professional Services. BS&A will perform Professional Services as described in an Order or Statement of Work. Customer will provide BS&A all reasonable cooperation required for BS&A to perform the Professional Services, including without limitation timely access to any reasonably required Customer materials, information, or personnel. Subject to any limitations identified in an Order or Statement of Work, Customer will reimburse BS&A's reasonable travel and lodging expenses incurred in providing Professional Services. To the extent the Professional Services result in any work product of any kind or character ("**Work Product**"), all such Work Product will remain owned solely and exclusively by BS&A and, to the extent any such Work Product consists of enhancements, improvements, or other modifications to the Platform, such Work Product may be used by Customer solely in connection with Customer's authorized use of the Platform under this Agreement.

6. Insurance. During the Subscription Period, BS&A shall procure and maintain appropriate insurance policies with

coverage limits that are commensurate with industry standards and sufficient to protect against potential risks associated with this Agreement. The insurance policies shall be obtained from reputable and financially sound insurance providers, and BS&A agrees to provide proof of such insurance upon request by Customer.

7. Fees and Taxes.

7.1 Fees. The Platform may be provided for a fee or other charge. Customer shall pay BS&A the fees ("**Fees**") identified in the Order without offset or deduction at the cadence identified in the Order (e.g., monthly or annually). BS&A may increase the Fees annually, provided that BS&A will provide Customer at least thirty (30) days' notice of such increase prior to the end of the then-current Term. The amount of the Fee increase will be in BS&A's sole discretion, provided that Customer agrees that the increase may be at least the greater of: (i) five percent (5%); or (ii) the annual increase in the relevant Consumer Price Index for all Urban Consumers published by the Bureau of Labor Statistics for the then-current calendar year, in each case as compared to the Fees applicable during then-current Term, as applicable. Fees paid by Customer are non-refundable. Customer shall make all payments hereunder in US dollars by ACH or via another reasonable method chosen by BS&A, to such account as BS&A may specify in writing from time to time, or by another mutually agreed-upon payment method. If Customer pays via invoice, Customer will pay the invoiced amount within thirty (30) calendar days of the invoice date. If Customer fails to make any payment when due, and Customer has not notified BS&A in writing within ten (10) days of the payment becoming due and payable that the payment is subject to a good faith dispute, without limiting BS&A's other rights and remedies, and to the fullest extent permissible under applicable law: (i) BS&A may charge interest on the undisputed past due amount at the rate of 1.5% per month, calculated daily and compounded monthly or, if lower, the highest rate permitted under applicable law; (ii) Customer shall reimburse BS&A for all reasonable costs incurred by BS&A in collecting any late payments or interest, including attorneys' fees, court costs, and collection agency fees; and (iii) if such failure continues for ten (10) days or more, BS&A may suspend Customer's and its Authorized Users' access to all or any part of the Platform until such amounts are paid in full.

7.2 Taxes. All Fees and other amounts payable by Customer under this Agreement are exclusive of taxes and similar assessments. Customer is responsible for all sales, use, and excise taxes, and any other similar taxes, duties, and charges of any kind imposed by any federal, state, or local governmental or regulatory authority on any amounts payable by Customer hereunder, other than any taxes imposed on BS&A's income.

8. Confidential Information.

8.1 Definition. From time to time during the Subscription Period, either Party may disclose or make available to the other Party information about its business affairs, products, confidential intellectual property, trade secrets, third-party confidential information, and other sensitive or proprietary information, whether orally or in written, electronic, or other form or media that: (i) is marked, designated or otherwise identified as "confidential" or something similar at the time of disclosure or within a reasonable period of time thereafter; or (ii) would be considered confidential by a reasonable person given the nature of the information or the circumstances of its disclosure (collectively, "**Confidential Information**"). Except for Personal Information, Confidential Information does not include information that, at the time of disclosure is: (a) in the public domain; (b) known to the receiving Party at the time of disclosure; (c) rightfully obtained by the receiving Party on a non-confidential basis from a third party; or (d) independently developed by the receiving Party without use of, reference to, or reliance upon the disclosing Party's Confidential Information.

8.2 Duty. The receiving Party shall not disclose the disclosing Party's Confidential Information to any person or entity, except to the receiving Party's employees, contractors, and agents who have a need to know the Confidential Information for the receiving Party to exercise its rights or perform its obligations hereunder ("**Representatives**"). The receiving Party will be responsible for all the acts and omissions of its Representatives as they relate to Confidential Information hereunder. Notwithstanding the foregoing, each Party may disclose Confidential Information to the limited extent required (i) in order to comply with the order of a court or other governmental body, or as otherwise necessary to comply with applicable law, provided that the Party making the disclosure pursuant to the order shall first have given written notice to the other Party and made a reasonable effort to obtain a protective order; or (ii) to establish a Party's rights under this Agreement, including to make required court filings. Further, notwithstanding the foregoing, each Party may disclose the terms and existence of this Agreement to its actual or potential investors, debtholders, acquirers, or merger partners under customary confidentiality terms.

8.3 Return of Materials; Effects of Termination/Expiration. On the expiration or termination of the Agreement, the receiving Party shall promptly return to the disclosing Party all copies, whether in written, electronic, or other form or media, of the disclosing Party's Confidential Information, or destroy all such copies and certify in writing to the disclosing Party that such Confidential Information has been destroyed. Each Party's obligations of non-use and non-

disclosure with regard to Confidential Information are effective as of the Effective Date and will expire three (3) years from the date of termination or expiration of this Agreement; provided, however, with respect to any Confidential Information that constitutes a trade secret (as determined under applicable law), such obligations of non-disclosure will survive the termination or expiration of this Agreement for as long as such Confidential Information remains subject to trade secret protection under applicable law.

9. Data Security and Processing of Personal Information.

9.1 Customer Data. Customer hereby grants to BS&A a non-exclusive, royalty-free, worldwide license to reproduce, distribute, and otherwise use and display the Customer Data and perform all acts with respect to the Customer Data as may be necessary for BS&A to provide the Platform and otherwise perform its obligations hereunder. Customer may export the Customer Data at any time through the features and functionalities made available via the Platform. For the avoidance of doubt, aggregated, de-identified, and anonymized portions, sets, or other combinations of Customer Data that do not contain personally identifying elements of Customer's identity or of any Authorized Users are Usage Data and not Customer Data.

9.2 Security Measures. BS&A will implement and maintain commercially reasonable administrative, physical, and technical safeguards designed to protect Customer Data (including Personal Information provided as part of Business Contact Data) from unauthorized access, use, alteration, or disclosure.

9.3 Processing of Personal Information. BS&A's rights and obligations with respect to Personal Information that it collects directly from individuals (if any) are set forth in BS&A's Privacy Policy (as amended from time to time in accordance with its terms). Personal Information processed by BS&A on behalf of Customer is considered Customer Data and is governed by the terms of this Agreement.

10. Intellectual Property Ownership; Feedback.

10.1 BS&A IP. Customer acknowledges that, as between Customer and BS&A, BS&A owns all right, title, and interest, including all intellectual property rights, in and to the BS&A IP and, with respect to Third-Party Products, the applicable third-party providers own all right, title, and interest, including all intellectual property rights, in and to the Third-Party Products.

10.2 Usage Data. Customer acknowledges that, as between BS&A and Customer, BS&A owns all right, title, and interest, including all intellectual property rights, in and to the Usage Data.

10.3 Customer Data. BS&A acknowledges that, as between BS&A and Customer, Customer owns all right, title, and interest, including all intellectual property rights, in and to the Customer Data, including all Business Contact Data.

10.4 Feedback. If Customer or any of its employees or contractors sends or transmits any communications or materials to BS&A by mail, email, telephone, or otherwise, suggesting or recommending changes to the BS&A IP, including without limitation, new features or functionality relating thereto, or any comments, questions, suggestions, or the like ("**Feedback**"), BS&A is free to use such Feedback irrespective of any other obligation or limitation between the Parties governing such Feedback.

11. Mutual Warranties; Disclaimer of Other Warranties.

11.1 Mutual Warranties. Each party hereby represents and warrants to the other that: (i) it has the full right, power, and authority to enter into, execute, and perform its obligations under this Agreement without any conflict with or violation of any other obligations to which it may be subject; and (ii) this Agreement is binding on such party in accordance with its terms.

11.2 Disclaimer of Other Warranties. THE BS&A IP IS PROVIDED "AS IS" AND BS&A HEREBY DISCLAIMS ALL WARRANTIES, WHETHER EXPRESS, IMPLIED, STATUTORY, OR OTHERWISE. BS&A SPECIFICALLY DISCLAIMS ALL IMPLIED WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, TITLE, AND NON-INFRINGEMENT, AND ALL WARRANTIES ARISING FROM COURSE OF DEALING, USAGE, OR TRADE PRACTICE. BS&A MAKES NO WARRANTY OF ANY KIND THAT THE BS&A IP, OR ANY PRODUCTS OR RESULTS OF THE USE THEREOF, WILL MEET CUSTOMER'S OR ANY OTHER PERSON'S REQUIREMENTS, OPERATE WITHOUT INTERRUPTION, ACHIEVE ANY INTENDED RESULT, BE COMPATIBLE OR WORK WITH ANY SOFTWARE, SYSTEM OR OTHER PLATFORM, OR BE SECURE, ACCURATE, COMPLETE, FREE OF HARMFUL CODE, OR ERROR FREE.

12. Indemnification.

12.1 BS&A Indemnification.

(a) BS&A shall indemnify, defend, and hold harmless Customer from and against any and all losses, damages, liabilities, costs (including reasonable attorneys' fees) ("**Losses**") incurred by Customer resulting from any third-party claim, suit, action, or proceeding ("**Third-Party Claim**") brought against Customer alleging that the Platform, or any use of the Platform in accordance with this Agreement, infringes or misappropriates such third party's US intellectual property rights; provided that Customer promptly notifies BS&A in writing of the claim, cooperates with BS&A, and allows BS&A sole authority to control the defense and settlement of such claim.

(b) If such a claim is made or appears possible, Customer agrees to permit BS&A, at BS&A's sole discretion: to (i) modify or replace the Platform, or component or part thereof, to make it non-infringing; or (ii) obtain the right for Customer to continue use. If BS&A determines that neither alternative is reasonably commercially available, BS&A may terminate this Agreement, in its entirety or with respect to the affected component or part, effective immediately on written notice to Customer, and as Customer's sole and exclusive remedy therefor, BS&A will provide to Customer a prorated refund of prepaid, unused Fees attributable to the Platform (and not including any one-time Fees for Professional Services).

(c) This Section 12.1 will not apply to the extent that the alleged infringement arises from: (i) use of the Platform in combination with data, software, hardware, equipment, or technology not provided by BS&A or authorized by BS&A in writing; (ii) modifications to the Platform not made by BS&A; (iii) Customer Data; or (iv) Third-Party Products.

12.2 Customer Indemnification. To the extent permitted under applicable laws, Customer shall indemnify, hold harmless, and, at BS&A's option, defend BS&A from and against any Losses resulting from any Third-Party Claim alleging that the Customer Data, or any use of the Customer Data in accordance with this Agreement, infringes or misappropriates such third party's intellectual property or other rights and any Third-Party Claims based on Customer's or any Authorized User's (i) negligence or willful misconduct; (ii) use of the Platform in a manner not authorized by this Agreement; or (iii) use of the Platform in combination with data, software, hardware, equipment or technology not provided by BS&A or authorized by BS&A in writing; in each case provided that Customer may not settle any Third-Party Claim against BS&A unless BS&A consents to such settlement, and further provided that BS&A will have the right, at its option, to defend itself against any such Third-Party Claim or to participate in the defense thereof by counsel of its own choice.

12.3 Sole Remedy. THIS SECTION 12.3 SETS FORTH CUSTOMER'S SOLE REMEDIES AND BS&A'S SOLE LIABILITY AND OBLIGATION FOR ANY ACTUAL, THREATENED, OR ALLEGED CLAIMS THAT THE PLATFORM INFRINGE, MISAPPROPRIATE, OR OTHERWISE VIOLATE ANY INTELLECTUAL PROPERTY RIGHTS OF ANY THIRD PARTY.

13. Limitations of Liability. IN NO EVENT WILL EITHER PARTY BE LIABLE UNDER OR IN CONNECTION WITH THIS AGREEMENT UNDER ANY LEGAL OR EQUITABLE THEORY, INCLUDING BREACH OF CONTRACT, TORT (INCLUDING NEGLIGENCE), STRICT LIABILITY, AND OTHERWISE, FOR ANY: (i) CONSEQUENTIAL, INCIDENTAL, INDIRECT, EXEMPLARY, SPECIAL, ENHANCED, OR PUNITIVE DAMAGES; (ii) INCREASED COSTS, DIMINUTION IN VALUE OR LOST BUSINESS, PRODUCTION, REVENUES, OR PROFITS; (iii) LOSS OF GOODWILL OR REPUTATION; (iv) USE, INABILITY TO USE, LOSS, INTERRUPTION, DELAY OR RECOVERY OF ANY DATA, OR BREACH OF DATA OR SYSTEM SECURITY; OR (v) COST OF REPLACEMENT GOODS OR SERVICES, IN EACH CASE REGARDLESS OF WHETHER BS&A WAS ADVISED OF THE POSSIBILITY OF SUCH LOSSES OR DAMAGES OR SUCH LOSSES OR DAMAGES WERE OTHERWISE FORESEEABLE. IN NO EVENT WILL 'EITHER PARTY'S AGGREGATE LIABILITY ARISING OUT OF OR RELATED TO THIS AGREEMENT UNDER ANY LEGAL OR EQUITABLE THEORY, INCLUDING BREACH OF CONTRACT, TORT (INCLUDING NEGLIGENCE), STRICT LIABILITY, AND OTHERWISE EXCEED THE TOTAL AMOUNTS PAID AND/OR PAYABLE TO BS&A UNDER THIS AGREEMENT IN THE TWELVE (12) MONTHS IMMEDIATELY PRECEDING THE CLAIM. THE FOREGOING LIMITATIONS OF LIABILITY WILL NOT APPLY WITH RESPECT TO LIABILITIES ARISING FROM: (A) A PARTY'S BREACH OF ITS CONFIDENTIALITY OBLIGATIONS UNDER SECTION 8; (B) A PARTY'S GROSS NEGLIGENCE, FRAUD, OR WILLFUL MISCONDUCT; OR (C) A PARTY'S INDEMNIFICATION OBLIGATIONS UNDER SECTION 12 (PROVIDED THAT BS&A'S TOTAL AGGREGATE LIABILITY IN CONNECTION WITH SUCH INDEMNIFICATION OBLIGATIONS WILL NOT EXCEED THREE TIMES (3X) THE TOTAL AMOUNTS PAID AND/OR PAYABLE TO BS&A UNDER THIS AGREEMENT IN THE TWELVE (12) MONTHS IMMEDIATELY PRECEDING THE CLAIM).

14. Subscription Period and Termination.

14.1 Subscription Period. The initial term of this Agreement begins on the Effective Date and, unless terminated earlier pursuant to this Agreement's express provisions, will continue in effect for the period identified in the

Order (the "**Initial Subscription Period**"). This Agreement will automatically renew for additional successive terms equal to the length of the Initial Subscription Period unless earlier terminated pursuant to this Agreement's express provisions or either Party gives the other Party written notice of non-renewal at least thirty (30) days prior to the expiration of the then-current term (each a "**Renewal Subscription Period**" and together with the Initial Subscription Period, the "**Subscription Period**").

14.2 Termination. In addition to any other express termination right set forth in this Agreement:

(a) BS&A may terminate this Agreement, effective on written notice to Customer, if Customer: (i) fails to pay any amount when due hereunder, and such failure continues more than ten (10) calendar days after BS&A's delivery of written notice thereof; or (ii) breaches any of its obligations under Section 2.3 or Section 8;

(b) either Party may terminate this Agreement, effective on written notice to the other Party, if the other Party materially breaches this Agreement, and such breach: (i) is incapable of cure; or (ii) being capable of cure, remains uncured thirty (30) calendar days after the non-breaching Party provides the breaching Party with written notice of such breach; or

(c) either Party may terminate this Agreement, effective immediately upon written notice to the other Party, if the other Party: (i) becomes insolvent or is generally unable to pay, or fails to pay, its debts as they become due; (ii) files or has filed against it, a petition for voluntary or involuntary bankruptcy or otherwise becomes subject, voluntarily or involuntarily, to any proceeding under any domestic or foreign bankruptcy or insolvency law; (iii) makes or seeks to make a general assignment for the benefit of its creditors; or (iv) applies for or has appointed a receiver, trustee, custodian, or similar agent appointed by order of any court of competent jurisdiction to take charge of or sell any material portion of its property or business.

14.3 Effect of Expiration or Termination. Upon expiration or earlier termination of this Agreement, Customer shall immediately discontinue use of the BS&A IP and, without limiting Customer's obligations under Section 8, Customer shall delete, destroy, or return all copies of the BS&A IP and certify in writing to the BS&A that the BS&A IP has been deleted or destroyed. No expiration or termination will affect Customer's obligation to pay all Fees that may have become due before such expiration or termination or entitle Customer to any refund.

14.4 Survival. This Section 14.4 and Sections 1, 5, 8, 10, 11, 12, 13, 14.3, and 15 survive any termination or expiration of this Agreement. No other provisions of this Agreement survive the expiration or earlier termination of this Agreement.

15. Miscellaneous.

15.1 Relationship of the Parties. BS&A performs its obligations hereunder as an independent contractor and not a partner, joint venture, or agent of Customer and shall not bind nor attempt to bind Customer to any contract without Customer's prior written approval on a case-by-case basis. BS&A is responsible for hiring, firing, and supervising its personnel is solely responsible hereunder for its personnel, including without limitation for: (a) payment of compensation to such personnel; (b) withholding (if applicable), paying, and reporting, for all personnel assigned to perform services (including Professional Services) in connection with this Agreement, applicable tax withholding, social security taxes, employment head taxes, unemployment insurance, and other taxes or charges applicable to such personnel; and (c) health or disability benefits, retirement benefits, or welfare, pension, or other benefits (if any) to which such personnel may be entitled. For purposes of clarity, BS&A's personnel will not be eligible to participate in any of Customer's employee benefit plans, fringe benefit programs, group insurance arrangements, or similar programs.

15.2 Entire Agreement. This Agreement, together with any other documents incorporated herein by reference, constitutes the sole and entire agreement of the Parties with respect to the subject matter of this Agreement and supersedes all prior and contemporaneous understandings, agreements, and representations and warranties, both written and oral, with respect to such subject matter. In the event of any inconsistency between the statements made in the body of this Agreement, the related Exhibits, and any other documents incorporated herein by reference, the following order of precedence governs: (i) first, this Agreement; and (ii) second, any other documents incorporated herein by reference.

15.3 Notices. All notices, requests, consents, claims, demands, waivers, and other communications hereunder (each, a "**Notice**") must be in writing and addressed to the Parties at the addresses set forth on the first page of this Agreement (or to such other address that may be designated by the Party giving Notice from time to time in accordance with this Section). All Notices must be delivered by personal delivery, nationally recognized overnight courier

(with all fees pre-paid), facsimile or email (with confirmation of transmission) or certified or registered mail (in each case, return receipt requested, postage pre-paid). Except as otherwise provided in this Agreement, a Notice is effective only: (i) upon receipt by the receiving Party; and (ii) if the Party giving the Notice has complied with the requirements of this Section.

15.4 Force Majeure. In no event shall either Party be liable to the other Party, or be deemed to have breached this Agreement, for any failure or delay in performing its obligations under this Agreement (except for any obligations to make payments), if and to the extent such failure or delay is caused by any circumstances beyond such Party's reasonable control, including but not limited to acts of God, flood, fire, earthquake, explosion, war, terrorism, invasion, riot or other civil unrest, strikes, labor stoppages or slowdowns or other industrial disturbances, or passage of law or any action taken by a governmental or public authority, including imposing an embargo.

15.5 Amendment and Modification. No amendment or modification to this Agreement is effective unless it is in writing and signed by an authorized representative of each Party.

15.6 Waiver. No failure or delay by either Party in exercising any right or remedy available to it in connection with this Agreement will constitute a waiver of such right or remedy. No waiver under this Agreement will be effective unless made in writing and signed by an authorized representative of the Party granting the waiver.

15.7 Severability. If any provision of this Agreement is invalid, illegal, or unenforceable in any jurisdiction, such invalidity, illegality, or unenforceability will not affect any other term or provision of this Agreement or invalidate or render unenforceable such term or provision in any other jurisdiction. Upon such determination that any term or other provision is invalid, illegal, or unenforceable, the Parties shall negotiate in good faith to modify this Agreement so as to effect their original intent as closely as possible in a mutually acceptable manner in order that the transactions contemplated hereby be consummated as originally contemplated to the greatest extent possible.

15.8 Governing Law; Submission to Jurisdiction. To the extent permissible under applicable laws, this Agreement is governed by and construed in accordance with the internal laws of the State of Delaware without giving effect to any choice or conflict of law provision or rule that would require or permit the application of the laws of any jurisdiction other than those of the State of Delaware. To the extent permissible under applicable laws, any legal suit, action, or proceeding arising out of or related to this Agreement must be instituted in the federal courts of the United States or the courts of the State of Delaware in each case located in New Castle County, Delaware and each Party irrevocably submits to the exclusive jurisdiction of such courts in any such suit, action, or proceeding. If Customer is located in a jurisdiction that requires that this Agreement be governed by and construed in accordance with laws other than those of the State of Delaware, or that require any legal suits, actions, or proceedings arising out of or related to this Agreement be instituted in state and federal courts located anywhere other than New Castle County, Delaware, then the Parties agree that such other laws shall apply and to institute any such legal suits, actions, or proceedings in such other jurisdiction(s).

15.9 Assignment. Neither Party may assign any of its rights or delegate any of its obligations hereunder (except in the case of either Party utilizing authorized subcontractors and consultants), in each case whether voluntarily, involuntarily, by operation of law or otherwise, without the prior written consent of the other Party. Any purported assignment or delegation in violation of this Section will be null and void. No assignment or delegation will relieve the assigning or delegating Party of any of its obligations hereunder. This Agreement is binding upon and inures to the benefit of the Parties and their respective permitted successors and assigns. Notwithstanding the foregoing, either Party may freely assign this Agreement to an affiliate or successor in interest in the event of a merger, acquisition, sale of all or substantially all of its assets, corporate reorganization, or other change in control, without the prior consent of the other Party.

15.10 Export Regulation. The Platforms utilize software and technology that may be subject to US export control laws, including the US Export Administration Act and its associated regulations. Customer shall not, directly or indirectly, export, re-export, or release the Platform or the underlying software or technology to, or make the Platform or the underlying software or technology accessible from, any jurisdiction or country to which export, re-export, or release is prohibited by law, rule, or regulation. Customer shall comply with all applicable federal laws, regulations, and rules, and complete all required undertakings (including obtaining any necessary export license or other governmental approval), prior to exporting, re-exporting, releasing, or otherwise making the Platform or the underlying software or technology available outside the US.

15.11 US Government Rights. Each of the Documentation and software components that constitute the Platform is a "commercial item" as that term is defined at 48 C.F.R. § 2.101, consisting of "commercial computer software"

and “commercial computer software documentation” as such terms are used in 48 C.F.R. § 12.212. Accordingly, if Customer is an agency of the US Government or any contractor therefor, Customer only receives those rights with respect to the Documentation and the Platform as are granted to all other end users, in accordance with (a) 48 C.F.R. § 227.7201 through 48 C.F.R. § 227.7204, with respect to the Department of Defense and their contractors, or (b) 48 C.F.R. § 12.212, with respect to all other US Government users and their contractors.

15.12 Equitable Relief. Each Party acknowledges and agrees that a breach or threatened breach by such Party of any of its obligations under Section 8 or, in the case of Customer, Section 2.3, would cause the other Party irreparable harm for which monetary damages would not be an adequate remedy and agrees that, in the event of such breach or threatened breach, the other Party will be entitled to equitable relief, including a restraining order, an injunction, specific performance and any other relief that may be available from any court, without any requirement to post a bond or other security, or to prove actual damages or that monetary damages are not an adequate remedy. Such remedies are not exclusive and are in addition to all other remedies that may be available at law, in equity or otherwise.

EXHIBIT B

PRICING SHEET

Upgrade - Cloud Modules – *Annual Fee*

Financial Management	
Accounts Receivable	**$18,635**
Community Development	
Building Department	**$32,120**
Business Licensing	**$18,915**
Property	
Assessing	**$25,280**
Tax	**$17,245**
Special Assessment	**$8,265**
Delinquent Personal Property	**$5,660**
Subtotal	**$126,120**

BS&A Online - *Fees for BS&A Online subscription services will be charged at the next renewal period.*

Community Development

Public Records Search + Online Bill Pay
With use of integrated Credit Card Processor

New Purchase - Cloud Modules - *Annual Fee*

Financial Management	
General Ledger *(Limited License)*	**$11,755**
Cash Receipting	**$20,885**
Subtotal	**$32,640**

Data Conversions/Database Setup

Database Setup:	
General Ledger (Chart of Accounts/Balances/Budget as of a Specified Date. Each additional year of 'history' balances to be setup will be an additional $1,000)	**$2,520**
Cash Receipting (Setup of Receipt Items/Tender Types)	**$1,800**
Subtotal	**$4,320**

Project Management and Implementation Planning

Services include:

- *Analyzing customer processes to ensure all critical components are addressed.*
- *Creating and managing the project schedule in accordance with the customer's existing processes and needs.*
- *Planning and scheduling training around any planned process changes included in the project plan.*
- *Modifying the project schedule as needed to accommodate any changes to the scope and requirements of the project that are discovered.*
- *Providing a central contact between the customer's project leaders, developers, trainers, IT staff, conversion staff, and other resources required throughout the transition period.*
- *Installing the software and providing IT consultation for network, server, and workstation configuration and requirements.*
- *Reviewing and addressing the specifications for needed customizations to meet customer needs (when applicable).*

$28,800

Implementation and Training

- *$1,200/day*
- *Days quoted are estimates; you are billed for actual days used*

Services include:

- *Setting up users and user security rights for each application*
- *Performing final process and procedure review*
- *Configuring custom settings in each application to fit the needs of the customer*
- *Setting up application integration and workflow methods*
- *Onsite verification of converted data for balancing and auditing purposes*
- *Training and Go-Live*

Software Setup	Days:	10		**$12,000**
Financial Management Modules	Days:	8		**$9,600**
Community Development Modules	Days:	20		**$24,000**
Property Modules	Days:	6		**$7,200**
	Total:	44	Subtotal	**$52,800**

Remote Post-Go Live Assistance

- *Review and consult on streamlining day-to-day activities as they relate to the processes within the BS&A modules*
- *Assist customers with more detailed and advanced report options available within the BS&A modules*
- *Revisit commonly-used procedures discussed during training*
- *As needs arise, provide assistance with bank reconciliations*
- *$1,200/day*
- *Days quoted are estimates; you are billed for actual days used*

Post-Go Live for all modules for which training was performed	Days:	4	**$4,800**

Travel Expenses ***$7,365***

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

11. REQUEST FOR AUTHORIZATION TO PURCHASE TWO (2) DUMP TRUCKS THROUGH THE ROCHESTER HILLS CO-OP AWARD AGREEMENT: Public Works Division, re: for use by the Roads Department, from budgeted funds.

    Don Rohraff, Director of Public Works, presented the request to Council.

    Councilmember Morgan offered an approving motion for the Regular Agenda.

    DIRECTION APPROVING REGULAR

LETTER TO THE LIVONIA CITY COUNCIL

11.

DPW
May 21, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Douglas L. Moore, MSA, Assistant Director of Public Works

AGENDA ITEM

REQUEST FOR AUTHORIZATION TO PURCHASE TWO (2) DUMP TRUCKS THROUGH THE ROCHESTER HILLS CO-OP AWARD AGREEMENT: Public Works Division, re: for use by the Roads Department, from budgeted funds

BACKGROUND DETAILS

Request to purchase and upfit two Freightliner Single Axle UTS Dump Trucks through the Rochester Hills Co-Op Awared Agreement (RFP-RH-20-023)

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

The DPW respectfully requests approval to purchase from Wolverine Freightliner, 107 South Groesbeck Hwy. Mt. Clemens, MI. 48043, two 2025 Single Axle Dump Trucks (Vehicle #23 and #24) with upfitting by Truck & Trailer Specialities, 900 Grand Oaks Dr. Howell, MI. 48843, at a total cost of $577,130.40.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Two 2025 Freightliner Single Axle Conventional UTS dump trucks, Model 108SD (Vehicles #23 and #24)

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

Truck #23	Truck #24	TOTAL	
$ 109,690.00	$109,690.00	$ 219,380.00	truck
$ 140,910.00	$140,910.00	$ 281,820.00	upfitting
$ 16,590.00	$ 16,590.00	$ 33,180.00	leaf box
$ 267,190.00	$267,190.00	$ 534,380.00	Sub Total
$ 21,375.20	$ 21,375.20	$ 42,750.40	8% contingency

$ 288,565.20	**$288,565.20**	**$ 577,130.40**	**GRAND TOTAL**

DETAILED WORK BEING PERFORMED

Purchase of two dump trucks with upfitting

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

Sufficient budget in the amount of $577,130.40 is available in account no. 401-000-985-010

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

Rochester Hills Co-Op Award RFP-RH-20-023

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): 3.04.140.Bids or quotes—Required when—Procedures—Council authority.

E. Notwithstanding the foregoing provisions of this section, no bids shall be required prior to the making of a contract in the following instances:

4. When the city joins with other units of government in cooperative purchasing efforts that are deemed to be in the best interests of the city, such cooperative purchasing may include, but is not limited to, consortiums, joint or multi-party contracts between public procurement units, and open-ended county, state or federal public procurement contracts which are made available to the city.

ATTACHMENTS

1. Single Axle UTS #23 #24 - QUOTE
2. Single Axle UTS #23 #24 - Recommendation

APPROVED BY

Date: May 21, 2024

Don Rohraff, Director of Public Works

Date: May 22, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 22, 2024

Maureen Miller Brosnan, Mayor

FREIGHTLINER
WOLVERINE
FREIGHTLINER - EASTSIDE, INC.
107 S. Groesbeck • Mt. Clemens, MI 48043 • (586) 783-2444 FAX (586) 469-8054

2/5/2024

City of Livonia
RE: RH Co-Op Chassis Pricing

Attn: Mr. Gary Garrison

The following is Freightliner chassis pricing information per your request. Pricing and conditions are per the Rochester Hills Co-op RFP-RH-20-023 agreement.

Single Axle 40,000 GVW Single Axle UTS #23 & #24
Chassis Model: 108SD **PLUS**

Base Chassis Price 2021 MY:	$84,993
2022 Model Year escalator.....	$ 900 add
2023 Model Year Increase	$ 1,000 Add
2023 Surcharges	$ 6,700 Add
2024 Pricing & Surcharges	$ 5,925
2025 Model & Surcharge	$ 5,500 Add
2026 Model & Surcharge not to exceed	$ 2,000 Add
Air Cleaner Pre-cleaner.....	$ 323 add
Block Heater.....	No Charge
18k front axle & suspension, w/ dual steering gear..	$ 1,166 add
Traction Control.....	$ 59 add
Locking Differential.....	$ 530
Spare tires & wheels (315) front, 11R rear	$ 1,382 add
Driver's seat 3 chamber upgrade	$ 134 add
Fender extenders	No Charge
Power Windows/doors	$ 219 add
Complete Set Filters.....	$ 420 add
Manuals, Paper or USB.....	$ 390 add
DAVCO 245 Fuel/Water Separator	$ 206 Add
Cooling System- Ext Warranty 5/100	$ 305 Add
Delete Hood Hatches.....	$ 361 Deduct
30k Rear Spring suspension.....	$ 1,259 Deduct
Right, under step exhaust.....	$ 842 Deduct
TOTAL: (Not to Exceed)	**$ 109,690 each**

Steven Sexton
Municipal Sales Manager
Wolverine Truck Group

TRUCK & TRAILER Specialties, Inc.
900 Grand Oaks Drive | Howell, MI 48843 | www.ttspec.com | ph: (517) 552-3855 | fx: (517) 552-3666

March 27, 2024

City of Livonia
13405 Surrey Street, Livonia, MI 48150
Gary Garrison, ph: (734) 564-6592 & Buzz Kirby, ph: (734) 564-6594
HQO004207

Equipment Quotation

The following pricing will be based on City of Rochester Hills RFP-RH-20-023 contract awarded September 2020

Chassis: Single Axle, Wolverine Freightliner/Steve Sexton
Truck: #23-#24 with Anti-Ice capability

Install **Crysteel 10' Select Dump Body including the following:**
120" body length, 96" outside width, 84" inside width
50" front height, 26" side height, 36" rear height (5.6 cu yd capacity)
7-gauge 201 stainless steel front, sides and rear pillars
Single panel, pressed-in horizontal side braces
Construction of the sides include a boxed top rail
Full-depth rear pillar posts constructed of 7-gauge 201 stainless steel
6-panel tailgate design constructed of 7-gauge 201 stainless steel
Air-operated tailgate with Velvac air controller
8" I-beam type Western understructure, crossmemberless
¼" AR450 steel floor with 8" floor-to-side radius
10-gauge x 24" cabshield 201 stainless steel
Install body prop kit on each side of the frame
Install 10" hardwood side boards (7.8 cu yd capacity with sideboards)
Install 4-hole light wedge boxes on rear pillars for lighting
Install Cougar model 3200 DC box vibrator
Install two (2) weld-on grab handles at base of tailgate (10" wide, 2-3" standoff)
Install Livonia-style branch deflector on cabshield, passenger-side, constructed of stainless steel
Install turnbuckles in tailgate
Install license plate brackets in upper-left corner of tailgate
Install side-mounted step, front corner of body, driver-side and grab handle above on cabshield
Install two (2) shovel holders front of dump body, curbside
Install mudflaps in front of and behind drive tires

Install **Mailhot model G490-4.25-3 DA Telescopic Hoist including the following:**
Greaseable rear hinge and replaceable rear stainless steel pin
Hoist is double-acting and trunnion-mounted
Install remote lube grease line kit for Mailhot hoists

Install **Roll-Rite Electric Tarp System including the following:**
Aluminum tarp and tension arms with offset elbows
TarpMaster aluminum tarp housing model 63000
Direct-drive motor
Mesh-type tarp cover

Install **Central Hydraulic System including the following:**
Rexroth A10VO85 front-mounted load-sensing piston pump
Spicer driveline

12-volt auto shutdown block
Low-oil shutdown valve and override circuit switch in-cab

Install **Monroe Combo Hydraulic Oil/Valve Enclosure including the following:**
7-gauge type 201 stainless steel construction (mos. 00141843 & 15570)
Valve enclosure will be installed on the driver's side of the combo tank with a lockable "T" handle latch (measuring 18" wide and behind cab)
38-gallon oil capacity, filled with 35-gallon AW32 hydraulic oil
5 psi pressurized tank cap on hydraulic tank
3" supply port on hydraulic tank with 3" x 2" suction strainer
2" ball valve shut-off for supply line to the hydraulic pump & ¾" case drain shut-off
Tank-mounted return line oil filter
Ball valve shut-offs on both fuel supply and return lines
Low-oil sensor mounted in the top of the tank
Install stainless steel step mounted on the end of the tank mounting bracket assembly

Install **Rexroth 7m4-12 closed-center air control hydraulic valve with the following sections:**
Dump Hoist with 500 PSI A port pressure limit
Scraper up/down with 500 PSI A port pressure limit
Scraper swing
Front plow up/down
12-volt EPC valve for auger
12-volt EPC valve for spinner
12-volt EPC valve 4-way asymmetrical section for pre-wet/anti-ice
Above valves within above frame-mounted stainless steel combo tank enclosure
Apsco air-type single axis levers for a total of 4 levers in position (L-R) from driver:
#1 Scraper up/down
#2 Scraper left/right
#3 Front Plow up/down
#4 Dump Hoist up/down with safety detent
Stainless steel piping to rear for spreader circuit
All necessary hoses and fittings
Stainless steel hydraulic couplers for spinner, anti-ice & front plow circuits with dust caps and plugs
Additional set of stainless steel couplers for backup (4 couplers per truck)

Install **Rexroth CS660 Electric Spreader Controller including the following:**
Touch screen
Closed-loop operation for spreader, spinner, pre-wet and anti-ice operations
Programmable blast and pause
Data download and programming is with a thumb drive and WiFi and GPS capable
Training is included

Install **Monroe 29" Husting Truck-Portion Hitch including the following:**
12" C-channel front bumper with tapered ends
3" DA lift cylinder with Socatri rod
Bumper cut-outs with installed front tow hooks on frame rails
Shall include hitch roller assembly plates
All necessary supports and braces

Install **Monroe 10' model MP36MR10-ISCT Front Plow including the following:**
36" height x 10' length
10-gauge roll-formed moldboard
Six, ½" x 4" tapered one-piece ribs
2" x 3" x 3/8" top moldboard angle, 4" x 4" x ¾" bottom moldboard angle
3-½" x 3-½" x ½" semi-circle

Manual-reversing (no cylinders)
29" Husting hitch plow-portion style pushframe with 6 attachment points
Roller kit
Rubber snow deflector
Pair of plastic 36" plow markers
Carbide curbguards, both ends of moldboard
Snow-Wheels System running gear with adjustable crank (part #6509)

Install **Monroe 10' model MS4510 Underbody Scraper including the following:**
1" thick x 20" high moldboard
½" thick hanger board with grease manifold brackets installed
2-1/2" O.D. hinge shaft
Two heavy-duty shock absorbers
Bolt-in trunnion caps for canisters; Outer arm remains bolt-on style
Two 3-½" x 10" actuating cylinders with Socatri 1000 rods
Cushion valve
1" solid circle with 5" centerpin
Centerpin is piloted into hanger board
Two 4" x 12" reversing cylinders with Socatri 1000 rods
Three hinge anchor points
Hydraulic pipes
20.5" x 7" poly hold-down blocks
Mounting hardware
Parts-installation manual
Hose kit and j-50 type relief valve
¾" solid hanger plates
Grease line kit with manifolds
Install Ray Stop moldboard protection kit
Install protective stainless steel guards on grease manifolds, both sides
Install serrated grating step on driver-side of scraper, include spacers behind for stand-off aiding cleaning
Install two (2) Bucyrus (mo. GB52103) flame-hardened cutting edges
Install two (2) Kennametal (mo. KCWB-0307A) carbide curbguards, one on each end of the moldboard

Install **Monroe model MS966-OW-GB Undertailgate Spreader including the following:**
Type 201 stainless steel construction, unpainted
5:1 gear box with direct-mounted motor
6" auger with one-way flighting and 4" flight spacing for left-discharge
Trough-hung self-leveling spinner with 18" poly spinner disc
Spinner motor shall include a seal-saver kit with grease zerk
Extended integral side plates on spreader
Auger spraybar kit
Jumper hoses with stainless steel hydraulic couplers
Application-rate sensor built into auger motor

Install **Monroe Closed-Loop Pre-Wet System including the following:**
One (1) 120-gallon poly pre-wet tank behind cab (measuring 36" long x 60" high x 14" wide)
Secured on the passenger side with stainless steel mounting brackets
Hydraulic driven motor/pump motor with application rate sensor installed inside a poly enclosure, and mounted alongside the frame
Stainless steel piping to the rear for pre-wet liquid
Nozzle bar mounted inside the auger trough
One-way check in the pre-wet hose with a Y-type strainer
Ball valve shut-off on pre-wet tank

All weather pack connectors for electrical disconnects
Bulk fill and flusher kit included (1-1/2" female bulk fill)

Install **Custom Lighting & Electrical including the following:**

Wired-Rite switch box with the following switches:
- Off/on switch labeled "front flashers"
- Off/on switch labeled "rear flashers" (this switch feeds power to the next switch)
- Off/on switch labeled "rear flashers 2" for green LED flashers
- Off/on switch labeled "air puffers"
- Off/on switch labeled "blade light"
- Off/on switch labeled "sander light"
- Off/on switch with guard labeled "tailgate open/close"
- Momentary on/off/momentary on labeled "tarp open/close"
- On/momentary off, labeled "low oil override" (includes low oil shutdown)
- Off/ momentary off switch labeled "box vibrator"

Standalone console toggle switch for Pause & Blast

Heads-up Indicator lights for the following:
- low-oil, pump shut down, body-up light & tailgate open

Maxxima LED heated truck lights (mo. MHLE-07HILO-MH)
Grote heated LED plow lights (mo. GR-84661-4) with aluminum brackets
One (1) SoundOff Pinnacle (mo. EPL7PDPC) amber/green mini lightbar with guard on cabshield front
Four (4) SoundOff mPower (mo. EMPS20V38-P) amber/green LED flashers flush-mounted:
- Two (2) mounted in chassis grille (separate switch)
- Two (2) cabshield-mounted side-facing at bottom of cabshield

4-hole stainless steel light wedge boxes including:
- Two (2) SoundOff LED amber warning lights in top of light boxes
- Two (2) Maxxima (mo. M63348R-MH) heated LED STT lights in 2nd hole of light boxes
- Two (2) SoundOff LED backup lights in 3rd hole of light boxes
- Two (2) SoundOff LED green warning lights in bottom of light boxes
  - Note: green warning lights powered only when amber warning lights are in-use

Two (2) Maxxima LED scraper work lights mounted above scraper, one each side
One (1) Maxxima LED spreader work light rear of dump, driverside
LED body marker lights
Ground wire for lights will be routed to firewall and connect to a protected independent ground point
Proximity switch for dump body-up light
Proximity switch for scraper-down 12v type switch for 12v input in city GPS unit
Install PWM slave switch on auger section to supply 12v signal for spreader "ON" input into city GPS unit
Label and supply scraper and spreader inputs in cab console
Betts junction box mounted at the rear of the dump body
ECCO EC-SA901 smart backup alarm with variable decibel control

Install **Pro-Vision IA-TV-220 Camera Light System (without wash system) including the following:**
Infrared camera and 5" LCD screen
Install puffer lens cleaner for camera
Mounted in streetside rear pillar with cover above
Five (5) air puffers, two (2) each side rear on light wedges, one (1) on camera with switch in-cab

Install **Rear ¾" Steel Hitch Plate with side supports including the following:**
PH20 Pintle hook – 20-ton rated set at multiple heights from ground, 18" setting
D-rings for safety chains
Tow hooks mounted at the rear
Heated LED taillights recessed into hitch plate
Electronic brake controller

7-way round pin electrical connector
7-way RV plug mounted on curbside of hitch plate for Anti-Ice trailer

Install **Shrader Valve under driver-side door, with ball-cock at tank**
Install **TigerTough Seat Covers: driver w/armrests, pass. seat stationary w/o armrests** (32605GRY & 34304GRY)
Install **Minimizer Floor Mats for Freightliner 108 SD** (mo. FKFRTL2B-MIN / 10002265)
Install **Livonia Truck # welded onto all removable components: Tailgate Spreader & Plow**
Install **3-step egress serrated grating under driverside door, top step allowing fuel tank access, painted Black**
Install **3-step egress serrated grating under passenger-side door, painted Black**
Paint All body underfloor, frame attachments, hoist, front hitch and rear hitch assembly Black
All stainless steel material non-painted

Above installed, non-stainless painted pricing: $140,910.00 ea.

HQO004213

Option **Install Leaf Cap for Single Axle 10' Dump Body including the following:**
Steel construction, measuring 12'3" tall from ground to top of leaf cap (shortest Livonia bridge is 14')
Structural vertical frame to be 11-gauge 1-1/2" x 1-1/2" square tubing, (24' length tubing, (4) tubes) all on the outside of the box, 20" on-center for ribs
Structural horizontal frame to be 11-gauge 3" x 1-1/2" square tubing, (24' length tubing, (4) tubes) all on the outside of the box, 20" on-center for ribs
14-gauge galvanized sheet metal sides on inside of tubular frame (5' x 10', two sheets) to build 60" high sides above the dump side walls
Sheet metal sides secured with 3/16" rivets installed 6" on-center
14-gauge galvanized solid roof (5' x 8') with rear 1/2 of roof ¾ #9 standard expanded metal screen (5' x 8')
Cap to bolt on to dump body with two bolts at front through board pockets and at rear with tailgate pins
Three (3) D-rings at top for removal & installation, one center front of body, two on either side near rear
Three (3) ladder steps to be mounted on streetside of box, continuing up from existing dump box steps made of 1" 11-gauge tubing with 3" stand-off (10' stick)
Grab handle on top of box, can exceed finished height of 12'3", 1' long with 3" stand-off
14-gauge galvanized top-hinged leaf tailgate with 16" suction hole and gusset, no rivets on tailgate framework, rivets to be inboard of tailgate to prevent door seal interference (4' x 8', two sheets)
Exterior gusset frame base 1/4" x 3" cold-roll flatstock (10' stick)
Interior gusset frame 1/4" x 1-1/2" cold-roll flatstock (10' stick)
Roller guide at bottom of tailgate gusset, mounted 74" up from cradle of pintle hook
Mount City-supplied rubber gasket
Grab handles on angles at bottom corners of tailgate, 3/4" round stock
Exterior frame painted Gray, galvanized sheet metal left unpainted

Option add: $16,590.00 ea.

Chassis requirements to be confirmed at time of order:
CA: 106"
Highest ground clearance
Delete OEM front bumper
Front frame extension
Front of engine PTO
Stationary grille
Air tanks mounted between the frame rails
Horizontal DPF mounted under the curbside door with a vertical tailpipe
Under-cab exhaust
Plow light/Headlight switch and related OEM wiring

TRUCK & TRAILER Specialties, Inc.
900 Grand Oaks Drive | Howell, MI 48843 | www.ttspec.com | ph: (517) 552-3855 | fx: (517) 552-3666

Electric disconnect switch
Trailer wiring to the rear for electric brake controller
Low-profile 50-gallon fuel tank mounted under the driver's door

Payment Terms: Net 30. Pricing effective for 30 days.
FOB: City of Livonia
Delivery: 14-16 months ARO, depending on chassis arrival

Thank you for the opportunity to quote.

Respectfully submitted by,
Jon Luea/Brian Bouwman

DEPARTMENT OF PUBLIC WORKS
PUBLIC SERVICE DIVISION
FLEET MAINTENANCE

GARY T. GARRISON
FLEET MANAGER

JAMES (BUZZ) KIRBY
FLEET MANAGER

13405 SURREY STREET
LIVONIA, MICHIGAN 48150-1527
(734)-466-2704
FAX: (734)-466-2662

May 3, 2024

Purchase of Two 2026 Freightliner Single Axle Conventional UTS Dump Trucks Model 108SD. The City Identification numbers will be #23 and #24.

It is my recommendation that we purchase two single axle, conventional bodied UTS dump trucks to be used as frontline snow and ice plow trucks during snow events.
These trucks will be purchased from Wolverine Freightliner, 107 S. Groesbeck, Mt. Clemens, Michigan 48043.Through the Rochester Hills CO-OP Award Agreement reference number RFP-RH 20-023.

The use of this CO-OP meets our required bidding process and allows us to get the group buying discounts. The cost per cab and chassis will be $109,690.00 and the total for both units will be $219,380.00.

I also recommend that we use Truck & Trailer Specialties, 900 Grand Oaks Drive. Howell Michigan, 48843 as our upfitter to build these trucks. Their pricing is through the City of Rochester Hills CO-OP agreement RFP-RH-20-023 which meets our financial purchasing requirements. The cost for the upfitting per truck will be $140,910.00 and the total cost of upfitting for both units will be $281,820.00.

Currently we are not able to construct leaf boxes for these trucks in-house because of our lack of technicians. Mr. Kirby spent some time going over our specifications on how to build these leaf boxes with Truck and Trailer, so they would be able to summit a proper quote to construct them for these two trucks. They quoted $16,590.00 each and a total of $33,180.00.

I am also requesting a contingency amount of eight percent per truck, which is $21,375.20 to cover any unforeseen cost escalations. The total contingency amount for both trucks will be $42,750.40.

The completed cost for these two trucks will be $577,130.40. These funds will come from approved budgeted funds in account 401-000-985-010.

If this purchase is approved, it will not increase the size of our fleet. These trucks will be replacing two trucks that have exceeded their reliable life expectancy. The replaced trucks will be disposed of through means of public auction.

If you have any questions or require additional information, you can reach me on ext. 2641.

Gary T. Garrison
Fleet Manager

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD JUNE 3, 2024

Meeting was called to order at 9:08 p.m. by Council President McCullough. Present: Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: Laura Toy

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

Councilmember Jolly led the meeting with the Pledge of Allegiance.

12. AWARD OF CONTRACT: Department of Public Works, re: for a maintenance service contract for water main and sanitary sewer rehabilitation for a period of three (3) years with an option to renew for an additional two (2) year period, from budgeted funds.

    Don Rohraff, Director of Public Works, presented the request to Council.

    Vice President Ptashnik offered an approving motion for the Regular Agenda.

    DIRECTION APPROVING REGULAR

LETTER TO THE LIVONIA CITY COUNCIL

12.

DPW
May 17, 2024

MEETING DATE	PRESENTED BY
S060324/R061724	Don Rohraff, Director of Public Works

AGENDA ITEM

AWARD OF CONTRACT: Department of Public Works, re: for a maintenance service contract for water main and sanitary sewer rehabilitation for a period of three (3) years with an option to renew for an additional two (2) year period, from budgeted funds.

BACKGROUND DETAILS

Over the last twelve years, the Department of Public Works has been performing preventative maintenance along with emergency repairs of the sanitary sewer system. We have used a variety of different methods, including but not limited to open cutting, spot lining and full-length relining for pipe repairs. The aging infrastructure has become and will continue to be a major focus of this department. We have found one of the quickest and least intrusive means of repair is with pipe relining. The timeliness and cleanliness of these repairs, lack of restoration needed, and the preservation/extension of the pipe's useful life has made this the repair of choice. The relining of these pipes not only restores the pipes' structural integrity but also reduces the amount of maintenance needed on the pipe moving forward. The council awarded Liqui-Force Services a three-year contract in 2013 (#96-13) for this purpose and extended said contract another five years in 2018 (#407-17).

As this project has been extremely successful in relining and repairing required sanitary sewers, we would like to continue to address the City's sewer structure needs using this method.

On April 10, 2024, the Department of Public Works sought competitive bids through MITN for a three-year award, with optional two-year extension to provide sewer cleaning, CCTV inspection, relining identified sewers using resin impregnated fabric liner (CIPP), pipe joint testing and resealing and rehabilitation of existing man-hole structures. Submitted bids were opened at 2:00 p.m., Tuesday, April 30, 2024, in the presence of the Bid Committee. Three qualified bids were received. The final bid tab is attached for reference.

The Department of Public Works requests that Council award the three-year contract to SAK Construction, LLC., 864 Hoff Road, O'Fallon, MO 63366 with the option to extend another two-years upon mutual agreement with the vendor. Work will be completed from the line item pricing provided, not to exceed the annual budgeted amount. While SAK's headquarters is in Missouri, we will be dealing with their office in Taylor, Michigan.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Council does hereby accept the unit price bid of SAK Construction LLC, 864 Hoff Road, O'Fallon, MO 63366, for completing all work required in connection with sanitary sewer rehabilitation on an as needed basis for a three (3) year period (with an option to renew for an additional two-year period), the same having been in fact the lowest bid received. Work will be completed from the line item pricing provided, not to exceed the annual budgeted amount. Account No. 592-158-000 (Construction in Progress). The Director of Public Works is hereby authorized to approve any minor adjustments in the work as it becomes necessary; and the Mayor and City Clerk are hereby authorized to execute a contract for and on behalf of the City of Livonia with the aforesaid bidder and to do all other things necessary or incidental to the full performance of this resolution.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

n/a

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

As needed

DETAILED WORK BEING PERFORMED

Sewer Maintenance Services

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

Account # 592-158-000 for $1,000,000.00

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

Lowest Bidder

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): n/a

ATTACHMENTS

1. 2024 DPW Sewer Lining Program April 10 2024 FINAL
2. SEWER LINE PROGRAM BID SHEET APRIL 30 2024
3. City of Livonia RFP_Sanitary Sewer Maintenance Services Program_SAKConstruction Submittal

APPROVED BY

Date: May 20, 2024

Don Rohraff, Director of Public Works

Date: May 22, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 22, 2024

Carter Fisher, City Attorney

Date: May 22, 2024

Maureen Miller Brosnan, Mayor

SPECIFICATIONS AND CONTRACT DOCUMENTS

FOR

SEWER LINING PROGRAM

CITY OF LIVONIA
DEPARTMENT OF PUBLIC WORKS
PUBLIC SERVICE DIVISION

April 2024

CITY OF LIVONIA
DEPARTMENT OF PUBLIC WORKS
PUBLIC SERVICE DIVISION

SEWER LINING PROGRAM

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CITY OF LIVONIA
DEPARTMENT OF PUBLIC WORKS
PUBLIC SERVICE DIVISION

REQUEST FOR PROPOSAL

SEWER LINE SYSTEM MAINTENANCE PROGRAM

Sealed proposals for **Sewer Lining Program** will be received by the City of Livonia, Michigan, as owner, until 2:00 p.m. on Tuesday, April 30, 2024. At which time the bids will be recorded by the Purchasing Manager and the City Clerk. Bid opening results will be conducted via Zoom and posted on the MITN website. Physical bid submission will not be accepted. Late Bids will not be considered.

A mandatory pre-bid meeting will be held on APRIL 17, 2024, at 10:00 a.m. at the LIVONIA Department of Public Works, 12973 Farmington Rd, Livonia, 48150. Bids will not be considered from firms not in attendance at the mandatory pre-bid meeting.

Vendors may attend the bid opening virtually by using the following credentials:

Bid Opening Access

By Computer:
Website: https://us02web.zoom.us/j/82294127641
By Phone:
Phone #: (312) 626-6799
Meeting I.D.: 822 9412 7641

Instructions to bidders and specifications may be obtained by registering with the Michigan Inter-Governmental Trade Network (MITN) at www.MITN.info.

Proposals must be submitted on the forms furnished by the Director of Finance of the City of Livonia. Instructions to Bidders and Specifications for items required may be obtained at the Office of the Director of Finance, 33000 Civic Center Drive, Livonia, MI.

Bidders may submit questions in writing to the attention of Gus Kandah, Purchasing Manager at gkandah@Livonia.gov. No phone calls will be accepted.

The City of Livonia seeks proposals for the following:

Sewer Cleaning, including debris and grease removal, obstruction and root cutting, protrusion reaming in both main and lateral pipelines.

Internal video inspection via CCTV video recording in mp4 format. The Contractor must be able to provide this service for the recording of mainline and lateral sewers including recommendations of specific corrective measures. All inspections shall be completed using the most current version of NASSCO Pipeline Assessment and Certification Program (PACP) for identifying observations.

Deliverables will include a detailed report of the pipes surveyed per the specifications provided later in this document, as well as portable file storage device or other media acceptable to the City, which is clearly labeled and contains digital files named in accordance with the City's filing convention.

Sectional lining of sewer with the use of a resin impregnated fabric liner (CIPP).

Relining sewer sections from manhole to manhole with a resin impregnated fabric inversion liner (CIPP).

Relining service laterals from the mainline toward the premises with a resin impregnated fabric inversion liner (CIPP) including the installation of a cleanout at the right of way.

Pipe joint testing and sealing utilizing chemical grout.

Rehabilitation of existing manhole structures for the purposes of inflow/infiltration control and/or structural purposes. The material and process utilized for this rehabilitation shall have prior approval by the City.

Important Dates

- APRIL 10, 2024 - Proposal Documents Available
- APRIL 17,2024 10:00 a.m. – Mandatory Pre-proposal Meeting at City of Livonia DPW Office.
- APRIL 24, 2024 - Last Day to accept questions. All questions must be submitted in writing. No phone calls will be accepted. Email questions to Gus Kandah, Purchasing Manager at gkandah@livonia.gov.
- APRIL 30,2024 – Proposal Due Date. Proposals must be uploaded to the MITN website in Adobe Acrobat PDF Format.

No bidder may withdraw his proposal within one hundred twenty (120) calendar days after the date set for opening thereof. The right to accept any bid, to reject any or all proposals and to waive irregularities in bidding is reserved by the City of Livonia. Portions of this Contract may be deleted due to unforeseen circumstances without compensation. Acceptance of any bid does not constitute a binding agreement until a written Contract is signed by both parties.

Acceptance of any bid does not constitute a binding agreement until a written Contract is signed by both parties. The successful bidder will be required to furnish satisfactory Performance, Labor and Material, and Maintenance and Guarantee Bonds.

Don Rohraff
Director of Public Works

Maureen Miller Brosnan
Mayor

1. Executive Summary

1.1. The City of Livonia, as part of a comprehensive and proactive program to control and manage its aging water and sewer infrastructure and to maintain and extend the useful life of the system, is soliciting proposals from qualified Contractors able to perform maintenance and rehabilitation services on an as needed basis.

1.2. Each entity is responsible for its own payments and is to be considered individually for billing and collection purposes. Each entity will provide their own purchase order and delivery location(s) and must be invoiced separately to the address indicated on their purchase order.

1.3. This document will be used to select Contractors, to perform these services for a three (3) year period with the option to renew for an additional two (2) year period. The City reserves the right to waive any irregularities in the bid, and to award to other than the low Bidder, if these actions are deemed to be in the City's best interest.

1.4. The successful Bidder will be required to provide upon entering into an agreement with the City, for the two years following the original three-year Contract maintenance and guarantee bond with a value of $100,000.00; as well as proof of insurance in a manner that is acceptable to the City. Copies of the insurance requirements have been included for your review.

1.5. The City will withhold 10% of each invoice submitted by the contractor as retainage, up to an amount not to exceed $50,000 annually. The retainage monies will be returned to the contractor at the end of each calendar year during the length of the contract.

1.6. The services could be performed in all areas of the City of Livonia on all lengths and diameters of the existing storm and sanitary sewer systems as well as water main. The Contract will not be for a specific volume of work or dollar amount. Rather, the Contract will be for work on as needed basis.

2. Work Items Requested

2.1. Sewer Cleaning, including debris and grease removal, obstruction and root cutting, protrusion reaming in both main and lateral pipelines.

2.2. Internal video inspection via CCTV video recording in mp4 format. The Contractor must be able to provide this service for the recording of mainline and lateral sewers including recommendations of specific corrective measures. All inspections shall be completed using the most current version of NASSCO Pipeline Assessment and Certification Program (PACP) for identifying observations.

2.3. Deliverables will include a detailed report of the pipes surveyed per the specifications provided later in this document, as well as portable file storage device or other media acceptable to the City, which is clearly labeled and contains digital files named in accordance with the City's filing convention.

2.4. Sectional lining of sewer with the use of a resin impregnated fabric liner (CIPP)

2.5. Relining sewer sections from manhole to manhole with a resin impregnated fabric inversion liner (CIPP).

2.6. Relining service laterals from the mainline toward the premises with a resin impregnated fabric inversion liner (CIPP) including the installation of a cleanout at the right of way.

2.7. Pipe joint testing and sealing utilizing chemical grout.

2.8. Rehabilitation of existing manhole structures for the purposes of inflow/infiltration control and/or structural purposes. The material and process utilized for this rehabilitation shall have prior approval by the City.

3. Definitions Used Herein

3.1. Bidder – entity which is submitting a Document of Qualifications in response to this request. The Bidder must meet the minimum requirements set forth in the balance of this request. May also be referred to as Contractor, Firm, Company, Corporation, etc.

3.2. Owner – shall be considered the City of Livonia. May also be referred to as Livonia or the City.

4. Background

4.1. The City of Livonia, in a proactive program to maintain and extend the life of their sewer system, has from time-to-time bid projects for cleaning, inspecting, lining, etc. While these projects were successful, they did not provide the City with the flexibility to evaluate and rehabilitate the system on a continuous basis. As the system conditions are changing, a set project scope of a specific location and does not provide the City the option to adjust to these changing conditions. Therefore, it is the City's intent to form a long-term relationship with a qualified Contractor or Contractors to aid in, assist and supplement the City staff in performing the necessary services which are consistent with the goals and objectives of the City's program of maintenance, repair and management.

5. Purpose

5.1. It is the purpose of this request to provide a format, criteria and evaluation process to select a qualified Contractor who is able to perform the requested services and is in the City's best interest.

6. Disclaimer

6.1. This request or any Contract deriving from the evaluation of the documents does not reference, promise, provide or agree to set a quantity of work or a specific value of

Contract and a specific timeframe. Contractors should not assume any set of anticipated scheduling.

7. Quotes/Prices

7.1. The City, upon requiring the assistance of the Contractor, will request necessary services based on unit prices as submitted in the pricing pages.

8. Observation of Site

8.1 The Contractor shall personally inspect the site of the requested work to clearly understand the conditions on an as needed basis. The Contractor shall be responsible for restoring the project location to a condition which is equal to or better than the original condition. This will not be paid for separately but shall be included into the unit prices under the Contract bid.

9. Payment

9.1 Contractor payments will be in accordance with the unit prices listed in the Contract on an as needed basis. Once the work is approved by the City, final payment including retainage will be processed.

10. Sub-Contracting

10.1 Using a sub-Contractor (who must be clearly identified in the submittal) is only acceptable for up to 15% of the total scope of the services for the length of the Contract. This includes a joint submission by two Bidders having no formal corporate connections or linkage. However, in this case one of the Bidders must be prepared to take over all responsibility for successful performance of the Contract and this should be clearly defined in the proposal. (Prime Contractor).

10.2 Sub-Contracting any firm or individual whose current or past corporate or other interests may, in the City's; give rise to a conflict of interest in connection with this project will not be permitted.

10.3 Where applicable, the names of the sub-Contractors listed in the document will be included in the Contract. No additional sub-Contractors will be added, or other changes made to the list in the Contract without the written consent of the City.

Request for Proposal Requirements

11. Submittal Date

11.1 Bidders submitting a response must do so on or before the date and time specified in the Advertisement or as otherwise specified herein.

12. Format

12.1 Responses must be submitted in the format and order as indicated within this document. The cover letter, as discussed herein, should be part of the bound submittal.

13. Quantity

13.1 Bidders must submit four (4) complete copies and 1 digital copy of their Response. One (1) should be an original with all original signatures and documents. The remaining three (3) documents may be copies in addition to the digital copy in pdf format.

14. Inquiries

14.1 All inquiries related to the request are to be directed, in writing, to the person listed below. Information obtained from any other source shall not be deemed official and should not be relied upon. Inquiries and responses will be recorded and may be distributed to all Bidders at the City's option. Questions will be answered only if time permits.

Attn: Gus Kandah Purchasing manager.
Email: gkandah@livonia.gov

15. Bidder's Expenses

15.1 Bidders are solely responsible for their own expenses in preparing a response and for subsequent negotiations with the City, if any. If the City elects to reject any or all proposals, the City will not be liable to any Bidder for any claims, whether for costs or damages incurred by the Bidder in preparing the response, loss of anticipated profit in connection with any final contract, or any other matter whatsoever.

16. Liability of Error

16.1 While the City has made considerable efforts to ensure an accurate representation of information in this request, the information contained in this request is supplied solely as a guideline for Bidders. The information is not guaranteed or warranted to be accurate by the City, nor is it necessarily.

comprehensive or exhaustive. Nothing in this request is intended to relieve Bidders from forming their own opinions and conclusions with respect to the matter addressed in this request.

17. Limitation of Damages

17.1 Further to the preceding paragraph, the Bidder, by submitting a response, agrees that it will not claim damages, for whatever reason, relating to the Contract or in respect to the process, and waives any claim for loss of profit if no agreement is made with the proposer.

18. Response Format

18.1 The Bidder must include the Bidder's experience and address each of the Selection Criteria outlined in Section 18.2 through 18.11.

18.2 **Legal Status of Bidder**: The Bidder shall provide a letter, resolution, power of attorney or other similar document which verifies the representative submitting the response and signing the cover letter is an authorized agent of the firm or company submitting the response.

18.3 **Sub-Contractor List**: Indicate which sub-Contractors (including name, contact person, address, telephone number) the Bidder intends on including in their response and what items the sub-Contractor will be responsible for including overall service percentage anticipated to be performed by the sub-Contractors. The Bidder should include similar information as requested herein for each sub-Contractor for the City's review and consideration. Please note that sub-Contractors are limited to not more than 15% of the Contract services for the length of the Contract which the Bidder (prime Contractor) will provide.

18.4 **References**: The submittal of a response must include at least 3 (3) municipal references for similar work for consideration. References shall be for work successfully completed as Prime Contractor within the last 24 months within the State of Michigan and preferably within Wayne, Oakland, Macomb, Livingston, Washtenaw, Monroe or Genesee County. The references are to include the municipality, address, contact person, telephone number, Contract amount and a description of services provided.

18.5 **Local Presence**: As previously mentioned, the services requested will, at times, require immediate or emergency response. Therefore, a local presence is highly desirable. The Bidder should indicate their base of operations, communities in which field crews are stationed and current on-going contracts in and around the City of Livonia. It is the intention of the City to select a Contractor who has performed these services for more than five (5) years with at least 2,000,000 feet documented municipal sewer rehabilitated with the proposed of manhole-to-manhole CIPP materials and has field crews available within a 25-mile radius of the City of Livonia. Any Bidder who has restructured or changed names for any reason within the prior five (5) years shall indicate the name of the previous company and the date of the completion of the formation of the new company. Those Bidders that cannot meet or exceed these minimum requirements shall be considered non-responsive.

18.6 **Workplace Safety**

a. Evidence of OSHA-approved safety training program
As OSHA does not formally approve safety programs, bidders should submit their company's safety program, which will be evaluated by the City to ensure that it meets relevant OSHA standards for the expected work activities found in most common projects.

b. Worker's Compensation EMR rating
Attach a statement from bidder's Worker's Compensation carrier indicating their EMR rating for the years of 2024, 2023 and 2022. Bidders with a rating exceeding

an EMR of 1.0 or higher in any of the 3 years prior to submittal date will receive a score of 0 in this category.

b. OSHA 30-hour training program
Provide a list of all employees and any OSHA training completed (30-hour course preferred, also list any that have completed 10-hour course).

18.7 **Workforce Development**

a. Evidence of a recognized development program and/or submittal of their company's programs, which will be evaluated by the Evaluation Committee to ensure that it meets relevant needs for the scope of services required.

b. Department of Labor Apprenticeship Program
The proposer shall provide a description of their current apprenticeship program used for each trade. If the proposer has participated in a U.S. Department of Labor approved Industry-Registered Apprenticeship Program (IRAP), documentation to this effect should be submitted. If an alternative program is used, or if the bidder works directly through one or more trade unions for employees of that trade to utilize the program under that trade, a statement to this effect and description of the program and affected employees should be provided.

c. Skills assessment for other employees
Provide listing of employees (or general classification of employees) that do not fall under item b above and describe the skills assessment / interview / evaluation process used to determine fitness for duty and qualifications for their position.

d. Social Equity
Local Labor declaration, Statement of approximate percentage, if known, of employees that reside in Wayne County. As it is understood that employees may change throughout a 12-month period and may not be known, estimates and ranges are acceptable.

e. Evidence of Equal Opportunity Program
Any documentation of an Equal Employment Opportunity Program for minorities, women, veterans, returning citizens, and small businesses. If the company ownership structure includes any of the above categories or similar, this should be stated as well, as it may be considered to satisfy this requirement.

f. Equal Opportunity Employment Assurance
Provide written assurance that bidder is an equal opportunity employer and does not discriminate on the basis of race, sex, pregnancy, age, religion, national origin, marital status, sexual orientation, gender identity or expression, height, weight, or disability.

18.8 **Ability to Perform**: In addition to references submitted and verified by the City, the Bidder shall include with their response documentation which provides evidence that the Contractor has the ability to perform the requested services. This documentation must include, but is not limited to: equipment lists, certified or authenticated financial

response (dated within 12 months of the submittal), certifications of company and/or employees, special awards or merits, patents, etc.

Further, certifications, test results, or a response from the authorized representative shall be included which indicates the Bidder's ability to conform to the technical specifications herein.

Services Requested

1. Sewer Cleaning
2. Internal video inspection, including evaluation and repair recommendations.
3. Sectional or spot lining.
4. Manhole to manhole lining.
5. Lateral lining including cleanout installation.
6. Joint testing and sealing with chemical grout.

18.9 **Product Qualifications**: The City is focused on making purchasing decisions which will provide the greatest value, part of which will include the evaluation of the materials utilized on its projects. The Bidder shall include information with regard to the materials, manufacturer and any other supplier of items for these projects. The Bidder shall include certifications, test results, name, address of manufacturer and contact person.

18.10 **Price**: Price is a component of the evaluation of each response. **The included BID FORM must be completed in its entirety**. The unit prices shall be applied for all requested services unless otherwise authorized by the City prior to commencing the start of the work. The Contract unit price shall be payment in full for furnishing all materials, labor and equipment necessary to complete the work as specified.

18.11 **Alternate Solutions**: If alternate solutions are offered, please submit the information in the same format, as a separate proposal. The Bidder shall state in his returned Request for Qualifications the system they intend to use and current documented evidence of proven use in the State of Michigan in the last year. If the proposed alternate cannot meet the experience requirements listed in the technical specifications for each of the services, then the alternate will not be considered.

19. Evaluation Process

19.1 The City's intent is to select a Contractor who can perform all of the requested items of work as indicated in this document. Responses will be evaluated as to their responsiveness to the specifications, including:

- Acceptable Format
- Primary Contracts Listed
- Complete References
- Authorization Confirmation Included
- Sub-Contractor Information
- Minimum Experience Requirements – see section 18.5.
- Minimum Corporate Presence – see section 18.5.

Failure to include any of the information for the mandatory criteria listed above may be grounds for rejection.

20. Selection Criteria / Weights

21. Additional Information

21.1 At any time during the evaluation process, the City may request additional information to properly review and evaluate proposal responses. This information should be supplied expeditiously and, in a format, similar to the proponent's initial response. Further, if necessary, the City may request an oral interview / presentation to the evaluation committee with all or a select few proposers as desired. The City will not be obliged to receive further information, whether written or oral, from any company unless specifically requested by the City.

22. Contract

22.1 A Contract executed between the City and the selected Contractor or Contractors shall not be binding in terms of volume or work provided to the Contractor or of a specific dollar amount but will be for as needed or as requested services.

22.2 Contract will be for a three (3) year period beginning with the execution of a Contract. The City may, at its option, extend the Contract for two (2) additional years, upon the same terms and conditions as set forth herein.

CITY OF LIVONIA
DEPARTMENT OF PUBLIC WORKS
PUBLIC SERVICE DIVISION

GENERAL CONDITIONS

SECTION	TOPIC
1.	Contract Documents
2.	Definitions
3.	Intent of the Contract Documents
4.	Contract Drawings and Specifications
5.	Shop Drawings
6.	Soil Conditions
7.	“Or Equal” Clause
8.	Patents and Infringements
9.	Superintendence
10.	Workers
11.	Subcontracting
12.	Director’s Status
13.	Inspector’s Status
14.	Inspection
15.	Protection of Work
16.	Accident Protection
17.	Working Space
18.	Use of the Site
19.	Order of Completion – Use of Completed Portion GC-i
20.	Permits, Surveys and Compliance With Laws
21.	Laying Out Work
22.	Survey Monuments

23. Sanitary Regulations

24. Report of Errors and Discrepancies

25. Estimated Quantities

26. Contractor's and Subcontractor's Insurance

27. Proof of Carriage of Insurance

28. Performance Bond

29. Retainage

30. Labor and Materials Bond

31. Forfeiture of Contract

32. Definition of Notice

33. Additional or Omitted Work – Payment

34. Deduction for Uncorrected Work

35. Time Limit of Contract

36. Extension of Time

37. Estimates and Payments

38. Fair Employment Practices Act

GENERAL CONDITIONS

1. Contract Documents

The contract documents shall consist of the Notice to Bidder, Proposal, General Conditions, Specifications, Bonds, Plans, Drawings, Contract, and any additional documents which may be made a part of the contract.

2. Definitions

Certain terms, when used in the contract documents, shall be respectively defined as follows:

"City"	The City of Livonia.
"Owner"	The City of Livonia
"Contractor"	The person, firm or corporation to whom the within contract is awarded by the Owner and who is subject to the terms hereof.
"Subcontractor"	A person, firm or corporation, other than a Contractor, supplying labor and/or materials which contribute in any manner to performance of the within contract.
"Surety"	Any person, firm or corporation that has executed, as Surety, the Contractor's bonds securing the performance of the within contract.
"Director"	The Director of Public Works of the City of Livonia or his designated representative, as the case may be.

3. Intent of the Contract Documents

The respective contract documents are complementary, so that requirements of any particular document shall be applicable to all. The contract price, as such term is used in the contract documents, shall include the cost of all superintendence, labor and materials, and all other expense necessary for the proper execution of the work.

The specifications, schedules, plans and drawings herein referred to shall be taken together to explain each other and to make the whole consistent. Work shown on a plan and not mentioned in the specifications, or vice versa, shall be performed as if shown by both; and, in case of conflict, the Director will determine which will govern. In case of ambiguity in the plans or specifications, the Director will decide as to the correct interpretation thereof. Where errors or omissions are encountered in the contract

documents, the applicable sections of the current edition of the Wayne County's Road Commissioners General Specifications for Roads, Bridges, and Miscellaneous Construction shall prevail.

When not otherwise specifically defined in the contract documents, words therein which describe materials or work having a well-known technical or trade meaning, recognized by architects, engineers and the trade, shall be construed in accordance with such meaning.

4. **Contract Drawings and Specifications**

The contractor shall be held to have compared the premises with the contract drawings and specifications, prior to submitting a proposal, and to have fully informed himself as to the condition of the premises, existing structures, and any other condition affecting the carrying out of the work. No additional consideration or compensation will be allowed for reasons of obvious errors or omissions in the contract drawings or specifications.

Unless otherwise provided in the contract documents, the Owner will furnish the contractor, free of charge, copies of all contract drawings and specifications reasonably necessary to carry out the work.

All work shall strictly conform with the contract drawings and specifications, and the contractor shall not proceed without reference thereto.

Approved or conformed copies of the contract drawings and specifications shall be maintained at the work site by the contractor and be made available to the Owner at all times.

5. **Shop Drawings**

The contractor shall submit to the Director all shop or setting drawings and schedules required for the work, make any corrections therein required by the Director, and resubmit same without delay.

Approved or conformed copies of all shop or setting drawings shall be maintained at the work site by the contractor and be made available to the Owner at all times.

6. **Soil Conditions**

The contractor shall be held to have made his own determination of soil conditions on the premises, prior to submitting a proposal, and shall complete the work in whatever soil materials and under whatever conditions he may encounter or create, without additional cost to the owner. This shall apply whether or not borings are shown on the drawings.

7. **"Or Equal" Clause**

Whenever an article, material, or item of equipment is specified in any of the contract documents by describing a proprietary product, or by using the name of a manufacturer or vendor, the term "or equal," if not inserted, shall be implied.

The specified article, material, or equipment shall be understood as indicating the type,

function, minimum standard of design, efficiency and quality desired and shall not be construed in such a manner as to exclude manufacturers' products of comparable quality, design and efficiency. The contractor shall comply with requirements in the contract documents relative to the City's approval of materials and equipment before they are incorporated in the work.

8. **Patents and Infringements**

The contractor agrees to indemnify and save the City, their servants and agents, harmless against any and all claims for royalties or infringements of patent rights in respect to tools, appliances, equipment, processes, or systems of construction and materials made, furnished or used under this contract, and to defend at his own expense any and all suits at law or in equity which may be brought against the City, their servants or agents, for such claims; provided, however, that the City, their servants or agents, give~~s~~ the contractor immediate notice in writing of the institution of such suit and authorizes him to defend the same, furnishing him with such reasonable assistance and available information as will enable him to so defend. The provisions of this paragraph shall be binding upon the parties hereto, notwithstanding anything to the contrary implied or expressed elsewhere in any of the contract documents.

9. **Superintendence**

The contractor shall give his personal superintendence to the work or have at the site of the work at all times a competent foreman, superintendent, or other representative who is satisfactory to the City and who has authority to act for the contractor.

10. **Workers**

The contractor shall employ only competent, efficient workers who are skilled in the work assigned to them and shall at all times enforce strict discipline and good order among his employees. Whenever the City shall notify the contractor, in writing, that in its opinion any worker so employed is careless, incompetent, disorderly, or otherwise unsatisfactory, such worker shall be relieved from the job and shall not again be employed thereon except with the written consent of the City.

11. **Subcontracting**

The contractor shall not subcontract any work to be performed or any materials to be furnished in the performance of this contract without the written consent of the City. If the contractor sublets any part of this contract, he shall be as fully responsible to the City for the acts and omissions of his subcontractors, and of the persons they directly or indirectly employed, as he is for the acts and omissions of his own employees.

12. **Director's Status**

The Director shall have general supervision and direction of the work, and authority to stop such work whenever necessary to ensure proper performance of this contract. He shall also have authority to reject all work and materials which do not conform with the contract, to direct the application of forces to any portion of the work, as in his judgment is

required, and to decide questions which arise in the course of such work.

13. **Inspector's Status**

The City may appoint on-the-job inspectors who shall be under the direction of the Director. Such inspectors will inform the Director as to the work progress, the manner in which it is being done, and the quality of materials being used. They will call the contractor's attention to any observed failure to follow the plans and specifications. They shall have the authority to reject materials or workmanship which are defective and to suspend the work until any questions concerning compliance with the contract can be referred to and decided by the Director; but they shall have no authority to direct the contractor's work or workers, to supervise the contractor's operations or to change the contract plans or specifications.

In no instance should any action or omission on the part of an inspector release the contractor from his responsibility to complete the work in accordance with the plans and specifications.

14. **Inspection**

The City and their representatives shall at all times have access to the work wherever it is in preparation or progress, and the contractor shall provide proper facilities for such access and for inspection.

The City shall have the right to reject materials and workmanship which are defective or to require their correction. Rejected workmanship shall be satisfactorily corrected, and rejected materials shall be promptly removed from the premises without charge to the City. If the contractor does not correct such condemned work and remove rejected materials within a reasonable time, fixed by written notice, the City may remove them and charge the expense to the contractor.

Should it be considered necessary or advisable by the City at any time before final acceptance of the entire work to make an examination of work already completed, by removing or tearing out same, the contractor shall, on request, promptly furnish any necessary facilities, labor and materials. If such work is found to be defective in any material respect, due to the fault of the contractor, or his subcontractors, he shall defray all the expenses of such examination and of satisfactory reconstruction. If, however, such work is found to meet the requirements of the contract, the actual cost of labor and material necessarily involved in the examination and replacement, plus 15%, shall be allowed the contractor.

15. **Protection of Work**

The contractor shall continuously maintain adequate protection of all his work from damage and shall protect the City's and adjacent property from injury arising in connection with this contract.

The work under this contract shall be at the risk of the contractor in every respect until finished and accepted by the City.

The contractor shall furnish and maintain necessary passageways, guard fences, lights and such other facilities and means of protection as may be needed.

16. **Accident Prevention**

Precautions shall be observed at all times for the protection of persons including employees and property. The safety provisions of applicable laws, as well as building and construction codes, shall be observed. Machinery and equipment shall be guarded, and all hazards guarded or eliminated, in accordance with the safety provisions of the Manual of Accident Prevention in Construction, published by the Associated General Contractors of America, to the extent that such provisions are not in contravention of applicable laws.

Substantial barricades shall be erected as deemed necessary to prevent accidents to vehicular or pedestrian traffic, and safety orange flags by day and safety orange lights by night shall be diligently posted by the contractor at all points of possible danger. In case detours or other traffic instructions are necessary, suitable warning or direction devices shall be installed and maintained by the contractor.

Should the contractor fail to comply with any provisions of this contract, affecting the public welfare or safety, the City may, with or without notice, cause the necessary precaution to be taken and will deduct the cost of such work from any money due or to become due the contractor under this contract; but the performance of such work by the City, or at its direction, shall not release the contractor from his general or particular liability for the safety of persons or property.

17. **Working Space**

The contractor shall confine his equipment, apparatus, materials storage and operations to limits indicated by applicable laws, permits or directions of the City and shall not unnecessarily encumber the premises with his materials.

Should the contractor require space on privately owned property, he shall obtain such space at his own expense by agreement with the owner thereof.

18. **Use of Site**

In his operations, the contractor shall interfere as little as possible with traffic and shall in no case unduly obstruct traveled ways.

The contractor shall at no time interfere with surface or underground drainage. Free access shall be provided at all times to hydrants and water and gas valves.

The contractor shall enforce the City's instructions regarding signs, advertisements, fires and smoke.

19. **Order of Completion – Use of Completion Portion**

The contractor shall cooperate with the City, when reasonably possible, to complete any portion or portions of the work in such order of time as will be beneficial to the City without prejudice to the contractor's interests.

Use of a completion portion of the work by the City shall not be deemed as acceptance of the work so used or any part thereof.

20. **Permits, Surveys and Compliance With Laws**

The contractor shall secure and pay for all permits, fees and licenses (including such fees that may be assigned to the City as permit holder) necessary for the performance of the work unless otherwise specifically provided in the contract documents.

The City shall furnish all surveys unless otherwise provided in like manner.

The contractor shall give all notices, pay all fees, and comply with all applicable laws, as well as rules and regulations bearing on the conduct of the work.

21. **Laying Out Work**

Principal reference lines or points and benchmarks shall be given by the Director when he deems necessary; or he shall be given twenty-four (24) hours advance notice if the contractor requires such information.

The Director will set suitable stakes and marks showing the locations and elevations of the various parts of the work and will furnish the contractor with cut sheets referred to the reference points. No work shall be undertaken until such stakes and marks shall have been set. The contractor shall ensure that the work at all times proceeds in accordance with the stakes and marks and shall provide all labor and materials to set required batter boards and locate the work accurately with respect to the reference points.

The contractor shall carefully preserve reference points and stakes; and, in case of willful or careless destruction thereof, he will be charged with the resulting expense and shall be responsible for any errors that may be caused by their loss or disturbance.

22. **Survey Monuments**

The contractor shall protect and preserve all land survey monuments or property corners along the line of his work. Where monuments or irons are unavoidably disturbed or removed due to operations under this contract, the contractor, at his own expense, shall employ the services of a registered land surveyor to establish, reset or replace such monuments or irons.

23. **Sanitary Regulations**

Necessary sanitary conveniences for the use of laborers on the work, properly secluded from public observation, shall be constructed and maintained in sanitary condition by the contractor; and their use shall be strictly regulated.

24. **Report of Errors and Discrepancies**

If, in the course of the work, the contractor finds any discrepancies between the plans and physical conditions encountered, or any errors or omissions in the plans or layout, it shall be his duty to immediately inform the Director in writing. Any work done after such a discovery, until authorized by the Director, will be at the contractor's risk.

25. **Estimated Quantities**

The quantities of the various classes of work to be done and materials to be furnished under this contract, which have been estimated as stated elsewhere herein, are approximate and only for the purpose of comparing on a uniform basis the bids offered for the work under this contract; and neither the City, nor their agents are to be held responsible should any of the estimated quantities be found incorrect during the performance of the work; and the contractor shall make no claim for anticipated profit, nor for the loss of profit, because of a difference between the quantities of the various classes of work actually done or materials actually delivered, and the estimated quantities as herein stated.

26. **Contractor's and Subcontractor's Insurance**

The contractor shall not commence work under this contract until he has obtained the insurance required under this paragraph, nor shall the contractor permit any subcontractor to commence work on his subcontract until he has obtained the insurance herein required.

a. Worker's Compensation Insurance. The contractor shall procure and maintain during the life of this contract, Worker's Compensation Insurance for all of his employees who engage in the work to be performed; and, in any case any such work is sublet, the contractor shall require the subcontractor to provide similar insurance for all of the latter's employees who engage in the work.

b. Contractor's Public Liability and Property Damage Insurance. The contractor shall procure and maintain during the life of this contract, Contractor's Public Liability and Property Damage Insurance in an amount not less than $1,000,000 for injuries, including accidental death, to each person; and, subject to the same limit for each person, in an amount not less than $1,000,000 on account for each accident; and in an amount not less than $1,000,000 on account for each accident for damage to property.

c. Owner's and Contractor's Protective Public Liability and Property Damage Insurance. The contractor shall procure and maintain during the life of this contract, Owner's and Contractor's Protective Public Liability and Property Damage Insurance, in the name of the City in an amount not less than $1,000,000 for injuries, including accidental death, to each person; and, subject to the same limits for each person, in an amount not less than $1,000,000 for damage to property. Such insurance shall include motor vehicle exposure and specific coverage, by endorsement, which shall be described in the following manner:

> "It is understood and agreed that such insurance as if afforded shall include specific coverage for the so-called Explosion, Collapse and

Underground Hazards, which covers damage to property arising directly or indirectly from explosion, damage or structural injury to buildings or adjacent structures arising from operations under this contract, including excavation or tunneling and damage sustained by wires, conduits, mains, sewers and the like, occasioned by the contractor's subsurface operations."

d. Subcontractor's Public Liability and Property Damage Insurance. The contractor shall require each of his subcontractors to procure and maintain during the life of their subcontract, Subcontractor's Public Liability and Property Damage Insurance in an amount not less than $1,000,000 for injuries, including accidental death, to each person; and, subject to the same limit for each person, in an amount not less than $1,000,000 on account for each accident; and in an amount not less than $1,000,000 on account for each accident for damage to property.

e. Contractor's Motor Vehicle Bodily Injury and Property Damage Insurance.

(1) The contractor shall procure and maintain during the life of this contract, Motor Vehicle Bodily Injury Insurance (Comprehensive Form) in an amount not less than $1,000,000 for injuries, including accidental death, to each person; and, subject to the same limit for each person, in an amount not less than $1,000,000 on account for each accident; and in an amount not less than $1,000,000 on account for each accident for damage to property.

(2) The contractor shall procure and maintain during the life of this contract, Hired and Non-Ownership Motor Vehicle Bodily Injury and Property Damage Insurance in an amount not less than $1,000,000 for injuries, including accidental death, to each person; and, subject to the same limit for each person, in an amount not less than $1,000,000 for each accident; and in an amount not less than $1,000,000 on account for each accident for damage to property.

27. **Proof of Carriage of Insurance**

The contractor shall provide the City, at the time this contract is returned by him for execution, the certificates listed below. A guarantee that thirty (30) days' notice will be given to the City prior to cancellation of, or change in, any insurance coverage shall be endorsed on each certificate:

a. Four (4) copies of Certificate of Coverage of Contractor's Worker's Compensation Insurance.

b. Four (4) copies of Certificate of Coverage of Contractor's Public Liability and Property Damage Insurance.

c. Four (4) copies of Certificate of Coverage of Contractor's Motor Vehicle Bodily Injury and Property Damage Insurance covering owned, hired, and non-owned vehicles.

d. Four (4) copies of Certificate of Coverage of Contractor's Protective Public Liability and Property Damage Insurance.

28. **Performance Bond**

The contractor, within fifteen (15) days from the date of acceptance of his proposal, shall execute in favor of the City a surety bond form in an amount at least equal to 100% of the contract price, as security for the faithful performance of this contract. Should the contract price not exceed $50,000.00, the contractor may deposit with the City Clerk, as the case may be, cash, a certified check or irrevocable bank letter of credit, or a surety bond, whichever the contractor selects, acceptable in form and content to the City Attorney, as applicable in the full amount of the contract.

29. **Retainage**

The City will withhold 10% of each invoice submitted by the contractor as retainage, up to an amount not to exceed $50,000 annually. The retainage monies will be returned to the contractor at the end of each calendar year during the length of the contract.

30. **Labor and Materials Bond**

The contractor, within fifteen (15) days from the date of acceptance of his proposal, shall execute in favor of the City a surety bond form in an amount at least equal to 100% of the contract price, as security for the payment of all persons performing labor and furnishing materials in connection with this contract. Should the contract price not exceed $50,000.00, the contractor may deposit with the City Clerk, as the case may be, cash, a certified check or irrevocable bank letter of credit, or a surety bond, whichever the contractor selects, acceptable in form and content to the City Attorney, as applicable, in the full amount of the contract.

31. **Forfeiture of Contract**

If the work to be done under the contract shall be abandoned by the contractor, or, if at any time in the judgment of the City, the contractor shall fail to perform the work at a reasonable rate of progress, or to comply with all or any of the terms and requirements herein set forth, then the City shall have the right to take possession of the work, including contractor's plant, supplies, and materials, at any time after having notified the contractor in writing to discontinue the work under this contract for said cause or causes, and such action shall not affect the right of the City to recover damages resulting from such abandonment or failure to perform. Upon receiving such notice, the contractor shall, upon demand, immediately give the City safe and peaceable possession of the work, including the plant, and shall then cease to have control over any portion thereof or the workers employed thereon.

The City may then proceed to complete the work herein specified, by contract or otherwise, and the entire cost incurred shall be charged to the contractor and deducted from any sum or sums due or to become due under the contract; the excess cost, if any, shall be paid to the City by the contractor or his sureties.

32. **Definition of Notice**

Where the contract documents provide for the giving of any notice, it shall be deemed to have been given:

a. As to the City, when written notice shall have been delivered to the Director or the City Clerk or shall have been placed in the U. S. mail, addressed to the City Clerk at the place where the bids or proposals for the contract were opened.

b. As to the contractor, when written notice shall have been delivered to his chief representative then present at the site of the work, or shall have been placed in the U. S. mail, addressed to the contractor at his permanent place of business, as stated in the papers prepared by him to accompany his proposal; and

c. As to the surety on a Performance Bond or Labor and Materials Bond, when a written notice shall have been placed in the U. S. mail, addressed to the surety at his home office or to the agents who executed such Performance Bond or Labor and Materials Bond on the surety's behalf.

33. **Additional or Omitted Work – Payment**

The City may authorize changes in, additions to, or deductions from the work to be performed or the materials to be furnished pursuant to the provisions of this contract.

Adjustments, if any, in the amounts to be paid to the contractor by reason of any such change, addition or deduction, shall be determined by one or more of the following methods:

a. By unit prices contained in the contractor's original bid and incorporated in the contract.

b. By a supplemental schedule of prices contained in the contractor's original bid and incorporated in the contract.

c. By an acceptable lump sum proposal from the contractor.

34. **Deduction for Uncorrected Work**

If the City deems it expedient to accept work which has been damaged or not done in accordance with the contract, an equitable adjustment will be made so as to deduct from the contract price the cost of repairing or properly performing such work.

35. **Time Limit of Contract**

The parties hereto distinctly understand and agree that the time specified for completion

of the work is the essence of this contract, and the contractor shall not be entitled to claim performance of this agreement unless the work is satisfactorily completed, in every respect, within the time herein specified.

36. **Extension of Time**

An extension of time may be granted by the City in the event of the work being delayed, beyond the prescribed time for completion, by carriers, the elements, general strikes, accidents or other causes not under the contractor's reasonable control.

Such an extension of time shall be deemed to be in full compensation for any loss or injury sustained by the contractor by reasons of delays caused as aforesaid, and the contract shall not thereby be invalidated in any respect.

37. **Estimates and Payments**

The City shall pay to the contractor amounts bid in the proposal, or as modified by subsequent agreement, less deduction for any unsatisfactory or incomplete work, based upon measurements by the Director or as otherwise herein stipulated, and such measurements shall be final and conclusive.

The contractor shall submit to the City an application for each payment and shall submit a Contractor's Declaration stating that he has not performed any work, furnished any material, sustained any loss, damage or delay, for any reasons, including soil conditions encountered or created, or otherwise done anything for which he will ask, demand, sue for, or claim compensation from the City and, if required, shall submit receipts or other vouchers showing his payments for materials and labor, including payments to subcontractors.

Payments, based on progress estimates, will be made bi-weekly for ninety-five percent (95%) of the work completed, less any deductions or reservations which may be made in accordance with the terms of this contract, provided that the work is progressing satisfactorily, all orders of the Director have been complied with, and the time of completion shall not have expired. No allowance will be made for materials furnished which have not been incorporated in the completed work, unless otherwise stated in the contract documents.

The City may withhold payment of any progress estimate, or portion thereof, until the contractor shall have furnished satisfactory evidence that he has paid all claims of every nature.

No payment shall be considered as acceptance of work completed, or any portion thereof, prior to completion of all work required by this contract and payment of the final estimate.

Within thirty (30) days after completion of all work required by this contract to the satisfaction of the City and the Director, in accordance with all and singular terms and stipulations herein contained, the City shall make final payment based upon a final estimate made by the Director. Before such payment is made, the contractor shall, as directed by the City, execute a Contractor's Affidavit that he has paid all claims of every nature, or secured a release from the surety or sureties approving payment. The final payment shall be considered as full approval and

acceptance of the completed work herein specified.

Acceptance by the contractor of the final payment aforesaid shall operate as, and shall be, a release of the City and their agents, from all claims by and liability to the contractor for anything done, furnished for, or relating to the work, as well as any act or neglect of the City, or of any person relating to or affecting the work.

City of Livonia **Form of Proposal** **Sewer Maintenance Program**

Honorable Members of the
Council 33000 Civic Center
Drive
Livonia, Michigan 48154

SUBMIT THREE (3) hard copies and ONE (1) electronic copy

Dear Council Members:

The undersigned, by the submission of this proposal, represents that they are familiar with and has determined for the nature and extent of the proposal work and the conditions under which it must be performed and completed, and agrees that they will contract with the City of Livonia to furnish at and for the following monies all materials, labor, equipment, insurance, supervision and all other things necessary or incidental to complete the entire work in accordance with the appended specifications, general conditions, and related contract documents. By the submission of this proposal, the undersigned represents that he is familiar with and understands all the above-referenced contract documents. **Contract is for three (3) years with provision to extend an additional two (2) years effective through an amendment in the Contract, provided that City notifies Contractor at least thirty (30) days prior to Contract expiration date**.

Sewer Line System Services

ITEM	DESCRIPTION	UNIT	UNIT PRICE
Section 1	**SANITARY SEWER CLEANING**		
1	Sanitary sewer cleaning, light, 8-inch to 72-inch diameter	linear foot	
2	Sanitary sewer cleaning, heavy, 8-inch to 72-inch diameter	linear foot	
3	Sanitary Sewer reaming, 8-inch to 72-inch diameter	linear foot	
4	Removal of protruding lateral	each	
Section 2	**SANITARY SEWER VIDEO INSPECTION**		
5	Sanitary sewer video inspection, 8-inch to 72-inch diameter	linear foot	
Section 3	**SANITARY SEWER SPOT LINER REPAIR**		
6	Structural spot liner, 8-inch diameter - 3 feet to 10 feet length	each	
7	Structural spot liner, 8-inch diameter - 10 feet to 20 feet length	each	
9	Structural spot liner, 10-inch diameter - 3 feet to 10 feet length	each	
10	Structural spot liner, 10-inch diameter - 10 feet to 20 feet length	each	
12	Structural spot liner, 12-inch diameter - 3 feet to 10 feet length	each	
13	Structural spot liner, 12-inch diameter - 10 feet to 20 feet length	each	
15	Structural spot liner, 15-inch diameter - 3 feet to 10 feet length	each	
16	Structural spot liner, 15-inch diameter - 10 feet to 20 feet length	each	
18	Structural spot liner, 18-inch diameter - 3 feet to 10 feet length	each	
19	Structural spot liner, 18-inch diameter - 10 feet to 20 feet length	each	
21	Structural spot liner, 21-inch diameter - 3 feet to 10 feet length	each	
22	Structural spot liner, 21-inch diameter - 10 feet to 20 feet length	each	
24	Structural spot liner, 24-inch diameter - 3 feet to 10 feet length	each	

25	Structural spot liner, 24-inch diameter - 10 feet to 20 feet length	each	
Section 4	**SANITARY SEWER LATERAL CLEANING AND REPAIR**		
27	Lateral sewer video inspection	each	
28	CIPP lateral liner, 6-inch diameter, up to 60 feet length	each	
29	Installation of cleanout	each	
Section 5	**SANITARY SEWER JOINT TESTING AND SEALING**		
29	Sanitary sewer pipe joint testing and sealing, 8-inch to 24-inch diameter	joint	
Section 6	**CIPP SEWER PIPE LINING**		
30	CIPP Sewer Lining, 8-inch diameter	linear foot	
31	CIPP Sewer Lining, 10-inch diameter	linear foot	
32	CIPP Sewer Lining, 12-inch diameter	linear foot	
33	CIPP Sewer Lining, 15-inch diameter	linear foot	
34	CIPP Sewer Lining, 18-inch diameter	linear foot	
35	CIPP Sewer Lining, 21-inch diameter	linear foot	
36	CIPP Sewer Lining, 24-inch diameter	linear foot	
37	CIPP Sewer Lining, 30-inch diameter	linear foot	
38	Reinstate lateral service connections	each	
Section 7	**MANHOLE REHABILITATION**		
38	Calcium aluminate lining	vertical foot	
39	Epoxy	vertical foot	
40	CIP lining	vertical foot	
41	Seal spot leak in structure	each	
42	Seal adjustment rings	each	
43	Replace corbel	each	

CONTRACT

THIS CONTRACT, entered into this_____day of_____ A.D. 20____, between the City of Livonia, hereinafter referred to as the Owner, party of the first part, and_____ hereinafter referred to as the Contractor, party of the second part.

WITNESSETH, that the said Contractor, for the consideration mentioned in the various items set forth below, by these presents does agree that he will furnish all labor, materials, machinery, tools and equipment and do all things necessary for and incidental to the_____

_____

_____

together with appurtenances thereto, as set forth in certain Instructions to Bidders, Proposal, General Conditions, Specifications, Bonds, Plans, Drawings, and the following documents, all of which are attached hereto and made a part of this agreement:

_____

_____

_____

_____

IN CONSIDERATION WHEREOF, said Owner does agree to pay to said Contractor the sum of_____Dollars ($_____), based upon the amounts and sum listed in the Proposal; which is subject, however, to adjustment by reason of any change in, addition to, or deduction from the work, as provided in the General Conditions. For the faithful performance of all and singular terms and stipulations contained in this agreement, said parties respectively bind themselves, their heirs, executors, administrators, successors and assigns.

Extension of Award to the MITN Purchasing Cooperative or Other Governmental Agencies.

All vendors awarded contracts from this Quotation may, upon mutual agreement, extend pricing to the Michigan Intergovernmental Trade Network (MITN) Purchasing Cooperative or other governmental agencies.

Each entity is responsible for its own payments and is to be considered individually for billing and collection purposes. Each entity will provide their own purchase order and delivery location(s) and must be invoiced separately to the address indicated on their purchase order.

The City of Livonia are members of the MITN Purchasing Cooperative. If your company is awarded item(s) referenced in the Request for Quotation, the cooperative governmental entities or other governmental agencies may wish to use this contract and will issue a purchase order for the item(s) awarded in the quotation. Each entity is responsible for its own payments and is to be considered individually for billing and collection purposes. Each entity will provide its own purchase order and delivery location(s) and must be invoiced separately to the address indicated on their purchase order.

_____ If an award if made by the City of Livonia, it is agreed that the contract will be extended to the MITN Purchasing Cooperative or other governmental agencies, under the same prices, terms and conditions.

_____ Our company is NOT interested in extending the contract.

IN WITNESS WHEREOF, said parties have this day hereunto set their hands and seals, in triplicate.

Witness: CITY OF LIVONIA, Owner

_____ By_____
Maureen Miller Brosnan, Mayor

_____ _____
Lori Miller, City Clerk

Witness:

_____ _____
Contractor

_____

Approved:

_____
Director of Public Works

_____
Director of Finance

Approved as to form:

_____
Department of Law

Pursuant to Resolution #_____
Adopted by City Council on_____

Witness:

_____ _____
Contractor

_____

PERFORMANCE BOND

KNOW ALL MEN BY THESE PRESENTS, that we, _____
_____
as Principal, and_____
as Surety or Sureties, are held and firmly bound unto the City of Livonia, Wayne County, Michigan, in the sum of_____
Dollars ($_____) for the payment of which, well and truly to be made, we hereby jointly and severally bind ourselves, our heirs, executors, administrators, successors and assigns.

THE CONDITION of the foregoing obligation is such that, whereas the said_____ _____did on the _____day of_____, 20_____, by articles of that date, enter into a contract with the said City of Livonia for the construction of_____
_____

NOW, THEREFORE, if the said_____ shall well and faithfully do and perform all things agreed to be done and performed by said contract, according to the terms thereof, then this obligation shall be void, but otherwise it shall remain in full force and effect.

PROVIDED, that any alterations which may be made in the terms of the contract or in the work to be done under it, or the granting by the said City of Livonia of any extension of time for the performance of the contract or any other forbearance on either the part of said City of Livonia or the Principal, to the other, shall not in any way release the Principal and the Surety or Sureties, or either, or any of them, their heirs, executors, administrators, successors, or assigns, from their liability thereunder, notice to the Surety or Sureties of any such alteration, extension or forbearance being hereby waived.

WITNESS, our hands and seals, this_____day of_____20_____.

Signed, sealed and delivered
In the presence of: _____

_____ By_____

_____

_____ By_____

PB-1

LABOR AND MATERIALS BOND

KNOW ALL MEN BY THESE PRESENTS, that we, _____
_____
as Principal, and_____
as Surety or Sureties, are held and firmly bound unto the City of Livonia, Wayne County, Michigan, in the sum of_____ Dollars ($_____) for the payment of which, well and truly to be made, we hereby jointly and severally bind ourselves, our heirs, executors, administrators, successors and assigns.

THE CONDITION of the foregoing obligation is such that, whereas the said_____ _____did on the _____day of_____, 20_____, by articles of that date, enter into a contract with the said City of Livonia for the construction of_____
_____
and the payment for all labor and materials used therein.

NOW, THEREFORE, if the said_____ shall pay for all labor and materials used in the fulfillment of the said contract, and shall pay all subcontractors doing work thereon, and shall indemnify and save harmless the said City of Livonia from and against all damages by reason of liens for labor and materials furnished therefor, then this obligation shall be void, but otherwise it shall remain in full force and effect.

PROVIDED, that any alterations which may be made in the terms of the contract, or in the work to be done under it, or the granting by the said City of Livonia of any extension of time for the performance of the contract or any other forbearance on either the part of said City of Livonia or the Principal, to the other, shall not in any way release the Principal and the Surety or Sureties, or either, or any of them, their heirs, executors, administrators, successors, or assigns, from their liability hereunder, notice to the Surety or Sureties of any such alteration, extension or forbearance being hereby waived.

WITNESS, our hands and seals, this_____day of_____, 20____.

Signed, sealed and delivered
in the presence of: _____

_____ By_____

_____

_____ By_____

LMB-1

CONTRACTOR'S DECLARATION

I hereby declare that I have not, during the period_____ to_____A.D. 20_____, performed any work, furnished any material, sustained any loss, damage or delay for any reason, including soil conditions encountered or created, or otherwise done anything for which I shall ask, demand, sue for, or claim compensation from the City of Livonia, as Owner, or its agents, in addition to the regular items set forth in the contract numbered_____, and dated _____, A.D. 20_____,
for_____

_____

executed between myself and the City of Livonia, and in the Change Orders for work issued by the City of in writing as provided thereunder, except as I hereby make claim for additional compensation and/or extension of time, as set forth on the itemized statement attached hereto.

There is/is not an itemized statement attached.

The Contractor further certifies that all his indebtedness for labor and materials incorporated in the work covered by this estimate has been fully paid and/or satisfactory
arrangements with materials suppliers have been made.

_____
Contractor

By_____

Title_____

Date_____

CD-1

CONTRACTOR'S AFFIDAVIT

State of Michigan)
) ss.
County of_____)

The undersigned Contractor, _____,
hereby represents that on_____he (it) was awarded a contract by the City of Livonia, Wayne County, Michigan, to_____
_____
in accordance with the terms and conditions of Contract No._____, and the said contract has now been completed.

The undersigned hereby warrants and certifies that all of his (its) indebtedness arising by reason of the said contract has been fully paid or satisfactorily secured; and that all claims from subcontractors and others for labor and material used in accomplishing the said project, as well as all other claims arising from the performance of the said contract, have been fully paid or satisfactorily settled. The undersigned further agrees that, if any such claim should hereafter arise, he (it) shall assume responsibility for the same immediately upon request to do so by the said City of Livonia.

The undersigned, for a valuable consideration, the receipt of which is hereby acknowledged, does waive, release and relinquish any and all claims or right of lien which he (it) now has or may hereafter acquire upon the subject premises for labor and material used in accomplishing said project owned by the said City of Livonia.

This affidavit is freely and voluntarily given with full knowledge of the facts, on this_____
day of_____, 20_____.

_____
Contractor

By_____

Title_____

Subscribed and sworn to before me on this.
_____day of_____, 20_____

_____

Notary Public, State of Michigan, County of_____

My commission expires: _____

Acting in the County of_____

CA-1

PROOF OF LIABILITY INSURANCE REQUIREMENT
CITY OF LIVONIA PROJECTS

THIS ENDORSEMENT CHANGES THE POLICY, PLEASE READ IT CAREFULLY

EARLIER NOTICE OF CANCELLATION PROVIDED BY US

Ref: ***Name of Company (vendor)***
Carrier: ***Name of Insurance Carrier***
Policy No: ***number***
Policy Term: ***START and END dates***

SAMPLE

Number of days' notice: **30**

For any statutorily permitted reason, the number of days required for notice of cancellation is increased to the number of days shown in the schedule above.

If this policy is cancelled by us we will send the named insured and any party listed in the following schedule, notice of cancellation based on the number of days' notice shown above.

SCHEDULE

Name of Person or Organization

The name of Person or Organization is any person or organization holding a certificate of insurance issued for you, provided the certificate:

1. Refers to this policy;
2. States that notice of:
   a. Cancellation;
   b. Nonrenewal, or
   c. Material change reducing or restricting coverage;

   Will be provided to that person or organization;

3. Is in effect at the time of the:
   a. Cancellation
   b. Nonrenewal; or
   c. Material change reducing or restricting coverage; and
4. Is on file at your agent or broker's office for this policy.

Mailing Address

The mailing address is the address shown for that person or organization in that certificate of insurance.

INS-2

Insurance Carrier letterhead
(NOT agent or agency letterhead)

SAMPLE

Date

City of Livonia
12973 Farmington Road
Livonia, MI 48150

Ref: ***Name of Company (vendor)***
Carrier: ***Name of Insurance Carrier***
Policy No: ***number***
Policy Term: ***START and END dates***

To Whom It May Concern:

Refer to attached certificate issued ***(date)*** and the following:

Notwithstanding the disclaimers on the referenced certificate, the coverages, coverage amounts, and expiration dates stated on the certificate are true and correct in all particulars, and the attached endorsement describes the notice the city of Livonia will receive prior to any change or cessation of coverage.

Sincerely,

_____
Name
Title
Company

City of Livonia
1304A (03/15)

PROOF OF INSURANCE FOR CITY OF LIVONIA

Information required by the Federal specifications for Highway construction and/or Act 327, P.A. of 1945 to verify insurance.

The subscribing insurance company certifies that insurance of the types and for limits of liability covering the work under contract with City of Livonia has been obtained by the contractor named below.

Such insurance, here certified, is written in accordance with the company's regular policies and endorsements subject to the company's applicable manuals of rules and rates, except (1) the insurance shall not be subject to the usual "x" – explosion, "c" – collapse or "u" – underground property.

NAME OF INSURED			
ADDRESS	CITY	STATE	ZIP CODE
TELEPHONE NO.	FAX NO.		

TYPE OF INSURANCE	POLICY NUMBER & NAME OF INSURANCE COMPANY (If more than one)	POLICY DATES EFFECTIVE	POLICY DATES EXPIRATION	LIMITS: Each Occurrence: $1,000,000 Aggregate: $2,000,000 BODILY INJURY AND PROPERTY DAMAGE LIABILITY	
☐ General Liability				General Aggregate	$
☐ Professional Liability					
☐ Commercial General Liability				Prods. comp/ops Aggregate	$
☐ Claims Made ☐ Occurrence				Personal &Advertising Inj.	$
☐ $_____ P.D. Deductible				Each Occurrence	$
☐ XCU Exclusion				Fire Damage (any one fire)	$
☐ Owners/Contractors Protective				Medical Exp. (any one person)	$
AUTOMOTIVE LIABILITY				Combined Single Limit (Minimum $2,000,000.00)	$
☐ Any Auto					
☐ All Owned Autos				Bodily Injury (per person) (Minimum $500,000.00)	$
☐ Scheduled Autos					
☐ Hired Autos				Bodily Injury (per accident) (Minimum $1,000,000.00)	$
☐ Non-Owned Autos					
☐ Garage Liability				(Minimum $1,000,000.00)	$
☐ Umbrella				Each Occurrence	$
				Aggregate	$
☐ Excess Liability Other Than Umbrella				Each Occurrence	$
				Aggregate	$
WORKERS COMPENSATION AND EMPLOYERS LIABILITY				**STATUTORY**	
				$	(Each Accident)
				$	(Disease- Policy Limit)
				$	(Disease- Each Emply.)
☐ Other					

NAME OF AGENCY	NAME OF INSURANCE COMPANY (If only one for all policies)		
ADDRESS	CITY	STATE	ZIP CODE
TELEPHONE NO	FAX NO.		

M:\ALL OTHER MATTERS\Contract Administration\2024\Water Main Replacement Program - Westfield and Harrison\Contract Documents\Word Documents\08-Certificate of Insurance 1304A.doc
03/15

THIS ENDORSEMENT CHANGES THE POLICY. PLEASE READ IT CAREFULLY.

ADVANCE NOTICE OF CANCELLATION, NONRENEWAL OR COVERAGE REDUCTION OR RESTRICTION PROVIDED BY US

This endorsement modifies insurance provided under the following:

COMMERCIAL GENERAL LIABILITY COVERAGE PART

SCHEDULE

Person(s) or Organization(s)	Address
CITY OF LIVONIA	12973 FARMINGTON ROAD LIVONIA, MI 48150

Number of Days Notice 30

If this policy is cancelled (other than nonpayment of premium) or nonrenewed or if the coverage provided by this policy is reduced or restricted (except for any reduction in the Limits of Insurance due to claims payments), we will provide written notice to the person(s) or organization(s) listed in the Schedule.

We will provide this notice by mail 30 days in advance of any policy cancellation, nonrenewal or coverage reduction or restriction or as indicated in the Number of Days Notice in the Schedule.

All terms and conditions of this policy apply unless modified by this endorsement.

INS-5

Includes copyrighted material of Insurance Services Office, Inc., with its permission.

POLICY NUMBER:

COMMERCIAL GENERAL LIABILITY
CG 20 35 04 13

THIS ENDORSEMENT CHANGES THE POLICY. PLEASE READ IT CAREFULLY.

ADDITIONAL INSURED – STATE OR GOVERNMENTAL AGENCY OR SUBDIVISION OR POLITICAL SUBDIVISION – PERMITS OR AUTHORIZATIONS

This endorsement modifies insurance provided under the following:

OWNERS AND CONTRACTORS PROTECTIVE LIABILITY COVERAGE PART

SCHEDULE

State Or Governmental Agency Or Subdivision Or Political Subdivision:
CITY OF LIVONIA 12973 FARMINGTON ROAD LIVONIA, MI 48150
Information required to complete this Schedule, if not shown above, will be shown in the Declarations.

A. Section II – Who Is An Insured is amended to include as an additional insured any state or governmental agency or subdivision or political subdivision shown in the Schedule, subject to the following provisions:

1. This insurance applies only with respect to operations performed by you or on your behalf for which the state or governmental agency or subdivision or political subdivision has issued a permit or authorization.

   However:

   a. The insurance afforded to such additional insured only applies to the extent permitted by law; and

   b. If coverage provided to the additional insured is required by a contract or agreement, the insurance afforded to such additional insured will not be broader than that which you are required by the contract or agreement to provide for such additional insured.

2. This insurance does not apply to:

   a. "Bodily injury" or "property damage" arising out of operations performed for the federal government, state or municipality; or

   b. "Bodily injury" or "property damage" included within the "products-completed operations hazard".

B. With respect to the insurance afforded to these additional insureds, the following is added to **Section III – Limits Of Insurance**:

If coverage provided to the additional insured is required by a contract or agreement, the most we will pay on behalf of the additional insured is the amount of insurance:

1. Required by the contract or agreement; or
2. Available under the applicable Limits of Insurance shown in the Declarations;

whichever is less.

This endorsement shall not increase the applicable Limits of Insurance shown in the Declarations.

All terms and conditions apply unless modified by this endorsement.

© Insurance Services Office, Inc., 2012

ACP GLP071260453 39 LN1N 15043 INSURED COPY 74 0001886

BID OPENING
SEWER LINING PROGRAM

BID DUE DATE 4/30/2024

VENDOR NAME	DVM Utilities Inc	Inland Waters Pollution Control, Inc.
CITY/STATE	6045 Sims, Suite 2 Sterling Heights, MI 48313	4086 Michigan Ave Detroit, MI 30083
TOTAL Cost	$ 194,504.75	* Total not included $ 87,265.00

VENDOR NAME	SAK	
CITY/STATE	864 Hoff Road O'Fallon, MO 63366	
TOTAL Cost	*Total not included $ 83,418.00	

VENDOR NAME		
CITY/STATE		
TOTAL Cost		

CITY REPRESENTATIVES: LESLIE ROHRAFF, OFFICE OF THE CITY CLERK, GUS KANDAH, PURCHASING MANAGER
***must total all line items to verify.**

CAPABLE
EXPERIENCED
COMMITTED

Trust SAK to deliver on time, every time.

APR 30 2024

CITY OF LIVONIA
Sanitary Sewer Maintenance Services Program

Request for Proposal Submittal
Due Date: April 30, 2024 @ 2 PM ET

SAK™
Pipeline Infrastructure. Solved.™

SAK™
Pipeline Infrastructure. Solved.™

National Headquarters
864 Hoff Road
O'Fallon, MO 63366
636.385.1000 *tel*
636.385.1100 *fax*
www.sakcon.com

April 30, 2024

City of Livonia
Director of Finance
Office of the Director of Finance
33000 Civic Center Drive
Livonia, MI 48154

Re: Proposal for RFP - Sewer Line System Maintenance Program

SAK Construction, LLC (SAK) is pleased to submit our Proposal in the requested format to the City of Livonia to serve as the responsible and responsive contractor for the Sewer Line System Maintenance Program.

SAK, along with our subcontractor partners, greatly appreciate the opportunity to provide the enclosed submission. Our team offers the City of Livonia deep experience and expertise in both wastewater infrastructure construction and in the delivery of on-call/emergency response, far exceeding minimum qualifications. **Together we will develop a lasting relationship on trust, teamwork, and performance.** Through our technical capabilities, our collaborative culture, our ability to develop and implement high-quality, cost-effective solutions, our innovative tools, and our dedication to strong and clear communications with the Project Team, Livonia can count on SAK's group of professionals.

The Authorized Representative from SAK championing the obligation in this proposal and the commitments to the City of Livonia is:

Respondent/Contractor

SAK Construction, LLC
Name: Joe Feuerborn
Title: Vice President and General Manager CIPP Division
Email: jfeuerborn@sakcon.com
Phone: 636.385.1000

In addition, we acknowledge receipt of the following addenda:

Addendum #1 dated 4/15/2024
Addendum #2 dated 4/17/2024
Addendum #3 dated 4/18/2024
Addendum #4 dated 4/24/2024

SAK looks forward to serving the City of Livonia as its on-call sewer system maintenance contracting partner. If you should require further information or have any questions, please do not hesitate to contact any member of our team.

Respectfully,

Jerome Shaw, Jr.
President, SAK Construction, LLC

SAK CONSTRUCTION, LLC

TECHNICAL EXPERIENCE & QUALIFICATIONS OF BIDDER

SAK is an industry-leading pipe rehabilitation contractor that offers a full range of trenchless and underground construction services. SAK offers a full range of trenchless and underground construction services. We have grown considerably since our launch in 2006, and currently forecast $280 million in construction revenue in 2024. Our 379 employeesnationwide complete an average of 125 projects per year. With headquarters in O'Fallon, MO, SAK operates in four regions across the U.S. Each of these regions has personnel in leadership positions with decades of experience, many of whom have been in the business since the early 1980s.

In just a few years, SAK has grown into a $280-million company specializing in CIPP rehabilitation.

Our senior leaders have been involved with CIPP development in the U.S. since the product was first introduced. SAK is now the largest privately held CIPP contractor in the U.S.

SAK specializes in repairing, reconstructing, building, and expanding wastewater, water, and stormwater systems using a wide range of trenchless technologies. SAK focuses on helping clients nationwide identify the most cost-effective solutions to the many operational, regulatory and environmental problems associated with inadequate or deteriorating sanitary sewers, water mains, and storm sewers.

SAK PHILOSOPHY

SAK was founded on a philosophy of providing services that focus on worker and public safety, a commitment to quality, with technical and operational excellence.

SAK believes in providing a safe work environment, meeting or exceeding Owner quality requirements, operational excellence and on-time completion and open communication with everyone involved on our projects

CIPP QUALIFICATIONS AND EXPERIENCE

SAK's core pipeline rehabilitation focus is Cured-in-Place Pipe (CIPP). SAK benefits from having some of the most experienced employees in the world. Within our Executive and Senior Management group only, SAK has well over 300 years of CIPP experience.

SAK has installed CIPP lining in 3,096 miles of pipe (16.3 million feet) and recently surpassed $1.8 billion in total revenue. Since its inception, the CIPP division has grown from a single six-man crew to 22 crews working nationwide. Of the 16.3 million feet of CIPP lining installed, 2.5 million feet have been installed in diameters of 24 inches and greater. A competitive advantage we have over our industry peers is the ability to execute long CIPP installs, commonly referred to as an "over-the-hole (OTH)" install. The services requested in the City of Livonia - Sewer Line System Maintenance Program RFP are comfortably within SAK's capabilities.

Over the past 18 years, SAK has consistently provided a high quality CIPP lining product throughout the continental United States. Although manufacturing a pipe within a pipe is not without challenges, all of our projects involve some degree of complexity, whether it be internal pipe conditions or external factors such as sensitive environmental wetlands. We are adept at planning for varied conditions and have the resources to exceed stringent job requirements and deadlines. SAK has a proven track record that demonstrates our ability to deliver a quality job, on time, and within budget.

18.1 SELECTION CRITERIA

18.2 LEGAL STRUCTURE

Joe Feuerborn, Vice President and General Manager of SAK's CIPP Division and Boyd Hirtz, Vice President, are hereby authorized to sign bids, extend offers, submit proposals, and execute contracts on behalf of SAK Construction, LLC.

Please see Appendix A: Authority To Sign, for a letter signed by Jerome Shaw, Jr., President, verifying this information.

18.3 SUBCONTRACTOR LIST

SAK selects its team members (see Table 1 below) based on overall performance, consistency, and value, not solely on low bid. The City of Livonia is getting a proven team of contractors with years of experience in this type of work. Most importantly, the proposed team has worked together on very similar CIPP projects.

Table 1. Team Members

CATEGORY	MEMBER NAME	PURPOSE/TASK/SERVICE
Prime	SAK Construction, LLC	Prime Contractor Cured-in-Place Pipe (CIPP), Self-Perform Remaining Work Items
Subcontractor	Advance Underground Inspection	Cementitious Manhole Lining
Subcontractor	Advanced Rehabilitation Technologies	Cured-In-Place Manhole Lining
Subcontractor	BLD Technologies	CIPP Lateral Lining

Note: SAK is aware that subcontractors are limited to not more than 15% of the Contract services for the length of the Contract. SAK will follow these requirements in regards to all subcontractors used on projects,

18.4 REFERENCES

The table below provides a summary of SAK's references applicable to the City of Livonia. References 1-4 are specific to the RFP requirements, but we added an additional reference of Citizens Energy Group to further highlight SAK's ability of a long term collaborative partnership with an Owner through management of a multi-year on-call master construction agreement.

Table 2. SAK Reference Project Examples

REFERENCE #	MUNICIPALITY/OWNER	PROJECT NAME	ORIGINAL CONTRACT VALUE
1	City of Ann Arbor	2020 & 2021 Sewer Lining Project	$5,946,305
		2022 Sewer Lining Project	$1,048,468
		2023 Sewer Lining Project	$2,989,659
		Total:	$9,984,432

Table 2. SAK Reference Project Examples

REFERENCE #	MUNICIPALITY/OWNER	PROJECT NAME	ORIGINAL CONTRACT VALUE
2	City of Royal Oak	2020 Sewer Lining	$225,366
		2023 Sewer Lining	$739,318
		Total:	$964,684
3	Macomb County (MIDDD)	Garfield Interceptor SPR Rehabilitation	$2,394,385
		Garfield Interceptor GeoKrete Rehab	$510,160
		Total:	$2,904,545
4	Village of Lexington	2023 Sanitary Sewer Pipe Rehabilitation	$1,577,160
		Total:	$1,577,160
5	Citizens Energy Group	Master Construction Agreement - Collection System Renewal Program Preferred On-Call Contract (2017 through Q1 - 2024)	$55,737,251
		Total:	$55,737,251

REFERENCE 1

Project Name(s):	2020 and 2021 Sewer Lining Project, 2022 Sewer Lining Project, and 2023 Sewer Lining Project
Owner Name:	City of Ann Arbor
Owner Address:	301 E. Huron Street, Ann Arbor, MI 48107
Contact Information:	Igor Kotlyar 734.794.6410 ikotlyar@a2gov.org
Contract Amount:	Original Total Contract Amounts: $9,984,432

Description of Services:

All three projects for Ann Arbor are very similar in project scope and include sewer cleaning and inspection (CCTV) and CIPP rehabilitation for both sanitary and storm sewers. The diameter range for these projects was from 6-inch through 66-inch. Project services also included point repairs (as necessary), flow control/bypass, manhole rehabilitation, traffic control and restoration.

18.5 LOCAL PREFERENCE

SAK is made up of over 379 team members in 12 locations across the U.S. Each location maintains multiple sets of installation equipment and experienced crews capable of successfully executing the outlined work scope. Our installation crews are supported by 2 wet-out facilities ensuring that materials will be available to complete work desired by the City of Livonia.

The 2020 and 2021 Sewer Lining Project was a combination of two years of rehabilitation budget because the City of Ann Arbor did not solicit a project during the pandemic. Work commenced on this project in April 2022 and was completed in Fall 2023. The total amount of CIPP installed was 62,056 lineal feet. Through close collaboration with the Owner, the project team was able to eliminate lines that either were previously lined or based on PACP inspections the sewer segments were deemed to not require rehabilitation. SAK was also able to eliminate many potential point repairs through innovative install techniques that reduced non-CIPP spend. Through elimination or reduction of many non-core budget items and sewer line segments that didn't require rehabilitation that was well communicated between SAK and the project team, the City of Ann Arbor was able add additional segments to maximize their rehabilitation budget.

The 2022 Sewer Lining Project was completed in tandem with the 2020 and 2021 Sewer Lining Project. The original scope included inspection, cleaning and CIPP rehabilitation of up to 20,086 lineal feet of sanitary and storm sewer ranging in diameter from 8-inch up to 40-inch. Again, the original scope also included ancillary items of flow control, point repairs (as necessary), traffic control, restoration, and manhole rehabilitation.

Work commenced on the 2022 Sewer Lining Project in September 2022 and completed in Fall 2023. Total footage rehabilitated was 5,788 lineal feet. Similar to the previous project, SAK worked collaboratively with the Ann Arbor project team through weekly status meetings and as-needed budget checks to maximize rehabilitation footage. Upon completion of the 2022 Sewer Lining Project, the desire by the Owner and SAK to further the relationship by piggybacking off the existing contract to continue annual services was attempted. However, due to the original solicitation and contract type, Ann Arbor was required to tender the 2023 Sewer Lining Project. Fortunately, SAK remained the low-bidder and acquired the contract with the City of Ann Arbor; however, this contract is set up as a term for up to two additional extensions.

Currently, the 2023 Sewer Lining Project is under construction. Construction commenced December 2023 and includes 23,819 lineal feet of both sanitary and storm sewer inspection, cleaning and CIPP rehabilitation. At of the end of Q1-2024, SAK has completed 21.7% of the contract based on footage rehabilitated and the City of Ann Arbor has verbally committed to an additional scope release for 2024/25.

REFERENCE 2

Project Name(s):	2020 Sewer Lining, S2002 and S2302, 2023 Sewer Lining
Owner Name:	City of Royal Oak
Owner Address:	203 S. Troy Street, Royal Oak, MI 48067
Contact Information:	Merleo (Leo) Seneres 248.246.3260 merleos@romi.gov
Contract Amount:	Original Total Contract Amounts: $964,684 Completed Total Contract Value: $1,493,070

Description of Services:

SAK has completed two contracts with the City of Royal Oak since September 2020. The original contract work included cleaning, televising and CIPP rehabilitation of 6,160 lineal feet of sanitary sewer. The original contract was in the amount of $259,500 but the contract allowed for additional terms and scope to be added to the original contract. Based on the performance of the original contract, Royal Oak elected to extend the scope and added 9,595 lineal feet of sanitary sewer rehabilitation in the amount of $528,386 ranging in diameter from 8-inch to 18-inch. With the contract extension, the work was completed in August 2022. After completion in August 2022, the City of Royal Oak requested a second contract extension. Unfortunately, due to the massive material price increases in the previous two years and inflation rate, SAK was unable to honor the original contract pricing.

In 2023, Royal Oak tendered another sewer rehabilitation contract. SAK was the successful bidder for the scope that includes 7,570 lineal feet of sanitary sewer inspection, cleaning and CIPP rehabilitation in diameters ranging from 8" to 24". The construction for this project commenced in October 2023 and is currently in the process of being completed.

REFERENCE 3

Project Name(s):	Garfield Interceptor SPR/GeoKrete Rehabilitation
Owner Name:	Macomb Interceptor Drainage District
Owner Address:	21777 Dunham Road, Clinton Township, MI 48036
Contact Information:	Vincent Astorino 586.469.5325 vincent.astorino@macombgov.org
Contract Amount:	Original Total Contract Amounts: $2,904,545

Description of Services:

The Macomb County Drain Drainage District (MIDDD) was evaluating new technologies for their interceptor rehabilitation program. Historically, MIDDD utilized traditional sliplining for large diameter rehabilitation but for the Garfield Interceptor, access locations limited the ability to excavate a large insertion pit and the bypass needs for the average daily flows were cost prohibitive. Through an intensive product vetting and collaborative ad-hoc design build process between MIDDD and SAK, it was determined that spiral wound lining (SPR) was the preferred rehabilitation methodology for the 750 lineal feet of 84" RCP. This technology was the only option that provided minimal access disruption and can be installed under flow that either eliminated or minimized bypass needs. This is also the first time the technology was utilized in the state of Michigan. The work for this project commenced in October 2022 and was completed in May 2023 and included pipe preparation, flow control, traffic control, and SPR installation. Throughout the project duration, intensive project communication was required and completed successfully with numerous agencies, project team, and the many commercial properties in the vicinity. This project has been awarded the 2024 APWA Project of the Year in the category of Disaster or Emergency Construction/Repair $1MM to $5MM. A copy of the award notice and recommendation letter is provided in Appendix B.

The second contract with MIDDD was for rehabilitation of vault structures and 235 lineal feet of 42-inch, 66-inch and 72-inch sidelines of the Garfield Interceptor. The scope included televising, cleaning/pipe preparation, and a fully structural spray-on application of GeoKrete geopolymer. Work began in May 2023 and was completed in June 2023.

REFERENCE 4

Project Name(s):	2023 Sanitary Sewer Pipe Rehab
Owner Name:	Village of Lexington
Owner Address:	7227 Huron Ave., Suite 100, Lexington, MI 48450
Contact Information:	Chris Townley 810.404.2266 chris@townleyengineering.com
Contract Amount:	Original Total Contract Amounts: $1,577,160

Description of Services:

The 2023 Sanitary Sewer Pipe Rehabilitation project for the Village of Lexington began in October 2023. The 32,666 lineal feet of 8-inch and 10-inch pipe is approximately 71.6% complete at the time of proposal preparation. Besides the full length CIPP lining and pipe preparation, the scope of this project includes CIPP point repairs, CIPP service repair, pressure testing and grouting of sewer joints, and spot repairs by open cut. The unique aspect of this project is that the project was essentially rehabilitating the infrastructure in the entire Village. Due to the size of the project for the Village, SAK became an extension of village staff by educating staff, communicating with residents, and providing consistent and accurate project updates to the entire project team.

REFERENCE 5

Project Name(s):	Master Construction Agreement - Collection System Renewal Program
Owner Name:	Citizens Energy Group
Owner Address:	2150 Dr. Martin Luther King Jr. St., Indianapolis, IN 46202
Contact Information:	Tim Shutters 317.410.3988 tshutters@citizensenergygroup.com
Contract Amount:	Original Total Contract Amounts: $55,737,251 completed as of Q1 - 2024

Description of Services:

As noted previously, we fully understand that this project does not meet the RFP instructions and metrics as it is outside of the state of Michigan. However, we believe it would be important to share this information with the City of Livonia to aid in the evaluation process by fully understanding SAK's on-call contract capabilities. In short, we understand it is a big decision to determine who the City of Livonia's next on-call contractor partner will be and SAK is very confident we would be a great fit based on our historical performance record.

In 2017, SAK acquired the first master construction agreement (MCA) with Citizens Energy Group (CEG) along with another contractor to provide pipeline assessment, pipe rehabilitation with CIPP, geopolymer, sliplining, shotcrete, and carbon fiber reinforced polymers for pipe diameters ranging from 8-inch to 84-inch. Ancillary work includes bypass pumping/flow control, traffic control, restoration, and point repairs/excavations. SAK also provides MSI inspections, SSES inspections, planning and project preparation, emergency responses and budget support. In 2023, the MCA was renewed, and SAK was selected as the preferred contractor and obtained the only contract award. Since 2017, we have completed 47 projects with a total contract value of $55,737,251. A letter of recommendation is included in Appendix B.

Table 3. Compliance with Minimum Qualifications

ITEM	REQUIREMENT	COMPLIANCE
A.	The Bidder should indicate their base of operations, communities in which field crews are stationed and current on-going contracts in and around the City of Livonia.	Jobsite management for all projects contracted with the City of Livonia is provided through our Taylor Michigan office, established in 2022, with support from SAK's Headquarters office in O'Fallon, MO. SAK has **22 employees** residing in Michigan and **14 employees** residing in Wayne County, MI. Our Taylor Operations currently have agreements with several communities for similar services including: • City of Ann Arbor, MI • City of Woodhaven, MI • Village of Lexington, MI • Charter Township of Hampton, MI • Oakland County Water Resource Commission
B.	It is the intention of the City to select a Contractor who has performed these services for more than five years with at least 2,000,000 feet documented municipal sewer rehabilitated with the proposed manhole-to-manhole CIPP materials.	SAK exceeds these requirements: Total years as a Contractor: **18 years** Total linear feet of sewer mains: **16,345,659 linear feet**
C.	Contractor who has field crews available within a 25-mile radius of the City of Linovia.	SAK's Michigan office is located at 27205 Northline Road, Taylor, MI 48180, approximately **13 miles** from the City of Livonia Department of Public Works office. This office was established for the express purpose of bringing SAK's expertise and experience as a prime contractor performing CIPP and other sewer pipe repair/ rehab/ replace techniques to the region.
D.	Any Bidder who has restructured or changed names for any reason within the prior five years shall indicate the name of the previous company and the date of the completion of the formation of the new company.	SAK has not restructured or changed names for any reason within the prior five years.

The Taylor, MI office now entering its second year of operation has shown tremendous growth and strength becoming a key member of the total corporate entity. SAK is dedicated to providing our clients with the best products and services possible. Please see Appendix B: Local Preference for Letters of Recommendation.

As members of the Public Works Community, we support the organizations that help to improve the quality of all our lives through public works and community. We are active members of the following organizations:

- Downriver Branch of American Public Works Association
- Michigan Chapter of American Public Works Association
- Michigan Water Environment Association
- Michigan Chapter of American Water Association
- Michigan Rural Water Association
- Southern Oakland County Municipal Engineers
- National Association of Sewer Service Companies
- National Association of Trenchless Technologies

As stated above, SAK has completed over 16.3 million linear feet of sewer mains rehabilitation. There are a number of projects that SAK has completed that were Term Contracts or On-Call Contracts, involving yearly renewals and various elements that are listed in the services requested, see Table 4.

Table 4. Term Contracts and On-Call Contract Examples

PROJECT EXAMPLE	PROJECT NAME	# OF TASK ORDER, WORK ORDERS, YEARLY RENEWALS	LINEAR FEET & DIAMETER	SEWER CLEANING	INTERNAL VIDEO INSPECTION	SECTIONAL OR SPOT LINING	MH TO MH LINING	LATERAL LINING	JOINT TESTING, SEALING WITH CHEMCIAL GROUT
1	WSSC, Sligo Creek ESA IDIQ	3 Task Orders	17,962' of 8"-18"	X	X	X	X		X
2	WSSC, Northwest Branch ESA IDIQ	7 Task Orders	6,580' of 8"-10"	X	X		X	X	X
3	WSSC, Western Branch ESA IDIQ	10 Task Orders	27,243' of 8"-66"	X	X		X	X	X
4	WSSC, Watts Branch ESA IDIQ	4 Task Orders	13,366' of 8"-27"	X	X	X	X		X
5	WSSC, Paint Branch ESA IDIQ	4 Task Orders	15,982' of 8"-27"	X	X	X	X		X
6	WSSC, Horsepen ESA IDIQ	2 Task Orders	321' of 8"-21"	X	X		X		X
7	WSSC, Rock Creek ESA IDIQ	5 Task orders	32,102' of 8"-36"	X	X	X	X		X
8	KCMO, City-Wide Sewer Infrastructure Rehabilitation with Waterways	3 Work Orders	13,639' of 8:-54"	X	X		X	X	
9	CEG, Large Diameter Sewer Rehabilitation Program	65 Work Orders	116,211' of 6"-120"	X	X	X	X		

18.6 WORKPLACE SAFETY

a. Evidence of OSHA-approved safety training program

Safety is the core of SAK's culture. The personal commitment from all SAK team members to "Focus on Safety" every day, defines our company and culture. The people working on our projects are our most valuable resources, and we want to ensure everyone goes home safely to their loved ones. We work tirelessly to hone our means and methods to ensure predictable and safe results.

SAK's health and safety program, Focus On Safety, enables us to complete our work by the safest means possible with the goal of achieving ZERO incidents. While our zero-incident goal is ambitious, we truly believe it is achievable. Focus On Safety uses three guiding principles:

STOP: Physically stop, take a break, and pause before acting when conditions are not standard operating procedures.

THINK: Identify and evaluate safety risks before reacting.

ACT: Proceed after assuring that the work environment is safe.

This safety-first attitude is every bit as important as SAK's thorough policies, procedures, and training. The City of Livonia can be assured that SAK prioritizes safety in every aspect of the work they do. Please see Appendix C: Workforce Safety for Table of Contents and Commitment Letter from SAK's Health and Safety Plan, entire document is available upon request.

Employee and Job Site Training

SAK emphasizes employee and job site training as essential to preventing injuries. New employees are put through a rigorous three-day safety orientation and training class prior to beginning any field activities. Annually, all field personnel are required to attend a four-day training course where previous training information is refreshed and new topics and procedures are introduced. For all field crews, each morning a toolbox meeting is held that covers a different safety topic relevant to that day's work. In addition, we demand our subcontractors meet our stringent standards for safety.

SAK's healthy and safety program, Focus on Safety, enables us to complete our work by the safest means possible with the goal of achieving ZERO incidents

This continuous-training approach ingrains safe working habits at the beginning of employment, on a daily basis, and annually during the intensive training course. In addition, all field employees are required to participate annually in the 10-hour or 30-hour OSHA and 8-hour first-aid/CPR training. Our workers are prepared to perform their activities in a safe manner by completing the following safety programs and training courses prior to starting work with the company, and ongoing throughout their employment:

Training Courses and Safety Programs

- SAK Safety and Accident Prevention Plan
- DOT
- Confined Space (Permit Required)
- Hazardous Communications (HAZCOM)
- Fall Protection
- Hand and Power Tools
- Ventilation
- Illumination
- Flood Control
- Emergency Procedures, including excavation plans and check-in/check-out systems
- Substance Abuse and Alcohol Policy
- Driver Orientation
- Blood-bourne Pathogens
- HAZMAT
- Electrical Safety
- Respiratory Protection
- Air Monitoring
- Communication
- Mechanical Equipment
- Personal Protective Equipment
- Lock Out/Tag Out Procedures

b. Worker's Compensation EMR rating

SAK's policy and approach to safety has resulted in an extremely low **EMR of 0.59**. Please see table below detailing

SAK's EMR Rating for last three years as well as Appendix C: Workforce Safety for an EMR Letter verifying data provided.

Table 5. EMR Rating

YEAR	2023 -2024	2022 -2023	2021 -2022
COMPANY	EMR	EMR	EMR
SAK	0.59	0.52	0.52

c. OSHA 30-hour training program

Please see Appendix C: Workforce Safety for a list provided detailing all SAK employees that have OSHA 30-Hour and 10-Hour certification. Copies of certificates are available upon request.

18.7 WORKFORCE DEVELOPMENT

b. Department of Labor Apprenticeship Program

SAK participates in an apprenticeship and training program in conjunction with the National Laborers' Union of North America (LiUNA) via the Missouri and Kansas Laborers' District Council. Please see Appendix D: Workforce Development for a letter from the Apprenticeship Program Coordinator detailing SAK's association with the Apprenticeship Program and the United States Department of Labor Office of Apprenticeship Certificate of Registration of Apprenticeship Program.

SAK's employees are the most important asset. As part of SAK's mentoring program, SAK provides training on quality performance, "doing it right the first time", and the importance of proper and effective construction techniques.

c. Skills assessment for other employees

In addition to the apprenticeship and training program, SAK trains all CIPP crew members in Safety, CPR, First Aid, Confined Space and other applicable areas necessary for CIPP installation. All crew members are OSHA 10-hour certified and are all trained by Pipenology (liner manufacturer) to be certified installers of CIPP.

d. Social Equity

SAK currently has 379 employees nationwide, 22 employees residing in Michigan and 14 employees residing in Wayne County, MI.

e. Evidence of Equal Opportunity Program

Please see Appendix D: Workforce Development for SAK's Equal Employment Opportunity & Affirmative Action Policy Statement.

f. Equal Opportunity Employment Assurance

It is the policy of SAK Construction to not discriminate against any employee or applicant for employment because of age, race, religion, color, disability, gender, physical condition, developmental disability, sexual orientation, national origin, genetic information & testing, family & medical leave, gender identity/expression or veteran status and to take affirmative action to employ and to advance in employment all persons regardless of their status, and to base all employment decisions only on valid job requirements.

SAK Construction is committed to applying equal employment opportunity (EEO) policies in order to ensure that its policy of non-discrimination and affirmative action is accomplished. Specifically, SAK Construction does not discriminate on the basis of veteran status or disability status, and will not make any distinctions based on such.

Employment decisions will be based on valid job requirements only.

This policy applies to all employment actions, including but not limited to recruitment, hiring, promotion, transfer, demotion, layoff, recall, termination, rates of pay or other forms of compensation and selection for training, including apprenticeship, at all levels of employment. Employees of and applicants to SAK Construction will not be subject to harassment, intimidation, threats, coercion, or discrimination because they have engaged or may engage in filing a complaint, assisting in a review, investigation, or hearing or have otherwise sought to obtain their legal rights related to any federal, state, or local law regarding EEO for qualified individuals with disabilities, or qualified protected veterans.

SAK Construction maintains that it will abide by any collective bargaining agreement by adhering to written conditions of employment set forth therein. Such agreements shall not be inconsistent with the guidelines of this Affirmative Action Plan.

We prohibit retaliation against individuals who bring forth any complaint, orally or in writing, to the employer or the government, or against any individuals who assist or participate in the investigation of any complaint or otherwise oppose discrimination.

SAK Construction and its President, Jerry Shaw are committed to the principles of Affirmative Action and Equal Employment Opportunity.

Please see Appendix D: Workforce Development for SAK's Equal Employment Opportunity & Affirmative Action Policy Statement.

18.8 ABILITY TO PERFORM

Financial Stability

The following documents are included in Appendix E: Ability to Perform to show SAK's financial stability

- ✓ Surety Letter
- ✓ 2023 Audited Financial Statement (Confidential)

Established in 2006, SAK has produced profitable returns for many years, with a strong balance sheet that is not highly leveraged. SAK has a long-term relationship with BMO Harris Bank, N.A. since 2010, with a $30 million available line of credit if needed to fund ongoing operations. SAK has never been in default of any of our banking covenants since the start of SAK.

SAK's project management process and financial tools, both tied together, have enabled SAK to manage its growth conservatively and consistently during the past 18 years. SAK is now the largest privately held pipe rehabilitation contractor in the U.S.

Strong financial success starts with the project estimate, where we accurately account for materials, labor, equipment, and general expenses for SAK's self-perform scope of work, as well as the subcontracting costs for CCTV and cleaning, bypass, manhole rehabilitation, excavations and traffic control, using our proprietary estimating program. After contract award, this information is input into Viewpoint, where all project management and accounting for the project is tracked, monitored, and adjusted on a weekly, monthly, and project-by-project basis by corporate accounting and the Project Manager. Smartsheet is a real-time online project management database that enables centralization and collaboration on every piece of the project. The estimate, the data in Viewpoint, and the use of Smartsheet ties all together, allowing us to manage the project effectively and efficiently, ensuring the project is delivered to the client's satisfaction.

Available Resources

SAK was incorporated in 2006 and has grown considerably in the past 18 years. SAK has installed CIPP in 3,096 miles of pipe (16.3 million feet) and recently surpassed $1.8 billion in total revenue. Currently, 2024 forecasts estimates

$280 million in construction revenue and $15 million in Michigan. Our team has a strong performance record and solid reputation for completing projects on time and within budget. Since inception, the CIPP division has grown from a single six-man crew to 22 crews working nationwide. Our 379 employees employed nationwide complete an average of 125 projects per year.

SAK's Taylor Operations includes 23 team members dedicated to trenchless pipeline rehabilitation services in Michigan and Ohio. Our fleet is extensive. Please see Appendix E: Ability to Perform Documentation for a listing of equipment available to our Taylor location. This expansive fleet of equipment includes redundancy of each unit ensuring that if equipment issues are encountered, the project will be completed on time. In the unlikely event that our local resources are not adequate, we have the option to deploy resources from other locations as close as Kansas City, Mo, Chicago, IL or O'Fallon, MO to accomplish the project goals and remain on schedule.

Executive and Management Personnel

SAK's Taylor Operations has a strong Executive and Management Team that understands the parameters associated with this project and is committed to achieving all the project goals and objectives. For this project the following Executive/Management Team is proposed:

Table 6. Executive and Management Personnel

EMPLOYEE	POSITION	ROLE ON PROJECT
Dale Newby	Area Manager	Leader of the personnel and equipment resources
Brandon Stangle	Operations Manager	Manager of operational resources
Dawn Young	Project Manager	Liaison and Manager of all City of Livonia Projects
Derrick Witz	Assistant Project Manager	Assist Project Manager and be a point of contact for the City of Livonia
Don Krupp	Site Superintendent	On-site leader of labor, equipment, and material resources

In addition to the above, SAK has significant resources to provide dedicated support staff, including:

Tim Bussen, Central Region General Manager

DALE NEWBY, AREA MANAGER • 20 YEARS EXPERIENCE

Dale was the founder and owner of a successful technology business prior to moving into the CIPP industry. In 2009, Dale entered the underground rehabilitationworld in Michigan and he immediately, utilized his skills to develop an Electronic Support Department into an efficient business unit that could support the maintenance and repair of over 30 CCTV cameras, 10 robotic cutters, a fleet in excess of 50 units, computer support services for over 80 employees as well as the management of all associated labor, materials and equipment. In his role as Area Manager, Dale has been involved with the completion of over 1,400,000 feet of CIPP liner installed. He has been responsible for all portions of the region including acquisition of materials, liner impregnation (wet out), pipe preparation, CIPP installation, lateral reinstatement, bypass pumping, business sustainability, goal setting, financials, and homeowner notifications. Although Dale's formal background is not directly associated with such activities, he has developed a thorough knowledge of CIPP lining while working within this industry for now over 20 years.

BRANDON STANGLE, OPERATIONS MANAGER • 16 YEARS EXPERIENCE

Brandon has 16 years of experience working in the trenchless pipeline rehabilitation industry in the Michigan area. Brandon started his career as a Laborer in 2008, performing many job functions such as Operator, Team Lead, Superintendent, Project Manager, Operations Manager, Senior Project Manager and Area Director. Brandon has predominantly worked in communities within the state of Michigan. Brandon has worked on many different types of projects including procurement methodology (bid, piggybacked, and term), scope size that ranges from $10k to up to $6MM and core work of lining that ranged from 2k feet up to 60k feet. He has also either performed or managed PACP pipe coding and CIPP point repairs. Brandon's experience has been

developed in the following regional Michigan communities: Bay City, Zillwalkuee, Flint, Genesee County, Swartz Creek, Grand Blanc, Flushing, Lapeer, Holland, Muskegon, Lansing, Southfield, Berkley, Livonia, Bloomfield, Farmington, Romulus, Waterford, St Clair Shores, Mt Clemens, Roseville, Centerline, Lincoln Park, Riverview, Trenton, Southgate, Woodhaven, Redford, Northville, Pontiac, Westland, and Canton.

DAWN YOUNG, PROJECT MANAGER • 3 YEARS EXPERIENCE

Dawn is a Project Manager with 3 years of experience working in trenchless rehabilitation industry in the Michigan area. She has worked on many projects with varying scopes throughout Eastern Michigan from Flat Rock to north of Bay County. These projects have included small and large municipalities that were either managed by engineering firms or city staff, with all being managed with the same care and attention to detail. During her time, she has managed several projects within Wayne County specifically including 2 annual contracts in Dearborn Heights and Canton Township, term projects in Plymouth, Gibraltar, Flat Rock as well as some large diameter projects for GLWA. Dawn considers it her duty to ensure all clients receive the necessary attention to detail and sufficient communication throughout the course of the project. She takes pride having the ability to work on improving the infrastructure of the community she was raised in.

DERRICK WITZ, ASSISTANT PROJECT MANAGER • 2 YEARS EXPERIENCE

Derrick's career started as a utility serviceman for a small "downriver" community. His experience and training from there, propelled him into NASSCO and the field of pipeline assessment and rehabilitation. Since 2002, Derrick has worked as a Project Manager for CIPP programs across the state of Michigan. He has managed CIPP rehab programs for the City of Livonia, Lincoln Park, Riverview, Redford Township, and Canton Township, as well as Genesee County. He is aware of the difficulties our aging infrastructure faces and takes pride in advancing his knowledge toward possible solutions. These projects have included multiple aspects of infrastructure rehabilitation, including relining/rehabilitation of watermains, manholes, sanitary mainlines, and storm mainlines. Derrick's responsibility as an assistant Project Manager is to facilitate clear communication between all parties and confirm that all requirements are met to successfully complete the project. Above all, he is proud to serve his local community with necessary infrastructure services.

DONALD KRUPP, SITE SUPERINTENDENT • 15 YEARS EXPERIENCE

Donald is a Site Superintendent with 15 years of experience working in trenchless rehabilitation in the Michigan area. He has worked on a large number of CIPP projects throughout the entire State of Michigan. Starting his CIPP career as laborer in 2009, he quickly progressed through the ranks to Team Lead and now is a Superintendent. He has worked on many large and small diameter CIPP installs, using both water and steam cure. He is responsible for setting up installs, ordering liners, and overseeing crews.

Construction Team Members

Dale Newby and the SAK management team lead a diverse local team capable of rehabilitating the sewer systems for the City of Livonia. SAK is a major supporter of local subcontractors in the region. To foster a prosperous and diverse contractor community, **SAK prepares our subcontractors for success**.

SAK leads a team of subcontractors that includes those highlighted in Table 7:

Table 7. Subcontractor Team

SUBCONTRACTOR	EXECUTIVE MANAGEMENT PERSONNEL	SERVICES PROVIDED
Advance Underground Inspection	Jeana Moir - Owner/President Steve Johnson - BD Manager	Cementious Manhole Lining
Advanced Rehabilitation Technologies	Dustin Schlachter - Owner/ President Alex Lantz - Representative	Cured-In-Place Manhole Lining

Table 7. Subcontractor Team

SUBCONTRACTOR	EXECUTIVE MANAGEMENT PERSONNEL	SERVICES PROVIDED
BLD Technologies	Jeremy Lange - Technical Representative	CIPP Lateral Lining

Corporate Awards and Recognition

At SAK, we believe that hard work and dedication should always be recognized and celebrated. Our commitment to excellence is reflected not only in the quality of our work but also in the countless accolades and awards we have received over the years. We are proud to showcase our achievements and honor the individuals and teams who made them possible.

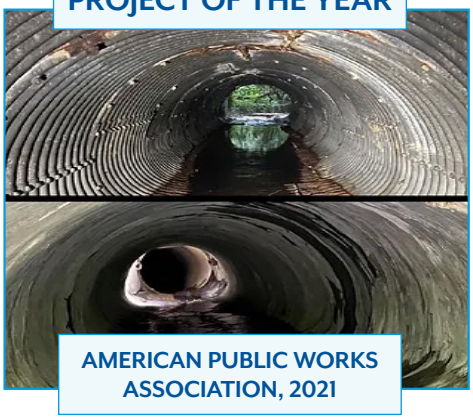
PROJECT OF THE YEAR, RUNNER UP

TRENCHLESS TECHNOLOGY MAGAZINE, 2022

66-In. Trunk Sewer Rehabilitation

Napa, CA

PROJECT OF THE YEAR



AMERICAN PUBLIC WORKS ASSOCIATION, 2021

Newport/Yeatman Box Culvert Improvements

Webster Groves, MO

PROJECT OF THE YEAR, HONORABLE MENTION

TRENCHLESS TECHNOLOGY MAGAZINE, 2020

SAWS Multiple Sewershed Package 2A

San Antonio, TX

ADDITIONAL HONORS	HONORED BY	YEAR
Project of the Year	Michigan APWA	2024
Superior Safety Performance	Associated General Contractors of American	2021
Top 100 Private Companies	St. Louis Business Journal	2019
CMA Star | Employee Communications	Construction Marketing Association	2018
Corporation of the Year	National Forum for Black Public Administrators	2016
Top 20 Firms in Utility	Engineering News-Record	2012
Top Specialty Contractors	Engineering News-Record	2012
Top 100 Private Companies	St. Louis Business Journal	2012
Top Specialty Contractors	Engineering News-Record	2011
Top 20 Firms in Utility	Engineering News-Record	2011

Proposed Work Plan

This section describes our processes and approaches for analyzing task orders to identify cost-saving opportunities as well as our methodologies for getting in and out of the construction areas with minimal impact, executing the rehab/repair/replace activities, and restoring the site to the same or better pre-construction condition.

Upon receiving a Task Order from the City of Livonia, SAK representatives will develop an estimate of cost and detailed work plan to accomplish the desired project goals. Upon completion of the estimate and project plan, SAK

will present them to the City and/or their Representatives for input and approval.

Estimates will be based on the application of appropriate line items as outlined in the Price Page of the Agreement. Once approved by the City, a Notice to Proceed will be given.

PRECONSTRUCTION PHASE

Following the Notice to Proceed and prior to mobilization to the site, the SAK Team will complete all pre-construction activities in close collaboration with the City's Project Management Team and ancillary agencies. Initial site visits by the SAK Project Manager and Subcontractors will be conducted to reconfirm the conditions of the system and the project plan. Based on the Scope of Work and current site conditions, with respect to the physical environment in and around the site, a Safe Work Plan and Job Hazard Analysis will be completed and incorporated into the Project Construction Plan. The SAK Team proposes that a Pre-Construction Meeting be conducted with the City's Project Team to ensure that all project requirements are addressed.

During the Preconstruction Phase, the Team (including subcontractors) gains a thorough understanding of the task. This includes a site visit and walkthrough to confirm conditions and plan the project.

This includes:

- The review of QA/QC Procedures
- The coordination of emergency services
- The confirmation of project details
- Public Notification Process
- Safe Work Planning
- Construction sequencing and progress
- Project schedule review
- Quality Control monitoring during installation

Our Project Plan is based on an understanding of the Project Goals including:

- Sewer Cleaning, including debris and grease removal, obstruction and root cutting, protrusion reaming in both main and lateral pipelines.
- Internal video inspection via CCTV video recording in mp4 format. The Contractor must be able to provide this service for the recording of mainline and lateral sewers including recommendations of specific corrective measures. All inspections shall be completed using the most current version of NASSCO Pipeline Assessment and Certification Program (PACP) for identifying observations.
- Deliverables will include a detailed report of the pipes surveyed per the specifications provided later in this document, as well as portable file storage device or other media acceptable to the City, which is clearly labeled and contains digital files named in accordance with the City's filing convention.
- Sectional lining of sewer with the use of a resin impregnated fabric liner (CIPP).
- Relining sewer sections from manhole to manhole with a resin impregnated fabric inversion liner (CIPP).
- Relining service laterals from the mainline toward the premises with a resin impregnated fabric inversion liner (CIPP) including the installation of a cleanout at the right-of-way.
- Pipe joint testing and sealing utilizing chemical grout.
- Rehabilitation of existing manhole structures for the purposes of inflow/infiltration control and/or structural purposes. The material and process utilized for this rehabilitation shall have prior approval by the City.
- Providing on-call/emergency response for the City of Livonia and general project management for the projected $1MM per year rehabilitation of sewer infrastructure.

PERMITTING AND PUBLIC NOTIFICATIONS

The SAK Project Manager will coordinate all permitting requirements with the designated City's Project Team and/or Representative. Any and all public notification requirements will be completed at a minimum of seven days prior to the first day of the effective date of the permit. The SAK Project Manager will communicate permit adherence and restrictions among its crews as well as those of our subcontractors. The SAK Project Manager in coordination with City of Livonia Representative will establish a Daily Notification chain that will serve as the means to communicate daily work activities to those who may need to be made aware of such activities. A General Project Notification will be distributed to all residents and businesses within the general project areas.

PROJECT ACCESS PLAN

Understanding of the project sites and the potential impact of equipment in residential subdivisions with landscaped yards, etc. has been considered instrumental to the success of this project. Our proposed plan was built with the priority of minimizing the surface disruption while maintaining a consciousness of the project milestones and overall schedule. The creation of a project plan designed to meet these goals is the first step into achieving this challenging goal.

Our plan was developed to satisfy the following:

- Meet with City of Livonia approval
- Satisfy all Project Safety needs
- Satisfy our CIPP needs
- Satisfy any open trench pipe repair needs
- Satisfy our flow control requirements
- Be cost competitive
- Minimize surface disruption and homeowner impact
- Minimize the amount of City resources needed on the project

"We are constantly looking for better ways to get projects done quickly, cost-effectively, and with the least impact to the environment and stakeholders."

We believe that we have met all these objectives relating to optimizing the project goals and maximizing the overall project value. Prior to proceeding our Site Superintendent will coordination with City Representatives and perform a complete site walk to establish the detailed needs for each location. Once established, our Team will proceed with public notification distributed to the subdivisions that will be affected during the project. This will be hand delivered and placed in a location that will be noticed by the homeowner/business. Instructions will be included as to who to contact should they have questions. If found to be necessary, our Project Team subcontractor, following notification of MISS DIG, will mobilize and complete the open trench pipe repair.

MAINTENANCE OF TRAFFIC

In conjunction to the establishment of access plans, traffic control plans per the standards of the Michigan Department of Transportation, Road Commission of Wayne County and the City of Livonia will be developed. The impact of operations including bypass routes will be taken into consideration during the development of these site specific plans. Traffic control measures will be established and removed at the completion of each workday to reduce the impact of the project activities on the public. In high traffic areas the potential of performing night operations may be considered in locations where it may be applicable to reduce socioeconomic impacts. Permission would be requested prior to any work being performed outside of the City's working hours or within those roadways of other agencies.

BYPASS OF FLOWS

Prior to each CIPP installation, our Project Team will establish an above ground bypass system sufficient in size to

maintain proper sewage service to all those connected upstream of the project area. Flows from the bypass system will be reintroduced to the sanitary collection system at a location that will have satisfactory carrying capacity to transport all existing and introduced flows. Our Project Team is very familiar with the collection system of the City of Livonia from its numerous previous experiences on City of Livonia's projects. Our Project Team is very well versed in the objectives/goals of this project and the expectations associated with the bypass activities.

OUR PROJECT PLAN IS BASED ON ACTIVATING THE BYPASS OPERATIONS DURING THE FOLLOWING OPERATIONS:

PIPE MEASUREMENT	• The bypass system will be engaged only as necessary should it be found that high flows prevent the ability to complete the work.
CIPP LINER INSTALLATION	• The bypass system will be engaged only during the on-site activities and upon completion of each liner installation the bypass will be dismantled and removed prior to departure of the crew.
PIPE JOINT SEALING WITH CHEMCIAL GROUT	• The bypass system will be engaged only as necessary should it be found that high flows prevent the ability to complete the work.

As a final procedure of disengaging the bypass system, all pumps and discharge piping will be drained prior to removal from site. The process of draining the discharge pipe will use techniques that utilize gravity to drain the water from the discharge pipe. In some instances, the injection of pressurized air to force the water out of the pipe may be used. In all instances, the water within the discharge piping will be discharged into the sanitary sewer and no sewage will be discharged on the surface including paved roadways, storm sewers, green space, etc.

Our plans will be developed to reduce the risks associated with potential wet weather events, mechanical failure, or other potential negative impact to the bypass system that would result in basement flooding and /or a sanitary sewer overflow. It is important to note that all project managers, lead hands, crew leads, pump watch personnel, and other key individuals will be in constant 2-way communication. They always carry 2-way radios to ensure availability.

The flow control plans will detail the following:

- Working hours during the pumping
- Wet weather flow management plan
- Contingency plans including but not limited to emergency response plan for wet weather flow events, pump breakdown and spill response etc.
- Procedures for addressing the public concerns such as driveways, noise, pump/equipment site location to minimize impacts
- Diversion Plug information and details

We will be ready and equipped to deal with potential spills. We will have multiple spare parts (properly sized) including tools at the ready in case of pipe damage. Once the CIPP liners are installed and post CCTV inspection is completed and accepted, the decommissioning can begin. Following each CIPP liner installation, the pneumatic plugs will be removed, and the pumps shut down. At this stage, the sewer system has been returned to service and is operating as designed. Before any of the pipe is dismantled it will be thoroughly flushed with hydrant water. After flushing, should gravity tactics not be sufficient than an air compressor may be hooked up to blow the remaining water out of the system. All discharge water will be reintroduced into the sanitary sewer system and will not be allowed to be discharged / spilled onto the surface, into the storm water system and/or into a water course.

CCTV, CLEANING AND PIPE PREPARATION

CCTV, cleaning and pipe preparation will be performed by SAK crews. CCTV equipment will be equipped with 1,000 ft rolls of coax cable to increase the ability to inspect the complete length of the sewer from fewer set up locations thus minimizing the number of vehicles set ups and maximizing daily production. This reduction will decrease the

overall impact to the surface conditions and result in less damage and restoration.

Pre-lining CCTV inspection crew operating TV truck verifying sewers are ready for lining operations to start.

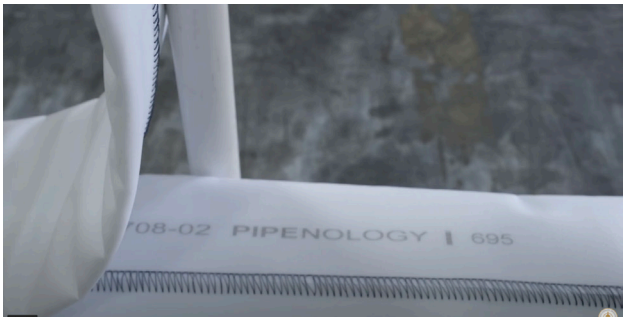
In rear yards or easements, we will utilize smaller track driven self-propelled pipe cleaning reels preventing the need to have vactors access these potentially sensitive locations. The reduction of this large truck traffic will decrease the impact to ground conditions and overall damage to the landscaping of each property. All debris encountered in the pipe during these operations will be removed for disposal at a facility equipped and licensed to handle such materials. Pipe preparation may include the removal of obstructions by passing reamers if pipe conditions warrant it. SAK possesses the ability to utilize flair reamers typically used for the removal of roots, calcite or grease. This style of reamer uses a high-speed motorcycle style chain that performs a superior job in removing the calcite and loose or mushy concrete without damaging the host pipe. Should other obstructions be encountered such as hanging gaskets, intruding reinforcement wire, etc., then SAK possesses the equipment and personnel to apply pneumatically powered remote controlled robotic cutters designed specifically for more sensitive pipe conditions and cutting of obstructions in heavily damaged pipe conditions.

Upon completion of the pipe preparation a pre-lining CCTV inspection is performed showing the full circumference of the sewer to ensure the sewer has been made ready for lining. A copy of the inspection will be submitted to the City's Project Team for review and consideration of material design prior to ordering. All cleaning and inspections will be completed by operators PACP certified per NASSCO standards. Please see Appendix E: Ability to Perform for a list of all PACP, LACP and MACP certified employees.

CIPP LINING MATERIALS

The Pipenlogy CIPP product is a composite structure made of various components of high quality materials that upon completion of installation, lead to a durable, chemically resistant, high-strength material that will provide a long-term solution to the City of Livonia's infrastructure needs through a minimum liner design life of 50-years. There are essentially two (2) main constituent parts of the Pipenology CIPP liner creating the finished composite. Those parts are the Pipenology's Non-Reinforced CIPP Tube, and a thermosetting resin. After a successful installation, these two constituent parts make up the finished composite that we call Pipenology CIPP liner. Each constituent material, the finished composite, and the design considerations of the finished composite are discussed below.

Pipenology Non-Reinforced CIPP Tube



Every Pipenology CIPP liner is stamped with footage markings and an identification number for tracking purposes.

Because of our long-term commitment to product research and development, Pipenology, a subsidiary of SAK, can provide the most innovative and versatile pipeline rehabilitation technologies within our market. We are proud of our state-of-the-art manufacturing facilities and research and development laboratory. Our team of engineers and researchers continue to improve our products and develop new product applications. Besides improving our existing product, we continue to add to our numerous products already in place throughout North America to remain an industry leader. SAK is a fully vertically integrated sewer Rehabilitation Company. In other words, we take complete responsibility from research and development to manufacturing to installation. Pipenology is ISO certified, recognized by the American National Standards Institute. The technology upon which

our company was founded in 2006 is principally based on the use of our carrier tube which is a polypropylene (PP) coated, polyester needle punched felt material that is tailor made to meet the specific needs of each application. This time proven material is manufactured so that the felt material is made to have specific stretch, strength, and compressibility characteristics to help facilitate liner installation, and ensure consistency in finished composite thicknesses and strength. Further testing of the carrier tube is completed via ASTM D5035 "Standard Test Method for Breaking Strength and Elongation of Textile Fabrics". This testing provides minimum criteria for the carrier tube assuring the liner will not be in jeopardy of thinning-out during the installation and/or curing process, therefore, creating the possibility of liners below minimum design requirements. To minimize the potential impact from outside suppliers, Pipenology maintains enough felt to meet the demands of their installation crews across North America. The physical properties used in the structural design of our liners are reviewed on a regular basis to ensure they are based on attainable real-world results. In fact, the values that we have submitted herein are based on actual field samples values and not theoretical laboratory numbers. All of this assures that the finished cured pipe the City receives in their sewers will attain a 50-year design life in every aspect of its operation.

Polypropylene(PP) coating has been successfully installed in millions of feet by SAK. The switch to PP coated tubes from our Polyethylene coated tubes is a result of upgrading the coating's ability to perform with the higher temperatures associated with the Air-Inversion-Steam-Cure (AISC) methodology. This is necessary to assure that the coating does not melt during curing and therefore compromise the finished CIPP composite. The Pipenology liner is also fabricated so that, when inverted, it is in intimate contact with the host pipe wall along its entire circumference and is generally free from wrinkling, except for where changes in the circumference or bends in the alignment occur. It should be noted that the felt only acts as a "form" to place the resin in a uniform thickness around the entire circumference of the pipe and does not significantly contribute to the structural integrity of the cured liner. During manufacturing, the tube is inspected to insure proper diameter, length, thickness, and an imperforated coating on the outside of the tube.

The Pipenology Liner tube also consists of several layers of felt, which serve to fulfill three objectives:

(1) Absorb the resin

(2) To hold the resin in position and give dimensional stability prior to curing

(3) To provide sufficient strength for the inversion process to take place

As a final quality check, our tube is tested at the wet-out facility utilizing a vacuum pump to further verify proper manufacturing and to assure there are no holes or defects in the polypropylene coating. Only after these tests are performed is the resin impregnation process, or "wet-out", allowed to proceed. The physical properties of the finished Pipenology product are largely a function of the type of resin system used. For the City of Livonia, we propose to utilize our enhanced polyester resin system exclusively manufactured by Interplastic. In addition to Interplastic's internal quality checks, upon receipt of the resin shipment at our O'Fallon, MO wet-out facility, Pipenology mixes the catalysts BCHPC and TBPB, into a resin sample and tests the catalyzed resin for cure properties, specific gravity, and viscosity. If the resin meets all the necessary prescribed parameters, it is cleared for utilization in the Resin Saturation (wet-out) process described below. With the marriage of the Interplastic polyester resin and the Pipenology tube, the Pipenology CIPP product is complete. The physical properties and values that SAK used in the structural design of the liners are reviewed on a regular basis to ensure they are based on attainable real-world results.

Pipenology liner quality check in wet-out facility to ensure durability and quality.

In addition to the proven track record of SAK's installations that continue to successfully perform decades after initial installation, another measure that is used to assure that the liner will perform over time, is to test cured liner using industry accepted testing methodologies ASTM D790, D2990.

CIPP LINING DESIGN

SAK maintains and retains Professional Engineers as part of their existing staff in addition to their supportive Consulting Team. The Design Engineer for materials on this project will be a Michigan P.E.

A sample Preliminary Design has been included for your review. The in place CIPP thickness will be calculated based on information outlined in the bidding documents. Please See Appendix E: Ability to Perform. Following the completion of the pre CCTV inspection and pipe measurement but prior to material order/manufacturing, the SAK Project Manager will submit a CIPP liner design for each manhole to manhole section sealed by a Professional Engineer licensed in the State of Michigan to City of Livonia Project Team for review and confirmation.

Below is a list of typical design assumptions for CIPP:

- Design Life: 50 Years
- Design Condition Fully Deteriorated
- External Hydrostatic Pressure 1/2 Depth to Invert or 5ft below ground surface whichever is closer to the ground surface
- Ovality 2% or the actual ovality, whichever is greater
- CIPP Liner Flexural Modulus Used for Design 400,000 psi
- Design Method ASTM F1216-07a, Appendix XI, Design Considerations
- Safety Factor 2.0 for all equations
- External Earth Load Actual Depth to Invert
- Soil Weight 120 lb/ft3
- CIPP Liner Flexural Strength Used for Design 4,000 psi
- XI.2 Gravity Pipe, later versions of Appendix XI are not acceptable
- Design Diameter per Plans
- Live Load AASHTOHS20
- Soil Modulus 1,000 psi

CIPP LINING INSTALLATION

Resin Impregnation (Wet-out)

All materials that make up the liner are inspected upon arrival at the O'Fallon, MO facility. The resin impregnation, or "wet-out", will only commence upon completion of the product quality tests and all site preparations have been completed. The owner's representative(s) are welcome to inspect all aspects of the resin impregnation. The wet-out facility uses bulk resin storage and computer controlled static mixers. By utilizing bulk resin shipments, the resin consistency from batch-to-batch is better than what is achieved with older barrel delivery methods. Furthermore, by sending via bulk transport, resin temperature during delivery is controlled, as are the bulk storage tanks at the wet-out facility. By maintaining the proper temperatures, resin viscosities can be optimized therefore maximizing the amount of resin saturation into the tube.

Another benefit with the Pipenology wet-out facility is that computer controlled static mixing is used. Static mixing is a superior method to mix all of the constituent parts of the finished liquid resin (base resin, catalysts, dye). Older methods of barrel mixing use paddles to combine the materials together, but also introduce air into the resin that is later pumped into the tube. By introducing air, the resin is less dense and therefore has a direct effect on lowering physical properties of the finished composite.

Design CCTV Inspection & Diameter Verification

A design CCTV inspection will typically be performed when the bypass system is operating. This inspection will confirm that the condition of the pipe is similar to contract design conditions. Any changes in condition will be immediately communicated to the City's Project Team. When the camera reaches the upstream or downstream manhole (depending on direction of travel) the cable will be pulled tight, and a tape mark will be made at the manhole where the CCTV is located. After the camera is retrieved, the cable will be stretched out and a steel tape measurement will be performed to determine the exact line length. In conjunction with the design CCTV, a confined space entry (with full safety equipment and confined space entry permit) is performed at both the upstream and downstream manholes to confirm the inside diameter of the sewer at both ends.

Quality Control and Monitoring

To counter the impacts of the unknown conditions during the curing of the liners such as material condition or temperature, the SAK CIPP installation team utilizes Thermal Imaging Technology for monitoring and recording of the cure data for all pipe runs 24-inches and greater, ensuring a full and proper cure. Where earlier efforts provided readings at intervals of 200 to 300 feet, our Thermal Imaging System enables our crews to monitor the curing process along the entirety of the pipe run. Our fiber optic technology will monitor the installation temperature at 6-inch intervals along the entirety of the pipe. The exponential increase in real-time data enables our teams to actively control the installations. More importantly, it will allow our crews to immediately react to any unfavorable or changing conditions. The result will be consistent, measurable quality on every installation. In addition to continual monitoring temperature readings at boiler trucks, remote monitoring of installations will be made available for viewing by the City of Livonia Project Team using a smart phone or computer from any location. It is the intent to install all liners on this project via the Air-Inversion-Steam-Cure (AISC) method. The AISC process installs the liner in a similar method for what has been done for over 40-years; however, instead of water being the substance creating hydrostatic pressure against the liner, low pressure air is used. The AISC methodology is typically more cost effective, time efficient and by utilizing less water, more environment friendly. The low pressure air causes the Pipenology tube to turn inside-out (inverted) into the damaged pipe so that the resin saturated felt is pressed firmly against the host pipe and the polypropylene skin becomes the inside of the newly lined pipe. By sandwiching the felt/resin tube between the host pipe and polypropylene coating, a resin rich composite is maintained.

The machine that performs the inversion is called an air inversion unit. This unit utilizes air pressure to invert the CIPP liner down the manhole and into the host pipe being rehabilitated. The installation continues as the liner moves through the damaged pipe. At the halfway point of the installation, a hold back rope and steam circulation layflat is attached to the un-inverted end of the liner. The hold back rope is used to control the inversion rate ensuring a slow steady roll of the tube, which pushes the standing water in the sewer out of the way of the tube. The inversion continues until the liner appears in the downstream, or "termination end", manhole at which point and time a "steam port" is introduced in the portion of liner that will later be cut & removed. With the installation complete, the boiler unit is moved into position. Curing commences and continues until curing temperatures have been achieved according to Interplastic and Pipenology specifications.

Curing

Once on site, the resin saturated liner is transformed into a finished CIPP liner through a controlled exothermic reaction or "cure". With the AISC method, curing is no longer accomplished by heating inversion water, but rather low-pressure air is replaced with low- pressure steam to impart heat energy to the resin to begin the cure process. As noted prior, the cure is monitored by Thermal Imagining Technology for diameters 24-inches and greater throughout the entire line at 6" intervals. The liner/host pipe interface (the coolest point of the liner that is in contact with the cooler host pipe) will be monitored to ensure minimum acceptable curing tempartures are reached, and sufficient exothermic reaction occurs.

Boiler truck operation during curing of CIPP liner

Steam is pumped throughout the tube. Multiple thermocouples are installed at both ends of the sewer in addition to the thermocouple running the entire length of the sewer. The end-to-end thermocouple is tied into a computer interface that continuously monitors liner temperature at the invert. The advantage to this method is a permanent record of the cure is recorded ensuring the resin consistently exotherms along its entire length. The thermocouples installed at the ends of the liner are monitored by field technicians recording the temperatures every 30 minutes during the cure. These are compared to

prescribed requirements and the cure schedule can be lengthened if low temperatures are recorded thus assuring the complete cure of the liner being installed.

In addition to using thermocouple wires to assure an appropriate cure, samples of the cured liner are taken in accordance with ASTM F1216 Appendix X1 and tested to verify design physical properties are attained. Testing of these samples is completed to ASTM D790 Standards and compared to the preliminary designs to determine compliance. The curing progress will be communicated to the City's Project Team to ensure that a City representative will be present when the sample is taken. For Sample test reports, please see Appendix F: Product Qualifications.

Service Connection Reinstatement

Once the ends of the cured liner are removed, all of the service connections without visible caps are internally reinstated. All of the service connections will be reinstated by remote controlled robotic cutting tools inserted into the pipeline. All lateral reinstatement operations are performed in conjunction with a CCTV inspection unit thus permitting the operator a full view of his operations within the pipeline. It is the intent to fully reinstate all service connections that are confirmed and verified by the City of Livonia staff, within 8 hours of the liner being installed. Notices will be hand delivered to all those entities affected a minimum of 24 hours in advance. The notice will indicate the timeframe for which service will be interrupted as well as contact information should they wish to inquire further. To ensure all services are reinstated, a tap cut verification table is created for each sewer section to receive a CIPP liner. This form identifies the location of each service to be reinstated and is signed off by the cutting operator and crew leader.

Post Installation CCTV

The post installation inspection will be performed after all services have been reinstated. The inspection is performed as per NASSCO standards by PACP certified operators as specified. Copies of the post installation CCTV inspection and PACP reports will be submitted as a means of additional verification of the successful installation and reinstatement of active services. All final inspections will be submitted to the City's Project Team for review and approval prior to the bypass being decommissioned.

RESTORATION OF DISTRUBED AREAS

Our Project Team understands the desired objective of the City of Livonia is to minimize surface disruption and/or damage to sensitive areas. To accomplish this goal, the SAK Project Team has developed a Project Plan to keep any surface disruption and restoration needs to a minimum. As an example, the use of the rubber construction mats may be utilized should it be found necessary to mitigate the amount of potential surface disruption or damage. Prior to proceeding with any surface restoration, our Project Manager and Project Team subcontractor will coordinate with City's Project Team to establish the end desired objectives in specific detail. These efforts will allow for a reduced restoration schedule and improved satisfaction of the Property Owner. Our restoration efforts will be completed by our Project Team subcontractor and will include all measures necessary to return the work area to its original condition or better. Any materials used for the purpose of this project will be removed.

EMERGENCY RESPONSE PLAN

Dependent upon the nature of an emergency, appropriate response controls will be in place. For matters of Health & Safety, onsite first responders will react. Our personnel are regularly trained in First Aid and CPR. At the start of each shift, the Project Manager or Superintendent will conduct a safety talk. The safety talk will discuss potential hazards of the job, environmental concerns, and other safety related issues. All team members will sign off on attendance at the pre-start safety meeting. In matters of operation emergency such as a bypass pump failure, the emergency plan as outlined in the specific flow control plan will be implemented. It is important to note that all Project Managers, Superintendents, Crew Leads, Pump Watch Personnel and other key individuals will be in constant communication via 2-way radios to ensure 100 % contact availability.

Project Team Subcontractors Role in Emergency Response

The nature of the emergency will dictate who is required to respond to a given incident. The onsite Project Manager will take the lead role in the case of an emergency with regards to being the point person on SAK's behalf. The pump watch personnel will have a specific / detailed protocol to follow in case of pump / piping failure. Pump watch personnel will not have to wait for word from the Site Manager to react as reaction time for flow control work is critical to avoid spills / flooding. They will have a plan and will be expected to follow it. In the case of an emergency, SAK Project Manager will handle all local public and governmental relations regarding the incident, unless another SAK Executive member has been mobilized to site.

Subcontractors will be directed to refrain from communications outside of those with the Project Team. All official correspondence will go through SAK. Subcontractors will be expected to perform first aid services as required on this project and to advise SAK Project Manager of the nature of the incident. All available onsite personnel/ Subcontractors will be expected to respond to an accident/incident when requested by a SAK Project Manager to assist in cleanup/rescue/repair etc.

Schedule

SAK Project Team will develop a reasonable project schedule that we are confident can be executed realistically and under safe conditions. The schedule will include allowances for holidays and some seasonal weather conditions to ensure that the human resources of both our Project Team and that of the City's may remain rested and mentally in tune with accomplishing the daily tasks in a safe manner with the mental attention this project requires. Should there be an instance an indicated milestone is not achieved due to any number of circumstances (i.e. – large wet weather events, extreme weather, etc.) we can obtain additional resources from either inter office operations or other inter-corporate locations. Our Project Team subcontractors also can obtain additional inter-corporation resources, should they be necessary. As such, our Project Team is confident we have the resources needed to perform any project needed by the City of Livonia under this scope of services.

Preliminary Project Schedule

Please see Appendix E: Ability to Perform.

Project Deliverables

The completion of the work in the field in a safe and high-quality manner, is the highest priority for the SAK Project Team, but the completion of proper documentation and records of what occurred are critical in ensuring the successful future management of the system for the City of Livonia. As such, the SAK Project Team deliverables for this project are essential to achieving the goals. Upon completion of the project, the SAK Project Manager will provide the following to the City's Project Team as deliverables:

- Copies of the Pre CIPP lining CCTV inspections and associated PACP reports/data base
- Copies of the Post CIPP lining CCTV inspections and associated PACP reports/data base
- CIPP designs sealed by a Professional Engineer licensed in the State of Michigan for each specific section receiving a liner
- CIPP wet out records for each liner installed on the project with clear indication of the specific liner location
- CIPP cured records for each liner installed on the project with clear indication of the specific liner location
- CIPP test results from each of the samples requested to be tested

18.9 PRODUCT QUALIFICATIONS

SAK provides a CIPP product that is a proven technology. SAK utilizes several time tested CIPP materials including Pipenology CIPP Liner and Interplastics resin. Pipenology is ISO-Certified and supplies CIPP liners throughout the country. Interplastic is also ISO-Certified, and SAK's multi-year supply agreements ensure a high quality, consistent supply, with quarterly price protections. Pipenology and Interplastic also have the necessary delivery logistics to

supply bulk resin to all our project locations, no matter how remote, at the correct delivery temperatures, for our numerous CIPP installations and OTH wetout installations. A well-tested supply delivery system for CIPP liners and bulk resin is critical to SAK's success in providing a quality product for all of our customers.

Pipenology, LLC CIPP liner manufacturing facility and assembly line.

Pipenology, LLC, with US Manufacturing facilities in O'Fallon, MO, is a wholly owned subsidiary of SAK. Pipenology has been manufacturing and supplying CIPP liners for both SAK and third parties for more than 10 years. SAK is an approved installer of Pipenology liners, and all SAK crew members have been trained to properly install CIPP liners in accordance with Pipenology specifications. Pipenology is an ISO 9001:2015-certified company. Over ten million lineal feet of Pipenology CIPP liners in diameters of 8" to 84" have been installed successfully nationwide.

Please see Appendix F: Product Qualification for additional documentation provided by Pipenology, LLC.

Pipenology Address and Contact Information:

Paul Stus, General Manager - Pipenology, LLC
1449 Hoff Industrial Drive
O'Fallon, MO 63366
636.542.6710

Interplastic Corporation, located in St. Paul, Minnesota, has been producing resins for the CIPP market for over twenty-five years with over 1.5 billion pounds of resin sold to rehabilitate deteriorated pipelines. These resins meet all the requirements of ASTM F1216, D5813, and F1743, as well as having been tested per ASTM D2990. Interplastic is ISO 9001 certified. SAK and Pipenology are certified installers of CIPP liners using these resins.

Please see Appendix F: Product Qualification for additional documentation provided by Interplastic Corporation.

Interplastic Corporation Address and Contact Information:
Kaleel Rahalm, Business Manager Remediation Polymers
1225 Willow Lake Boulevard
Saint Paul, MN 55110
615.481.6860

18.10 PRICE

Please see Bid Form provided in RFP documents in Appendix G: Price

18.11 ALTERNATE SOLUTION

Pipeline Assessment Department

In addition to the requested services SAK is including the services of their Pipeline Assessment Department. The Assessment Department will review the information associated with the project site/sewer segment including, CCTV inspections, drawings, impact of location and associated potential social costs to provide a recommendation to repair any defects identified. Included with the recommendations will be associated repair costs.

The Pipeline Assessment Department will evaluate the CCTV inspection information and pipe segment to develop

a plan that will provide the City with a "Best Value" recommendation for the rejuvenation of pipelines experiencing deficiencies in structural and/or operational capacities. The recommendations will be based on improving the long-term operation and maintenance of the existing system and will not include the impacts of variable that require additional capacity and/or the expansion of the pipelines required services.

GIS/Project Information Input

SAK also has the ability to enhance these services through data management and implementation in the City's GIS. The information gathered and generated during the inspections, recommendations and rehabilitation can be captured and installed into the City's system. The software tools developed in connection with DLZ, Inc. enable SAK to use the City's GIS system and base information to graphically display information such as:

- Sewer sections inspected based on date
- Sections with specific PACP ratings
- Sections with defects of a specific PACP rating
- Defects/Sections with repairs completed
- Defects/Section with repairs to be completed
- Costs associated with work completed on each section
- Copies of all video inspections completed in that specific section of sewer

This ability simplifies the management of the rehabilitation efforts and financial resources by consolidating and displaying all the information on the City's GIS maps.

APPENDIX A

AUTHORITY TO SIGN

SAK™
Pipeline Infrastructure. Solved.™

636.385.1000 tel
636.385.1100 fax
864 Hoff Road
O'Fallon, MO 63366
www.sakcon.com

January 3, 2024

To Whom It May Concern:

Joe Feuerborn, Vice President and General Manager of our CIPP Division is hereby authorized to sign bids, extend offers, submit proposals, and execute contracts on behalf of SAK Construction, LLC.

Boyd Hirtz, Vice President is hereby authorized to sign bids, extend offers, submit proposals, and execute contracts on behalf of SAK Construction, LLC.

Jerome P. Shaw, Jr.
President
SAK Construction, LLC

State of Missouri)

County of St. Charles)

On this 3rd day of January, in the year 2024, before me, Theresa H. Messer, a notary public, personally appeared, Jerome P. Shaw, Jr. proved on the basis of satisfactory evidence to be the person whose name is subscribed to this instrument, and acknowledged he executed the same. Witness my hand and official seal.

THERESA H. MESSER
Notary Public, Notary Seal
State of Missouri
St. Charles County
Commission # 15634377
My Commission Expires 03-30-2027

Theresa H. Messer
NOTARY PUBLIC

SEAL

UNANIMOUS WRITTEN CONSENT
OF THE SOLE MANAGER OF
SAK CONSTRUCTION, LLC

Pursuant to Section 5.3 of the Operating Agreement of SAK Construction, LLC, a Missouri limited liability company (the "Company"), the undersigned, being the sole manager of the Company, hereby adopts the following resolutions for the Company and consents to the taking of the actions therein described, such consent to have the same force and effect as a unanimous vote of the managers of the Company at a meeting duly held on the date hereof:

RESOLVED, that the following individuals are hereby elected as officers of the Company, to hold the offices set forth opposite their respective names below for the ensuing year or until their successors are duly elected and shall have qualified, unless sooner removed by the Manager:

Thomas Kalishman	Chairman and Chief Executive Officer
Jerome P. Shaw, Jr.	President
Boyd Hirtz	President-Tunneling Division
Joe Feuerborn	Vice President
Roger Archibald	Chief Financial Officer, Secretary and Treasurer
Steve Stulce	Assistant Secretary and Assistant Treasurer

RESOLVED FURTHER, that any and all action heretofore taken, and any and all things heretofore done, by any director of the Company in connection with, or with respect to, the matters referred to in the foregoing Resolutions be and hereby are confirmed as authorized and valid acts taken on behalf of the Company.

RESOLVED FURTHER, that the foregoing resolutions shall replace and supersede any and all prior resolutions appointing officers of the Company.

Dated as of July 1, 2020.

Jerome P. Shaw, Jr.

BEING THE SOLE MANAGER OF THE COMPANY

APPENDIX B

LOCAL PREFERENCE

CANDICE S. MILLER
COMMISSIONER

April 29, 2024

RE: Letter of Reference, SAK Construction, LLC

To Whom It May Concern,

SAK Construction, LLC has been contracted through Macomb County, Macomb Interceptor Drain Drainage District (MIDDD) for pipeline rehabilitation utilizing spiral wound and geopolymer technologies in 2022 and completed the work in 2023. They performed very well for MIDDD and have shown a great deal of flexibility regarding workload and scheduling. All of their work has been completed to our high quality of standards and were completed within agreed upon timeframes. SAK is incredibly easy to work with and are excellent communicators with project staff and the general public.

Sincerely,

Vincent Astorino
Operations Director
Macomb County Public Works

Macomb County Public Works Commissioner Candice S. Miller
21777 Dunham Road, Clinton Township, Michigan 48036
MAIN LINE: 586-469-5325 | ENGINEERING 586-469-5910 | SOIL EROSION 586-469-5327

March 9, 2024

Vincent Astorino
Operations Director
Macomb County Public Works Office
23001 E. 9 Mile Road
St. Clair Shores, Michigan 48080

RE: 2024 Project of the Year
APWA - Michigan Chapter

Dear Mr Astorino:

Congratulations!

The Michigan Chapter of the American Public Works Association is very pleased to announce that your project:

Macomb Interceptor Drain "Spiral Wound" Rehabilitation

Has been awarded Project of the Year in the category of:
DISASTER OR EMERGENCY CONSTRUCTION/REPAIR $1 MILLION TO $5 MILLION

At the Annual Conference in May of this year, the Michigan Chapter will recognize this project as an award winner. In addition, your project was forwarded to the APWA National office for competition at that level.

The Michigan Chapter of American Public Works Association will be holding its Annual Conference at the Boyne Mountain Resort in Boyne Falls, Michigan. The Awards Banquet will be held on Thursday, May 23, 2024, beginning at 6:00 pm. For those attending the Awards Banquet only and not the full conference, a separate registration will be available on the Chapter website at http://michigan.apwa.net in the near future.

Plaque wording will be:

Macomb Interceptor Drain "Spiral Wound" Rehabilitation
Macomb County Public Works Office
SAK Construction, LLC
Anderson, Eckstein & Westrick, Inc.

Three plaques will be provided at no cost, additional plaques can be ordered at your expense. In the event you have any changes, special requests regarding your plaques or would like to purchase additional plaques, please contact me by March 25th.

I can be contacted at (313) 363-0532 or my e-mail: william.fisher@wsp.com.

Sincerely,

William Fisher

William Fisher, PE
Awards Chairperson
APWA – Michigan Chapter

cc: Anthony Aderhold, Business Development Leader Industrial Markets, SAK Construction, LLC
Louis J. Urban, PE, Project Manager, Anderson, Eckstein & Westrick, Inc.

2150 Dr. Martin Luther King Jr. St. | Indianapolis, IN | 46202
CitizensEnergyGroup.com

August 4, 2023

Re: Letter of Reference, SAK Construction, LLC

To whom it may concern,

SAK Construction, LLC has been contracted through Citizens Energy Group to provide Pipe Rehabilitation Services since February 2017. They have performed very well for us and have shown a great deal of flexibility with regard to workload. SAK provided primarily CIPP, Geopolymer and slip lining pipe lining services, but also managed several subcontractors that provided bypass pumping services, manhole rehabilitation, traffic control, pipe replacement, and restoration. All their work has been done to our quality standards and no project failed to meet our completion dates. SAK has been easy to work with and they do a good job coordinating with the public.

Sincerely,

Tim Shutters

Tim Shutters
Supervisor, Underground Engineering & Construction Group

APPENDIX C

WORKFORCE SAFETY

SAFETY AND ACCIDENT PREVENTION PLAN

Jerry Shaw
President

SAK™
Pipeline Infrastructure. Solved.™

SAFETY AND ACCIDENT PREVENTION PLAN
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HEALTH & SAFETY COMMITMENT

SAK Construction, LLC is committed to providing a safe and healthy workplace for all our employees.

SAK Construction, LLC will strive to comply with all relevant government regulations regarding personal health and safety. We will encourage good safety habits in every aspect of our Company's activities by maintaining an effective accident prevention program. This program will provide training and control exposure to hazardous situations both on the jobsite and at home. In every activity of our business, we expect a commitment to safety and active participation of every employee in our comprehensive safety effort.

In all our activities, the health and safety of our people is not to be compromised or placed at risk for any reason.

Jerry P. Shaw
President
SAK Construction, LLC

_____
Employee Signature

MARSH & McLENNAN AGENCY

Marsh & McLennan Agency LLC
825 Maryville Centre Drive, Suite 200
St. Louis, MO 63017
+1 314 594 2700
MarshMMA.com

July 20, 2023

Attn: Harry Miller
SAK Construction, LLC
864 Hoff Road
O'Fallon, MO 63366

RE: SAK Construction, LLC
Workers' Compensation Experience Modification

Dear Harry:

Your Experience Modification Rating Factor for the past three years is as follows:

Effective 8-2-2023 .59

Effective 8-2-2022 .52

Effective 8-2-2021 .52

Sincerely,

Diane Stiehl

Diane M. Stiehl, CISR
Senior Account Manager

SAK OSHA CERTIFIED PERSONNEL

List of all OSHA Certified Personnel

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Kevin Maszkiewicz	Atlantic	Yes	Yes
Matthew Rhoads	Atlantic	Yes	
Cristian Martinez	Atlantic	Yes	
Stephanie Harris	Atlantic		Yes
David Moon	Atlantic		Yes
Marco Antonelli	Atlantic	Yes	Yes
Michelle Ashley Gabbitas	Atlantic		Yes
Tyree Richardson	Atlantic	Yes	
Ajani Riley	Atlantic	Yes	
Richard Culligan	Atlantic	Yes	
Aris McGownas	Atlantic	Yes	
James Jackson-Thorpe	Atlantic	Yes	
Malik Smith	Atlantic	Yes	
Marion Nado	Atlantic	Yes	
Chris Brewton	Atlantic	Yes	
Matthew Zellam	Atlantic		Yes
Zachary Adcock	Atlantic		Yes
Dominick Mullin	Atlantic	Yes	
Aaron Miller	Atlantic		Yes
Thomas Botti	Southeast	Yes	
John Price	Southeast	Yes	
James Jacobs	Southeast	Yes	Yes
Avery Long	Southeast	Yes	

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Calvin Washington	Southeast	Yes	
Dylan Baggett	Southeast	Yes	
Brian Navarro	Southeast	Yes	Yes
Lee Grant	Southeast	Yes	
Troy Melton	Southeast	Yes	
Stanley Krause	Southeast		Yes
Gabe Cummings	Southeast	Yes	Yes
Amir Alzer	Southeast		Yes
Austin Preiss	Southeast	Yes	Yes
Regan Roy	Southeast		Yes
Scott Hoffman	Southeast	Yes	Yes
Tyler Partridge	Southeast	Yes	Yes
James Hansbrough	Southeast	Yes	
Trisha Kindle	Southeast	Trainer	Trainer
Reggie Barnes	Southeast	Yes	Yes
Blake Kimball	Southeast	Yes	
Jordan Anderson	Southeast	Yes	
Renato Guitart	Southeast	Yes	
Nakeita Watts	Southeast		Yes
Ross Cummings	Southeast	Yes	
James Miller	Southeast	Yes	Yes
Julis Sheppard	Southeast		Yes
David Bratton	Southeast		Yes

SAK OSHA CERTIFIED PERSONNEL

List of all OSHA Certified Personnel

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Neil Soriano	Southeast	Yes	
Spencer Davidson	Southeast		Yes
Steven King	Southeast	Yes	
Darrell Aaron	Southeast		Yes
Johnny Lynn	Southeast	Yes	
Chad Rusher	Southeast	Yes	
Stanley Carley	Southeast	Yes	Yes
Ronny Tidwell	Southeast		Yes
Daniel Graham	Southeast		Yes
Dallas Lucas	Southeast	Yes	
Josh Wood	Southeast	Yes	
Levi Kurtovich	Southeast		Yes
Keith Corbin	Southeast	Yes	
Nathan Summerville	Southeast	Yes	
Ahmad Strickland	Southeast		Yes
Sean Tempesco	Southeast	Yes	
Edgardo Rivera	Southeast	Yes	
Jonathan Jenkins	Southeast	Yes	
Dillon Shephard	Southeast	Yes	
Aaron Carey	Southeast	Yes	
Freddie Salimbangon	Southeast	Yes	
Curtis Sadowski	Southeast	Yes	
David Stanley	Southeast	Yes	

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Casey Salter	Southeast	Yes	
Brandon Coleman	Southeast	Yes	
Anthony Vazquez	Southeast	Yes	
Joseph Sturkey	Southeast	Yes	
Bobby Elmore	Southeast	Yes	
Roberto Vasquez	Southeast	Yes	
Samuel Dickson	Southeast		Yes
Adolfo Reyna	Southeast	Yes	
Travis Jerrels	Central	Yes	
Chris Vogt	Central	Yes	
Jason Laney	Central	Yes	
Nicholas Pryor	Central		Yes
Josh Grote	Central		Yes
Alan Stuhlsatz	Central	Yes	
Aviana Ward	Central	Yes	
Shelly DeRousse	Central	Yes	
Brett Thebeau	Central	Yes	
Devin Cross	Central		Yes
Justin Woodring	Central	Yes	
Theodore Love	Central	Yes	
Dale Morgan	Central	Yes	
Justin Quisenberry	Central	Yes	
Travis Clouser	Central	Yes	

SAK OSHA CERTIFIED PERSONNEL

List of all OSHA Certified Personnel

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Robert Cope	Central	Yes	
John Lang	Central	Yes	
Clifford Williams	Central	Yes	
Anthony Love	Central	Yes	
Isaiah Williams	Central	Yes	
David Herter	Central	Yes	Yes
Jon Jackson	Central	Yes	
Arnell Love	Central	Yes	
Gregory Robinson	Central	Yes	Yes
Bruce Cope	Central	Yes	
Billy Gates	Central	Yes	
Bradly Schenning	Central	Yes	
William Seibert	Central	Yes	
Tim Bussen	Central	Yes	
Brian Harmon	Central	Yes	
Thomas Rathbun	Central	Yes	
Tim Higby	Central	Yes	Yes
Jeff Brand	Central	Yes	
Ben Loges	Central	Yes	
Dan Brueggemann	Central		Yes
Mark Stoecker	Central	Yes	Yes
Zachariah Andrews	Central	Yes	
Ronald Milton	Central	Yes	

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Joshua Hermeyer	Central	Yes	
JacQui Luster	Central	Yes	
Kent Broz	Central	Yes	
Richard Stephenson	Central	Yes	
Louis Krch	Central		Yes
Kerry Penn	Central		Yes
Minika Roberts	Central		Yes
Ron Gaedke	Central		Yes
Thomas Lindsay	Central	Yes	
Matthew Hirtz	Central	Yes	
Jeff Hirtz	Central	Yes	
Justin Long	Central		Yes
Jason Vetter	Central		Yes
Dallas Olezkowicz	Central	Yes	
Johnnie Moore	Central		Yes
Bobby Jones	Central	Yes	
Saroya Fortune	Central	Yes	
George Niemeyer	Central		Yes
Ben Thebeau	Central	Yes	
Anthony Whitford	Central		Yes
William Beaty	Central		Yes
Donald Krupp	Central		Yes
Matt Barr	Central		Yes

SAK OSHA CERTIFIED PERSONNEL

List of all OSHA Certified Personnel

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
James Reed	Central	Yes	
Jason Hiby	Central	Yes	
Dillan Ramey	Central	Yes	
Brandon Thorpe	Central	Yes	
Michael Botsick	Central	Yes	
Anthony Jorgensen	Central	Yes	
Blake McCoy	Central	Yes	
Jeff Oberhofer	Central	Yes	
Michael Stubbs	Central	Yes	
Harry Miller	Central	Trainer	Trainer
Brent Hook	Central	Yes	
Don Melcher	Central	Yes	
Chance Armstrong	Central	Yes	
Tyler Melcher	Central	Yes	
Eric Sample	Central		Yes
Ben Ramey	Central	Yes	
Carlos Wilson	Central	Yes	
Joseph Wilson	Central	Yes	
Joshua Warren	Central	Yes	
Jacob Warren	Central	Yes	
Noah Meyers	Central	Yes	
Kristin Smith	Central	Yes	
Connor Boyd	Central	Yes	

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Bradley Rusher	Central	Yes	
Melvin May	Central	Yes	
Zachary Ericson	Central	Yes	
Robert McIntyre	Central	Yes	
James “Danny” Brown	Central	Yes	
Mike McIntyre	Central	Yes	
Eric Sanders	Central	Yes	
Craig Heimsoth	Central		Yes
Austin Salmans	Central	Yes	
Caleb Turner	Central		Yes
Connor Vandermaas	Central	Yes	
Corey Siders	Central	Yes	
Atean Catanzaro	Central	Yes	
Marcus Vanderfeltz	Central	Yes	
Tommy O’Neil	Central	Yes	
Balazs Sturgeon	Central	Yes	
Michael Eldridge	Central	Yes	
William Garcia	Pacific	Yes	
Isaias Zuniga	Pacific	Yes	
Brandon Gerber	Pacific		Yes
Elias Torres	Pacific	Yes	
Daniel Badgley	Pacific	Yes	Yes
Jon Clarke	Pacific	Yes	

SAK OSHA CERTIFIED PERSONNEL

List of all OSHA Certified Personnel

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
John Vyborny	Pacific	Yes	
Robert Gaytan	Pacific	Yes	
Jarmann Frazer	Pacific	Yes	
James Conrad	Pacific	Yes	Yes
James Bower	Pacific	Yes	Yes
Shawn Gleason	Pacific	Yes	
Jesus Loza	Pacific		Yes
Michael Hamp	Pacific	Yes	
Miguel Espinoza	Pacific	Yes	
Donald Eva	Pacific	Yes	
Labarron Robinson	Pacific	Yes	
William Broady	Pacific	Yes	
Michael Gonzalez	Pacific	Yes	
Daniel Abasolo	Pacific	Yes	
Jesse Alvarez	Pacific		Yes
Juventino Langarcia	Pacific	Yes	
Josh Whipple	Pacific	Yes	
Michael Nelson	Pacific	Yes	
Darrell Moon	Pacific	Yes	
Dominic Decasper	Pacific	Yes	
Victor Tyler	Pacific	Trainer	Trainer
Patrick Carpenter	Pacific	Yes	
Javanti Aldridge	Pacific	Yes	Yes

SAK EMPLOYEE	REGION	OSHA 10 HOUR	OSHA 30 HOUR
Howard Wagner	Pacific	Yes	
Alejandro Guerra	Pacific	Yes	
Thomas Petnaovich	Pacific	Yes	
Truman Wipff	Pacific	Trainer	Trainer
Roger Terrazas	Pacific	Yes	Yes
Brandon Smith	Pacific	Yes	
Alfred Landa	Pacific	Yes	Yes
Garrick Rodgers	Pacific		Yes
Juan Rivera	Pacific	Yes	
Howard Linhart	Pacific		Yes
Fernando Avila	Pacific		Yes
Mario Corrales	Pacific	Yes	
Todd Chalk - GI	Pacific		Yes
Michael Gregerson	Pacific	Yes	
Franco Guadarrama	Pacific	Yes	
Peter Voelker	Pacific		Yes - GI
Richard Aguilar	Pacific	Yes	
Oscar Aguilar	Pacific	Yes	
Timothy Howlin	Pacific	Yes	
Octavio Morales - GI	Pacific	Yes	
Nolan Kurtovich	Pacific	Yes	
Gustavo Garcia	Pacific	Yes	
Jonathan Mullican	Pacific	Yes	

APPENDIX D

WORKFORCE DEVELOPMENT

Construction Craft Laborers' Apprenticeship Program

Registration Number MO-002-950002
35 Opportunity Road
High Hill, Missouri 63350
(636) 585-1500 ext. 1 fax (636) 585-2604
e-mail: app@lctcmo.org

Committee Members/Alternates

Labor
Patrick Pryor - Chairman
Bradley Turner
Sam Simmons
Brandon Flinn

Management
Frank Marchesi, Sr.-Secretary
Michael W. Luth
Rod Fain
Shawn Jordan

Apprenticeship Advisor
Joseph J. Weinhardt

Sponsoring Organizations

Eastern Missouri Laborers' District Council

SITE Improvement Association

Associated General Contractors of Missouri

CONSULTANTS

Raymond Hefner
Plumbing Industry Council

Brian Smith.
Mason Contractors' Association

Jerald A. Pelker
Director of Training – Retired

August 31, 2023

To whom it may concern,

This letter is to verify that SAK Construction, LLC participates in the Eastern Missouri Construction Craft Laborers' Apprenticeship Program (Registration Number MO -002-950002) and has the ability to employ apprentice laborers under the terms of the collective bargining agreement for the Missouri & Kansas Laborers' District Council.

If you have any question or need additional information please contact me at (636) 585 – 1500.

Joseph Weinhardt

Joseph J. Weinhardt
Apprenticeship Advisor

The United States Department of Labor

Bureau of Apprenticeship and Training
Certificate of Registration

LABORERS AFL-CIO AGC TRAINING CENTER

HIGH HILL, MISSOURI

FOR THE TRADE CLASSIFICATION OF

CONSTRUCTION LABORER

Registered as part of the National Apprenticeship Program in accordance with the basic standards of apprenticeship established by the Secretary of Labor

OCTOBER 23, 1995

Date

MO-002-0386

Registration No.

Director, Regional Bureau of Apprenticeship & Training

Secretary of Labor

Director, Bureau of Apprenticeship and Training

SAK™
Pipeline Infrastructure. Solved.™

636.385.1000 tel
636.385.1100 fax
864 Hoff Road
O'Fallon, MO 63366
www.sakcon.com

Equal Employment Opportunity & Affirmative Action Policy Statement
41 CFR 60-20.3, 60-50.2

It is the policy of SAK Construction to not discriminate against any employee or applicant for employment because of age, race, religion, color, disability, gender, physical condition, developmental disability, sexual orientation, national origin, genetic information & testing, family & medical leave, gender identity/expression or veteran status and to take affirmative action to employ and to advance in employment all persons regardless of their status, and to base all employment decisions only on valid job requirements.

SAK Construction is committed to applying equal employment opportunity (EEO) policies in order to ensure that its policy of non-discrimination and affirmative action is accomplished. Specifically, SAK Construction does not discriminate on the basis of veteran status or disability status, and will not make any distinctions based on such. Employment decisions will be based on valid job requirements only.

This policy applies to all employment actions, including but not limited to recruitment, hiring, promotion, transfer, demotion, layoff, recall, termination, rates of pay or other forms of compensation and selection for training, including apprenticeship, at all levels of employment. Employees of and applicants to SAK Construction will not be subject to harassment, intimidation, threats, coercion, or discrimination because they have engaged or may engage in filing a complaint, assisting in a review, investigation, or hearing or have otherwise sought to obtain their legal rights related to any federal, state, or local law regarding EEO for qualified individuals with disabilities, or qualified protected veterans.

SAK Construction maintains that it will abide by any collective bargaining agreement by adhering to written conditions of employment set forth therein. Such agreements shall not be inconsistent with the guidelines of this Affirmative Action Plan.

We prohibit Retaliation against individuals who bring forth any complaint, orally or in writing, to the employer or the government, or against any individuals who assist or participate in the investigation of any complaint or otherwise oppose discrimination.

SAK Construction and its President, Jerry Shaw are committed to the principles of Affirmative Action and Equal Employment Opportunity.

This Affirmative Action Program is available for inspection by any employee or applicant for employment upon request, during normal business hours, in the O'Fallon, MO office. Interested persons should contact the appointed EEO Officer, **Angie Hirtz at (636) 385-1020** for assistance.

Jerry Shaw, President

10/1/22
Date

APPENDIX E

ABILITY TO PERFORM

Marsh McLennan Agency
825 Maryville Centre Drive | Suite 200
Chesterfield | MO 63017
T +1 314 594 2700
MarshMMA.com

January 4, 2024

RE: SAK Construction, LLC

To Whom It May Concern,

SAK Construction, LLC is a valued Travelers Casualty and Surety Company of America surety customer. Travelers Casualty and Surety Company of America is one of the most financially sound insurance companies in the United States and enjoys a Best Rating of A++ with financial strength category of XV.

Due to SAK Construction, LLC's reputation, technical expertise, financial strength, quality equipment and experienced labor force, Marsh McLennan Agency is prepared to consider performance and payment bonds for single jobs in the $350,000,000 range with an aggregate work program of $800,000,000.

Any bonds are subject to acceptable review of the contract terms and conditions, bond forms, confirmation of financing, and any other underwriting considerations at the time of the request. It should be understood that any arrangement for bonds is strictly a matter between SAK Construction, LLC and Travelers Casualty and Surety Company of America. We assume no liability to third parties or to you if for any reason we do not execute said bonds.

Over the course of Marsh McLennan Agency's relationship with SAK Construction, LLC, we have never had a complaint as respects any of their workmanship or a question as to their ability to perform on any project. Additionally, SAK Construction, LLC's pro-active approach to a safe worksite and a safe labor force enables owners to rest assured that a safe work environment will be provided.

Please feel free to contact me if you have any specific questions regarding SAK Construction, LLC or their surety bond program.

Sincerely,

Andrew P. Thome

Chief Executive Officer

Sunlight Peak, LLLP dba SAK, LLC

Consolidated Financial Statements
and Supplementary Information

December 31, 2023 and 2022

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INDEPENDENT AUDITOR'S REPORT

To the Partners of
Sunlight Peak, LLLP dba SAK, LLC
O'Fallon, Missouri

Opinion

We have audited the accompanying consolidated financial statements of Sunlight Peak, LLLP dba SAK, LLC (a Missouri limited partnership) (the "Company"), which comprise the consolidated balance sheets as of December 31, 2023 and 2022, and the related consolidated statements of income and partners' capital, and cash flows for the years then ended, and the related notes to the consolidated financial statements.

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the financial position of Sunlight Peak, LLLP dba SAK, LLC as of December 31, 2023 and 2022 , and the results of their operations and their cash flows for the years then ended in accordance with accounting principles generally accepted in the United States of America.

Basis for Opinion

We conducted our audits in accordance with auditing standards generally accepted in the United States of America. Our responsibilities under those standards are further described in the Auditor's Responsibilities for the Audit of the Financial Statements section of our report. We are required to be independent of Sunlight Peak, LLLP dba SAK, LLC and to meet our other ethical responsibilities in accordance with the relevant ethical requirements relating to our audits. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

Emphasis of Matter

As discussed in Note A to the consolidated financial statements, as a result of a legal entity restructuring event, the reporting entity has changed this year from SAK Construction, LLC to Sunlight Peak, LLLP. Our opinion is not modified with respect to that matter.

Responsibilities of Management for the Financial Statements

Management is responsible for the preparation and fair presentation of these consolidated financial statements in accordance with accounting principles generally accepted in the United States of America, and for the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of consolidated financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the consolidated financial statements, management is required to evaluate whether there are conditions or events, considered in the aggregate, that raise substantial doubt about Sunlight Peak, LLLP dba SAK, LLC's ability to continue as a going concern within one year after the date that the financial statements are available to be issued.

Auditor's Responsibilities for the Audit of the Financial Statements

Our objectives are to obtain reasonable assurance about whether the consolidated financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance but is not absolute assurance and therefore is not a guarantee that an audit conducted in accordance with auditing standards generally accepted in the United States of America will always detect a material misstatement when it exists. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control. Misstatements are considered material if there is a substantial likelihood that, individually or in the aggregate, they would influence the judgment made by a reasonable user based on the consolidated financial statements.

In performing an audit in accordance with auditing standards generally accepted in the United States of America, we:

- Exercise professional judgment and maintain professional skepticism throughout the audit.
- Identify and assess the risks of material misstatement of the consolidated financial statements, whether due to fraud or error, and design and perform audit procedures responsive to those risks. Such procedures include examining, on a test basis, evidence regarding the amounts and disclosures in the consolidated financial statements.
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of Sunlight Peak, LLLP dba SAK, LLC's internal control. Accordingly, no such opinion is expressed.
- Evaluate the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluate the overall presentation of the consolidated financial statements.
- Conclude whether, in our judgment, there are conditions or events, considered in the aggregate, that raise substantial doubt about Sunlight Peak, LLLP dba SAK, LLC's ability to continue as a going concern for a reasonable period of time.

We are required to communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit, significant audit findings, and certain internal control related matters that we identified during the audit.

Armanino LLP

Armanino LLP
St. Louis, Missouri

March 15, 2024

SUNLIGHT PEAK, LLLP

Consolidated Balance Sheets
December 31, 2023 and 2022

ASSETS	2023	2022
Current Assets		
Cash and cash equivalents	$ 28,688,144	$ 1,301,587
Marketable securities	15,601,861	9,760,838
Contracts receivable	57,259,159	44,623,311
Retainage	20,524,188	24,580,215
Contract assets	7,471,416	10,478,122
Inventory	8,717,697	10,411,128
Miscellaneous receivables	1,197,910	777,527
Prepaid expenses	4,337,655	5,060,563
Other current asset - escrow	473,861	-
Total Current Assets	144,271,891	106,993,291
Operating Lease Right-of-Use Assets	1,922,482	906,344
Assets Under Finance Lease Arrangements - Net	5,714,636	3,309,060
Property and Equipment - Net	74,845,663	72,610,454
Goodwill	1,798,886	1,798,886
TOTAL ASSETS	$ 228,553,558	$ 185,618,035
LIABILITIES AND PARTNERS' CAPITAL		
Current Liabilities		
Current portion of operating lease liabilities	$ 654,001	$ 725,540
Current obligations under finance leases	1,230,322	912,057
Current portion of other long-term debt	15,449,649	11,391,796
Accounts payable	28,508,114	27,297,345
Contract liabilities	29,240,777	30,911,689
Accrued expenses	5,364,868	4,475,376
Total Current Liabilities	80,447,731	75,713,803
Long-Term Operating Lease Liabilities	1,268,481	180,804
Non-Current Obligations from Finance Lease Arrangements	4,184,967	2,326,785
Long-Term Debt	45,515,703	25,066,524
Partners' Capital	97,136,676	82,330,119
TOTAL LIABILITIES AND PARTNERS' CAPITAL	$ 228,553,558	$ 185,618,035

The accompanying notes are an integral part of these consolidated financial statements.

SUNLIGHT PEAK, LLLP

Consolidated Statements of Income and Partners' Capital

Years ended December 31, 2023 and 2022

	2023	2022
Contract revenue	**$ 334,225,012**	$ 326,179,398
Cost of contract revenue		
Labor	**45,387,523**	42,886,778
Material	**42,562,450**	57,497,698
Subcontractors	**102,838,327**	85,498,966
Equipment	**46,797,567**	44,660,614
Other	**34,117,142**	32,102,889
Total cost of contract revenue	**271,703,009**	262,646,945
Gross profit	**62,522,003**	63,532,453
(Gain) loss on disposal of assets	**(173,251)**	310,843
General and administrative expenses	**33,603,794**	29,165,995
Income from operations	**29,091,460**	34,055,615
Other income (expense)		
Interest expense - net	**(2,114,406)**	(1,333,456)
Other income (expense) - net	**(296,449)**	(325,807)
Total other income (expense)	**(2,410,855)**	(1,659,263)
Net income	**$ 26,680,605**	$ 32,396,352
Partners' Capital		
Beginning balance	**$ 82,330,119**	$ 78,750,332
Distributions to Partners	**(11,968,336)**	(28,732,691)
Change in unrealized holding gain (loss) on marketable securities	**94,288**	(83,874)
Net income	**26,680,605**	32,396,352
End of year	**$ 97,136,676**	$ 82,330,119

The accompanying notes are an integral part of these consolidated financial statements.

SUNLIGHT PEAK, LLLP

Consolidated Statements of Cash Flows

Years ended December 31, 2023 and 2022

	2023	2022
Cash flows from operating activities:		
Net income	$ **26,680,605**	$ 32,396,352
Adjustments to reconcile net income to net cash provided by operating activities:		
Depreciation and amortization	**27,195,241**	23,764,805
(Gain) loss on disposal of assets	**(173,251)**	310,843
Gain on sale of marketable securities	**-**	(256)
(Increase) decrease in operating assets:		
Contracts receivable	**(12,635,848)**	(13,929,104)
Retainage	**4,056,027**	(4,830,033)
Contract assets	**3,006,706**	(3,344,246)
Inventory	**1,693,431**	(2,026,118)
Other assets	**(171,336)**	2,239,032
Increase (decrease) in operating liabilities:		
Accounts payable	**1,210,769**	6,537,964
Contract liabilities	**(1,670,912)**	(20,181,534)
Accrued expenses	**889,492**	(103,655)
Net cash provided by operating activities	**50,080,924**	20,834,050
Cash flows from investing activities:		
Purchases of marketable securities	**(13,488,971)**	(11,559,733)
Maturities of marketable securities	**7,520,000**	1,475,000
Proceeds from sales of marketable securities	**-**	104,283
Purchases of property, plant and equipment	**(28,525,657)**	(32,679,261)
Proceeds from sale of assets	**452,618**	863,409
Net cash used in investing activities	**(34,042,010)**	(41,796,302)
Cash flows from financing activities:		
Proceeds from long-term debt	**38,946,150**	20,291,345
Payments on long-term debt	**(14,439,118)**	(11,254,474)
Payments on finance lease obligations	**(1,191,053)**	(815,010)
Distributions to Partners	**(11,968,336)**	(28,732,691)
Net cash provided by (used in) financing activities	**11,347,643**	(20,510,830)
INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS	**27,386,557**	(41,473,082)
Cash and cash equivalents at beginning of year	**1,301,587**	42,774,669
Cash and cash equivalents at end of year	$ **28,688,144**	$ 1,301,587
Supplemental Information - Interest paid	$ **2,503,413**	$ 1,406,856

The accompanying notes are an integral part of these consolidated financial statements.

Note A - Nature of Operations and Summary of Significant Accounting Policies

The following summary of significant accounting policies of Sunlight Peak, LLLP, dba SAK, LLC, hereinafter referred to as "SAK" or the "Company," are presented to assist in understanding the Company's consolidated financial statements. The consolidated financial statements and notes are the representation of the Company's management, who is responsible for their integrity and objectivity. The accounting policies conform to U.S. generally accepted accounting principles.

Principles of Consolidation — The consolidated financial statements include the accounts of SAK, and its wholly-owned subsidiaries. Prior to January 1, 2023, the consolidated financial statements were presented for SAK Construction, LLC and its wholly-owned subsidiaries. Effective January 1, 2023, a restructuring resulted in SAK Construction, LLC and all of its wholly-owned subsidiaries being directly owned by SAK. The consolidated entities of SAK are comprised of: SAK Construction, LLC; Affholder, LLC; Pipenology, LLC; TBM Deer Creek, LLC; and SAK Real Estate Holdings, LLC. All significant intercompany transactions have been eliminated from the consolidated financial statements.

Nature of Operations — SAK operations include rehabilitation of pipelines and construction of tunnels servicing the water, sanitary and storm sewer markets within the United States. SAK performs construction jobs through its wholly-owned subsidiaries:

- SAK Construction, LLC – trenchless rehabilitation of pipelines through a process known as Cured in Place Pipe (CIPP).
- Affholder, LLC – construction of soft ground and hard rock tunnels.
- Pipenology, LLC – manufacturer of CIPP lining materials.

Operating Cycle — SAK's "operating cycle" is the length of each individual contract, which generally takes from one month to two years to complete. Therefore, the accounts and retentions receivable and payable related to contracts in progress are treated as current items.

Joint Ventures — From time to time SAK has signed joint venture agreements to bid on specific projects. Management's decision to bid projects with a joint venture are based on economic and competitive factors. All accounting policies of the joint ventures are consistent with the policies of SAK. The reporting methods utilized by SAK to account for the joint ventures are detailed in Note O.

Estimates — Management uses estimates and assumptions in preparing the consolidated financial statements. Those estimates and assumptions affect the reported amounts of assets and liabilities, the disclosure of contingent assets and liabilities, and the reported revenues and expenses. Actual results may differ from those estimates.

Note A - Nature of Operations and Summary of Significant Accounting Policies (Continued)

Cash and Equivalents — Cash and equivalents consist of highly liquid investments with an initial maturity of three months or less. The Company aggregates all cash balances by bank and reclassifies any negative balance to accounts payable. At times, bank deposits may be in excess of federally insured limits.

Marketable Securities — The Company classifies its investments in marketable securities as available-for-sale securities, which are carried at fair value. Net unrealized gains and losses on state and local municipal bonds are reported as a component of partners' capital until realized. Realized gains and losses from dispositions of securities are based on the net proceeds from the sale and the adjusted book value of the securities sold, using the specific identification method.

Fair Value Measurements — The framework for measuring fair value provides that financial assets measured at fair value subsequent to initial recognition are grouped into three levels of inputs or assumptions that market participants would use in pricing the asset, including assumptions about risk and the reliability of assumptions used to determine fair value. The fair value hierarchy for valuation inputs gives the highest priority to quoted prices in active markets for identical assets and the lowest priority to unobservable inputs. The fair value hierarchy levels are described below:

- Level 1 – Quoted prices (unadjusted) in active markets for identical assets that the Company has the ability to access as of the measurement date.
- Level 2 – Significant other observable inputs other than Level 1 prices, such as quoted prices for similar assets, quoted prices in markets that are not active, and other inputs that are observable or can be corroborated by observable market data.
- Level 3 – Significant unobservable inputs that reflect the Company's own assumptions about similar assumptions that market participants would use in the pricing of the asset, based on the best information available given the circumstances.

The asset's fair value measurement level within the fair value hierarchy is based on the lowest level of any input that is significant to the fair value measurement. Valuation techniques used need to maximize the use of observable inputs and minimize the use of unobservable inputs. The following is a description of the valuation methodology used at December 31, 2023 and 2022.

State and Local Municipal Bonds – Valued by the broker based on yields currently available on comparable securities of issues with similar credit ratings.

Note A - Nature of Operations and Summary of Significant Accounting Policies (Continued)

Certificates of Deposit – Valued using quoted market prices for similar assets in markets that are not active.

Contracts Receivable – The Company's contracts receivable represent amounts billed to customers that have yet to be collected and represent an unconditional right to cash from its customer. Contracts receivable are stated at the amount management expects to collect from the balances outstanding at year-end.

Allowance for Credit Losses – Financial assets, which potentially subject the Company to credit losses, consist primarily of contracts receivable, retainage, contract assets and available-for-sale marketable securities. The Company measures expected credit losses based on an analysis of historical loss experience, current receivable aging, management's assessment of current conditions, reasonable and supportable expectation of future conditions, and an assessment of specific identifiable customer accounts or securities considered at risk of being uncollectible.

The Company assesses collectability by pooling financial assets where similar characteristics exist and evaluate financial assets individually when specific balances no longer share those risk characteristics and are considered at risk or uncollectible.

Expected credit losses are recorded to an allowance for credit losses valuation account that is deducted from the applicable financial asset, to present the net amount expected to be collected on the financial asset on the consolidated balance sheets. The change in the provision for credit losses is recognized in general and administrative expenses. Expected credit losses at December 31, 2023 and 2022 were $0.

Inventory — Inventory is stated at the lower of cost and net realizable value. Average cost is used in determining the cost of the inventories.

Property and Equipment — Purchases of property and equipment are recorded at cost. Upon sale or retirement, the cost and related accumulated depreciation are eliminated from the respective accounts, and the resulting gain or loss is included in current income. Repairs and maintenance charges that do not increase the useful lives of the assets are charged to expense as incurred.

In general, depreciation of property and equipment is computed by the straight-line method over the following estimated useful lives: buildings and leasehold improvements, from five to 39 years; and machinery and equipment, from three to ten years. The Company owns several Tunnel Boring Machines, which remain idle until they are needed for specific tunneling contracts. These machines are depreciated on a straight-line method, but only during the period that they are being used.

Note A - Nature of Operations and Summary of Significant Accounting Policies (Continued)

The Company periodically evaluates the carrying value of its long-lived assets when events and circumstances warrant such a review. The carrying value of a long-lived asset is considered impaired when the anticipated undiscounted cash flows from such asset is less than its carrying value. In that event, a loss is recognized to the extent the carrying value exceeds the fair value of the long-lived asset.

Other Current Asset — Escrow — Escrow accounts have been established for the purpose of holding retention on certain Tennessee contracts. As of December 31, 2023 and 2022, $473,861 and $0 remained in escrow, respectively.

Leases — The Company leases office, warehouse and yard space, as well as utility vehicles. The Company determines if an arrangement is a lease at inception. Operating leases are included in operating lease right-of-use (ROU) assets, current liabilities, and long-term operating lease liabilities on the consolidated balance sheets. Finance leases are included in assets under finance lease arrangements, current liabilities, and non-current obligations under finance lease arrangements on the consolidated balance sheets.

ROU assets represent the Company's right to use an underlying asset for the lease term and lease liabilities represent the Company's obligation to make lease payments arising from the lease. Operating lease ROU assets and liabilities are recognized at commencement date based on the present value of lease payments over the lease term. As most of the leases do not provide an implicit rate, the Company uses an incremental borrowing rate based on information available at commencement date in determining the present value of lease payments. The Company's lease terms may include options to extend or terminate the lease when it is reasonably certain that it will exercise that option. Lease expense for lease payments is recognized on a straight-line basis over the lease term.

The Company's lease agreements do not contain any material residual value guarantees or material restrictive covenants.

The Company has lease agreements with lease and non-lease components, which are generally accounted for separately. For certain leases, such as office space, the Company accounts for the lease and non-lease components as a single lease component. For arrangements accounted for as a single lease component, there may be variability in future lease payments as the amount of the non-lease components is typically revised from one period to the next. These variable lease payments, which are primarily comprised of common area maintenance, utilities, and real estate taxes, that are passed on from the lessor in proportion to the space leased, are recognized in operating expenses in the period in which the obligation for those payments was incurred.

Note A - Nature of Operations and Summary of Significant Accounting Policies (Continued)

The Company has elected to apply the short-term lease exemption to certain leases.

Goodwill — This balance represents the excess cost over fair value of net identifiable assets acquired resulting from the 2011 acquisition of Pipenology, Inc. The Company evaluates the carrying value of goodwill on at least an annual basis and more frequently if events occur or circumstances change that would more likely than not reduce the fair value below its carrying amount.

Revenue Recognition, Contract Assets and Liabilities — SAK performs construction jobs under fixed price contracts and, from time to time, repair jobs under cost plus fee contracts. The length of the contracts vary, but typically the rehabilitation of pipeline projects run less than a year and tunneling projects run longer than a year.

Performance Obligations — A performance obligation is a promise to transfer a distinct good or service to the customer, and is the unit of account in FASB ASC 606. A contract's transaction price is allocated to each distinct performance obligation and recognized as revenue when, or as, the performance obligation is satisfied. For contracts in which construction and installation services are provided, there is generally a single performance obligation as the promise to transfer the individual goods or services is not separately identifiable from other promises in the contracts and, therefore, not distinct. The bundle of goods and services represents the combined output for which the customer has contracted.

The Company's performance obligations are generally satisfied over time as work progresses. Revenues from products and services transferred to customers over time account for over 99% of revenues for each of the years ended December 31, 2023 and 2022. Revenues from construction and installation services are recognized over time using an input measure (e.g., cost incurred to date relative to total estimated costs at completion) to measure progress toward satisfying performance obligations. Incurred cost represents work performed, which corresponds with, and thereby best depicts, the transfer of control to the customer.

Contract costs include all direct material, labor and those identifiable indirect costs related to contract performance. Bonding and insurance costs for tunneling projects, which are expected to take longer than one year to complete, are capitalized and incurred ratably over the life of the project. Otherwise, such incremental costs of obtaining a contract, expected to be completed in less than one year, are expensed as incurred. Changes result in revisions to costs and income and are recognized in the period in which the revisions are determined. At the time a loss on a contract becomes known, the entire amount of the estimated loss is accrued.

Note A - Nature of Operations and Summary of Significant Accounting Policies (Continued)

Revenues from stand-alone product sales are recognized when control of the product is transferred to the customer. Revenues from these types of contracts account for less than 1% of revenues for each of the years ending December 31, 2023 and 2022.

Contract Estimates — Accounting for long-term contracts involves the use of various techniques to estimate total contract revenue and costs. For long-term contracts, the Company estimates the profit on a contract as the difference between the total estimated revenue and expected costs to complete a contract and recognizes that profit over the life of the contract. Contract estimates are based on various assumptions to project the outcome of future events that sometimes span multiple years. These assumptions include labor productivity and availability; the complexity of the work to be performed; the cost and availability of materials; the performance of subcontractors; and the availability and timing of funding from the customer.

The Company's contracts do not typically contain variable consideration or other provisions that increase or decrease the transaction price. In rare instances where the transaction price is not fixed, the Company estimates variable consideration at the most likely amount to which it expects to be entitled. The Company includes estimated amounts in the transaction price to the extent it is probable that a significant reversal of cumulative revenue recognized will not occur when the uncertainty associated with the variable consideration is resolved. For contracts in which a portion of the transaction price is retained and paid after the good or service has been transferred to the customer the Company does not recognize a significant financing component. The primary purpose of the retainage payment is often to provide the customer with assurance that the Company will perform its obligations under the contract, rather than to provide financing to the customer.

The Company's estimates of variable consideration and determination of whether to include estimated amounts in the transaction price are based largely on an assessment of anticipated performance and all information (historical, current and forecasted) that is reasonably available.

Claims and settlements with customers, which may arise in the normal course of business, are generally included in revenues when realization is probable, and the amount can be reasonably estimated.

Note A - Nature of Operations and Summary of Significant Accounting Policies (Continued)

Contract Balances — The timing of revenue recognition, billings and cash collections results in billed contracts receivable, retainage, contract assets and contract liabilities on the Consolidated Balance Sheets. Contract assets include unbilled receivables, which represent work performed that could not be billed either due to contract stipulations or the required contractual documentation has not been finalized. These assets are reclassified to contracts receivable when they are billed under the terms of the contract. Contract retainages represent amounts invoiced to customers where payment has been withheld by the customer until the work is completed. Contract retentions are due 30 days after completion of the project and acceptance by the customer. Contract liabilities represent billings as of the balance sheet date, as allowed under the terms of the contract, but not yet recognized as revenue pursuant to the Company's revenue recognition policy. The Company anticipates that substantially all costs incurred and associated with contract assets as of December 31, 2023 will be billed and collected within one year.

The Company's contract assets and contract liabilities are reported in a net position on a contract-by-contract basis at the end of each reporting period, excluding retainage. Advance payments, billings in excess of revenue recognized and deferred revenue are each classified as current.

Income Taxes — The Company operates as a limited liability company; therefore, earnings and losses are included on the income tax returns of the respective Partners. The Company has no uncertain tax positions.

Subsequent Events — The Company has evaluated all subsequent events through March 15, 2024, the date the consolidated financial statements were available to be issued.

Note B - Recently Adopted Accounting Guidance

In June 2016, the Financial Accounting Standards Board (FASB) issued guidance (Accounting Standards Codification [ASC] 326, Measurement of Credit Losses on Financial Instruments) which significantly changed how entities will measure credit losses for most financial assets and certain other instruments that aren't measured at fair value through net income. The most significant change in this standard is a shift from the incurred loss model to the expected loss model. Under the standard, disclosures are required to provide users of the financial statements with useful information in analyzing an entity's exposure to credit risk and the measurement of credit losses.

Note B - Recently Adopted Accounting Guidance (Continued)

Financial assets held by the Company that are subject to the guidance in FASB ASC 326 were contracts receivable, retainage, contract assets, and available-for-sale marketable securities.

The Company adopted the standard effective January 1, 2023, using the modified retrospective approach. The impact of the adoption was not considered material to the consolidated financial statements and primarily resulted in new and enhanced disclosures.

Note C - Concentrations of Revenues and Credit Risk

The Company earned approximately 37% and 37% of its contract revenues from two customers during the years ended December 31, 2023 and 2022, respectively. Amounts due from these customers as of December 31, 2023 and 2022, and included in contracts receivable and retainage, totaled $7,901,056 and $33,900,315, respectively.

Note D - Marketable Securities and Fair Value Measurements

The costs and fair values of marketable securities are as follows:

	Amortized Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
December 31, 2023:				
Available-for-sale				
State & local municipal bonds	$ 9,591,442	$ 10,419	$ -	$ 9,601,861
Certificates of deposit	6,000,000	-	-	6,000,000
Total securities	**$ 15,591,442**	**$ 10,419**	**$ -**	**$ 15,601,861**

Note D -Marketable Securities and Fair Value Measurements (Continued)

	Amortized Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
December 31, 2022:				
Available-for-sale				
State & local municipal bonds	$ 9,844,712	$ -	$ 83,874	$ 9,760,838
Total securities	**$ 9,844,712**	**$ -**	**$ 83,874**	**$ 9,760,838**

The Company's available-for-sale marketable securities had the following annual maturities at December 31, 2023:

Investment Type	Fair Value	2024	2025
State & local municipal bonds	$ 9,601,861	$ 6,347,349	$ 3,254,512
Certificates of deposit	6,000,000	6,000,000	-
	$ 15,601,861	**$ 12,347,349**	**$ 3,254,512**

The Company held two certificates of deposit as of December 31, 2023. A $3,000,000 6-month certificate of deposit will mature on June 1, 2024. A $3,000,000 12-month certificate of deposit will mature on December 1, 2024.

Available-for-sale debt securities are carried in the consolidated financial statements at fair value. During 2022, the Company sold debt securities available-for-sale for total proceeds of $104,283, resulting in gross realized gains of $256 which are included in earnings.

In 2023 and 2022, interest income from marketable securities was $293,589 and $107,751, respectively, net of premium amortization on state and local municipal bonds of $222,236 and $135,994, respectively.

Note D - Marketable Securities and Fair Value Measurements (Continued)

The following tables set forth by level, within the fair value hierarchy, the Company's marketable securities at fair value.

December 31, 2023:	Level 1	Level 2	Level 3	Fair Value
Available-for-sale				
State & local municipal bonds	$ -	$ 9,601,861	$ -	$ 9,601,861
Certificates of deposit	-	6,000,000	-	6,000,000
Total securities	**$ -**	**$ 15,601,861**	**$ -**	**$ 15,601,861**

December 31, 2022:	Level 1	Level 2	Level 3	Fair Value
Available-for-sale				
State & local municipal bonds	$ -	$ 9,760,838	$ -	$ 9,760,838
Total securities	**$ -**	**$ 9,760,838**	**$ -**	**$ 9,760,838**

Note E - Contracts Receivable

The following table summarizes the contracts receivable balance as of:

	12/31/2023	**12/31/2022**	**1/1/2022**
Contracts completed	$ 2,779,925	$ 1,411,001	$ 4,136,678
Contracts in progress	54,479,234	43,212,310	26,557,529
Contracts receivable	**$ 57,259,159**	**$ 44,623,311**	**$ 30,694,207**

Note F - Inventories

The following table summarizes inventories as of December 31, 2023 and 2022:

	2023	2022
CIPP liner	$ 2,513,733	$ 2,771,507
CIPP raw materials	3,715,753	4,551,399
Construction materials	2,488,211	3,088,222
	$ 8,717,697	$ 10,411,128

Note G - Leases

The Company has obligations as a lessee for office, warehouse and yard space with initial noncancelable terms in excess of one year. The Company classifies these leases as operating leases. The Company also leases vehicles under finance leases.

The following summarizes the line items on the consolidated balance sheets as of December 31, 2023 and 2022:

	2023	2022
Operating Leases:		
Operating lease right-of-use assets	$ 1,922,482	$ 906,344
Operating lease liabilities, current	$ 654,001	$ 725,540
Operating lease liabilities, noncurrent	1,268,481	180,804
Total operating lease liabilities	$ 1,922,482	$ 906,344
Finance Leases:		
Equipment	$ 9,028,207	$ 6,120,692
Accumulated depreciation	3,313,571	2,811,632
Assets under finance lease arrangements, net	$ 5,714,636	$ 3,309,060
Finance lease liabilities, current	$ 1,230,322	$ 912,057
Finance lease liabilities, noncurrent	4,184,967	2,326,785
Total finance lease liabilities	$ 5,415,289	$ 3,238,842

Note G - Leases (Continued)

The following summarizes the line items on the consolidated statements of income for the years ended December 31, 2023 and 2022:

	2023	2022
Operating:		
Operating leases, included in operating expenses	$ **1,007,656**	$ 710,349
Short-term leases, included in operating expenses	**320,796**	270,395
	1,328,452	980,744
Finance:		
Amortization of assets, included in depreciation	**1,204,061**	908,913
Interest, included in interest expense	**296,917**	138,211
	1,500,978	1,047,124
	$ **2,829,430**	$ 2,027,868

The remaining short-term lease payments due in 2024 are $220,400.

The following summarizes the cash flow information related to operating leases for the years ended December 31, 2023 and 2022:

	2023	2022
Cash paid for amounts included in the measurement of lease liability:		
Operating cash flows from operating leases	$ **1,007,656**	$ 710,349
Operating cash flows from finance leases	$ **296,917**	$ 138,211
Financing cash flows from finance leases	$ **1,191,053**	$ 815,010
Lease assets obtained in exchange for lease obligations:		
Operating leases	$ **1,979,525**	$ 466,362
Finance leases	$ **3,367,500**	$ 1,986,843

The following summarizes the weighted average remaining lease term and discount rate as of December 31, 2023 and 2022:

	2023	2022
Weighted average remaining lease term in years:		
Operating leases	**3.6 years**	1.4 years
Financing leases	**4.8 years**	3.5 years
Weighted average discount rate:		
Operating leases	**8.0%**	4.7%
Financing leases	**7.7%**	6.0%

Note G - Leases (Continued)

The maturities of lease liabilities as of December 31, 2023 were as follows:

Years Ending December 31,	Operating	Finance
2024	$ 772,656	$ 1,608,234
2025	512,440	1,462,730
2026	425,414	1,290,126
2027	267,694	1,237,221
2028	250,560	841,675
Total lease payments	2,228,764	6,439,986
Less: interest	(306,282)	(1,024,697)
Present value of lease liabilities	$ 1,922,482	$ 5,415,289

Note H - Property and Equipment

Property and equipment consisted of the following as of December 31, 2023 and 2022:

	2023	2022
Land	$ **3,327,340**	$ 3,327,340
Building	**12,434,104**	11,507,072
Construction equipment	**125,046,105**	102,107,455
Vehicles	**45,332,869**	37,546,484
Manufacturing equipment	**11,009,333**	10,644,895
Computer equipment	**1,134,354**	1,032,524
Leasehold improvements	**126,421**	126,421
Furniture and fixtures	**572,337**	564,909
Construction in progress	**2,846,604**	16,839,274
	201,829,467	183,696,374
Less: accumulated depreciation	**(126,983,804)**	(111,085,920)
Net book value	$ **74,845,663**	$ 72,610,454

Note I - Accounts Payable

Accounts payable includes amounts due to subcontractors for retainage of $2,597,951 and $3,880,286 at December 31, 2023 and 2022, respectively. These payables have been retained pending completion and customer acceptance of jobs.

Note J - Debt

Debt at December 31, 2023 and 2022 consists of the following:

	2023	2022
Bank debt – equipment financing	$ 57,871,312	$ 32,972,058
Bank debt – building and land financing	3,094,040	3,486,262
	60,965,352	36,458,320
Less: current maturities	(15,449,649)	(11,391,796)
Long-term debt	$ 45,515,703	$ 25,066,524

The Company has a collateralized revolving line of credit with a borrowing limit of $30,000,000 that terminates on July 31, 2025. Drawings against the line are collateralized by certain Company assets. Under the agreement, the Company has the option to draw money at a base rate which equals the current Prime Rate adjusted for an applicable margin (-0.5% to 0.0%) based on the Company's leverage ratio, or at a rate that equals the current SOFR plus an applicable margin (1.5% to 2.0%) based on the Company's leverage ratio. At December 31, 2023 and 2022, the Company had no outstanding borrowings. The terms of the agreement are such that the borrowings are classified as long-term debt, if there was a balance. The line of credit includes covenants related to net worth, leverage and fixed charge coverage ratios. The Company was in compliance with all covenants as of December 31, 2023. Letters of credit of $740,000 have been issued at December 31, 2023, and reduce the borrowing amount available under the line of credit.

In 2014, as a part of the line of credit agreement, the Company entered into a building term loan for $3,800,000. This term loan was used to refinance the Company's 2010 corporate facility loan. The term loan bears an interest rate, which varies monthly, equal to the current SOFR plus an applicable margin (1.5% to 2.0%) based on the Company's leverage ratio. Principal plus the respective interest is payable monthly. This loan matures on July 31, 2025, when the revolving line of credit matures; however, it is management's intent to renew both the line of credit and the term loan. Therefore, the term loan is shown on the maturity schedule based on the 20 year amortization period. The balance of this loan as of December 31, 2023 and 2022, was $1,950,000 at a rate of 7.13% and $2,142,000 at a rate of 4.31%, respectively.

Note J - Debt (Continued)

In 2018, the Company entered into a term loan for the purchase of a building and land in San Antonio, Texas for $748,000. The term loan bears an interest rate of 3.25%, and principal plus the respective interest is payable monthly. This loan matures on December 1, 2025. The balance of this loan as of December 31, 2023 and 2022, was $413,257 and $488,043, respectively.

In 2019, the Company entered into a term loan for the purchase of a building and land in Kansas City, Missouri for $1,275,000. The term loan bears an interest rate of 3.25%, and principal plus the respective interest is payable monthly. This loan matures on March 1, 2026. The balance of this loan as of December 31, 2023 and 2022, was $730,783 and $856,219, respectively.

From 2018 through 2023, the Company purchased machinery and equipment and subsequently borrowed cash against the value of the machinery and equipment by entering into several collateralized long-term debt agreements. The loans are collateralized by the financed assets. Most loans have a current fixed interest rate ranging from 2.83% to 6.74%. The weighted average interest rate as of December 31, 2023 and 2022, was 4.89% and 3.40%, respectively. Principal plus the respective interest is payable monthly. The loans mature at various dates from January 2024 through December 2029. The balance of these loans as of December 31, 2023 and 2022, was $57,871,312 and $32,972,058, respectively.

The current portion of long-term debt at December 31, 2023 is $15,449,649. The aggregate maturities of long-term debt are as follows:

Years Ending December 31,	
2025	$ 14,360,338
2026	13,778,913
2027	9,858,476
2028	5,253,756
2029	1,466,220
2030 and thereafter	798,000
	$ 45,515,703

Interest expense on loans and line of credit totaled $2,342,411 and $1,310,477 in 2023 and 2022, respectively.

Note K - Partners' Capital

The following table summarizes the total equity unit capitalization structure at December 31, 2023 and 2022:

	2023	2022
Capital units (voting)	**9,371,868**	9,371,868
Incentive units (vested)	**2,841,781**	2,643,185
Incentive units (not vested)	**387,615**	397,192
	3,229,396	3,040,377
	12,601,264	12,412,245

All incentive units are non-voting and vest over 4 years from date of issuance. Incentive unitholders participate in the appreciation of the value of the Company as of the grant date of the units, subject to vesting. The Company does not record compensation expense for the incentive units as the Company has concluded it is not material to the presentation of the financial statements.

The Company has a complex waterfall distribution formula in the event of a sale or dissolution of the partnership as outlined in the operating agreement. The spirit of the agreement is first to return capital and priority returns to the capital unitholders. Incentive unitholders participate in the distributions at various levels based on the valuation of the Company and the dates they were awarded the incentive units. Periodically, the Company makes tax distributions and profit distributions to unitholders.

Note L - Revenue Recognition, Contract Assets and Liabilities

Revenue by Category — The following tables summarize revenues by segment and geography.

Year Ended December 31, 2023

Geographic Region	Cured In Place Pipe	Underground	Product Sales	Total
Central	$ 71,943,994	$ 115,058,583	$ 110,253	$ 187,112,830
Pacific	69,595,934	-	232,214	69,828,148
Southeast	60,077,596	-	-	60,077,596
Atlantic	17,206,438	-	-	17,206,438
	$ 218,823,962	$ 115,058,583	$ 342,467	$ 334,225,012

Year Ended December 31, 2022

Geographic Region	Cured In Place Pipe	Underground	Product Sales	Total
Central	$ 66,367,550	$ 130,576,262	$ 370,066	$ 197,313,878
Pacific	75,366,167	-	103,896	75,470,063
Southeast	29,290,521	-	18,925	29,309,446
Atlantic	24,086,011	-	-	24,086,011
	$ 195,110,249	$ 130,576,262	$ 492,887	$ 326,179,398

Net contract assets (liabilities) consisted of the following at:

	12/31/2023	12/31/2022	1/1/2022
Contract Assets	$ 7,471,416	$ 10,478,122	$ 7,133,876
Contract Liabilities	(29,240,777)	(30,911,689)	(51,093,223)
Net Contract Assets (Liabilities)	**$ (21,769,361)**	**$ (20,433,567)**	**$ (43,959,347)**

Impairment losses recognized on receivables, retainage and contract assets were not material during 2023 and 2022.

Note M - Defined Contribution Plan

The Company's defined 401(k) contribution plan covers all non-union employees. The plan matches contributions equal to 100% of the first three percent of eligible compensation and 50% of the next two percent of eligible compensation. During 2023 and 2022, the Company contributed $1,188,780 and $1,070,458 to the plan, respectively.

Note N - Union Benefit Plans

The Company contributes to 20 multiemployer pension plans under collective bargaining agreements covering union-represented employees. Approximately 45% of current employees are participants in such multiemployer plans. These plans generally provide retirement benefits to participants based on their service to contributing employers. The Company does not administer these multiemployer plans. In general, these plans are managed by a board of trustees with the unions appointing certain trustees and other contributing employers of the plan appointing certain members. The Company generally is not represented on the board of trustees.

Based on the information available, the Company believes that some of the multi-employer plans to which it contributes are either "critical" or "endangered" as those terms are defined in the Pension Protection Act enacted in 2006 (the PPA). The PPA requires underfunded pension plans to improve their funding ratios within prescribed intervals based on the level of their underfunding. Until the plan trustees develop the funding improvement plans or rehabilitation plans as required by the PPA, the Company is unable to determine the amount of assessments it may be subject to, if any.

Accordingly, no determination has been made at this time regarding the impact that the PPA may have on the consolidated financial position, results of operations or cash flow.

Furthermore, under current law regarding multiemployer benefit plans, a plan's termination, or voluntary withdrawal (which may be considered from time to time), or the mass withdrawal of all contributing employers from any under-funded, multiemployer pension plan would require the Company to make payments to the plan for its proportionate share of the multi-employer plan's unfunded vested liabilities.

The most significant plan that the Company participates in is the Construction Laborers Pension Trust of Greater St. Louis, EIN 43-6142465, Plan number 001, which is a multiemployer pension plan under collective bargaining agreements covering union-represented employees. The Company's collective bargaining agreements with the union expire at various dates through February 28, 2025. As of the plan's most recent financial statements, April 30, 2023, the plan was in the "green" zone, as defined by the PPA. The Company's contribution expense for this plan was $1,453,825 and $1,408,134 for the years ended December 31, 2023 and 2022, respectively.

Note N - Union Benefit Plans (Continued)

The second most significant plan that the Company participates in is the International Union of Operating Engineers Local 513, EIN 43-0827344, Plan number 001, which is a multiemployer pension plan under collective bargaining agreements covering union-represented employees. The Company's collective bargaining agreements with the union expire at various dates through May 1, 2028. As of the plan's most recent financial statements, April 30, 2023, the plan was in the "green" zone, as defined by the PPA. The Company's contribution expense for this plan was $1,101,681 and $776,572 for the years ended December 31, 2023 and 2022, respectively.

The Company's contribution expense for all other multiemployer plans was $1,567,120 and $2,015,910 for the years ended December 31, 2023 and 2022, respectively.

Note O - Joint Venture Activity

Thalle / SAK Joint Venture – The Company entered into a joint venture agreement in 2022 with a non-related party for purposes of bidding on a tunneling contract. The venture was awarded the contract. Per the Joint Venture agreement, Thalle Construction Co. Inc. and SAK are responsible for providing all working capital, management, supervision, labor, material, and equipment necessary to perform their respective Scope of Work. Funds will be distributed in line with each party's completed and paid Scope of Work and each party shall be entitled to receive all of the profits or losses in connection with its respective Scope of Work. Neither party shall share in the profits or losses resulting from the performance of the other party's Scope of Work. SAK will recognize the revenue for their Scope of Work for this agreement using the percentage of completion method. SAK recognized $25,538,957 and $2,891,565 in 2023 and 2022, respectively, as 'Contract Revenue' in the accompanying consolidated statements of income.

Note P - Unsatisfied Performance Obligations

Unsatisfied performance obligations represent revenue expected to be realized from work to be performed on contracts in progress and any change orders in which the realization and collection is probable. Additionally, unsatisfied performance obligations represent revenue expected to be realized from projects that have not begun as of December 31, 2023. These projects represent new signed contracts or projects the Company has been deemed "Apparent Low Bidder." The total unsatisfied performance obligations are $378,670,050 of which $248,296,715 is estimated new revenue on contracts in progress and $130,373,335 represents estimated revenue on contracts for which work had not yet begun as of December 31, 2023. The Company estimates that approximately $302 million, or 80%, of the remaining performance obligations at December 31, 2023 will be realized as revenues in the next 12 months.

Asset Number	Description	Year	Date Purchased	Purchase Price	Accumulated Depreciation	Net Book Value
ACM102	Aries Camera and Carring Case-PE3600 Seeker - Repurchase	2015	8/27/2012	10,800	10,800	-
ACM102	Aries Camera and Carring Case-PE3600 Seeker -Use Tax	2015	9/30/2012	643	643	-
ACM104	Aries Camera in TV14	2012	1/6/2012	14,985	14,985	-
ACM108	Aries TV Camera and Tractor	2010	5/28/2010	24,223	24,223	-
ACM132	ARIES CAMERA	2012	11/5/2012	14,901	14,901	-
ACM136	Aries Camera	2017	11/15/2017	11,363	11,363	-
ACM138	Aries Camera Lets/Seeker	2016	3/7/2016	13,241	13,241	-
ACM139	Aries Camera Lets/Seeker	2016	3/7/2016	13,241	13,241	-
ACM141	Aries Camera	2019	9/27/2019	8,590	8,590	-
ACM143	Aries Camera Pan Tilt & Zoom	2016	8/30/2016	19,483	19,483	-
ACM147	Aries Camera	2016	9/20/2016	19,505	19,505	-
ACM149	Aries Camera/PUSH	2017	9/1/2017	12,630	12,630	-
ACM150	Aries Camera/PUSH	2017	9/1/2017	12,630	12,630	-
ACM151	Aries Camera/PUSH	2017	9/1/2017	12,630	12,630	-
ACM153	Aries Camera Pathfinder Self-Cleaning P&T Zoom	2017	7/27/2017	69,362	69,362	-
ACM158	Aries Camera /Push	2018	3/30/2018	14,966	14,966	-
ACM159	Aries Camera /Push	2018	3/30/2018	14,966	14,966	-
ACM160	Aries Camera	2018	11/1/2018	34,795	34,795	-
ACM161	Aries Camera	2018	11/1/2018	34,795	34,795	-
ACM162	Aries Camera	2018	11/1/2018	34,795	34,795	-
ACM163	Aries Camera	2018	11/1/2018	34,795	34,795	-
ACM164	Aries Camera Pan Tilt & Zoom	2018	8/31/2018	15,009	15,009	-
ACM164	Sales tax on Purchase	2018	8/31/2018	893	893	-
ACM165	Aries Camera Pan Tilt & Zoom	2018	9/14/2018	16,655	16,655	-
ACM167	Aries Camera Pan Tilt & Zoom	2018	9/14/2018	16,655	16,655	-
ACM168	Aries Camera Pan Tilt & Zoom	2019	9/25/2019	17,482	17,482	-
ACM169	Aries Camera Pan Tilt & Zoom	2019	9/25/2019	17,482	17,482	-
ACM170	Aries Camera PT&Z	2021	10/8/2021	13,398	9,677	3,722
ACM171	Aries Camera PT&Z	2021	10/8/2021	13,679	9,879	3,800
ACM172	Aries Camera PT&Z	2021	10/31/2021	13,390	9,670	3,719
ACM173	Aries Camera PT&Z	2021	10/31/2021	21,100	15,239	5,861
ACM174	Aries Camera PT&Z	2021	10/31/2021	21,100	15,239	5,861
ACM175	Aries Camera PT&Z	2021	9/30/2021	18,352	14,273	4,078
ACM176	Aries Camera PT&Z	2021	11/16/2021	13,395	9,674	3,721
ACM179	Aries Camera PT&Z	2022	1/25/2022	13,391	8,927	4,464
ACM181	Aries Camera PT&Z	2023	1/12/2023	24,154	7,381	16,774
ACM182	Aries Camera PT&Z	2023	1/12/2023	24,154	7,381	16,774
ACM183	Aries Camera PT&Z	2023	1/25/2023	24,161	8,054	16,107
ACM184	Aries Camera PT&Z	2023	1/25/2023	24,161	8,054	16,107
ACM185	Aries Camera PT&Z	2023	1/25/2023	24,161	8,054	16,107
ACM192	Aries Pathfinder	2023	5/26/2023	25,490	3,540	21,950
ACM204	Aries Pathfinder	2023	10/27/2023	31,186	2,599	28,587
ACM205	Aries Pathfinder	2023	10/27/2023	31,186	2,599	28,587
ACM206	Aries Pathfinder	2023	10/27/2023	31,186	2,599	28,587
ACR107	Hertz Compressor-P185WJD-Serial #369941	2010	7/1/2010	8,493	8,493	-
ACR109	2011-IR Doosan XP375 Comp.	2013	2/22/2011	32,103	32,103	-
ACR109	2011-IR Doosan XP375 Comp. - Tax/License	2013	9/1/2011	2,521	2,521	-
ACR116	Compressor-Air- IR -185 - Capital Repair	2023	12/1/3123	10,948	304	10,644
ACR120	Air Compressor-Trailer Mounted--	2012	10/10/2012	21,240	21,240	-
ACR121	Trailer Mounted Air Compressor	2012	7/31/2012	15,023	15,023	-
ACR121	Trailer Mounted Air Compressor	2012	7/31/2012	1,150	1,150	-
ACR122	Trailer Mounted Air Compressor	2012	7/31/2012	15,023	15,023	-
ACR122	Trailer Mounted Air Compressor	2012	7/31/2012	1,150	1,150	-
ACR124	Air Compressor-Trailer Mounted	2012	9/19/2012	33,194	33,194	-
ACR125	Air Compressor-Trailer Mounted	2012	9/19/2012	26,062	26,062	-
ACR126	Air Compressor-Trailer Mounted--	2012	10/8/2012	34,669	34,669	-
ACR127	Capital Repair	2023	12/31/2023	9,699	404	9,295
ACR127	Move to CIPP Central	2015	11/13/2012	16,696	16,696	-
ACR128	Capital Repair - Replace Air End	2023	2/28/2023	21,890	6,081	15,809
ACR128	IR-Air Compressor-Trailer Mounted	2013	2/27/2013	17,975	17,975	-
ACR132	Air Compressor-Trailer Mounted	2013	6/17/2013	39,739	39,739	-
ACR137	Air Compressor- IR -375 Trailer Mounted	2013	8/7/2013	43,707	43,707	-
ACR139	2013-Ingersol Rand-185	2013	9/19/2013	18,206	18,206	-
ACR140	Capital Repair - Replace ECM and Controller	2023	2/28/2023	15,282	4,245	11,037
ACR140	Air Compressor-Doosan-375-Trailer Mounted	2013	8/20/2013	43,707	43,707	-
ACR141	Air Compressor-185-Trailer Mounted	2013	9/30/2013	17,295	17,295	-
ACR144	Air Compressor-IR-185-Trailer	2014	1/1/2014	16,077	16,077	-
ACR147	Air Compressor-IR 185-Trailer Mounted	2014	1/23/2014	16,077	16,077	-
ACR149	Capital Repair - Air End Replace/Rebuild	2022	10/31/2022	7,335	3,056	4,279
ACR151	Air Compressor-IR375XP-Trailer	2014	8/27/2014	33,105	33,105	-
ACR154	Air-Compressor-375	2015	6/5/2015	54,306	54,306	-
ACR155	Capital Repair - Air-Compressor-375	2022	9/30/2022	6,972	2,905	4,067
ACR155	Air-Compressor-375	2015	6/5/2015	52,271	52,271	-
ACR156	Air Compressor 185	2015	10/9/2015	22,708	22,708	-
ACR157	Air Compressor 185	2015	10/9/2015	22,708	22,708	-
ACR158	Air Compressor 375	2015	9/25/2015	54,306	54,306	-
ACR159	Move from Tunnel to CIPP	2017	10/9/2015	54,306	54,306	-
ACR161	Air Compressor 375	2016	4/22/2016	56,663	56,663	-
ACR162	AIR COMPRESSOR 185	2016	8/18/2016	23,056	23,056	-
ACR163	Air Compressor 375	2023	8/18/2016	56,663	56,663	-
ACR164	185 AIR COMPRESSOR	2021	9/26/2016	23,056	23,056	-
ACR165	375 AIR COMPRESSOR	2016	11/22/2016	57,198	57,198	-

ACR166	Capital Repair - Replace turbo and actuator	2023	5/31/2023	10,475	2,328	8,147
ACR166	375 AIR COMPRESSOR	2016	10/21/2016	57,198	57,198	-
ACR167	Capital Repair - Replace Compressor drive coupler	2023	5/31/2023	9,510	2,113	7,397
ACR167	375 AIR COMPRESSOR - TIER 4F	2017	3/2/2017	57,505	57,505	-
ACR168	185 AIR COMPRESSOR	2017	5/8/2017	23,056	23,056	-
ACR169	Capital Repair - Replace DEF & Sensors	2021	4/30/2021	7,323	6,713	610
ACR169	375 AIR COMPRESSOR	2017	8/22/2017	57,198	57,198	-
ACR169	Captial Repair - Replace Coupler & Seals	2020	4/1/2020	5,876	5,876	-
ACR171	375 AIR COMPRESSOR	2018	1/16/2018	57,842	57,842	-
ACR172	375 AIR COMPRESSOR	2018	1/16/2018	57,842	57,842	-
ACR175	Capital Repair - Repalce Air end Coupler	2023	9/30/2023	10,069	839	9,230
ACR175	375 AIR COMPRESSOR	2023	6/28/2018	59,725	59,725	-
ACR176	375 AIR COMPRESSOR	2018	10/29/2018	59,725	59,725	-
ACR177	185 AIR COMPRESSOR	2019	1/24/2019	24,105	24,105	(0)
ACR178	375 AIR COMPRESSOR	2019	4/18/2019	60,226	50,211	10,015
ACR180	375 AIR COMPRESSOR	2019	4/30/2019	60,226	50,211	10,015
ACR181	375 AIR COMPRESSOR	2019	6/5/2019	60,226	50,203	10,023
ACR185	375 AIR COMPRESSOR	2020	10/8/2020	57,101	32,116	24,985
ACR188	375 AIR COMPRESSOR	2021	12/20/2021	66,259	22,504	43,755
ACR190	375 AIR COMPRESSOR	2021	12/20/2021	66,259	22,503	43,755
ACR191	375 AIR COMPRESSOR	2022	1/21/2022	66,259	22,503	43,755
ACR192	375 AIR COMPRESSOR	2022	2/11/2022	66,259	21,295	44,964
ACR193	375 AIR COMPRESSOR	2022	8/18/2022	74,231	15,558	58,674
ACR194	375 AIR COMPRESSOR	2022	8/18/2022	74,231	15,558	58,674
ACR194	375 AIR COMPRESSOR - Capital Repair - Replace Coupler	2022	10/31/2022	5,700	1,330	4,370
ACR195	375 AIR COMPRESSOR	2022	8/18/2022	74,231	15,558	58,674
ACR196	375 AIR COMPRESSOR	2022	12/16/2022	75,056	14,262	60,793
ACR197	375 AIR COMPRESSOR	2022	12/16/2022	75,056	14,262	60,793
ACR198	375 AIR COMPRESSOR	2022	12/16/2022	75,056	12,011	63,044
ACR199	185 AIR COMPRESSOR	2022	12/29/2022	29,628	5,926	23,702
ACR200	185 AIR COMPRESSOR	2022	12/29/2022	29,628	5,926	23,702
ACR201	185 AIR COMPRESSOR	2022	12/29/2022	29,628	5,926	23,702
ACR202	185 AIR COMPRESSOR	2023	1/18/2023	30,921	6,184	24,737
ACR203	185 AIR COMPRESSOR	2023	1/18/2023	30,921	6,184	24,737
ACR204	185 AIR COMPRESSOR	2023	1/17/2023	30,921	6,184	24,737
ACR205	375 AIR COMPRESSOR	2023	1/27/2023	74,486	11,897	62,588
ACR206	375 AIR COMPRESSOR	2023	1/27/2023	74,486	11,897	62,588
ACR207	375 AIR COMPRESSOR	2023	1/27/2023	74,486	11,897	62,588
ACR208	375 AIR COMPRESSOR - MOUNTED TO BSK133	2023	4/17/2023	78,541	9,163	69,378
ACR209	375 AIR COMPRESSOR	2023	4/17/2023	78,541	9,163	69,378
ACR210	375 AIR COMPRESSOR	2023	4/17/2023	78,541	9,163	69,378
ACR211	375 AIR COMPRESSOR	2023	4/17/2023	78,541	9,163	69,378
ACR212	375 AIR COMPRESSOR	2023	5/10/2023	78,541	9,163	69,378
ACR213	375 AIR COMPRESSOR	2023	8/30/2023	78,541	5,236	73,305
ACR214	185 AIR COMPRESSOR	2023	12/22/2023	27,726	462	27,264
ACR215	NOT in VP YET	2023	12/22/2023	27,726	-	27,726
ACR216	NOT in VP YET	2023	12/22/2023	27,726	-	27,726
ACR217	NOT in VP YET	2023	12/22/2023	71,914	-	71,914
ACR218	NOT in VP YET	2023	12/22/2023	71,914	-	71,914
ACT138	SAK Robot Aries Badger Shorty 6-15"	2019	7/1/2019	13,238	13,238	-
ACT139	SAK Robot Aries Tractor Badger Shorty Wheeled 6-15"	2019	7/1/2019	13,238	13,238	-
ACT140	Aries Badger Mini 6"-15"	2016	1/15/2016	8,978	8,978	-
ACT141	Aries Tractor Steerable Storm Sewer	2016	1/21/2016	20,625	20,625	-
ACT142	Aries Tractor, Badger Shorty Wheeled 6 - 15"	2016	3/7/2016	8,942	8,942	-
ACT143	Aries Tractor, Badger Shorty Wheeled 6 - 15"	2016	3/7/2016	8,942	8,942	-
ACT149	Aries Tractor Badger Shorty Wheeled 6-15"	2016	9/29/2016	9,000	9,000	-
ACT150	Aries Tractor Badger Shorty Wheeled 6-15"	2016	9/29/2016	9,000	9,000	-
ACT152	Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	12,648	12,648	-
ACT153	Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	12,648	12,648	-
ACT154	SAK Robot Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	56,608	56,608	-
ACT155	SAK Robot Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	56,608	56,608	-
ACT157	SAK Robot Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	56,608	56,608	-
ACT158	SAK Robot Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	56,608	56,608	-
ACT159	SAK Robot Aries Tractor Badger Shorty Wheeled 6-15"	2017	9/1/2017	56,608	56,608	-
ACT161	Aries Tractor, Wheeled	2018	3/25/2018	2,967	2,967	-
ACT162	Aries Tractor Badger Shorty Wheeled	2018	3/30/2018	15,413	15,413	-
ACT168	Aries Titan Steerable Storm Tractor	2019	12/9/2019	24,082	24,082	-
ACT170	Aries Titan Steerable Storm Tractor	2020	6/26/2020	21,040	21,040	-
ACT171	Aries Titan Steerable Storm Tractor	2021	3/26/2021	4,392	4,148	244
APR102	Flatbed Trailer 20'	2017	1/26/2012	4,452	4,452	-
APR102	Capital Repair - replace motor and gear boxes on resin pumps	2021	8/31/2021	10,875	10,875	-
APR103	Aquapipe Water Heater Conex	2021	7/31/2021	144,286	-	144,286
APR103	New Aquapipe Crew Supplies	2023	11/30/2023	38,365	-	38,365
ARP003	Aries Portable Reel Seeker Push with Cam	2019	1/18/2019	12,568	12,568	-
ART108	Message Board Trailer	2020	2/5/2020	13,558	13,558	-
ART109	Message Board Trailer	2020	2/5/2020	13,558	13,558	-
ATV105	2015-Kubota	2015	2/1/2015	14,840	14,840	-
ATV107	GATOR	2018	3/5/2018	15,929	15,929	-
ATV108	KUBOTA RTV-X900 ATV	2019	2/15/2019	7,526	7,526	-
ATV110	United Rentals ATVs	2019	3/19/2019	7,020	7,020	-
ATV111	Kubota RTV-X1120	2019	12/27/2019	17,443	17,443	-
ATV115	Can-Am Defend Max	2020	2/27/2020	17,670	17,670	-
ATV116	ATV-BOBCAT-3400G	2020	7/16/2020	6,176	6,176	-
ATV118	John Deere Gator	2021	12/9/2021	20,343	13,562	6,781
ATV120	ATV-KUBOTA RTV-X1140W-H	2022	12/30/2022	12,613	3,153	9,460
ATV123	ATV-KUBOTA RTV-X1120WL-H	2023	7/20/2023	20,731	3,455	17,276

ATV124	ATV-CAN AM-DEFENDER MAX	2022	10/29/2022	31,942	10,647	21,295
BLW101	BLOWER	2016	6/30/2016	76,149	76,149	-
BLW102	BLOWER - 15 PSI - 1200 CFM - 1800 RPM MAX	2017	5/1/2017	60,087	60,087	-
BLW103	BLOWER -	2018	3/1/2018	92,736	92,736	-
BLW104	BLOWER -	2018	3/1/2018	92,736	92,736	-
BLW105	BLOWER - TIER 4 FINAL	2018	3/1/2018	92,736	92,736	-
BLW106	BLOWER - SMALL BLOWER	2018	9/1/2018	60,467	60,467	-
BLW106	Capital Repair - Gate Valves	2021	2/1/2021	5,248	5,248	-
BLW110	Blower Downpymt	2023	10/6/2023	25,214	-	25,214
BLW111	Blower Downpymt	2023	10/6/2023	25,214	-	25,214
BLW112	Blower Downpymt	2023	10/6/2023	25,214	-	25,214
BP05	BY-Pass Pipe-12"- 2,240 Ft.	2014	9/17/2014	22,148	22,148	-
BP06	BY-Pass Pipe 18"- 8,200 Ft.	2014	8/12/2014	153,988	153,988	-
BP07	By-Pass Pipe 8" x 20' Discharge Pipe with couplings	2016	12/7/2016	43,083	43,083	-
BP07	Sales tax on Purchase	2017	3/1/2017	4,924	4,924	-
BP08	By-Pass Pipe 12" SDR26 HDPE Pipe - 4,400 Ft	2017	6/16/2017	30,782	30,782	-
BP09	By-Pass Pipe 18" SDR HDPE PIpe - 10,000 LF	2017	6/16/2017	104,940	104,940	-
BP09	Hauling Pipe from Vendor to SAK	2017	7/27/2017	10,270	10,270	-
BP10	By-Pass Pipe 18" DR 26 IPS Pipe HDPE	2017	5/22/2017	58,224	58,224	-
BP11	By-Pass Pipe 8" SDR HDPE Pipe - 7,000 LF	2018	8/15/2018	71,187	71,187	-
BP12	By-Pass Pipe 18" IPS HDPE Pipe - 40,000 LF	2019	10/17/2018	671,700	671,700	-
BP12	By-Pass Pipe 18" IPS HDPE Pipe - 40,000 LF - Tax	2019	3/31/2019	55,415	53,568	1,847
BP13	Bypass Manifold - 18" x3 12" x5 - 4,800lbs-6,800lbs w/valves	2019	8/1/2019	61,043	53,922	7,122
BP13	Additional rehab to manifold	2019	10/31/2019	11,333	9,444	1,889
BP14	Bypass Manifold - 18" x5 - 4,000lbs-6,000lbs w/valves	2019	8/1/2019	61,043	53,922	7,122
BP14	Additional rehab to manifold	2019	10/31/2019	11,333	9,444	1,889
BP15	Bypass Manifolds 18" x 4	2019	10/31/2019	9,692	9,692	-
BP16	Bypass Manifolds 18" x 2 & 24" x1	2019	10/31/2019	9,692	9,692	-
BP17	18x50 IPS SDR26 ByPass Pipe - HDPE 5,000LF	2020	3/31/2020	81,524	59,784	21,740
BP18	18x50 IPS SDR26 ByPass Pipe - HDPE 5,000LF	2020	4/2/2020	79,107	58,012	21,095
BP19	By-Pass Pipe 24" HDPE AWWA Pipe	2020	5/14/2020	523,301	231,632	291,669
BSK105	Steam Boiler - Rush - 4 MBTU - Capital Repair - Repipe Boiler & Replace Valves	2021	11/30/2021	29,506	21,310	8,196
BSK105	Capital Repair	2023	11/30/2023	33,751	703	33,047
BSK105	Boiler Truck International 7600	2010	7/1/2009	219,408	219,408	-
BSK105	Boiler Truck International - Cap repair	2014	3/31/2014	22,226	22,226	-
BSK105	Major Engine top end	2018	3/31/2018	7,479	7,479	-
BSK105	Replace Boiler Coils	2017	10/31/2017	20,759	20,759	-
BSK105	Boiler Truck Modifications	2017	11/30/2017	17,728	17,728	-
BSK106	Capital Repair - Repipe and controls	2022	10/31/2022	10,662	6,220	4,442
BSK106	Capital Repair - Replace engine oil pump and repace bottom end bearings	2023	2/28/2023	10,695	4,456	6,239
BSK106	Boiler Truck - maintenance	2012	1/12/2012	7,222	7,222	-
BSK106	Boiler Truck - Capital Repair	2013	8/31/2013	5,110	5,110	-
BSK106	Boiler Truck International 7600	2010	7/1/2009	229,999	229,999	-
BSK106	Boiler Truck - Capital Repair	2014	12/31/2014	8,279	8,279	-
BSK106	install doors on boiler enclosure	2016	3/31/2016	11,351	11,351	-
BSK106	Etech Tube Bundle	2016	5/23/2016	16,104	16,104	-
BSK106	Replace Boiler Tubes	2018	11/1/2018	21,816	21,816	-
BSK106	BSK106 - Generator/doors/sheeting	2019	5/1/2019	23,089	23,089	-
BSK106	Capital Repair to BSK106	2018	8/31/2018	13,376	13,376	-
BSK106	Capital Repair - replace boiler tubes and necessary fittings and hardware	2019	12/1/2020	17,845	17,845	-
BSK107	Boiler Truck - Capital Repair	2022	9/30/2022	20,419	12,762	7,657
BSK107	Capital Repair	2023	11/30/2023	43,591	908	42,683
BSK107	Boiler Truck - maintenance	2012	12/21/2011	2,772	2,772	-
BSK107	Heater Coil for BSK107	2013	5/14/2013	19,739	19,739	-
BSK107	Boiler Truck International 7600	2010	9/30/2009	255,657	255,657	-
BSK107	Capital Repair to BSK107	2013	11/30/2013	18,752	18,752	-
BSK107	Capital Repair to BSK107	2014	3/31/2014	34,953	34,953	-
BSK107	Capital Repair to BSK107	2014	6/30/2014	11,425	11,425	-
BSK107	Replace boiler tubes bundle	2019	3/31/2019	17,618	17,618	-
BSK107	Capital Repair - Replace Boiler Tubes & Pipe	2020	4/1/2020	19,316	19,316	-
BSK109	Capital Repair - Replace Injectors	2023	2/28/2023	6,490	1,803	4,687
BSK109	Boiler Truck - maintenance	2012	2/13/2012	2,498	2,498	-
BSK109	1997 Peterbuilt Boiler Truck	2011	8/11/2011	24,318	24,318	-
BSK109	1997 Peterbuilt Boiler Truck-Tax/License	2011	9/16/2011	2,120	2,120	-
BSK109	Capital Repair to BSK109	2014	6/30/2014	12,701	12,701	-
BSK109	Replace Roof on BSK109	2016	3/31/2016	6,409	6,409	-
BSK109	Replace Roof on BSK109	2016	4/30/2016	6,266	6,266	-
BSK109	Replace Water Tank/Fitting	2016	6/30/2016	7,908	7,908	-
BSK109	Repair Work for BSK109	2017	3/1/2017	17,288	17,288	-
BSK109	Replace Steam Coil Tube Bundle	2017	10/31/2017	15,200	15,200	-
BSK109	Capital Improvement to Truck	2018	5/1/2018	12,950	12,950	-
BSK109	Capital Repair	2020	10/30/2020	8,299	8,299	-
BSK109	Capital Repair - Top End Engine Overhaul and install reman diff.	2020	6/30/2020	35,079	35,079	-
BSK112	Capitla Repair - Boiler Lantern Element	2021	12/1/2021	12,977	12,977	(0)
BSK112	Capital Repair	2022	4/1/2022	8,550	7,125	1,425
BSK112	Capital Repair - Replace Boiler Vaporizer	2023	8/1/2023	8,004	1,112	6,892
BSK112	Capital Repair - Complete retube of boiler	2023	9/30/2023	25,545	2,129	23,416
BSK112	Boiler Replacement	2022	1/18/2022	87,132	30,853	56,279
BSK112	BSK112 Rebuild	2022	6/30/2022	58,305	15,463	42,842
BSK112	Boiler Truck-Steam - capital repair	2013	8/31/2013	4,436	4,436	-
BSK112	Boiler Truck-Steam - capital repair	2013	10/31/2013	3,172	3,172	-
BSK112	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK112	Upgraded piping in truck	2015	7/31/2015	10,000	10,000	-
BSK112	Boiler Truck-Steam - capital repair	2013	6/1/2013	8,819	8,819	-

BSK112	Boiler Truck-Steam	2013	2/28/2013	298,911	298,911	-
BSK112	Replace Steam Coil Tube Bundle	2017	10/31/2017	15,200	15,200	-
BSK112	Capital Improvement to Truck	2018	5/1/2018	12,950	12,950	-
BSK112	Boiler Truck-Steam - Capital Repair	2018	6/30/2018	7,003	7,003	-
BSK112	ENGINE INFRAME OVERHAUL	2019	1/1/2019	15,416	15,416	-
BSK112	Capital Repair - Replace Boiler Tube Bundle - Reskin Boiler	2021	8/31/2021	22,209	22,209	-
BSK112	Capital Repair	2023	11/30/2023	55,801	1,163	54,638
BSK113	Capital Repair	2023	11/30/2023	38,546	803	37,743
BSK113	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK113	Steam Boiler - Rush - 4 MBTU	2013	3/31/2013	116,455	116,455	-
BSK113	Replace boiler enclosure	2018	3/31/2018	6,799	6,799	-
BSK113	Capital Repairs to Boiler	2017	9/1/2017	12,623	12,623	-
BSK113	Capital Repairs to Boiler	2017	12/15/2017	37,765	37,765	-
BSK113	New Coils	2017	12/1/2017	17,480	17,480	-
BSK113	New doors and canopy	2018	5/1/2018	23,503	23,503	-
BSK113	Capital Repair - Replace Boiler Tubes & Pipe	2020	4/1/2020	20,423	20,423	-
BSK114	Capital Repair - Replace Boiler Coils	2020	12/1/2020	19,993	19,993	0
BSK114	Capital Repair	2023	11/30/2023	45,656	951	44,705
BSK114	Boiler Truck-Capital Repair	2014	12/31/2014	12,545	12,545	-
BSK114	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK114	Piping and Valves	2018	3/31/2018	5,457	5,457	-
BSK114	Boiler Truck-Steam	2013	5/9/2013	116,418	116,418	-
BSK114	Steam Boiler - LES - 5 MBTU	2013	10/31/2013	87,640	87,640	-
BSK114	Boiler Truck-Steam - Additions	2013	11/30/2013	6,622	6,622	-
BSK114	Rewire Boiler and replace panel	2018	12/1/2018	7,041	7,041	-
BSK114	Capital Repair - Boiler coil replacement	2020	6/30/2020	22,886	22,886	-
BSK114	Captial Repair - Replace controls in panel/boiler	2021	8/31/2021	13,841	13,841	-
BSK115	Capital Repair - Repipe and Controls	2022	10/31/2022	10,302	6,010	4,292
BSK115	Capital Repair - Replace VGT turbo and cooler	2023	4/30/2023	8,079	3,030	5,050
BSK115	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK115	Capitalize repairs	2018	11/1/2018	6,866	6,866	-
BSK115	Steam Boiler - LES - 5 MBTU	2013	12/1/2013	285,328	285,328	-
BSK115	New Coils	2017	12/1/2017	19,139	19,139	-
BSK115	Coil Replacement	2018	12/1/2018	26,999	26,999	-
BSK115	Capital Repair - Replace Boiler Tube Bundle	2021	5/31/2021	18,711	18,711	-
BSK115	Capital Repair - Replace Boiler Tube Bunde - Reskin Box - Replace Underbody Boxes	2021	9/30/2021	27,141	27,141	-
BSK115	BSK115 Rebuild	2021	9/1/2021	28,085	28,085	-
BSK116	Capital Repair Upgrade/Replace boiler piping	2021	12/1/2021	5,633	5,633	-
BSK116	Capital Repair - Replace boiler piping	2023	3/31/2023	10,187	3,820	6,367
BSK116	Capital Repair	2023	11/30/2023	33,333	694	32,639
BSK116	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK116	Replace coils on boiler	2015	7/31/2015	21,754	21,754	-
BSK116	Steam Boiler - LES - 5 MBTU	2014	3/1/2013	101,762	101,762	-
BSK116	Purchased from WF at end of Lease	2018	11/1/2018	28,426	28,426	-
BSK116	New doors and operators on boiler	2018	10/31/2018	7,503	7,503	-
BSK116	ENGINE IN FRAME OVERHAUL	2019	1/1/2019	17,379	17,379	-
BSK116	Repipe and Resheet	2019	3/1/2019	64,062	64,062	-
BSK116	Unilux Steam Box and Burner	2014	4/8/2014	47,777	47,777	-
BSK117	Capitla Repair - Start Up & New Controls/Boiler	2021	12/1/2021	4,705	4,705	-
BSK117	Capital Repair - Turbo & DPF	2022	6/30/2022	10,744	5,671	5,074
BSK117	Capital Repair - Replacement Unilux with Power Flame Burner	2020	4/9/2020	102,882	60,159	42,723
BSK117	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK117	Purchased from WF at end of Lease	2019	2/26/2019	32,868	32,868	-
BSK117	International 7400 Boiler Truck	2014	7/31/2014	165,181	165,181	-
BSK117	Capital Repair - replace intake and egr on chassis engine	2021	8/31/2021	3,396	3,396	-
BSK118	Capital Repair - Replace Both Fuel Tanks	2022	1/1/2022	5,177	5,177	0
BSK118	Boiler Components from BW01	2012	1/5/2012	16,745	16,745	-
BSK118	Boiler Truck International 7600-Replaced BW01	2010	8/26/2009	43,052	43,052	-
BSK118	Additions to BWK102	2014	7/10/2014	8,397	8,397	-
BSK118	Rebuild Boilers	2014	12/31/2014	7,437	7,437	-
BSK118	Capital Repairs to Boiler	2017	9/1/2017	21,217	21,217	-
BSK118	Replace boiler tubes bundle	2019	3/31/2019	19,013	19,013	-
BSK118	Capital Repair - Repipe Boiler Replace Separator & Steam Trap - Upgrade Controller	2019	8/1/2019	23,320	23,320	-
BSK118	Steam Boiler - LES - 5 MBTU	2014	9/30/2014	168,748	168,748	-
BSK118	Captial Repair - Tires, pm, etc.. Spare parts for boiler	2019	11/1/2019	25,056	25,056	-
BSK119	Capital Repair - Exhaust manifold, intercooler, turbo mounts lots of labor broken bolts	2022	6/30/2022	13,984	7,380	6,603
BSK119	Capital Repair - Replace HP oil pump and injector	2023	2/28/2023	6,649	1,847	4,802
BSK119	Capital Repair - Replace high pressure oil pump and injectors	2023	3/31/2023	15,538	3,884	11,653
BSK119	Capital Repair	2023	11/30/2023	28,096	585	27,511
BSK119	Capital Repair - Replace Doors & Tool Boxes	2019	8/1/2019	6,858	6,858	-
BSK119	Steam Boiler - LES - 5 MBTU	2014	12/31/2014	288,476	288,476	-
BSK120	Capital Repair - Steam Boiler - Repipe and Controls	2022	10/31/2022	9,457	3,678	5,779
BSK120	Capital Repair	2023	11/30/2023	20,440	426	20,014
BSK120	Steam Boiler	2015	8/31/2015	224,891	224,891	-
BSK120	BSD101 Build Steamer	2015	7/31/2015	33,541	33,541	-
BSK121	Capital Repair - Replace coils and repipr boiler - Replace Controls	2022	4/1/2022	30,246	16,803	13,443
BSK121	BSK121 Repipe	2022	6/30/2022	30,538	16,115	14,423
BSK121	Capital Repair - Steam Boiler	2022	9/30/2022	20,772	8,655	12,117
BSK121	Capital Repair - Replace Injectors	2022	10/31/2022	18,133	7,555	10,577
BSK121	Capital Repair	2023	11/30/2023	31,452	655	30,796
BSK121	Replace Air Compressor on Chassis	2018	11/1/2018	4,208	4,208	-
BSK121	Steam Boiler - remaining TTK101	2016	3/30/2016	89,063	89,063	-
BSK121	Steam Boiler	2016	3/30/2016	38,844	38,844	-
BSK121	Move Boiler onto BSK122	2016	11/1/2016	(10,705)	(10,705)	-

BSK124	Capital Repair - Replace Boiler Tube Bundle	2021	5/31/2021	17,904	15,417	2,487
BSK124	Steam Boiler	2017	9/1/2017	231,451	157,056	74,395
BSK124	Capital Repair - Replace Tube Stack Coils and Misc. Pipe	2021	9/30/2021	23,767	18,485	5,282
BSK126	Steam Boiler	2018	11/1/2018	335,378	185,660	149,718
BSK127	Capital Repair - Replace Boiler Tube Bundle Set	2020	12/1/2020	18,687	18,687	(0)
BSK127	Capital Repair - Replace Bolier Coils	2021	3/31/2021	18,918	17,342	1,577
BSK127	Capital Repair - Replace flex tubes on boiler	2023	2/28/2023	5,999	1,666	4,332
BSK127	Capital Repair - Replace burner box	2023	3/31/2023	18,491	4,623	13,868
BSK127	Capital Repair - Replace burner box and replace piping on boiler	2023	4/30/2023	12,867	3,217	9,650
BSK127	Steam Boiler - Rush - 4 MBTU	2018	9/1/2018	148,640	148,640	-
BSK127	Capital Repair to truck	2020	10/30/2020	22,692	22,692	-
BSK128	Steam Boiler CIP Rebuild	2021	9/1/2021	142,187	60,354	81,833
BSK128	Capital repair to Boiler	2018	10/26/2018	105,000	105,000	-
BSK128	Sheeting Replacement	2018	12/1/2018	6,103	6,103	-
BSK128	Capital Improvement to Truck	2017	8/30/2017	12,878	12,878	-
BSK128	Water Boiler - Unilux - - Propane	2016	9/1/2016	334,900	334,900	-
BSK128	Additions to Truck Build	2016	10/1/2016	6,963	6,963	-
BSK129	Steam Boiler -	2022	11/15/2022	(150,456)	(35,106)	(115,350)
BSK129	Steam Boiler -	2022	11/30/2022	189,980	44,329	145,651
BSK129	Capital Repair - Body work, wire harness, air lines after boiler burnt	2023	3/31/2023	36,019	5,403	30,617
BSK130	Steam Boiler	2022	11/30/2022	214,069	49,949	164,120
BSK130	Steam Boiler - BSK123 Rehab/Disposal Costs	2022	12/1/2022	13,397	3,126	10,271
BSK130	Capital Repair - Capex as part of boiler build. Refractory for boiler build and parts	2023	2/28/2023	7,232	1,205	6,026
BSK130	Capital Repair - Replace Generator	2023	3/31/2023	21,250	3,188	18,063
BSK131	Steam Boiler	2023	7/1/2023	330,770	24,808	305,962
BSK132	Steam Boiler	2023	8/1/2023	369,433	32,280	337,153
BSK132	Additions to Steam Boiler Build	2023	11/30/2023	10,387	173	10,214
BSK133	Capital Repair	2023	11/30/2023	15,682	327	15,355
BSK133	Capital Repair - Boiler Hise for new steam boiler build	2023	8/1/2023	10,143	845	9,297
BSK133	Steam Boiler	2023	8/1/2023	520,520	23,342	497,177
BSK133	Additions to Steam Boiler Build	2023	11/30/2023	10,589	176	10,413
BSK134	Steam Boiler -	2023	3/31/2023	11,178	3,726	7,452
BSK134	Capital Repair - Cap to new build of equipment	2023	6/1/2023	545	159	386
BSK134	Capital Repair	2023	11/30/2023	27,249	568	26,681
BSK135	Capital Repair	2023	11/30/2023	18,828	392	18,435
BSK135	Steam Boiler	2023	11/30/2023	317,398	3,967	313,431
BTK101	Move to Geopolymer	2020	11/1/2011	37,797	37,797	-
BTK102	Tool Truck-Portable Steam Generator Truck	2012	6/19/2012	59,720	59,720	-
BTK102	Tool Truck - Tax/License Paid	2012	7/12/2012	4,826	4,826	-
BTK102	Shelving in Boiler Truck	2012	8/1/2012	4,485	4,485	-
BTK104	Box Truck for Grout	2013	3/19/2013	102,432	102,432	-
BTK104	Box Truck for Grout	2013	3/31/2013	90,996	90,996	-
BWK103	Boiler Truck Maintenance	2012	1/11/2012	3,052	3,052	-
BWK103	Boiler Truck Maintenance	2012	3/19/2012	2,074	2,074	-
BWK103	Boiler Truck Maintenance	2012	12/1/2012	7,564	7,564	-
BWK103	Boiler Truck Freightliner	2010	6/3/2010	70,000	70,000	-
BWK103	Boiler Truck Capital Repair	2013	8/31/2013	4,285	4,285	-
BWK103	Boiler Truck Capital Repair	2014	3/31/2014	30,159	30,159	-
BWK103	Upgrade Boiler	2018	11/1/2018	6,979	6,979	-
BWK103	Capital Repair - Repipe Boiler, Replace Shutoff Valves, Clean up Wiring, and Paint	2021	4/30/2021	8,456	8,456	-
BWK104	1994 Freightliner Boiler Truck	2011	3/23/2011	45,000	45,000	-
BWK104	Capital repair on BWK104	2013	6/1/2013	27,191	27,191	-
BWK104	Capital repair on BWK104	2014	9/30/2014	5,131	5,131	-
BWK105	Boiler Truck Maintenance	2012	5/9/2012	3,851	3,851	-
BWK105	Boiler Truck Maintenance	2012	5/18/2012	12,498	12,498	-
BWK105	2003 International 4300	2011	3/23/2011	78,100	78,100	-
BWK106	New Boiler purchase	2018	12/21/2018	64,681	64,681	0
BWK106	Capital Repair - Engine Overhaul - Replace Boiler tubes & piping	2022	1/1/2022	53,691	35,794	17,897
BWK106	Capital Repair -	2023	10/31/2023	15,814	879	14,935
BWK106	Water Boiler -Capital Repair	2013	8/31/2013	20,670	20,670	-
BWK106	Water Boiler -Capital Repair	2013	9/30/2013	14,406	14,406	-
BWK106	Water Boiler -Capital Repair	2014	12/31/2014	6,546	6,546	-
BWK106	Install roll up doors & canopy	2016	3/31/2016	10,406	10,406	-
BWK106	Water Boiler - Unilux -10 MBTU, Propane	2013	6/1/2013	308,626	308,626	-
BWK106	Fix boiler tubes	2018	9/1/2018	80,056	80,056	-
BWK108	BWK108 - Boiler Repairs	2022	6/30/2022	69,406	21,979	47,427
BWK108	WATER BOILER TRUCK	2018	11/1/2018	125,595	125,595	-
BWK109	Capital Repair - Capex to unit. This is freight to haul the truck to O'Fallon when we purchased out of state	2023	5/31/2023	11,287	2,508	8,779
BWK109	Capital Repair - Sandblast and paint new boiler	2023	8/1/2023	6,530	907	5,623
BWK109	Capital Repair	2023	11/30/2023	15,668	326	15,342
BWK109	Water Boiler -	2023	3/23/2023	56,829	8,524	48,304
BWK110	Water Boiler -	2023	3/23/2023	55,000	8,250	46,750
CBS004	Brain Box - Digital Box V2	2021	8/24/2021	8,528	5,922	2,606
CBS005	Brain Box - Digital Box V2	2021	8/24/2021	8,528	5,922	2,606
CBS006	Brain Box - Digital Box V2	2021	8/24/2021	8,528	5,922	2,606
CBS007	Brain Box - Digital Box V2	2022	4/25/2022	5,932	3,460	2,471
CBS008	Brain Box - Digital Box V2	2022	4/25/2022	5,932	3,460	2,471
CBS009	Brain Box - Digital Box V2	2022	4/25/2022	5,932	3,460	2,471
CBS018	Brain Box - Digital Box v2	2023	2/28/2023	5,175	1,294	3,881
CBS019	Brain Box - Digital Box v2	2023	2/28/2023	5,175	1,294	3,881
CBS020	Brain Box - Digital Box v2	2023	2/28/2023	5,175	1,294	3,881
CBS021	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS022	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS023	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881

CBS024	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS025	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS026	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS027	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS028	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS029	Brain Box - Digital Box v2	2023	3/31/2023	5,175	1,294	3,881
CBS030	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS031	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS032	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS033	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS034	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS035	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS036	Brain Box - Digital Box v2	2023	8/16/2023	5,750	160	5,590
CBS037	Brain Box - Digital Box v2	2023	9/15/2023	5,175	144	5,031
CBS038	Brain Box - Digital Box v2	2023	9/15/2023	5,175	144	5,031
CBS039	Brain Box - Digital Box v2	2023	9/15/2023	5,175	144	5,031
CCI117	Power Command System 200	2014	12/18/2014	36,051	36,051	-
CCI118	Power Command System 200	2014	12/18/2014	36,051	36,051	-
CCI121	Power Command System 200	2015	6/30/2015	35,465	35,465	-
CCI122	Power Command System 200	2015	6/30/2015	35,918	35,918	-
CHL102	Wetout Unichiller	2013	8/19/2013	2,691	2,691	-
CHL102	Wetout Unichiller - Labor to Install	2014	3/31/2014	5,916	5,916	-
CHL103	Wetout Unichiller	2013	8/19/2013	2,691	2,691	-
CHL103	Wetout Unichiller - Labor to Install	2014	3/31/2014	5,916	5,916	-
CJI022	Digital Joystick Control Unit - Zoom Camera	2015	9/21/2015	5,224	5,224	-
CMI01Z	Zoom Camera PC 200 NTSC	2015	9/21/2015	19,034	19,034	-
CMI032	ICamera Module for IST Cutter Systems	2013	7/31/2013	21,520	21,520	-
CMI035	ICamera Module for IST Cutter Systems	2013	7/31/2013	21,520	21,520	-
CMI068	Camera Module for IST Cutter Systems	2014	12/18/2014	11,966	11,966	-
CMI069	Camera Module for IST Cutter Systems	2014	12/18/2014	11,966	11,966	-
CMI071	Camera Module for IST Cutter Systems	2014	12/2/2014	9,468	9,468	-
CMI073	Camera Module for IST Cutter Systems	2014	12/2/2014	9,468	9,468	-
CMI074	Camera Module for IST Cutter Systems	2014	12/2/2014	9,468	9,468	-
CMI075	Camera Module for IST Cutter Systems	2014	12/2/2014	9,468	9,468	-
CMI076	Camera Module for IST Cutter Systems	2014	12/2/2014	9,468	9,468	-
CMI077	Camera Module for IST Cutter Systems	2014	12/2/2014	9,468	9,468	-
CMI085	Camera Module for IST Cutter Systems	2015	6/30/2015	12,668	12,668	-
CMI086	Camera Module for IST Cutter Systems	2015	6/30/2015	12,668	12,668	-
CMP101	Peristaltic Mixer Pump 2" Trailer Mounted	2012	10/9/2012	77,424	77,424	-
CMP101	Peristaltic Mixer Pump 2" Trailer Mounted - Final Pymt	2012	12/7/2012	9,287	9,287	-
CMP102	Cretefoamer Pump with Trailer	2021	1/29/2021	81,821	47,729	34,092
CMR101	Wetout Cameras - Downpayment	2013	10/17/2013	3,789	3,789	-
CMR101	Wetout Cameras - Remaining pymt	2014	2/1/2013	3,789	3,789	-
CMS004	Camera MiNa NTSC	2021	8/24/2021	6,369	4,423	1,946
CMS005	Camera MiNa NTSC	2021	8/24/2021	6,369	4,423	1,946
CMS006	Camera MiNa NTSC	2021	8/24/2021	6,369	4,423	1,946
CMS008	Camera MiNa NTSC	2022	4/25/2022	9,440	5,507	3,933
CMS009	Camera MiNa NTSC	2022	4/25/2022	9,440	5,507	3,933
CMS010	Camera MiNa NTSC	2022	4/25/2022	9,440	5,507	3,933
CMS020	Camera MiNa NTSC	2023	2/28/2023	7,875	1,969	5,906
CMS021	Camera MiNa NTSC	2023	2/28/2023	7,875	1,969	5,906
CMS022	Camera MiNa NTSC	2023	2/28/2023	7,875	1,969	5,906
CMS023	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS024	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS025	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS026	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS027	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS028	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS029	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS030	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS031	Camera Mina NTSC	2023	3/31/2023	7,875	1,969	5,906
CMS032	Camera MiNa NTSC	2023	8/16/2023	10,225	284	9,941
CMS033	Camera MiNa NTSC	2023	8/16/2023	10,225	284	9,941
CMS034	Camera MiNa NTSC	2023	8/16/2023	10,225	284	9,941
CMS035	Camera MiNa NTSC	2023	8/16/2023	10,225	284	9,941
CMS036	Camera MiNa NTSC	2023	9/15/2023	10,208	284	9,925
CMS037	Camera MiNa NTSC	2023	9/15/2023	10,208	284	9,925
CMS038	Camera MiNa NTSC	2023	9/15/2023	10,208	284	9,925
CPR009	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR009	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CPR010	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR010	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CPR011	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR011	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CPR012	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR012	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CPR013	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR013	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CPR014	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR014	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CPR015	SAK Kutter Can	2022	11/1/2019	33,415	27,846	5,569
CPR015	SAK Kutter Can	2022	10/1/2020	10,522	8,417	2,104
CPR016	SAK Kutter Can	2022	11/1/2019	33,415	27,846	5,569
CPR016	SAK Kutter Can	2022	10/1/2020	10,522	8,417	2,104
CPR017	SAK Kutter Can	2019	11/1/2019	33,415	27,846	5,569
CPR017	SAK Kutter Can	2020	10/1/2020	10,522	8,417	2,104
CSR104	1999 Stepdeck - Wetout Trailer	2010	3/31/2010	128,875	128,875	-

CSR110	Flatbed Trailer 48'	2023	3/4/2015	16,260	16,260	-
CSR110	Capital Repair	2023	4/1/2020	3,848	3,848	-
CSR112	Flatbed Expandable Trailer	2016	3/4/2016	58,300	58,300	-
CSR112	Build Rails for CSR112	2016	4/25/2016	14,402	14,402	-
CSR113	Flatbed Expandable Trailer	2016	3/4/2016	58,300	58,300	-
CSR113	Build Rails for CSR113	2016	4/25/2016	14,402	14,402	-
CSR116	Flatbed Trailer	2016	4/21/2016	14,101	14,101	-
CSR118	Capital Repair	2023	12/31/2023	9,071	378	8,693
CSR118	Flatbed Trailer	2016	4/21/2016	14,101	14,101	-
CSR118	Flatbed Trailer - Capital Repair	2019	9/1/2019	5,319	5,319	-
CSR123	Flatbed Trailer	2017	11/1/2017	18,888	18,888	-
CSR126	Trailer	2019	8/15/2019	28,000	24,733	3,267
CSR127	Trailer	2019	8/15/2019	28,000	24,733	3,267
CSR128	Trailer- Dorsey-53'-Dropdeck	2020	3/20/2020	23,500	18,017	5,483
CSR129	Trailer	2020	6/19/2020	32,055	21,904	10,151
CTK115	2006 Ford F750 XLT	2010	12/11/2009	15,000	15,000	-
CTK145	Capital Repair - Dodge Ram 5500 HD	2022	10/31/2022	7,529	2,928	4,601
CTK146	Dodge 5500 HD	2015	12/31/2015	2,231	2,231	-
CTK147	Dodge 5500 HD	2015	12/31/2015	2,231	2,231	-
CTK152	Crew Truck - 4WD Crew Cab w/Service Body	2016	7/20/2016	7,882	7,882	-
CTK157	Crew Truck - 4WD Crew Cab w/Service Body	2021	6/20/2017	6,611	6,611	-
CTK157	Crew Truck - 4WD Crew Cab w/Service Body - Capital Lease	2022	1/1/2022	47,689	47,689	-
CTK157	Crew Truck - 4WD Crew Cab w/Service Body - Residual Value	2022	6/30/2022	7,423	7,423	-
CTK158	Crew Truck - 4WD Crew Cab w/Service Body	2017	7/20/2017	6,611	6,611	-
CTK158	Crew Truck - 4WD Crew Cab w/Service Body - Capital Lease	2022	1/1/2022	47,945	47,945	-
CTK158	Crew Truck - 4WD Crew Cab w/Service Body - Residual Value	2022	7/31/2022	7,168	7,168	-
CTK160	Crew Truck - 4WD Crew Cab w/Service Body	2017	7/20/2017	6,611	6,611	-
CTK160	Crew Truck - 4WD Crew Cab w/Service Body - Capital Lease	2022	1/1/2022	47,945	47,945	-
CTK160	Crew Truck - 4WD Crew Cab w/Service Body - Residual Value	2022	7/31/2022	7,168	7,168	-
CTK161	Crew Truck - Residual Value	2022	12/1/2022	6,183	6,183	-
CTK161	Outfit truck with tank, rack, invertor, etc	2018	3/31/2018	5,731	5,731	-
CTK161	Crew Truck - 4WD Crew Cab w/Service Body	2017	12/5/2017	13,947	13,947	-
CTK161	Crew Truck - 4WD Crew Cab w/Service Body - Capital Lease	2022	1/1/2022	43,328	43,328	-
CTK162	Capital Repair - Crew Truck - 4WD Crew Cab w/Service Body	2022	10/31/2022	6,340	2,466	3,875
CTK162	Crew Truck - Residual Value	2022	12/1/2022	6,161	6,161	-
CTK162	Crew Truck - 4WD Crew Cab w/Service Body	2017	12/5/2017	12,353	12,353	-
CTK162	Crew Truck - 4WD Crew Cab w/Service Body - Capital Lease	2022	1/1/2022	43,226	43,226	-
CTK163	Crew Truck - Residual Value	2022	12/1/2022	6,148	6,148	-
CTK163	Crew Truck - 4WD Crew Cab w/Service Body	2017	12/5/2017	13,259	13,259	-
CTK163	Crew Truck - 4WD Crew Cab w/Service Body - Capital Lease	2022	1/1/2022	43,083	43,083	-
CTK164	Crew Truck - 4WD Crew Cab w/Service Body	2017	11/28/2017	42,350	42,350	-
CTK164	Taxes	2017	12/1/2017	3,557	3,557	-
CTK165	Crew Truck - 4WD Crew Cab w/ Enclosed Bed - Residual Value	2023	4/30/2023	7,905	5,929	1,976
CTK165	Capitalize initial lease from 2018	2019	3/16/2018	52,660	52,660	-
CTK165	Crew Truck - 4WD Crew Cab w/ Enclosed Bed	2019	4/5/2018	9,421	9,421	-
CTK166	Capitalize initial lease from 2018 - Residual Value	2023	4/30/2023	7,801	5,851	1,950
CTK166	Crew Truck - 4WD Crew Cab w/Service Body	2018	4/5/2018	7,236	7,236	-
CTK166	Capitalize initial lease from 2018	2019	3/16/2018	51,843	51,843	-
CTK168	Crew Truck	2018	8/21/2018	62,239	62,239	-
CTK169	Crew Truck - Residual Value	2023	10/31/2023	7,301	1,825	5,475
CTK169	Crew Truck	2018	10/18/2018	55,550	55,550	-
CTK170	Crew Truck - Residual Value	2023	10/31/2023	7,588	1,897	5,691
CTK170	Crew Truck	2018	10/18/2018	59,633	59,633	-
CTK171	Crew Truck - 4WD Crew Cab w/Stakebed	2018	12/28/2018	57,190	49,412	7,778
CTK171	UPLIFT NEW TRUCK WITH ACCESSORIES	2019	1/1/2019	2,156	2,156	(0)
CTK171	UPLIFT NEW TRUCK WITH ACCESSORIES	2019	1/1/2019	4,562	4,486	76
CTK172	Crew Truck - 4WD Crew Cab w/Service Body	2018	12/28/2018	57,452	49,934	7,518
CTK172	UPLIFT NEW TRUCK WITH ACCESSORIES	2019	1/1/2019	12,265	12,060	204
CTK173	Crew Truck - 4WD Single Cab w/Service Body	2019	2/27/2019	59,258	57,283	1,975
CTK176	Crew Truck - 4WD Crew Cab w/Service Body	2019	5/16/2019	67,449	61,828	5,621
CTK176	Crew Truck - 4WD Crew Cab w/Service Body	2019	6/1/2019	8,328	7,634	694
CTK177	Crew Truck - 4WD Crew Cab w/Service Body	2019	5/16/2019	67,467	61,845	5,622
CTK177	Crew Truck - 4WD Crew Cab w/Service Body	2019	6/1/2019	8,328	7,634	694
CTK178	Crew Truck - 4WD Crew Cab w/Service Body	2019	5/20/2019	71,146	65,217	5,929
CTK178	Crew Truck - 4WD Crew Cab w/Service Body	2019	3/1/1900	8,328	7,634	694
CTK179	Crew Truck - 4WD Crew Cab w/ Service Body	2019	5/15/2019	76,177	69,829	6,348
CTK179	Capital Repair - New Fuel transfer tank and hose, Rhino line bed, labor to do so	2023	7/1/2023	4,624	642	3,981
CTK180	Crew Truck - 4WD Crew Cab w/ Service Body	2019	5/15/2019	76,177	69,829	6,348
CTK181	Crew Truck - 4WD Crew Cab	2021	4/9/2020	73,208	51,950	21,258
CTK181	Capital Repair - Install PTO and Hydraulic Pump	2021	8/1/2020	9,925	6,617	3,308
CTK182	Crew Truck - 4WD Crew Cab w/ Service Body	2021	1/14/2021	72,276	37,555	34,722
CTK183	Crew Truck - 4WD Crew Cab w/ Service Body	2021	2/19/2021	72,262	36,528	35,734
CTK184	Crew Truck - 4WD Crew Cab w/ Service Body	2021	3/3/2021	71,986	36,499	35,487
CTK185	Crew Truck - 4WD Crew Cab w/ Service Body	2021	3/3/2021	71,986	36,499	35,487
CTK186	Crew Truck - 4WD Crew Cab w/ Service Body	2021	4/6/2021	72,799	34,748	38,051
CTK187	Crew Truck - 4WD Crew Cab w/ Service Body	2021	7/7/2021	56,987	27,544	29,443
CTK187	Capital Repair - Service Body	2021	9/30/2021	17,862	8,336	9,526
CTK188	Crew Truck - 4WD Crew Cab w/ Service Body	2021	7/7/2021	56,987	27,544	29,443
CTK188	Capital Repair - Service Body	2021	9/30/2021	18,236	8,510	9,726
CTK190	Crew Truck - 4WD Crew Cab w/ Service Body	2021	9/9/2021	56,975	26,588	30,386
CTK190	Crew Truck - 4WD Crew Cab w/ Service Body	2021	10/31/2021	17,854	8,332	9,522
CTK191	Crew Truck - 4WD Crew Cab w/ Service Body w/ Service Body	2021	9/9/2021	76,002	35,468	40,535
CTK192	Crew Truck - 4WD Crew Cab w/ Service Body w/ Service Body	2021	9/9/2021	76,002	35,468	40,535
CTK193	Crew Truck - 4WD Crew Cab w/ Service Body	2021	11/9/2021	74,869	32,272	42,597
CTK194	Crew Truck - 4WD Crew Cab w/ Service Body	2021	11/24/2021	74,849	31,187	43,662

CTK195	Crew Truck - 4WD Crew Cab w/ Service Body	2021	9/9/2021	74,849	31,187	43,662
CTK196	Crew Truck - 4WD Crew Cab w/ Service Body	2021	12/14/2021	74,849	29,940	44,909
CTK197	Crew Truck - 4WD Crew Cab w/ Service Body	2021	1/7/2022	74,849	28,692	46,157
CTK198	Crew Truck - 4WD Crew Cab w/ Service Body	2021	1/7/2022	74,849	29,940	44,909
CTK199	Crew Truck - 4WD Crew Cab w/ Service Body	2022	1/27/2022	70,637	25,900	44,737
CTK200	Crew Truck - 4X4 Double Cab w/Service Body -	2022	10/4/2022	83,802	16,591	67,211
CTK201	Crew Truck - 4X4 Double Cab w/Service Body -	2022	10/4/2022	83,073	16,507	66,566
CTK202	Crew Truck - 4X4 Double Cab w/Service Body -	2022	10/4/2022	82,345	16,427	65,918
CTK203	Crew Truck - 4X4 Crew Cab w/Service Body	2023	6/4/2023	75,732	7,722	68,010
CTK204	Crew Truck - 4X4 Crew Cab w/Service Body -	2023	6/2/2023	76,251	6,734	69,518
CTK205	Crew Truck - 4X4 Crew Cab w/Service Body	2023	6/2/2023	76,249	6,733	69,516
CTK206	Crew Truck - 4X4 Crew Cab w/Service Body	2023	7/6/2023	76,249	6,733	69,516
CTK207	Crew Truck - 4X4 Crew Cab w/Service Body	2023	7/6/2023	76,249	6,720	69,529
CTK209	Crew Truck - 4X4 Crew Cab w/Service Body	2023	7/25/2023	102,398	7,553	94,845
CTK210	Crew Truck - 4X4 Crew Cab w/Service Body	2023	7/25/2023	102,398	7,553	94,845
CTK212	Crew Truck - 4X4 Crew Cab w/Service Body	2023	7/25/2023	102,398	7,553	94,845
CTK215	Crew Truck - 4X4 Crew Cab w/Service Body	2023	8/18/2023	102,808	6,089	96,719
CTK216	Crew Truck - 4X4 Single Cab w/Service Body	2023	11/10/2023	69,133	2,304	66,829
CUE108	Hydro Tech 150	2015	10/8/2015	77,560	77,560	-
CUE108	Price Adjustment	2016	10/8/2015	(9,786)	(9,786)	-
CUE110	Hydro Tech 150	2019	2/22/2019	60,358	58,346	2,012
CUE111	Hydro Tech 150	2022	1/6/2022	69,083	27,633	41,450
CUI004	IST Cutter- (Innovative Sewer Tech)	2017	1/12/2017	97,066	97,066	-
CUI033	IST Cutter -	2019	11/22/2019	37,100	29,680	7,420
CUI035	IST Cutter -	2019	11/22/2019	37,100	29,680	7,420
CUI043	IST Cutter- (Innovative Sewer Tech)	2013	7/31/2013	109,658	109,658	-
CUI044	IST Cutter- (Innovative Sewer Tech)	2013	7/31/2013	109,658	109,658	-
CUI050	IST Cutter--(Innovative Sewer Technology)	2018	8/3/2018	25,897	25,897	-
CUI051	IST Cutter-(Innovative Sewer Technology)	2018	3/7/2018	23,404	23,404	-
CUI055	IST Cutter-(Innovative Sewer Technology)	2018	3/7/2018	23,404	23,404	-
CUI060	IST Cutter--(Innovative Sewer Technology)	2018	8/3/2018	25,897	25,897	-
CUI062	IST Cutter--(Innovative Sewer Technology)	2018	8/3/2018	25,897	25,897	-
CUI064	IST Cutter--(Innovative Sewer Technology)	2018	8/3/2018	25,897	25,897	-
CUI070	IST Cutter--(Innovative Sewer Technology)	2014	12/18/2014	115,284	115,284	-
CUI078	IST Cutter--(Innovative Sewer Technology)	2015	6/30/2015	120,856	120,856	-
CUI081	IST Cutter--(Innovative Sewer Technology)	2015	6/30/2015	111,162	111,162	-
CUI089	IST Cutter--(Innovative Sewer Technology)	2016	6/24/2016	88,452	88,452	-
CUI101	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	23,918	23,918	-
CUI102	IST Cutter - Capital Repair	2014	9/30/2014	5,026	5,026	-
CUI102	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	40,225	40,225	-
CUI103	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	40,225	40,225	-
CUI104	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	40,225	40,225	-
CUI105	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	40,225	40,225	-
CUI106	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	40,244	40,244	-
CUI107	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	40,244	40,244	-
CUI109	IST Cutter-(Innovative Sewer Technology)	2018	2/9/2018	24,177	24,177	-
CUI110	IST Cutter-(Innovated Sewer Tech)	2013	3/19/2013	132,830	132,830	-
CUI111	IST Cutter-(Innovated Sewer Tech)	2013	3/19/2013	132,830	132,830	-
CUI112	IST Cutter-(Innovated Sewer Tech)	2013	3/19/2013	132,830	132,830	-
CUI113	IST Cutter-(Innovated Sewer Tech)	2013	3/19/2013	132,830	132,830	-
CUI41A	Capital Repair	2023	10/31/2023	15,959	887	15,073
CUI41A	Capital Repair to CUI41A	2014	6/30/2014	11,549	11,549	-
CUI41A	IST Cutter--(Innovative Sewer Technology)	2013	9/30/2013	135,125	135,125	-
CUI41B	IST Cutter--(Innovative Sewer Technology)	2013	9/30/2013	135,125	135,125	-
CUS001	Schwalm Talpa 2060 Cutter	2020	6/5/2020	138,170	96,719	41,451
CUS001	Capital Repair - Replace Main Control Boards	2023	2/28/2023	4,559	1,266	3,292
CUS002	Schwalm Talpa 2060 Cutter	2020	6/5/2020	138,170	96,719	41,451
CUS002	Capital Repair	2023	10/31/2023	10,355	575	9,780
CUS003	Schwalm Talpa 2060 Cutter	2021	8/24/2021	122,523	51,051	71,472
CUS004	Schwalm Talpa 2060 Cutter	2021	8/24/2021	122,523	51,051	71,472
CUS005	Schwalm Talpa 1330 6" Cutter	2022	2/25/2022	76,105	29,173	46,931
CUS006	Schwalm Talpa 2060 Cutter	2022	4/25/2022	123,451	43,208	80,243
CUS007	Schwalm Talpa 1330 6" Cutter	2022	4/25/2022	99,702	34,896	64,806
CUS014	Schwalm Talpa 2060 Cutter	2023	2/28/2023	115,283	17,292	97,990
CUS015	Schwalm Talpa 2060 Cutter	2023	2/28/2023	115,283	17,292	97,990
CUS016	Schwalm Talpa 2060 Cutter	2023	2/28/2023	101,593	15,239	86,354
CUS017	Schwalm Talpa 2060 Cutter	2023	3/31/2023	101,593	15,239	86,354
CUS018	Schwalm Talpa 2060 Cutter	2023	3/31/2023	101,593	15,239	86,354
CUS019	Schwalm Talpa 2060 Cutter	2023	3/31/2023	101,593	15,239	86,354
CUS020	Schwalm Talpa 2060 Cutter	2023	3/31/2023	82,445	12,311	70,134
CUS021	Schwalm Talpa 2060 Cutter	2023	3/31/2023	82,445	12,311	70,134
CUS022	Schwalm Talpa 1330 6" Cutter	2023	8/16/2023	81,801	1,363	80,437
CUS023	Schwalm Talpa 1330 6" Cutter	2023	8/16/2023	81,801	1,363	80,437
CUS024	Schwalm Talpa 2060 Cutter	2023	8/16/2023	102,251	1,704	100,547
CUS025	Schwalm Talpa 2060 Cutter	2023	8/16/2023	102,251	1,704	100,547
CUS026	Schwalm Talpa 1330 6" Cutter	2023	9/15/2023	86,772	1,446	85,325
CUS027	Schwalm Talpa 1330 6" Cutter	2023	9/15/2023	86,772	1,446	85,325
CV01	Sales/use Tax - 160" Wide Converyor	2012	9/30/2012	1,785	1,785	-
CV01	160" Wide Converyor	2011	3/28/2011	28,300	28,300	-
CV01	160" Wide Converyor - purchase from AYKE	2012	7/1/2012	31,782	31,782	-
CV02	Conveyor System-Wet-Out-For CA	2012	12/30/2012	3,890	3,890	-
CV02	Conveyor System-Wet-Out-For CA	2012	4/30/2012	52,522	52,522	-
CV02	Conveyor System-Wet-Out-For CA	2012	4/30/2012	7,196	7,196	-
CV02	Conveyor System-Wet-Out-For CA	2012	7/1/2012	12,273	12,273	-
CV02	Motor for Wetout Conveyor - CA	2014	6/30/2014	8,101	8,101	-
CV02	Capital Repair - Build Cost	2021	1/1/2021	5,300	5,300	-
CV02	CV02 - Fabrication	2020	3/31/2020	13,071	13,071	-

CVR104	Conveyor System	2014	3/31/2014	8,354	8,354	-
CVR105	Conveyor Trailer	2020	10/1/2020	90,203	58,632	31,571
CX101	Conex-8'x20'-Empty	2022	3/8/2019	1,974	1,974	-
CX125	Conex- 8x20- Empty	2022	11/30/2022	8,224	3,198	5,026
CX17	Conex Storage Containers--20'-Purchased Used	2019	12/12/2010	3,312	3,312	-
CX19	Conex Box-Replace Refridgerated Container Unit	2020	3/17/2020	21,065	21,065	-
CX36	20' Storage Container	2019	7/30/2013	2,278	2,278	-
CX52	Conex 20'	2019	2/17/2015	1,973	1,973	-
CX94	Conex-8'x20'-Empty	2019	3/7/2019	1,974	1,974	-
CX96	Conex-8'x20'-Empty	2019	3/8/2019	1,974	1,974	-
DMP101	Dump Trailer 14'	2016	5/3/2016	7,137	7,137	-
DMP102	Dump Trailer 16'	2018	12/4/2018	17,004	17,004	-
DMP103	Dump Trailer 10'	2021	1/13/2021	5,452	5,300	151
DTC001	Schwalm USA - Crawler Tracks	2019	11/23/2018	6,774	6,435	339
DTC001	Schwalm USA - Crawler	2019	9/27/2018	37,909	37,909	-
DTS009	Capital Repair - Vericures software subsription 12 month depreciation	2023	6/1/2023	6,346	3,702	2,644
DTS009	CMS Unit with IPC (Vericure)	2021	10/7/2021	48,853	21,169	27,683
DTS010	Capital Repair - Vericures software subsription 12 month depreciation	2023	6/1/2023	6,240	3,640	2,600
DTS010	CMS Unit with IPC (Vericure)	2022	5/5/2022	52,558	17,519	35,039
DTS011	Capital Repair - Vericures software subsription 12 month depreciation	2023	6/1/2023	6,240	3,640	2,600
DTS011	CMS Unit with IPC (Vericure)	2022	5/5/2022	52,558	17,519	35,039
DTS012	Capital Repair - Vericures software subsription 12 month depreciation	2023	6/1/2023	6,240	3,640	2,600
DTS012	CMS Unit with IPC (Vericure)	2022	5/5/2022	52,558	17,519	35,039
DTS013	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
DTS014	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
DTS015	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
DTS016	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
DTS017	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
DTS018	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
DTS019	CMS Unit with IPC (Vericure)	2022	12/31/2022	38,862	5,829	33,033
EBL101	Electric Boom Lift	2012	2/24/2012	27,665	27,665	-
ESR101	Enviromental Solvent Recycler	2013	8/16/2013	4,890	4,890	-
FBK101	2004 Peterbilt Boiler Truck	2011	3/23/2011	19,500	19,500	-
FBK111	FLATBED TRUCK	2023	3/20/2023	64,944	9,742	55,202
FBR105	Flatbed Trailer 53' Drop Deck	2015	9/9/2015	23,500	23,500	-
FBR105	Capital Repair	2020	4/1/2020	6,732	6,732	-
FBR106	Flatbed Trailer 48'	2018	5/16/2018	5,000	5,000	-
FBR107	Flatbed Trailer	2018	5/16/2018	5,000	5,000	-
FBR108	Flatbed Trailer	2020	4/22/2020	18,000	18,000	-
FBR109	Flatbed Trailer	2021	12/27/2021	25,095	15,336	9,759
FBR110	Flatbed Trailer	2021	12/27/2021	25,095	15,336	9,759
FBR111	Flatbed Trailer	2021	12/27/2021	25,095	15,336	9,759
FBR112	Flatbed Trailer	2021	12/27/2021	25,095	15,336	9,759
FBR113	Flatbed Trailer	2021	12/27/2021	25,095	15,336	9,759
FCR102	Transcraft 48' Flatbed	2014	12/16/2008	16,500	16,500	-
FCR102	Capital Repair to FCR102	2014	6/30/2014	15,714	15,714	-
FCR102	Canopy Redesign	2015	10/1/2015	13,424	13,424	-
FCR102	Build Canopy System	2018	4/30/2018	10,804	10,804	-
FL09	10 Ton-Reach Lift s/n 16285 - Repair	2012	11/12/2012	12,982	12,982	-
FL09	10 Ton-Reach Lift s/n 16285	2010	12/31/2010	29,413	29,413	-
FL09	Replace Hoses, Guides & Rollers	2016	10/1/2016	7,021	7,021	-
FL09	Replace rear hub, bearings, & seals	2018	5/31/2018	8,617	8,617	-
FL11	Komatsu FG25-3	2011	3/23/2011	244	244	-
FL12	2001 Shooting Boom Forklift s/n 169229	2010	1/1/2011	2,136	2,136	-
FL15	Shop forklift	2014	7/31/2014	19,601	19,601	-
FL15	Capital Repair - Install clas 2 fork position carrage	2023	9/30/2023	557	139	418
FL18	Capital Repair	2023	11/30/2023	22,982	479	22,503
FL18	Alban CAT - Block Heater	2015	6/29/2015	162,590	162,590	-
FL19	Nissan Forklift	2015	9/17/2015	18,204	18,204	-
FL24	Forklift - Shop	2018	3/20/2018	20,642	20,642	-
FL26	Forklift Downpayment	2018	4/18/2018	1,156	1,156	-
FL26	Forklift Final Payment	2018	8/23/2018	23,497	23,497	-
FL30	AD Lift Invoice: M06749 - Used 2014 TCM	2020	2/24/2020	12,449	12,449	-
FL34	Forklift - Shop Electric	2021	6/23/2021	7,678	6,611	1,066
FS01	2004 28" Ride on Floor Scrubber s/n 10384709	2013	2/3/2011	7,778	7,778	-
FS01	2004 28" Ride on Floor Scrubber s/n 10384709-Repair	2018	12/15/2017	3,565	3,565	-
FU01	Fusion Machine-AT1807401 Kubota	2010	3/11/2010	32,511	32,511	-
FU01	Capital Repair - Master Die Inserts	2020	4/1/2020	5,882	5,882	-
FU01	Capital Repair - Purchase cost of new fusion machine	2019	12/1/2019	21,068	21,068	-
FU02	Fusion Machine-Tracstar Series 2	2019	12/10/2019	73,797	60,268	13,530
FU03	Fusion Machine	2023	4/27/2023	269,498	3,369	266,129
GLR101	Taxes	2017	12/1/2017	1,630	1,630	-
GLR101	TRAILER MOUNTED GLAND INVERTER (9,000 LBS)	2017	4/30/2017	31,632	31,632	-
GLR102	Additional build costs	2018	12/1/2018	7,134	7,134	-
GLR102	TRAILER MOUNTED GLAND INVERTER (9,700 LBS)	2018	3/31/2018	59,833	59,833	-
GLR103	Additional build costs	2018	12/1/2018	7,134	7,134	-
GLR103	TRAILER MOUNTED GLAND INVERTER (9,700 LBS)	2018	3/31/2018	59,833	59,833	-
GLR104	Additional build costs	2018	12/1/2018	7,134	7,134	-
GLR104	TRAILER MOUNTED GLAND INVERTER (9,700 LBS)	2018	3/31/2018	59,833	59,833	-
GLR106	TRAILER MOUNTED SMALL GLAND INVERTER	2018	9/1/2018	28,943	28,943	-
GLR107	TRAILER MOUNTED SMALL GLAND INVERTER	2018	9/1/2018	28,943	28,943	-
GLR107	Capital Repair - Replace Hydraulic Power Pack Unit	2021	9/30/2021	6,100	6,100	-
GLR108	TRAILER MOUNTED SMALL GLAND INVERTER	2018	9/1/2018	28,943	28,943	-
GLR110	GLAND INVERTER	2022	11/30/2022	57,836	13,495	44,341

GNR110	Capital Repair - Replace complete generator end	2023	3/31/2023	10,723	2,681	8,042
GNR148	Generator-13KW	2013	11/20/2013	10,829	10,829	-
GNR156	Generator-CK Power-33KW	2014	2/11/2014	18,189	18,189	-
GNR169	Generator-30KW	2015	2/25/2015	18,189	18,189	-
GNR176	Generator CK-20KSI	2015	6/5/2015	16,443	16,443	-
GNR177	8 KW GENERATOR	2015	7/29/2015	8,629	8,629	-
GNR179	Generator-30KW	2016	3/31/2016	18,189	18,189	-
GNR185	55 kW Generator	2016	9/9/2016	32,027	32,027	-
GNR191	Capital Repair - Replace EGR cooler and exh valves	2023	2/28/2023	5,698	1,583	4,115
GNR191	70KVA Generator	2016	9/14/2016	46,126	46,126	-
GNR193	24 KW GENERATOR	2017	8/31/2017	17,960	17,960	-
GNR194	35 KW GENERATOR - TIER 4	2017	5/1/2017	30,906	30,906	-
GNR195	24 KW GENERATOR	2017	8/31/2017	19,548	19,548	-
GNR197	13 KW GENERATOR	2017	3/30/2017	12,379	12,379	-
GNR197	Modification and Installation	2017	6/30/2017	15,414	15,414	-
GNR198	13 KW GENERATOR	2017	3/30/2017	12,379	12,379	-
GNR198	Modification and Installation	2017	6/30/2017	19,371	19,371	-
GNR199	55 KW GENERATOR	2017	7/6/2017	35,272	35,272	-
GNR200	55 KW GENERATOR	2017	7/6/2017	35,272	35,272	-
GNR208	13 KW GENERATOR	2018	12/1/2018	17,403	17,403	-
GNR210	35 KW Generator	2018	6/6/2018	16,321	16,321	-
GNR211	13 KW GENERATOR	2018	12/1/2018	15,455	15,455	-
GNR213	24 KW GENERATOR	2019	3/31/2019	20,115	20,115	-
GNR215	13 KW GENERATOR	2019	6/1/2019	19,690	19,690	-
GNR228	Mobile Large Diesel Generator	2020	3/20/2020	37,776	28,332	9,444
GNR232	125 KW GENERATOR - 50 HZ	2021	11/30/2020	18,400	17,889	511
GNR232	125 KW GENERATOR - 50 HZ Rental Cost	2021	6/30/2021	20,000	17,222	2,778
GNR238	60 KW GENERATOR	2022	3/7/2022	45,523	15,933	29,590
GNR239	2000 KW GENERATOR	2022	3/24/2022	756,576	94,572	662,004
HSP101	Hydralic Submersible Pump 8"	2015	12/31/2012	23,194	23,194	-
HSP102	Hydraulic Submersible Pump 8"	2015	12/31/2012	23,194	23,194	-
HXR101	Heat Exchange Trailer	2013	1/21/2013	1,330	1,330	-
HXR101	Heat Exchange Trailer - Additions	2013	4/30/2013	5,528	5,528	-
HXR101	Heat Exchange Trailer - Additions	2013	3/15/2013	4,790	4,790	-
HXR102	Move to CIPP Southeast	2015	4/30/2013	5,610	5,610	-
IT03	INVERSION TOWER TOP ROLLER - 100"	2017	5/1/2017	20,375	20,375	-
IT04	CIPP Tower	2017	12/1/2017	8,540	8,540	-
JT04	Eastement Machine	2014	9/30/2014	15,090	15,090	-
JTE101	Jetter Easement Machine	2015	9/21/2015	54,451	54,451	-
JTE102	Jetter Easement Machine	2021	7/15/2021	49,045	23,705	25,340
JTK103	Rebuild Engine for JK03	2011	5/31/2011	8,644	8,644	-
JTK103	Capital Repairs on JTK103	2012	5/2/2012	3,676	3,676	-
JTK103	1999 GMC TC7H042 Jetter Truck	2010	7/9/2009	72,833	72,833	-
JTK103	Capital Repairs on JTK103 - Vacuum Tuck Sales & service	2012	11/1/2012	13,159	13,159	-
JTK103	Engine Repair on JTK103	2013	3/1/2013	20,829	20,829	-
JTK104	Capital Repair - Replace Jetter Pump	2022	1/1/2022	16,903	11,268	5,634
JTK104	Vactor unit on Truck	2012	6/15/2012	3,450	3,450	-
JTK104	2001 International Vactorjet	2011	3/23/2011	50,150	50,150	-
JTK104	Pump replacement	2018	3/31/2018	15,250	15,250	-
JTK105	Capital Repair - Replace Jetter Pump	2020	12/1/2020	18,186	18,186	(0)
JTK105	Capital Repair - Replace Jetter Pump	2021	3/31/2021	18,276	16,753	1,523
JTK105	Capital Repair - Replace Jetter Pump	2022	1/1/2022	20,329	13,553	6,776
JTK105	2000 Sterling-Jetter Truck-L7501 - Capital repair	2013	6/1/2013	5,133	5,133	-
JTK105	2000 Sterling-Jetter Truck-L7501	2011	8/11/2011	51,730	51,730	-
JTK105	2000 Sterling-Jetter Truck-Tax/License	2011	9/16/2011	4,272	4,272	-
JTK105	Capital Repair to JTK105	2014	6/30/2014	6,667	6,667	-
JTK105	Capital Repair	2015	8/30/2015	14,463	14,463	-
JTK105	Capital Repair	2016	4/30/2016	13,582	13,582	-
JTK105	Rebuild Differentials	2018	11/1/2018	8,240	8,240	-
JTK105	Capital Repair - Adjust ECM paramaters and hydraulic pressure to achieve 80gpm flow	2019	11/1/2019	5,059	5,059	-
JTK108	Capital Repair - Replace rodder pump, cooler, and old piping	2023	2/28/2023	31,739	8,816	22,923
JTK108	Jetter/Vactor Truck	2011	10/27/2011	59,500	59,500	-
JTK108	Tax / License on JK08	2011	12/6/2011	4,766	4,766	-
JTK109	Capital Repair - 2002 Vactor Ramjet model F8015	2022	9/30/2022	31,499	13,125	18,375
JTK109	Capital Repair - Repalce Jetter pump	2023	7/1/2023	13,396	1,861	11,535
JTK109	Capital Repair - Replace rodder pump and missing Y strainer	2023	9/30/2023	13,872	1,156	12,716
JTK109	2002 Vactor Ramjet model F8015	2013	1/31/2013	59,850	59,850	-
JTK109	Sales/Use Tax on JTK109	2013	2/25/2013	3,572	3,572	-
JTK109	Capital Repairs	2017	3/31/2017	10,182	10,182	-
JTK109	Capital Repairs	2018	6/30/2018	14,172	14,172	-
JTK109	Replace rodder pump	2019	3/31/2019	6,683	6,683	-
JTK109	Capital Repair - Replace Heater Exchange	2021	2/1/2021	2,360	2,360	-
JTK111	Jetter Truck -SewEqCo- 60gpm	2016	11/1/2016	25,000	25,000	-
JTK111	Jetter Truck -Capital Repair - Pump Parts	2019	5/14/2019	16,365	16,365	-
JTK112	Capital Repair - Replace Jetter pump	2023	9/30/2023	18,920	1,577	17,343
JTK112	Replacement Jetter Pump	2015	7/31/2015	14,757	14,757	-
JTK112	Jetter Truck--800 HPR-ECO	2016	11/1/2016	25,000	25,000	-
JTK112	Capital Repair - Hydraulic Drive Motor Replacement/Pump	2020	4/1/2020	4,574	4,574	-
JTK113	Downpayment on Jetter Truck	2015	3/30/2015	6,955	6,955	-
JTK113	Jetter Truck	2015	4/1/2015	174,850	174,850	-
JTK113	Jetter Truck - Sales tax	2015	5/1/2015	13,511	13,511	-
JTK113	HYDRAULIC REPAIRS	2019	1/1/2019	6,845	6,845	-
JTK113	Capital Repair - Heat Exchanger & Line Replacement	2020	4/1/2020	3,395	3,395	-
JTK113	Capital Repair - Replace Jetter Pump	2021	5/31/2021	11,688	11,688	-
JTK115	Capital Repair - Rebuild Jetter Pump	2023	2/28/2023	10,291	2,859	7,432
JTK115	Capital Repair - Replace Jetter Pump	2023	3/31/2023	15,203	3,801	11,402

JTK115	Capital Repair	2023	11/30/2023	18,714	390	18,325
JTK115	Jetter Truck	2015	12/2/2015	206,226	206,226	-
JTK115	Capital Repair - Replace maine hydraulic pump	2019	11/1/2019	12,870	12,870	-
JTK115	Jetter Truck - Sales tax	2016	1/5/2016	10,972	10,972	-
JTK116	Capital Repair - Replace Rodder pump and ydraulic cooler	2023	2/28/2023	27,001	7,500	19,501
JTK116	Capital Repair - replace front springs, shackles and hangers -- NON Cap items PM, Repalce Dryer, Misc repairs	2023	6/1/2023	7,051	1,371	5,680
JTK116	Jetter Truck	2015	12/2/2015	185,383	185,383	-
JTK116	Jetter Truck - Sales tax	2016	3/29/2016	12,687	12,687	-
JTK116	replace jetter pump	2018	3/31/2018	14,507	14,507	-
JTK116	replace hyd cooler and hoses and swivel	2019	5/31/2019	5,706	5,706	-
JTK116	Hydraulic Cooler Replacement on Jetter Unit	2019	7/1/2019	9,816	9,816	-
JTK116	Capital Repair - replace auto trans, Trans control module, harness, and turbo due to electrical short	2019	12/1/2020	33,427	33,427	-
JTK117	JETTER TRUCK	2019	2/18/2019	214,053	203,350	10,703
JTK117	Captial Repair - Replace Jetter hydraulic cooler. Failed and contaminated system	2022	5/1/2022	7,466	4,148	3,318
JTK118	JETTER TRUCK	2019	5/23/2019	211,840	194,187	17,653
JTK118	Capital Repair - Replace Jetter Pump	2022	1/1/2022	15,214	10,143	5,071
JTK119	JETTER TRUCK	2021	1/20/2021	229,738	100,510	129,228
JTK120	JETTER TRUCK	2021	9/27/2021	231,404	80,991	150,413
JTK121	JETTER TRUCK	2021	9/24/2021	92,000	38,333	53,667
JTK122	JETTER TRUCK	2022	9/14/2022	94,000	20,367	73,633
JTK123	JETTER TRUCK	2023	4/28/2023	69,713	8,133	61,579
JTK124	JETTER TRUCK	2023	6/9/2023	355,867	31,138	324,729
JTK125	JETTER TRUCK	2023	7/13/2023	84,711	4,236	80,476
JTK126	JETTER TRUCK	2023	4/17/2023	106,092	5,305	100,787
JTK127	Jetter Truck	2023	8/4/2023	355,867	4,448	351,419
JTK128	Jetter Truck	2023	8/4/2023	355,867	4,448	351,419
JTK129	JETTER TRUCK	2023	9/25/2023	354,827	13,306	341,521
JTK130	Key Equipment - Awaiting Final Paperwork - NOT IN VP	2023	10/23/2023	365,486	-	365,486
JTR101	Sewer Jet Cleaner-747-300R -2	2012	3/2/2012	14,789	14,789	-
JTR102	Capital Repair - replace clutch and flywheel assy on rear of engine	2021	6/30/2021	7,530	6,275	1,255
JTR102	Capital Repair - Replace ECM, Harness, & Injectors	2022	1/1/2022	14,072	9,381	4,690
JTR102	Jet Cleaner-2008 747-300R-2	2012	6/6/2012	15,019	15,019	-
JTR102	Reel Hose for Jetter	2013	9/25/2013	4,179	4,179	-
JTR102	Jetter Truck - capital repair	2013	10/31/2013	6,519	6,519	-
JTR103	Capital Repair - Replace all trailer axles complerte with tires and brakes	2023	2/28/2023	9,268	2,575	6,694
JTR103	2008-Jetter Trailer-JT03	2013	4/1/2013	15,923	15,923	-
JTR104	Capital Repair to Jetter Trailer	2013	8/31/2013	9,136	9,136	-
JTR104	Jetter-Trailer - 60gpm	2013	10/16/2013	15,953	15,953	-
JTR104	Capital Repair - Rebuild Jetter Pump	2020	7/1/2020	3,348	3,348	-
JTR105	Jetter-Trailer Mounted	2012	8/22/2012	38,706	38,706	-
JTR106	Move to CIPP Central	2015	8/23/2012	5,000	5,000	-
JTR106	Move to CIPP Central	2015	9/1/2012	40,085	40,085	-
JTR106	Move to CIPP Central	2015	10/24/2012	2,764	2,764	-
JTR107	replace jetter pump	2015	7/31/2015	12,660	12,660	-
JTR107	Jetter-Trailer- 65 GPM-W/Myers Pump	2013	11/25/2013	87,868	87,868	-
JTR107	replace jetter pump	2018	3/31/2018	15,439	15,439	-
JTR107	Capital Repair	2020	10/30/2020	9,199	9,199	-
JTR107	Capital Repair - Replace Clutch, injectors, & pump	2021	8/31/2021	18,218	18,218	-
JTR108	Jetter Trailer--65GPM@2000psi	2014	10/24/2014	75,886	75,886	-
JTR108	Jetter Trailer--65GPM@2000psi TAX	2014	11/13/2014	6,075	6,075	-
JTR109	Jetter Trailer - 18 GPM	2016	3/8/2016	50,408	50,408	-
JTR110	Jetter Trailer - 18 gpm	2017	5/4/2017	51,318	51,318	-
JTR110	Tax on Jetter Trailer	2017	7/1/2017	3,024	3,024	-
JTR111	Jetter Trailer - 18 gpm	2019	8/26/2019	54,535	44,537	9,998
JTR112	Jetter Trailer	2023	2/16/2023	102,049	17,008	85,041
JTR113	Jetter Trailer	2023	2/13/2023	53,404	8,901	44,503
JVK105	Combo Truck - 900-ECO - 65 GPM	2017	8/30/2017	415,397	281,876	133,521
JVK105	Capital Repair - Pump Rebuild Jetter	2020	4/1/2020	8,887	6,517	2,370
JVK105	Capital RepairPTO failure, replace pto for Combo Unit	2021	1/1/2021	11,558	6,742	4,816
JVK105	Capital Repair - Replace Jetter Pump	2023	2/28/2023	21,018	3,503	17,515
JVK105	Capital Repair - New nozzles for larger diameter cleaning	2023	3/31/2023	15,757	2,363	13,393
JVK107	Vacuum Cleaner - Maryland Industrials Trucks	2020	2/5/2020	93,089	71,369	21,721
JVK107	Capital Repair - replace blower and rebuild shroud to prevent debris from damaging blower	2023	8/1/2023	19,172	2,663	16,510
JVK107	Capital Repair	2023	11/30/2023	46,599	971	45,628
JVK108	Combo Truck	2021	6/17/2021	355,000	128,688	226,312
JVK108	Capital Repair	2023	11/30/2023	18,128	378	17,750
JVK109	Combo Truck	2023	2/10/2023	462,451	34,684	427,767
JVK109	Capital Repair - Dacant Wash Down Kit	2023	8/1/2023	6,729	561	6,169
JVK110	Combo Truck	2023	2/10/2023	468,927	35,170	433,758
JVK110	Capital Repair - Components Pacific Region stripped off JVK109 before it left Pacific that had to be repurchased	2023	7/1/2023	7,309	609	6,700
LAT101	NEW EQUIPMENT FOR LATERAL DIVISION IRD, Inc	2012	12/1/2012	76,095	76,095	-
LAT102	Packer 8"x6"(20")--3 Items--Lateral Division	2013	1/24/2013	21,490	21,490	-
LAT103	Packer 9"x12"x6"--3 Items--Lateral Division	2013	3/22/2013	24,777	24,777	-
LAT104	Sewer Rods and Camera for Lateral	2013	5/15/2013	7,424	7,424	-
LAT105	Sewer Rods and Camera for Lateral	2013	10/16/2013	20,822	20,822	-
LAT106	Packers and Control Boxes	2013	12/1/2013	27,547	27,547	-
LAT107	Top Hat Packer 12-14"	2014	12/12/2014	5,691	5,691	-
LAT108	Lateral Inversion Packers	2016	6/30/2016	36,319	36,319	-
LAT109	Lateral Packer with Sensor	2017	3/30/2017	19,498	19,498	-
LAT110	Lateral Packer with Sensor	2017	11/6/2017	11,619	11,619	-
LD07	2008 78" Bobcat Track Loader s/n 532017148	2014	1/1/2011	31,217	31,217	-
LD102	Loader-Attachments-Grapple Forks-JRB	2019	2/8/2019	15,297	15,297	-
LD14	323E Compact Track Loader	2016	6/30/2016	48,828	48,828	-

LD15	323E Compact Track Loader	2018	3/13/2018	48,385	48,385	-
LD17	333E Compact Track Loader	2018	8/28/2018	55,285	55,285	-
LD19	Loader-Skid Steer-JD-323E-2018	2019	1/11/2019	56,788	56,788	(0)
LD19	Capital Repair	2023	12/1/3123	7,447	207	7,240
LD20	Loader-Skid Steer-JD-323E-2015	2021	2/21/2019	39,000	38,350	650
LD20	Capital Repair	2021	1/1/2020	11,623	9,105	2,518
LD20	Capital Repair	2021	4/1/2020	6,050	4,436	1,613
LD26C	Snow pusher box-96" Skid Steer Mount-	2020	12/8/2020	6,012	3,707	2,304
LD27	Loader-Skid Steer-JCB-3TS-8T	2020	10/28/2020	87,440	52,464	34,976
LD35	Loader-Skid Steer-JCB-3TS-8T	2022	12/28/2022	105,000	21,000	84,000
LD36	Loader-Skid Steer-JCB-3TS-8T	2022	12/22/2022	100,394	20,079	80,315
LDB104	Loader-Atachments- Brush Hog	2017	8/4/2017	5,430	5,430	-
LDB115	Attachments-Mulcher	2020	1/8/2021	26,988	26,987	0
LFR101	LAYFLAT ROLLER	2017	9/1/2017	7,649	7,649	-
LFR102	LAYFLAT ROLLER	2017	9/1/2017	7,649	7,649	-
LFR103	LAYFLAT ROLLER	2017	9/1/2017	7,649	7,649	-
LFR104	LAYFLAT ROLLER	2017	9/1/2017	7,649	7,649	-
LFR105	LAYFLAT ROLLER	2020	9/1/2020	13,854	13,854	-
LFR106	LAYFLAT ROLLER	2020	9/1/2020	13,854	13,854	-
LFR107	LAYFLAT ROLLER	2020	9/1/2020	13,854	13,854	-
LFR108	LAYFLAT ROLLER	2020	9/1/2020	13,854	13,854	-
LFR109	LAYFLAT ROLLER	2020	9/1/2020	13,854	13,854	-
LFR110	LAYFLAT ROLLER	2020	9/1/2020	13,854	13,854	-
LN01	LUMBERJACK NOZZELS 6"-8"-10" w/pullring-12" lumberjack sled	2011	9/26/2011	10,280	10,280	-
LN02	Lumberjack 300 Series Sled kit-w/30" wheels	2013	12/3/2013	4,791	4,791	-
LT07	MAGNUM PORTABLE LITE TOWER M# 40601, S# 00505, ISUZU 3 CYL DIESEL RM61006	2018	5/22/2008	1,218	1,218	-
LT10	Light Tower Trailer	2020	8/21/2020	4,427	4,304	123
LT12	Light Tower Trailer	2020	8/21/2020	4,427	4,304	123
LT13	Light Tower Trailer	2020	8/21/2020	4,427	4,304	123
MARS01	QUADEX PUMPING SYSTEM - CSR125	2022	10/31/2022	81,655	34,023	47,632
MARS01	QUADEX PUMPING SYSTEM - CSR125	2022	10/31/2022	1,500	625	875
MARS01	Quadex Misc Parts	2019	5/29/2019	15,550	15,550	-
MARS01	Quadex Pumping system - replace heat exchanger	2019	5/31/2019	3,877	3,877	-
MARS01	QUADEX PUMPING SYSTEM	2019	10/31/2019	20,846	20,846	-
MARS02	QUADEX MIXING STATION - CSR125	2022	10/31/2022	81,655	34,023	47,632
MARS02	QUADEX MIXING STATION - CSR125	2022	10/31/2022	1,500	625	875
MARS02	QUADEX MIXING STATION	2019	10/31/2019	20,846	20,846	-
MARS02	Capital Repair - Build Up Mixer w/ weld & Metal (Due to wear)	2021	5/31/2021	10,404	10,404	-
MARS03	Pump and Ribbon Mixer - Skid mounted (backup)	2023	12/31/2022	82,319	6,860	75,459
MXK101	CEMENT MIXING TRUCK	2022	5/18/2022	354,444	84,180	270,263
OT05	Office Trailer - Nashville jobs	2017	4/25/2017	27,860	27,860	-
OT06	Office Trailer - San Antonio	2018	12/6/2018	14,868	14,868	-
PLG101	PLUG 42"-78"	2019	3/25/2019	23,156	21,998	1,158
PLG102	PLUG 42"-78"	2019	3/25/2019	23,156	21,998	1,158
PLG103	PLUG 42"-78"	2019	3/25/2019	23,156	21,998	1,158
PMR102	8" Pump- Godwin CD225M-Silenced Diesel/Trailer	2010	2/17/2010	54,983	54,983	-
PMR103	6" Pump- Godwin CD100M-Silenced Diesel	2010	2/17/2010	43,220	43,220	-
PMR105	6" Pump- Godwin CD100M-Silenced Diesel	2010	2/17/2010	34,200	34,200	-
PMR106	2-Godwin 6" Pump vin# 25989	2010	12/31/2010	73,552	73,552	-
PMR111	Godwin Pumps and Hoses - Capital Repair	2015	8/31/2013	4,713	4,713	-
PMR111	Sekisui Fee	2015	3/1/2012	3,369	3,369	-
PMR111	Godwin Pumps and Hoses	2015	6/30/2011	168,450	168,450	-
PMR111	Godwin Pumps and Hoses - Sales/Use Tax paid	2015	12/30/2011	10,023	10,023	-
PMR117	Capital Repair - Replace pump end with Rebuild	2020	4/1/2020	15,147	15,147	-
PMR122	Godwin 6" Pump-Trailer mounted	2014	1/27/2014	53,569	53,569	-
PMR124	BBA 8" Pump-Trailer Mounted	2016	3/23/2016	57,283	57,283	-
PMR124	Capital Repair - Pump Rebuild	2020	4/1/2020	5,567	5,567	-
PMR125	BBA 8" Pump-Trailer Mounted	2016	3/23/2016	57,283	57,283	-
PMR125	Capital Repair - Pump Rebuild	2020	4/1/2020	5,893	5,893	-
PMR127	HYDRAULIC PUMP - JOHN DEERE	2017	5/1/2017	67,245	67,245	-
PMR127	Capital Repair - Replace Tandem Gear Pump Assy	2020	12/1/2020	3,953	3,953	-
PMR128	HV QuietFlow Diesel Trash Pump	2020	1/22/2020	147,195	110,396	36,799
PMR129	HV QuietFlow Diesel Trash Pump	2020	1/22/2020	147,195	110,396	36,799
PMR130	HV QuietFlow Diesel Trash Pump	2020	1/22/2020	147,195	110,396	36,799
PMR131	HV QuietFlow Diesel Trash Pump	2020	1/22/2020	147,195	110,396	36,799
PMR132	12" Godwin Pump	2021	6/30/2021	118,525	61,238	57,287
PMR132	Pump Freight	2021	8/31/2021	5,200	2,427	2,773
PMR133	6" Godwin Pump	2023	7/24/2023	48,692	4,058	44,635
PMR134	6" Godwin Pump	2023	7/24/2023	48,692	4,058	44,635
PPC001	Pearpoint Camera	2019	3/14/2019	55,080	55,080	-
PPC002	Pearpoint Camera	2019	3/14/2019	55,080	55,080	-
PSB11	EASY KLEEN STEAM BOILER - 2,000,000 BTU	2023	2/7/2023	32,340	3,773	28,567
PSB6	Portable Steam Boiler	2015	11/1/2012	10,883	10,883	-
PSB6	Capital repair on PSB	2017	5/1/2017	5,940	5,940	-
PSB7	Portable Steam Boiler	2015	11/1/2012	10,883	10,883	-
PSB7	Capital repair on PSB	2017	5/1/2017	5,940	5,940	-
PTK120	2008 Chevy 2500HD	2011	3/23/2011	27,117	27,117	-
PTK156	Pickup - 4X4 Crew Cab	2023	11/12/2015	39,080	39,080	-
PTK166	Pickup - 4X4 Crew Cab - BALTIMORE SHOP TRUCK #1 - Capital Lease	2022	1/1/2022	26,156	26,156	-
PTK166	Pickup - 4X4 Crew Cab - BALTIMORE SHOP TRUCK #1 - Residual Value	2022	6/30/2022	4,117	4,117	-
PTK173	Pickup - 4X4 Crew Cab LTZ Z71 - Capital Lease	2022	1/1/2022	35,461	35,461	-
PTK173	Pickup - 4X4 Crew Cab LTZ Z71 - Residual Value	2022	7/31/2022	5,380	5,380	-
PTK175	Pickup - 4X4 Crew Cab Z71	2023	9/11/2017	21,910	21,910	-
PTK178	Pickup - 4X4 Crew Cab LTZ Z71 - Capital Lease - Residual Value	2023	12/1/2022	5,613	5,613	-

PTK178	Pickup - 4X4 Crew Cab LTZ Z71 - Capital Lease	2023	1/1/2022	35,654	35,654	-
PTK183	Residual Value - Chevy Silverado	2023	3/1/2023	6,561	5,468	1,093
PTK183	Chevy Silverado	2018	3/2/2018	47,149	47,149	-
PTK185	Residual Value - Pickup - 4X4 Crew Cab LTZ Z71 - Capital Lease	2023	3/1/2023	7,304	6,087	1,217
PTK185	Pickup - 4X4 Crew Cab LTZ Z71 - Capital Lease	2022	1/1/2022	46,405	46,405	-
PTK189	Pickup - 4X4 Crew Cab LTZ Z71 - Residual Value	2023	12/11/2018	6,859	572	6,288
PTK189	Pickup - 4X4 Crew Cab LTZ Z71	2018	12/11/2018	47,039	47,039	-
PTK190	Pickup - 4X4 Crew Cab LT Z71	2023	12/18/2018	42,949	37,312	5,637
PTK193	Pickup - 4X4 Crew Cab LT Z71 - SPARE	2018	12/18/2018	42,949	37,312	5,637
PTK194	Pickup - 4X4 Crew Cab LT Z71	2018	12/21/2018	42,961	37,250	5,711
PTK195	Pickup - 4X4 Crew Cab LTZ Z71	2018	12/21/2018	53,899	46,734	7,164
PTK196	Pickup - 4X4 Crew Cab LT Z71	2019	1/3/2019	42,439	37,231	5,208
PTK199	Pickup - 4X4 Crew Cab LT	2019	1/10/2019	54,537	47,968	6,570
PTK201	Pickup - 4X4 Crew Cab LT	2019	1/10/2019	54,537	47,968	6,570
PTK202	Pickup - 4X4 Crew Cab	2023	3/14/2019	32,855	31,760	1,095
PTK203	Pickup - 4X4 Crew Cab LT Z71	2020	1/28/2020	42,964	29,299	13,666
PTK205	Pickup - 4X4 Crew Cab LT Z71	2020	1/28/2020	42,969	29,302	13,667
PTK206	Pickup - 4X4 Crew Cab LTZ	2020	1/28/2020	50,575	34,490	16,085
PTK207	Pickup - 4X4 Crew Cab LTZ	2020	1/28/2020	50,364	34,346	16,018
PTK208	Pickup - 4X4 Crew Cab LT	2022	2/19/2020	51,359	34,427	16,931
PTK209	Pickup - 4X4 Crew Cab LT	2020	2/19/2020	51,239	34,349	16,890
PTK210	Pickup - 4X4 Crew Cab Lariat	2020	4/27/2020	57,525	36,821	20,703
PTK211	Pickup	2020	5/8/2020	43,325	27,970	15,355
PTK212	Pickup	2020	6/17/2020	51,730	31,712	20,018
PTK212	Capital Repair	2023	12/31/2023	14,873	413	14,460
PTK213	Pickup - 4X4 Crew Cab LT - BALTIMORE SHOP TRUCK #2	2020	7/1/2020	51,729	31,041	20,688
PTK214	Pickup - 4X4 Crew Cab LTZ	2020	7/1/2020	54,072	32,506	21,566
PTK215	Pickup - 4X4 Crew Cab	2020	8/1/2020	35,015	23,927	11,088
PTK216	Pickup - 4X4 Crew Cab SL	2020	11/12/2020	44,577	28,232	16,345
PTK217	Pickup - 4X4 Crew Cab	2020	12/1/2020	44,272	27,301	16,971
PTK219	Pickup - 4X4 Crew Cab	2021	1/5/2021	44,289	22,853	21,436
PTK220	Pickup - 4X4 Crew Cab LT	2021	3/1/2021	53,061	26,219	26,842
PTK221	Pickup - 4X4 Crew Cab LT	2021	2/26/2021	53,103	26,264	26,839
PTK224	Pickup - 4X4 Crew Cab LT	2021	3/1/2021	53,053	26,214	26,839
PTK227	Pikcup - 4X4 Crew Cab LT	2021	3/1/2021	53,061	26,219	26,842
PTK228	Pickup - 4X4 Crew Cab LT	2021	2/26/2021	53,061	26,244	26,817
PTK229	Pickup - 4X4 Crew Cab LT	2021	3/22/2021	53,053	25,559	27,494
PTK230	Pickup - 4X4 Crew Cab LTZ - DARREN FINDING ABOUT THE DRIVER	2021	3/26/2021	58,950	28,054	30,896
PTK231	Pickup - 4X4 Crew Cab LTZ - DARREN FINDING ABOUT THE DRIVER	2021	3/26/2021	58,950	28,054	30,896
PTK232	Pickup - 4X4 Crew Cab LT	2021	4/15/2021	48,089	26,449	21,640
PTK233	Pickup - 4X4 Crew Cab XLT	2021	5/19/2021	56,523	25,224	31,299
PTK234	Pickup - 4X4 Crew Cab AT4	2021	11/9/2021	70,612	30,599	40,014
PTK235	Pickup - 4X4 Crew Cab SL	2023	10/8/2021	46,179	20,011	26,168
PTK238	Pickup - 4X4 Crew Cab	2021	11/8/2021	51,430	22,286	29,144
PTK240	Pickup - 4X4 Crew Cab	2022	2/10/2022	47,615	18,252	29,363
PTK241	Pickup - 4X4 Crew Cab AT4	2022	3/18/2022	71,773	26,317	45,456
PTK242	Pickup - 4X4 Crew Cab LT	2022	3/30/2022	54,913	16,777	38,136
PTK242	Capital Repair - New truck upfit. Seat covers, mats, toolbox, bed cover	2022	5/1/2022	4,251	1,417	2,834
PTK244	Pickup - 4X4 Crew Cab LT	2022	4/29/2022	54,913	15,978	38,935
PTK245	Pickup - 4X4 Crew Cab LT	2022	4/28/2022	61,475	17,894	43,582
PTK247	Pickup - 4X4 Crew Cab LT	2022	5/3/2022	54,913	16,205	38,708
PTK248	Pickup - 4X4 Crew Cab LT	2022	5/12/2022	61,475	18,048	43,427
PTK249	Pickup - 4X4 Crew Cab LT	2022	5/12/2022	61,475	18,048	43,427
PTK251	Pickup - 4X4 Crew Cab LT	2022	5/12/2022	61,475	18,048	43,427
PTK253	Pickup - 4X4 Crew Cab LT	2022	5/25/2022	54,913	15,993	38,920
PTK254	Pickup - 4X4 Crew Cab	2022	9/2/2022	64,010	15,123	48,887
PTK256	Pickup - 4X4 Crew Cab SLT	2022	10/4/2022	65,163	14,414	50,749
PTK258	Pickup - 4X4 Crew Cab	2023	11/11/2022	74,775	14,270	60,505
PTK260	Pickup - 4X4 Crew Cab	2022	11/16/2022	63,080	11,999	51,081
PTK261	Pickup - 4X4 Crew Cab	2022	11/22/2022	72,412	13,721	58,691
PTK262	Pickup - 4X4 Crew Cab - GROTE USING	2022	11/22/2022	72,412	13,721	58,691
PTK263	Pickup - 4X4 Crew Cab - BACH USING	2022	11/22/2022	72,412	13,721	58,691
PTK264	Pickup - 4X4 Crew Cab	2022	11/22/2022	72,412	13,721	58,691
PTK265	Pickup - 4X4 Crew Cab	2022	11/23/2022	72,412	13,721	58,691
PTK266	Pickup - 4X4 Crew Cab	2022	12/6/2022	74,775	13,217	61,558
PTK267	Pickup - 4X4 Crew Cab - SWIM USING	2022	12/8/2022	72,412	12,784	59,628
PTK267	Capital Repair	2023	12/31/2023	10,316	172	10,144
PTK268	Pickup - 4X4 Crew Cab AT4	2023	12/29/2022	92,143	18,338	73,805
PTK269	Pickup - 4X4 Crew Cab	2023	3/6/2023	65,491	10,915	54,576
PTK270	Pickup - 4X4 Crew Cab	2023	3/10/2023	73,310	12,218	61,092
PTK271	Pickup - 4X4 Crew Cab LTZ	2023	3/13/2023	71,395	11,899	59,496
PTK272	Pickup - 4X4 Crew Cab SLT	2023	4/18/2023	73,383	9,784	63,599
PTK273	Pickup - 4X4 Crew Cab SLT	2023	4/18/2023	73,383	9,784	63,599
PTK274	Pickup - 4X4 Crew Cab SLE	2023	5/9/2023	67,601	6,957	60,644
PTK275	Pickup - 4X4 Crew Cab SLE	2023	5/9/2023	67,601	6,957	60,644
PTK276	Pickup - 4X4 Crew Cab SLE	2023	5/9/2023	67,699	6,967	60,732
PTK277	Pickup - 4X4 Crew Cab SLE	2023	5/9/2023	67,601	6,957	60,644
PTK278	Pickup - 4X4 Crew Cab SLE	2023	5/9/2023	70,896	7,293	63,603
PTK279	Pickup - 4X4 Crew Cab AT4	2023	6/8/2023	85,354	7,460	77,894
PTK280	Pickup - 4X4 Crew Cab AT4	2023	6/8/2023	86,899	7,595	79,304
PTK281	Pickup - 4X4 Crew Cab AT4	2023	6/8/2023	85,895	7,508	78,388
PTK282	Pickup - 4X4 Crew Cab AT4	2023	6/8/2023	84,381	7,375	77,006
PTK283	Pickup - 4X4 Crew Cab AT4	2023	7/6/2023	85,354	7,460	77,894
PTK284	Pickup - 4X4 Crew Cab SLE	2023	8/4/2023	78,550	4,634	73,916
PTK285	Pickup - 4X4 Crew Cab SLE	2023	8/4/2023	78,550	4,634	73,916

PTK290	Pickup - 4X4 Crew Cab LTZ	2023	8/8/2023	86,692	5,101	81,591
PTK291	Pickup - 4X4 Crew Cab LTZ	2023	8/8/2023	86,692	5,101	81,591
PTK292	Pickukp - 4X4 Crew Cab SLE	2023	8/9/2023	79,150	4,654	74,496
PTK293	Pickup - 4X4 Crew Cab AT4	2023	8/17/2023	85,189	7,099	78,090
PTK294	Pickup - 4X4 Crew Cab SLE	2023	8/14/2023	67,699	3,968	63,732
PTK295	Pickup - 4X4 Crew Cab SLE	2023	9/8/2023	79,115	3,491	75,625
PTK296	Pickup - 4X4 Crew Cab SLE	2023	9/8/2023	79,115	3,491	75,625
PTK297	Pickup - 4X4 Crew Cab SLE	2023	9/8/2023	79,115	3,491	75,625
PTK298	Pickup - 4X4 Crew Cab LT	2023	10/4/2023	77,392	2,283	75,110
PTK299	Pickup - 4X4 Crew Cab LTZ	2023	10/4/2023	87,447	2,579	84,867
PTK300	Pickup - 4X4 Crew Cab LT	2023	10/5/2023	77,204	2,276	74,929
PTK301	Pickup - 4X4 Crew Cab LTZ	2023	10/31/2023	87,250	2,539	84,711
PTK301	Pickup - 4X4 Crew Cab LTZ	2023	12/31/2023	4,438	74	4,364
PTK302	Pickup - 4X4 Crew Cab LT	2023	10/31/2023	77,219	2,247	74,972
PTK303	Pickup - 4X4 Crew Cab LT	2023	10/31/2023	77,219	2,247	74,972
RBK101	Centruy, 20 series Wrecker Truck - for Geokrete	2019	9/19/2019	145,000	125,667	19,333
RCM101	OMNI 3 ZOOM-PURCHASED DEMO UNIT	2011	8/31/2011	15,784	15,784	-
RCM106	TV Camera	2013	5/30/2013	18,069	18,069	-
RCR101	Capital Repair - conveyor repairs. Rollers, bearings etc.	2021	6/30/2021	5,790	4,825	965
RCR101	1998 Great Dane 50' Reefer	2010	1/21/2009	10,169	10,169	-
RCR101	1998 Great Dane 50' Reefer - Capital Repair	2013	8/31/2013	9,764	9,764	-
RCR101	1998 Great Dane 50' Reefer - Capital Repair	2013	9/30/2013	16,231	16,231	-
RCR101	2600 Precedent Refrigeration Unit on RCR101	2015	1/21/2015	37,157	37,157	-
RCR101	Capital Repair - Replace Generator on Conveyor Trailer	2021	5/31/2021	5,922	5,922	-
RCR102	Capital Repair - Install conveyor from 101 Into RCR102	2022	6/30/2022	4,600	2,427	2,172
RCR102	2000 Dorse Reefer Trailer	2011	3/23/2011	1,624	1,624	-
RCR102	2000 Dorse Reefer Trailer - capital repair	2013	6/1/2013	11,314	11,314	-
RCR102	Capital Repair to RCR102	2014	6/30/2014	6,699	6,699	-
RCR102	S600 Precedent Unit - Installed on RCR102	2014	1/2/2014	34,360	34,360	-
RCT105	RST Storm Drain Tractor	2017	9/26/2017	8,740	8,740	-
RCT106	RST Tractor	2018	2/26/2018	10,952	10,952	-
RS01	Resin Storage Tank	2010	1/22/2008	42,254	42,254	-
RS02	Resin Storage Tank	2010	1/5/2009	38,719	38,719	-
RS03	2-Resin Storage Tank	2010	4/1/2011	80,100	80,100	-
RS04	IMO1 ISO Tank Container - Rocklin	2013	2/14/2013	22,160	22,160	-
RS04	Downpayment - Roofing for Resin Tank	2013	6/8/2013	3,981	3,981	-
RS04	Final Pymt - Roofing for Resin Tank	2013	7/10/2013	3,981	3,981	-
RS06	Resin Storage Tank--24,000 Litre	2013	8/6/2013	23,252	23,252	-
RS06	Resin Tank #4 - O'Fallon	2014	9/30/2014	26,586	26,586	-
RSR102	Safety Trailer	2020	1/1/2011	795	795	-
RTK102	Reefer Truck 2002 International	2010	5/12/2010	15,300	15,300	-
RTK102	Reefer Truck 2002 International - Capital repair to reefer unit	2013	12/4/2012	20,844	20,844	-
RTK104	2006 International-Reefer Truck-Capital Repair	2012	9/30/2012	24,539	24,539	-
RTK104	2006 International-Reefer Truck	2011	8/26/2011	49,400	49,400	-
RTK104	2006 International-Reefer Truck-Tax/Licence	2011	9/9/2011	3,938	3,938	-
RTK104	Replace Refigeration Unit	2016	4/30/2016	23,030	23,030	-
RTK105	Capital Repair- RTK105	2022	7/25/2022	26,176	13,088	13,088
RTK105	Capital - Reefer Truck - 28' T/A Reefer	2022	10/31/2022	8,688	3,379	5,310
RTK105	Sekisui Fee	2012	3/1/2012	1,800	1,800	-
RTK105	Reefer Truck - 28' T/A Reefer	2011	11/22/2011	88,775	88,775	-
RTK105	Refrigeration unit on RTK105	2016	7/15/2016	23,522	23,522	-
RTK106	Capital Repair - Replace compressor	2023	3/31/2023	10,308	2,577	7,731
RTK106	Warranty on Reefer Truck	2013	1/22/2013	2,159	2,159	-
RTK106	Reefer Truck-26' Box Thermo King T1000-50	2012	8/1/2012	133,873	133,873	-
RTK106	Injector Replacement	2019	3/31/2019	5,647	5,647	-
RTK106	Captial Repair - replace radiator, fan hub and harmonic balancer	2021	8/31/2021	8,201	8,201	-
RTK107	Reefer Truck-26' Box Thermo King T1080S-50	2017	6/29/2017	132,143	124,277	7,866
RTK107	Capital Repair - replace compressor on refer unit	2021	6/30/2021	11,496	9,580	1,916
RTK107	Reefer Unit for Truck	2017	6/26/2017	25,406	23,289	2,117
RTK108	Reefer Truck-Being built at CSTK	2021	5/12/2021	120,480	62,248	58,232
RTK108	Reefer Truck-Being built at CSTK	2021	8/17/2021	61,563	28,729	32,834
RTK109	Reefer Truck	2022	6/29/2022	49,827	13,287	36,540
RTK110	Reefer Truck	2022	12/1/2022	75,250	16,304	58,946
RTR103	2009 Utility VS1RA Trailer/w Reefer	2010	1/15/2008	52,799	52,799	-
RTR103	Capital Repair to RTR103	2014	6/30/2014	5,983	5,983	-
RTR105	1997 Wabash 53x102 Spring Reefer Trailer	2010	7/23/2008	13,700	13,700	-
RTR107	1998 Utility Trailer Vin 1UYVS1327WM608801	2010	1/21/2009	15,002	15,002	-
RTR107	replace upper fifth wheel plate	2018	12/1/2018	8,262	8,262	-
RTR107	Capital Repair: Replace roll up door.	2020	5/31/2020	5,744	5,744	-
RTR109	Capital Repair - Replace Hmi and program on Refer	2022	8/31/2022	5,626	3,751	1,875
RTR109	Capital Repair	2023	11/30/2023	17,150	357	16,793
RTR109	1998 Great Dane 28' Reefer	2010	5/20/2009	14,038	14,038	-
RTR109	CSTK Refrigeration Unit	2013	12/12/2013	33,249	33,249	-
RTR109	Capital Repair - replace rear door with operator and tracks	2021	8/31/2021	5,370	5,370	-
RTR113	Move to OTH Pooled Equip	2015	3/23/2011	2,300	2,300	-
RTR113	Move to OTH Pooled Equip	2015	3/31/2014	13,339	13,339	-
RTR113	Capital Repair	2020	4/28/2020	28,454	28,454	-
RTR115	Reefer Trailer 28'	2012	4/2/2012	8,900	8,900	-
RTR115	Tax/License	2012	4/25/2012	775	775	-
RTR115	Reefer Trailer Modifications	2017	11/30/2017	8,722	8,722	-
RTR116	Capital Repair - replace spring hanger, radius rods, slipper pads, etc on suspension	2022	12/31/2022	8,572	2,857	5,715
RTR116	Capital Repair	2023	11/30/2023	30,552	637	29,915
RTR116	Reefer Trailer-48'-5th wheel	2012	6/14/2012	13,831	13,831	-
RTR117	Reefer Trailer 28'	2012	7/26/2012	7,500	7,500	-
RTR117	Reefer Trailer 28' - MO DOR Tax	2012	7/31/2012	513	513	-
RTR118	Reefer Trailer -	2013	2/19/2013	38,320	38,320	-

RTR120	Reefer Trailer Capital Repair	2013	12/1/2013	5,577	5,577	-
RTR120	Reefer Trailer -	2013	2/19/2013	38,320	38,320	-
RTR120	Reefer Trailer - capitalize repair	2013	6/26/2013	23,937	23,937	-
RTR121	Reefer Trailer - deliver to Rocklin	2013	5/29/2013	3,850	3,850	-
RTR121	Reefer Trailer -	2013	2/19/2013	38,320	38,320	-
RTR122	Reefer Trailer -	2013	2/19/2013	37,250	37,250	-
RTR122	Reefer Trailer - Capital Repair	2019	6/10/2019	38,251	38,251	-
RTR125	Reefer Trailer - 48' TA	2013	9/5/2013	9,750	9,750	-
RTR125	Reefer Trailer - 48' TA - TAX & Repair	2013	10/4/2013	5,531	5,531	-
RTR126	CSTK Refrigeration Unit	2013	12/12/2013	32,331	32,331	-
RTR126	Reefer Trailer 48'X102"	2013	9/20/2013	16,362	16,362	-
RTR128	Capital Repair to RTR128	2014	9/30/2014	5,992	5,992	-
RTR128	Reefer Trailer-32'X102'	2013	10/7/2013	23,789	23,789	-
RTR128	Reefer Trailer-32'X102' - Additions	2013	11/30/2013	1,557	1,557	-
RTR129	Capital Repair - Replace Comp	2022	10/31/2022	9,742	3,789	5,954
RTR129	Reefer Trailer-32'X102'Reefer Trailer32'x102" - TAX	2013	11/4/2013	1,814	1,814	-
RTR129	Reefer Trailer-32' TA	2013	10/11/2013	21,975	21,975	-
RTR130	Capital Repair	2023	11/30/2023	14,849	309	14,540
RTR130	Reefer Trailer 28'	2014	1/20/2014	14,116	14,116	-
RTR131	Reefer trailer 28'	2014	1/20/2014	14,116	14,116	-
RTR132	Reefer Trailer	2014	7/9/2014	19,077	19,077	-
RTR133	Reefer Trailer 48' TA	2014	9/15/2014	14,992	14,992	-
RTR134	Reefer Trailer 48' TA	2014	9/15/2014	15,314	15,314	-
RTR135	Reefer Trailer 36'	2015	9/16/2015	8,096	8,096	-
RTR136	Reefer Trailer 48'	2017	3/1/2017	11,776	11,776	-
RTR137	Reefer Trailer Modifications	2017	11/30/2017	7,972	7,972	-
RTR137	Reefer Trailer 48'	2017	5/1/2017	27,526	27,526	-
RTR138	Line trailer walls with aluminum	2019	3/31/2019	5,003	5,003	-
RTR138	Reefer Trailer 53' w/Conveyor	2017	9/1/2017	111,505	111,505	-
RTR138	Reefer Trailer 53' w/Conveyor Final Pymt	2017	11/1/2017	35,650	35,650	-
RTR139	Reefer Trailer 53' w/Conveyor	2019	4/1/2019	4,022	3,822	201
RTR139	Reefer-Conveyor (rebuild RCR101)	2022	11/30/2022	61,295	14,302	46,993
RTR139	Reefer Trailer 53' w/Conveyor	2017	9/1/2017	111,505	111,505	-
RTR139	Reefer Trailer Modifications	2017	11/30/2017	3,127	3,127	-
RTR139	Reefer Trailer 53' w/Conveyor Final Pymt	2017	11/1/2017	35,650	35,650	-
RTR140	Reefer Trailer 7' X 12' 5200 LB CAPACITY (2000 LB WEIGHT)	2017	5/19/2017	17,500	17,500	-
RTR141	Reefer Trailer	2019	3/20/2019	15,262	15,262	-
RTR141	Capital Repair - Rollers	2019	5/1/2019	3,964	3,964	-
RTR142	Reefer Trailer	2019	3/20/2019	15,262	15,262	-
RTR142	Capital Repair - Rollers	2019	5/1/2019	3,964	3,964	-
RTR142	Capital Repair - Rebuild running gear	2021	8/31/2021	8,213	8,213	-
RTR143	Reefer Trailer	2019	3/20/2019	15,262	15,262	-
RTR143	Capital Repair - Rollers	2019	5/1/2019	3,964	3,964	-
RTR144	Reefer Trailer	2019	6/25/2019	9,350	9,350	-
RTR145	Reefer Trailer	2022	11/30/2022	144,377	33,688	110,689
RTR146	Reefer Trailer	2022	11/30/2022	144,377	33,688	110,689
RTR147	Reefer Trailer	2022	11/30/2022	144,377	33,688	110,689
RTR148	Reefer Trailer	2022	5/10/2022	35,000	11,667	23,333
RTR149	Reefer Trailer	2022	5/10/2022	35,000	11,667	23,333
RTR150	Reefer Trailer	2022	8/8/2022	48,000	10,400	37,600
RTR151	Reefer Trailer	2022	8/8/2022	48,000	10,400	37,600
RTR152	Reefer Trailer	2022	8/8/2022	48,000	10,400	37,600
RTR153	Reefer Trailer	2022	8/8/2022	48,000	10,400	37,600
RTR153	Capital Repair	2023	11/30/2023	13,328	278	13,051
RTR154	Reefer Trailer	2023	9/7/2023	24,960	1,664	23,296
RTR155	Reefer Trailer	2023	9/7/2023	24,960	1,664	23,296
RTR156	Reefer Trailer	2023	9/7/2023	24,960	1,664	23,296
RTR999	Adding Ladders to Reefer Trailers	2023	7/1/2023	1,713	285	1,428
RTR999	Layflat Rollers (18 new reels)	2022	6/30/2022	23,844	12,584	11,260
RTR999	Rollers for Reefer Units	2014	12/31/2014	7,886	7,886	-
RTT102	Capital Repair - replace bolster rings	2023	3/31/2023	10,966	2,741	8,225
RTT102	TANKER TRAILER	2017	2/13/2017	18,419	18,419	-
RTT103	Capital Repair/Upgrades - State Inspection	2021	7/31/2021	16,434	13,238	3,195
RTT103	TANKER TRAILER	2019	5/21/2019	16,215	16,215	-
RTT104	TANKER TRAILER - 20'	2022	4/25/2022	32,868	8,217	24,651
RTT105	TANKER TRAILER - 20'	2022	4/25/2022	32,868	8,217	24,651
SA18	Safety Monitors & Docking Stations	2020	9/4/2020	70,094	46,729	23,365
SA19	Sensor Units with Control Unit and Cradle (5)	2022	1/28/2022	161,385	59,175	102,211
SA20	Radiophone Radios (35 units)	2023	9/29/2023	21,171	1,764	19,406
SAC102	Wet-Out Air Compressor	2015	3/30/2015	7,180	7,180	-
SC20	Refrigerated Storage Container	2011	4/21/2011	9,726	9,726	-
SH06	Shooters-700-03	2010	1/14/2009	15,355	15,355	-
SH07	Shooter-Large Diameter	2010	1/14/2009	20,199	20,199	-
SH08	Hornet Shooter	2010	1/14/2009	5,950	5,950	-
SH09	15"-36" Shooter, 12"-24" Shooter	2010	12/14/2009	41,067	41,067	-
SH12	12" Shooter	2011	3/23/2011	2,706	2,706	-
SH16	Shooter 12"	2012	12/30/2012	9,426	9,426	-
SH17	Shooter 24"	2012	12/30/2012	9,426	9,426	-
SH18	12" SHOOTER	2012	12/30/2012	9,426	9,426	-
SH19	Shooter	2012	12/30/2012	9,426	9,426	-
SH20	SHOOTER-Small Diameter	2012	12/30/2012	9,426	9,426	-
SH21	SHOOTER-Small Diamteer	2012	12/30/2012	9,426	9,426	-
SH22	Shooter Small Diameter	2012	12/30/2012	9,426	9,426	-
SH23	Shooter-Small Diameter	2012	12/30/2012	9,426	9,426	-
SH24	Shooter 6"-8"-10" Leg Frame	2013	12/1/2013	7,000	7,000	-
SH25	Shooter 6"-8"-10" Leg Frame	2013	12/1/2013	7,000	7,000	-
SH26	Shooter 6"-8"-10" Leg Frame	2013	12/1/2013	7,000	7,000	-

SH27	Shooter 6"-8"-10" Leg Frame	2013	12/1/2013	7,000	7,000	-
SH28	Shooter 6"-8"-10" Leg Frame	2013	12/1/2013	7,000	7,000	-
SH29	Shooter 12" Leg Frame	2013	12/1/2013	9,500	9,500	-
SH30	Shooter-6-8-10" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH31	Shooter 6-8-10" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH32	Shooter 6-8-10-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH33	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH34	Shooter-6'-8'-10'-12' Leg Frame	2014	12/31/2014	6,000	6,000	-
SH35	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH36	Shooter 6"-8"-10"-12" Wheel Framed	2014	12/31/2014	6,000	6,000	-
SH37	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH39	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH40	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH41	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH42	Shooter 6"-8"-10"-12" Leg Frame	2014	12/31/2014	6,000	6,000	-
SH43	Shooter 6"-8"-10"-12"-Leg Frame	2014	12/31/2014	6,000	6,000	-
SH47	MID SIZED SHOOTER	2016	9/1/2016	5,694	5,694	-
SH48	MID SIZED SHOOTER	2016	9/1/2016	5,694	5,694	-
SH54	Shooters (quantity of 12)	2021	9/30/2021	15,792	12,283	3,509
SHR101	24" Shooter Emagineered Solutions	2010	11/29/2007	44,043	44,043	-
SHR103	2008 Eaton Air Shooter	2011	3/23/2011	18,000	18,000	-
SHR107	Shooter-Trailer Mounted-15" to 24"	2013	12/1/2013	15,290	15,290	-
SHR108	Shooters - Built in Shop	2011	12/15/2011	121,143	121,143	-
SHR109	Shooter Trailer Mounted 15"-24"--Blue	2013	12/1/2013	10,501	10,501	-
SHR110	Rebuilt Shooter frame	2019	5/31/2019	4,073	4,073	-
SHR111	Shooter - Built in Shop	2014	12/31/2014	6,000	6,000	-
SHR113	Shooter 18"-48" - Trailer Mounted - BLACK	2022	11/30/2022	59,235	13,822	45,413
SHR114	Shooter 18"-36" - Trailer Mounted - BLACK	2022	11/30/2022	59,235	13,822	45,413
SHR999	Shooter Builds - New Crews	2023	7/1/2023	16,756	2,793	13,963
SHR999	Shooter Builds - Maintenance Material & Labor	2021	1/1/2021	14,422	14,022	401
SL05	SKYJACK SCISSOR LIFT	2019	2/15/2019	6,995	6,995	-
SM01	Mixer Tank - 1 HP	2010	2/6/2008	1,331	1,331	-
SM01	Mixer Tank - 1 HP	2012	3/2/2012	16,630	16,630	-
SM01	Sales/Use Tax on SM01	2012	4/30/2012	989	989	-
SM02	Static Mixer	2015	8/30/2015	10,087	10,087	-
SM04	Static Mixer	2010	6/28/2010	60,938	60,938	-
SM05	In-Line Static Mixer	2011	3/28/2011	27,890	27,890	-
SMR101	Capital Repair - Pump Replacement	2022	2/1/2022	8,819	8,084	735
SMR101	Capital Repair - Replace mixing pumps and rewire	2022	4/1/2022	21,311	11,840	9,472
SMR101	Capital Repair - Replace Pump	2022	10/31/2022	7,093	2,758	4,334
SMR101	2008 Pace CS820 Epoxy Trailer	2011	3/23/2011	44,464	44,464	-
SMR101	2008 Pace CS820 Epoxy Trailer - Tax/Liecense	2011	10/12/2011	3,752	3,752	-
SMR101	upgrades to static mixer	2015	7/31/2015	13,907	13,907	-
SMR102	Static Mixing Trailer	2021	1/1/2021	154,442	90,091	64,351
SMR102	Back Resin Tank - CA &	2022	11/11/2022	10,093	561	9,532
SMR102	Trailer Mounted Static Mixer (Pacific)	2023	7/1/2023	26,955	1,498	25,458
SMR103	Capital Repair - Replace air compressor	2023	7/1/2023	4,774	663	4,111
SMR103	Capital Repair	2023	11/30/2023	30,622	638	29,984
SMR103	Aqua Trailer enclosed vin 5RAGE3638AM506874	2014	1/1/2011	1,429	1,429	-
SMR103	Addition to Aquapipe Trailer	2014	4/30/2013	4,293	4,293	-
SMR103	Aqua Trailer enclosed vin 5RAGE3638AM506874	2014	10/31/2011	165,098	165,098	-
SMR103	Replace both axles on trailer	2015	7/31/2015	12,052	12,052	-
SMR103	Addition of Gear Meter	2018	2/15/2018	7,031	7,031	-
SMR103	Upgrade mixing trailer	2018	7/31/2018	4,294	4,294	-
SMR103	Rebuild Mixers in Trailer & Motors	2018	3/31/2018	28,628	28,628	-
SMR103	Rebuild Mixers in Trailer & Motors	2018	4/30/2018	12,673	12,673	-
SMR103	AquaTrailer-36' GOOSENECK	2019	4/1/2019	8,823	8,823	-
SMR103	Capital Repiar - Replace Resin Pump and Catalyst	2020	8/1/2020	11,297	11,297	-
SP23	Resin Pumps/Scales/Winches	2011	3/23/2011	7,361	7,361	-
SQ06	Metal Press-Huber Farms	2014	2/2/2009	4,500	4,500	-
SQ07	Hose End Crimp 4SP w Series 3/4 Hose 3/4 MPT	2010	2/26/2009	3,248	3,248	-
SQ10	Resin Pump - s/nGG16559 Wetout	2010	7/6/2009	2,892	2,892	-
SQ13	Extruder Gun	2010	1/1/2010	4,150	4,150	-
SQ18	Initial Type Plate Bending Roll, 5'x1/4'	2011	5/6/2011	12,780	12,780	-
SQ19	Heater Fans & 14'x14' Door	2011	3/23/2011	433	433	-
SQ20	Wetout Tent	2011	3/23/2011	379	379	-
SQ21	MOB-100 120,000 BTU	2011	3/23/2011	6,495	6,495	-
SQ22	20' x 80' Wetout Tent	2011	6/20/2011	10,507	10,507	-
SQ23	Wet-out Plastic Welding Kit	2011	5/17/2011	3,573	3,573	-
SQ24	Pneumatic shears - Shop Equipment	2012	12/7/2012	5,829	5,829	-
SQ25	POWER SQUARING SHEAR 1/4" X 10' Used Equip.	2013	3/1/2013	13,774	13,774	-
SQ26	Paint Booth for Shop	2013	3/12/2013	10,489	10,489	-
SQ27	230-TON PRESS/ BRAKE	2013	3/7/2013	54,145	54,145	-
SQ27	Die Sets for 230-TON PRESS/ BRAKE	2013	4/17/2013	7,803	7,803	-
SQ27	Capital Repair - Cost of 230 ton used press brake purchased	2023	6/1/2023	2,300	447	1,853
SQ28	Sheet Metal Corner Notcher	2013	9/5/2013	6,190	6,190	-
SQ29	Pro Link IQ Extreme Kit	2014	2/5/2014	10,895	10,895	-
SQ30	Lathe Machine	2014	4/16/2014	11,125	11,125	-
SQ32	Programmable Horizontal Bandsaw	2014	10/14/2014	26,417	26,417	-
SQ34	Vertical Milling Machine	2016	4/7/2016	20,926	20,926	-
SQ34	Tooling Certificate for Milling Machine	2016	5/3/2016	3,814	3,814	-
SQ36	Water Jet for Shop	2017	1/16/2017	114,333	114,333	-
SQ36	Water Jet Installation	2017	3/1/2017	10,425	10,425	-
SQ36	Capital Repair - Waterjet - Pump Rebuild	2022	10/31/2022	5,119	1,991	3,128
SQ39	Walz Equipment Scale	2017	7/17/2017	6,017	6,017	-
SQ40	LATHE - 13 X 40	2018	1/19/2018	7,403	7,403	-
SQ41	MILL	2018	1/19/2018	7,403	7,403	-

SQ42	PIPE BENDER - 220V SINGLE PHASE	2018	2/13/2018	7,148	7,148	-
SQ43	Water jet 4' x 8'	2018	6/27/2018	52,485	52,485	-
SQ46	HD PLASMA CUTTING TABLE	2019	3/20/2019	142,075	137,339	4,736
SQ47	Miller Deltaweld	2019	6/14/2019	16,721	16,721	-
SQ48	Fume Extractor (Waites Compnay)	2019	7/17/2019	34,876	31,395	3,481
SQ49	LOAD BANK 100kW	2020	4/20/2020	7,970	7,970	-
SQ50	PIRANHA IRONWORKER	2020	2/12/2020	23,298	23,298	-
SQ51	PIPE THREADER	2020	7/1/2020	11,467	11,467	-
SQ56	PRESS BRAKE	2023	6/5/2023	7,490	1,456	6,034
SQ57	ROLAND PRINTER	2023	8/23/2023	6,693	744	5,949
SU51	Wetout Electrical/Modifications - Rocklin	2016	11/30/2016	21,930	21,930	-
SU53	Replace stolen tools from TTR123	2019	11/1/2018	29,798	29,798	-
SU54	Communication Headsets - Geokrete	2019	7/1/2019	11,156	11,156	-
SU58	4-Post Truck Lift	2022	3/31/2022	21,767	12,093	9,674
SU62	New Tools/Equipment - San Antonio Crew	2022	12/31/2022	31,728	6,873	24,855
SU63	Control Unit 19" Rack Cues/Aries - Spare	2023	6/27/2023	23,584	2,751	20,833
SU64	Control Unit 19" Rack Cues/Aries - Spare	2023	6/28/2023	23,409	2,731	20,678
SU65	New Tools/Equipment - Atlanta Crews	2023	11/30/2023	126,189	2,103	124,086
SU66	New Tools/Equipment - Kansas City Crews	2023	11/30/2023	24,072	401	23,671
SU67	New Tools/Equipment - 2 Detroit Crews	2023	11/30/2023	54,966	916	54,050
SWB102	Swamp Buggy	2021	3/18/2021	92,960	51,128	41,832
SWB102	Capital Repair - replace drive sprockets, bogey wheels and drive shaft due to wear	2023	6/1/2023	7,429	1,445	5,985
SWB102	Capital Repair - replace undercarrage	2023	7/1/2023	4,440	617	3,823
SWM101	Spiralwinding Machine	2014	2/10/2014	16,477	16,477	-
SWM101	Spiralwinding Machine	2014	2/10/2014	(16,477)	(16,477)	-
SWM102	Heitkamp - SPR 200 Machine	2014	6/12/2014	78,656	78,656	-
SWM102	Heitkamp - SPR 200 Machine	2014	6/12/2014	(78,656)	(78,656)	-
TCC101	Downpayment on Catalyst Mixer - O'Fallon	2013	4/1/2013	30,000	30,000	-
TCC101	Downpayment on Catalyst Mixer - O'Fallon	2013	8/19/2013	29,270	29,270	-
TCC102	Downpayment on Catalyst Mixer - Rocklin	2013	4/1/2013	30,000	30,000	-
TCC102	Downpayment on Catalyst Mixer - Rocklin	2013	8/5/2013	30,123	30,123	-
TCC103	Temperature Control Catalyst Machine	2021	6/1/2021	53,583	27,684	25,898
TLH102	Telehandler	2016	3/31/2016	127,997	127,997	-
TLH102	Capital Repair - Replace wet brakes and upgrade tires	2021	8/31/2021	13,105	13,105	-
TLH103	Telehandler	2017	1/18/2017	131,178	131,178	-
TLH103	Capital Repair	2019	10/1/2019	4,613	4,613	-
TLH104	Telehandler	2017	8/2/2017	124,276	124,276	-
TLH105	Telehandler	2019	3/7/2019	116,050	116,050	-
TLH108	TELEHANDLER	2022	3/4/2022	127,380	77,843	49,537
TLH109	TELEHANDLER	2022	8/9/2022	109,893	29,305	80,588
TLH110	TELEHANDLER	2023	10/28/2022	132,518	28,712	103,806
TNK101	ISO STORAGE TANK	2022	2/22/2022	35,390	12,976	22,414
TNK101	ISO STORAGE TANK - Chasis	2022	2/25/2022	20,492	6,148	14,345
TNK102	ISO STORAGE TANK	2022	2/22/2022	35,390	12,976	22,414
TNK102	ISO STORAGE TANK - Chasis	2022	2/25/2022	20,492	6,148	14,345
TR59	Wetout Trailer/Conveyor 80" Wide	2011	3/23/2011	14,073	14,073	-
TRK102	2004 Mack, CX612	2010	7/17/2008	32,823	32,823	-
TRK104	1998 Peterbilt Cat 3604E 1XPFDU9X2WN454704	2010	8/22/2008	5,681	5,681	-
TRK114	Capital Repair - Replace Transmission	2023	2/28/2023	11,300	3,139	8,161
TRK114	Road Tractor-Day Cab - Freight	2012	10/3/2012	1,924	1,924	-
TRK114	Road Tractor-Day Cab - Warranty	2012	12/18/2012	2,151	2,151	-
TRK114	Road Tractor-Day Cab	2012	6/11/2012	118,540	118,540	-
TRK115	Road Tractor - Warranty	2012	12/18/2012	2,151	2,151	-
TRK115	Road Tractor	2012	8/23/2012	110,267	110,267	-
TRK117	Capital Repair - EGR Cooler - Turgbo	2022	2/1/2022	14,066	8,596	5,470
TRK117	Road Tractor - International 8600	2012	12/18/2012	100,701	100,701	-
TRK118	Road Tractor - International 8600	2012	12/18/2012	100,701	100,701	-
TRK119	Capital Repair - Replace Head	2022	10/31/2022	9,025	5,265	3,760
TRK119	Capital Repair - Replace DOC, EGR, and Turbo	2023	2/28/2023	13,855	3,849	10,006
TRK119	2014 International Road Tractor	2013	3/1/2013	104,649	104,649	-
TRK119	2014 International Road Tractor - Capital Repair	2021	10/31/2021	5,200	5,200	-
TRK120	Road Tractor-Day Cab	2013	6/21/2013	104,394	104,394	-
TRK121	Capital Repair - Turbo, CAC and DPF replacement	2022	12/31/2022	10,094	3,365	6,729
TRK121	Road Tractor-Day Cab	2013	5/3/2013	106,091	106,091	-
TRK122	Road Tractor-Day Cab	2013	7/15/2013	104,394	104,394	-
TRK122	Capital Repair - replace EGR and intake	2021	8/31/2021	8,456	8,456	-
TRK123	Road Tractor-Day Cab	2013	10/22/2013	104,573	104,573	-
TRK124	Road Tractor-Day Cab	2013	9/24/2013	99,754	99,754	-
TRK125	Road Tractor-Day Cab purchased from WF at end of lease	2019	3/6/2019	27,199	27,199	-
TRK126	Road Tractor-Day Cab purchased from WF at end of lease	2019	9/18/2019	19,775	19,775	-
TRK128	Road Tractor-Day Cab-TA	2015	2/20/2015	89,505	89,505	-
TRK129	Capital Repair - Replace Clutch	2023	5/31/2023	7,233	1,607	5,626
TRK129	2007 Freightliner Day Cab	2019	6/3/2015	33,526	33,526	-
TRK130	Road Tractor-Day Cab	2017	3/1/2017	109,840	109,840	-
TRK131	Road Tractor-Day Cab	2017	3/1/2017	115,344	115,344	-
TRK132	Road Tractor-Day Cab	2017	3/1/2017	111,840	111,840	-
TRK136	Capital Repair - Replace all engine mounts and ext housing reseal. Clutch and cluthc brake	2022	3/31/2022	7,717	6,752	965
TRK136	2012 Freightliner, Cascadia 125	2018	6/1/2018	15,000	15,000	-
TRK136	Motor Rebuild	2018	8/31/2018	14,150	14,150	-
TRK136	Capital Repair - replace DEF and EGR reseal front structure	2021	8/31/2021	12,876	12,876	-
TRK137	Replace Diesel Particulate Filter	2018	11/1/2018	14,321	14,321	-
TRK137	Capital Repair - Reseal Rear Structure/Engine	2021	2/1/2021	12,712	12,712	-
TRK137	2012 Freightliner, Cascadia 125	2018	6/1/2018	15,000	15,000	-
TRK137	Capital Repair - replace injectors	2021	8/31/2021	8,456	8,456	-
TRK139	Road Tractor	2019	3/14/2019	122,400	118,320	4,080
TRK140	Road Tractor	2019	3/14/2019	122,400	118,320	4,080

TRK141	Road Tractor	2019	3/14/2019	122,400	118,320	4,080
TRK143	Road Tractor	2020	5/14/2020	98,099	70,304	27,795
TRK144	Road Tractor	2020	5/14/2020	98,099	70,304	27,795
TRK145	Road Tractor	2021	4/8/2021	115,900	61,813	54,087
TRK146	Capital Repair - Replace DOC and DPF	2022	12/31/2022	9,053	3,018	6,035
TRK146	Road Tractor	2021	12/27/2021	65,822	24,135	41,687
TRK147	Road Tractor	2022	3/7/2022	44,361	16,266	28,095
TRK148	Road Tractor	2022	5/19/2022	47,662	15,093	32,569
TRK149	Road Tractor	2023	3/31/2023	40,140	6,021	34,119
TRK150	Road Tractor	2023	4/28/2023	39,393	4,596	34,797
TRK151	Road Tractor	2023	4/28/2023	49,844	5,815	44,029
TRK153	Road Tractor	2023	8/28/2023	177,165	8,858	168,307
TRK154	Road Tractor	2023	9/11/2023	177,165	8,858	168,307
TRK155	Road Tractor	2023	10/4/2023	177,165	5,906	171,260
TRK156	Road Tractor	2023	9/18/2023	177,165	5,906	171,260
TRK157	Road Tractor	2023	10/4/2023	177,165	5,906	171,260
TRK158	Road Tractor	2023	9/18/2023	177,165	5,906	171,260
TRK159	Road Tractor	2023	10/20/2023	177,165	5,906	171,260
TRK160	Road Tractor	2023	10/4/2023	177,165	5,906	171,260
TTR114	2010 Interstate Trailer-Static Mixer Trailer	2010	10/31/2010	20,865	20,865	-
TTR114	2010 Interstate Trailer-Static Mixer Trailer	2011	5/31/2011	528	528	-
TTR114	2010 Interstate Trailer-Static Mixer Trailer - capital repair	2013	6/1/2013	5,853	5,853	-
TTR118	Tool Trailer 8.5x16'-Enclosed - Down Payment	2012	8/14/2012	1,000	1,000	-
TTR118	Tool Trailer 8.5x16'-Enclosed	2012	8/14/2012	8,774	8,774	-
TTR121	TOOL TRAILER-6X18-CARGO	2013	3/26/2013	10,847	10,847	-
TTR121	Tool Trailer Upgrades - Grote Crew	2013	4/30/2013	5,886	5,886	-
TTR122	Tool Trailer-18' - East Coast Crew	2013	4/12/2013	10,745	10,745	-
TTR122	Tool Trailer Upgrades - East Coast Crew	2013	4/30/2013	4,596	4,596	-
TTR124	Tool Trailer 18' - Alan Stuhlsatz Crew	2013	6/1/2013	13,621	13,621	-
TTR124	Replace stolen tools	2016	6/30/2016	8,768	8,768	-
TTR125	Tool Trailer-20"	2013	8/31/2013	18,722	18,722	-
TTR127	Tool Trailer18'--Kansas City Crew	2013	10/31/2013	17,311	17,311	-
TTR129	Tool Trailer-6'8"X18'	2013	12/1/2013	13,341	13,341	-
TTR135	Tool Trailer - 18'	2018	12/11/2018	14,539	14,539	-
TTR138	Tool Trailer - 16'	2019	3/20/2019	4,803	4,803	-
TTR139	Tool Trailer - 16'	2019	3/29/2019	10,343	10,343	-
TTR140	Tool Trailer - 16'	2019	4/16/2019	4,803	4,803	-
TTR141	Tool Trailer - 12'	2019	4/22/2019	4,144	4,144	-
TTR142	Tool Trailer - 8'W x 16'L	2019	7/10/2019	8,172	8,172	-
TTR142	Tools & Safety Equipment/Replace Stolen Trailer	2019	7/1/2019	11,272	11,272	-
TTR143	Rescue Safety Training Trailer - 20'	2017	6/23/2017	10,600	10,600	-
TTR144	Tool Trailer - 18'	2020	12/11/2019	11,900	11,900	-
TTR145	Tool Trailer - 16'	2019	12/13/2019	4,900	4,900	-
TTR146	Tool Trailer - 16'	2019	12/13/2019	4,900	4,900	-
TTR148	TOOL TRAILER	2020	4/15/2020	9,927	9,927	-
TTR149	TOOL TRAILER	2020	4/15/2020	9,927	9,927	-
TTR150	Tool Trailer - 22'	2022	4/15/2022	18,286	10,667	7,619
TTR150	Tool Trailer - 22' Shelving and tools	2022	4/1/2022	12,717	7,065	5,652
TTR151	Tool Trailer - 18'	2022	9/30/2022	14,880	6,200	8,680
TTR152	Tool Trailer - 18'	2022	9/30/2022	14,880	6,200	8,680
TTR153	Tool Trailer - 18'	2022	12/29/2022	14,880	5,373	9,506
TTR154	Tool Trailer - 18'	2022	12/29/2022	14,880	5,373	9,506
TTR155	Tool Trailer - 16'	2023	5/4/2023	11,700	650	11,050
TTR156	Tool Trailer - 16'	2023	5/4/2023	11,700	650	11,050
TTR157	Tool Trailer - 16'	2023	5/4/2023	11,700	650	11,050
TTR158	Tool Trailer - 16'	2023	5/4/2023	11,700	650	11,050
TTR159	Tool Trailer - 16'	2023	5/4/2023	11,700	650	11,050
TTR160	Tool Trailer - 16'	2023	5/4/2023	11,700	650	11,050
TTR161	Tool Trailer - 14' - WAITING ON PAPERWORK	2023	10/4/2023	6,570	548	6,023
TVK111	Maintenance to Camera	2012	3/8/2012	2,238	2,238	-
TVK111	Red Coax Nylon for TV Truck	2012	4/11/2012	3,190	3,190	-
TVK111	Aries-TV Equipment-Chasis/Box - Repurchase	2012	8/27/2012	13,950	13,950	-
TVK111	Aries-TV Equipment-Chasis/Box - Sales/Use Tax	2012	9/30/2012	830	830	-
TVK111	Aries-TV Equipment-Chasis/Box	2010	12/31/2010	237,041	237,041	-
TVK111	Aries-TV Equipment-Chasis/Box	2011	1/1/2011	1,630	1,630	-
TVK111	Lost TV Equipment	2012	12/31/2010	(34,232)	(34,232)	-
TVK111	Retrofit to SAK Robot	2017	9/1/2017	11,964	11,964	-
TVK111	Capital Repair	2018	6/30/2018	6,519	6,519	-
TVK111	TV Truck-Aries - Capital Repairs	2019	9/1/2019	14,057	14,057	-
TVK113	Capital Repair - TV Truck-SAKutter	2022	10/31/2022	9,409	3,659	5,750
TVK113	TVK113 - Convert to SAK Cutter	2022	11/30/2022	24,031	9,345	14,686
TVK113	2007 Chevy C5500	2011	3/23/2011	2,652	2,652	-
TVK113	2007 Chevy C5500	2011	8/11/2011	89,895	89,895	-
TVK113	2007 Chevy C5500-Tax/License	2011	9/16/2011	7,395	7,395	-
TVK113	Cues Crawler for TVK113	2015	12/18/2015	6,564	6,564	-
TVK113	Capital Repair	2021	2/1/2021	6,859	6,859	-
TVK114	Replace Aries Reel	2015	7/31/2015	5,649	5,649	-
TVK114	TV Truck - 20' Hi-Cube Van - Down Payment	2012	12/20/2011	35,032	35,032	-
TVK114	TV Truck - 20' Hi-Cube Van	2012	2/29/2012	155,332	155,332	-
TVK114	Generator Replacement	2018	3/31/2018	17,346	17,346	-
TVK115	Rehab TVK115	2022	11/30/2022	57,059	13,314	43,745
TVK115	Capital Repair	2023	11/30/2023	20,655	430	20,224
TVK115	Move to CIPP	2015	4/25/2012	5,099	5,099	-
TVK115	Move to CIPP	2015	1/22/2013	3,239	3,239	-
TVK115	Rebuild TVK115	2015	10/1/2015	15,608	15,608	-
TVK115	Retrofit with dual system IST & Aries - Capital Repair	2015	12/31/2015	14,208	14,208	-
TVK115	Move to CIPP	2015	6/15/2012	91,402	91,402	-

TVK115	Capital Repair	2017	9/1/2017	15,745	15,745	-
TVK117	TV TRUCK--BOX TRUCK	2012	6/12/2012	21,296	21,296	-
TVK117	Diesel Generator and warranty	2012	6/22/2012	10,729	10,729	-
TVK117	TV Truck Built in Shop	2012	8/1/2012	32,612	32,612	-
TVK117	Rehab for new IST Cutters	2014	4/30/2014	11,477	11,477	-
TVK117	New Generator	2019	2/28/2019	15,604	15,604	-
TVK118	TV Additions to TV Truck	2013	12/1/2013	3,485	3,485	-
TVK118	Capital Repair to TVK118	2014	6/30/2014	12,910	12,910	-
TVK118	TV Truck-Lateral Division	2012	9/28/2012	21,890	21,890	-
TVK118	TV Truck-Lateral Division	2012	11/30/2012	60,567	60,567	-
TVK119	TV Truck - Additional items	2012	12/1/2012	10,714	10,714	-
TVK119	TV Truck	2012	12/30/2012	74,144	74,144	-
TVK119	TV Truck - Capital Repair	2019	9/1/2019	14,800	14,800	-
TVK123	TV Additions to TV Truck	2013	12/1/2013	3,485	3,485	-
TVK123	Underhood Air Compressor	2014	1/1/2014	10,569	10,569	-
TVK123	TV Truck - Lateral Division	2013	10/31/2013	123,022	123,022	-
TVK125	Capital Repair to TVK125	2014	6/30/2014	12,133	12,133	-
TVK125	Rehab for new IST Cutters	2014	4/30/2014	11,477	11,477	-
TVK125	TV Truck-IST	2013	12/1/2013	116,096	116,096	-
TVK125	Capital Repair - Cap this to GNR226 New generator	2019	12/1/2020	13,982	13,982	-
TVK126	TVK126 - Full Rehab	2023	7/1/2023	40,525	4,053	36,473
TVK126	Rehab for new IST Cutters	2014	4/30/2014	11,477	11,477	-
TVK126	Add Reel to make dual unit	2017	9/1/2017	7,151	7,151	-
TVK126	Added dual TV System	2018	3/31/2018	6,210	6,210	-
TVK126	Captial Repair	2018	6/30/2018	4,985	4,985	-
TVK126	TV Truck-IST	2014	5/31/2014	101,412	101,412	-
TVK126	TV Truck - Replacement Air Reels	2020	10/9/2020	7,136	7,136	-
TVK128	TV Truck	2014	8/1/2014	8,829	8,829	-
TVK128	TV Truck - International	2014	9/30/2001	156,986	156,986	-
TVK130	Rebuild/Rehab	2023	11/30/2023	24,123	1,005	23,118
TVK130	TV Truck	2015	4/30/2015	78,062	78,062	-
TVK130	Capital Repair	2017	9/1/2017	5,125	5,125	-
TVK130	Upgrade TV Truck	2018	11/1/2018	23,351	23,351	-
TVK130	Capital Repair - Rewire	2020	4/1/2020	7,995	7,995	-
TVK131	TVK131 - Refit/Rehab	2023	7/1/2023	107,818	10,782	97,036
TVK131	Ford F550 - TV TRUCK	2016	11/30/2016	171,364	171,364	-
TVK131	Capital Repair	2017	3/31/2017	11,214	11,214	-
TVK131	Winch Assy	2018	3/31/2018	6,876	6,876	-
TVK131	Capital Repair	2017	5/1/2017	17,327	17,327	-
TVK131	Vac Pump and Motor	2017	5/31/2017	15,176	15,176	-
TVK131	Logiball Lateral Packer	2017	6/30/2017	11,812	11,812	-
TVK132	Capital Repair	2023	10/31/2023	16,471	915	15,556
TVK132	Capital Repair	2023	11/30/2023	23,012	479	22,533
TVK132	Aries Power Winch Assembly	2017	7/31/2017	7,210	7,210	-
TVK132	TV Truck-Aries	2015	3/23/2015	248,672	248,672	-
TVK132	TV Truck-Aries Delivery Fee	2015	3/31/2015	788	788	-
TVK133	Convert TVK133 to a dual unit	2017	6/1/2017	32,868	32,868	-
TVK133	Reel Repairs & Upgrades	2018	9/1/2018	14,969	14,969	-
TVK133	TV Truck - Lateral Division	2015	10/1/2015	167,332	167,332	-
TVK133	Capital Repair	2021	3/31/2021	16,128	16,128	-
TVK133	Capital Repair - Replacement Generator Cap - GNR235	2021	8/31/2021	15,728	15,728	-
TVK134	TV TRUCK	2017	11/1/2017	9,812	8,527	1,285
TVK134	TV TRUCK	2015	12/31/2015	329,898	329,898	-
TVK135	Capital Repair - TV Truck	2022	9/30/2022	8,230	5,144	3,086
TVK135	TV Truck - Grout	2015	8/14/2015	303,901	303,901	-
TVK135	TV Truck - modifications	2015	10/1/2015	27,928	27,928	-
TVK135	Capital Repair - Replace Penta Grout hose 800'	2021	8/31/2021	15,345	15,345	-
TVK136	Rehab - Schwalm	2023	11/30/2023	55,735	1,548	54,187
TVK136	TV Truck	2016	12/1/2016	191,947	191,947	-
TVK136	TV Truck - modifications	2017	11/30/2017	12,469	12,469	-
TVK136	Reel Repairs & Upgrades	2018	5/1/2018	12,875	12,875	-
TVK137	Capital Repair	2023	11/30/2023	19,541	407	19,134
TVK137	TV Truck	2016	12/1/2016	191,947	191,947	-
TVK139	Adding Schwalm Equipment to Truck	2023	11/30/2023	112,057	3,113	108,945
TVK139	Add Safety supplies in Truck	2018	11/1/2018	18,292	18,292	-
TVK139	Add Truck bed	2018	12/1/2018	7,242	7,242	-
TVK139	TV Truck	2018	5/1/2018	108,242	108,242	-
TVK140	TV Truck	2019	10/31/2019	141,720	118,100	23,620
TVK141	TV Truck	2022	11/30/2022	160,190	37,378	122,812
TVK142	TV Truck	2022	11/30/2022	107,981	25,196	82,786
TVK142	Capital Repair	2023	10/31/2023	11,392	380	11,012
TVK143	TV Truck	2023	11/30/2023	573,710	5,122	568,588
TVK143	TV Truck	2022	4/22/2022	51,912	15,574	36,338
TVK143	TV Truck - Truck Body	2022	5/20/2022	13,869	4,161	9,709
TVK144	TV Truck	2022	11/30/2022	626,074	85,563	540,511
TVK145	TVK145 - Build	2023	7/1/2023	469,170	36,561	432,609
TVK146	TV Truck - Aries/IBG	2023	11/30/2023	201,828	3,364	198,464
TVK146	Aries Component parts	2023	5/26/2023	93,735	1,562	92,173
TVK148	TV Truck	2023	2/23/2023	59,006	8,851	50,155
TVK148	TV Truck - TVK116 Rehab & TVK148 New Build	2023	7/1/2023	39,817	3,982	35,836
TVK148	TV Additions to TV Truck	2013	12/1/2013	3,485	3,485	-
TVK148	Underhood Air Compressor	2014	1/1/2014	10,569	10,569	-
TVK148	TV TRUCK-BOX TRUCK	2012	6/12/2012	21,296	21,296	-
TVK148	Diesel Generator and warranty	2012	6/22/2012	10,729	10,729	-
TVK148	TV TRUCK-BOX TRUCK - capital repair	2013	6/1/2013	5,242	5,242	-
TVK148	TV Truck Built in Shop	2012	8/1/2012	30,987	30,987	-
TVK149	TV Truck - ARIES/IST	2023	11/30/2023	43,563	726	42,837

TVK149	TV Truck - ARIES/IST	2023	2/23/2023	59,006	8,851	50,155
TVK150	TV Truck	2023	7/1/2023	393,868	29,540	364,328
TVK151	TV Truck - Aries	2023	10/10/2023	520,098	19,504	500,595
TVR103	Capital Repair - Replace axles and tongue	2023	4/30/2023	10,321	2,580	7,741
TVR103	2009 Trailerman (Inversion Trailer)	2010	7/1/2009	37,124	37,124	-
TVR107	Capital Repair - replace and add tool boxes and storage	2023	6/1/2023	8,566	1,666	6,900
TVR107	Tool Trailer w/375-cfm	2013	10/29/2013	4,376	4,376	-
UNR101	20' UNLOADING TRAILER (9,500 LBS)	2017	5/31/2017	25,244	21,001	4,243
UNR102	20' Unloading Trailer	2018	12/1/2018	58,982	58,982	-
UNR103	20' Unloading Trailer (9,500 LBS)	2018	12/1/2018	58,982	58,982	-
UNR104	Utility Trailer	2020	3/31/2020	35,963	27,571	8,391
UNR104	Utility Trailer	2020	5/31/2020	19,619	14,060	5,559
UTR103	Trailerman CST7020N14	2013	7/21/2009	4,282	4,282	-
UTR105	82"x20' Gravity Tilt Utility Trailer-1DGRS2025AM088980	2015	5/5/2010	4,895	4,895	-
UTR107	2007 C&B Flatbed	2011	3/23/2011	600	600	-
UTR110	Move to CIPP Central	2017	7/5/2011	4,995	4,995	-
UTR113	Flatbed EZ Loader Trailer 20'	2012	11/3/2011	5,182	5,182	-
UTR118	Trailer - Flatbed 20'	2013	8/3/2013	2,916	2,916	-
UTR123	Flatbed Trailer 22'	2014	12/15/2014	10,365	10,365	-
UTR123	Tax on Flatbed Trailer	2015	1/6/2015	852	852	-
UTR124	Layflat Trailer - Downpayment	2015	5/19/2015	2,815	2,815	-
UTR125	Flatbed Trailer 13.5' w/ACR154	2015	7/6/2015	4,243	4,243	-
UTR126	Flatbed Trailer 13.5' w/ACR118	2015	7/6/2015	4,243	4,243	-
UTR127	Flatbed Trailer 12'	2015	7/6/2015	4,243	4,243	-
UTR128	Flatbed Trailer 13.5' w/ACR***	2015	7/6/2015	4,243	4,243	-
UTR130	Flatbed Trailer 13.5' w/ACR109	2015	7/6/2015	4,243	4,243	-
UTR130	Flatbed Trailer 13.5' w/ACR109 - Capital Repair	2021	10/31/2021	3,084	3,084	-
UTR131	Flatbed Trailer 13.5' w/ACR***	2015	7/6/2015	4,243	4,243	-
UTR132	Flatbed Trailer 13.5' w/ACR106	2015	7/6/2015	4,243	4,243	-
UTR133	Flatbed Trailer 13.5' w/ACR***	2015	7/6/2015	4,243	4,243	-
UTR135	Flatbed Trailer 13.5' w/ACR131	2015	7/6/2015	4,405	4,405	-
UTR147	2009 Trailerman (Inversion Trailer)	2010	7/1/2009	61,238	61,238	-
UTR153	Utility Trailer 20'	2018	3/16/2018	4,869	4,869	-
UTR153	Utility Trailer 20' MODOR Licensing	2018	3/16/2018	430	430	-
UTR155	Utility Trailer 20'	2019	3/29/2019	5,052	5,052	-
UTR158	Utility Trailer 20'	2019	12/11/2019	5,999	5,999	-
UTR159	Utility Trailer 16'	2019	12/13/2019	4,200	4,200	-
UTR160	Utility Trailer	2019	10/7/2019	11,377	11,377	-
UTR162	Utility Trailer 24'	2021	6/25/2020	16,500	16,500	-
UTR165	Utility Trailer 24'	2020	6/23/2020	8,445	8,445	-
UTR166	Utility Trailer 10'	2020	6/23/2020	2,100	2,100	-
UTR167	Utility Trailer 20'	2020	6/23/2020	6,745	6,745	-
UTR168	Utility Trailer 16'	2020	6/23/2020	3,595	3,595	-
UTR169	Utility Trailer 22'	2021	1/13/2021	6,433	6,254	179
UTR177	Utility Trailer 22'	2022	10/6/2022	15,910	6,629	9,281
UTR178	Flatbed Trailer 14' w/ACR196	2023	1/17/2023	6,932	2,310	4,621
UTR179	Flatbed Trailer 14' w/ACR207	2023	1/17/2023	6,932	2,310	4,621
UTR179	Capital Repair - This is a inversion trailer for water shots. Cost is for layflat that is permanantly installed on trailer	2023	4/30/2023	9,386	2,347	7,040
UTR180	Utility Trailer 17'	2023	1/17/2023	12,096	4,032	8,064
UTR181	Utility Trailer 16'	2023	1/17/2023	11,560	3,853	7,706
UTR182	Utility Trailer 16'	2023	1/17/2023	11,519	3,840	7,679
UTR183	Utility Trailer 18'	2023	2/3/2023	6,300	1,400	4,900
UTR184	Utility Trailer 18' - WATER INVERSION TRAILER	2023	2/3/2023	6,300	1,575	4,725
UTR191	Utility Trailer 20' - FOR FUSION MACHINE	2023	5/12/2023	15,000	2,917	12,083
UTR192	Utility Trailer 20' - SIOUX BOILER TRAILER	2023	5/23/2023	9,456	1,839	7,617
UTR196	Utility Trailer 16'	2023	11/8/2023	20,152	560	19,592
UTR197	Utility Trailer 16'	2023	11/8/2023	20,152	560	19,592
UTR198	Utility Trailer 16'	2023	11/8/2023	20,152	560	19,592
UTR199	Utility Trailer 16'	2023	11/8/2023	20,152	560	19,592
UTR200	Utility Trailer 16' - Aluminum	2023	12/7/2023	8,147	226	7,921
UVK101	UV CURING SYSTEM TRUCK	2023	6/14/2023	148,424	17,316	131,108
UVK101	Curing System	2023	6/30/2023	1,012,414	25,310	987,103
WBR103	Capital Repair	2022	7/1/2022	11,616	5,808	5,808
WBR103	Trailmobile FTIT5JAJ 45Ft Hiboy- 1PTF71TS2S9019219	2010	2/2/2010	5,957	5,957	-
WBR103	Trailmobile FTIT5JAJ 45Ft Hiboy - capital repair	2013	6/1/2013	3,901	3,901	-
WBR103	Trailmobile FTIT5JAJ 45Ft Hiboy - capital repair	2013	8/31/2013	7,054	7,054	-
WBR103	Captial Repair - New Burner, Electrical Control Panel & Rewire	2020	3/23/2020	26,250	26,250	-
WBR103	Capital Repair - Rewire Control panel and controls	2020	5/31/2020	9,446	9,446	-
WBR104	Capital Repair - Replace boiler hoses	2023	7/1/2023	12,390	1,721	10,669
WBR104	Capital Repair	2023	11/30/2023	28,735	599	28,137
WBR104	Water Boiler Trailer- CEW - 14MBTU (350HP w/IC Burner)	2013	8/31/2013	123,507	123,507	-
WBR106	Capital Repair - Replace boiler tubes	2023	3/31/2023	13,967	3,492	10,475
WBR106	Capital Repair	2015	7/31/2015	18,691	18,691	-
WBR106	Split WBR101 into WBR106 & WBR107	2015	7/31/2015	203,481	203,481	-
WBR106	Kraftsman Trailer - Downpayment	2014	10/20/2014	10,000	10,000	-
WBR106	Kraftsman Trailer - remaining pymt	2015	2/1/2015	19,005	19,005	-
WBR106	Replace Boiler Hoses	2018	11/1/2018	5,872	5,872	-
WBR106	Rewire Boiler and all Controls	2018	3/31/2018	12,934	12,934	-
WBR106	Water Boiler Trailer - WILLIAMS AND DAVIS / WEBSTER - Capital Repair - Replace Tubes & Louvers on Boiler	2021	11/30/2021	13,064	13,064	-
WBR107	Capital Repair - Repipe Units & Controls	2022	2/1/2022	8,403	7,703	700
WBR107	Capital Repair - Replace boiler	2022	5/1/2022	71,647	39,804	31,843
WBR107	WBR107 Boiler Swap	2022	6/30/2022	42,151	22,247	19,905
WBR107	Capital Repair	2015	7/31/2015	18,691	18,691	-
WBR107	Split WBR101 into WBR106 & WBR107	2015	7/31/2015	203,481	203,481	-
WBR107	Kraftsman Trailer - Downpayment	2014	10/20/2014	10,000	10,000	-

WBR107	Kraftsman Trailer - remaining pymt	2015	2/1/2015	19,005	19,005	-
WBR107	Capitalize M&R	2019	2/28/2019	2,548	2,548	-
WBR107	Capital Repair - New Tubes, Fix Pipes & Gunite	2019	3/1/2019	33,209	33,209	-
WBR107	Capitalize - Boiler tubes & heater repair	2019	3/31/2019	36,180	36,180	-
WBR107	Upgrade wiring and controls	2018	4/30/2018	15,301	15,301	-
WBR107	weld boiler tubes to tube sheet	2019	5/31/2019	3,747	3,747	-
WBR108	Water Boiler Trailer	2016	11/30/2016	142,914	142,914	-
WBR108	Captial Repair - Replace Blower Motor & Rewire	2020	4/1/2020	8,091	8,091	-
WBR109	Capital Repair - Update Controlls	2022	10/31/2022	6,704	3,923	2,782
WBR109	Shop Build - Flatbed Trailer	2017	7/1/2017	7,159	7,159	-
WBR109	Added Boiler Hose	2018	3/31/2018	10,698	10,698	-
WBR109	Replace Broken Bonnett on Boiler & fuel Nozzles	2019	7/1/2017	6,782	6,782	-
WBR109	Shop Build - Flatbed Trailer	2017	12/15/2017	6,285	6,285	-
WBR109	Water Boiler Trailer -	2017	5/1/2017	77,573	77,573	-
WBR110	Water Boiler Trailer -	2020	3/31/2020	192,253	123,281	68,973
WBR111	Water Boiler Trailer - Pacific Region WBR111	2020	11/1/2020	359,621	125,325	234,296
WBR111	Capital Repair - Reseal tubes to boiler sheet	2023	3/31/2023	15,975	3,994	11,981
WBR112	Capital Repair - Replace Controller	2022	2/1/2022	5,765	3,523	2,242
WBR112	Capital Repair - replace honewell, replace gas line	2022	3/31/2022	6,418	3,744	2,674
WBR112	Water Boiler Trailer - HURST / POWERFLAME NOVA PLUS	2021	7/31/2021	232,957	75,447	157,510
WBR113	Water Boiler Trailer - HURST / POWERFLAME	2023	11/30/2023	281,293	3,516	277,777
WBR114	Water Boiler Trailer - HURST / POWERFLAME	2023	11/30/2023	281,293	3,516	277,777
WSR101	Wet-Out Storage Racks	2012	11/1/2012	10,410	10,410	-
	Aries TV Truck Components (equip for 2 trucks)	2023	7/28/2023	173,664	-	173,664
	Kraftsman Dwnpymt & Final Pymt - 2 Trailers	2023	8/23/2023	101,058	-	101,058
	Sioux Stam Boilers x3 Downpymt	2023	10/6/2023	192,442	-	192,442
	Peterbilt Tractors & Chasis	2023	11/20/2023	651,178	-	651,178
TVK147	TV Truck - Build	2023	12/31/2023	252,859	-	252,859
	Sioux Boiler Build	2023	12/31/2023	110,424	-	110,424
BSK136	Steam Boiler - Build	2023	12/31/2023	213,073	-	213,073
BSK136	Steam Boiler - Build	2023	12/31/2023	174,411	-	174,411
				75,276,261	**43,120,240**	**32,156,021**

Cured-In-Place Pipe (CIPP) Wall Thickness Design and Hydraulic Capacity Calculations

Project: Sewer System Maintenance Services
Location: Livonia, MI
Owner: City of Livonia
Line Segment(s): 8 Inch FD, 1/2 GW
MH Depth: 20' to the invert — 20

Minimum Thickness: 4.0 mm
Nominal Thickness: 4.5 mm

Design Assumptions: — Shaded cells are user-defined

Condition of host pipe		FD	PD = partially deteriorated, FD = fully deteriorated
Inside diameter of host pipe (in)	D =	8	
Ovality of host pipe (%)	q =	2.0	Default value is 2%; range = 0%-10%
Slope of host pipe (ft/ft)	S =	0.003	
Host pipe Manning's roughness (dimensionless)	n_l =	0.013	varies from 0.013-0.030 (dependent on existing pipe material, geometry, diameter and condition)
CIPP Manning's roughness (dimensionless)	n_f =	0.010	varies from 0.009-0.013
Constrained soil modulus of native soil in the pipe zone (psi)	M_{sn} =	1,000	See table below for recommended values

From Table 5.6 of *AWWA Manual of Water Practices M45, Second Edition*

Granular Native Soils		Cohesive Native Soils: Unconfined compressive strength (q_u)		Cohesive Native Soils: Description	M_{sn}	
Blows/ft (per ASTM D1586)	Description	tons/sf	kPa		psi	kPa
> 0 - 1	very, very loose	> 0 - 0.125	0 - 13	very, very soft	50	0.3
1 - 2	very loose	0.125 - 0.25	13 - 25	very soft	200	1.4
2 - 4		0.25 - 0.50	25 - 50	soft	700	4.8
4 - 8	loose	0.50 - 1.0	50 - 100	medium	1,500	10.3
8 - 15	slightly compact	1.0 - 2.0	100 - 200	stiff	3,000	20.7
15 - 30	compact	2.0 - 4.0	200 - 400	very stiff	5,000	34.5
30 - 50	dense	4.0 - 6.0	400 - 600	hard	10,000	69.0
> 50	very dense	> 6.0	> 600	very hard	20,000	138.0

Flexural modulus of Eelasticity of CIPP, initial (psi)	E =	400,000	Minimum value is 250,000 psi per ASTM F1216
Long-term retention of mechanical properties (%)		50%	Default value is 50%
Flexural modulus of elasticity of CIPP, long-term (psi)	E_L=	200,000	Determined from long-term retention %
Design safety factor	N =	2	Default value is 2.0
Unit weight of soil (pcf)	δ_s =	120	Applies to fully deteriorated designs only
Unit weight of water (pcf)	δ_w =	62.4	
Depth of cover (ft)	H =	19.33	Measured from ground surface to top of pipe
Height of groundwater (ft)	H_w =	9.67	Measured from top of pipe; **Note: If water table is below top of pipe, input a negative number!**
Internal vacuum pressure (psi)	P_v =	0.0	Default value is 0
Internal pressure (psi)	P =	0.0	Pressure pipe applications only! If no pressure, input 0
Diameter of hole or opening in original pipe wall (in)	d =	0.0	Pressure pipe applications only! If no pressure, input 0
Poisson's ratio of CIPP	ν =	0.30	Average value for CIPP per ASTM F1216
Flexural strength of CIPP, initial (psi)	σ_I=	4,500	Minimum value is 4,500 psi per ASTM F1216
Flexural strength of CIPP, long-term (psi)	σ_L=	2,250	Determined from long-term retention %
Tensile strength of CIPP, initial (psi)	σ_T=	3,000	Pressure pipe applications only!
Tensile strength of CIPP, long-term (psi)	σ_{TL}=	1,500	Determined from long-term retention %
Enhancement factor (dimensionless)	K =	7.0	Minimum value recommended per ASTM F1216
Surface live loading condition		HS20	HS20, HS25,HL93, E80 or airport
Live load calculation method		AASHTO	Select AASHTO or AWWA

HS20 Calculations as per AASTHO, Seventh Edition, 2014 (Highway Loads)

For live load distribution transverse to culvert spans, the wheel/axle load interaction depth $H_{int\text{-}t}$ shall be determined as:

$$H_{int\text{-}t} = \frac{s_w - \frac{w_t}{12} - \frac{0.06 D_i}{12}}{LLDF} \qquad (3.6.1.2.6b\text{-}1)$$

in which:

- where $H < H_{int\text{-}t}$:

$$w_w = \frac{w_t}{12} + LLDF(H) + 0.06\frac{D_i}{12} \qquad (3.6.1.2.6b\text{-}2)$$

- where $H \geq H_{int\text{-}t}$:

$$w_w = \frac{w_t}{12} + s_w + LLDF(H) + 0.06\frac{D_i}{12} \qquad (3.6.1.2.6b\text{-}3)$$

For live load distribution parallel to culvert span, the wheel/axle load interaction depth $H_{int\text{-}p}$ shall be determined as:

$$H_{int\text{-}p} = \frac{s_a - \frac{l_t}{12}}{LLDF} \qquad (3.6.1.2.6b\text{-}4)$$

in which:

- where $H < H_{int\text{-}p}$:

$$l_w = \frac{l_t}{12} + LLDF(H) \qquad (3.6.1.2.6b\text{-}5)$$

- where $H \geq H_{int}$:

$$l_w = \frac{l_t}{12} + s_a + LLDF(H) \qquad (3.6.1.2.6b\text{-}6)$$

A_{LL} = rectangular area at depth H (ft²)
l_w = live load patch length at depth H (ft)
w_w = live load patch width at depth H (ft)
$H_{int\text{-}t}$ = wheel interaction depth transverse to culvert span (ft)
s_w = wheel spacing, 6.0 ft
w_t = tire patch width, 20 (in.)
D_i = inside diameter or clear span of the culvert (in.)
$LLDF$ = live load distribution factor as specified in Table 3.6.1.2.6a-1
H = depth of fill over culvert (ft)
$H_{int\text{-}p}$ = axle interaction depth parallel to culvert span (ft)
s_a = axle spacing (ft)
l_t = tire patch length, 10 (in.)

The rectangular area, A_{LL}, shall be determined as:

$$A_{LL} = l_w w_w \qquad (3.6.1.2.6a\text{-}1)$$

The live load vertical crown pressure shall be determined as:

$$P_L = \frac{P\left(1 + \frac{IM}{100}\right)(m)}{A_{LL}} \qquad (3.6.1.2.6b\text{-}7)$$

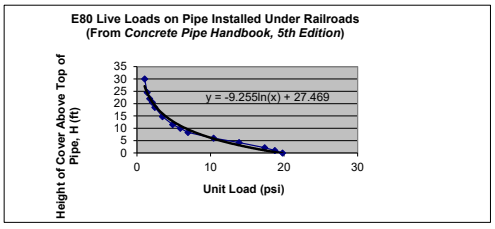
where:

P_L = live load vertical crown pressure (ksf)
P = live load applied at surface on all interacting wheels (kip)
IM = dynamic load allowance as specified in Article 3.6.2.2
m = multiple presence factor specified in Article 3.6.1.1.2
A_{LL} = rectangular area at depth H (ft²)

Load Type		HS20	
Inside dia of host pipe	D_i=	8.0	in
Tire patch width	w_t=	20.0	in
Tire patch length	l_t=	10.0	in
Wheel spacing	s_w=	6.0	ft
Axle spacing	l_w=	14.0	ft
Live Load Distribution factor	LLDF=	1.15	
Depth of fill over culvert	H=	19.33	ft
Wheel interaction depth - transverse	$H_{int\text{-}t}$=	3.7	ft
Live load patch width at depth H	w_w=	29.9	ft
Wheel interaction depth - parallel	H_{int_p}=	11.4	ft
Live load patch length at depth H	l_w=	37.1	ft
Rectengular area at depth H	A_{LL}=	1,109.8	sq. ft
Number of loaded lanes	n=	1.0	
Multiple presence factor	m=	1.2	
Dynamic load allowance	IM=	0.0	
Live load applied at surface (Total applied surface wheel load)	P=	64,000.0	lb
Live load vertical crown pressure	P_L=w_{LH}=	0.48	psi
Live load transferred to pipe at depth H (psi)	w_{LH} =	0.48	psi

E80 Calculations (Railway Loads)

E80 live load transferred to pipe at depth H (psi) | w_{LR} = 0.00 | from graph below



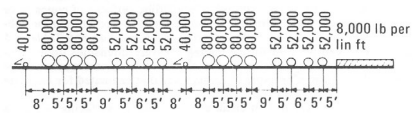
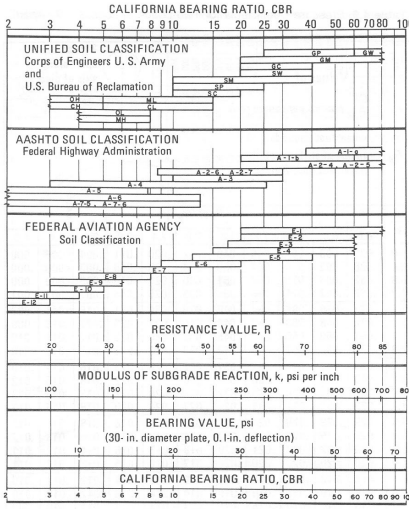


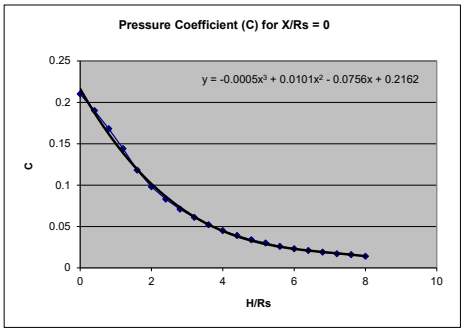
Figure 4.30. Spacing of Wheel Loads Per Axle for a Cooper E 80 Design Loading.

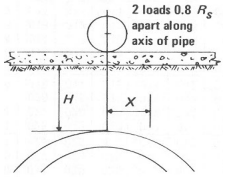
Airport Loads

Modulus of elasticity of concrete (psi)	E_c =	4,000,000	default value is 4,000,000
Poisson's ratio of concrete (dimensionless)	μ =	0.15	default value is 0.15
Modulus of subgrade reaction (lb/in^3)	k =	250	see adjacent figure
Thickness of concrete pavement (in)	h =	12	
Depth of cover, top of pipe to bottom of slab (ft)	H =	18.3	
Horizontal distance from pipe centerline (ft)	X =	0	assumed = 0 (worst case)
Radius of stiffness of the rigid pavement (ft)	R_s =	3.27	$R_s = \sqrt[4]{\frac{Eh^3}{12(1-\mu^2)k}}$
Wheel load (lbs)	P_{LA} =	90,000	



Worst-case loading scenario is for 2 loads spaced 0.8R_s apart and is calculated below.
For alternate loading conditions, see *Concrete Pipe Handbook, 5th Edition*





H/R_s = 5.615
C = 0.022

Airport live load transferred to pipe at depth H (psi) | w_{LA} = 0.00 | $w_{LA} = CP/R_s^2$

Wall Thickness Design

Partially Deteriorated Gravity Pipe Condition

Ovality reduction factor (dimensionless) | C = 0.84 | $C = \left(\frac{1-q/100}{[1+q/100]^2}\right)^3$

External hydrostatic pressure from groundwater (psi) | P_w = 4.48 | $P_w = \gamma_w (H_w + D/12)/144$

Minimum thickness required, hydrostatic buckling | t_1 = 0.12 in = 3.03 mm | $t_1 = \frac{D}{\left(\left[\frac{2\cdot K\cdot E_L\cdot C}{(1-\upsilon^2)\cdot N\cdot(P_w+P_V)}\right]^{1/3}+1\right)}$ | ASTM F1216, Equation X1.1

Minimum thickness required, ovality check | t_2 = 0.08 in = 2.05 mm | $1.5\cdot\frac{q}{100}\cdot\left(1+\frac{q}{100}\right)\cdot SDR^2 - 0.5\cdot\left(1+\frac{q}{100}\right)\cdot SDR - \frac{\sigma_L}{P\cdot N} = 0$ | ASTM F1216, Equation X1.2

SDR_2 = 99 | If P_w = 0, default SDR = 100

Quadratic factors for Eq. X1.2 used to solve for SDR_2 and t_2: a = 0.0306, b = -0.510, c = -251.241

Fully Deteriorated Gravity Pipe Condition

Total live load transferred to pipe at depth H (psi) = | W_s = 0.48 | From live load calculations

Water buoyancy factor (dimensionless) | R_w = 0.84 | $R_w = 1 - 0.33(H_w/H)$ (min. value = 0.67) | **Note: If H_w<0, use H_w = 0 in this calculation**

Total external pressure on pipe (psi) | q_t = 18.12 | $q_t = 0.433H_w + \delta_s HR_w/144 + W_s$ | **Note: If H_w<0, use H_w = 0 in this calculation**

Coefficient of elastic support (in-lb) | B' = 0.468 | $B' = 1/(1+4e^{-0.065H})$

Minimum thickness required, Luscher's buckling equation | t_3 = 0.16 in = 3.99 mm | $t = \left[\frac{(Nq_t)^2\cdot D^3\cdot 12}{32\cdot R_w\cdot B'\cdot M_{sx}\cdot E_L\cdot C}\right]^{1/3}$ | ASTM F1216, Equation X1.3

Minimum thickness required, pipe stiffness | t_4 = 0.11 in = 2.86 mm | $t = D/(E/0.093\cdot 12)^{1/3}$ | ASTM F1216, Equation X1.4

Partially Deteriorated Pressure Pipe Condition

Minimum thickness required to withstand internal pressure | t_{pr} = 0.00 in | $t_{pr} = D/([(D/d)^2\cdot(5.33\cdot\sigma_L/PN)]^{1/2}+1)$ | ASTM F1216, Equation X1.6

in spanning across any holes in the original pipe wall | d/D = 0.00 | If d/D > $1.83\cdot(t_{pr}/D)^{1/2}$, ASTM F1216, Equation X1.5, then liner is in ring tension or hoop stress

$1.83(t_{pr}/D)^{1/2}$ = 0.00 | and fully deteriorated pressure pipe condition applies (ASTM F1216, Equation X1.7)

Minimum thickness required by design check | t_{pr1} = 0.00 in = 0.00 mm

Fully Deteriorated Pressure Pipe Condition

Minimum thickness required to withstand all external loads and the full internal pressure | t_{pr2} = 0.00 in = 0.00 mm | $t_{pr2} = D/((2\cdot\sigma_{TL}/PN) + 2)$ | ASTM F1216, Equation X1.7

CIPP Wall Thickness Design Summary

Host pipe condition		Fully Deteriorated	
CIPP end use application		Gravity Flow	
CIPP outside diameter (host pipe inside diameter)	D =	8	in
Minimum CIPP thickness calculated	t_{calc} =	0.16 in = 3.99 mm	Greatest value calculated from ASTM F1216 Equations X1.1, X1.2, X1.3 and X1.4 (gravity flow) or greatest of X1.1, X1.2, X1.3, X1.4 and X1.7 (pressure pipe)
Minimum CIPP thickness recommended	t_{min} =	0.16 in = 3.99 mm	Based on a maximum SDR = 100
Nominal CIPP thickness to be supplied	t_{CIPP} =	4.5	mm Rounded up to the nearest 1.5 mm to reflect standard CIPP thicknesses supplied
	SDR_{CIPP} =	45	SDR = D/t Maximum recommended SDR for CIPP is 100 per ASTM F1216

Hydraulic Calculations

CIPP inside diameter (in)	D_f =	7.6	
Flow area of host pipe (ft^2)	A_l =	0.35	
Flow area of CIPP (ft^2)	A_f =	0.32	
Capacity of host pipe (cfs)	Q_l =	0.66	$Q = (1.486\cdot A\cdot R_H^{2/3}\cdot S^{1/2})/n$ (Manning's Equation)
Capacity of CIPP (cfs)	Q_f =	0.76	where R_H = hydraulic radius = D/4 for pipe flowing full
% increase/decrease in Flow Capacity	ΔQ =	15%	

December 11, 2023
File No.: 231206-SAK

SAK
864 Hoff Road
O'Fallon, MO 63366

Attention: Mr. Ryan Hogenmiller
Estimator

Subject: Mount Clemons Sewer Rehabilitation– CIPP Liner Thickness Design
Mount Clemons, MI

Mr. Hogenmiller,

As requested, we have reviewed the SAK calculations for the minimum thickness design of the cured-in-place pipe (CIPP) for the referenced rehabilitation project.

Our review was based on ASTM F1216-16, “Standard Practice for Rehabilitation of Existing Pipelines and Conduits by the Inversion and Curing of Resin Impregnated Tube – Gravity Pipe” and the following documents provided to us by your firm:

- SAK pipe design input values and calculated thickness prepared by SAK for the subject project.
- Project Specifications – AEW #0150-0593.

Design parameters provided by SAK and used in the analyses are presented in Table 1. We have assumed that the height of soil, groundwater depth, and soil modulus values supplied by the SAK for our calculations are correct. For live load, HS-20 vehicular loading was considered. A detailed sample calculation is presented in Attachment (1).

We have reviewed the specs, and the attached calculated minimum design thicknesses, as presented in Table 2, meet the requirements outlined in ASTM F1216-16 for Gravity Pipe. The design was performed once using the upstream manhole depth and was repeated using the downstream manhole depth, and the larger thickness obtained from both designs was used as the design thickness. The highlighted cells in Table 2 indicate that the soil cover depth at the upstream, or at downstream, or both is not known and the liner thickness at these locations may not be sufficient if the loading exceeds what the liner thickness can support. Table 2 also has the planned installation thickness.

The finished installed thickness must be equal to or thicker than the design minimum for the stated assumptions. We recommend that design assumptions and dimensions, such as depth of cover, height of water, and shape of pipe, be checked in the field during construction and that we be notified if any discrepancies are observed so that we can review the design accordingly.

It was assumed that the soil cover (be that existing or proposed) would exist before the CIPP installation. However, if the plan is to have the proposed grade constructed or modified using heavy construction equipment after CIPP installation, the contractor shall bring this to the designer’s attention as this will impact the design.

Table 1: CIPP Design Parameter Values

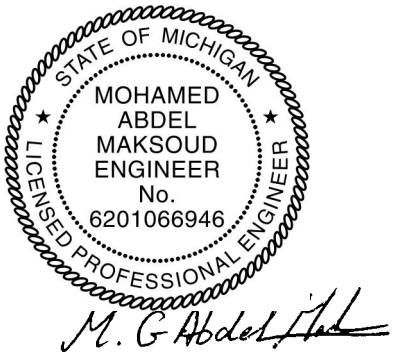
Design Parameter	Value
Pipe Condition	Fully Deteriorated
Calculation Method	ASTM F1216-16
Flexural Modulus (short-term)	400,000 psi
Flexural Strength (short-term	4,500 psi
Modulus Retention Factor	50%
Safety Factor	2.0
Groundwater Depth (ft)	Half of soil cover
Soil Density	120 pcf
Soil Modulus of Horizontal Reaction, E's	1000
K_u factor	0.13
Ovality	2%
Live Load	(AASHTO) HS20
K factor	7

Table 2: CIPP Minimum Design Thickness

Manholes		Soil Modulus	Host Diameter	Soil Depth to Invert (ft)		Minimum Design Thickness		Install Thickness	
Upstream	Downstream	(psi)	(in)	US	DS	(in)	(mm)	(in)	(mm)
M97-7-18-2	M97-7-18-1	1000	12	4.4	8.8	0.18	4.6	0.24	6
M97-7-18-1	M97-7-18	1000	12	8.5	N/A	0.17	4.3	0.24	6
M97-7-16-3	M97-7-16-2	1000	12	N/A	9	0.17	4.3	0.24	6
M97-7-16-2	M97-7-16-1	1000	12	9	9.3	0.17	4.3	0.24	6
M97-12-6	M97-12-5	1000	15	10.3	9.8	0.22	5.5	0.30	7.5
TP5-14-6	TP5-14-5	1000	12	N/A	N/A	N/A	N/A	0.24	6
TP5-1-1-3-9	TP5-1-1-3-8	1000	12	9.2	8.6	0.17	4.3	0.24	6
TP5-1-1-3-5	TP5-5-1-1-2	1000	18	9.3	9.1	0.25	6.4	0.35	9
TP5-1-1-4-5-1	TP5-1-1-4-5	1000	12	8.8	9	0.17	4.3	0.24	6
TP5-1-14-12	TP5-1-14-11	1000	18	10	12.2	0.27	7.0	0.35	9
TP5-1-14-11	TP5-1-14-10	1000	18	12.2	12	0.27	7.0	0.35	9
TP5-1-14-8	TP5-1-14-7	1000	18	9	13.5	0.29	7.3	0.35	9
TP5-1-14-7	TP5-1-14-6	1000	18	13.5	15.3	0.30	7.7	0.35	9
TP5-1-1-12-4	TP5-1-1-12-3	1000	12	N/A	N/A	N/A	N/A	0.24	6
TP5-1-1-12-3	TP5-1-1-12-1	1000	15	N/A	N/A	N/A	N/A	0.30	7.5
TP5-1-1-12-1	TP5-1-1-12	1000	15	N/A	N/A	N/A	N/A	0.30	7.5
TP5-1-1-3-2	TP5-1-1-3-1	1000	12	7.3	6.4	0.17	4.3	0.24	6
DPB2	DPB2-1	1000	12	4.8	4.9	0.17	4.4	0.24	6
TP5-1-1-0-10	TP5-1-1-0-9	1000	12	10	9.2	0.17	4.4	0.24	6
DPA10-2	DPA10-1	1000	12	N/A	N/A	N/A	N/A	0.24	6
TP24-2-3-6	TP24-2-3-5	1000	15	13.1	N/A	0.24	6.1	0.30	7.5

Note: Highlighted cells indicate that soil cover depth was not provided at the upstream or downstream manhole or not provided at both, and the thickness may not be sufficient.

We appreciate the opportunity to be of service to you on this project. Please call with any questions.



Sincerely,
TU GEOSTRUCTURAL, LLC
Mohamed Gamal, Ph.D., PE
Geo-Structure Engineer

Attachments –
Attachment (1) - Sample Design Calculations

ATTACHMENT 1

Sample CIPP Design Calculations Using ASTM F1216-16

GEOSTRUCTURAL

Liner Thickness Design using ASTM F1216-16
Circular Conduit – 18”

Soil Depth to Invert = 7.8 ft

Sewer Rehabilitation

Mount Clemons, MI

Prepared by:

TU GeoStructural LLC
Denver, CO

For

SAK

December 11, 2023

INPUT

Design Using ASTM F1216-16 Failure Criteria

Loading Parameters

Soil/Rock Height above top of pipe	=	$H_{sc} := 7.8 \cdot ft$
Water Depth Below Ground Surface	=	$d_w := 4.65 \cdot ft$

Pipe Geometry and Condition

Ovality (%)	=	$Ov := 2\%$ (Should be less than 10%)
Sewer Mean Diameter	=	$D_{mean} := 18 \cdot in$

Is the existing host fully or partially deteriorated:

◉ Fully Deteriorated or No Host ○ Partially Deteriorated

Liner Properties

Initial Liner Modulus	=	$E_{liner_i} := 400000 \cdot psi$
Flexural Strength (short Term)	=	$f_{flex_i} := 4500 \cdot psi$
Compression Strength (long term)	=	$f_{compression} := 8000 \cdot psi$
Tensile Strength (short term)	=	$f_{tensile_i} := 3000 \cdot psi$
Retention Factor for Flexural Modulus	=	$\varepsilon_{fm} := 50\%$
Retention Factor for Flexural Strength	=	$\varepsilon_{flex.} := 50\%$
Retention Factor for Tensile Strength	=	$\varepsilon_{t} := 50\%$
Factor of Safety	=	$FS := 2.0$
Allowable Deflection ratio	=	$\Delta\% := 5\%$ (typically 2% cementitious, 5% for CIPP)
Deflection used in ASTM F1216 for CIPP	=	$\Delta_{cipp\%} := 5\%$
Liner Poisson's Ratio	=	$\upsilon_{liner} := 0.3$

Ground Properties

Soil Modulus	=	$E_{soil} := 1000 \cdot psi$
Unit weight of fluid	=	$\gamma_{water} := 62.4 \cdot pcf$
Total Unit weight of soil	=	$\gamma_{soil} := 120 \cdot pcf$
Coefficient of Earth Pressure at Rest	=	$K_o := 0.5$
Confinement enhancement factor (Enhancement factor is only applicable for compression)	=	$K_e := 7.0$

INPUT

Long Term Liner Flexural Modulus = $E_{liner} := E_{liner_i} \cdot \varepsilon_{fm} = 200000\,psi$

Long Term Flexural Strength = $f_{flex} := \varepsilon_t \cdot f_{flex_i} = 2250\,psi$

Long Term Flexural Strength = $f_{tensile} := \varepsilon_{flex.} \cdot f_{tensile_i} = 1500\,psi$

Determine Traffic Induced Loading

Type of Traffic Loading

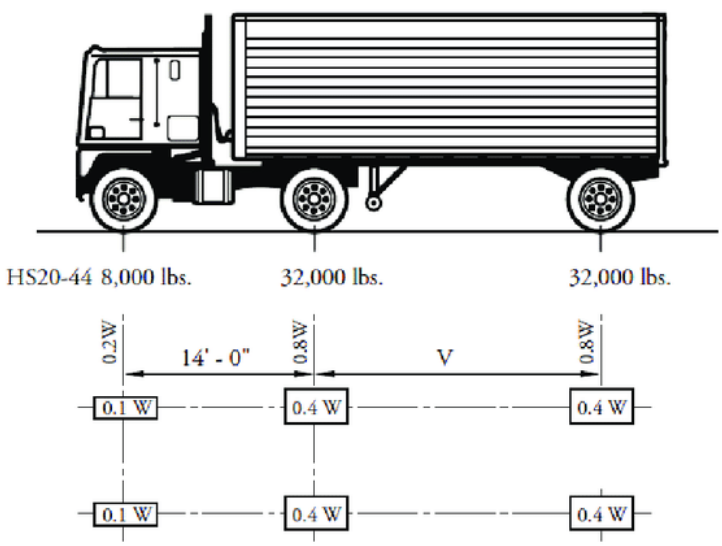
- (●) AASHTO HS-20 Or H-20
- ( ) AASHTO H-25 Or HS-25
- ( ) AASHTO HL-93
- ( ) Rail Road - E80

Stress Calculation Method

- (●) AASHTO Method (use for cover greater than 3 ft)
- ( ) AWWA Method (use for cover less than 3 ft
- ( ) Boussineseq Elastic Solution (for rail road loading)

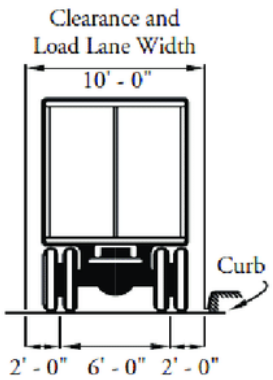
Inputs for HS-20 Truck Or HS-25

In the drawing below, the axle load becomes 40,000 lbs for HS-25 or H-25



W = Combined weight on the first two axles which is the same as for the corresponding H truck.

V = Variable spacing – 14 feet to 30 feet inclusive. Spacing to be used is that which produces maximum stresses.



half of axle load = $P_{wheel_each} := P_{axle} \div 2 = 16000 \cdot lbf$

Wheel spacing in transverse direction = $s_w := 6.0ft$ $\quad s_w = 1.829 \cdot m$

Axle spacing in longitudinal direction = $s_a := 14.0ft$ $\quad s_a = 4.267 \cdot m$

Tire contact width (transverse direction) = $w_t := 20.0in$ $\quad w_t = 0.508 \cdot m$

Tire Contact length in longitudinal direction = $l_t := 10.0in$ $\quad l_t = 254 \cdot mm$

Live load distribution factor = $LLDF := 1.15$

Multiple presence factor = $m_{Lane} := 1.2$

Wheel interaction depth in transverse direction = $H_{int_t} := \dfrac{(s_w - w_t - 0.06 \cdot D_{mean})}{LLDF} = 3.69 \cdot ft$

Let Impact Factor $\beta_{IF} := 33 \cdot \left(1 - 0.125 \cdot \dfrac{H_{sc}}{1ft}\right) \cdot 1\%$ (Should not be less than 1)

Wheel interaction depth in longitudinal direction = $H_{int_p} := (s_a - l_t) \div LLDF = 11.449 \cdot ft$

Tributary area width at top of buried pipe = $w_w := \begin{cases} w_t + LLDF \cdot H_{sc} + 0.06 \cdot D_{mean} + s_w & \text{if } H_{sc} \geq H_{int_t} \\ w_t + LLDF \cdot H_{sc} + 0.06 \cdot D_{mean} & \text{otherwise} \end{cases}$
(This is in transverse direction)

$w_w = 16.727 \cdot ft$ $\quad w_w = 16.727\,ft$

Tributary area length at top of buried pipe = $l_w := \begin{cases} l_t + LLDF \cdot H_{sc} + s_a & \text{if } H_{sc} \geq H_{int_p} \\ l_t + LLDF \cdot H_{sc} & \text{otherwise} \end{cases}$
(This is in longitudinal direction)

$l_w = 9.803 \cdot ft$ $\quad l_w = 9.803\,ft$

Dynamic load allowance= $IM := \begin{cases} \beta_{IF} & \text{if } \beta_{IF} \geq 0 \\ 0 & \text{otherwise} \end{cases}$ $\quad IM = 8.25 \times 10^{-3}$

Tributary area at the top of the buried pipe= $A_{LL} := w_w \cdot l_w = 163.977 \cdot ft^2$

Live load due to all interacting wheel= $P_{LL} := \begin{cases} P_{wheel_each} & \text{if } H_{sc} < H_{int_t} \\ 2 \cdot P_{wheel_each} & \text{if } H_{int_p} \geq H_{sc} \geq H_{int_t} \\ 4 \cdot P_{wheel_each} & \text{if } H_{sc} > H_{int_p} \end{cases}$

$P_{LL} = 32000 \cdot lbf$ $\quad P_{LL} = 142.343 \cdot kN$

Live load pressure at crown=

$$P_{surcharge_1} := \left(\frac{P_{LL}}{A_{LL}}\right)\cdot(1 + IM)\cdot m_{Lane} = 1.64\cdot psi$$

$P_{surcharge_1} = 1.6\cdot psi$ $\quad$ $P_{surcharge_1} = 11.3\cdot kPa$

Start Design Calculations Using ASTM F1216-16

Using The AASHTO Approach

For the HS-20 load, the induced pressure = $P_{surcharge} = 1.64\cdot psi$

Determine Different External Pressures Acting on Liner :

Let $N_{sf} := FS$

Let C_{ovrf} = Ovality reduction factor where:

$$C_{ovrf} := \left[\frac{(1 - Ov)}{(1 + Ov)^2}\right]^3 = 0.836$$

Water height above crown = $H_{wc} := H_{sc} - d_w = 3.15\,ft$ (Minimum is 0.0)

Water height above invert = $H_{wi} := H_{sc} - d_w + D_{mean} = 4.65\,ft$ (Minimum is 0.0)

Height of soil above crown = $H_{sc} = 7.8\,ft$

Determine Minimum Thickness Assuming Partially Deteriorated Case

Water buoyancy factor = $R_w := 1 - \frac{H_{wc}}{H_{sc}}\cdot 0.33 = 0.867$ (Minimum is 0.67)

Summary of Verified Variables Values

$H_{wc} = 3.15\,ft$ $H_{sc} = 7.8\,ft$ $H_{wi} = 4.65\,ft$ $R_w = 0.867$

Hydrostatic Load = $\gamma_{water} \cdot H_{wi}$ $P_{Hydrostatic} = 2.01\,psi$

Total load at invert including, water, soil and traffic load = $q_t = 8.64 \cdot psi$

Minimum thickness based on restrained buckling equation under hydrostatic pressures is given as

$$t_{liner_X1.1} := \frac{D_{mean}}{\left[\frac{2 \cdot K_e \cdot E_{liner} \cdot C_{ovrf}}{P_{Hydrostatic} \cdot N_{sf} \cdot \left(1 - \upsilon_{liner}^2\right)} \cdot \frac{\Delta\%}{\Delta_{cipp\%}}\right]^{.33333333} + 1} = 0.207 \cdot in$$

(Equation X1.1 - ASTM F1216)

Determine minimum thickness using the flexural strength under hydrostatic load

$$\frac{f_{flex}}{N_{sf} \cdot P_{Hydrostatic}} = \left[1.5 \cdot Ov \cdot (1 + Ov) \cdot \left(\frac{D_{mean}}{t_{liner_x1.2}}\right)^2 - 0.5 \cdot (1 + Ov) \cdot \left(\frac{D_{mean}}{t_{liner_x1.2}}\right)\right]$$

(Equation X1.2 - ASTM F1216)

$t_{liner_x1.2} = 0.125 \cdot in$

Determine the Thickness for Fully Deteriorated Case

Coefficient of elastic support = $B_{prime} := \left(\frac{1}{1 + 4 \cdot e^{-0.065 ft^{-1} \cdot H_{sc}}}\right) = 0.293$

$$q_t = \frac{1}{N_{sf}} \left(32 \cdot R_w \cdot B_{prime} \cdot E_{soil} \cdot C_{ovrf} \cdot \frac{E_{liner} \cdot t_{liner_X1.3}^3}{12 \cdot D_{mean}^3}\right)^{0.5}$$

(Equation X1.3 - ASTM F1216)

$$t_{liner_X1.3} := \left[\frac{\left[\left(q_t\right) \cdot N_{sf}\right]^{2.0} \cdot \left(12 \cdot D_{mean}^3\right)}{\left(32 \cdot R_w \cdot B_{prime} \cdot E_{soil} \cdot C_{ovrf} \cdot E_{liner}\right)} \cdot \frac{\Delta_{cipp\%}}{\Delta\%}\right]^{\frac{1}{3}} = 0.249 \cdot in$$

$$\frac{E_{liner_i} \cdot t_{liner_X1.4}^{3}}{12 \cdot D^{3}}$$ should be greater than 0.093 ***(Equation X1.4 - ASTM F1216)***

$$t_{liner_X1.4} := \left(\frac{0.093 \cdot D_{mean}^{3} \cdot 12}{E_{liner_i} \cdot 1 \cdot \frac{in^{2}}{lbf}} \cdot \frac{\Delta_{cipp\%}}{\Delta\%} \right)^{\frac{1}{3}} = 0.253 \cdot in$$ ***(Equation X1.4 - ASTM F1216)***

For Fully Deteriorated Condition the new liner is to support all soil, surcharge and hyrostatic loads

Design Thickness = $t_{design} = 6.4 \cdot mm$ $t_{design} = 0.25 \cdot in$

Flow Capacity Analysis

INPUT

Host Data

Slope = $S_sec := .00255$

Manning Coeff = $N_manning := 0.018$ (For old pipe)

INPUT

Perimeter = $P_{host} := \pi \cdot D_{mean} = 56.549 \cdot in$

Area = $A_{host} := \frac{\pi \cdot D_{mean}^2}{4} = 254.469 \cdot in^2$

Hydraulic Radius = $R_{host} := \frac{A_{host}}{P_{host}} = 0.375 \cdot ft$

Discharge = $Q_sec_host := \frac{1.486 \cdot \frac{ft}{sec}}{N_manning} \cdot A_{host} \cdot \left(\frac{R_{host}}{1 \cdot ft}\right)^{\frac{2}{3}} \cdot S_sec^{\frac{1}{2}} = 3.831 \cdot \frac{ft^3}{sec}$

INPUT

New Lined Pipe Data

Slope = $S_secL := .00255$

Manning Coeff (new liner = $N_manningL := 0.014$

INPUT

Area = $A_{new} := \pi \cdot \frac{\left(D_{mean} - 2 \cdot t_{design}\right)^2}{4} = 240.341 \cdot in^2$

Perimeter = $P_{new} := \pi \cdot \left(D_{mean} - 2 \cdot t_{design}\right) = 54.957 \cdot in$

Hydraulic Radius = $R_{new} := \frac{A_{new}}{P_{new}} = 0.364 \cdot ft$

Discharge = $Q_secLiner := \frac{1.486 \cdot \frac{ft}{sec}}{N_manningL} \cdot A_{new} \cdot \left(\frac{R_{new}}{1 \cdot ft}\right)^{\frac{2}{3}} \cdot S_secL^{\frac{1}{2}} = 4.564 \cdot \frac{ft^3}{sec}$

Ratio of newly lined conduit flow capacity to old liner = $Q_{ratio} := \frac{Q_secLiner}{Q_sec_host} = 1.19$

Design Summary:

Final Design Thickness	=	$t_{design} = 0.25 \cdot in$	$t_{design} = 6.44 \cdot mm$
Sewer Mean Diameter	=	$D_{mean} = 18 \cdot in$	
Traffic load	=	$P_{surcharge} = 1.64\,psi$	
Soil height above crown	=	$H_{sc} = 7.8\,ft$	
Water depth below ground surface	=	$d_w = 4.65 \cdot ft$	
Long term liner modulus	=	$E_{liner} = 200000\,psi$	
Soil modulus	=	$E_{soil} = 1000\,psi$	
flexural strength	=	$f_{flex} = 2250\,psi$	

Flow Capacity Analysis

Ratio of newly lined conduit flow capacity to old liner= $Q_{ratio} = 1.19$

USACE - Cahokia Heights SS Trunkline Rehab

Tentative Schedule

Activity	3/4/24					3/11/24					3/18/24					3/25/24					4/8/24					4/15/24					4/22/24					4/29/24					5/6/24					5/13/24					5/20/24				
	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F
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Cleaning and Televising																																																								
Liner manufacturing/video review																																																								
CIPP Lining																																																								
Clean-up and closeout																																																								

Activity	5/27/24					6/3/24					6/10/24					6/17/24					6/24/24					7/1/24					7/8/24					7/15/24					7/22/24					7/29/24					8/5/24				
	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F
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CIPP Lining																																																								
Clean-up and closeout																																																								

Activity	8/12/24					8/19/24					8/26/24					9/2/24					9/9/24					9/16/24					9/23/24					9/30/24					10/7/24					10/14/24					10/21/24				
	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F
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Activity	10/28/24					11/4/24					11/11/24					11/18/24					11/25/24					12/2/24					12/9/24					12/16/24					12/23/24					12/30/24					1/6/25				
	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F
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Clean-up and closeout																																																								

KCMO - N. Southern Rd. 54 Inch CIPP Tentative Schedule

Activity	11/20/23					11/27/23					12/4/23					12/11/23					12/18/23					12/25/23					1/1/24					1/8/24					1/15/24					1/22/24				
	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F
Excavations																																																		
Bypass Setup																																																		
Cleaning/CCTV																																																		
Bypass																																																		
Lead time for CIPP Liner																																																		
CIPP Installation																																																		
MH Rehab																																																		
Bypass Teardown																																																		
Restoration																																																		

Activity	1/29/24					2/5/24					2/12/24					2/19/24					2/26/24					3/4/24					3/11/24					3/18/24					3/25/24					4/1/24				
	M	T	W	T	F	M	T	W	T	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F	M	T	W	Th	F
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Restoration																																																		

Wyoming, MI - CIPP Lining - Tentative Schedule

Activity	3/4/24					3/11/24					3/18/24					4/1/24					4/8/24					4/15/24					4/22/24					4/29/24					5/6/24					5/13/24					5/20/24					5/27/24					6/3/24					6/10/24				
	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F	M	T	W	T	F
Cleaning and Televising																																																																											
Liner manufacturing/video review																																																																											
CIPP Lining																																																																											
Closeout																																																																											
Completion Date																																																																											

PACP CERTIFIED PERSONNEL

List of all PACP Certified Personnel

SAK EMPLOYEE	CERTIFICATE #	CERTIFICATE TYPE	EXPIRATION DATE
Lilly Ackerman	P0046547-032024	PACP/LACP/MACP	3/8/2027
Amir Alzer	P00056544-032024	PACP/LACP/MACP	3/8/2027
Jordan Anderson	P0040224-112022	PACP	11/22/2025
Zach Andrews	U-312-14904	PACP	6/29/2026
Marco Antonelli	U-0721-0402631	PACP/LACP/MACP	7/27/2024
Dylan Baggett	P0040225-112022	PACP	11/22/2025
Andrew Bartell	U-0817-07008957	PACP/LACP/MACP	10/5/2026
Leo Calvario	P0033913-092021	PACP/LACP/MACP	9/23/2024
Patrick Carpenter	P0043053-062023	PACP/LACP/MACP	6/17/2026
Dominic Decasper	U-0520-70309455	PACP/LACP/MACP	6/23/206
Sam Dickson	P00046540-032024	PACP/LACP/MACP	3/8/2027
Michelle Gabbitas	U-0721-70402478	PACP/LACP/MACP	7/12/2024
Ron Gaedke*	U-114-06019873	PACP	12/30/2024
Josh Grote	U-0120-70308112	PACP	7/7/2026
David Hill	T-505-133	PACP/LACP/MACP	4/5/2025
Kaitlyn Hill	U-1018-07006938	PACP/LACP/MACP	11/28/2025
Blake Kimball	P0040223-112022	PACP	11/22/2025
Levi Kurtovich	P0039185-092022	PACP/LACP/MACP	9/8/2025
Stephen Kruczyk	P0046552-032024	PACP/LACP/MACP	3/8/2027
Lou Krch*	U-407-4714	PACP	4/14/2025
Don Krupp*	U-512-15331	PACP	12/30/2024
Howard Linhart	U-0520-70309456	PACP/LACP/MACP	5/25/2026
Theodore Love	P0042717-052023	PACP/LACP/MACP	5/20/2026

SAK EMPLOYEE	CERTIFICATE #	CERTIFICATE TYPE	EXPIRATION DATE
Enrique Melgoza	P0033910-092021	PACP/LACP/MACP	9/23/2024
David Moon	P0040236-112022	PACP/LACP/MACP	11/23/2025
Noah Myers	P0042705-052023	PACP	5/19/2026
Brian Navarro	P0040227-112022	PACP	11/22/2025
Dallas Oleszkowicz*	U-0519-070305664	PACP/LACP/MACP	5/9/2025
Autin Preiss	P0046562-032024	PACP/LACP/MACP	3/8/2027
Nick Pryor	P0046539-032024	PACP/LACP/MACP	3/8/2027
Ajani Riley	P0040233-112022	PACP	11/23/2025
Edgardo Rivera	P0040852-012023	PACP/LACP/MACP	1/19/2026
Regan Roy	P0046543-032024	PACP/LACP/MACP	3/8/2027
Freddie Salimbangon	P0040229-12022	PACP	11/22/2025
Craigor Shaw	U-313-17309	PACP/LACP/MACP	8/28/2025
Kristen Shea	P0046550-032024	PACP/LACP/MACP	3/8/2027
Corey Siders	P0042707-052023	PACP/LACP/MACP	5/19/2026
Brandon Stangle*	U-512-15333	PACP	12/30/2024
Mike Stubbs	U-217-07005654	PACP	5/24/2024
Balazs Sturgeon	P0042712-052023	PACP	5/19/2026
Joe Wilson	P0042703-052023	PACP	5/19/2026
Dawn Young*	P0046558-032024	PACP/LACP/MACP	5/19/2026
Gabriel Cummings	P0046548-032024	PACP/LACP/MACP	3/8/2027
Ross Cummings	P0043743-082023	PACP	8/21/2026

Above are all the PACP, LACP and MACP certified personnel company-wide. All other certificates are available upon request.

APPENDIX F

PRODUCT QUALIFICATIONS

PIPENOLOGY™
Quality & Technology from the Inside Out

January 31, 2024

To Whom It May Concern,

This letter certifies that Pipenology, LLC is a wholly owned subsidiary of SAK Construction, LLC, and has been providing felt tubes for use in CIPP lining for more than 10 years.

SAK Construction, LLC is an approved installer of Pipenology, LLC CIPP liners and all other products manufactured by Pipenology, LLC. All crew members have been trained to properly install CIPP liners per Pipenology, LLC specifications.

Pipenology, LLC manufactures CIPP liners (felt tubes) meeting the material requirements of ASTM F1216-16 (paragraph 5.1) and ASTM F1743-17 (section 6) as well as the minimum strength requirements of ASTM D5813-04 (paragraph 6.1). Pipenology, LLC is an ISO 9001:2015 certified company.

Over 10 million feet of Pipenology, LLC multilayer CIPP liners in diameters of 6" to 84," approximately 33,500 manhole to manhole reaches and 23,200 lateral connection liners have been successfully installed nationwide. These liners are assembled using only components made in the USA.

Sincerely,

Paul J. Stus
General Manager – Pipenology, LLC

1449 Hoff Industrial Drive • O'Fallon, MO 63366 • (636) 542-6710 tel • (636) 542-6711 fax

PERRY JOHNSON REGISTRARS, INC.

Certificate of Registration

Perry Johnson Registrars, Inc., has audited the Quality Management System of:

Pipenology, LLC
864 Hoff Road, O'Fallon, MO 63366 United States

(Hereinafter called the Organization) and hereby declares that
Organization is in conformance with:

ISO 9001:2015

This Registration is in respect to the following scope:

The Manufacture of CIPP Liner

This Registration is granted subject to the system rules governing the Registration referred to above, and the Organization hereby covenants with the Assessment body duty to observe and comply with the said rules.

PERRY JOHNSON REGISTRARS, INC.

ANAB
ANSI National Accreditation Board
ACCREDITED
ISO/IEC 17021-1
MANAGEMENT SYSTEMS CERTIFICATION BODY

Terry Boboige, President

Perry Johnson Registrars, Inc. (PJR)
755 West Big Beaver Road, Suite 1340
Troy, Michigan 48084
(248) 358-3388

The validity of this certificate is dependent upon ongoing surveillance.

Effective Date:	Expiration Date:	Certificate No.:
February 8, 2023	February 7, 2026	C2023-00073

PIPENOLOGY™
Quality & Technology from the Inside Out

Cured-in-Place Pipe (CIPP) Tube Specification

1. Description:

A resin-impregnated flexible tube will produce a tight forming product within the host conduit. The resin is cured using either steam pressure or hot water under hydrostatic pressure. The Cured-In-Place Pipe (CIPP) will be continuous and permanently set within the host pipe.

2. Material:

As provided for in the American Society for Testing and Materials ASTM F1216 and/or ASTM F1743 the sewn tube shall:

2.1 Consist of one or more layers of flexible needled felt, or equivalent, woven or nonwoven materials.

2.2 Be manufactured to a size specified by the customer. Allowance should be made for circumferential stretching during inversion.

2.3 Have an outside layer that is coated with a plastic, flexible coating that will contain the resin and allow for inspection of resin saturation of the tube fabric.

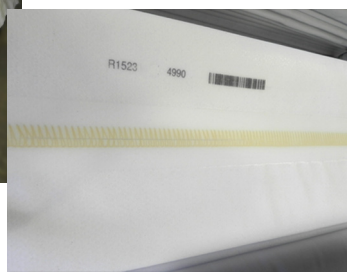
2.4 Have seams that are stronger than the non-seamed felt material.

The resin system, used in conjunction with the Pipenology tube, shall satisfy the requirements of ASTM F1216 and ASTM F1743 and shall produce a CIPP that will comply with the structural and chemical resistance requirements of the relevant ASTM standard.

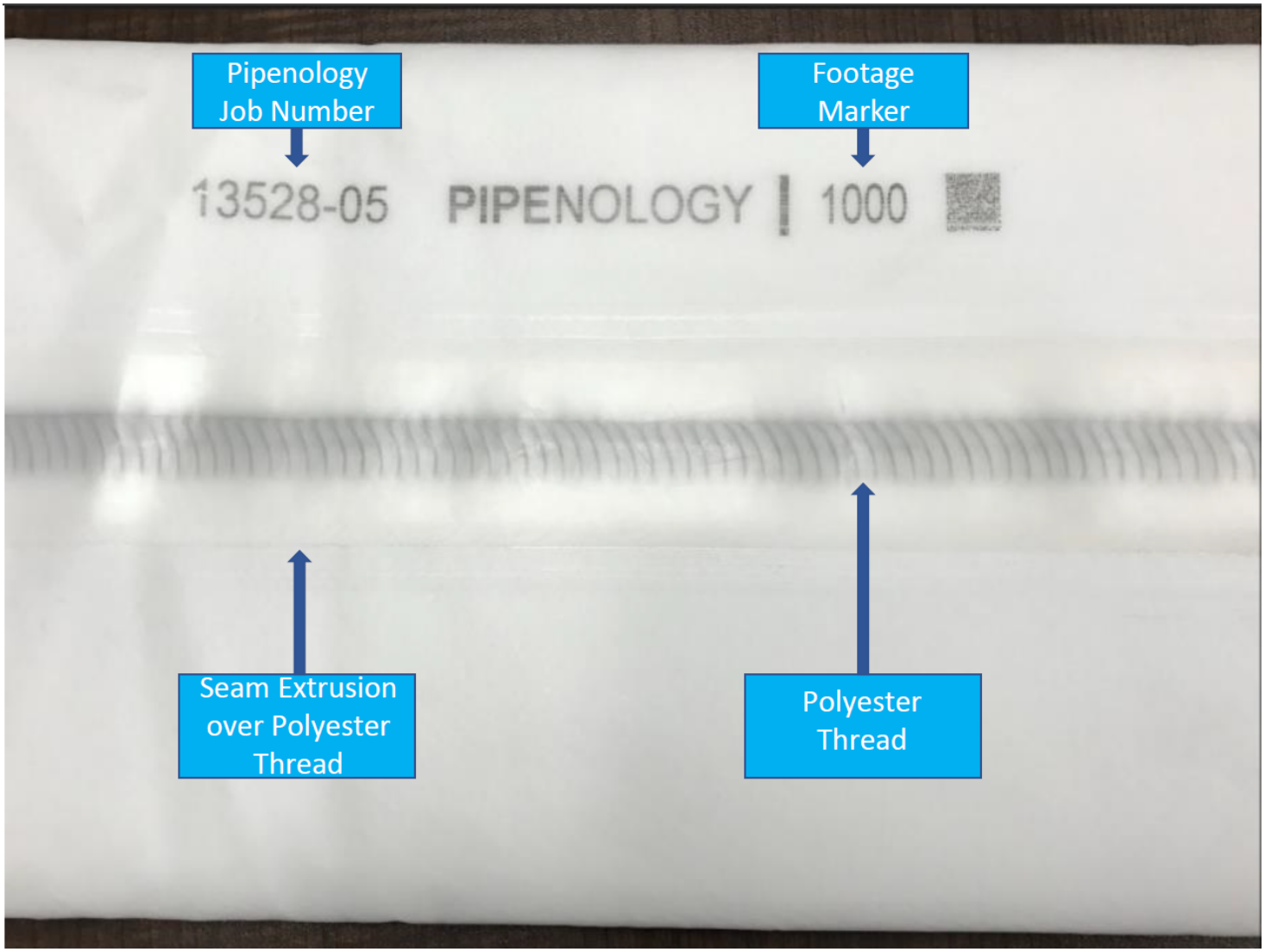
Installation, curing and cool down shall be performed consistent with ASTM F1216 and ASTM F1743.

3. Warranty:

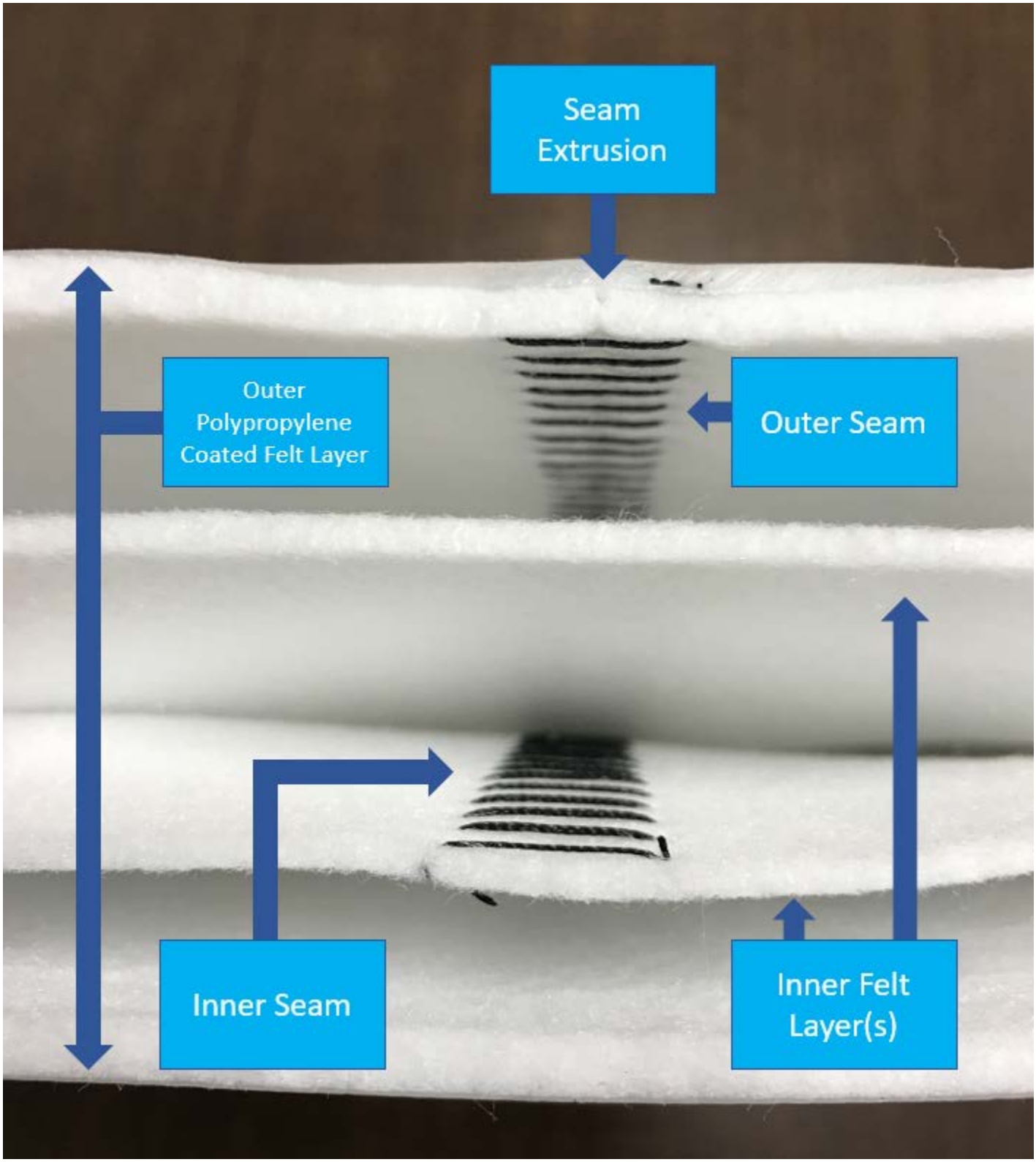
Pipenology extends no warranty, express or implied, as to the merchantability, fitness for a particular purpose or any other matter concerning the goods sold hereunder whether used alone or in combination with other products. Pipenology, LLC neither provides nor warrants design specifications.



LINER TOP VIEW DIAGRAM



LINER SIDE VIEW DIAGRAM



The number of inner felt layers is determined by the overall thickness of the requested liner

CIPP LINER

SAK CONSTRUCTION, LLC
864 Hoff Road
O'Fallon, MO 63366

WO# P-0246933
Report Date: 3/13/2024
Test Date: 3/11/2024
Page 1 of 1

Attention: Dawn Young

REPORT OF MECHANICAL TESTS

PROJECT: 23080, Mount Clemens, MI – 072303, 2023 Sewer Rehab

SAMPLE ID: Date Installed: 2/19/2024, Seg 14,13 / Shot 15
Upstream Manhole: TP5-1-14-6
Downstream Manhole: TP5-1-14-8, 21in x 12mm

SPECIFICATION: ASTM F1216-21 / ASTM F1743-21

METHOD: Flexural Properties per ASTM D790-17

TEST SPECIMEN: The specimens were conditioned and prepared in accordance with ASTM D618-21 and ASTM D5813-04(2018), respectively.

RESULTS:

Sample ID	Specimen #	Thickness Measurement (mm)	Maximum Flexural Strength (psi)	Tangent Modulus (psi)	Deflection @ Maximum Flexural Strength (inches)
Shot 15	1	12.95	6794.5	575295.9	1.034
	2	12.88	6638.3	604328.8	0.586
	3	12.90	6885.9	584615.4	1.261
	4	13.03	6162.2	577202.4	0.485
	5	12.95	7307.7	578090.2	1.083
	6	13.07	--	--	--
	7	12.90	--	--	--
	8	12.88	--	--	--
	Average	12.95	6757.7	583906.5	0.890

Karl Schmitz (Mar 13, 2024 15:35 CDT)

Karl Schmitz, Director
Materials Testing

KS/jlb

IIA Lab Services, LLC
2810 Clark Ave.
St. Louis, MO 63103
(314) 531-8080
industrial-ia.com

IIA Lab Services – St. Louis, warrants that the testing services provided herein have been performed, findings obtained and reports prepared in accordance with generally accepted testing laboratory principles and practices, subject to generally accepted margins of error for the instruments used in performing the tests. No other warranties are either expressed or implied. No opinions, conclusions or warranties are rendered by IIA Lab Services – St. Louis as to fitness of the sample for any particular purpose other than compliance with the specific code standards to the extent that such code standards are specifically set forth on the front of this report.

These tests were conducted in accordance with the standards and procedures specified. The analysis and/or tests have been made and report prepared, based upon results from specific samples identified and supplied by the client or their representatives. IIA Lab Services – St. Louis assumes no responsibility for, nor makes any warranties for any extrapolation of data from the test results and relating such test results to any batch, lot or material from which IIA Lab Services – St. Louis had no control of sample acquisition.

This report is furnished in strict confidence for the exclusive use of the client or their representative, and no distribution of all or part of the report shall be made to third parties without the prior written approval of the company or individual ordering the work. Official reports will be provided only by IIA Lab Services – St. Louis and will contain a watermark to certify authenticity. Revision or modification of these reports by anyone other than IIA Lab Services – St. Louis is prohibited. A hard copy will be provided on request, for a fee.

If during or after the performance of these tests it is necessary for IIA Lab Services – St. Louis to recreate reports, assemble materials, gather additional information, or perform other work with regard to these test results to assist in the preparation for any investigation, civil proceeding, or criminal action, regardless of who makes such a request or issues a subpoena, client shall reimburse Laboratory for out of pocket expenses incurred in relation to such work. Client further agrees to compensate Laboratory at a rate of $400.00 per hour for any such work which is required, including any time devoted to testifying in depositions, at hearings, or in court.

Only tests requested by the client are those that are set forth on the front of this report. There may be additional tests which could be performed on the sample but which client has not requested IIA Lab Services – St. Louis perform. Client releases and holds IIA Lab Services – St. Louis harmless for any damages which may have been discovered, avoided, or mitigated as a result of any additional testing not requested by client.

IIA Lab Services – St. Louis will dispose of samples 30 days after issuance of a formal report, unless specifically requested in writing by the client or their representative to return the samples to them. Samples may be stored at IIA Lab Services – St. Louis for an extended period of time, provided a written agreement incorporating monetary considerations is executed.

IIA Lab Services, LLC
2810 Clark Ave.
St. Louis, MO 63103
(314) 531-8080
industrial-ia.com

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2810 Clark Avenue • St. Louis, MO 63103-2574 • (314) 531-8080 • FAX (314) 531-8085

Chemical, Metallurgical, Mechanical, Nondestructive, Environmental Testing, Analyses and Field Service.

SAK CONSTRUCTION, LLC
864 Hoff Road
O'Fallon, MO 63366

November 30, 2022
WO# P-0197811a
Invoice No. INSTL26501

Attention: Nick Pryor

REPORT OF MECHANICAL TESTS

PROJECT: 21125, Ann Arbor, MI – 2020 & 2021 Sewer Lining Project

SAMPLE ID: Date Installed: 07/27/2022 Seg 38/Shot 106
Upstream Manhole: 71-71637, Downstream Manhole: 71-71395
8in x 6mm

SPECIFICATION: ASTM F1216-21 / ASTM F1743-21

METHOD: Flexural Properties per ASTM D790-17

TEST SPECIMEN: The specimens were conditioned and prepared in accordance with ASTM D618-21 and ASTM D5813-04(2018), respectively (using the full thickness of the submitted pipe).

RESULTS:

Sample ID	Specimen #	Thickness Measurement (mm)	Maximum Flexural Strength (psi)	Tangent Modulus (psi)	Deflection @ Maximum Flexural Strength (inches)
Shot 106	1	6.05	6398.1	401346.5	0.505
	2	6.02	6387.7	403747.2	0.716
	3	6.05	7634.9	462469.1	0.657
	4	6.02	7086.1	428525.9	0.743
	5	6.02	7249.6	462422.0	0.737
	6	6.02	--	--	--
	7	6.00	--	--	--
	8	6.03	--	--	--
	Average	6.02	6951.3	431702.1	0.672

Identification of tested specimen(s) provided by the client.

KS/mrh

Karl Schmitz, Director
Materials Testing

ACCREDITED
CERTIFICATE # 0397.01
CERTIFICATE # 0397.02

AN OFFICIAL COPY OF TEST REPORT WILL BE PROVIDED BY THIS LABORATORY ON REQUEST.
NOT OFFICIAL WITHOUT THE RAISED SEAL OF ST. LOUIS TESTING LABORATORIES, INC.
SEE REVERSE FOR CONDITIONS.

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SAK CONSTRUCTION, LLC
864 Hoff Road
O'Fallon, MO 63366

November 30, 2022
WO# P-0197811b
Invoice No. INSTL26501

Attention: Nick Pryor

REPORT OF MECHANICAL TESTS

PROJECT: 21125, Ann Arbor, MI – 2020 & 2021 Sewer Lining Project

SAMPLE ID: Date Installed: 09/01/2022 Seg 98/Shot 165
Upstream Manhole: 71-71763, Downstream Manhole: 71-71852
8in x 6mm

SPECIFICATION: ASTM F1216-21 / ASTM F1743-21

METHOD: Flexural Properties per ASTM D790-17

TEST SPECIMEN: The specimens were conditioned and prepared in accordance with ASTM D618-21 and ASTM D5813-04(2018), respectively (using the full thickness of the submitted pipe).

RESULTS:

Sample ID	Specimen #	Thickness Measurement (mm)	Maximum Flexural Strength (psi)	Tangent Modulus (psi)	Deflection @ Maximum Flexural Strength (inches)
Shot 165	1	5.59	6603.3	414257.5	0.683
	2	5.56	7061.0	441256.5	0.718
	3	5.66	6958.0	447448.4	0.717
	4	5.74	6632.2	412726.7	0.629
	5	5.72	6290.7	404586.1	0.620
	6	5.61	--	--	--
	7	5.57	--	--	--
	8	5.68	--	--	--
	Average	5.64	6709.0	424055.0	0.673

Identification of tested specimen(s) provided by the client.

KS/mrh

Karl Schmitz, Director
Materials Testing

ACCREDITED
CERTIFICATE # 0397.01
CERTIFICATE # 0397.02

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Chemical, Metallurgical, Mechanical, Nondestructive, Environmental Testing, Analyses and Field Service.

SAK CONSTRUCTION, LLC
864 Hoff Road
O'Fallon, MO 63366

November 30, 2022
WO# P-0197811e
Invoice No. INSTL26501

Attention: Nick Pryor

REPORT OF MECHANICAL TESTS

PROJECT: 21125, Ann Arbor, MI – 2020 & 2021 Sewer Lining Project

SAMPLE ID: Date Installed: 08/09/2022, Seg 270/Shot 41
Upstream Manhole: 71-69051, Downstream Manhole: 71-69108
8in x 6mm

SPECIFICATION: ASTM F1216-21 / ASTM F1743-21

METHOD: Flexural Properties per ASTM D790-17

TEST SPECIMEN: The specimens were conditioned and prepared in accordance with ASTM D618-21 and ASTM D5813-04(2018), respectively (using the full thickness of the submitted pipe).

RESULTS:

Sample ID	Specimen #	Thickness Measurement (mm)	Maximum Flexural Strength (psi)	Tangent Modulus (psi)	Deflection @ Maximum Flexural Strength (inches)
Shot 41	1	5.97	6790.2	422233.2	0.655
	2	5.84	6516.6	380937.7	0.673
	3	5.82	6482.5	380915.2	0.609
	4	5.74	6547.6	395902.4	0.825
	5	6.02	6794.1	421836.0	0.731
	6	5.87	--	--	--
	7	5.93	--	--	--
	8	5.77	--	--	--
	Average	5.87	6626.2	400364.9	0.699

Identification of tested specimen(s) provided by the client.

KS/mrh

Karl Schmitz, Director
Materials Testing

ACCREDITED
CERTIFICATE # 0397.01
CERTIFICATE # 0397.02

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Chemical, Metallurgical, Mechanical, Nondestructive, Environmental Testing, Analyses and Field Service.

SAK CONSTRUCTION, LLC
864 Hoff Road
O'Fallon, MO 63366

November 30, 2022
WO# P-0197811i
Invoice No. INSTL26501

Attention: Nick Pryor

REPORT OF MECHANICAL TESTS

PROJECT: 21125, Ann Arbor, MI – 2020 & 2021 Sewer Lining Project

SAMPLE ID: Date Installed: 08/29/2022, Seg 280/Shot 162
Upstream Manhole: 71-62284, Downstream Manhole: 71-62285
8in x 6mm

SPECIFICATION: ASTM F1216-21 / ASTM F1743-21

METHOD: Flexural Properties per ASTM D790-17

TEST SPECIMEN: The specimens were conditioned and prepared in accordance with ASTM D618-21 and ASTM D5813-04(2018), respectively (using the full thickness of the submitted pipe).

RESULTS:

Sample ID	Specimen #	Thickness Measurement (mm)	Maximum Flexural Strength (psi)	Tangent Modulus (psi)	Deflection @ Maximum Flexural Strength (inches)
Shot 162	1	5.89	6495.0	408390.5	0.649
	2	5.87	6051.2	400075.8	0.761
	3	5.94	6067.3	402779.6	0.634
	4	5.84	6384.7	419816.7	0.678
	5	5.87	6570.8	425839.5	0.701
	6	5.85	--	--	--
	7	5.91	--	--	--
	8	5.97	--	--	--
	Average	5.89	6313.8	411380.4	0.685

Identification of tested specimen(s) provided by the client.

KS/mrh

Karl Schmitz, Director
Materials Testing

ACCREDITED
CERTIFICATE # 0397.01
CERTIFICATE # 0397.02

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Chemical, Metallurgical, Mechanical, Nondestructive, Environmental Testing, Analyses and Field Service.

SAK CONSTRUCTION, LLC
864 Hoff Road
O'Fallon, MO 63366

WO# P-0211579
Report Date: 12/6/2023
Test Date: 12/5/2023

Attention: Brent Adams

REPORT OF MECHANICAL TESTS

PROJECT: 23070, Auburn Hills, MI – Pipeline Mgmt, Auburn Hills CIPP

SAMPLE ID: Date Installed: 08/02/2023, Shot 1, Seg 1
Upstream Manhole: 20J2-376C
Downstream Manhole: 20J2-375C, 10in x 6mm

SPECIFICATION: ASTM F1216-21 / ASTM F1743-21

METHOD: Flexural Properties per ASTM D790-17

TEST SPECIMEN: The specimens were conditioned and prepared in accordance with ASTM D618-21 and ASTM D5813-04(2018), respectively.

RESULTS:

Sample ID	Specimen #	Thickness Measurement (mm)	Maximum Flexural Strength (psi)	Tangent Modulus (psi)	Deflection @ Maximum Flexural Strength (inches)
Shot 1	1	6.10	6710.5	410731.2	0.723
	2	6.07	7250.9	454702.5	0.645
	3	6.10	7029.9	473011.5	0.707
	4	6.10	7124.4	471768.8	0.710
	5	6.10	6743.4	440029.2	0.769
	6	6.02	--	--	--
	7	6.10	--	--	--
	8	6.10	--	--	--
	Average	6.08	6971.8	450048.6	0.711

KS/mrh

Karl Schmitz, Director
Materials Testing

AN OFFICIAL COPY OF TEST REPORT WILL BE PROVIDED BY THIS LABORATORY ON REQUEST.
NOT OFFICIAL WITHOUT THE RAISED SEAL OF ST. LOUIS TESTING LABORATORIES, INC.
SEE REVERSE FOR CONDITIONS.

INTERPLASTIC CORPORATION
1225 Willow Lake Boulevard
Saint Paul, Minnesota 55110-5145
(651) 481-6860 Fax (651) 481-9836

December 6, 2016

Mr. Boyd Hirtz, Vice President
SAK LLC
864 Hoff Rd
O'Fallon, MO 63366

Dear Mr. Hirtz:

You have requested information on Interplastic Corporation cured-in-place pipe (CIPP) resins.

Interplastic Corporation has produced resins for the CIPP market for over twenty-five (25) years with over 1.5 billion pounds of resin sold to renovate deteriorated pipelines.

These resins are manufactured with 100% virgin raw materials. These resins meet all the requirements of ASTM F1216, D5813, and F1743 as well as having been testing per ASTM D2990. This resin meets all the corrosion requirements found in the above referenced ASTM documents.

SAK LLC and Pipenology LLC are certified installers of CIPP liners using these resins.

These products are designed for use in heat cured systems using either hot water or hot air.

Interplastic Corporation's manufacturing facilities are all ISO9001 certified.

I hope that this information meets your needs. We appreciate your continued interest in products from Interplastic Corporation. Please call me at 281-687-8617 if you have additional questions or comments.

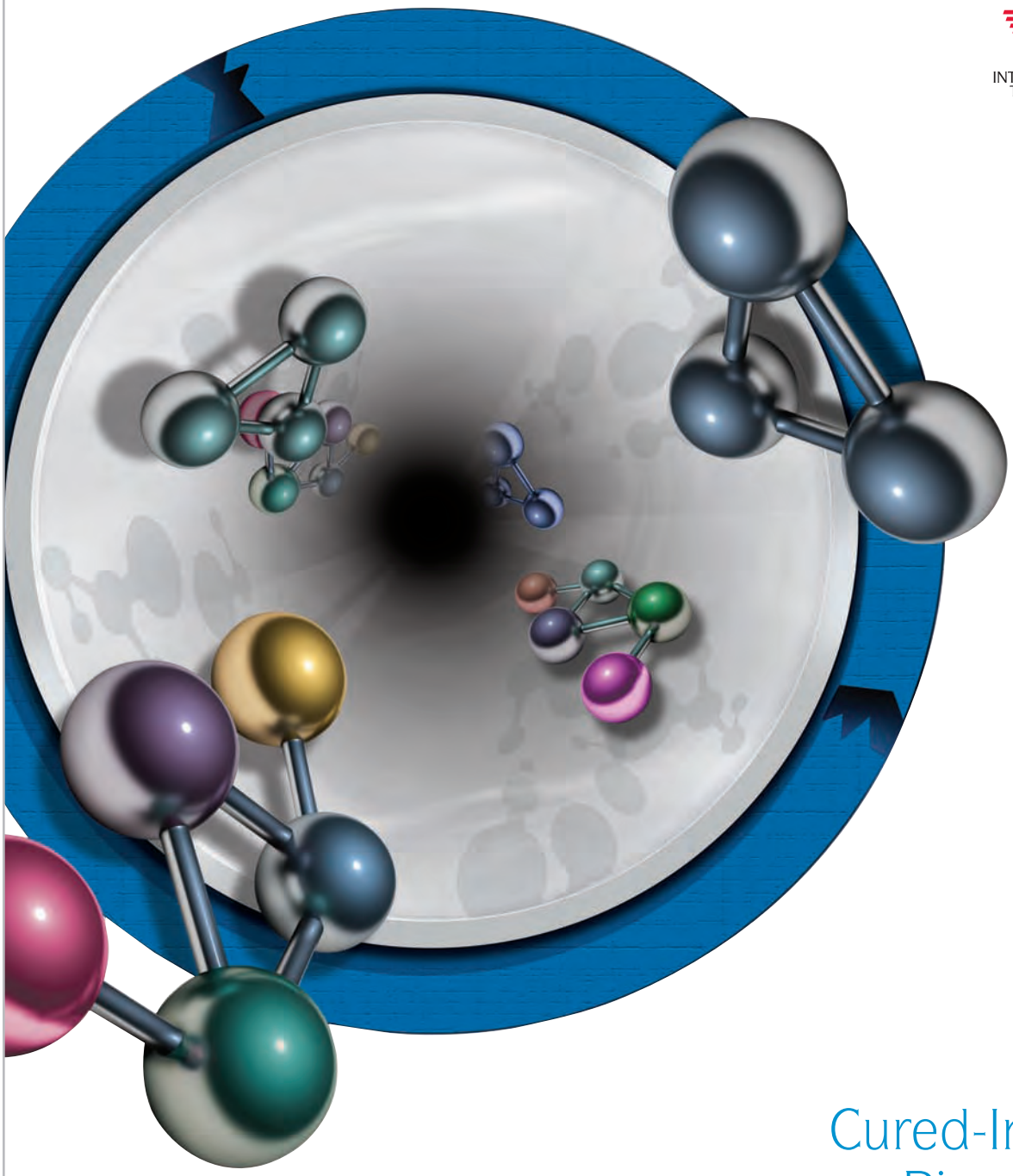
Sincerely,

Kaleel Rahaim

Kaleel Rahaim
Business Manager Remediation Polymers

Cc: Jason Schiro, Burt Beattie

INTERPLASTIC CORPORATION
Thermoset Resins Division



Cured-In-Place Pipe Resins

An Endless Flow of Experience and Innovation

Commitment

For over three decades CoREZYN® Cured-In-Place Pipe (CIPP) resins—from Interplastic Corporation—have been the leading choice of engineers and contractors. Our resins have helped restore thousands of storm water, sewer, culvert and industrial pipes throughout North America. Whether you're a municipal professional, an engineer or a CIPP contractor, we're dedicated to providing you with innovative solutions, a broad product line and support from expert field specialists—today and for decades to come.

The CIPP process provides a less intrusive method of pipeline remediation.The inversion tower (left) allows entry of the liner through a standard manhole.

The photographs below show various steps in the CIPP process, including wet-out, air removal in the liner and liner inversion into the deteriorated line.

Selection

For the broadest selection of high-quality products, you can count on the CoREZYN CIPP line. Our polyesters and vinyl esters cover the widest range of applications on the market today. Whichever product you choose, the CoREZYN brand is engineered to provide trouble-free installation and many years of reliable performance.

CIPP Resins — Filled vs. Unfilled

Filled Resins

- Generally higher-modulus properties
- More resistant to "slugging" in service connections
- More resistant to stress cracking
- Lower shrink
- Lower exotherm
- Better heat retention in laminate during cure
- Generally lower cost per pound

Unfilled Resins

- Generally higher-strength properties
- Less resin cost per linear foot of liner
- Faster liner wet-out, in some cases

Innovation

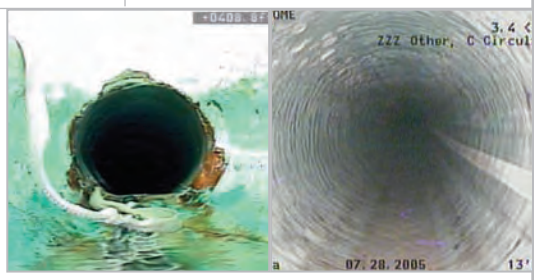
Innovation in resins is central to our culture. We're continually researching, developing and testing new resin technology. Our laboratory facilities use time-tested methods for determining corrosion resistance, flexural creep, physical properties, gel/cure properties and other characteristics. And if you have a unique situation, Interplastic is ready to develop a solution.

You see innovation in our CoREZYN® products. They're made with advanced stability properties to prevent premature gelation. They're designed to gel uniformly and cure thoroughly to minimize installation time. And the latest rheology technology minimizes resin seepage or migration up lateral service lines during installation.

CoREZYN vinyl ester products provide long-term resistance to corrosive fluids. With high flexural and tensile strength, they're the ideal solution for industrial waste lines, pressure pipes and sewers that handle both caustic and acidic materials.

The process can be completed night or day. Interplastic resin in the liner will help form a structurally sound, long-lasting new pipe.

Before and after photographs of a sewer line showing unacceptable inflow and infiltration, and a smooth surface compliant system.



Filled/Unfilled SELECTION GUIDE

Resin Number	Initiator System	Resin Type	Features and Benefits
COR72-AA-451	P/T	Unfilled CIPP	Lower viscosity for faster wet-out
COR72-AA-455HV	P/T	Unfilled CIPP	A reactive resin for faster cure
COR72-AT-470HT	P/T	Filled CIPP	Enhanced for higher physical properties
COR78-AT-329	P/T	Filled CIPP	Value resin for higher-volume projects
COR72-AA-433HV	T/T	Unfilled CIPP	Uses an all-liquid initiator system for ease in processing
COR72-AT-477	T/T	Filled CIPP	Uses an all-liquid initiator system for ease in processing
COR78-AT-330	T/T	Filled CIPP	Value resin for higher-volume projects – uses all-liquid initiator system for ease in processing
COR72-AA-456	Ambient	Unfilled CIPP	Ambient cure for fast processing of point repairs
COR72-AA-646	Ambient	Unfilled CIPP	Ambient cure for fast processing of point repairs
VE8190	P/T	Vinyl Ester	Meets "Green Book" standards for use in Los Angeles
VE8738	P/T	HT Vinyl Ester	Corrosion-resistant for more highly corrosive, high-temperature applications

P/T = Perkadox® 16, Trigonox® C or Trigonox 42S
T/T = Trigonox 121BB75, Trigonox 21OP50
Ambient = Benzoyl Peroxide, Dimethyl Aniline

The above resins meet the requirements for Cured-In-Place Pipe (CIPP) resins as found in ASTM F1216, D5813, F1743, and D2990. Please consult with your local Interplastic Corporation technical sales representative to discuss specific applications and product requirements.

INTERPLASTIC CORPORATION
Thermoset Resins Division

Cured-In-Place Pipe Resins

Our 40-year proven track record speaks for itself. Engineers and CIPP contractors depend on the CoREZYN® brand—consistent, competitively priced, reliable products for repairing partially or fully deteriorated pipes. You will benefit from our technical field-support specialists who'll help you select the right resin for long-term performance. For the experience and innovation your next CIPP project deserves, choose CoREZYN brand resins from Interplastic.

INTERPLASTIC CORPORATION

1225 Willow Lake Blvd., St. Paul, MN 55110-5145
800.736.5497 • 651.481.6860 • Fax: 651.481.9836
www.interplastic.com

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Printed in USA 12/06 B-052

Scholarships

Interplastic Thermoset Resins Division

Interplastic's Thermoset Resins Division is the leading manufacturer of unsaturated polyester, vinyl ester and specialty resins, gel coats, and colorants under the CoREZYN® and Silmar® brand names for the composites, cast polymer, and solid surface industries. All CoREZYN and Silmar products are sold direct and through our extensive network of Distributors in North America and around the world.

All Thermoset Resins Division manufacturing facilities and research and development laboratories are ISO 9001:2000 certified.

To find out more about CoREZYN, click here.

CoREZYN® INTERPLASTIC CORPORATION Thermoset Resins Division

To find out more about Silmar, click here.

SILMAR® INTERPLASTIC CORPORATION Thermoset Resins Division

Interplastic Corporation • 1225 Willow Lake Blvd., St. Paul, MN 55110 • 651.481.6860 • 1.800.736.5497 • Fax: 651.481.9836 • info@interplastic.com
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INTERPLASTIC CORPORATION

2015 Broadway Street Northeast
Minneapolis, MN 55413-1714
651.481.6860 Fax 612.331.4634

COR78-AT-579 Cured-in-Place Pipe Resin

This packet contains information typically required when submitting a resin designed for the CIPP process to a municipality. Included is the following information for COR78-AT-579:

- **Technical Data Sheet**
  - Includes product specifications
  - Includes typical physical properties of the resin
  - Includes typical physical properties of a felt impregnated composite
- **Fourier Transform Infrared (FTIR) Spectrum on the Liquid Resin**
- **Material Safety Data Sheet (MSDS)**
- **Corrosion Test Data**
  - A summary of the data as it relates to ASTMs D543, D5813, F1216, and F1743
  - Raw data for 1 month and 12 month testing performed by a third party test laboratory
- **ASTM D2990 Flexural Creep Modulus Data**

Any test results referenced as COR78-AT-5XX in this submittal package apply to a specific group of resins. The resins in this group are similar in design, and the referenced information is believed to apply equally to all resins within this group.

If additional information is required, or for any specific questions regarding this resin, please contact one of the following individuals:

Jason Schiro
CIPP Product Manager
651.757.3961 (office)
612.356.3343 (cell)
jschiro@interplastic.com

OR

Kaleel Rahaim
Business Manager-Remediation Polymers
281.687.8617 (cell)
krahaim@interplastic.com

All specifications and properties specified above are approximate. Specifications and properties of material delivered may vary slightly from those given above. Interplastic Corporation makes no representations of fact regarding the material except those specified above. No person has any authority to bind Interplastic Corporation to any representation except those specified above. Final determination of the suitability of the material for the use contemplated is the sole responsibility of the Buyer. The Thermoset Resin Division's technical sales representatives will assist in developing procedures to fit individual requirements.

COR78-AT-579

Enhanced CIPP Resin

Technical Data Sheet

COR78-AT-579 is a physical property enhanced, promoted, thixotropic, corrosion resistant, unsaturated polyester resin for use in the manufacture of liner pipe using cured-in-place techniques.

FEATURES	BENEFITS
• Corrosion Resistant	• Works well in a variety of environments, including most sanitary and storm sewers and some industrial applications
• Improved Felt Wet-Out Characteristics	• Uniform and rapid resin dispersion for maximum properties in minimal time
• Similar Cure and Viscosity as Traditional Value-Rez™ and GEN II Products	• No procedural differences

LIQUID PROPERTIES	RESULTS
Viscosity, Brookfield Model RV#4 Spindle @ 20 rpm, 77°F (25°C), cps	4,000-4,500
Thix Index	3.00-3.75
Gel time run in a 140°F (60°C) water bath, initiated with 0.75% of Perkadox 16 and 0.35% Trigonox 42S by weight*	
Gel Time, 130-150°F (54-66°C), min:sec	7:00-11:00
Gel to Peak Time, 150°F (66°C) to Peak Exotherm, min:sec	1:30-5:00
Peak Exotherm	310-380°F (154-193°C)
Non-Volatile Content, %	66.0-70.0
Hazardous Air Pollutant (Styrene) Content, %	30.0-34.0
Room Temperature Catalyzed Stability (RTCS), hours	>24
Weight per Gallon, lbs.	10.50-10.90

TYPICAL PROPERTIES								
Thickness	**1/8 inch (3.2 mm) Casting**				**1/4 inch (6 mm) Laminate**			
Construction	**Not Applicable**				**CIPP Felt Laminate**			
Flexural Strength, ASTM D790	11,600	psi	80	MPa	8,100	psi	56	MPa
Flexural Modulus, ASTM D790	6.72×10^5	psi	4,600	MPa	712,500	psi	4,900	MPa
Tensile Strength, ASTM D638	7,500	psi	52	MPa	2,980	psi	21	MPa
Tensile Modulus, ASTM D638	7.99×10^5	psi	5,500	MPa	9.81×10^5	psi	6,760	MPa
Tensile Elongation, ASTM D638	1.48	%	1.48	%	1.15	%	1.15	%
Heat Distortion Temperature, ASTM D648	268	°F	131	°C	249.3	°F	120.7	°C
Specific Gravity @ 23°C, ASTM D792	1.40		1.40		--		--	

* The gel time and reactivity will vary due to the type and concentration of Free Radical Initiator (catalyst), shop temperature, humidity, and type of fillers used. In order to meet your individual needs consult our technical sales representative for assistance.

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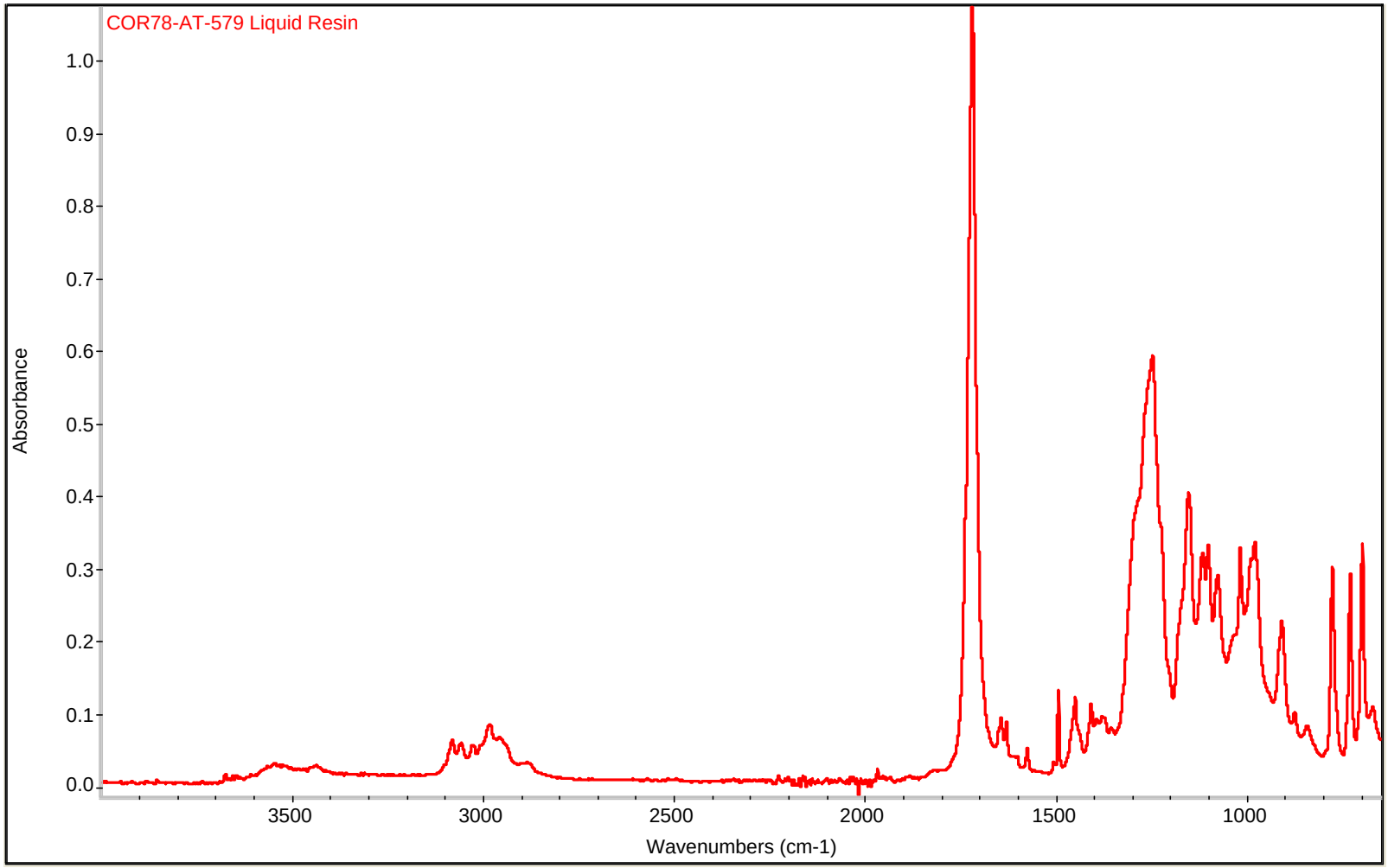
INTERPLASTIC CORPORATION
2015 Northeast Broadway Street
Minneapolis, Minnesota 55413-1775
651.481.6860 Fax 612.331.4235
www.interplastic.com

Revised: 6/14

INTERPLASTIC CORPORATION

2015 Northeast Broadway Street
Minneapolis, Minnesota 55413-1775
(651) 481-6860 Fax (612) 331-4235

COR78-AT-579 Liquid Resin



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INTERPLASTIC CORPORATION
1225 Willow Lake Boulevard
St. Paul, MN 55110-5145
(651) 481-6860

CHEMTREC 24-Hour Emergency Telephone (800) 424-9300

ATTN: PLANT MGR/SAFETY DIR

Date Printed: 10/15/14
Revision Date: 06/18/14
MSDS File ID: MSDSLET0
Customer No:
Warehouse No: 005

This MSDS complies with 29 CFR 1910.1200 (Hazard Communication).

SECTION I - PRODUCT IDENTIFICATION

Product Name: COR78-AT-579 CIPP RESIN
General or Generic ID: Unsaturated Polyester Resin
Hazard Classification: Flammable Liquid

SECTION II - HAZARDOUS COMPONENTS

INGREDIENT	CAS NO.	PERCENT	OSHA-PEL	ACGIH-TL NOTE
Unsaturated Polyester Base Resin	See Index	66- 70	None-Estb.	None-Est
Styrene	100-42-5	30- 34	50 ppm TWA	50 ppm (1&2)

(1) OSHA has formally endorsed a styrene industry proposal for a voluntary 50 ppm PEL for workplace exposure to styrene. This proposal was agreed upon by representatives of the UPR industry. The OSHA STEL is 100 ppm. The ACGIH recently changed the TLV for styrene from 50 ppm to 20 ppm, and the STEL from 100 ppm to 40 ppm.
(2) HMIS Rating for Styrene: Health=2; Fire=3; Physical Hazard=2

SECTION III - PHYSICAL DATA

PROPERTY		MEASUREMENT
Initial Boiling Point	For Styrene	293.40 Deg F (145.22 Deg C) @ 760.00 mm Hg
Vapor Pressure	For Styrene	4.3 mm Hg 68 Deg F (20 Deg C)
Specific Gravity		1.26-1.30 @ 77 Deg F (25 Deg C)
Vapor Density	Air = 1	3.6
Evaporation Rate		Slower than Ether

SECTION IV - FIRE AND EXPLOSION DATA

Flash Point: 88 Deg F (31.1 Deg C) for Volatile Component

Flammable: (Lowest Value of Styrene) Lower - 1.1%
(Upper Value of Styrene) Upper - 6.1%

Extinguishing Media: Foam, carbon dioxide, dry chemical, or water fog.

Hazardous Decomposition Products: May form toxic materials such as carbon dioxide, carbon monoxide, and various hydrocarbons.

Special Firefighting Procedures: Wear self-contained breathing apparatus with a full facepiece operated in pressure demand or other positive pressure mode when fighting fires.

Vapors are heavier than air and may travel along the ground or may be moved by ventilation and ignited by ignition sources at locations distant from material handling point.

Never use welding or cutting torch on or near drum (even empty) because product vapor can ignite explosively.

SECTION V - HEALTH DATA

Permissible Exposure Level: Not established for product. See Section II.

POTENTIAL HEALTH EFFECTS

Eyes - Can cause severe irritation, redness, tearing, blurred vision.

Skin - Prolonged or repeated contact can cause moderate irritation, defatting, dermatitis.

Inhalation - Excessive inhalation of vapors can cause nasal irritation, dizziness, weakness, fatigue, nausea, headache, possible unconsciousness, and even asphyxiation.

Swallowing - Can cause gastrointestinal irritation, nausea, vomiting, diarrhea. Aspiration of material into the lungs can cause chemical pneumonitis.

SECTION V - HEALTH DATA (continued)

TARGET ORGAN EFFECTS

Overexposure to this material (or its components) has been suggested as a cause of the following effects in laboratory animals, and may aggravate pre-existing disorders of these organs in humans: mild, reversible kidney effects, effects on hearing, respiratory tract (nose, throat, and airways), testis, liver. Overexposure to this material (or its components) has been suggested as a cause of the following effects in humans, and may aggravate pre-existing disorders of these organs: central nervous system effects, mild effects on color vision, effects on hearing, and respiratory tract damage (nose, throat, and airways).

FIRST AID

If on Skin: Thoroughly wash exposed area with soap and water. Remove contaminated clothing. Launder contaminated clothing before re-use.

If in Eyes: Flush with large amount of water, lifting upper and lower lids occasionally. Get medical attention.

If Swallowed: Do not induce vomiting. Keep person warm, quiet, and get medical attention. Aspiration of material into the lungs due to vomiting can cause chemical pneumonitis which can be fatal.

If Inhaled: If affected, remove individual to fresh air. If breathing is difficult, administer oxygen. If breathing has stopped, give artificial respiration. Keep person warm, quiet, and get medical attention.

PRIMARY ROUTE(S) OF ENTRY

Inhalation, skin absorption, skin contact, eye contact.

SECTION VI - REACTIVITY DATA

Hazardous Polymerization:	Possible
Stability:	Stable
Incompatibility:	Avoid contact with strong alkalies, strong mineral acids, and oxidizing agents.
Conditions to Avoid:	Exposure to excessive heat or open flame, storage in open containers, prolonged storage (6 months), storage above 100 Deg F (38 Deg C), and contamination with oxidizing agents.
Hazardous Decomposition Products:	Carbon monoxide, carbon dioxide, low molecular weight hydrocarbons, and organic acids.

SECTION VII - SPILL OR LEAK PROCEDURES

Eliminate all ignition sources (flares, flames (including pilot lights), and electrical sparks). Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed. Stop spill at source, dike area of spill to prevent spreading, shovel or pump to tank or drums. Remaining liquid may be absorbed in sand, clay, earth, or other absorbent material and shoveled into containers.

SECTION VIII - PROTECTIVE EQUIPMENT TO BE USED

Respiratory Protection:	If PEL of the product or any component is exceeded, an NIOSH/MSHA approved respirator is advised in absence of proper engineering control (see your safety equipment supplier). Engineering or administrative controls should be implemented to reduce exposure.
Ventilation:	Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below TLV(s).
Protective Gloves:	Wear chemical resistant gloves that afford proper protection to the hands, such barrier creams maybe used in some environments as long as proper skin protection is afforded.
Eye Protection:	Chemical splash goggles in compliance with OSHA regulations are advised; however, OSHA regulations also permit other type safety glasses. (Consult your safety equipment supplier.)
Other Protective Equipment:	Work clothing that covers arms and legs.

SECTION IX - SPECIAL PRECAUTIONS

Containers of this material may be hazardous when empty. Since empty containers retain product residues (vapors, liquid, and/or solids), all hazard precautions given in this MSDS must be observed.

The information accumulated herein is believed to be accurate, but is not warranted to be, whether originating with Interplastic or not. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances.

SECTION X - SUPPLEMENT

The International Agency for Research on Cancer (IARC) has classified styrene as a possible carcinogen to humans (Group 2B) based on "limited evidence" in humans, "limited evidence" in animals and "other relevant data". The National Toxicology Program listed styrene as reasonably anticipated to be a human carcinogen based on limited evidence from studies in humans, sufficient evidence from studies in experimental animals, and supporting data on mechanisms of carcinogenesis.

The significance of these results for humans has not been established. Styrene is not expected to cause cancer in humans at concentrations below the recommended exposure standard or when appropriate industrial hygiene procedures are followed. Moreover, studies in humans exposed for long periods of time to styrene have not demonstrated any carcinogenic effects.

At the conclusion of a major notice and comment rulemaking revising its air contaminants regulations, OSHA concluded that the "current evidence on styrene's carcinogenicity does not support its classification in the final rule as a carcinogen." In the same rulemaking, the National Institute for for Occupational Safety and Health (NIOSH) commented that there "seems to be little basis from experimental animal investigations or epidemiologic studies to conclude at this time that styrene is carcinogenic." The National Toxicology Program does not include styrene on its list of chemicals expected to be carcinogenic.

SECTION XI - SUPPLIER NOTIFICATION

This product contains toxic chemicals subject to the reporting requirements of Section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 and of 40 CFR 372. Please refer to "Section II - Hazardous Components" for the specific product and concentration.

SECTION XII - TRANSPORTATION INFORMATION

Regulatory Information	UN Number	Proper Shipping Name	Class	Packaging Group	Label	Additional Information
US DOT	UN-1866	Resin Solution	3	III	Flammable Liquid	RQ for Styrene=1000 pounds*

* For shipments in a single container exceeding the RQ for styrene the letters RQ must appear in the proper shipping name.

BASE RESIN CAS INDEX

The base resins indicated under Section II are identified by one or more of the following CAS numbers:

113060-15-4	141224-31-9	29403-69-8	67712-08-7
135108-89-3	145417-47-6	30110-00-0	67845-68-5
1352626-53-9	14807-96-6	30946-90-8	67859-89-6
1352626-54-0	149717-53-3	31260-98-7	67939-08-6
1352626-55-1	155122-62-6	31472-46-5	67939-09-7
1352626-56-2	167747-48-0	32505-78-5	67939-40-6
1352626-57-3	21645-51-2	32677-47-7	67990-44-7
1352650-31-7	25037-66-5	32762-75-7	68002-44-8
1352650-32-8	25101-03-5	36346-15-3	68140-84-1
1356821-61-8	25215-72-9	36425-15-7	68140-88-5
1356821-62-9	25464-21-5	36425-16-8	68171-28-8
1356821-63-0	25609-89-6	37339-47-2	68238-98-2
1356821-64-1	25749-46-6	37347-86-7	68299-40-1
1356821-65-2	25749-49-9	37625-93-7	68492-68-2
1356821-66-3	25987-82-0	37999-57-8	68511-26-2
1356844-12-6	26098-37-3	42133-45-9	68585-94-4
1356844-15-9	26123-45-5	477767-44-5	69013-22-5
1364010-85-4	26265-08-7	49624-93-3	
1373121-77-7	26301-26-8	51394-65-1	
1373121-78-8	26588-55-6	58182-50-6	
1373121-79-9	28572-30-7	62569-28-2	
1373121-80-2	28679-80-3	64386-66-9	
1373140-61-4	287723-38-0	64386-67-0	
1374301-59-3	29011-83-4	67380-21-6	
1374821-41-6	29350-58-1	67599-39-7	

INTERPLASTIC CORPORATION

2015 Broadway Street Northeast
Minneapolis, MN 55413-1714
651.481.6860 Fax 612.331.4634

COR78-AT-5XX Series
Corrosion Summary

ASTM F1216 & D543 (CIPP) Corrosion Data @ 73.4 +/- 3.6°F (23 +/- 2°C)

Immersion Media	Flexural Strength Retention, % Months 1	Flexural Strength Retention, % Months 12	Flexural Modulus Retention, % Months 1	Flexural Modulus Retention, % Months 12
100% Tap Water (pH 6-9)	97	90	97	94
5% Nitric Acid	96	81	96	84
10% Phosphoric Acid	94	93	100	95
10% Sulfuric Acid	95	95	100	98
100% Gasoline	96	95	99	89
0.1% Detergent	94	93	96	96
0.1% Soap Solution	95	91	97	97
100% Vegetable Oil	98	97	99	99

ASTM D5813, F1743, & D543 (CIPP) Corrosion Data @ 73.4 +/- 3.6°F (23 +/- 2°C)

Immersion Media	Flexural Strength Retention, % Months 1	Flexural Strength Retention, % Months 12	Flexural Modulus Retention, % Months 1	Flexural Modulus Retention, % Months 12
1% Nitric Acid	97	92	98	93
5% Sulfuric Acid	98	99	100	96
100% Gasoline	96	95	99	89
0.1% Detergent	94	93	96	96
0.1% Soap Solution	95	91	97	97
100% Vegetable Oil	98	97	99	99

Note: Non-shaded regions are the applicable test durations as they relate to achievement of the minimum acceptable retentions.

**All testing was conducted by HTS Pipe Consultants, Inc.

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HTS Pipe Consultants, Inc.
420 Pickering Street, Houston, TX 77091
www.htspipeconsultants.com

Phone 713-692-8373
Fax 713-692-8502
Toll Free 1-800-692-TEST

HTS Pipe Consultants

August 16, 2011

Interplastic Corporation
Thermoset Resins Division
2015 Northeast Broadway Street
Minneapolis, Minnesota 55413-4235

Attn: Mr. Jason Schiro, Senior Chemist
Corrosion and Specialty Resins

Re: One Month Test Results
Chemical Resistance Testing of
Cured in-Place Pipe (CIPP) Samples
No. LB-00048515

Dear Mr. Schiro:

Please find enclosed one month chemical resistance test results for samples of Cured-in-Place Pipe received in our laboratory on July 7, 2011. Per your instructions the sample has been identified as #LB-00048515. The samples were constructed with COR78-AT-5XX type resin.

All of the test coupons were prepared and post-cured by the Research and Development Laboratory of Interplastic Corporation's Thermoset Resins Division. The resin was initiated with 0.70% and 0.35% by weight of Akzo Nobel's Perkadox 16 and Trigonox 42S, respectively. The initiated resin was impregnated into the felt and clamped between metal plates with precision spacers. The panels were gelled at 150° F (66°C) and held at that temperature for four hours. The panels were then post-cured at 180°F (82°C) for sixteen additional hours. The test coupons were cut and labeled from the cured panels. Each coupon was edge-coated with the same resin used to construct the coupon, and post-cured an additional 4 hours at 150°F (66°C).

The testing program was conducted in accordance with the following:

- ASTM F1216, "Practice for Rehabilitation of Existing Pipelines and Conduits by the Inversion and Curing of a Resin –Impregnated Tube".
- ASTM F1743, "Standard Practice for Rehabilitation of Existing Pipelines and Conduits by Pulled-in-Place Installation of Cured-in-Place Thermosetting Resin Pipe (CIPP)".
- ASTM D5813, "Standard Specification for Cured-in-Place Thermosetting Resin Sewer Pipe".

- ASTM D2122, "Test Method for Determining Dimensions of Thermoplastic Pipe and Fittings".
- ASTM D790, "Test Method for Flexural Properties of Unreinforced and Reinforced Plastics".

The initial weight, hardness (ASTM D2583) and thickness (ASTM D2122) of each coupon sample was recorded prior to immersion. One (1) coupon sample was utilized as a control base sample.

The coupon samples were immersed in 10 different chemical reagents. Eight of the reagents are as specified in ASTM F1216, section X2, Table X2.1. The other two reagents (Nitric Acid 5% and Sulfuric Acid 10%) are as specified in ASTM F1743, section 8, table 2. The coupon samples were exposed to the reagents for a period of 1 month. At the end of 1 month the coupon samples were removed from the reagent containers, rinsed, dried, weighed and tested for thickness and hardness.

The coupon samples were then tested for flexural strength and flexural modulus of elasticity. A summary of all test data and percent change in each property is included in the attached summary of test data. ASTM F1216, Section X2.2.1 states that the test specimens should lose no more than 20% of their initial flexural strength and flexural modulus during the exposure time. As indicated by these test results, all of these samples comply with that specification requirement.

Should you have any questions or comments regarding these tests or this report, please do not hesitate to call us. Thank you very much.

Sincerely,

Larry L. McMichael
Principal
S:/ClientInformation/InterplasticCorp.-CIPPChemicalResistance
30DayResults/LB-00048515

HTS, INC.
Consultants

SUMMARY OF TEST DATA
RESISTANCE OF CIPP TO CHEMICAL REAGENTS

SAMPLE ID: COR78-AT-5XX Duration: 30 Days Date Tested: 8/12/2011

Chemical Reagent (Concentration)	Mechanical Property	Test Method ASTM D	Unit	Control Sample	30 Days Value	30 Days % Change
Tap water (100%)	Observation	543		N/A	No Change	pH 7.5
	Weight	543	g	144.84	145.47	0.43
	Hardness	2583		89.2	89.2	0.00
	Thickness	2122	in.	0.265	0.265	0.00
			mm.	6.7	6.7	0.00
	Max. Flexural	790	psi	8180	7896	-3.47
	Modulus	790	psi	665887	648714	-2.58
Nitric Acid (5%)	Observation	543		N/A	No Change	pH 0.2
	Weight	543	g	147.19	147.87	0.46
	Hardness	2583		88.0	88.0	0.00
	Thickness	2122	in.	0.269	0.269	0.00
			mm.	6.8	6.8	0.00
	Max. Flexural	790	psi	8180	7858	-3.94
	Modulus	790	psi	665887	640045	-3.88
Phosphoric Acid (10%)	Observation	543		N/A	No Change	pH 0.7
	Weight	543	g	146.16	146.72	0.38
	Hardness	2583		88.2	88.2	0.00
	Thickness	2122	in.	0.276	0.276	0.00
			mm.	7.0	7.0	0.00
	Max. Flexural	790	psi	8180	7709	-5.76
	Modulus	790	psi	665887	663334	-0.38
Sulfuric Acid (10%)	Observation	543		N/A	No Change	pH 0.1
	Weight	543	g	143.33	143.80	0.33
	Hardness	2583		89.0	89.0	0.00
	Thickness	2122	in.	0.265	0.265	0.00
			mm.	6.7	6.7	0.00
	Max. Flexural	790	psi	8180	7774	-4.96
	Modulus	790	psi	665887	667650	0.26

HTS Pipe Consultants

SUMMARY OF TEST DATA
RESISTANCE OF CIPP TO CHEMICAL REAGENTS

SAMPLE ID: COR78-AT-5XX Duration: 30 Days Date Tested: 8/12/2011

Chemical Reagent (Concentration)	Mechanical Property	Test Method ASTM D	Unit	Control Sample	30 Days Value	30 Days % Change
Gasoline (100%)	Observation	543		N/A	No Change	pH-NA
	Weight	543	g	142.18	142.37	0.13
	Hardness	2583		88.8	88.8	0.00
	Thickness	2122	in.	0.270	0.270	0.00
			mm.	6.9	6.9	0.00
	Max. Flexural	790	psi	8180	8527	4.24
	Modulus	790	psi	665887	656421	-1.42
Vegetable Oil (100%)	Observation	543		N/A	No Change	pH-NA
	Weight	543	g	150.03	150.11	0.05
	Hardness	2583		88.8	88.8	0.00
	Thickness	2122	in.	0.283	0.283	0.00
			mm.	7.2	7.2	0.00
	Max. Flexural	790	psi	8180	8039	-1.72
	Modulus	790	psi	665887	675249	1.41
Detergent (0.1%)	Observation	543		N/A	No Change	pH 5.6
	Weight	543	g	154.08	154.72	0.42
	Hardness	2583		89.4	89.4	0.00
	Thickness	2122	in.	0.283	0.283	0.00
			mm.	7.2	7.2	0.00
	Max. Flexural	790	psi	8180	7697	-5.90
	Modulus	790	psi	665887	638719	-4.08
Soap (0.1%)	Observation	543		N/A	No Change	pH 5.8
	Weight	543	g	147.44	148.08	0.43
	Hardness	2583		88.6	88.6	0.00
	Thickness	2122	in.	0.274	0.274	0.00
			mm.	7.0	7.0	0.00
	Max. Flexural	790	psi	8180	7778	-4.91
	Modulus	790	psi	665887	644970	-3.14

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SUMMARY OF TEST DATA
RESISTANCE OF CIPP TO CHEMICAL REAGENTS

SAMPLE ID: COR78-AT-5XX Duration: 30 Days Date Tested: 8/12/2011

Chemical Reagent (Concentration)	Mechanical Property	Test Method ASTM D	Unit	Control Sample	30 Days	
					Value	% Change
Nitric Acid (1%)	Observation	543		N/A	No Change	pH 0.5
	Weight	543	g	132.37	132.96	0.45
	Hardness	2583		89.0	89.0	0.00
	Thickness	2122	in.	0.254	0.254	0.00
			mm.	6.5	6.5	0.00
	Max. Flexural	790	psi	8180	7967	-2.60
	Modulus	790	psi	665887	652904	-1.95
Sulfuric Acid (5%)	Observation	543		N/A	No Change	pH 0.3
	Weight	543	g	136.69	137.23	0.40
	Hardness	2583		88.4	88.4	0.00
	Thickness	2122	in.	0.258	0.258	0.00
			mm.	6.6	6.6	0.00
	Max. Flexural	790	psi	8180	8015	-2.02
	Modulus	790	psi	665887	664824	-0.16

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420 Pickering Street, Houston, TX 77091
www.htspipeconsultants.com

Phone 713-692-9373
Fax 713-692-8502
Toll Free 1-800-692-TEST

Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
E. CARRILLO

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, CONTROL

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.532	0.242	4.0
2	0.534	0.250	4.0
3	0.535	0.258	4.0
4	0.533	0.263	4.0
5	0.537	0.269	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0449	41.6	8020	653474
2	0.0505	44.4	7991	679712
3	0.0453	49.2	8282	672851
4	0.0500	50.5	8226	663459
5	0.0505	54.3	8382	659940
Mean	0.0482	48.0	8180	665887
Standard Deviation	0.0029	5.0	170	10428
Minimum	0.0449	41.6	7991	653474
Maximum	0.0505	54.3	8382	679712

F128-2-C.is_flex

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Fax 713-692-8502
Toll Free 1-800-692-TEST

Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
E. CARRILLO

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN TAP WATER (100%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.531	0.242	4.0
2	0.533	0.253	4.0
3	0.538	0.264	4.0
4	0.536	0.274	4.0
5	0.535	0.280	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0467	39.8	7674	636433
2	0.0485	45.1	7939	652616
3	0.0451	50.8	8132	648610
4	0.0498	53.5	7973	643495
5	0.0499	54.3	7761	662414
Mean	0.0480	48.7	7896	648714
Standard Deviation	0.0021	6.1	181	9759
Minimum	0.0451	39.8	7674	636433
Maximum	0.0499	54.3	8132	662414

F128-2-1.is_flex

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Phone 713-692-8373
Fax 713-692-8502
Toll Free 1-800-692-TEST

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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
E. CARRILLO

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN NITRIC ACID (5%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.535	0.258	4.0
2	0.535	0.265	4.0
3	0.537	0.271	4.0
4	0.532	0.277	4.0
5	0.536	0.280	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0432	48.3	8130	631059
2	0.0500	48.3	7715	632280
3	0.0446	49.9	7589	630538
4	0.0500	53.1	7811	663120
5	0.0500	56.3	8044	643226
Mean	0.0476	51.2	7858	640045
Standard Deviation	0.0034	3.5	226	13910
Minimum	0.0432	48.3	7589	630538
Maximum	0.0500	56.3	8130	663120

F128-2-2.ls_flex

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Fax 713-692-8502
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FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
E. CARRILLO

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN PHOPHORIC ACID (10%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.534	0.265	4.0
2	0.537	0.272	4.0
3	0.533	0.279	4.0
4	0.531	0.285	4.0
5	0.531	0.287	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0488	49.8	7972	676749
2	0.0462	51.4	7761	670671
3	0.0442	53.7	7768	651951
4	0.0311	51.0	7099	661853
5	0.0423	57.9	7948	655446
Mean	0.0425	52.8	7709	663334
Standard Deviation	0.0068	3.2	355	10341
Minimum	0.0311	49.8	7099	651951
Maximum	0.0488	57.9	7972	676749

F128-2-3.ls_flex

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FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
E. CARRILLO

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN SULFURIC ACID (10%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.532	0.252	4.0
2	0.537	0.262	4.0
3	0.537	0.269	4.0
4	0.538	0.275	4.0
5	0.533	0.279	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0440	44.5	7905	645290
2	0.0499	49.1	7991	653064
3	0.0501	50.7	7833	682337
4	0.0496	52.2	7694	694689
5	0.0383	51.5	7449	662871
Mean	0.0464	49.6	7774	667650
Standard Deviation	0.0052	3.1	212	20508
Minimum	0.0383	44.5	7449	645290
Maximum	0.0501	52.2	7991	694689

F128-2-4.ls_flex

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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
E. Carrillo

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN GASOLINE (100%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.535	0.257	4.0
2	0.534	0.265	4.0
3	0.538	0.274	4.0
4	0.541	0.281	4.0
5	0.540	0.285	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0512	47.5	8065	633658
2	0.0462	54.0	8647	664297
3	0.0438	58.0	8611	662401
4	0.0502	60.0	8426	657865
5	0.0503	64.9	8883	663883
Mean	0.0483	56.9	8527	656421
Standard Deviation	0.0032	6.6	305	12978
Minimum	0.0438	47.5	8065	633658
Maximum	0.0512	64.9	8883	664297

F128-2-5.is_flex

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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
E. Carrillo

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN VEGETABLE OIL (100%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.536	0.268	4.0
2	0.534	0.278	4.0
3	0.536	0.285	4.0
4	0.533	0.291	4.0
5	0.533	0.295	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0500	53.7	8371	650918
2	0.0485	54.8	7967	680738
3	0.0411	55.4	7631	678077
4	0.0490	62.4	8296	685359
5	0.0433	61.3	7928	681152
Mean	0.0464	57.5	8039	675249
Standard Deviation	0.0039	4.0	300	13849
Minimum	0.0411	53.7	7631	650918
Maximum	0.0500	62.4	8371	685359

F128-2-6.ls_flex

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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
E. Carrillo

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN DETERGENT(0.1%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.529	0.268	4.0
2	0.534	0.278	4.0
3	0.537	0.285	4.0
4	0.536	0.290	4.0
5	0.536	0.293	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0459	50.5	7972	626162
2	0.0447	55.7	8103	625880
3	0.0382	51.5	7082	652229
4	0.0484	59.0	7857	624722
5	0.0407	57.3	7472	664601
Mean	0.0436	54.8	7697	638719
Standard Deviation	0.0041	3.7	417	18512
Minimum	0.0382	50.5	7082	624722
Maximum	0.0484	59.0	8103	664601

F128-2-7.is_flex

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Fax 713-692-8502
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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
E. Carrillo

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN SOAP (0.1%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.529	0.253	4.0
2	0.534	0.265	4.0
3	0.532	0.276	4.0
4	0.535	0.285	4.0
5	0.536	0.290	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0485	46.3	8202	626116
2	0.0406	51.1	8169	667818
3	0.0439	52.3	7747	648301
4	0.0397	54.4	7516	639037
5	0.0459	54.5	7254	643577
Mean	0.0437	51.7	7778	644970
Standard Deviation	0.0037	3.4	412	15213
Minimum	0.0397	46.3	7254	626116
Maximum	0.0485	54.5	8202	667818

F128-2-8.is_flex

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Fax 713-692-8502
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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
E. Carrillo

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN NITRIC ACID (1%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.532	0.241	4.0
2	0.534	0.249	4.0
3	0.535	0.255	4.0
4	0.536	0.261	4.0
5	0.530	0.265	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0421	40.9	7946	630824
2	0.0411	43.8	7940	639510
3	0.0481	46.8	8067	658640
4	0.0487	48.5	7974	658865
5	0.0477	49.1	7910	676680
Mean	0.0455	45.8	7967	652904
Standard Deviation	0.0036	3.4	60	18032
Minimum	0.0411	40.9	7910	630824
Maximum	0.0487	49.1	8067	676680

F128-2-9.is_flex

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Fax 713-692-6502
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Friday, August 12, 2011

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
E. Carrillo

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN SULFURIC ACID (5%) FOR 30 DAYS

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.536	0.248	4.0
2	0.536	0.255	4.0
3	0.535	0.262	4.0
4	0.535	0.265	4.0
5	0.531	0.267	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0476	42.3	7695	618620
2	0.0495	48.0	8270	673286
3	0.0500	48.8	7967	695363
4	0.0465	49.9	7971	651761
5	0.0501	51.5	8169	685090
Mean	0.0487	48.1	8015	664824
Standard Deviation	0.0016	3.5	221	30498
Minimum	0.0465	42.3	7695	618620
Maximum	0.0501	51.5	8270	695363

F128-2-10.is_flex

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www.htspipeconsultants.com

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Fax 713-692-8502
Toll Free 1-800-692-TEST

HTS Pipe Consultants

September 25, 2012

Interplastic Corporation
Thermoset Resins Division
2015 Northeast Broadway Street
Minneapolis, Minnesota 55413-4235

Attn: Mr. Jason Schiro

Re: **Chemical Corrosion Testing**
Sample No. COR78-AT-5XX Twelve Month Test Data

Dear Mr. Schiro:

Please find attached the Summary of Test Data Report for the sample designated as COR78-AT-5XX. At the end of one year (10,000 hrs) a set of coupons were evaluated from each test environment and compared to a control coupon (no immersion).

This testing program is being performed in accordance with ASTM F1216, ASTM F1743, and ASTM C5813.

We very much appreciate the opportunity to work with you and Interplastic Corporation. Please let me know if you have any questions or comments.

Sincerely,
HTS, Inc. Consultants

Rick Eastwood
Vice-President

SUMMARY OF TEST DATA
RESISTANCE OF CIPP TO CHEMICAL REAGENTS

SAMPLE ID: COR78-AT-5XX Duration: 1 Year Date Tested: 9/24/2012

Chemical Reagent (Concentration)	Mechanical Property	Test Method ASTM D	Unit	Control Sample	1 Year Value	1 Year % Change
Tap water (100%)	Observation	543		N/A	No Change	pH 7.7
	Weight	543	g	147.81	149.19	0.93
	Hardness	2583		89.2	89.2	0.00
	Thickness	2122	in.	0.267	0.267	0.00
			mm.	6.8	6.8	0.00
	Max. Flexural	790	psi	8180	7345	-10.21
	Modulus	790	psi	665887	623908	-6.30
Nitric Acid (5%)	Observation	543		N/A	Light Yellow	pH 0.2
	Weight	543	g	141.05	143.28	1.58
	Hardness	2583		88.0	88.0	0.00
	Thickness	2122	in.	0.256	0.256	0.00
			mm.	6.5	6.5	0.00
	Max. Flexural	790	psi	8180	6635	-18.89
	Modulus	790	psi	665887	573486	-13.88
Phosphoric Acid (10%)	Observation	543		N/A	No Change	pH 0.7
	Weight	543	g	153.64	154.87	0.80
	Hardness	2583		87.2	87.2	0.00
	Thickness	2122	in.	0.283	0.283	0.00
			mm.	7.2	7.2	0.00
	Max. Flexural	790	psi	8180	7610	-6.97
	Modulus	790	psi	665887	633797	-4.82
Sulfuric Acid (10%)	Observation	543		N/A	No Change	pH 0.1
	Weight	543	g	139.88	140.78	0.64
	Hardness	2583		88.2	88.2	0.00
	Thickness	2122	in.	0.260	0.260	0.00
			mm.	6.6	6.6	0.00
	Max. Flexural	790	psi	8180	7789	-4.78
	Modulus	790	psi	665887	653177	-1.91

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SUMMARY OF TEST DATA
RESISTANCE OF CIPP TO CHEMICAL REAGENTS

SAMPLE ID: COR78-AT-5XX Duration: 1 Year Date Tested: 9/24/2012

Chemical Reagent (Concentration)	Mechanical Property	Test Method ASTM D	Unit	Control Sample	1 Year	
					Value	% Change
Gasoline	Observation	543		N/A	Light Brown	pH-NA
(100%)	Weight	543	g	139.20	141.10	1.36
	Hardness	2583		87.8	87.8	0.00
	Thickness	2122	in.	0.255	0.255	0.00
			mm.	6.5	6.5	0.00
	Max. Flexural	790	psi	8180	7760	-5.13
	Modulus	790	psi	665887	594814	-10.67
Vegetable Oil	Observation	543		N/A	No Change	pH-NA
(100%)	Weight	543	g	153.65	153.90	0.16
	Hardness	2583		89.4	89.4	0.00
	Thickness	2122	in.	0.282	0.282	0.00
			mm.	7.2	7.2	0.00
	Max. Flexural	790	psi	8180	8447	3.26
	Modulus	790	psi	665887	673628	1.16
Detergent	Observation	543		N/A	No Change	pH 6.0
(0.1%)	Weight	543	g	139.80	141.18	0.99
	Hardness	2583		89.2	89.2	0.00
	Thickness	2122	in.	0.262	0.262	0.00
			mm.	6.7	6.7	0.00
	Max. Flexural	790	psi	8180	7593	-7.18
	Modulus	790	psi	665887	637978	-4.19
Soap	Observation	543		N/A	No Change	pH 6.2
(0.1%)	Weight	543	g	152.63	154.29	1.09
	Hardness	2583		88.2	88.2	0.00
	Thickness	2122	in.	0.283	0.283	0.00
			mm.	7.2	7.2	0.00
	Max. Flexural	790	psi	8180	7461	-8.79
	Modulus	790	psi	665887	644935	-3.15

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SUMMARY OF TEST DATA
RESISTANCE OF CIPP TO CHEMICAL REAGENTS

SAMPLE ID: COR78-AT-5XX Duration: 1 Year Date Tested: 9/24/2012

Chemical Reagent (Concentration)	Mechanical Property	Test Method ASTM D	Unit	Control Sample	1 Year	
					Value	% Change
Nitric Acid (1%)	Observation	543		N/A	Light Yellow	pH 0.4
	Weight	543	g	155.15	156.66	0.97
	Hardness	2583		88.0	88.0	0.00
	Thickness	2122	in.	0.285	0.285	0.00
			mm.	7.2	7.2	0.00
	Max. Flexural	790	psi	8180	7530	-7.95
	Modulus	790	psi	665887	619804	-6.92
Sulfuric Acid (5%)	Observation	543		N/A	No Change	pH 0.2
	Weight	543	g	146.93	148.06	0.77
	Hardness	2583		87.0	87.0	0.00
	Thickness	2122	in.	0.266	0.266	0.00
			mm.	6.8	6.8	0.00
	Max. Flexural	790	psi	8180	8076	-1.27
	Modulus	790	psi	665887	636899	-4.35

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www.htspipeconsultants.com

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Fax 713-692-8502
Toll Free 1-800-692-TEST

Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN TAP WATER (100%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.508	0.255	4.0
2	0.508	0.260	4.0
3	0.508	0.267	4.0
4	0.507	0.273	4.0
5	0.508	0.280	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0469	39.4	7148	593810
2	0.0447	41.8	7302	640847
3	0.0466	44.2	7329	637389
4	0.0494	47.3	7509	616383
5	0.0499	49.4	7437	631113
Mean	0.0475	44.4	7345	623908
Standard Deviation	0.0021	4.0	138	19255
Minimum	0.0447	39.4	7148	593810
Maximum	0.0499	49.4	7509	640847

F128-2-Y-1.is_flex

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Fax 713-692-8502
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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN NITRIC ACID (5%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.511	0.266	4.0
2	0.510	0.270	4.0
3	0.522	0.268	4.0
4	0.522	0.288	4.0
5	0.524	0.295	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0495	38.0	6310	584083
2	0.0499	40.8	6584	553112
3	0.0500	42.6	6819	560471
4	0.0500	47.0	6520	589623
5	0.0499	52.7	6941	580140
Mean	0.0499	44.2	6635	573486
Standard Deviation	0.0002	5.8	250	15823
Minimum	0.0495	38.0	6310	553112
Maximum	0.0500	52.7	6941	589623

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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN PHOPHORIC ACID (10%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.508	0.271	4.0
2	0.510	0.278	4.0
3	0.509	0.286	4.0
4	0.510	0.292	4.0
5	0.508	0.295	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0477	46.8	7527	645024
2	0.0436	51.0	7759	632425
3	0.0499	53.7	7737	616258
4	0.0436	53.9	7437	626934
5	0.0478	55.9	7589	648343
Mean	0.0465	52.3	7610	633797
Standard Deviation	0.0028	3.5	137	13174
Minimum	0.0436	46.8	7437	616258
Maximum	0.0499	55.9	7759	648343

F128-2-Y-3.is_flex

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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
K. PHOUANGASAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN SULFURIC ACID (10%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.507	0.252	4.0
2	0.508	0.258	4.0
3	0.509	0.262	4.0
4	0.511	0.267	4.0
5	0.509	0.271	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0500	42.5	7918	622987
2	0.0500	44.9	7962	609323
3	0.0492	44.8	7685	669948
4	0.0449	47.8	7868	678337
5	0.0500	46.8	7512	685290
Mean	0.0488	45.3	7789	653177
Standard Deviation	0.0022	2.0	187	34569
Minimum	0.0449	42.5	7512	609323
Maximum	0.0500	47.8	7962	685290

F128-2-Y-4.is_flex

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Fax 713-692-8502
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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26.

OPERATOR NAME:
K. PHOUANGASAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN GASOLINE (100%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.508	0.252	4.0
2	0.511	0.258	4.0
3	0.509	0.264	4.0
4	0.508	0.270	4.0
5	0.507	0.272	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0416	41.0	7627	568666
2	0.0411	42.8	7553	589133
3	0.0499	47.7	8064	609334
4	0.0399	46.6	7549	596778
5	0.0470	50.1	8008	610157
Mean	0.0439	45.6	7760	594814
Standard Deviation	0.0043	3.7	254	17074
Minimum	0.0399	41.0	7549	568666
Maximum	0.0499	50.1	8064	610157

F128-2-Y-5.is_flex

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Fax 713-692-8502
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FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN VEGETABLE OIL (100%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.511	0.273	4.0
2	0.510	0.288	4.0
3	0.508	0.277	4.0
4	0.507	0.289	4.0
5	0.509	0.295	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0511	54.0	8505	652526
2	0.0483	60.9	8637	688853
3	0.0500	55.0	8473	658972
4	0.0436	59.3	8406	679670
5	0.0458	60.7	8216	688121
Mean	0.0478	58.0	8447	673628
Standard Deviation	0.0031	3.2	155	16870
Minimum	0.0436	54.0	8216	652526
Maximum	0.0511	60.9	8637	688853

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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN DETERGENT(0.1%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.506	0.259	4.0
2	0.507	0.268	4.0
3	0.510	0.274	4.0
4	0.523	0.281	4.0
5	0.522	0.286	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0456	42.5	7516	624186
2	0.0500	44.8	7379	648779
3	0.0437	49.9	7816	647270
4	0.0474	53.2	7730	627122
5	0.0445	53.5	7523	642532
Mean	0.0462	48.8	7593	637978
Standard Deviation	0.0025	5.0	177	11531
Minimum	0.0437	42.5	7379	624186
Maximum	0.0500	53.5	7816	648779

F128-2-Y-7.is_flex

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Fax 713-692-8502
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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN SOAP (0.1%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.511	0.286	4.0
2	0.508	0.271	4.0
3	0.507	0.279	4.0
4	0.511	0.285	4.0
5	0.511	0.292	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0518	53.1	7615	640220
2	0.0475	43.5	6988	630504
3	0.0474	46.8	7111	624870
4	0.0500	54.4	7869	688533
5	0.0490	56.1	7721	640549
Mean	0.0491	50.8	7461	644935
Standard Deviation	0.0018	5.4	389	25264
Minimum	0.0474	43.5	6988	624870
Maximum	0.0518	56.1	7869	688533

F128-2-Y-8.is_flex

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Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN NITRIC ACID (1%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.508	0.266	4.0
2	0.509	0.273	4.0
3	0.510	0.288	4.0
4	0.506	0.294	4.0
5	0.509	0.300	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0476	44.5	7435	591067
2	0.0405	49.5	7822	636985
3	0.0500	54.9	7781	626650
4	0.0463	55.6	7621	616400
5	0.0390	53.4	6988	627916
Mean	0.0447	51.6	7530	619804
Standard Deviation	0.0047	4.6	339	17644
Minimum	0.0390	44.5	6988	591067
Maximum	0.0500	55.6	7822	636985

F128-2-Y-9.is_flex

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Fax 713-692-8502
Toll Free 1-800-692-TEST

Monday, September 24, 2012

FLEXURAL PROPERTIES OF PLASTICS
ASTM D790
3 POINT BEND

INSTRON CORPORATION
BLUEHILL V. 2.26

OPERATOR NAME:
K. PHOUANGSAVANH

TEMPERATURE (F) / HUMIDITY (%)
71 / 50

RATE (in/min)
.110

SAMPLE ID:

78-AT-5XX, SAMPLE SOAKED IN SULFURIC ACID (5%) FOR 1 YEAR

	WIDTH (in)	THICKNESS (in)	SUPPORT SPAN (in)
1	0.511	0.254	4.0
2	0.507	0.262	4.0
3	0.503	0.270	4.0
4	0.506	0.277	4.0
5	0.508	0.284	4.0

	STRAIN @ MAX (in/in)	MAXIMUM LOAD (lbf)	FLEXURAL STRENGTH (psi)	FLEXURAL MODULUS (psi)
1	0.0493	43.6	7930	609430
2	0.0456	48.0	8272	646447
3	0.0500	48.0	7861	635134
4	0.0500	51.4	7942	622440
5	0.0474	57.2	8374	671045
Mean	0.0485	49.6	8076	636899
Standard Deviation	0.0019	5.1	231	23579
Minimum	0.0456	43.6	7861	609430
Maximum	0.0500	57.2	8374	671045

F128-2-Y-10.is_flex

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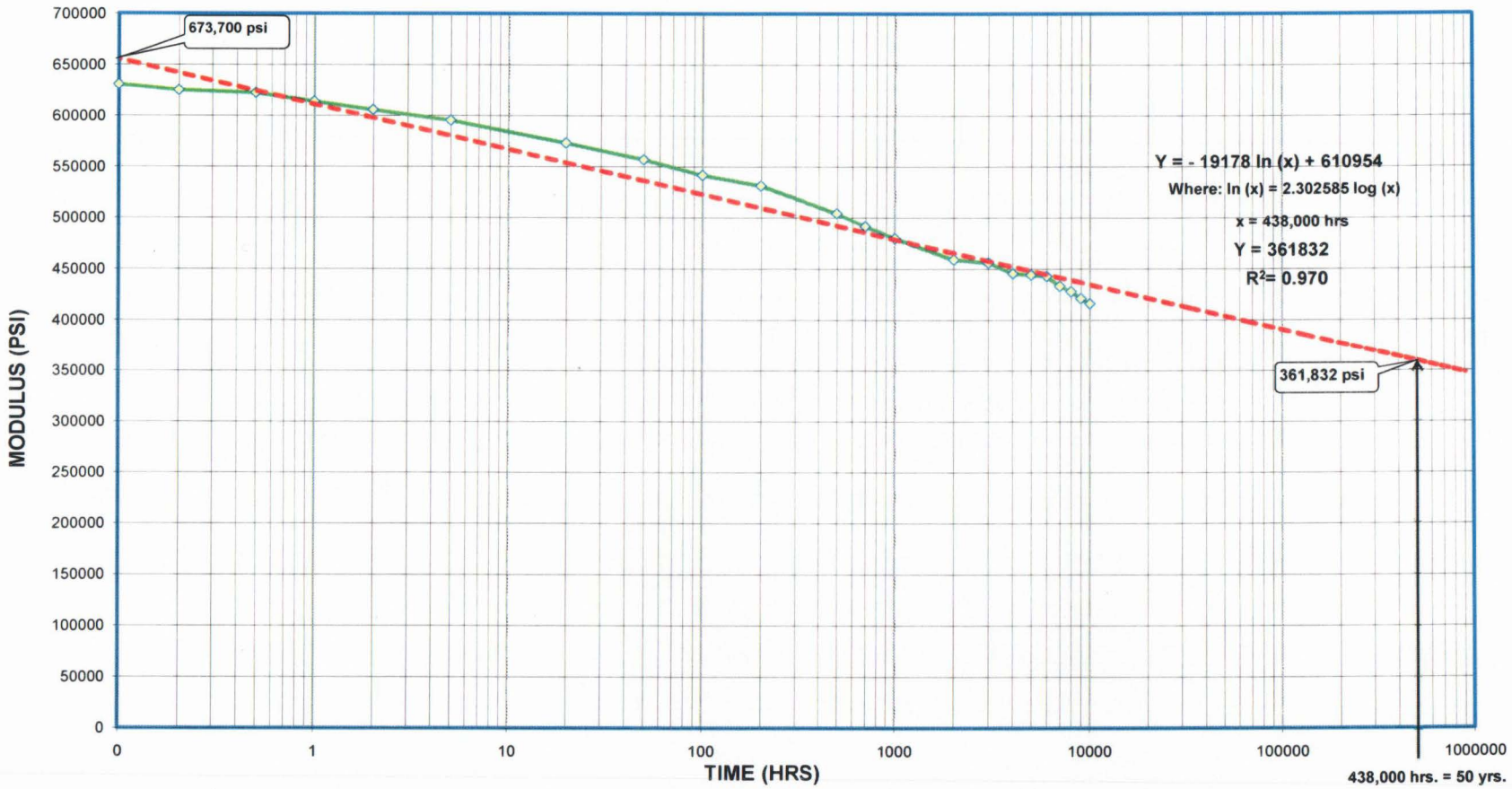
Tel: (713) 692-8373 Fax: (713) 692-8502

FLEXURAL CREEP
(ASTM D2990)



Project Name:	Laboratory Testing - Interplastic Corp.	Modulus = 361,832 psi (extrapolated to 50 years)	**Test Temperature :** 71° F
Report Date :	September 18, 2012	% Retained = 53.8	**Laboratory Humidity :** 50%
Sample ID No.:	COR-78-AT-5XX - Specimen # 1	Line from Lab test data	**Specimen Gage Length :** 4.0"
HTS Report#:	ICF128.003	Line from linear extrapolation	**Stress :** 1300 psi

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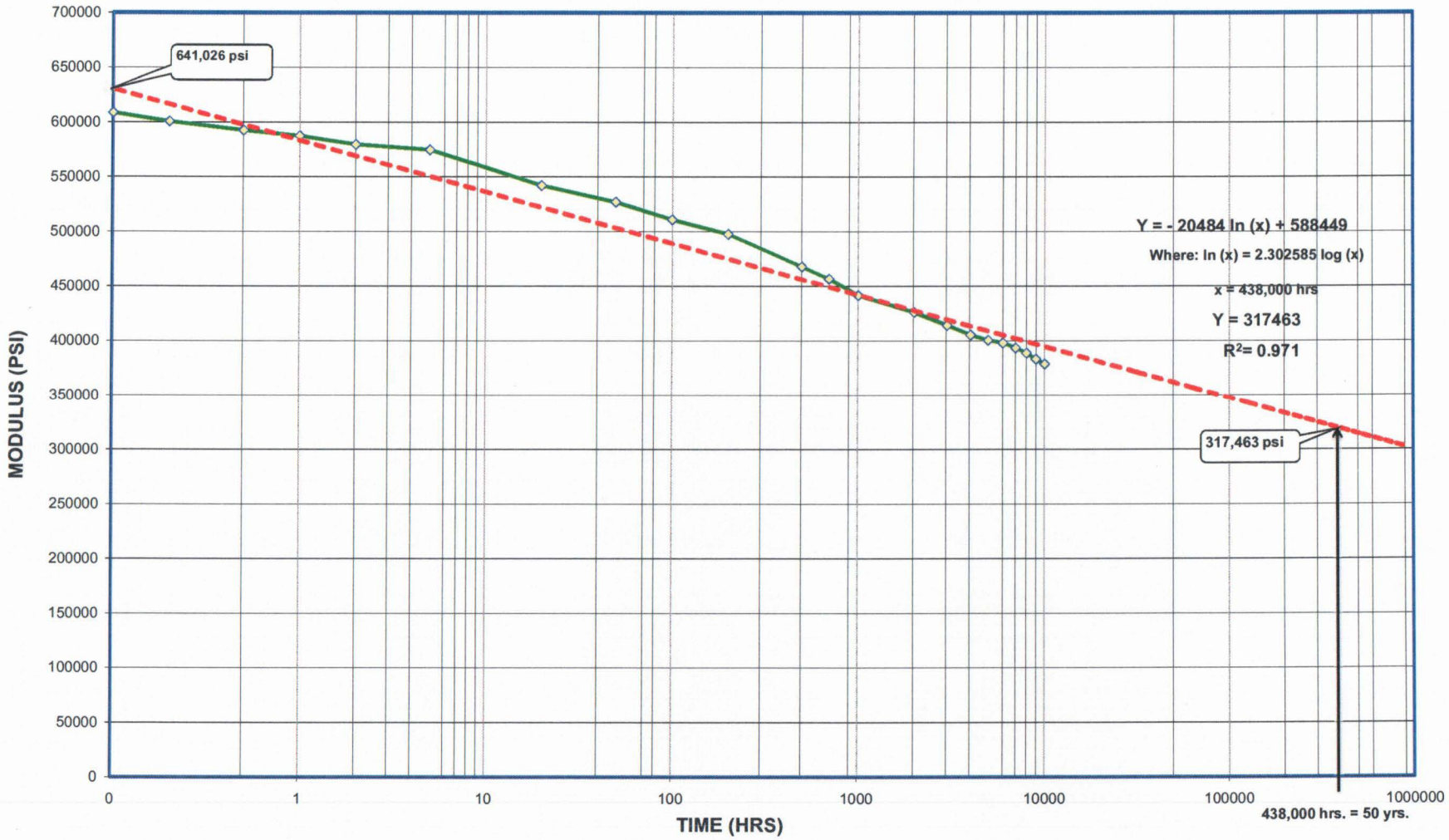
FLEXURAL CREEP
(ASTM D2990)



Project Name:	Laboratory Testing - Interplastic Corp.	Modulus = 317,463 psi (extrapolated to 50 years)	**Test Temperature :** 71° F
Report Date :	September 18, 2012	% Retained = 49.5	**Laboratory Humidity :** 50%
Sample ID No.:	COR-78-AT-5XX - Specimen # 2	Line from Lab test data	**Specimen Gage Length :** 4.0"
HTS Report#:	ICF128.003	Line from linear extrapolation	**Stress :** 1300 psi

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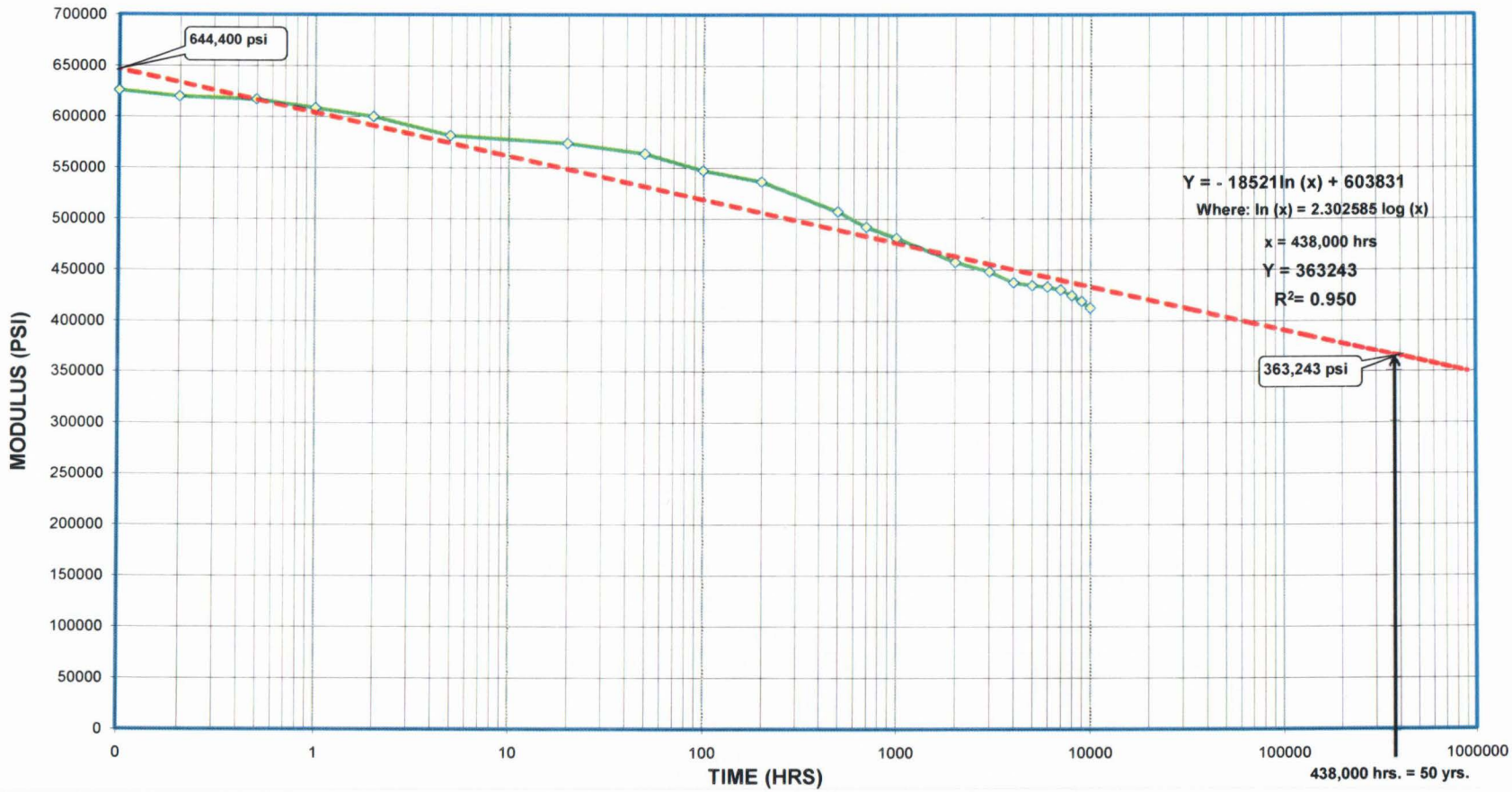
FLEXURAL CREEP
(ASTM D2990)



Project Name:	Laboratory Testing - Interplastic Corp.	Modulus = 363,243 psi (extrapolated to 50 years)	**Test Temperature :** 71° F
Report Date :	September 18, 2012	% Retained = 56.4	**Laboratory Humidity :** 50%
Sample ID No.:	COR-78-AT-5XX - Specimen # 3	Line from Lab test data	**Specimen Gage Length :** 4.0"
HTS Report#:	ICF128.003	Line from linear extrapolation	**Stress :** 1300 psi

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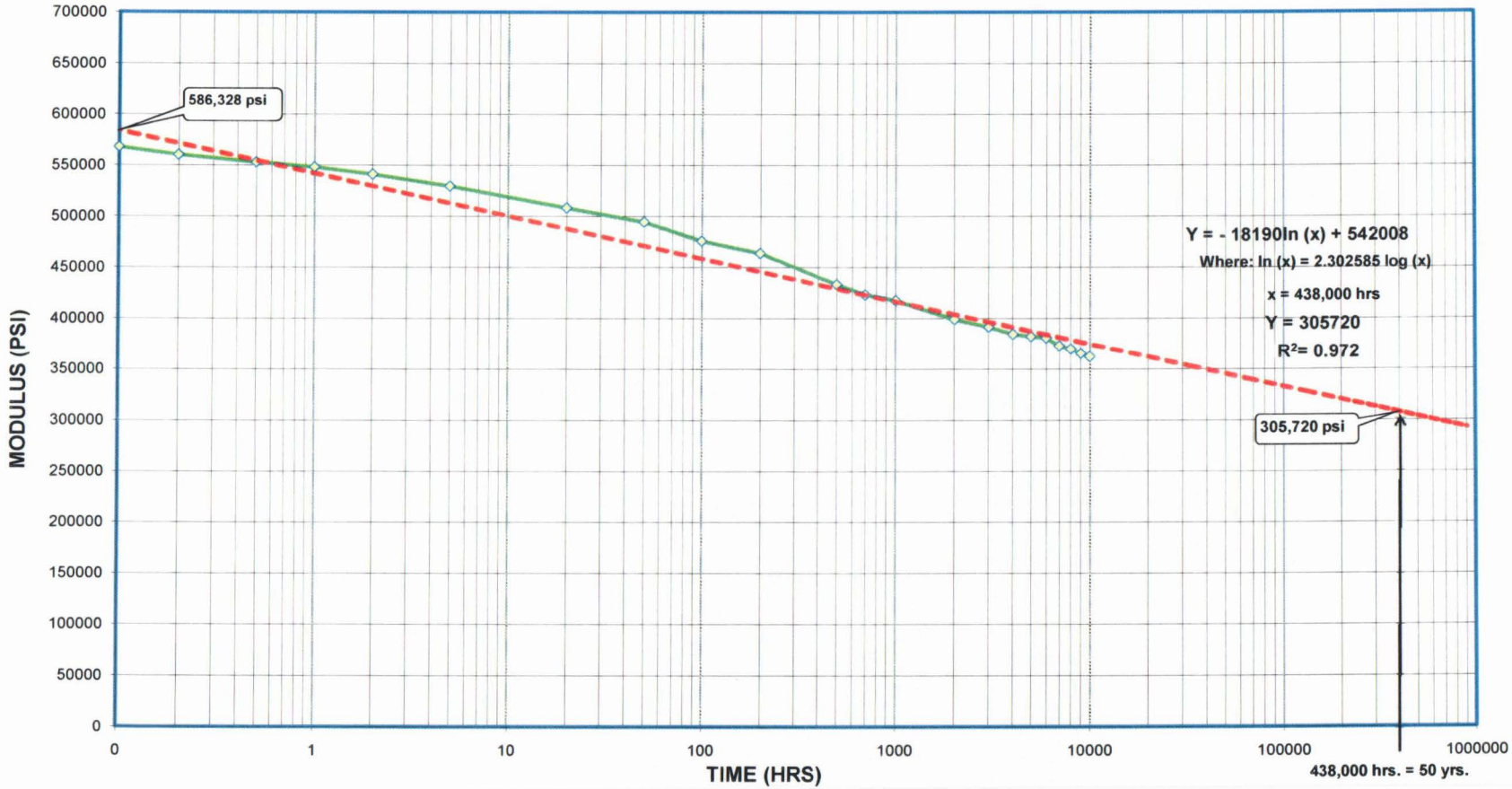
FLEXURAL CREEP
(ASTM D2990)



Project Name:	Laboratory Testing - Interplastic Corp.	Modulus = 305,720 psi (extrapolated to 50 years)	**Test Temperature :** 71° F
Report Date :	September 18, 2012	% Retained = 52.1	**Laboratory Humidity :** 50%
Sample ID No.:	COR-78-AT-5XX - Specimen # 4	Line from Lab test data	**Specimen Gage Length :** 4.0"
HTS Report#:	ICF128.003	Line from linear extrapolation	**Stress :** 1300 psi

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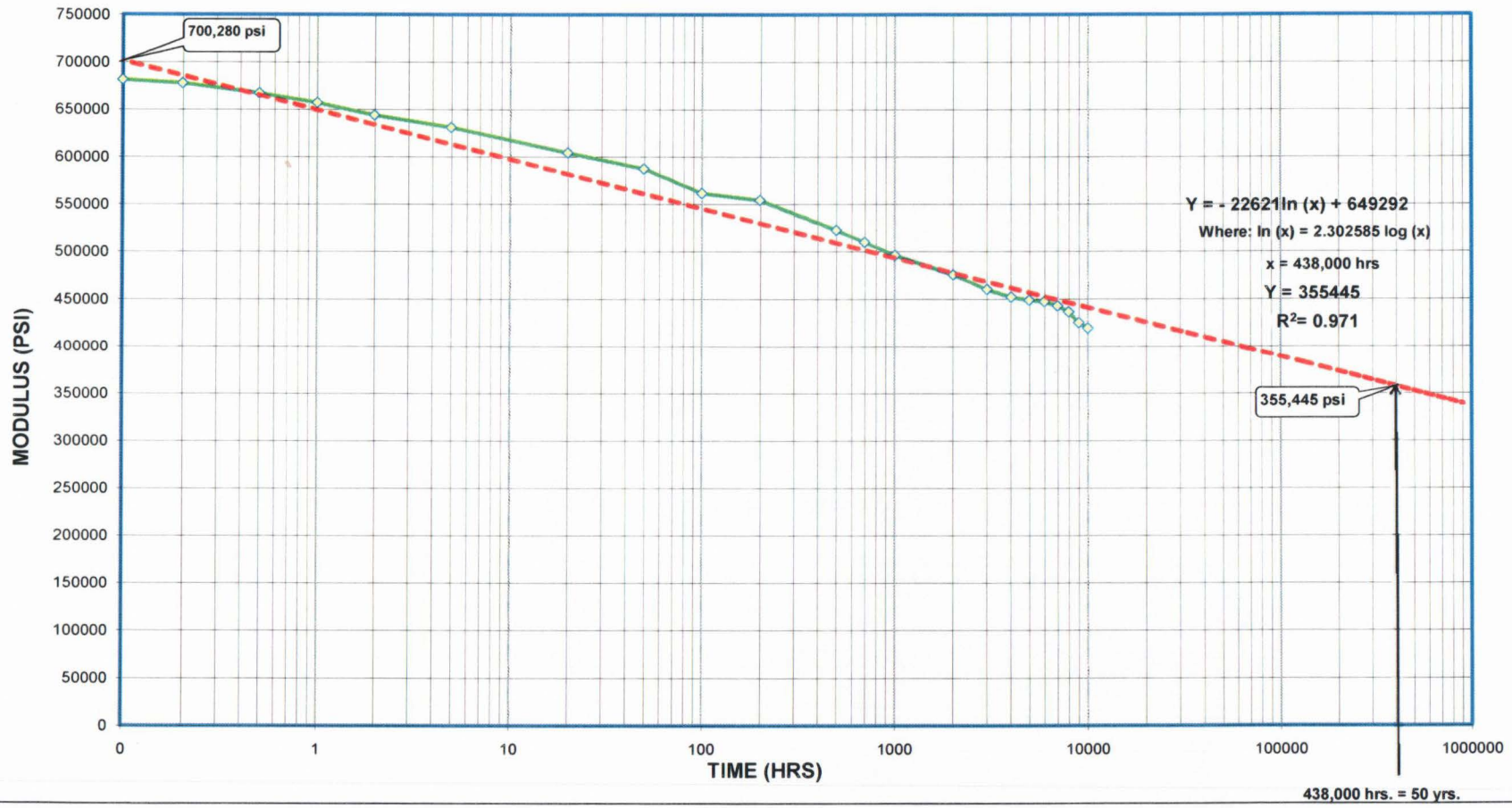
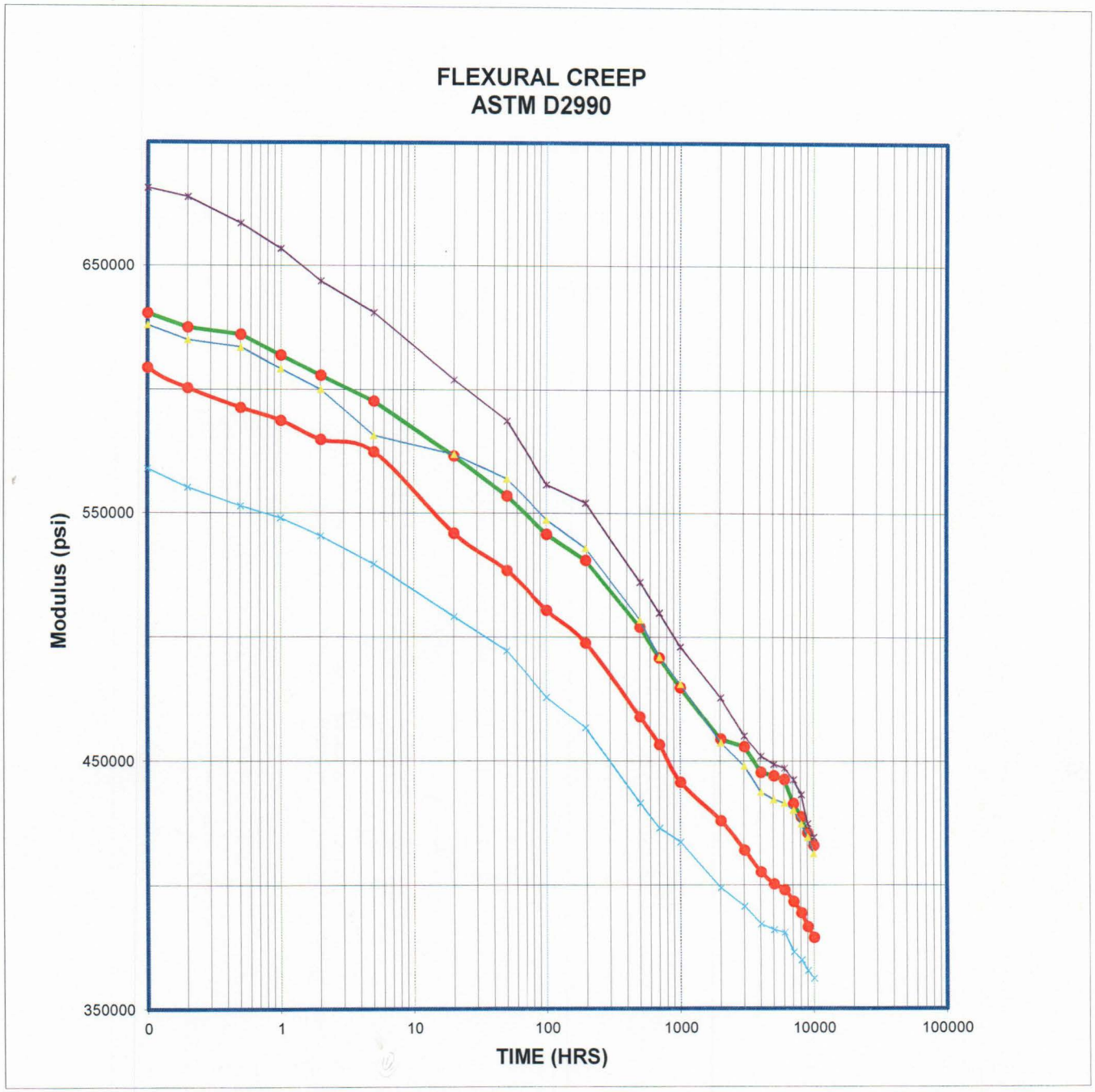
FLEXURAL CREEP
(ASTM D2990)



Project Name:	Laboratory Testing - Interplastic Corp.	Modulus = 355,445 psi (extrapolated to 50 years)	**Test Temperature :** 71° F
Report Date :	September 18, 2012	% Retained = 50.8	**Laboratory Humidity :** 50%
Sample ID No.:	COR-78-AT-5XX - Specimen # 5	Line from Lab test data	**Specimen Gage Length :** 4.0"
HTS Report#:	ICF128.003	Line from linear extrapolation	**Stress :** 1300 psi

HTS Pipe Consultants, Inc.

420 Pickering, Houston, Texas 77091
Tel: (713) 692-8373 Fax: (713) 692-8502



Project Name:

Project No.:

Sample ID No.: *COR-78-AT-5XX*

HTS Report#: *ICF128.003*

Tested Temperature: 71°*F*

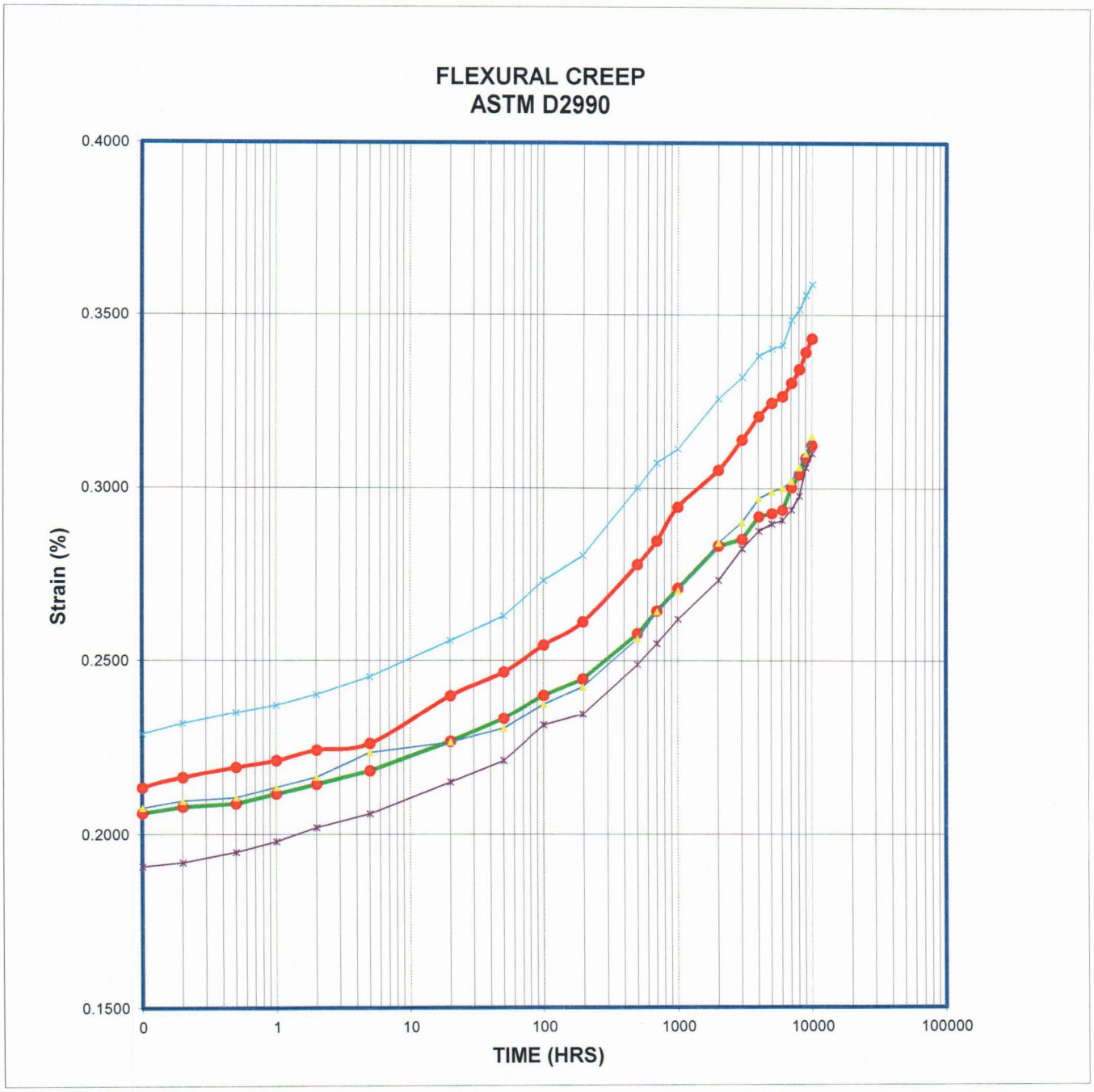
Lab Humidity: *50%*

Specimen Gage Length: 4.0"

Stress: 1300 PSI

HTS Pipe Consultants, Inc.

420 Pickering, Houston, Texas 77091
Tel: (713) 692-8373 Fax: (713) 692-8502



Project Name:

Project No.:

Sample ID No.: *COR-78-AT-5XX*

HTS Report#: *IFC128.003*

Tested Temperature: 71°*F*

Lab Humidity: *50%*

Specimen Gage Length: 4.0"

Stress: 1300 PSI

HTS Report# ICF128.003

Sample ID: COR-78-AT-5XX

Spec# 1		Spec# 2		Spec# 3	
Thickness: 0.251"	Width: 0.488"	Thickness: 0.260"	Width: 0.494"	Thickness: 0.265"	Width: 0.491"
TIME (HRS)	**Strain (%)**	**TIME (HRS)**	**Strain (%)**	**TIME (HRS)**	**Strain (%)**
0.02	0.1930	0.02	0.2028	0.02	0.2017
0.10	0.2061	0.10	0.2135	0.10	0.2077
0.20	0.2080	0.20	0.2165	0.20	0.2097
0.50	0.2090	0.50	0.2194	0.50	0.2107
1	0.2118	1	0.2213	1	0.2137
2	0.2146	2	0.2243	2	0.2166
5	0.2184	5	0.2262	5	0.2236
20	0.2268	20	0.2399	20	0.2266
50	0.2334	50	0.2467	50	0.2306
100	0.2400	100	0.2545	100	0.2375
196	0.2447	196	0.2613	196	0.2425
500	0.2579	500	0.2779	500	0.2564
700	0.2645	700	0.2847	700	0.2643
1004	0.2711	1004	0.2945	1004	0.2703
2012	0.2833	2012	0.3052	2012	0.2842
3019	0.2852	3019	0.3140	3019	0.2902
4028	0.2918	4028	0.3208	4028	0.2971
5036	0.2927	5036	0.3247	5036	0.2991
6044	0.2937	6044	0.3266	6044	0.3001
7052	0.3003	7052	0.3305	7052	0.3021
8059	0.3040	8059	0.3344	8059	0.3061
9000	0.3087	9000	0.3393	9000	0.3101
10003	0.3125	10003	0.3432	10003	0.3150

HTS Report ICF128.003

Sample ID: COR-78-AT-5XX

Spec# 4		Spec# 5	
Thickness: 0.275"	Width: 0.497"	Thickness: 0.272"	Width: 0.494"
TIME (HRS)	**Strain (%)**	**TIME (HRS)**	**Strain (%)**
0.02	0.2217	0.02	0.1856
0.10	0.2289	0.10	0.1907
0.20	0.2320	0.20	0.1918
0.50	0.2351	0.50	0.1948
1	0.2372	1	0.1979
2	0.2403	2	0.2020
5	0.2454	5	0.2060
20	0.2558	20	0.2152
50	0.2630	50	0.2213
100	0.2733	100	0.2315
196	0.2805	196	0.2346
500	0.3001	500	0.2489
700	0.3073	700	0.2550
1004	0.3114	1004	0.2621
2012	0.3259	2012	0.2734
3019	0.3321	3019	0.2825
4028	0.3383	4028	0.2876
5036	0.3403	5036	0.2897
6044	0.3413	6044	0.2907
7052	0.3486	7052	0.2938
8059	0.3517	8059	0.2978
9000	0.3558	9000	0.3060
10003	0.3589	10003	0.3101

HTS Report# ICF128.003

Sample ID: COR-78-AT-5XX

Spec# 1		Spec# 2		Spec# 3	
Thickness: 0.251"	Width: 0.488"	Thickness: 0.260"	Width: 0.494"	Thickness: 0.265"	Width: 0.491"
TIME (HRS)	**Modulus (psi)**	**TIME (HRS)**	**Modulus (psi)**	**TIME (HRS)**	**Modulus (psi**
0.02	673728	0.02	641026	0.02	644422
0.10	630658	0.10	608828	0.10	625922
0.20	624951	0.20	600601	0.20	619989
0.50	622136	0.50	592593	0.50	617064
1	613841	1	587372	1	608454
2	605764	2	579710	2	600081
5	595320	5	574713	5	581412
20	573088	20	542005	20	573761
50	556912	50	527009	50	563869
100	541624	100	510856	100	547354
196	531208	196	497512	196	536138
500	504066	500	467836	500	507045
700	491510	700	456621	700	491796
1004	479563	1004	441501	1004	480947
2012	458851	2012	425985	2012	457404
3019	455822	3019	414079	3019	448006
4028	445530	4028	405268	4028	437517
5036	444097	5036	400400	5036	434610
6044	442674	6044	398010	6044	433171
7052	432960	7052	393314	7052	430321
8059	427598	8059	388727	8059	424733
9000	421080	9000	383142	9000	419287
10003	416007	10003	378788	10003	412674

HTS Report ICF128.003

Sample ID: COR-78-AT-5XX

Spec# 4		Spec# 5	
Thickness: 0.275"	Width: 0.497"	Thickness: 0.272"	Width: 0.494"
TIME (HRS)	**Modulus (psi)**	**TIME (HRS)**	**Modulus (psi)**
0.02	586328	0.02	700280
0.10	567841	0.10	681556
0.20	560269	0.20	677931
0.50	552897	0.50	667283
1	548090	1	656964
2	541033	2	643692
5	529666	5	630945
20	508309	20	604033
50	494355	50	587332
100	475700	100	561458
196	463458	196	554135
500	433198	500	522340
700	423022	700	509804
1004	417419	1004	495918
2012	398926	2012	475563
3019	391493	3019	460112
4028	384331	4028	451954
5036	382002	5036	448771
6044	380848	6044	447196
7052	372960	7052	442538
8059	369679	8059	436476
9000	365393	9000	424837
10003	362243	10003	419247

SOLVED

APPENDIX G

PRICE

City of Livonia **Form of Proposal** **Sewer Maintenance Program**

Honorable Members of the
Council 33000 Civic Center
Drive
Livonia, Michigan 48154

SUBMIT THREE (3) hard copies and ONE (1) electronic copy

Dear Council Members:

The undersigned, by the submission of this proposal, represents that they are familiar with and has determined for the nature and extent of the proposal work and the conditions under which it must be performed and completed, and agrees that they will contract with the City of Livonia to furnish at and for the following monies all materials, labor, equipment, insurance, supervision and all other things necessary or incidental to complete the entire work in accordance with the appended specifications, general conditions, and related contract documents. By the submission of this proposal, the undersigned represents that he is familiar with and understands all the above-referenced contract documents. **Contract is for three (3) years with provision to extend an additional two (2) years effective through an amendment in the Contract, provided that City notifies Contractor at least thirty (30) days prior to Contract expiration date**.

Sewer System Maintenance Services

ITEM	DESCRIPTION	UNIT	UNIT PRICE
Section 1	**SANITARY SEWER CLEANING**		
1	Sanitary sewer cleaning, light, 8-inch to 72-inch diameter	linear foot	$ 2.00
2	Sanitary sewer cleaning, heavy, 8-inch to 72-inch diameter	linear foot	$ 5.00
3	Sanitary Sewer reaming, 8-inch to 72-inch diameter	linear foot	$ 5.00
4	Removal of protruding lateral	each	$ 100.00
Section 2	**SANITARY SEWER VIDEO INSPECTION**		
5	Sanitary sewer video inspection, 8-inch to 72-inch diameter	linear foot	$ 8.00
Section 3	**SANITARY SEWER SPOT LINER REPAIR**		
6	Structural spot liner, 8-inch diameter - 3 feet to 10 feet length	each	$ 3,000.00
7	Structural spot liner, 8-inch diameter - 10 feet to 20 feet length	each	$ 4,000.00
9	Structural spot liner, 10-inch diameter - 3 feet to 10 feet length	each	$ 3,500.00
10	Structural spot liner, 10-inch diameter - 10 feet to 20 feet length	each	$ 4,500.00
12	Structural spot liner, 12-inch diameter - 3 feet to 10 feet length	each	$ 4,000.00
13	Structural spot liner, 12-inch diameter - 10 feet to 20 feet length	each	$ 5,000.00
15	Structural spot liner, 15-inch diameter - 3 feet to 10 feet length	each	$ 4,500.00
16	Structural spot liner, 15-inch diameter - 10 feet to 20 feet length	each	$ 5,500.00
18	Structural spot liner, 18-inch diameter - 3 feet to 10 feet length	each	$ 5,200.00
19	Structural spot liner, 18-inch diameter - 10 feet to 20 feet length	each	$ 6,000.00
21	Structural spot liner, 21-inch diameter - 3 feet to 10 feet length	each	$ 6,000.00
22	Structural spot liner, 21-inch diameter - 10 feet to 20 feet length	each	$ 7,000.00
24	Structural spot liner, 24-inch diameter - 3 feet to 10 feet length	each	$ 6,500.00

25	Structural spot liner, 24-inch diameter - 10 feet to 20 feet length	each	$ 7,500.00
Section 4	**SANITARY SEWER LATERAL CLEANING AND REPAIR**		
27	Lateral sewer video inspection	each	$ 1,000.00
28	CIPP lateral liner, 6-inch diameter, up to 60 feet length	each	$ 3,500.00
29	Installation of cleanout	each	$ 1,500.00
Section 5	**SANITARY SEWER JOINT TESTING AND SEALING**		
29	Sanitary sewer pipe joint testing and sealing, 8-inch to 24-inch diameter	joint	$ 500.00
Section 6	**CIPP SEWER PIPE LINING**		
30	CIPP Sewer Lining, 8-inch diameter	linear foot	$ 35.00
31	CIPP Sewer Lining, 10-inch diameter	linear foot	$ 40.00
32	CIPP Sewer Lining, 12-inch diameter	linear foot	$ 48.00
33	CIPP Sewer Lining, 15-inch diameter	linear foot	$ 60.00
34	CIPP Sewer Lining, 18-inch diameter	linear foot	$ 75.00
35	CIPP Sewer Lining, 21-inch diameter	linear foot	$ 95.00
36	CIPP Sewer Lining, 24-inch diameter	linear foot	$ 120.00
37	CIPP Sewer Lining, 30-inch diameter	linear foot	$ 200.00
38	Reinstate lateral service connections	each	$ 250.00
Section 7	**MANHOLE REHABILITATION**		
38	Calcium aluminate lining	vertical foot	$ 225.00
39	Epoxy	vertical foot	$ 300.00
40	CIP lining	vertical foot	$ 350.00
41	Seal spot leak in structure	each	$ 300.00
42	Seal adjustment rings	each	$ 1,500.00
43	Replace corbel	each	$ 1,000.00

Executed by Jerome Shaw, Jr.,
President, SAK Construction, LLC

SAK Construction, LLC
864 Hoff Road
O'Fallon, Missouri 63366

sakcon.com

SAK™

Pipeline Infrastructure. Solved.™

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

Meeting was called to order at 9:00 p.m. by Council President McCullough. Present: Laura Toy, Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: None

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

21. REQUEST FOR CONSIDERATION OF PROPOSED ORDINANCE AMENDMENT: Department of Parks and Recreation, re: to amend Chapter 8.24.050 (Keeping wild animals, birds and bees) in order to allow for introducing bee hives on park property for educational purposes.

    Ted Davis, Superintendent of Parks and Recreation, presented the request to Council.

    Councilmember Jolly offered an approving motion for the Consent Agenda.

    DIRECTION FIRST READ REGULAR

LETTER TO THE LIVONIA CITY COUNCIL

21.

Parks and Recreation
April 30, 2024

MEETING DATE	PRESENTED BY
S052024/R060324	Ted Davis, CPRP, Superintendent of Parks and Recreation

AGENDA ITEM

REQUEST FOR CONSIDERATION OF PROPOSED ORDINANCE AMENDMENT: Department of Parks and Recreation, re: to amend Chapter 8.24.050 (Keeping wild animals, birds and bees) in order to allow for introducing bee hives on park property for educational purposes.

BACKGROUND DETAILS

The Parks and Recreation Department requests a revision to ordinance 8.24.050. Keeping wild animals, birds, and bees prohibited. Specifically, the requested change would allow for introducing bee hives on park property for educational purposes.

With your approval, we would like to introduce honey bee hives to the farm complex at Greenmead Historical Park. This will continue our efforts to create a unique educational experience and bring the farm to life.

Your consideration of this request is greatly appreciated.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Revise ordinance 8.24.05 as follows: It is unlawful to keep, harbor, possess, or keep in confinement on any premises within the City of Livonia, any wild animals, snakes, birds, bees, or creatures the nature of which, inherently when not confined, constitutes a danger, hazard, or nuisance to public health, safety, and comfort. The prohibition on possession of bees shall not include possession of bees in specified areas of park property under the control and management of the Parks and Recreation Commission and designated and approved for educational and other park purposes. (Prior code §3-105)

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

ATTACHMENTS

1. S052024 LTC Prop Amend (bee hives)
2. 2024 Ordinance 8.24.050 amendment

APPROVED BY

Date: May 01, 2024

Ted Davis, CPRP, Superintendent of Parks and Recreation

Date: May 01, 2024

Carter Fisher, City Attorney

Date: May 02, 2024

Maureen Miller Brosnan, Mayor

AN ORDINANCE AMENDING SECTION 050 OF TITLE 8, CHAPTER 24 (KEEPING WILD ANIMALS, BIRDS AND BEES PROHIBITED) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 050 of Title 8, Chapter 24 of the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

8.24.050 Keeping wild animals, birds and bees prohibited

It is unlawful to keep, harbor, ~~have in possession~~possess, or keep in confinement on any premises within the City of Livonia, any wild animals, snakes, birds, bees, or creatures the nature of which, inherently when not confined, ~~do~~constitutes a danger, hazard, or nuisance to ~~the~~public health, safety, and comfort. The prohibition on possession of bees shall not include possession of bees in specified areas of park property under the control and management of the Parks and Recreation Commission and designated and approved for educational and other park purposes. (Prior code §3-105)

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

Proposed Amendment to Section 8.24.050
of the Livonia Code of Ordinances, as amended

AN ORDINANCE AMENDING SECTION 050 OF TITLE 8, CHAPTER 24 (KEEPING WILD ANIMALS, BIRDS AND BEES PROHIBITED) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 050 of Title 8, Chapter 24 of the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

8.24.050 Keeping wild animals, birds and bees prohibited

It is unlawful to keep, harbor, possess, or keep in confinement on any premises within the City of Livonia, any wild animals, snakes, birds, bees, or creatures the nature of which, inherently when not confined, constitutes a danger, hazard, or nuisance to public health, safety, and comfort. The prohibition on possession of bees shall not include possession of bees in specified areas of park property under the control and management of the Parks and Recreation Commission and designated and approved for educational and other park purposes. (Prior code §3-105)

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

Meeting was called to order at 9:00 p.m. by Council President McCullough. Present: Laura Toy, Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: None

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

24. PROPOSED AMENDMENT TO THE LIVONIA CODE OF ORDINANCES, AS AMENDED: Department of Law, re: to Title 2, Chapter 23 (Department of Information Systems), in order to remove the role of the Director of Finance in the responsibility for management of the Director of Information Systems.

    Councilmember Jolly offered an approving motion for the Consent Agenda.

    DIRECTION FIRST READ REGULAR

LETTER TO THE LIVONIA CITY COUNCIL

24.

Law
April 22, 2024

MEETING DATE	PRESENTED BY
S052024/R060324/R061724	Paul Bernier, City Attorney Carter Fisher, City Attorney

AGENDA ITEM

PROPOSED AMENDMENT TO THE LIVONIA CODE OF ORDINANCES, AS AMENDED: Department of Law, re: to Title 2, Chapter 23 (Department of Information Systems), in order to remove the role of the Director of Finance in the responsibility for management of the Director of Information Systems.

BACKGROUND DETAILS

When the Department of Information Systems (IS) was created, the ordinance identified that the Director of the department was to be recommended by and responsible to the Director of Finance. The ordinance also identified that the IS Director was to be appointed by and serve at the pleasure of the Mayor.

As the responsibilities and demands of the IS Department have grown significantly, the Director of IS has effectively reported directly to the Mayor for many years, rather than reporting to the Director of Finance.

The proposed ordinance amendment codifies this arrangement and removes the role of the Director of Finance in the responsibility for management of IS and in the organizational chart.

We respectfully request the approval of the Council for this amendment.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

First Read

ATTACHMENTS

1. S052024 LTC Remove IS Director from Fin Director
2. Ordinance Amending 2.23

APPROVED BY

Date: April 23, 2024

Carter Fisher, City Attorney

Date: May 02, 2024

Maureen Miller Brosnan, Mayor

AN ORDINANCE AMENDING CHAPTER 23 (DEPARTMENT OF ~~MANAGEMENT~~ INFORMATION SYSTEMS) OF TITLE 2 OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED

THE CITY OF LIVONIA ORDAINS:

Section 1. Chapter 23 of Title 2 of the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

CHAPTER 2.23

DEPARTMENT OF INFORMATION SYSTEMS

Sections:

2.23.010 Title for Citation.
2.23.020 Creation -- Organization -- Director.
2.23.030 Purpose -- Information systems duties.

2.23.010 Title for citation. The ordinance codified in this chapter may be known and cited as the "Information Systems Ordinance."

2.23.020 Creation -- Organization -- Director.

There is created and established in the city a department known as the department of information systems. A director shall be appointed by the Mayor in accordance with the Charter provisions pertaining to directors of departments. ~~which shall be under the management and control of the information systems director who shall be the appointing authority for such department. The information systems director shall be responsible to the director of finance.~~ The city council shall~~, as deemed necessary~~ make the necessary appropriations annually to provide suitable quarters, facilities, equipment and personnel to carry on the work of the department. The director ~~shall be recommended by the director of finance and appointed by and serve at the pleasure of the mayor in accordance with the Charter provisions pertaining to directors of departments, and~~ shall receive such compensation as from time to time may be fixed by the council. All other personnel of such department shall be subject to civil service and be part of the classified service.

2.23.030 Purpose -- Information systems duties.

Under the direction of the Mayor, Tthe purpose of the department of information systems is to perform necessary tasks associated with the overall development and direction of the city's computing systems and computer operational activities. The department shall be responsible for providing direction and leadership in the development and implementation of both short and long-range management information service planning, shall provide advice to all city departments regarding computer techniques and purchases, and shall apply information processing technology to improve city services and operations. The department of information systems shall have the following powers and duties:

A. To be responsible for total system analysis, study, design and implementation of user applications and all related information systems functions.

B. To provide guidance and counsel to department heads in the examination and definition of objectives for existing or proposed systems and in the design of improved systems, utilizing computing equipment.

C. To review purchase requests from departments and their divisions for any computer equipment or related product and to make recommendations regarding desirability of the proposed purchase.

D. To maintain professional contacts with other organizations, equipment manufacturers, etc. regarding computer applications and equipment.

E. To keep abreast of technological changes and innovations in the information systems field.

F. To oversee networking and the transfer of data or files between computer systems as appropriate.

G. To be responsible for the oversight and administration of the City's WAN and LAN.

H. To apply information processing technology to improve services in City functions and operations.

I. To develop long-range and short-range plans for the purchase and installation of computer equipment.

J. To provide budget estimates for future personnel/equipment necessary for the data processing division.

K. To recommend the type, size, location and equipment for computer installation(s), including applicable software.

L. To plan and schedule all training required for personnel involved in or affected by information systems and equipment.

M. To make presentations on data processing and information management issues to upper management and city council.

N. To perform such other duties and functions as are required by the ~~director of finance or the~~ mayor.

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

LETTER TO THE LIVONIA CITY COUNCIL

23.

Law
May 21, 2024

MEETING DATE	PRESENTED BY
PH042224/R050624	Carter Fisher, City Attorney

AGENDA ITEM

PROPOSED AMENDMENT TO THE LIVONIA ZONING ORDINANCE, AS AMENDED, Department of Law, re: Petition 2024-01-01-01 submitted by SR&D Development, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

BACKGROUND DETAILS

At your regular City Council meeting held on May 20, 2024, you responded to Petition 2024-01-01-01, submitted by SR&D Development, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

Accordingly, herewith submitted for your consideration is the proposed ordinance amendment prepared by the Department of Law, together with the map prepared by the Planning Department.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

First Read

ATTACHMENTS

1. R052024 Petition 2024-01-01-01, SR&D Dev - New Data Recd 5-14-24
2. R052024 Petition 2024-01-01-01, SR&D Dev - New Data Recd 4-26-24
3. PH042224 Petition 2024-01-01-01(SR&D Dev) Minutes
4. PH042224 LTC Petition 2024-01-01-01 SR&D
5. 2024-01-01-01_SR&D_E-COUNCIL Pkt
6. Proposed Ordinance - Pet. 2024-01-01-01 - SR&D
7. 2024-01-01-01_1st

APPROVED BY

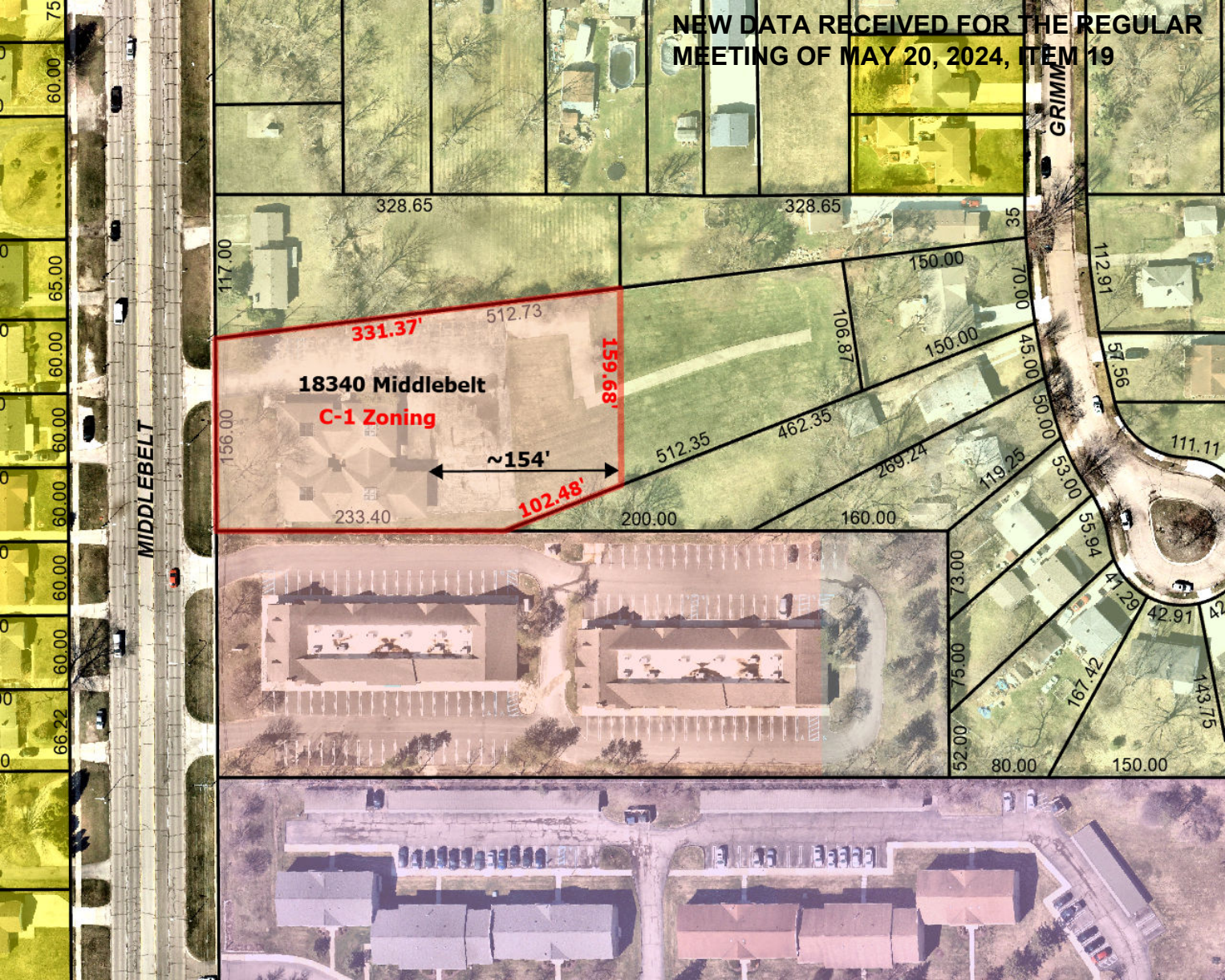
Date: May 21, 2024

Carter Fisher, City Attorney

Date: May 22, 2024

Maureen Miller Brosnan, Mayor

NEW DATA RECEIVED FOR THE REGULAR MEETING OF MAY 20, 2024, ITEM 19



<u>18340 Middlebelt Road Rezoning Legal Description</u>
Sidwell #046 01 0002 001

Parts of lots 2 and 3 of Thomas F. O'Connor's Middlebelt Sub., T. 1 S., R. 9 E., Livonia Township (now City of Livonia) as recorded in Liber 68, Page 96, Wayne County Records,
More particularly described as Beginning at the southwest corner of said lot 3 and proceeding N 00°10'30" W, 156.00 feet; thence N 83°02'09" E, 331.37 feet; thence S 00°10'30" E, 159.68 feet; thence S 68°47'00" W, 102.48 feet; thence N 89°51'20" W, 233.40 feet to the Point of Beginning. Containing 1.292 acres, more or less.

NEW DATA RECEIVED REGARDING PETITION 2024-01-01-01, SR&D DEV.

From: noreply@civicplus.com
To: CityCouncil
Subject: Online Form Submittal: City Council Inquiries
Date: Wednesday, April 24, 2024 10:51:42 PM

City Council Inquiries

This form is for any questions, comments, or concerns you may have for the City in regards to city council meetings or other city council inquiries. If you leave contact information, the City will reply within 2 business days. If this is an emergency, please dial 9-1-1.

First Name	Carmen
Last Name	Kelley
Address	18359 Grimm St.
Email Address	Carmen_Kelley3@outlook.com
Phone Number	3132932312
Topic	City Council Meetings
Date of Issue	4/22/2024
Attachment (Optional)	*Field not completed.*
Comments	During the City Council meeting on April 22, 2024, the contentious issue of rezoning the property situated at 18340 Middlebelt was fervently debated by myself and fellow neighbors. Please let this email serve as written correspondence staunchly reiterating my opposition to the proposal to rezone the property in question from Residential Urban Farming (RUF) to Commercial (C1). It is imperative to underscore the adverse effects this rezoning would inflict upon the adjacent neighbors and the established residential atmosphere. Such a shift in zoning could potentially disrupt the tranquility and character of the neighborhood, leading to increased light/noise pollution and a decrease in residential property values. It remains paramount to prioritize the preservation of the residential integrity and the well-being of the community amidst urban development initiatives.

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CITY OF LIVONIA
PUBLIC HEARING

Minutes of Meeting Held on Monday, April 22, 2024

A Public Hearing of the Council of the City of Livonia was held at the Livonia City Hall Auditorium on April 22, 2024.

MEMBERS PRESENT: Brandon McCullough, President
Martha Ptashnik, Vice President
Carrie Budzinski
Rob Donovic
Jim Jolly
Scott Morgan

MEMBERS ABSENT: Laura M. Toy

OTHERS PRESENT: Mike Fisher, Assistant City Attorney
Mark Taormina, Planning and Economic Development Director
Sara Kasprowicz, Recording Secretary

1. The Public Hearing was called to order at 7:00 p.m. with Council President Brandon McCullough presiding. This item is regarding Petition 2024-01-01-01 submitted by SR&D Development under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

This item will be moved to the Regular Meeting of **May 20, 2024**.

The Public Hearing is now open. There were approximately 7 persons in the audience.

McCullough Mr. Taormina.

Taormina Thank you. This rezoning petition involves a single parcel 20340 Middlebelt Road, as you indicated, it's on the east side of Middlebelt between Six and Seven Mile Roads. This site is 1.87 acres in area it has 156 feet of frontage on Middlebelt, and the depth is roughly 512 feet, the properties abutting the site to the north to the west, and to the east are all zoned Single Family and then to the south is an office complex zoned C-1 local business. Despite the RUF zoning of this property, it does have a long history of commercial uses from 1959 to 1992. The site was occupied by a landscape business and a retail nursery. In 1993, the Zoning Board of Appeals granted a variance that allowed for the construction of a physical therapy rehabilitation clinic and that operated up until about two years ago. The current owner and applicant SR&D Development purchased a property late last year and is currently renovating the building

for reuse as a wellness health center. The building on the site is about 10,000 square feet in size. It's located near the front of the property it has parking available at the rear and along the north side. The developed portions of the site, including the building and parking areas, are mainly on the west half of the property. The east half extending for a distance of about 285 feet is undeveloped and maintained mainly as grass. There is a protective wall that runs along the property's north side. The remaining section along the north property line and the east and the south sides contain wooden fences.

The Zoning Board of Appeals in 1983 did grant a waiver to the protective wall in these other areas along the portion of the north and south sides. Then in 2005, the previous property owner, Theramatrix, entered into a five-year separation agreement with the adjoining properties. Those have since expired. So, one of the issues that has to be resolved with this property still is either continuing that separation agreement with the property owners to allow the wooden fences to remain or the construction of the wall. Changing the zoning would eliminate the non-conformity with respect to the commercial use of the property. In addition, it would facilitate the owners' desire to someday expand the use, realizing that any proposal to either construct a new building or in the large, the existing building will require site plan approval. The Planning Commission reviewed this item at a meeting I believe in February and is recommending approval of the rezoning of the property. Thank you.

McCullough Thank you Mr. Taormina. I'm gonna open it up to the Council and then I'm gonna open it up to the audience. Council? Councilmember Donovic.

Donovic Thanks, Mr. President. Mr. Taormina help me understand. Are we voting on, since we're talking about rezoning this. We are not currently talking about the site plan exterior facades or are we doing it all at the same time? How are we handling this?

Taormina We are not. The work that is being undertaken right now to the interior of the building is all being done under permit. So, there's no review with respect to the use of the property or any exterior improvements. It only affects the zoning. And I will add this. Mr. Fisher and I dealt with the buyer as Miss Durant had been negotiating the purchase of this property for several months and was inquiring about the use and what would be required. It was determined that the change of use was consistent with the long-standing use of the property. And we asked her, what we would like is for her to seek the rezoning of the property in order to eliminate the nonconformity. So, to a large extent, this petition is really one that was suggested by the city in order to correct the non-conformity. One issue I think the Council may want to delve into is whether the entire property should be rezone to the C-1 or whether a portion of it should be rezoned. Miss Durant does have some future plans to expand the building, but at

this point, it would not involve using an entire property for that purpose. So that is something that I think is worthy of a discussion.

Dominic Because I was just thinking about that and I love the plans in the right areas. My girlfriend spent the weekend looking at your social media, and reviewing the renderings. And it's really, I hope it happens, because it's very impressive. But to Mr. Taormina, I'm just thinking about from a Council's perspective, since we're not looking at a site plan, where things like the dumpster enclosure are taken into consideration. Talks about adding additional building there, look at that red area, and then when we typically oversee renderings, I like that, but we're not going to have any, any input on that. So, I'm just trying to understand it.

Taormina Well, no, this is actually a visualization of what she would like to do in the future, for the back of the property for the area immediately behind the building. And that's something that we're considering tonight. I think what she wants to do is just illustrate what her long-term plans are for the property. This is certainly something that would have to come back before you.

Donovic Okay. Thanks Mr. Taormina, thanks Mr. President.

McCullough Councilman Jolly.

Jolly So, Mark, this picture. That would be a second, completely new building?

Taormina Yeah, so one of the concepts, let me just describe the site. So, this may be a little hard to read. But this is the property. And you can kind of match that up with the aerial photograph and the other information we provided to you. This is the main building, this is Middlebelt Road on the left-hand side. This is the main building. This is the parking area, the shaded area currently, this area of this square area behind it is where she would like to someday expand the use of the property. The complication here is a sanitary sewer easement that runs directly behind the existing building. So, it puts a constraint on the ability to expand the building anywhere along the rear at this time. So, one of the concepts, one of the thoughts, and I'll let the petitioner describe this, would be to potentially build a second building on the property directly behind. So, in looking at this plan, the question I raised is, do you want to see this whole area back here, zoned commercial, I don't think it's necessary. It's probably somewhere along this back portion where we could have a split zone parcel, there is some opportunity, I think, in the future for some of this surplus land in the back to either be combined with some of the adjacent residential property. So that's, that's something we can look at in terms of long-term future uses.

Jolly And I know we're not at this point yet, but in terms of the secondary building, would that be for a similar purpose as the intended use of the

first building now? Or would it be some kind of new additional service or use of the property?

Taormina That has not been really brought forward to the city, but I'll let the petitioner address it.

Jolly I'd like to hear what the plan is, not just yet, but and then Mark, what's the sidewalk that looks like runs in the middle of the grass area?

Taormina That was more than likely an access path. So, when the site was used as a nursery, I believe there were either temporary structures on the property or plant material that people could then gain access, so that allows for service vehicles and probably patrons of the nursery to go back there and look at the nursery stock.

Jolly Thank you, sir.

McCullough Ms. Ptashnik.

Ptashnik This is for Mr. Taormina as well. So, if we were to not rezone the entire property C-1, but only part of it that have been advantage of that leaving the back half for lack of a better description, RUF, the purpose being so it can be sold off to adjacent residential or become I mean, what would be the reason that we would want to split the zoning versus just going to C-1?

Taormina It would mostly be to maintain some consistency with the surrounding zoning. So, if you look at how the property is configured, that extends quite a distance into what is developed RUF land. So, I think what it does more than anything is that it limits the commercial activities to the rear portion of that property, which could present a nuisance to those homes.

Ptashnik So, would we be looking at like a 2/3, 1/3, kind of?

Taormina I actually drew it up today, just to give some idea, respecting the petitioners desire to maybe do something in the future. These are all pictures of what she provided for how she wants to develop the interior of the space. This kind of gives an illustration of what we might want to consider and that those boundaries are fixed by any means. It's just something that the Planning Department prepared as a suggestion.

Donovic Not to belabor it, but we already know what the petitioners eventual desire is to build on that portion of land back there. So, does it make sense to just get it over with now so that when the petitioner does come back in the future, they can come back for a site plan, as opposed to going through rezoning and everything in the future? What will be the logic?

Taormina I will only, again, the petitioner is going to have to, I think respond to some of these questions. But the one thing, and I don't know what her situation is right now with the property, but oftentimes, when they go to get a permanent mortgage on the property, the issue of the zoning becomes a barrier or a factor. So, it might make sense, I think, to at least rezone a portion of it immediately, because it's kind of confirming the long-standing use of this property. Then in the future, if there's a need to extend that boundary one way or the other, beyond the line, if that is what the Council desires, then we can address it at that time. You can leave that issue open, while she develops her plans for the future. I think she's probably got her plate full over just getting existing building renovated and up and running. So, I think she'll give you a better sense of her timing for doing anything beyond just the current project.

Donovic Thank you.

McCullough I do have one question for Mr. Taormina. Did we have any neighbors or around the area have an issue with this any complaints?

Taormina Written? I don't believe we received any written correspondence. I believe there's one or two neighbors here this evening that might want to speak on this issue. And I can't remember if they were at the Planning Commission, the minutes would reflect if anyone spoke at that meeting. I can't remember.

McCullough Well, if the Council is good, I'm gonna go to the audience first, and then we can go to the petitioner. If you wouldn't mind, name and address for the record and you've got two minutes. Okay.

Kelley Good evening. My name is Carmen Kelley, my address is 18359 Grimm Street. My property is the entire southern border of the property in question. So, the wooden fence line is my entire thing. At the previous meeting, I expressed my concern for what a nuisance it would be because on the other side of the property line, there's an office complex, I deal with trash, I deal with light pollution. I currently have a complaint with the City Ordinance Office because of a light pollution coming from that property. At the previous meeting, you know, I expressed that the back end of that property is 30 feet from my back door. None of us want a business being built 30 feet from our back door. So, that's what my concern is. I know we talked about future plans. That's not what's on the books right now. But you know, all of us think about our futures. That's how we plan, and I've lived in Livonia for five years, I purchased my house five years ago, and it's been great. I have no complaints. This has been my only thing. And the previous meeting was really disappointing because I even passed out photos of the current issues that I'm dealing with the other property, and it was okay. Okay, okay and then it was business first. Not Livonia family first. And with this, with the future in mind, you know, and the subject of splitting the property where the back half is still zoned as RUF, I don't

really have a problem with that. I have a problem with that extending all the way to my back door. How does that affect my utilities when they're in the process of construction, when you don't have water right now, you don't have lights right now, you don't have all of these things. The motto of Livonia on every sign when we go into the community is Family First. I have a family. And the neighbors that surround me, we are a community, we look out for each other. And so, we would expect the businesses in our community to do the same. I work for a company in the community, literally at the end of my street, so I am about this community. But you know, it just seemed in the last meeting, it was businesses first. And really, this is about people.

McCullough Thank you so much. One thing, and I'll open it up to some of my colleagues. But the one thing I if you could, there are cards right up at the podium. Can you send the ordinance complaints that you guys have currently with those two businesses? Can you send us some correspondence? And then obviously, thank you for coming up and giving your opinion on the lot split. So, I appreciate it. Anybody else from the audience? How are you sir?

Sielicki I'm doing well. Thank you. My name is Nicholas Sielicki, I reside at 18347 Grimm Street. I would like to echo all of the sentiments that my neighbor Carmen, Miss Kelley has just shared, I myself am also dealing with light pollution that is currently affecting both of our homes. When I purchased the home, I was fully aware that there was a commercial residence to the left. However, I am not comfortable with a commercial residence now surrounding both areas of my backyard. Should this move forward, it would render my backyard essentially useless because we would be sharing essentially, a parking lot, or the back end of a business building would be in the middle of my backyard as well. I will also say that I have never attended one of these meetings before. This is my first time speaking like this, but please know that that this is just the level of disagreement that I have for the rezoning of this property to put a business at our backdoors. I also don't know if this is the appropriate forum to ask. But, if possible, I would like to have some sort of market data research that indicates that this business would actually be successful in our community. My fear, as well as that of our neighbors, is that the business fails, and then now we have a vacant, abandoned building in our backyards, which only brings further safety concerns for blight, pillaging, whatever the case may be. And so, I fear what it may do to our property values as well.

McCullough Thank you for coming up and thanks for hanging out with us for the first meeting. So, I will tell you this. As for market data, I mean this it's more for the businesses and real estate and that I would assume that the business has done their due diligence to want to open up the business. So unfortunately, in the packet, if you got a chance to review the packet,

that's going to give you pretty much every information that's public. I appreciate you coming out and letting us know your feelings.

Sielicki Thank you for your time.

McCullough Good evening, sir.

Clinton Good evening. My name is Douglas Clinton. I live at 18339 Grimm and I'm here to voice my opposition to the committee's results. You need go no further than onto Middlebelt Road. Go up by Seven Mile. Boston Market empty for months or around the corner the old VFW hall on Seven Mile between Middlebelt and Maple. It's been vacant for well over a decade. The Up North Bar down by Gildan, abandoned and deteriorating. You go down to Antigo and Ressler on the north side of Seven Mile, empty storefronts. Back out to Middlebelt, between Vassar and St. Martin's, the old Livonia Pavilion, it's vacant and vandalized. Just up the road from that at Norfolk, the old Ram's Horn Restaurant, a large piece of commercial property just sitting empty. Sears. That probably speaks for itself. This is just a small snippet within a mile of this property. I know a city needs businesses to be vibrant, to be a good city. But I just feel it's much better if businesses could use the existing commercial property that we already have and renovate those and use that and not rezone other commercial properties, when I don't feel it's needed. I think that would be much better to have residential development on this property. The light pollution, the noise pollution, the traffic congestion would be so much less. And it would increase the property values of all the surrounding homeowners if there were more new residential homes in there. And if they did in the lot on Seven Mile, they built new houses on Harrison, those were all sold. They're all full. On the north side of Seven Mile, they put in that condo development. Just north of Gilman, I believe. They're all full and vibrant. So, I just feel that it's just not a good idea to add more commercial property to the maximum we already have a gaunt of commercial property.

McCullough I appreciate it, sir. That's the two minutes. Okay. But thank you so much for coming out and voicing your opinion.

Clinton Just in closing, where business comes first is not the city model. It's where families come first. Thank you.

McCullough Mr. King.

King Steve King. 33950 Coventry. Yeah, just wanted to echo the sentiments. It's always great when a petitioner comes forward and wants to renovate an existing property. And that's fantastic. And everybody's hoping that they do more of that. But it is very clear that area around there has a lot of vacant property. We desperately need housing, more housing in the city area, across the whole country, we know that. So, if it's a change of residential. It doesn't make sense here. If a house is good, it could be built

on that. That would be fantastic. Of course, you gotta find somebody who wants to do it. So, I just wanted to add my voice to the rest of it thanks.

McCullough Thank you, Mr. King. Anything else from the audience? Seeing none, I'm going to ask the petitioner if you wouldn't mind, make your way to the podium. And if Council has any questions for the petitioner, now it's time.

Durant Hello.

McCullough Would you mind maybe just give it a little brief history when you're looking to do with property?

Durant Yes. So, right now, what we're looking to do is offer a fitness and wellness center. So, this will be an all-encompassing center, it will have a fitness area, a spa area, child friendly areas as well. And our main focus behind this is actually to provide something for the community. So, all the families that live there actually don't have access anything like this, you actually won't find anything like this and all of Michigan, there, it's almost like putting a resort for people to come and enjoy without even having the need to travel. And the reason why I specifically picked the city like the Livonia, I could have easily put it in West Bloomfield, but I feel like a lot of times more of the luxury wellness businesses go out to these areas, and then no one has access to them. No one's gonna drive 30-40 minutes. To answer their questions.

McCullough Really fast. What's your name and address? I forgot to mention that in the beginning.

Durant It's Sahar Durant and the address is 200 North St. Clair, Toledo, Ohio. I know, Miss Kelly, last time did mention that the light pollution bothers her house. I did say this last time. So, even right now if you look at the current renderings, the light starts from the bottom. I personally hate it when businesses light up the whole streets in people's eyes. So, our lights actually come from the bottom, we're not going to be distracting any of the neighbors. And for any future addition we do, and probably follow the same model. And I know there was a discussion with how much you guys would let us use. And I know many people are against that. But in terms of the value that we're offering, we are investing millions into just this property alone. And we plan to invest even more to do any addition. So, along this property, when we purchased, it was going for $85 a square foot and then he got raised for $350 a square foot so we drastically increase the value for even other businesses. So, if anyone here even wants to open a business, their property value is automatically going to go up. And in regards to data. We have been in business for 10 years and we do have a big market rate. I would not invest millions if I didn't believe in the vision and didn't think that there is a need for it. And since we have finally that are unveiling, we actually have 1000s of people on the waitlist to register with us. And these are all people specifically looking for

community space that can offer them the amenities we're offering. A lot of them work in Livonia, Farmington Hills, Dearborn, Bloomfield, I mean, people are driving to us. And we have a whole list of that.

I know there's a lot of vacant businesses in Livonia. And that wasn't even a concern for us when we decided to purchase the property. But because I do believe that sometimes all it takes is one business to go in there and they flourish and other businesses will want to come. And we've already had people even reach out to us if we can rent them space inside that want to be in a space like this. So, I feel like sometimes even if we don't offer that rental space to people, if we are next to them, they're gonna want to rent the property next to us make it look nice, because now there's a lineup of nicer buildings, and they're willing to invest in improve, which I feel like will overall improve the value for homes as well. I feel like I covered most of what they said I missed anything.

McCullough Thank you. I'm gonna hand it over to Councilmember Jolly.

Jolly Can you, I've seen some of the pictures here in this photo packet. Can you give us a layout of what the business model is, you've said community, does that mean like a monthly membership? And also, if you could expand upon that, what's the range of services that you will be offering here? I look at the pictures and it looks like, I can guess what these pictures are presuming to tell us but I'd rather hear from you.

Durant So basically, we have like a cafe lounge area. And that one, even if you're not a member, you're more than welcome to come in there. You want to be on your laptop, have a coffee, grab a healthy snack. So that's going to be our cafe area here. And then we have also a spa area that's also open, whether you're a member or not, you want to get a massage or facial. What you see here is a salt room, which helps with like breathing. So, there's like a machine that goes in the back and breaks on the salt particles. This is the sauna room. And so, these are basically member amenities, what you're looking at. So, this is the stuff we would be offering for people who are members of the facility. This is just kind of the layout that we renovated the basement area. And then what you see over there is that Blue Room, it’s basically called an ice room. So, basically what we're offering there, it's like these beds, its dry ice, lay in it, and engulfs you, this one is actually very, very cool. So, all these are basically what the member amenities would be. And then there's the fitness area, we're offering classes, we're offering open gyms, the fitness area here. And we are limiting our capacity. So, if you guys are worried about traffic, we are not overcrowding the place, we're actually taking, we can fit more people into the like membership area, but we're actually taking less people to ensure that it's not overcrowded in there. And we're also not overcrowding the street. These are just some of the spa rooms, massage rooms as well.

Jolly Do the current plans anticipate a certain usage of parking spots?

Durant Yes.

Jolly Will those need to increase from the current footprint of parking spots?

Durant If we expand, we do plan on increasing them, we would need to increase them. But what we have right now is sufficient enough for the occupancy that we were given.

Budzinski Thank you. So, all of the things you just described would fit in the 10,000 square foot footprint that already exist in this space? Is that correct? Are you needing to build up or…

Durant So the reason why we need to build up our existing business offers personal training. And in order for us to move our members there too, we do need to at least start with that small Phase 2 addition that Mark showcased. So that way, we don't have two businesses, it doesn't make sense for our members to go to Dearborn Height to do their training and then do their membership stuff here. And that's why we really wanted to do the Phase 2 addition in order to just make it easier for people. We're primarily known for offering personal training. But there's some people that can't afford that and that's the main reason why we're offering the community center. But we still have our existing community that still wants to continue to do training and I just felt like making them drive to two different places wouldn’t it makes sense.

Budzinski How long have you been in Dearborn Heights?

Durant Seven years.

Budzinski In terms of our conversation here about the lot split to RUF, what is your timeline for the secondary building that you're thinking about doing?

Durant For the smaller one, the second one, if you guys give us approval, I plan on working on plans and hopefully, you know, starting to get some numbers together and all of that we have to budget at all. And that's the main reason why I wanted to know if we can rezone the whole thing, because we do have to plan years ahead to budget an expansion like this. So even this expansion, you know, I planned it for the last five years, it wasn't something that I was just able to do. So, we have to scale this business properly in order to go back to the bank and say, hey, we're doing good, we want to do an expansion. So, if we don't know if we can result in or not, I can't start financially planning appropriately, not knowing how much land I got to use or not. And then also, as Mark noted, some banks do have a problem with the RUF even as we were going through funding, that was a big issue until you know, the city explained to them

that we can go ahead because the second they see RUF, they say you can't do C-1 over there.

Budzinski Do you feel comfortable going forward with your business plan, if only half or two thirds of the current land is approved for commercial, but the remaining portion remains RUF?

Durant To be completely honest, I said comfortable only because I feel like I would be losing out on some value. Like I don't mind, obviously giving the neighbors enough space where they don't feel uncomfortable, I don't want to make anyone feel uncomfortable in their home. But I do feel like it can be like a fair split, because it's kind of like telling them they can't use their backyard. Because we did purchase, you know, the building and the land. And when we purchased it, part of the cost of the building, the seller took into account that half an acre, so it's a big parcel, it's actually almost as big as what the existing building is on. So, to just have that, because right now it's going to waste it's not being used, and I don't mind putting a high fence, you know, whatever makes the neighbors feel more comfortable with us being there. I just feel like whatever it is, I guess, fair to both sides.

Budzinski And I guess my final question would be, would you be willing to invest in landscaping that created a kind of barrier along the perimeter that is trees or something that created a more visually appealing, perhaps, dim some of the light pollution?

Durant 100%. That's actually something we already plan on doing. Because even if we're not going to build out that expansion right now, part of my goals is to actually redo all of the landscaping on that land just to make it look nicer, because right now it's you see how it looks, so we want to take into account you know, putting some trees or a fence, we'll have to kind of work with the city on what they allow us to do. But that's definitely in the plans.

Donovic Thanks, Mr. President. A couple of questions for Mr. Taormina and also the petitioner and a few comments. Mark, Mr. Taormina, we have to talk about future land use of this unique parcel because this parcel is unique. All the parcels that surround this virtual square essentially rectangle, are all unique in nature. What are the lot widths, for example, that back portion that abuts directly to that house back there with a small backyard has a lot of width is that maybe 60 feet wide?

Taormina You can see right here on the plan. This block for example is 70 feet, adjacent to it is only 45 feet, at least the street frontage. These are a little bit pie shaped, so it widens out at the building line. This next one is 50 feet, this one's only 35 feet. So, it's varied.

Donovic So, a couple a couple of comments to the residents. Definitely sympathetic to not wanting something more commercial in your backyard.

I mean, naturally, I understand that. At the same time, it's a commercial property, even though it's been zoned RUF. It's operating the commercial property. And I agree, I would love to see residential here. But when we talk about the lot widths, there isn't room, you could do a few houses, maybe. But you're talking about multiple neighbors all selling their backyards, which is very difficult to do if they own it free and clear. If they have a mortgage on it, it's virtually impossible, short of your bank allowing you to split off a piece of your property and paying the bank. So, my point is that no residential developer can come here so long as this commercial building is standing, and buy everyone's backyards, and make it financially feasible. So, I just don't think that's realistic. And that's just my opinion, as one Councilmember, I could be completely wrong. I just don't see commercial owners selling their property for what they want. And then all these other homeowners selling portions of their land for what they would want and making a big residential development here, again, my opinion I just don't see that happening. And then talking about some of the vacant buildings we have, it's super frustrating. We shouldn't have vacant properties, but we as Council in the city, we can’t determine what will happen with vacant properties, we can only determine what a petitioner is bringing before us because they're the private property owner, we can't tell the vacant owner down the street to go and develop their property, because it's their property. But I do wish that all the vacant properties in our community were good owners and that's what I see here tonight is a good owner that's coming to a vacant property that is ugly and dilapidated and needs to be really addressed. And I see an opportunity here. At the same time, I understand the residents that, you know, that they they're used to having grass, a large grass area back there, mine is not theirs, you pay property taxes on it, the residents don't pay property tax, if you bought this piece of property, intending to use it and you paid a significant amount of money, I'm assuming for that area back there. And that's what Council needs to do is determine if you can use it or not. And then I guess we'll see what happens. But just a few comments there. To Petitioner this existing building that you have right now, do you plan on making exterior renovations to that building? When do you plan on doing that?

Durant We are actually doing exterior renovations. Right now, we're actually 50% completion with our interior renovations and that looks like we could see the exterior outside. So, we're redoing all the removing all that wood, we're putting porcelain tile, we're adding steel framing, we already replaced the roof, we're replacing all the glass, we're closing that skylight area, I mean, we're putting in a skylight, it's open in the middle, which causes water issues in the building, where we are redoing all the landscaping. It is basically directing the water wron0g, we're going to fix all that. We're going to repave the lot, so we're doing a lot to the exterior.

Donovic I asked that question because I'm not comfortable with rezoning the property if you're not going to do exterior modifications. And that is my thought as one Councilmember, if you're asking us to redevelop because

you're promising us, you're going to do this really beautiful plan, which I love the plan. I think our community does need a type of luxury fitness. I mean, this would be the kind of project I'd see, so often we hear about projects at Haggerty Road and Eight Mile, Seven Mile, Six Mile, very rarely do we see these beautiful plans over on east side of town. So, I see this opportunity that you want to really do a nice high-end development over here. But my problem is, are you actually going to do it? Do you actually plan on doing the exterior modifications to this building?

Durant So, we are definitely doing it and Mr. Mark knows. This is, you know, we had to go through funding. So, everything that we proposed to the city that we're going to do we have to do, because that was our proposal we made, so we can't not do it. Even if we changed our mind, it's gonna get done regardless.

Donovic Good, good. And my last question, the renderings that you provided to us. Those renderings are the existing building right now. It's not the second building you're talking about.

Durant Yes, correct.

Donovic Okay, so what do you think the timeline is going to be between, you know, this body making a decision within a few weeks or months and the time that you're moving forward with the entire renovation outside and inside for the existing building?

Durant We already started construction on that one. Are you asking how much more time we have left? Like right now, based on what my contractor's timeline is, we're looking at about fall to be open and done.

Donovic Thank you. Thank you, Mr. President.

Ptashnik Thank you, Mr. Chair. Quick question, I'm not sure if this goes to Mr. Taormina or Mr. Fisher. First, I know that the wall agreement has expired. So, would be at a wall now at this point, as well?

Taormina That is something the Inspection Department is going to have to resolve. As I said, the separation agreements have expired and so they're either going to have to renew that or the petitioner is going to have to come back with a requirement for a wall. That's my understanding. But we I really haven't looked at all the scenarios with the Inspection Department on what has to be done.

Ptashnik I guess I'm just wondering if that would help with some of the separation from the residents and the business if the wall has to go up, but I'm not sure if you thought about that in your plan as well.

Durant Are they talking about the existing wall that is already there?

Taormina So let me just go back to the show.

Ptashnik There was an agreement for a fence instead of a wall that has now expired.

Taormina There is a partial wall along the north side and there's no requirement for a wall here. The question remains, how much of a wall was required here again, it's not a commercial zoned property at this point, but if we were to rezone it, if you were to rezone it, then that would definitely trigger the need for the wall to be constructed and at least along those areas where it's zoned commercial.

Ptashnik So if we split it, however we split it, RUF to C-1, the wall would come into play under C-1?

Taormina Correct.

McCullough Councilman Jolly then Councilman Morgan.

Jolly Yeah, the only question I would have is, it's just I'm critiquing some of the stuff you just said. You said, the second building. And there's currently the first building, you've kind of given us some plans for a second building. Are there plans for a potential third building at some point, because I kind of, the way you said, something kind of made me think that the second building was maybe not the end building.

Durant So, that second building is only going to take up a small piece of what's already next to the existing building, but you're still going to have that whole area of grass is not going to be touched. And that's where we need to find that, financially, if we know if it is going to be resolved, we do plan on possibly having an addition there. Right now, with that building size that we have, it's really not enough to take on more people in the community and more people want to be members, like I said, we already have like a long waitlist. So, in order for us to stay in the same area, it would make sense to use the land and just have our extension over there.

Jolly So, we're talking about potentially a third building.

Durant Correct.

Jolly All right, okay. Well, having all the information is helpful for us in regards to you know, Mr. Taormina has laid out potential splitting of the zoning, you're advocating to have the full zoning, just in terms of understanding where we potentially could be headed here, gives us a clearer idea of the decision we're making and what that means.

Durant I mean, yeah, even for me, I did think of possibly putting myself a house in that area if it were turning residential, but even my contractor told me to be very difficult. Then to have a home right next to a commercial building, even if we were to build some homes there. What are the odds of someone buying it literally in the parking lot of a commercial building? So that's why for us, it didn't make sense to entertain the residential route. We didn't think, okay, how can we best use the land? But I feel like it would be best used if we were to have it as an extension to the business as we grow in scale.

Jolly Yeah, I think, just to give you my quick thoughts here, I understand what you're saying in regards to a splitting of usages does not necessarily make sense. Right? Like, you're not going to build a house back there. No, I mean, nobody in their right mind would want to live, you know, go enter through a commercial property and then live behind it, right. But you're also in a very odd circumstance in terms of the shape of the lot, the surrounding usages of the lot. So, there's just a lot for us to navigate in terms of, it's not just what you want to do, it's if we rezone the whole thing for the commercial purpose, what are the other requirements? And so if you potentially want to put a third building there, then that kind of frames our mindset in regards to how close will that be, potentially, theoretically, to some of these other houses and stuff like that? It's just the broader picture of things. It allows us to get to a more clearer answer.

Durant I mean, honestly, for me, I'm willing to work with the city, even with this building, whatever they advise us with, we took. In the coming years, we decided to expand whatever the recommendations are, is what we will follow. Like I said, I don't want to make it where is the neighbors and the residents mad at you? So, I don't know exactly yet because this is like a future plan thing. And we still have to get the engineers out, figure out the whole water sewer situation. So, for all we know, maybe engineers do say we have to stop way further. And then we think that's all going to depend, as we looked into it before in the future.

Jolly I appreciate that. Mark, can I ask you a follow up? So that rear property line, I feel funny saying rear because it's kind of an angle in this position. But the rear property line there, if she were to build a potential third building, how close could the rear wall of that building needs to the property line, if this were to be rezoned? I know that's a loaded question.

Taormina No, it's I believe it's the setback requirement. The minimum is 20 feet in the C-1 zoning district.

Jolly So, we're talking 20 feet from that rear property line.

Taormina Yeah, conceivably.

Jolly Okay. And if she wanted to come back and do the second building, they would have to go through site plan approval.

Taormina Correct.

Jolly And if she wants to come back with a third time, we'd have to revisit that again through a new site approval.

Taormina That is correct.

Jolly Okay, so we really don't have to do too much worrying about that right now.

Taormina I would agree.

Jolly Thank you.

McCullough Mr. Morgan.

Morgan That pretty much covered what I had, what my questions were. So really, all's we're doing is we would be just changing this to a C-1, if we were to approve that and any other building that goes on this property before that takes place, it will have to come to this governing body, is that correct?

Taormina Correct.

Morgan Okay.

Donovic Mr. President.

McCullough Councilman Donovic.

Donovic To my colleague’s question. If we do rezone the entire thing, then it would give the petitioner the legal right to develop a commercially operated building on those properties, short of us having site plan concerns with the facades and whatnot. And they then legally have a right though. And we could just deny it because the residents don't want it, you have a right to those factors, so to speak.

Taormina Well, I'm going to refer this your question to Council because the question of constructing a permitted use that otherwise complies with all the ordinance requirements, would suggest that you're in a position that you might have to act favorably on that. And so that's part of the reason why we're suggesting to scale back the rezoning as part of this first phase.

Donovic Can you help clarify, I'm a little confused on the number of buildings, because the plan we have just shows an existing building. It doesn't show

a second building. I see a proposed building for the building that the petitioner is talking about, where is the second building?

Taormina Again, I'll describe this again. So, this is the second building. So, if you look at, look at this plan, this is the existing building. This is what she would propose as part of, this is called the second phase. This probably illustrates that the best, this is the existing building. So, picture this, I know, it's difficult, and it's probably not, it’s just a rendering, you see the palm trees. But this would be Middlebelt Road on the far left. So, this is the existing building. This is that second building kind of tucked behind the existing buildings. So, this is the existing, this would be the second building.

Donovic If we were to sort of split this in half, or whatever the size is, would that second building be in that first portion closest to Middlebelt?

Taormina Back to this plan that I showed. That building, that second building, would sit roughly here.

Donovic And would that second building meet the setback requirements, and what have you? I guess what I'm thinking is, do we have to adjust that line accordingly to make sure that the petitioner meets all the proper criteria to build a second building?

Taormina That's a that's a very good question. So, this line, again, was just for kind of illustrative purposes. Just to give you a sense, this is 275 feet from this point to this point, it may or may not encompass everything that's needed for that second building. So, whether this line moves a little bit east, or west, for that matter, depending on how she would accomplish that phase. We don't have all the information to be able to make that determination right now. So, if the Council wanted to act on this, I would suggest that there would be some additional information provided by the petitioner that shows us more specifically, what would be required. If your thought is that you could rezone enough of this property to facilitate that second building, then we should make sure that this line is far enough east in order to facilitate the….

Donovic If we rezone a portion of this property, depending on what Council wants to do, rezone a portion of it, then you're like, oh, I can't build that building, because I'm two feet within the rezoning line we create.

Taormina I would say, based on this plan and with judging from the improvements that are shown, that probably going to at least this line right here, which is 330 feet, that'd be more than enough to accommodate that.

Donovic Thank you.

McCullough Councilwoman Budzinski.

Budzinski I don't know exactly where the question goes. But if we just approve a partial or commercial to allow for the current space and the potential for a second, are we able to put in any requirements for trees in the RUF or would we have to wait for a site plan with what comes up for us and just do it along the perimeter for the new commercial zone?

Taormina So there is a way to conditionally rezone the property. However, that would have to be by means of the petitioner voluntarily offering those improvements and conditions. So, this body has the authority to enter into a conditional zoning agreement, only where the applicant submits to you, and you approve those conditions, the statement of conditions that would outline these improvements. We cannot dictate to the applicant what those conditions can be. If she wants to voluntarily offer those and provide those in the form of a plan or a statement of conditions, as I said, that's something that you can accept. And we have done that on numerous occasions, as Mr. Fisher will testify.

Fisher Certainly, we've done it on many occasions.

Budzinski And just for my own knowledge, for the 20 feet from the neighbors, would it be all three neighbors that are abutting up or just the one on the far east?

Taormina Let me verify the information on the setbacks. Okay. Because it varies, depending on circumstances. I think it might get 20 around, but let me check out the site and the rear yard requirements, give me a second so if you have other questions.

McCullough Thank you. And then just to kind of get back on. I mean, right now, this is a public hearing, mostly for the zoning change. And I know, we're looking a lot under the plan and I appreciate you bringing that forward, and let's just keep it on topic in theory. Council, I don't think we have a motion, do we?

Jolly At this time, Mr. President, I will offer an approving, a denying and committee of the whole to give us some time to think about what we're going to do before the next meeting.

Donovic Mr. Chair, Mr. President. Are we, at this point, going to specifically say whether it’s just for a portion of the property, the entire parcel itself?

Jolly I’ll offer an approving for partial, I’ll offer an approving for the whole and I’ll offer a denying for the Committee of the Whole. Mark tries to give us some very, very good direction. You heard some of the things that Council is interested in, in regards to, considering the full scope of what you're asking for. I think some of the Members might appreciate if you took some of those things into account before that meeting.

Durant I personally would like to add trees, because if I can block the residential areas, I think it's even better for us moving forward. So, if we were to ever use the land, you know, you don't see residential houses or anything like that, because right now, there's a house next to us and if the person there tells us we can put a wall, we would like to. It's also for our privacy and their privacy. I feel like it's best for both parties.

Donovic So I got a question for that point. And I don't want to put you on the spot, so you don't have to do this right now, the southern property, the wall that separates right now because it's a wooden fence, and then the one to the northern two properties, there's no fence on there, it's kind of sporadically open on that portion?

Durant There is like halfway then a break point, and then there is a little while, so when it stops and then there's nothing.

Donovic I guess my question is, it'd be a significant ask for us to ask you to install a masonry wall, if we're not going to rezone the entire thing. And I don't want to make you do something that is not financially feasible, at the same time, I want to offer some buffer to the residents. So, it'd be nice if you would conditionally, or you voluntarily would add some vegetation, some trees to buffer the northern portion and the southern portion. With that, I guess that's a difficult decision. Do we ask you to remove that wooden fence and put a masonry wall back there? Is that kind of overburdensome? Or do we just ask if you would you be okay with putting pine trees or some sort of trees back there? It's kind of hard to make a decision right now.

Durant The thing is like, if it comes to that phase, and we are building, that is something that, these are the things I need to know. So financially, we've been taken into account, that's something that's going to make everyone happy. Where, you know, I think vegetation will look nice and appealing for both sides. And you're saying that's if we were to use the rest of the land, right? That's something we can do.

Donovic Because I have my gut instinct. And I can only speak for myself. As you know, I wouldn't be shocked if Council only approved the one portion of this to be rezoned, and the other portion set for another day when you're ready, because I don't know if you do this often, but a lot of times petitioners will come before us and they're going to rezone a piece of property, speculatively are going to rezone it. And we will approve the zoning contingent upon the site plan being approved. So, what I could see theory here, that Council approves the one, the fronting portion along Middlebelt be rezoned, that 330 feet or whatever it may be, and then you're really successful in this first portion, and you come back, I'm bursting at the seams, I need to build that third building back there. You would come back before Council. The only caveat to that is you got to spend that money to do this really nice plan and go through all these hoops and maybe you still don't get approved, but that is just the cost of

doing business, I guess. So, do we make you do that masonry wall or buffer at that point, or do you voluntarily do the buffer trees right now?

Durant To do the buffer of trees right now, and we're not using the land, that's like half an acre of land that would cost a significant amount. So, if we're not using that land, it wouldn't make sense to do so. But in the case that you tell me, hey, when you're ready to build, that is something we would like you to volunteer, I feel like that's a fair exchange.

McCullough Vice President.

Ptashnik Thank you, Mr. President. I guess my question is, I'm trying to clarify what Mr. Donovic was actually saying, if we were to approve a portion, but that would be C-1, then the petitioner would have to build the wall unless they get the wall agreement signed.

Donovic I guess what I was saying is that I don't think it'd be fair for Council to require the petitioner to buffer all that half acre back there, the RUF part, if we don't rezone that portion. From my perspective, if we're not going to rezone the entire portion, then we shouldn't have the right to force you to go back there and do a bunch of enhancements on a piece of property that we're not allowing you to rezone currently. But if we do rezone this, this portion along Middlebelt, then I don't know what kind of conditions we could place in terms of buffering to that, just that 330 feet or whatever, to the north.

Durant Yeah, I understand it now. I mean, either way, we're doing landscaping in our portion, whether it was going to get rezoned or not. And I guess it's very hard to decide this, no one knows what we're gonna do with that. I also take into account if I do put in all those trees now, their maintenance yearly, and all that, and it's not being used.

McCullough All right. Is that it for Council? Alright, so, right now we have I think six motions, correct?

Jolly I think it's four.

McCullough So yeah, committee of the whole in general…

Jolly Then half approval for the rezone, a full approval and a or denial.

Fisher So, what meaning is this for?

McCullough Sara, are we targeting May 6th?

Kasprowicz So targeting May 6th.

Taormina Can I make a suggestion that we push this to the 20th? Allow me time to work with the conditions? I think it'd be a time well spent.

McCullough So May 20th this will be on the City Council agenda. Anything further from the audience? Seeing none, I'm going to close this item and move on to item number two.

As there were no further questions or comments, the Public Hearing was declared closed at 7:59 p.m.

LETTER TO THE LIVONIA CITY COUNCIL

Planning
March 7, 2024

MEETING DATE	PREPARED BY
	Stephanie Reece, Program Supervisor,

AGENDA ITEM

Petition 2024-01-01-01 submitted by SR&D Development under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

BACKGROUND DETAILS

March 7, 2024

Honorable Members of the City Council
City of Livonia, Michigan

Re: Petition 2024-01-01-01 - SR & D Development

Dear Council Members:

At the 1,210th Public Hearings and Regular Meeting held by the City Planning Commission on March 5, 2024, the following resolution was adopted:

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

#03-07-2024 RESOLVED, That the City Planning Commission does hereby recommend to the City Council that Petition 2024-01-01-01 submitted by SR&D Development under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business), be approved for the following reasons:

1. A zoning change to C-1 would be compatible and in harmony with the area's surrounding land uses and zoning.

2. The proposed C-1 zoning is consistent with the longstanding commercial use of the property.

3. C-1 zoning will eliminate the nonconformity and the need for future use variances.

4. The proposed zoning change represents a reasonable and logical plan for the subject property

that adheres to sound land use planning principles.

FURTHER RESOLVED, That notice of the above hearing was given in accordance with the provisions of Section 13.13 and 13.15 of Livonia Zoning Ordinance, as amended.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

DETAILED WORK BEING PERFORMED

PH042224/R050624

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc):

ATTACHMENTS

1. 2024-01-01-01_SR&D_E-COUNCIL Pkt

APPROVED BY

Date: March 07, 2024

Mark Taormina, Planning and Economic Development Director

Date: March 15, 2024

Maureen Miller Brosnan, Mayor

REZONING APPLICATION
CITY OF LIVONIA, MICHIGAN

All applications must be presented in quadruplicate to the City Clerk, 33000 Civic Center Drive, Livonia, MI 48154-3097. Applications **must** include property owner's name, address and notarized signature. You are invited and encouraged to review your proposal with the Planning Department staff.

Date Filed: 1/25/24 Petition 2024-01-01-01

Site Address: 18340 Middlebelt Rd Sidwell _____

Requesting To Rezone Property From RUF To C1

For the Following Reason (s) Rezone existing building to better match our use. Rezone land parcel as well for future addition.

Applicant: Sahar Durant Business/Company: SR & D development

Applicant's Address: 200 n st clair City: Toledo State: OH Zip Code: 43604

Applicant's Phone # (313) 286-5070 Applicant's Email Stormfitnessllc@gmail.com

For fee computation, see attached Fee Schedule **Please provide the following information:**

1) **Legal Description** of the property to be considered. Paper copy must be clearly printed.
2) **Fully Dimensional Map (3 copies)** drawn at an appropriate scale, with a north arrow, dated & legend key to symbols and showing:
   - The land that would be affected by the proposed amendment.
   - The dimensions, square footage & acreage of the land.
   - The existing conditions of the site, including all structures & parking layout.
   - A legal description of the land to be rezoned.
   - All public and private right-of-ways & easements bounding & intersecting the site.
   - A preliminary plan showing the proposed land use(s) of the land under consideration.
   - The zoning classification of all abutting zoning districts.
   - The structures and existing land uses on all property adjacent to the subject parcel and on other such property as may, in the City Planner's determination, be necessary to properly reflect the existing character of the surrounding neighborhood.
3) A copy of the Fully Dimensional Map submitted in a pdf. format either on a CD or it can be emailed to Planning@livonia.gov

RECEIVED JAN 30 2024 CITY OF LIVONIA PLANNING COMMISSION

Owner of Property: SR & D development

Owner's Address: 200 n St clair st City: Toledo State: OH Zip Code: 43604

Owner's Phone # (313) 286-5070 Owner's Email Stormfitnessllc@gmail.com

Signature of Owner: _____ Print Name: Sahar Durant

Subscribed and sworn to before me, a Notary Public in and for the County of Wayne State of Michigan

on this 25th day of January 20 24.

Signature of Notary Stephanie K Reece My commission expires September 28, 2027

Received 1/26/24

APPROVED AS FORM
Department of Law

By: Michael E. Fisher

Date: 1/29/2024

STEPHANIE K. REECE
Notary Public, State of Michigan
County of Wayne
My Commission Expires Sep. 28, 2027
Acting in the County of Wayne

UNAPPROVED MINUTES

MINUTES OF THE 1,210th PUBLIC HEARINGS AND REGULAR MEETING HELD BY THE CITY PLANNING COMMISSION OF THE CITY OF LIVONIA

On Tuesday, March 5, 2024, the City Planning Commission of the City of Livonia held its 1,210th Public Hearing and Regular Meetings in the Livonia City Hall, 33000 Civic Center Drive, Livonia, Michigan.

Mr. Ian Wilshaw, Chairman, called the meeting to order at 7 p.m.

Members present:	Wafa Dinaro	David Bongero	Glen Long
	Peter Ventura	Ian Wilshaw	

Members absent: Sam Caramagno

Mr. Mark Taormina, Planning Director, and Stephanie Reece, Program Supervisor, were also present.

Chairman Wilshaw informed the audience that if a petition on tonight's agenda involves a rezoning request, this Commission makes a recommendation to the City Council who, in turn, will hold its own public hearing and make the final determination as to whether a petition is approved or denied. The Planning Commission holds the only public hearing on a request for preliminary plat and/or vacating petition. The Commission's recommendation is forwarded to the City Council for the final determination as to whether a plat is accepted or rejected. If a petition requesting a waiver of use or site plan approval is denied tonight, the petitioner has ten days in which to appeal the decision, in writing, to the City Council. Resolutions adopted by the City Planning Commission become effective seven (7) days after the date of adoption. The Planning Commission and the professional staff have reviewed each of these petitions upon their filing. The staff has furnished the Commission with both approving and denying resolutions, which the Commission may, or may not, use depending on the outcome of the proceedings tonight.

ITEM #1 PETITION 2024-01-01-01 SR & D Development

Mr. Bongero, Acting Secretary, announced the first item on the agenda, Petition 2024-01-01-01 submitted by SR&D Development under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

Mr. Taormina: Thank you, Mr. Chairman. This is a request to rezone a single parcel from RUF (Rural Urban Farm) to C-1 (Local Business). This property is on the east side of Middlebelt Road, approximately midway between Six Mile and Seven Mile Roads. The address is 18340 Middlebelt Road. The property is approximately 1.87 acres in size, with 156 feet of road frontage and a depth of about 512 feet. Properties abutting the site to the north, east, and west are all single-family residential. To the south is an office complex zoned C-1. Despite the current RUF zoning, this property has a long history of commercial uses. From 1959 until about 1992, the site was occupied by a landscaping business and retail nursery. In 1993, the Zoning Board of Appeal granted a variance that allowed for the development of a physical therapy rehabilitation clinic, which operated until about two or three years ago. The current owner and applicant, SR&D Development, purchased the property late last year and is renovating the building for reuse as a Wellness Health Center. The building is about 10,000 square feet and is located near the front of the property, with parking available at the rear and along the north side. The developed portion of the site is the west half, including the parking areas. The east half, extending for about 285 feet, is undeveloped and maintained primarily with grass. There is a protective wall that runs along a portion of the north side of the property. The remaining section of the north property line, as well as the east and south sides, contain wooden fences. In 1983 the Zoning Board of Appeals temporarily waived the requirement to build a protective wall in these areas. Over the next 20 years, the Zoning Board of Appeals granted temporary extensions of the wall waiver. Then, in 2005, the adjoining residential property owners signed five-year Separation Agreements with the previous owner, Thera-Matrix Inc., which avoided the need to return to the Zoning Board of Appeals. However, these Separation Agreements have since expired. A change of the zoning of the property would eliminate the nonconformity concerning the commercial use of the land. In addition, it may help facilitate the owner's desire to expand the use in the future, realizing that any proposal to either construct a new building or enlarge the existing building will require site plan approval. The Livonia Vision 21 Master Plan designates the subject property as Medium Density Residential. With that, Mr. Chairman, I can read out the departmental correspondence.

Mr. Wilshaw: Yes, please.

Mr. Taormina: Mr. Taormina: The first item is from the Engineering Division, dated February 8, 2024, which reads as follows: *"In accordance with your request, the Engineering Division has reviewed the above referenced petition. We have no objections to the proposed rezoning at this time, but would like to note the following items: 1. The subject parcel is assigned the address of #18340 Middlebelt Road. Should additional addresses be needed, the Owner will need to contact this Department once permitting has been completed. 2. There legal description submitted with the drawings appears to be correct, and should be used for the property if the rezoning petition is approved. 3. The existing parcel is currently serviced by public sanitary sewer and water main, and storm sewer. The submitted drawings does not include any proposed utility information or calculations, so we cannot comment on any proposed impacts to the existing systems at this time. Should the proposed improvements move forward, we will review utility improvements and impacts during the permitting process.4. Although the drawings do not indicate any future utility information, it should be noted the any proposed development will be required to provide storm water improvements and detention per the Wayne County Stormwater Ordinance. Stormwater calculations will be reviewed during the permitting process. 5. Any disturbances with the Middlebelt Road right-of-way will require permits through the Wayne County Department of Public Service, including drive approach and sidewalk removals and placements."* The letter is signed by David W. Lear, P.E., Assistant City Engineer. The next letter is from the Finance Department, dated February 12, 2024, which reads as follows: *"I have reviewed the addresses connected with the above noted petition. As there are no outstanding amounts receivable, general or water and sewer, I have no objections to the proposal."* The letter is signed by Connie Kumpula, Chief Accountant. We have an email correspondence coming from the City Treasurer, Susan Nash, indicating that taxes on the property are current. The last letter is from the Assessor Department, dated February 14, 2024, which reads as follows: "*A request has been made by SR&D Development to rezone the property at 18340 Middlebelt Road, parcel No: 046-01-0002-001 from RUF to C1. Based on the plans submitted it appears they want to construct an additional building on the site. The parcel would need to be split to accommodate another building, it is unclear how they would access the rear of the property. Please direct any questions to the Assessor's Office or Livonia.gov for the lot split and combination process.*" The letter is signed by

Kathie Siterlet, Residential Appraiser. That is the extent of the correspondence.

Mr. Wilshaw: Thank you. Mr. Taormina. Is there any questions forour planning staff? Mr. Ventura.

Mr. Ventura: Mr. Taormina, since I wasn't here for the study on this. Do I understand that any action we would take tonight is strictly a rezoning action and would not have any implications with regard to future development on the site?

Mr. Taormina: That is correct. Yes.

Mr. Ventura: Thank you. Thank you, Mr. Chairman.

Mr. Wilshaw: Thank you, Mr. Ventura. Any other questions for our planning staff? Okay, I don't see any other questions. Our petitioner is here tonight. Feel free to come to our podium, either one and introduce yourself. Good evening.

Sahar Durant, 200 North Street, Toledo, OH 43604. Hi. I was so nervous about this.

Mr. Wilshaw: Oh, you're fine. You're fine.

Mr. Wilshaw: Thank you, Ms. Durant. What would you like to tell us about your rezoning request?

Ms. Durant: So, as Mr. Toarmina spoke, right now, there's already an existing building and there's about half an acre of land that's still left over and as he said, it's something that we plan to do in the near future is to hopefully, expand out into that area. Primarily right now, the main thing we want to do is rezone, and as we finish construction and see how our turnout is…if we have a lot of turnout, we want to have the ability to expand right next door to where we are in order to take on more clientele. The current space we have right now is very limited so we're only going to be able to accept limited memberships and clients and so I'm kind of thinking in the long run to have a plan ahead.

Mr. Wilshaw: Okay, thank you and as we normally mention, when we have rezoning requests, the petition itself is just a rezoning request. We're not looking to approve anything other than a change of zoning on this property at this time, but this would give you the potential of coming back in the future for site plan changes if you wish to expand the building or do things like that. So, our

focus tonight in our discussion is primarily going to be your own zoning, but we may have some discussion about what your future plans are. So just so everyone understands, that's the goal of the meeting here tonight, so thank you for your comments. Is there any questions of our petitioner in regard to this rezoning request? Mr. Ventura.

Mr. Ventura: Oh, good evening, and thank you for coming here tonight. Can you tell us exactly what a Wellness Health Center does?

Ms. Durant: Yes. So, my background is in sports psychology. So, a lot of the focus on fitness is just the physical aspect. A fitness and wellness center will also merge in the mental aspect. So, with our space right now that we're building out, it's divided into a physical area, and also an area that would address working on the internal things, such as things like brain training, light therapy, more of the holistic modalities. So that's why it's like fitness and wellness. So, we're trying to bring in that you should also be really fixing the inside before fixing the outside. That's where the true healing and recovery starts.

Mr. Ventura: Are you doing this in Toledo?

Ms. Durant: No. So, originally, my business started in Michigan and right now, my studio is in Dearborn Heights, Michigan, and it's a smaller space. So, this is the expansion that would allow us to provide a lot more of the services I had been wanting to provide. We actually just purchased a house in Michigan. So, we're going to be in Michigan soon. Originally, I'm from here, and my business is here. But I commute to Ohio because of my husband's job.

Mr. Ventura: Well, we're always happy to bring business to Michigan from Ohio. I note that there's a portion of the building that houses what appears to be a new overhead door. Is that a new garage door or did I misread that?

Ms. Durant: The existing building in the back? No those doors are already…they've been there.

Mr. Ventura: They've been there. and so does that fit into your use in some way, or…

Ms. Durant: We're gonna take out the garage doors and replace them with like regular doors. We're not going to keep that garage door, but

it's not going to be used for entrance, we're going to use the main entrance to enter.

Mr. Ventura: And I guess my final question or observation would be it appears that you're doing quite a bit of work to the building. You're going to put new siding on it or paint it, or…

Ms. Durant: So, we actually just finished changing the roof. We're gonna put all new porcelain slabs on the outside and then we're going to do some new steel framing. I believe I sent some of the pictures to the City of Livonia. So, all the outside is going to be redone. New landscaping, we're going to repave the lot. So we're investing over a million dollars in the reconstruction process.

Mr. Ventura: Okay, well, thank you for your answers. And I wish you good luck.

Mr. Wilshaw: Thank you. Thank you, Mr. Ventura. And Mr. Taormina showed some of those conceptual renderings on the screen for people to see. So, it gives at least an idea of conceptually what you're looking at doing for this property, correct?

Ms. Durant: Yes.

Mr. Wilshaw: Okay. Is there anything more about the building that you would like to talk about before we continue on with questions since it's on the screen? Is there any aspects of it that you're wanted to point out or?

Ms. Durant: No, I mean, I just hope everyone likes it.

Mr. Wilshaw: Okay. Good. Good. We appreciate you providing those. Okay. Any other questions for our petitioner? No questions from any of the commission. We'll have you take a seat for just one moment, Ms. Durant, we'll see if there's anyone else in the audience wishing to speak for or against this petition? Is there anyone wishing to speak on this item? If so, please come forward to one of our podiums here. Again, we'll ask for your name and address so we can attribute your comments.

Carmen Kelly, 18359 Grimm Street, Livonia, MI 48152 Thank you. Can you hear me?

Mr. Wilshaw: We hear you good. Thank you, Miss Kelly, and what would you like to tell us

Ms. Kelly: So I have a couple of things to hand out, and if you can just pass these down, I think we've got seven of them. So, the smaller picture, if you have the word Google at the bottom represents the south side of the property in question. Well, the north side of the property is on the top part of the picture and to the south of me is the other office park that has been zoned C-1. So, my property could potentially be straddled by two C-1 properties. The larger picture, the larger 8 x 10 picture is just an example of some of the lighting that we're getting from a C-1 zoned property, and this is currently going on right now. If you look at the pictures of the lighting, you can see…all the pictures are the same, they were just, you know, more so for the members to be able to hold on to them. But right now, I'm dealing with what can only be described as lighting that seems to have been taken by the big house at U of M. It's lit up like July at noon. This…I'll just it hold up. This is a picture of my bathroom window at 10 o'clock at night. Like it's lit up, and this is from C-1 zoning. So, as a separate issue, you know, I've been talking to the Ordinance Department, but my concern is that these lights are coming from the end of my property, which are near where the building the property in question are. And I can…it's extending 500 feet to my house, and they're not pointed at my house. So, in thinking about the building in question, as it stands right now, I'm thinking about lighting, and then with expansion that really puts…the back of that property is about 30 feet from my house. So, you know, and I support the work that you're doing. I'm very familiar with it. I'm just afraid that I would have to be there all the time for wellness, just because like my daughter was in her room last night. She's like, it's so bright in here, you know, and so those are some of the things that I'm dealing with. And you know, as we think about future development, you know, it's a gorgeous building that's being proposed. I would want to take care of it. I would want it well lit. I just don't want it 30 feet from my back door.

Mr. Wilshaw: We appreciate your comments. Miss Kelly, thank you. And thank you for the visual aids as always. All right, is there someone else wishing to speak? Good evening, sir.

Douglas Clinton 18339 Grimm, Livonia, Michigan 48152. I'm here to voice my opposition to the rezoning of this property. You need go no further than around the corner on Seven Mile Road and between Maplewood and Middle Belt, it's the empty VFW hall. Down the street between Gilman and Floral, the empty Up North Bar. Between Antigo and Rensellor on the north side of Seven Mile, empty storefronts. Back on Middle Belt Road between

Vassar and St. Martin, the Livonia pavilion, vacant and vandalized. The old Ram's Horn restaurant. Sears. Huge commercial properties that are sitting empty. Rather than rezoning this to a commercial property, I feel it would be better for it to be residential. If new housing was built in the area, it would increase the property values of the nearby residents and new businesses. I have nothing against new businesses starting up in Livonia. But I feel they should utilize some of the property that's already zoned commercial. So, thank you.

Mr. Wilshaw: Thank you for your comments. Anyone else wishing to speak on this item? Going once, going twice, no one else wishing to speak on this item. Ms. Durant, we always like to give the petitioner an opportunity to have the last word. Is there anything that you would like to say before we make our decision? Yes, certainly, you can come up to the podium.

Ms. Durant: So, I tried to kind of take some quick notes in regard to the concerns that Miss Cameron Kelly noted out. I'm not really familiar with the building you're talking about, but when I go to the building next time, I'll keep an eye out. In regard to us in general right now for the building, I am not a big proponent of big bright lights. So, our lights are actually going to all…for the outside of the building going to come from the bottom and go up. I just think it's easier on the eyes and also it's not so loud. So that's one of your concerns that some, at least for the existing building right now. For any future expansion, that's not something we're doing right now. We have to finish building this one, which is going to take us a good year and the future expansion is something that we're looking at in the next two years or so. So that's not something we're doing right now. And if we do, we have to go through all planning and everything, but in general, you're probably never going to see any building that I have a hands on doing any design for it having any bright lights. All the lights will start from the bottom going up just because it is better for the eyes in general. And then, in regard to the gentleman that mentioned all the empty businesses, I'm actually aware of that. That was one of the concerns we had deciding to purchase something in Livonia. But where I'm at right now that area was actually empty and there was no businesses there. With our client base, we're dealing with a lot of the upper middle class. So, when I moved into that plaza, it was completely empty. Right now, it's fully leased out. Across the street got bought out. The place next to it got renovated. So, a lot of times all it takes is one business to kind of open up an entire area for more businesses to believe in and kind of go back in there. And

that's actually one of the reasons we want to continue investing in Livonia because we do see a lot of vacant areas, and we feel like it's a good city. I don't know what happened with some of these businesses and why they left, but that was a concern for us even purchasing the building. But it really depends on how you look at it and the potential you can bring to a city.

Mr. Wilshaw: Well, thank you, Ms. Durant, for your comments. And is there any other questions from any of the commissioners for Ms. Durant before…Ms. Dinaro.

Ms. Dinaro: So, if you can't build the second building in the back, does the development stop?

Ms. Durant: No, the development is not going to stop. But right now we're extremely limited on space. So, one of my biggest things to bring more of the luxury wellness is to make it more accessible to people around here. But if I can only take on a certain number of people, I'm very limited and I have a whole half acre that would allow me to take on another 300 to 400 memberships in the future as we expand and grow, which I'm hoping…is the goal. So, the goal is to continue growing. So instead of opening another location in a different city, I would rather just stay where I'm at and take on more space.

Mr. Wilshaw: Thank you, Ms. Dinaro. Any other questions? One question for you, Ms. Durant. what would the hours of your business be?

Ms. Durant: Right now? Possibly, we would be open around 5:30am- 6am and then closing around 9pm or 10pm.

Mr. Wilshaw: Okay, so you will have some evening clients come in to your business, okay.

Ms. Durant: Yes, it is private membership only. So, the way it's going to be is all entry like, unless you are a private member, there is no access. So, all the traffic is going to be very controlled with us.

Mr. Wilshaw: Okay, and those members pay a membership fee to use your services. Is that how it works?

Ms. Durant: Yes, correct. And the way we're also gonna try to really keep any of, you know…as you see a lot of gym parking lots are overcrowded and all that? So, we're actually even requiring an application process for applicants. We want to make sure that, you know, you are looking for a lifestyle change to become a

member and that you're not just coming in here to waste time or, you know, just go in the cafe and all that. So, we want to control traffic as much as possible. Yeah.

Mr. Wilshaw: All right. Good. I just wanted to understand your business a little bit there. Thank you. If there's no other questions for petitioner, I think we are done with the public hearing section. Sir, yes, feel free to come forward to the podium.

Mr. Wilshaw: Good evening, sir.

Gary Reister, 18329 Grimm, Livonia, MI. You had mentioned before when you were talking about your services that you were doing holistic processes to help people. Does this include dispensing foods and that kind of medications?

Ms. Durant: What do you mean?

Mr. Reister: Well, a lot of holistic places, they have specific diets that you have to have, and specific foods that are that are provided by the people that are running the places.

Ms. Durant: Like, nutritional consulting, is that what you're referring to?

Mr. Reister: Yeah, will you be dispensing foodstuffs and selling that kind of stuff?

Ms. Durant: Not necessarily like food food, but we will have a cafe that has like healthier drink options, if that's what you're referring to, but it's not going to be like a restaurant style food, but we do offer nutritional consulting, meaning if you were to come and you need help with your food we would create for you like, basically a meal plan and a food log and all of that. And, like let's say you become a member, you would have access to our app and with our app, you put your goals in there, and it will generate for you a meal plan automatically with your recipes, pictures and everything.

Mr. Reister: Okay, so you're not intending to sell foodstuffs at your location?

Ms. Durant: Not like restaurant food. No, because we don't have like an open fire kitchen or anything like that. It’s gonna be more like a cafe. So like, smoothies, drinks on the go, stuff like that. We're gonna have like prepackaged healthy snacks on the go as well, but nothing that we're cooking inside.

Mr. Reister: Okay. Not even prepackaged stuff?

Ms. Durant: Yes, they wouldn't be prepackaged and like to go freezer.

Mr. Reister: Okay, would any of this have marijuana or those products in it?

Mr. Wilshaw: Sir, your questions should be directed toward us. But I do appreciate the dialogue that's happened here in terms of getting those questions answered quickly. Thank you, Mr. Reister, but is there any other comments you'd like to direct toward us in terms of…

Mr. Reister: No. I was just concerned if they're going to have membership only if there will be marijuana distributed since it's a membership issue.

Mr. Wilshaw: Right. That's that would not be permitted.

Mr. Reister: Okay, thank you.

Mr. Wilshaw: You're welcome, sir. Any other comments from any of the commissioners before we close the public hearing? If not, I think the public hearing can be closed, and a motion is in order.

On a motion by Ventura, seconded by Bongero, and unanimously adopted, it was

#03-07-2024 ***RESOLVED***, That the City Planning Commission does hereby recommend to the City Council that Petition 2024-01-01-01 submitted by SR&D Development under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business), be approved for the following reasons:

1. A zoning change to C-1 would be compatible and in harmony with the area's surrounding land uses and zoning.

2. The proposed C-1 zoning is consistent with the longstanding commercial use of the property.

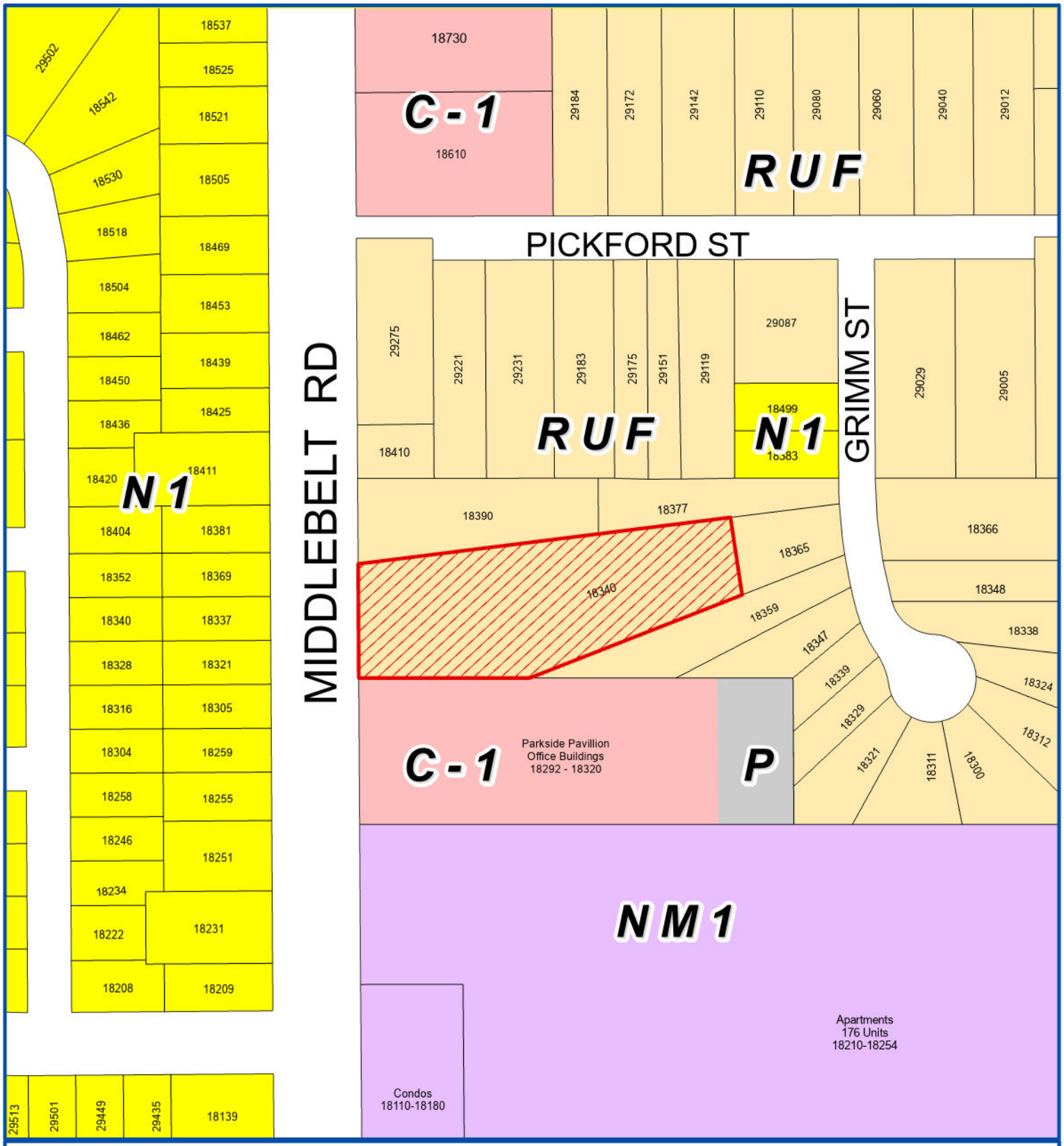
3. C-1 zoning will eliminate the nonconformity and the need for future use variances.

4. The proposed zoning change represents a reasonable and logical plan for the subject property that adheres to sound land use planning principles.

FURTHER RESOLVED, That notice of the above hearing was given in accordance with the provisions of Section 13.13 and 13.15 of Livonia Zoning Ordinance, as amended.

Mr. Wilshaw: Is there any discussion?

Mr. Wilshaw, Chairman, declared the motion is carried and the foregoing resolution adopted. It will go on to City Council with an approving resolution.



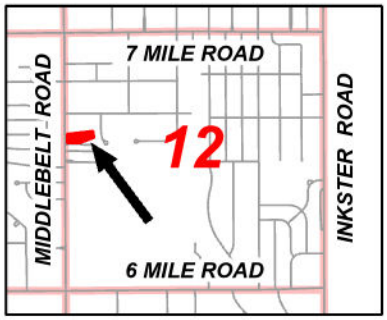
Address & Zoning Map

Petitions 2024-01-01-01
SR&D Development
18340 Middlebelt Road
RUF to C-1

N

Not to Scale

City of Livonia
Planning Department



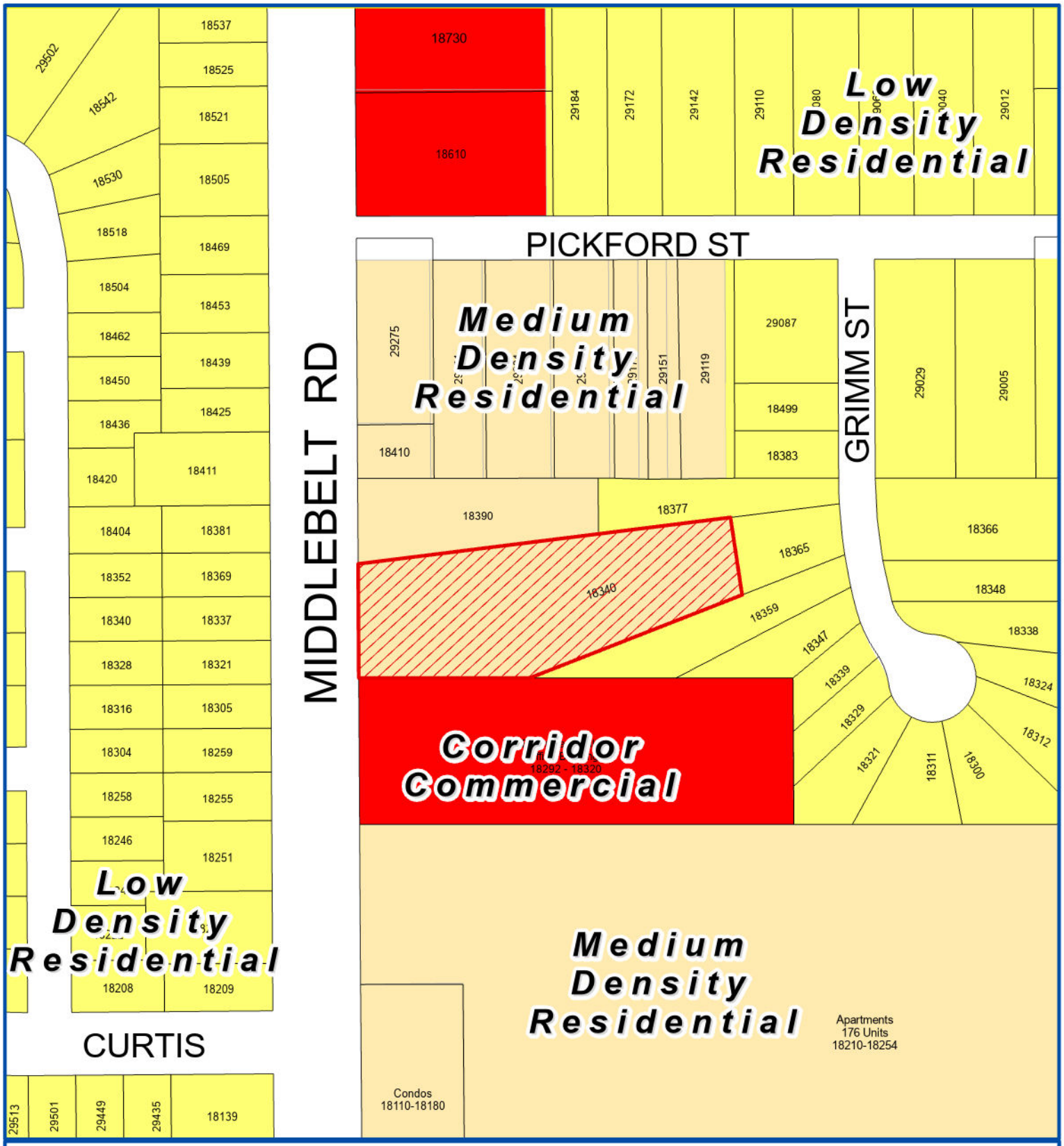
Aerial Map

Petitions 2024-01-01-01
SR&D Development
18340 Middlebelt Road
RUF to C-1

N

Not to Scale

City of Livonia
Planning Department



Address & Zoning Map

Petitions 2024-01-01-01
SR&D Development
18340 Middlebelt Road
RUF to C-1

N

Not to Scale

City of Livonia
Planning Department

PLANNING COMMISSION STAFF NOTES

PREHEARING ITEMS

ITEM 1

Petition 2024-01-01-01 submitted by SR&D Development under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

February 20, 2024, Study Meeting:

This petition seeks to rezone a single parcel located on the east side of Middlebelt Road, approximately midway between Six Mile and Seven Mile Roads, from RUF (Rural Urban Farm) to C-1 (Local Business). The parcel affected by the rezoning is at 18340 Middlebelt Road. It contains a commercial building and comprises approximately 1.87 acres of land area, with 156 feet along Middlebelt Road and a depth of roughly 512 feet. To the west, across Middlebelt Road, are single-family houses zoned N-1 (Neighborhood District). Properties to the north and behind the site to the east are zoned RUF with single-family housing. Bordering the site to the south are two multi-tenant office buildings zoned C-1 (Local Business).

Despite the current RUF zoning, this property has a long history of commercial uses. Records show that from 1959 to 1992, the site was owned by Skandia, Inc., which operated a landscaping business and retail nursery with temporary greenhouse structures at the rear of the property. In 1993, the Zoning Board of Appeals granted a use variance to Whitton-Boutros Associates to operate a physical therapy rehabilitation clinic. For the next 15+ years, the site was occupied by Whitton & Boutros Associates, which later became Thera-Matrix. The property was sold in December 2023 to the current owner, SR&D Development, LLC. Before acquiring the property, the owner of SR&D, Sahar Durant, worked with the City to verify that her business plan to operate a wellness center called Storm Fitness would be allowed under the 1993 variance. In considering Ms. Durant's request, the City agreed that the change of tenancy was consistent with 1993 approval but asked that an attempt be made to rezone the property to bring the use into conformity. SR&D is currently in the process of renovating the existing 9,936-square-foot building.

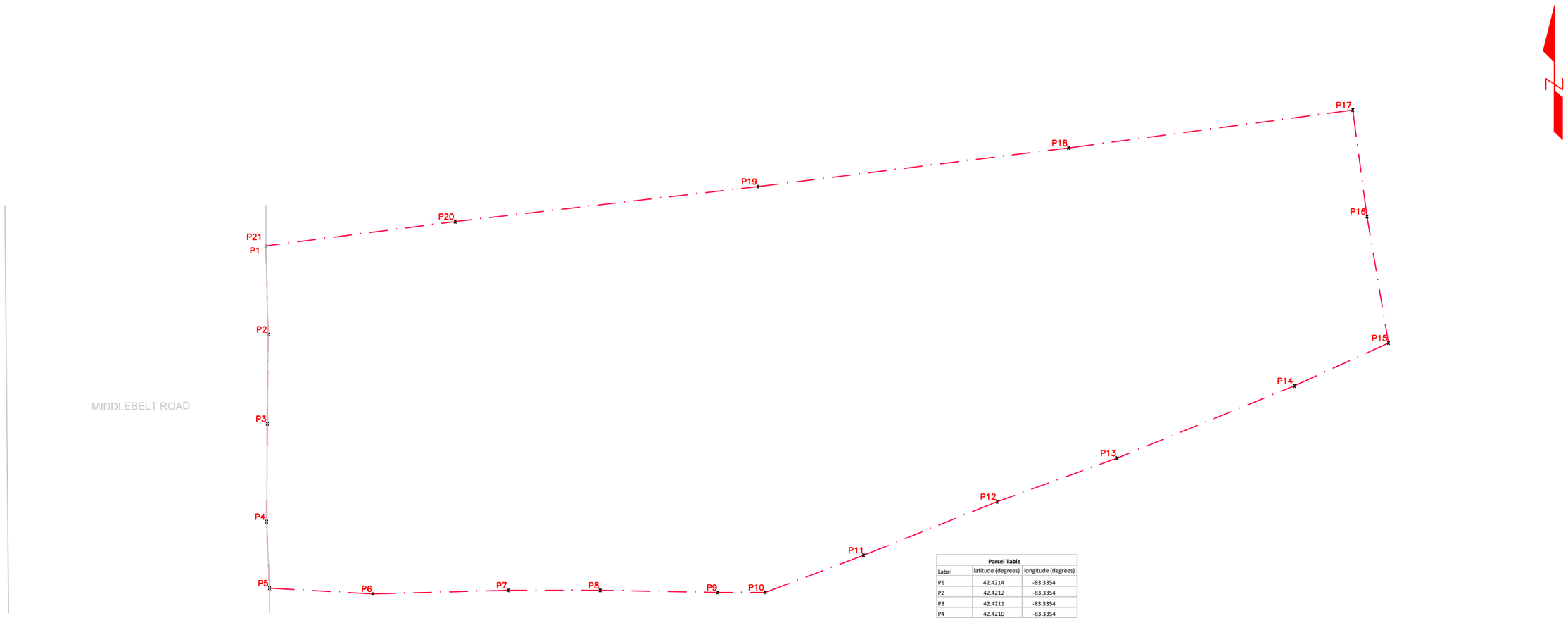
The building is located near the front of the property, with parking available at the rear and along the north side. The developed portions of the site, including the building and parking areas, are mainly limited to the west half of the property. The east half, extending for approximately 285 feet, is undeveloped and maintained with grass, except for a concrete driveway that runs from the northeast corner of the parking lot through the center of the rear of the property. It is believed that this driveway provided access to the nursery stock and greenhouses when the site was operated as a landscaping business. A protective wall runs along a portion of the property's north side. The remaining section of the north side of the property, along with the east and south sides, all lie adjacent to residential and contain wooden fences. In 1983, the Zoning Board of Appeals temporarily waived the requirement for Skandia Landscaping to install a protective wall in these areas. Over approximately 20 years, the ZBA granted temporary extensions of the wall waiver. Then, in 2005, the adjoining residential property owners signed 5-year Separation Agreements with Thera-Matrix, Inc.,

which circumvented the need to go back to the ZBA or obtain site plan approval. It does not appear that the agreements or the wall waiver by the ZBA are currently in effect.

In addition to eliminating the nonconformity affecting the use of the property, SR&D desires to someday develop the east half of the property with a second commercial building. A conceptual site plan shows the structure, measuring approximately 10,000 square feet, located behind the main building with parking on the north and east sides. Currently, the site has thirty-nine (39) parking spots, with forty-eight (48) spaces shown being added, bringing the total to eighty-seven (87). Access to the site would remain unchanged off Middlebelt Road, with a twenty-four-foot (24') drive extending to the second building and additional parking.

In evaluating this request, the Planning Commission can adjust the amount and limits of the C-1 District as it affects the overall property. For example, suppose the Commission determines that the Petitioner's long-term plan of constructing a 10,000-square-foot building is excessive based on the anticipated impact on the neighborhood. In that case, the area of C-1 can be reduced by maintaining a portion of the rear of the property under the current classification, RUF. Alternatively, the Commission could recommend rezoning a portion of the property to the P, Parking classification.

The Livonia Vision 21 Future Land Use map designates the subject property as *Medium Density Residential*. Areas identified as *Medium Density Residential* consist of areas with potential for infill into traditional single-family neighborhoods near planned mixed development centers or needing investment and stabilization.



Parcel Table		
Label	latitude (degrees)	longitude (degrees)
P1	42.4214	-83.3354
P2	42.4212	-83.3354
P3	42.4211	-83.3354
P4	42.4210	-83.3354
P5	42.4209	-83.3354
P6	42.4209	-83.3352
P7	42.4209	-83.3349
P8	42.4209	-83.3348
P9	42.4209	-83.3346
P10	42.4209	-83.3345
P11	42.4210	-83.3343
P12	42.4211	-83.3341
P13	42.4211	-83.3339
P14	42.4212	-83.3336
P15	42.4213	-83.3335
P16	42.4214	-83.3335
P17	42.4216	-83.3335
P18	42.4215	-83.3340
P19	42.4214	-83.3345
P20	42.4214	-83.3351
P21	42.4214	-83.3354

LEGEND

— · — · —	PROPERTY BOUNDARY
P1	POINT LABELS

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT:

STORM FITNESS CENTER

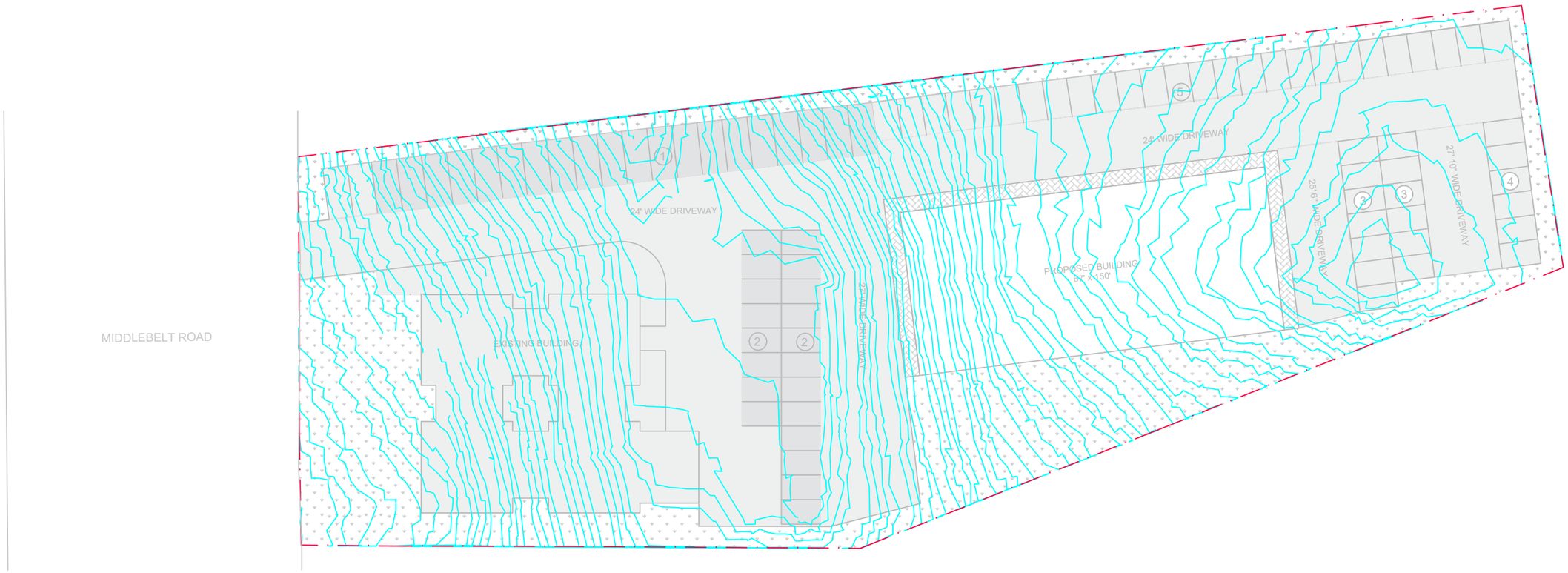
DRAWING TITLE:

CIVIL PLANS

BOUNDARY SURVEY

DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-1	SES CODE P-065	STATUS: FA / REV: 00

FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT



LEGEND

	EXISTING CONTOURS
	PROPERTY BOUNDARY
	EXISTING BUILDING
	PROPOSED BUILDING
	GREEN AREA
	PAVED AREA
	EXISTING PARKING
	PROPOSED PARKING
1	PARKING COUNT

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE
Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT:

STORM FITNESS CENTER

DRAWING TITLE:

CIVIL PLANS

CONTOUR PLAN

DRAWN BY	MUHAMMAD AALIYAN ASHARF		SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ		A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ		DATE: AUG, 2023
APPROVED BY			
DRAWING NUMBER:	SES CODE P-065	STATUS	REV
A-2		FA	00

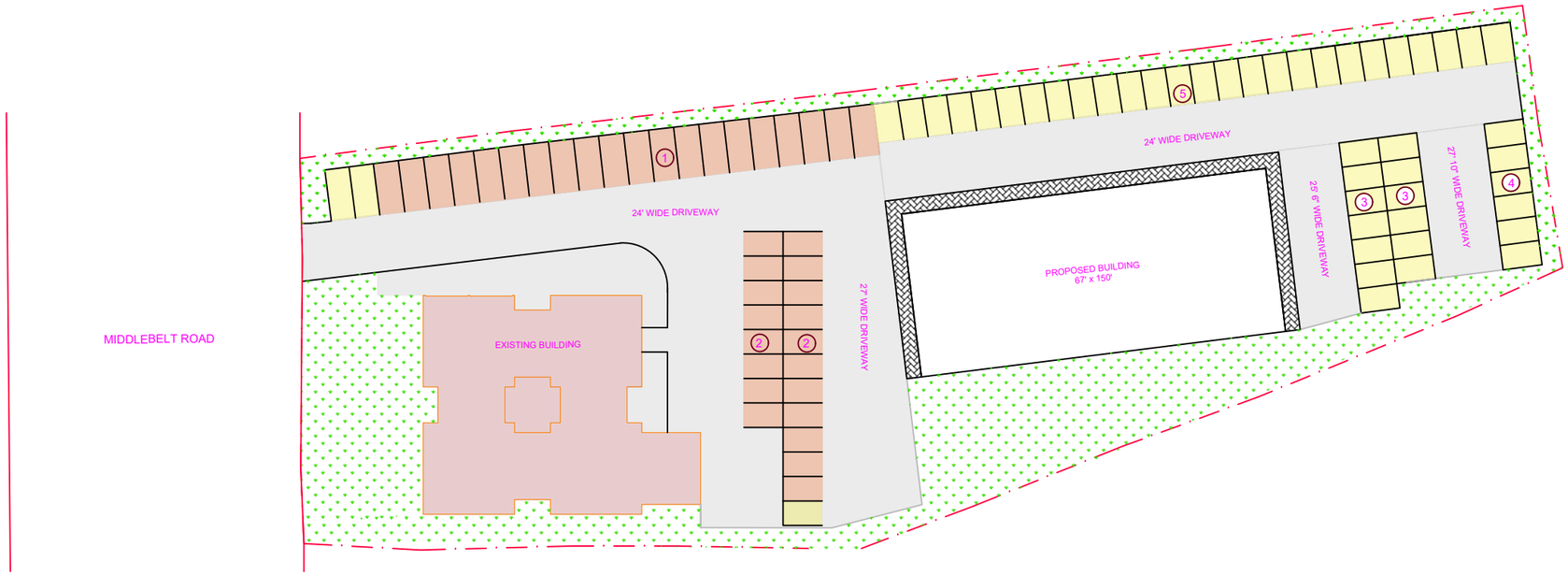
FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT

SITE LAYOUT NOTES

1. ALL EDGES OF PAVEMENT ARE TO BE STRAIGHT (OR OF CONSISTENT RADIUS IN THE CASE OF CURVES).
2. TO MAINTAIN THE INTEGRITY OF HORIZONTAL AND VERTICAL CONTROL FOR THE SITE, THE SURVEYOR OR PROFESSIONAL ENGINEER EMPLOYED BY THE CONTRACTOR TO PERFORM CONSTRUCTION LAYOUT STAKING, SHALL SET AND PROTECT ADDITIONAL TRAVERSE POINTS OUTSIDE THE AREAS OF CONSTRUCTION ACTIVITY.
3. CONTRACTOR SHALL REFER TO BUILDING ARCHITECTURAL PLANS FOR EXACT LOCATIONS OF ROOF LEADERS, CONCRETE SLABS, UTILITY LOCATIONS, ETC...
4. PROPOSED PAVEMENTS SHALL MEET THE LINE AND GRADE OF EXISTING ADJACENT PAVING SURFACES AND SHALL BE TREATED WITH TACK COAT AT POINT OF CONNECTION.
5. ALL PROPOSED SITE FEATURES SHALL BE LAID OUT AND STAKED FOR REVIEW AND APPROVAL BY THE OWNER'S REPRESENTATIVE PRIOR TO INSTALLATION. ANY REQUIRED ADJUSTMENTS TO THE LAYOUT SHALL BE UNDERTAKEN AS DIRECTED AT NO ADDITIONAL COST TO THE OWNER.

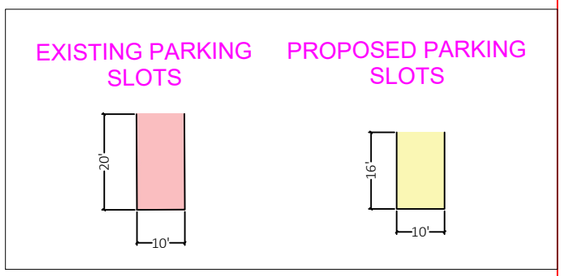
IMPERVIOUS AREA RATIO

TOTAL LOT AREA = 81269.23 sq. ft
IMPERVIOUS AREA = 62057.18 sq. ft
IMPERVIOUS AREA RATIO = 76.36%



LEGEND

— · — · —	PROPERTY BOUNDARY
	PROPOSED BUILDING
	WALKWAY
	EXISTING BUILDING
	GREEN AREA
	PAVED AREA
	EXISTING PARKING
	PROPOSED PARKING
1	PARKING COUNT



PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia, MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

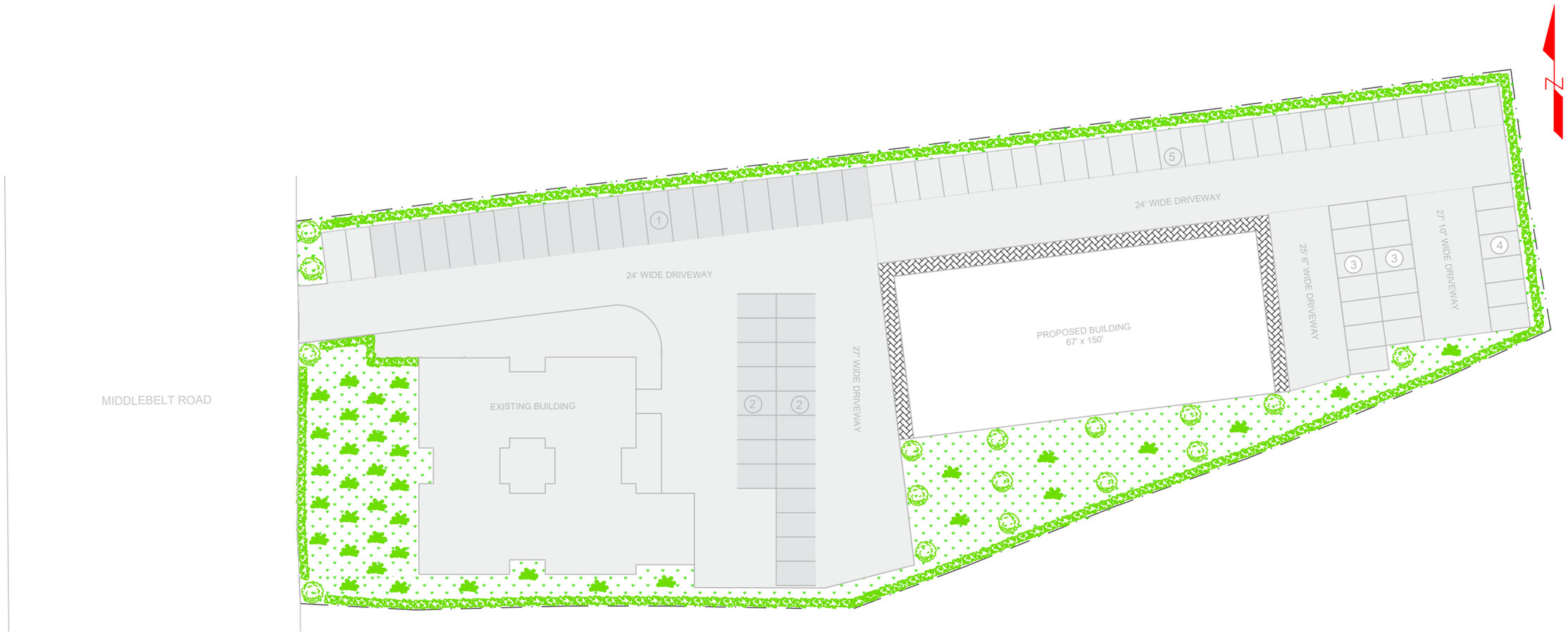
PROJECT: STORM FITNESS CENTER

DRAWING TITLE: CIVIL PLANS

SITE LAYOUT PLAN

DRAWN BY	MUHAMMAD AALIYAN AHSRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-3	SES CODE P-065	STATUS: FA / REV: 00

FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT



LEGEND

— · — · —	PROPERTY BOUNDARY
	PROPOSED BUILDING
	WALKWAY
	EXISTING BUILDING
	GREEN AREA
1	PARKING COUNT
	REDBUD TREE
	BUTTON BUSH
	FETTERBUSH

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT:

STORM FITNESS CENTER

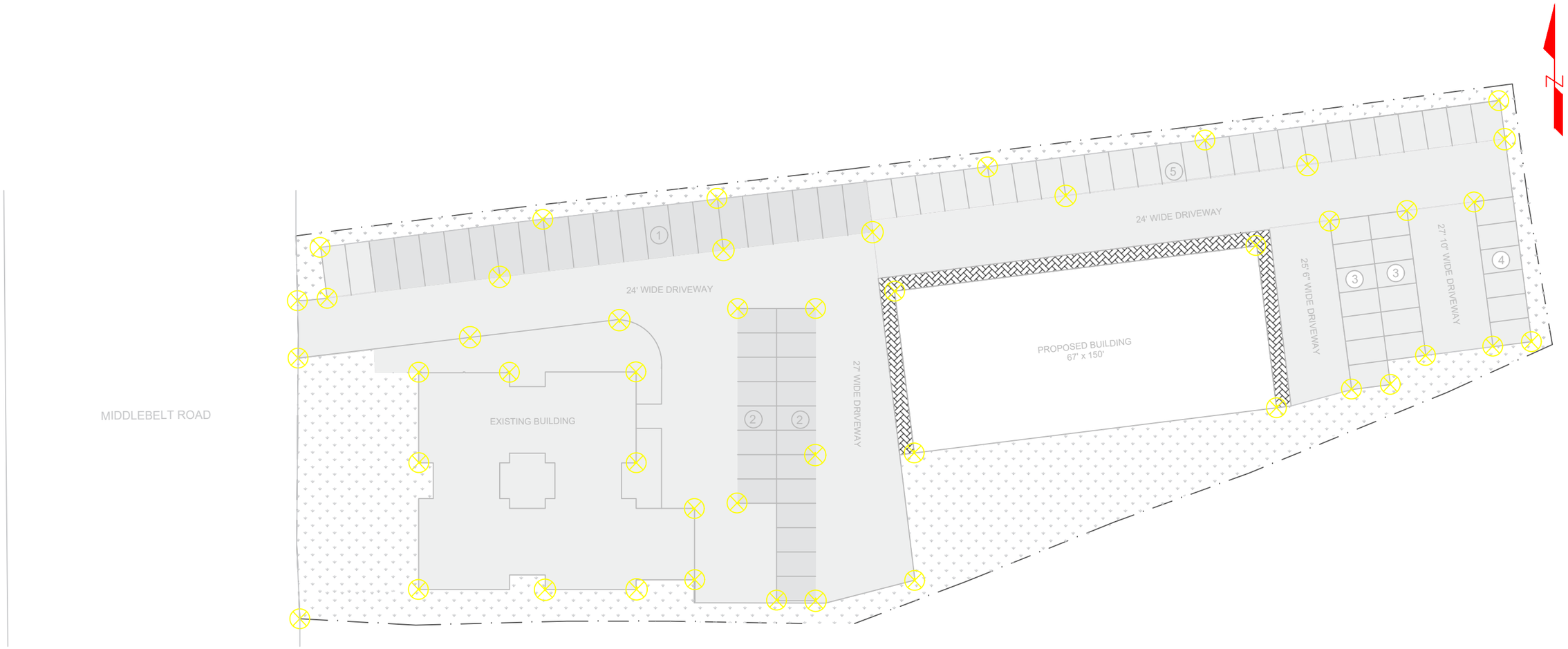
DRAWING TITLE:

CIVIL PLANS

LANDSCAPING PLAN

DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-4	SES CODE P-065	STATUS: FA / REV: 00

FR = FOR REVIEW , FA = FOR APPROVAL ; FC = FOR CONSTRUCTION ; AB = AS BUILT



LEGEND

	PROPERTY BOUNDARY
	PROPOSED BUILDING
	WALKWAY
	EXISTING BUILDING
	GREEN AREA
1	PARKING COUNT
	OUTDOOR LIGHTS

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

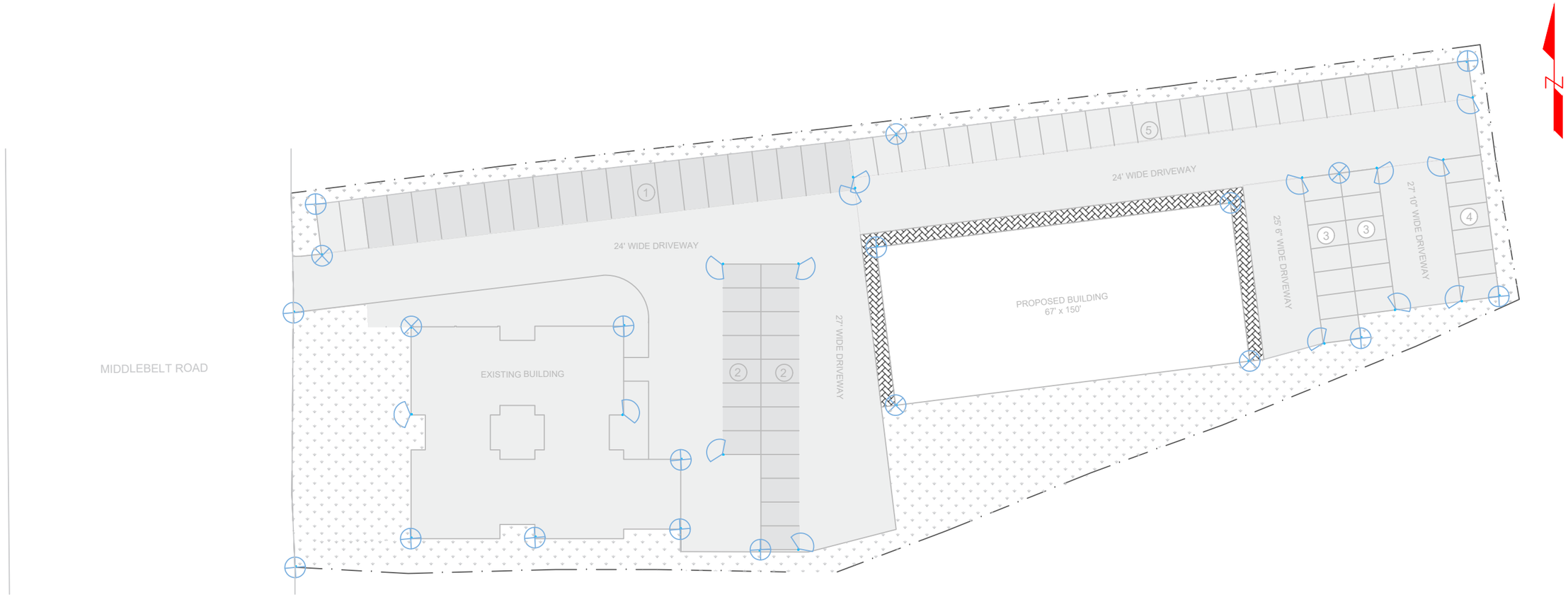
PROJECT: STORM FITNESS CENTER

DRAWING TITLE: CIVIL PLANS

LIGHTING PLAN

DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-5	SES CODE P-065	STATUS: FA / REV: 00

FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT



LEGEND

- · — · — · -	PROPERTY BOUNDARY
	PROPOSED BUILDING
	WALKWAY
	EXISTING BUILDING
	GREEN AREA
1	PARKING COUNT
	360° MOVEMENT CAMERA
	165° MOVEMENT CAMERA

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT:

STORM FITNESS CENTER

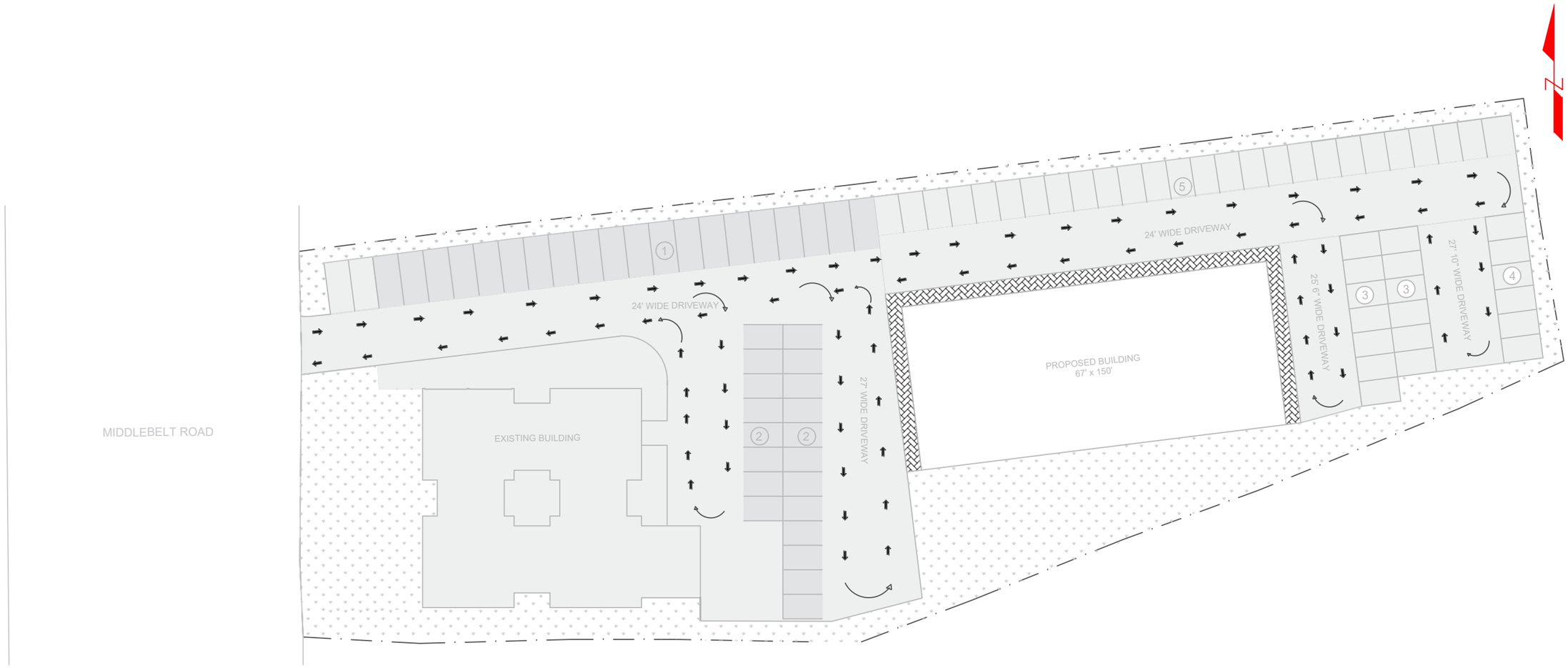
DRAWING TITLE:

CIVIL PLANS

SURVEILLANCE PLAN

DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-6	SES CODE P-065	STATUS FA / REV 00

FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT



LEGEND

— · — · —	PROPERTY BOUNDARY
	PROPOSED BUILDING
	WALKWAY
	EXISTING BUILDING
	GREEN AREA
1	PARKING COUNT
→	TRAFFIC MOVEMENT DIRECTIONS

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT:

STORM FITNESS CENTER

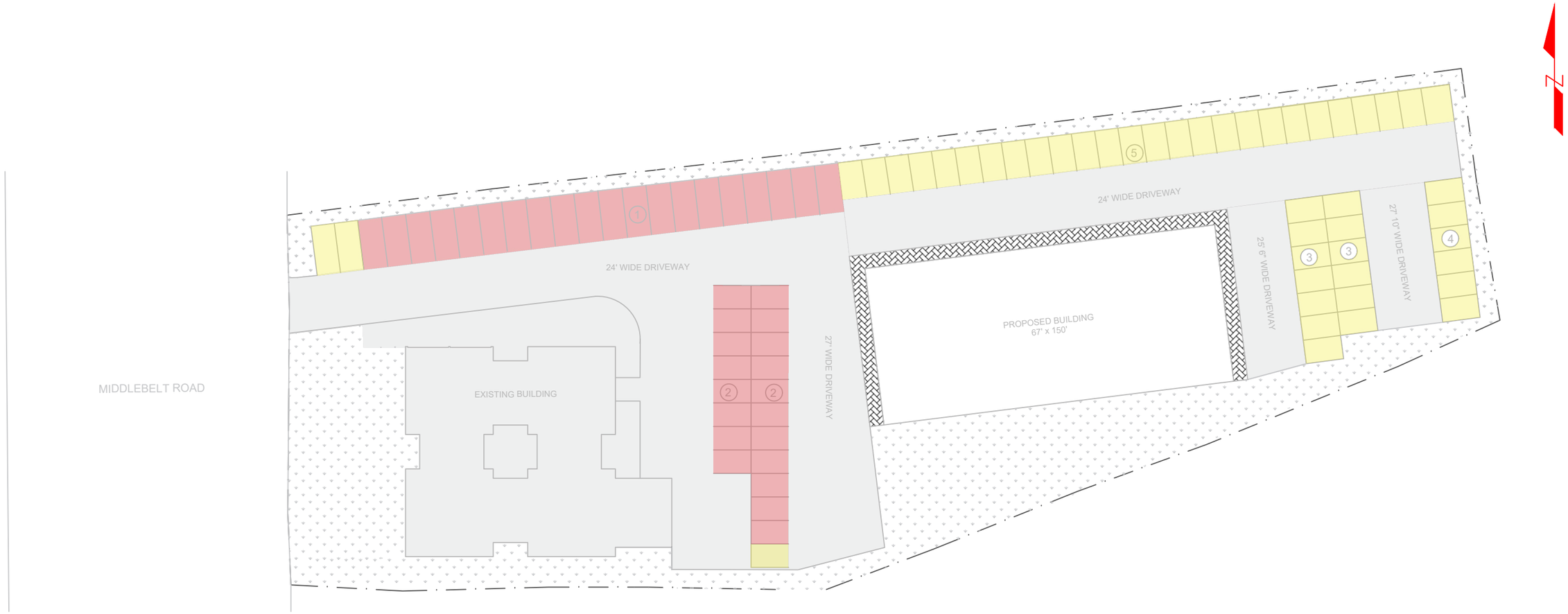
DRAWING TITLE:

CIVIL PLANS

PARKING PLAN

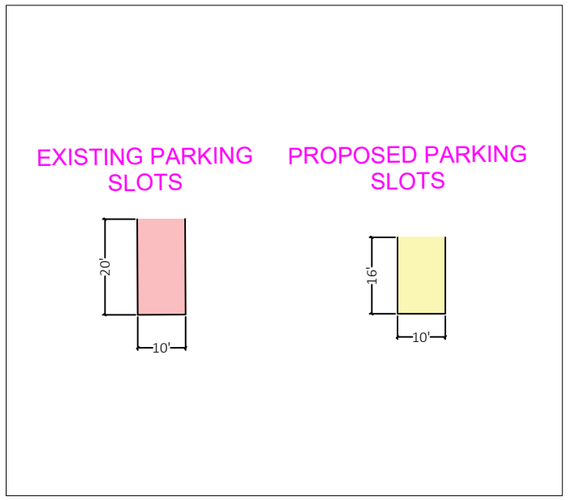
DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER:	SES CODE P-065	STATUS / REV
A-7		FA / 00

FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT



LEGEND

— · — · —	PROPERTY BOUNDARY
	PROPOSED BUILDING
	WALKWAY
	EXISTING BUILDING
	GREEN AREA
1	PARKING COUNT
	EXISTING PARKINGS
	PROPOSED PARKINGS



PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT:

STORM FITNESS CENTER

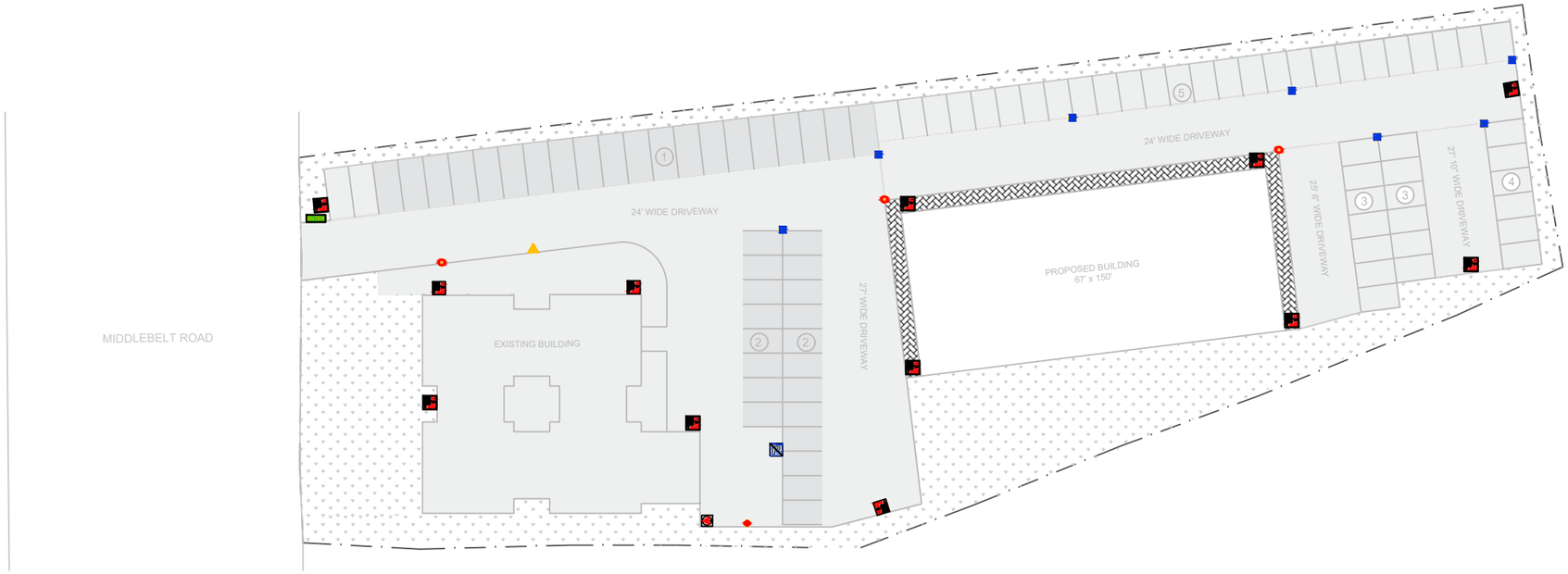
DRAWING TITLE:

CIVIL PLANS

PARKING DISTRIBUTION PLAN

DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-8	SES CODE P-065	STATUS FA / REV 00

FR = FOR REVIEW , FA = FOR APPROVAL , FC = FOR CONSTRUCTION , AB = AS BUILT



LEGEND

- PROPERTY BOUNDARY
- PROPOSED BUILDING
- WALKWAY
- EXISTING BUILDING
- GREEN AREA
- 1 PARKING COUNT
- FIRE HYDRANT
- FDC
- NO PARKING
- TRAFFIC STOP
- ENTER — ENTER PATH
- EXIT — EXIT PATH
- TWO-WAY LANE
- 30 MPH SPEED LIMIT
- P — CAR PARKING

PROPERTY ADDRESS

18340 Middlebelt Rd, Livonia,
MI 48152

DESIGNED FOR:

DESIGNED BY:

SAFE Engineering Solutions

REV	DESCRIPTION	DATE

NOTES:

1. ALL DIMENSIONS & LEVELS ARE IN FEET AND INCHES UNLESS SPECIFIED OTHERWISE.

PROJECT: STORM FITNESS CENTER

DRAWING TITLE: CIVIL PLANS

SIGNAGE PLAN

DRAWN BY	MUHAMMAD AALIYAN ASHRAF	SCALE: AS SHOWN
DESIGNED BY	AHMAD MAAZ	A3 SIZE PAPER
CHECKED BY	SYED SAIF UL HAQ	DATE: AUG, 2023
APPROVED BY		
DRAWING NUMBER: A-9	SES CODE P-065	STATUS: FA / REV: 00

FR = FOR REVIEW , FA = FOR APPROVAL ; FC = FOR CONSTRUCTION ; AB = AS BUILT

CORRESPONDENCE

DEPARTMENT OF PUBLIC WORKS
ENGINEERING DIVISION

TODD J. ZILINCIK, P.E.
CITY ENGINEER

DAVID W. LEAR, P.E.
ASST. CITY ENGINEER

MAUREEN MILLER BROSNAN
MAYOR

DONALD R ROHRAFF
DIRECTOR OF PUBLIC WORKS

12973 FARMINGTON ROAD
LIVONIA, MICHIGAN 48150
(734) 466-2571
FAX: (734) 466-2195

February 8, 2024

Mr. Jacob Uhazie
Planning and Economic Development Coordinator
City of Livonia

Re: Petition 2024-01-01-01 – #18340 Middlebelt Road

Dear Mr. Uhazie:

In accordance with your request, the Engineering Division has reviewed the above referenced petition. We have no objections to the proposed rezoning at this time, but would like to note the following items:

1. The subject parcel is assigned the address of **#18340 Middlebelt Road**. Should additional addresses be needed, the Owner will need to contact this Department once permitting has been completed.

2. There legal description submitted with the drawings appears to be correct, and should be used for the property if the rezoning petition is approved.

3. The existing parcel is currently serviced by public sanitary sewer and water main, and storm sewer. The submitted drawings does not include any proposed utility information or calculations, so we cannot comment on any proposed impacts to the existing systems at this time. Should the proposed improvements move forward, we will review utility improvements and impacts during the permitting process.

4. Although the drawings do not indicate any future utility information, it should be noted the any proposed development will be required to provide storm water improvements and detention per the Wayne County Stormwater Ordinance. Stormwater calculations will be reviewed during the permitting process.

5. Any disturbances with the Middlebelt Road right-of-way will require permits through the Wayne County Department of Public Service, including drive approach and sidewalk removals and placements.

Should you have any additional questions on this matter, please feel free to contact myself at (734) 466-2608 or the City Engineer, Mr. Todd Zilincik at (734) 466-2561. If you would prefer, you can e-mail either of us at dlear@livonia.gov or tzilincik@livonia.gov.

Sincerely,

David W. Lear, P.E.
Assistant City Engineer

cc: 2024 Petition File

DEPARTMENT OF FINANCE

Michael T. Slater
DIRECTOR OF FINANCE

Connie Kumpula
CHIEF ACCOUNTANT

MAUREEN MILLER BROSNAN
MAYOR

33000 CIVIC CENTER DRIVE
LIVONIA, MICHIGAN 48154-3097
(734) 466-2260
FAX: (734) 421-1807

February 12, 2024

Mr. Jacob Uhazie
Planning Commission
33000 Civic Center Drive
Livonia, MI 48154

Petition 2024-01-01-01 - 18340 Middlebelt Road

Dear Mr. Uhazie,

I have reviewed the address connected with the above noted petition. As there are no outstanding amounts receivable (general or water and sewer), I have no objections to the proposal.

Please contact me if you have any further questions.

Very truly yours,

Connie Kumpula
Chief Accountant

CK: jw

From: Uhazie, Jacob
To: Reece, Stephanie
Subject: FW: Petition 2024-01-01-01 - 18340 Middlebelt Road
Date: Friday, February 16, 2024 4:56:33 PM

Jacob Uhazie
Assistant Planning Director
City of Livonia | Planning Department
(734) 466-2293 | (734) 674-7647
juhazie@livonia.gov

From: Nash, Susan M. <snash@livonia.gov>
Sent: Friday, February 2, 2024 10:57 AM
To: Uhazie, Jacob <juhazie@livonia.gov>
Subject: RE: Petition 2024-01-01-01 - 18340 Middlebelt Road

Taxes are current

Susan Nash
City Treasurer
City of Livonia | Treasurer's Office
(734) 466-2244
snash@livonia.gov

From: Uhazie, Jacob <juhazie@livonia.gov>
Sent: Friday, February 2, 2024 10:48 AM
To: Nash, Susan M. <snash@livonia.gov>; Kumpula, Connie <ckumpula@livonia.gov>; Siterlet, Kathie <ksiterlet@livonia.gov>; Gosselin, Linda <LGosselin@livonia.gov>
Cc: Reece, Stephanie <SReece@livonia.gov>
Subject: Petition 2024-01-01-01 - 18340 Middlebelt Road

Under Sections 13.13 and 13.15 of the City of Livonia Zoning Ordinance, as amended, SR&D Development is requesting to rezone the property at 18340 Middlebelt Road, located on the east side of Middlebelt Road between Six Mile Road and Pickford Avenue in the Northwest ¼ of Section 12, from RUF (Rural Urban Farm) to C1 (Local Business).

If you have any observations or concerns, we would appreciate receiving your comments by **February 19, 2024**. Please transmit an **electronic copy** (PDF format please) to planning@livonia.gov

Jacob Uhazie
Assistant Planning Director
City of Livonia | Planning Department
(734) 466-2293 | (734) 674-7647
juhazie@livonia.gov

OFFICE OF THE MAYOR

Maureen Miller Brosnan
MAYOR

Linda Gosselin
ASSESSOR

33000 CIVIC CENTER DRIVE
LIVONIA, MICHIGAN 48154-3097
(734) 466-2220
assessorforms@livonia.gov

February 14, 2024

To: Planning Department

Re: **Petitions 2024-01-01-01 - 18340 Middlebelt**

A request has been made by SR&D Development to rezone the property at 18340 Middlebelt Road, parcel No: 046-01-0002-001 from RUF to C1. Based on the plans submitted it appears they want to construct an additional building on the site. The parcel would need to be split to accommodate another building, it is unclear how they would access the rear of the property. Please direct any questions to the Assessor's Office or Livonia.gov for the lot split and combination process.

Kindest Regards,

Kathie Siterlet

Kathie Siterlet
Residential Appraiser

Nomad Massage
Starfish Kayden
Intuitive Hands Massage
Grimm St
Google

ROLL CALL VOTE:
AYES: Maher, Burklow, Brown, Laura, Blomberg, Muccino
NAYS: None

Muccino: Your petition's been approved. Good luck.

Schafer: Thank you.

APPEAL CASE NO. 9307-123: Whitton-Boutros Associates, Inc., 20365 Middlebelt, Livonia 48152, seeking a variance from the portion of the Zoning Ordinance which regulates the activities which may be conducted on property zoned RUF. The Applicant proposes to operate a physical therapy rehabilitation clinic. The Zoning Ordinance does not provide for this use in an RUF zoning district. The property is located on the east side of Middlebelt (18340) between Seven Mile and Curtis, Lot No. 046 01 0002 001, RUF zoning district. Rejected by the Inspection Department under Zoning Ordinance 543, Section 5.02, Permitted Uses; and 3.08, District Regulations, not complied with.

Muccino: Mr. MacDonald, do you have anything to add?

MacDonald: Madame Chair, a couple of comments. As just read from the Legal Notice, the property is zoned residential. The use proposed for this property is either professional office use or C-1 or C-2 commercial use. Previously on this property, the Board had granted a request for the owner of Skandia Landscaping to build what is essentially a commercial building on residential land for purposes of a nursery yard and sales and offices for that business. Along with that, at that time the Board required that commercial standards, namely those pertaining to protection from abutting residential properties in the form of a protective wall, be provided. On this property, we have in part, that protective wall on the north for a length of 400 feet. The Board has granted a waiver for the remainder of the wall required on the north lot line which would be 120 feet on the westerly end of the north lot line. An additional 110 feet of wall would be required on the east property line, which is the rear of the property, and approximately 300 feet of wall on the south. That's all I have.

Muccino: Thank you. Any questions?

Brown: As far as the wall is concerned, Mr. MacDonald, have there been any major changes behind that property that would abut all of these sections as far as homes being built or anything like that?

MacDonald: Well, the major change would be that the nursery yard itself, which contained the trees and plant material that was being stored or raised for later planting, has been removed or stripped from the land, yes.

Brown: But there's no additional residences back there of any kind?

MacDonald: No, I believe it is essentially the same as when the Board

last heard the rehearing.

Brown: Thank you.

Muccino: Any other questions?

Blomberg: Mr. MacDonald, what would be an alternate use of this property? Could it possibly be developed into a small subdivision or possibly commercial?

MacDonald: I don't know if we have enough land area here to make a subdivision-type development feasible. I guess that's something that could be considered. The only other thing I could think of with its current zoning might be useful for would be perhaps a day care facility or something like that.

Blomberg: The property extends to the street behind it, doesn't it?

MacDonald: No, it does not. At one time it did, but the rear portion was split off and developed with a home on it which also came before the Board years ago. It has an average depth of around 512 feet. I might also add that there are some remnants of the previous use of this property. There is a metal barn-type storage building behind the principal building. We have information that there was a 1,000 gallon underground gas tank which was used to fuel the vehicles for the previous company and our records show that that tank is still in the ground, however, the property owner has applied to the Michigan State Police for the required permit to remove the tank that we believe is still in the ground. The plans don't show the status of this building except that it's to remain and I'm not sure how that building would fit in with the proposed use. The inspector for the area also reports that the landscaping on this site would require complete renovation from top to bottom. There are some minor problems with the building itself. The stone entrance will require some maintenance or repair. The entire asphalt area, in his estimation, requires complete resurfacing and striping. There is also a storm drain at the rear of the building which during the last rainstorm we had was observed to be blocked or plugged which caused a flooding condition in the entire paved area to the rear of the building. There have also been complaints from neighbors regarding allegations of rat infestation or rats observed on this property and as a result of that complaint, I called the resident rat expert with the Wayne County Health Department and he and I both inspected the property from top to bottom and also neighboring residential properties. He has submitted a letter regarding the condition in which he found the property which I will pass along to the Board.

Maher: Mr. MacDonald, how long has this property been vacant?

MacDonald: We reported this vacant around April of last year. We're approaching a year and a half now. Madame Chair, I would also add one additional comment. If the Board members, when they visited the property, were standing in the rear, they would have observed a protective wall to the south. That wall was erected by the owners of the office pavilion which abuts this property in part on the south. There is a residential property that fronts on Grimm Street to the rear, a portion of whose rear

yard was used for tree storage. Standing in the back of this property, you would have also been looking at the portion of that rear yard that was used for that purpose. That is not, in fact, part of this site. There is not a wall on the south property line of this property. There is this interlope of residential property fronting on Grimm Street to the rear, which actually comes between the property in question and the office zoned property to the south. I will pass along a map and on this map the area highlighted in orange is the residential property that the Skandia property abuts. There is a wall required, by virtue of previous action of the Board, where this property would abut that residential property.

Muccino: Any other questions? Will the Petitioner please come forward. Good evening. Could you give us your names and addresses please.

My name is Joseph Durso. I live at 35209 Seven Mile, Livonia.

My name is Ed Raschke. I live at 3140 Chickering Court, Bloomfield Hills.

Durso: Mr. Raschke will be representing Whitton-Boutros Company. And the owner of the property, I would be representing him this evening. He could not make it.

Muccino: And whoever would like to begin.

Durso: Okay, a couple of issues that Mr. MacDonald had brought up. There is a parcel of land that is on Grimm Street that goes back into this property and if this sale is made, we've already made arrangements with the owner of that property to purchase that and therefore, that would square off that section of land in the back. I'm sure at some future date the purchaser of the property will be coming back to solve this situation with the wall that would be required in the back section there.

Muccino: Let's get to the reason for this use coming into this building.

Raschke: Currently the building is approximately 9,000 square feet. We have a facility on Middlebelt Road currently just north of Seven Mile Road. The facility's approximately 1,600 square feet. What we would like to do, because of the volume of people moving into the Livonia area, would like to expand that particular facility and move to the south in this particular building. We at the present time would utilize only about 4,500 square feet of the building, or half of it. The other half we would partition off and use for storage of our machinery, exercise equipment and that type of thing. We do plan on landscaping the property similar to what we have at our other facility. We do have eight other facilities beside the one in Livonia. We do intend to landscape it. The plan is to surface with asphalt the whole parking area. We intend to stripe that particular area. We do intend to fix-I was in there in June and I noticed some of the sidewalks need repairing and that type of thing. Some of the doors need repairing. I don't know if those will be repaired or replaced, one or the other. We do plan on just having medical suites there. Currently, we have six employees at our current facility. We hope to expand that to about 15 employees, which of course, would be all working for the city here. As I read the sketch here, it looks like we have between 34 and 40 parking spaces, which I feel at this point, would be

adequate. The gas tank, I understand, will be removed as soon as this appeal has been granted. That will be removed at the current owner's expense. We do maintain ourselves all of our clinics. Maintenance people do maintain our lawns. All of our clinics are very beautiful. I think that's about all I have.

Brown: I have several questions. You said you thought you would have between 30 and 40 parking spaces. Is that correct?

Raschke: As I count them off, it looks like I could count 34. It looks like we could another six or so in there.

Brown: You would have medical suites. Now I'm assuming that this would all pertain to your therapists. This isn't a medical suite that would be rented out to this doctor, and that doctor, or am I wrong?

Raschke: It's all for physical therapy for our own use. We do not rent any of the suites out in any of our current buildings.

Brown: How many patients requiring physical therapy would you be able to service at one time-the most that you would service at one time if you were at full capacity?

Raschke: Well, it appears we're going to be putting in about eight beds, so the best we could do is eight with two or three waiting. I'd say between 10 and 11 people.

Brown: I was just trying to see where we were on parking.

Raschke: I see, okay.

Brown: There was some reference made to the entrance being deteriorated, the brick or the stone. Is that going to be repaired?

Raschke: Yes, it is.

Brown: If this were granted, how soon would you be occupying this building?

Raschke: Well, we have a tentative buyer for our existing building and he's quite anxious to get in. We would get started right away.

Brown: I guess I was wondering when it would be completed, when the paving would be done. Are we looking at this season, because I don't know if we are running out of time, or are we looking at spring?

Raschke: It's hard to say because of the asphalt, I don't know when they stop that. Again, I looked at it in June and I didn't look at it that closely, the asphalt itself. I understand it does need repair or I can replace it. So I feel if the weather permits, we'll be getting in right away. Our mortgage money has been approved. We are going through a small business loan on that and we are also going to Comerica Bank. That all has been approved. It's just a matter of waiting. The biggest holdup right now is this variance that we're looking for and the tank in the

ground. I think if that were done we'd be ready to go.

Brown: You stated that you would be occupying around 4,500 square feet and using the rest for storage. So there would be no plans to rent any of the excess space to any other tenant?

Raschke: No, we have no plans for that. We have one of our largest facilities, it's almost 5,000 square feet. We have a work area which is used specifically for workman comp cases. In there, for lack of a better explanation, it looks like kind of a Vic Tanny operation, for long-term care. We may use that space for that later. We would come again before the Board and ask permission for that.

Brown: That would still be part of your business, correct?

Raschke: Oh, yes. That's our business also.

Brown: Thank you.

Blomberg: The tank issue was discussed, but I'm curious to know about the steel building that's in the back. Will there be a need by you for that steel building or will that be removed?

Raschke: We have no need for it.

Blomberg: In other words, we're not going to see vehicles parked there for winter storage and so forth?

Raschke: We don't really have vehicles.

Blomberg: The rear of the property concerns me quite a bit. Your building and your operation and parking and so forth will occupy such a small portion of this very large piece. What do you intend on doing with the rear. You spoke of a neighbor in the rear buying or possibly purchasing some of it. Just how much are we talking about?

Durso: There's a sliver there on the parcel in the back that comes to a point on the southern section of the property and what he wanted to do was purchase that small sliver. It's of no use whatsoever to the homeowner on Grimm. It's in order to square the property off. When I talked to the company about purchasing it, their thoughts were they could grow and expand maybe sometime in the future they might want to do an addition. They would have the land to do it. Obviously, they would have to come back and request it.

Blomberg: This would be a small part, the third neighbor on Grimm from another lot line, lot 45 I think it is. Is that right, Bill, is that what he's speaking of?

MacDonald: Are you looking at the plat of the area, Mr. Blomberg?

Blomberg: Right.

MacDonald: The area I highlighted in orange is the residential property

that Mr. Durso says the homeowner will sell to Whitton-Boutros, not the reverse.

Blomberg: Oh, I see. I misunderstood.

MacDonald: So the Petitioner would acquire that area highlighted in orange to expand the site accordingly.

Blomberg: I guess I'm concerned about the rear of the property. It's in sad shape right now. It's a no man's land.

Raschke: We have a piece of property we're currently in where our biggest facility is and what we have done, we put about two acres of new grass and we do maintain it. We have a park-like atmosphere. That's what we're doing at our current facility.

Blomberg: And you'll do the same here?

Raschke: We'll do the same here because we don't want weeds. First of all, in bringing patients in, they want something that looks nice. We don't want weeds growing in the back yard and they're going to have to park and certainly they'd be coming into the building and they'll see that.

Blomberg: You look like you could use some fill back there.

Raschke: Oh, it's pretty bad.

Blomberg: Yes, I would say that if grant this, we condition that we would like to see a landscape print. That came up earlier, too, in discussion, possibly including this, so if it's approved we might approve it with an informal viewing of landscape prior. We don't want to hold him up, but I'd like to take a look at it myself.

Durso: I have a suggestion if I may. If you grant it with that condition, that would at least enable us to get this thing moving and then give him a certain time period. I don't know how that would function, but....

Blomberg: I'm sure we can handle that.

Laura: This way we wouldn't hold up everything if we approve this this evening. Time is of the essence. Obviously this area needs to be improved. This sounds like an improvement to me and a win-win situation. I would hate to restrict him. We could have him come back but give him some sort to latitude to get going.

Muccino: Any other questions?

Maher: Following Mrs. Brown's line of questioning, she talked about the number of patients that would be there at one time, but how many employees will be at that site?

Raschke: At our peak we would probably have 15.

Maher: And what would your hours of operation be?

Raschke: We're operating currently between the hours of 8:00 and 5:30. We will probably expand that until about 6:30 or 7:00.

Maher: Monday through Friday?

Raschke: Monday through Friday.

Maher: No weekend hours at all?

Raschke: We have not been in the past.

Maher: And you don't have any plans to open on a Saturday?

Raschke: Not at this time.

Maher: Thank you.

Muccino: Any other questions? I have a couple I'd like to clear up. We talked about the equipment that you'll have there. You stated sort of a Vic Tanny type atmosphere. Apparently you aren't having any type of fitness center, this is strictly physical therapy?

Raschke: Physical therapy, and I use the phrase Vic Tanny. I don't want to mislead you on that. We have a room that's about 30 by 40 at our present facility and it has exercise equipment. This equipment is used for long-term care.

Muccino: I just wanted to clear that up for the record. Does this building have a basement in it?

Raschke: No.

Muccino: Do you have any plans or anything that you're going to show us what this building will look like when you're finished? Do you have a site plan or elevations or anything?

Raschke: I don't have one with me.

Muccino: Okay, can you briefly describe what you are going to do to the exterior of this building?

Raschke: I can't tell you exactly what we're going to do, but I believe there's mortar problems, as I understand it. Those will be corrected. The walkway going up there, I understand is going to be replaced where necessary. I don't think every panel will be replaced. They're talking about at this time repaving. They have had people look at it to come in and possibly repave it and stripe the lot. I don't believe the roof needs repair because it's not that old.

Muccino: Do you have any thoughts on signage?

Raschke: Currently we have very small signs. We haven't thought too much about signs.

Muccino: Do you actually have doctors on premises or is it mostly therapists?

Raschke: It's strictly physical therapists, licensed physical therapists. There are no doctors.

Muccino: That's all I have. Are there any other questions?

Burklow: Regarding the Vic Tanny room, would that ever be open to the public?

Raschke: No.

Burklow: Thank you.

Raschke: The only way we can accept a patient is through a prescription. You cannot walk into any of our clinics. They have to be prescribed.

Muccino: Any other questions? Is there anybody in the audience wishing to speak on this? Yes, sir, could we have your name and address for the record please.

My name is Harry Yuschak. I live at 18369 Middlebelt, directly across. My driveway is directly across their driveway and I've lived there for 32 years. This zoning change would, for me, it would cause a real great inconvenience because it would increase the traffic in the turn lane. When I'm trying to enter my driveway heading north, I would be coming directly at the traffic trying to enter their driveway. We would be nose to nose. I'm experiencing this now. I've experienced this with Skandia. I have said nothing when Skandia wanted to change, but their traffic was mainly trucks in the morning because they store trucks there. They left, and then they came back in the late evening. But this would be a continuous flow of traffic throughout the day and would cause me a great deal of harm and create a hazard for me and my family to try to get in and out of my own driveway, especially getting back into it because I would be using that turning lane and that turning lane just does not allow for all that traffic. It would be very bad. I'm very much against it.

Muccino: Thank you for your comments. Anybody else? Do we have any correspondence?

Maher: Yes, we have two letters. We have an approval from Thomas and Dorothy Moyles at 29275 Pickford. We have an objection from Harry Yushcak at 18369 (the letters were read).

Muccino: Mr. Raschke and Mr. Durso, do you have any final statements you'd like to make?

Raschke: I don't have any.

Durso: I think it's an excellent use for the land considering all of the different options we have.

Muccino: We'll close the public portion.

Blomberg: I don't have a problem with it. I just would like to condition that they bring back a print within a specified period of time, we might discuss informally too, 30 days, of what they propose for that back property and front property and make that as part of the condition. Maybe 30 days or so that they could draw up something for us and get a commitment for that. Otherwise, I think it's a good use for the property.

Maher: I agree with Mr. Blomberg. I think it's a wonderful use for the space. I'm glad to see another vacant building being used obviously. So I would vote for this and I am also in concurrence on seeing a site plan along with a landscaping plan.

Brown: I agree. I think this will be a very good and attractive facility. I think it's a very attractive building and it's good to see somebody going in there. I think it's a very good use.

Laura: I think it's an excellent use in consideration of the options. I would be in favor of it. I would hope this Board would not-the proposed tenant seems to be ready to go and again, the time is waning as we get further and further into the fall and winter, so I hope that we wouldn't put any restrictions or at least allow him the latitude to get started.

Burklow: I have no problem with the business. As far as Mr. Yuschak's objection, the other options available would be maybe an office building or day care center. I have a day care center at the end of my street and traffic through there is constant. I think you might be better off with this where there's a limited number of patients coming in.

Yuschak: I would like to make one other suggestion if I might. If there's any chance of putting a "no left hand turn" so his traffic would flow coming in from the south, that would be super. Then we wouldn't be coming head on.

Muccino: I don't think that we can restrict that, but I can have Mr. MacDonald check on that.

Burklow: I have no problem as long as the landscaping and site plan is provided.

Muccino: I would agree with this also.

Brown: In regard to the landscaping. They're going to shortly run out of time and maybe not do a whole lot this year. Not that I wouldn't like to see them move ahead as soon as possible, it's just that....

Blomberg: Condition they bring something for approval. Madame Chair, I've got another question to Bill about the wall. Did the wall issue go away with the tenant or are we still speaking about a lack of wall that's needed here?

MacDonald: Part of this case, in addition to the use variance, would be the waiver of the wall.

Blomberg: Even with the new tenant?

MacDonald: Well, I can only assume that the Board is going to apply the same commercial standards to this use and this property as it did previously. With that in mind, the wall is an issue.

Blomberg: That might make our handle for compliance with any landscaping we might review. We'll condition, possibly, for one year to take a look at the property and a year to see what we get.

Muccino: That's what I was going to suggest. I, too, would like to see a plan within 30 days that we can just look at after a meeting one night as an x-item. But I would go along with the wall waiver for whatever the Board decides, Spring, or a year.

Brown: Spring won't really give them enough time to get everything in.

Muccino: Okay, anything else?

Durso: Can I ask a question? The condition of the-we're fighting the weather coming up and that's what I'm a little concerned about and the condition of the 30 days to get the plan back, I'm certain I can provide you with something like that, but how will we handle that in regards to moving forward to a closing and getting them into the building. Is that going to restrict us at all?

Raschke: We'd like to move as quickly as possible.

Muccino: I understand that.

Raschke: I do have a site plan. I didn't bring it with me, but we provided the Small Business Association with.

Muccino: I think that's really what we're asking for.

Raschke: They would really be more concerned with the four walls and roof as opposed to landscaping.

Blomberg: Is there a way out, Bill, that we can condition but let them go ahead?

MacDonald: Certainly, I think the Board if they find favor with the proposal to use it for this purpose, allow them in the building now. If we don't have enough time this year to complete the clean up and site improvements, do it in the springtime.

Muccino: I don't think the landscape right now is going to be a problem because you really can't get it in this year to where you're going to see something.

Raschke: You'll see improvement almost immediately.

Muccino: I think a motion's in order.

Upon Motion by Maher, supported by Blomberg, it was:

RESOLVED, APPEAL CASE NO. 9307-123: Whitton-Boutros Associates, Inc., 20365 Middlebelt, Livonia 48152, seeking a variance from the portion of the Zoning Ordinance which regulates the activities which may be conducted on property zoned RUF. The Applicant proposes to operate a physical therapy rehabilitation clinic. The Zoning Ordinance does not provide for this use in an RUF zoning district. The property is located on the east side of Middlebelt (18340) between Seven Mile and Curtis, Lot No. 046 01 0002 001, RUF zoning district. Rejected by the Inspection Department under Zoning Ordinance 543, Section 5.02, Permitted Uses; and 3.08, District Regulations, not complied with, be granted for the following reasons and findings in fact:

1. The Board finds that a physical therapy rehabilitation clinic would be a good use for this property, which is currently vacant. The Petitioner indicated that although they plan to utilize only half of the building at this time, they will probably need the extra space to install an exercise room, to be used by their patients only, at a later date. Therefore, they will not be renting any of the space during the interim.

2. The Petitioner plans to purchase a small portion of property from the rear residential neighbor (on Grimm) to square this property off. This would also allow room for expansion.

3. The City's Inspection Department received complaints of rat infestation, however, upon an inspection conducted by the Wayne County Environmental Health Division, it was determined that there was no rat activity at this particular property.

4. The Board did hear concerns addressed by a surrounding neighbor regarding traffic problems this use would create. However, the Board determined that this clinic would create less traffic than other uses, such as offices or a day care center, because there will be a limited number of patients at this facility.

5. The Board also grants the continuance of the protective wall waiver for a period of one year for the northerly 120 feet; southerly 300 feet and the easterly 110 feet of this property.

FURTHER, This variance is granted with the following conditions:

1. As indicated by the Petitioner, several upgrades are to be made to the property including the repair of the mortar where necessary; the replacement of the walkway to the building; and repaving and re-striping the parking lot. In addition, the landscaping will be completely renovated. The Board has

requested the Petitioner to submit a landscape plan for this site within 60 days which will be reviewed as an x-item, however, the Petitioner may move in and proceed with the clean-up of the property.

2. The existing metal building at the rear of the property is to be removed.

FURTHER, The granting of this variance is not detrimental to the surrounding area or to the Master Plan of the City of Livonia.

ROLL CALL VOTE:
AYES: Maher, Blomberg, Laura, Burklow, Brown, Muccino
NAYS: None

Muccino: Your motion's been approved with conditions. You'll get a copy of the resolution within a week.

Raschke/Durso: Thank you.

APPEAL CASE NO. 9307-125: Jim Seba, Northland Center, J-21, Southfield 48075, seeking a variance from the portions of the Zoning Ordinance which regulate building setbacks, landscaping and parking on commercial sites. It is proposed to erect a new, multi-tenant commercial building. That building is required to be at a 75 foot front yard setback, have 15% of the entire site in landscape, and provide a minimum of 20 parking spaces. It is proposed to to erect the building at a 43 foot front yard setback, have 12.6% of the site in landscaping and provide 13 conforming parking spaces. The property is located on the north side of Five Mile (27510) between Harrison and Inkster, Lot No. 052 01 0036 004, C-1/P zoning district. Rejected by the Inspection Department under Zoning Ordinance 543, Sections 10.08, Front and Side Yard Requirements; 19.06, General Waiver Requirements and General Standards; 18.37(b), Off-Street Parking Requirements, and 18.38(21), Off-Street Parking; Schedule, not complied with.

Muccino: Mr. MacDonald, do you have anything to add?

MacDonald: Madame Chair, the site plan submitted as part of this proposal shows on the east side of the building abutting Foch Street five parking spaces. Those spaces were not included as part of the write-up and would be deficient. Originally proposed to be 18 spaces because they do not conform to the ordinance requirements in that in order to enter or exit the space it would require you to travel over the public sidewalk at other than a driveway location. These do not conform to parking space requirements. Therefore, were not counted as part of the on-site parking. I can only presume that those spaces would then be used for landscaping purposes or something other than parking. In this particular case, if the Board were to grant variances, this proposal will require site plan approval by the Planning Commission.

Muccino: Any questions for Mr. MacDonald? Will the Petitioner please

PROPERTY SEPARATION AGREEMENT

RECITALS

Section 18.45 of the City of Livonia Zoning Ordinance requires that a poured concrete, cement block, or brick wall be erected along the line between the adjoining residential and non-residential properties of the undersigned parties unless the undersigned reach an agreement as to an alternative type of separation between the properties.

The parties hereto have agreed on an alternative to a wall between the properties.

AGREEMENT

1. In return for the agreement of the non-residential property owner to maintain materials in the location and type shown in the attached plans, in order to protect the residential property from the effects of activities on the non-residential property, the residential property owner hereby waives the wall requirement of Zoning Ordinance Section 18.45 for a period of 5 years* from the date of this agreement.

2. After the term of this agreement expires, the property owners (or their successors) may sign another agreement like this one, or change the agreement in any way they can agree on.

3. The non-residential property owner understands and agrees that he/she/they/it will have to build the wall required by Section 18.45 of the Zoning Ordinance if:

---

* The term of this agreement may not be longer than five years.

a) the term of this agreement ends, and no new agreement is signed, and/or

b) the non-residential property owner fails to install or maintain any of the materials shown on the attached plans.

4. This agreement shall be binding on the lessees, successor owners, or other assignees of both the residential and the non-residential property until the term set forth in paragraph 1 above expires.

5. [Any additional terms.]

Non-residential Property Owner	Residential Property Owner(s)
THERAMATRIX, INC.	
By: George Walker	
Its: C.F.O.	
Address: 900 AUBURN RD. PONTIAC, MI 48342	Address: 18365 GRIMM ST LIVONIA MI 48152
Date: 10-3-05	Date: 10-3-05
	LOTS 2b + 3b

APPEAL CASE NO. 9307-123

PROPERTY ADDRESS: 18340 Middlebelt

PROPERTY SEPARATION AGREEMENT

RECITALS

Section 18.45 of the City of Livonia Zoning Ordinance requires that a poured concrete, cement block, or brick wall be erected along the line between the adjoining residential and non-residential properties of the undersigned parties unless the undersigned reach an agreement as to an alternative type of separation between the properties.

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b) the non-residential property owner fails to install or maintain any of the materials shown on the attached plans.

4. This agreement shall be binding on the lessees, successor owners, or other assignees of both the residential and the non-residential property until the term set forth in paragraph 1 above expires.

5. [Any additional terms.]

NONE

Non-residential Property Owner	Residential Property Owner(s)
THERAMATRIX, INC.	
By: George Wilkes	Jennifer Prymeau-Smolka
Its: C.F.O.	PC.
Address: ~~18~~ 900 AUBURN RD PONTIAC, MI. 48342	Address: 18359 Grimm Livonia MI 48152
Date: 10-3-05	Date: 10-3-05
	LOT 4

APPEAL CASE NO. 9307-123

PROPERTY ADDRESS: 18340 Middlebelt

MAYOR
EDWARD H. McNAMARA
CITY COUNCIL
ROBERT E. McCANN, President
ROBERT R. BISHOP, Vice President
ROBERT D. BENNETT
FERNON P. FEENSTRA
ALICE M. GUNDERSEN
GERALD D. TAYLOR
PETER A. VENTURA

33000 CIVIC CENTER DRIVE
LIVONIA, MICHIGAN 48154
421-2000 EXT. 427

August 19, 1983

Mr. and Mrs. Hans O. Hansen
34412 Quaker Valley Road
Farmington Hills, Michigan 48018

Dear Mr. and Mrs. Hansen:

The Zoning Board of Appeals of the City of Livonia, at its special meeting held on August 16, 1983, adopted the following resolution:

RESOLVED, That Appeal Case No. 8306-80, filed by Hans O. and Mary Ann Hansen, 34412 Quaker Valley Road, Farmington Hills 48018, seeking to construct a new nursery sales and office building - existing building is nonconforming use - (residential structure to be removed) on property located on the east side of Middlebelt (18340 - Skandia Landscaping & Garden Service) between Six Mile Road and Pickford, Lot Nos. 2, 3 (046 01 0002 000) (046 01 0003 000), Thomas F. O'Connor's Middlebelt Subdivision, RUF zoning district, be granted and the requirements of Zoning Ordinance No. 543, Section 5.02 (Landscaping business prohibited in RUF zone); Section 18.21 (Expansion of nonconforming use not allowed), be waived for the following reasons and findings of fact:

1) That it has been represented by the petitioner and their counsel that the granting of this relief would allow the petitioner to upgrade the area that is in need of such, as it is a business that has existed on this particular parcel for twenty-five years or so and the Board feels that this is an ideal way to allow for this upgrading.

ATT: TO FILE COPY.

2) That it has been represented to the Board that this is an opportune time for the petitioner to construct a far more aesthetically pleasing building to complement his type of business and the Board feels that the granting of this waiver will certainly accomplish this end.

FURTHER, That the variance be granted with the following conditions:

1) That the petitioner will comply and adhere to all commercial zoning restrictions and building codes.

2) That there will be no outside storage of landscaping materials, live or otherwise, in the front of the building other than what would be allowed in the landscaping plan.

3) That there shall be no storage of vehicles in the front parking area as designated on the site plan, other than for loading or unloading.

4) That any additions or change of use on this particular parcel in the future will come before this Board for their decision.

5) That any signage on this parcel shall come before this Board for approval.

6) That this variance is granted for this petitioner and this petitioner's use only.

7) That the Board does condition that prior to issuance of a building permit, final site plan approval and landscape plan approval shall come back before this Board, especially due to the fact that this will be the only body of the City reviewing this matter.

FURTHER, That the Board has taken into consideration the fact that this would normally be considered a waiver use in a commercial zone and due to the fact that protective walls would be required for that use, the Board does reserve the right that at some time in the future, should there be a change of use on this property, or should this existing use become detrimental to the abutting residential property, with the full knowledge and intent of the deliberation this evening, to require the protective wall on the northerly and southerly property lines and the Board does waive that for a period of two (2) years from issuance of the Certificate of Occupancy.

AN ORDINANCE AMENDING SECTION 12 OF THE ZONING MAP OF THE CITY OF LIVONIA AND AMENDING ARTICLE III OF LIVONIA ZONING ORDINANCE, AS AMENDED, KNOWN AND CITED AS "THE CITY OF LIVONIA ZONING ORDINANCE" BY ADDING SECTION 3.____ THERETO.

THE CITY OF LIVONIA ORDAINS:

Section 1. Pursuant to the report of the City Planning Commission, dated March 7, 2024, setting forth its resolution 03-07-2024 recommending approval of Petition 2024-01-01-01, having been considered by the Council, and the Council having conducted a public hearing on March 5, 2024, on said petition, and having rejected the recommendation of the City Planning Commission, the Council hereby adopts said Petition 2024-01-01-01 to amend the Zoning Ordinance and Zoning Map of the City of Livonia and all proceedings heretofore conducted on said petition are hereby approved.

Section 2. Article III of the City of Livonia Zoning Ordinance, as amended, is hereby amended by adding thereto the following section:

Section 3.___. Petition 2024-01-01-01 submitted by SR&D Development is hereby approved, and the zoning classification of the premises hereinafter described is hereby changed from RUF (Rural Urban Farm) to C1 (Local Business):

> Land situated in the City of Livonia, Wayne County, Michigan, described as follows:
>
> Parts of lots 2 and 3 of Thomas F. O'Connor's Middlebelt Sub., T. 1 S., R. 9 E., Livonia Township (now City of Livonia) as recorded in Liber 68, Page 96, Wayne County Records, More particularly described as Beginning at the southwest corner of said lot 3 and proceeding N 00°10'30" W, 156.00 feet; thence N 83°02'09" E, 331.37 feet; thence S 00°10'30" E, 159.68 feet; thence S 68°47'00" W, 102.48 feet; thence N 89°51'20" W, 233.40 feet to the Point of Beginning. Containing 1.292 acres, more or less
>
> and the Northwest 1/4 of Section 12 of the Zoning Map is hereby amended to conform to the changes made in this section.

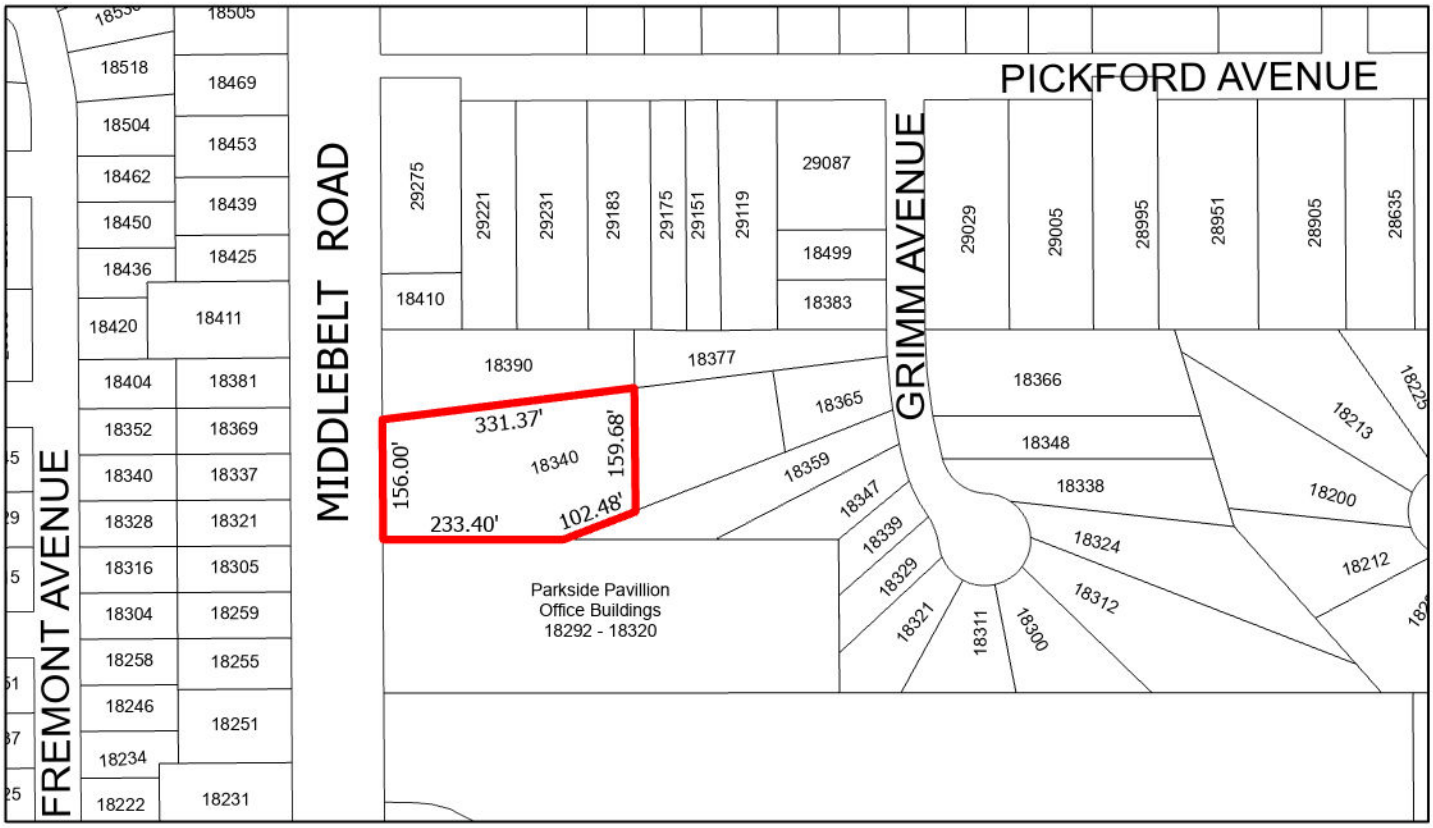
Section 4. The attached map designated “Amendment No. ___ to the Zoning Map of the City of Livonia” showing all of the amendments and changes made in the foregoing Section 2 of this ordinance is hereby approved, established and made a part hereof.

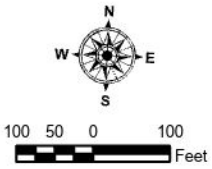
Section 5. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 6. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

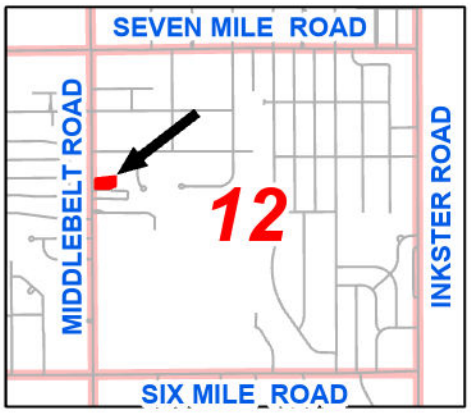
BOUNDARY OF DISTRICT AS AMENDED FROM RUF, RURAL URBAN FARM TO C-1, LOCAL BUSINESS





PETITION NO. 2024-01-01-01
A PART OF THE N.W. 1/4 OF SECTION 12

AMENDMENT NO. TO
THE LIVONIA ZONING MAP
CITY OF LIVONIA, MICHIGAN
ORDINANCE NO.
Adopted by the City Council on



_____ MAYOR

_____ CLERK

LETTER TO THE LIVONIA CITY COUNCIL

20.

Clerk
June 4, 2024

MEETING DATE	PRESENTED BY
R061724	

AGENDA ITEM

ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 040 of Title 13, Chapter 08 (Water Services Rates and Revenues) to provide for changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

BACKGROUND DETAILS

N/a

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Second Read

ATTACHMENTS

1. R060324 New Data Recd 5-29-24 - Proposed Ordinance 13.08.040 - 2024
2. S052024 LTC and Study Minutes for Water Rates

APPROVED BY

AN ORDINANCE AMENDING SECTION 040 OF TITLE 13, CHAPTER 08 (WATER SERVICE RATES AND REVENUES) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 040 of Title 13, Chapter 08 the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

13.08.040 Consumption rates. Effective with the first billing on and after July 1, 202~~3~~4, water use will be charged at the following rates:

CHARGE DESCRIPTION	AMOUNT PER 100 CUBIC FEET
Base Charge	
GLWA per 100 cubic feet of water used	$ 2.~~35~~52
City of Livonia per 100 cubic feet of water used	$ ~~0.86~~1.05
Use Charge per 100 cubic feet of water used	$ 3.~~21~~57
Large User (meters sizes 1.5 inch or larger)	
Charge per 100 cubic feet of water used	$ 1.~~13~~24
Total Use Charge for Large Users per 100 cubic feet of water used	$ 4.~~34~~81

Rates presently established shall continue for bills issued before July 1, 202~~3~~4.

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

Meeting was called to order at 9:00 p.m. by Council President McCullough. Present: Laura Toy, Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: None

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

22. REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

    Councilmember Donovic offered a motion to refer this item to the Capital Outlay and Infrastructure Committee.

    DIRECTION APPROVING COMMITTEE OF WHOLE

LETTER TO THE LIVONIA CITY COUNCIL

22.

DPW
May 7, 2024

MEETING DATE	PRESENTED BY
S052024/R060324	Don Rohraff, Director of Public Works Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

BACKGROUND DETAILS

Livonia's Department of Public Works and Finance Department have worked together on the water and sewer rates proposed for implementation on July 1, 2024. In calculating the new rates, a review was made to determine how the fiscal year 2023 rates performed in conjunction with the budget, along with an analysis of the effects of the proposed new rates on our low-, average- and high-volume water users.

Incorporating the increase in wholesale charges from the Great Lakes Water Authority and an expected reduction in water sales charges, the recommended new rates will impact customers in the following manner:

1. The proposed water and sewer rate increase is 8.68 percent (8.68%) this year for the average residential user, which is an increase of $16.90 per quarter. Average use is based on consumption of 20 units (2,000 cubic feet) per quarter, which is 15,000 gallons of water.
2. The rate increase is mainly due to a pass-through of the changes to the water charges from our wholesale provider coupled with an anticipated decrease in water sales. Overall, GLWA increased its wholesale rate by 3.06%. The GLWA increase by component amounts to the per-unit rate increased by $.06 or 5.3 percent (5.3%) from $1.13 to $1.19, and an increased monthly fixed fee by $12,500 from $662,000 to $674,500 or 1.89 percent (1.89%).
3. A fixed fee increase of 5% is recommended for all meters.
4. City of Livonia users still pay less for water than users in most surrounding communities pay for an equal amount of water.
5. The new rates will be in effect from July 1, 2024, through June 30, 2025.

Additional detailed information is included in the attached letter to the Water and Sewer Board.

At a meeting of the Water and Sewer Board of the City of Livonia, the following resolution was adopted:

#WS 6551 05/24 RESOLVED, that the Water and Sewer Board will request City Council at their May 20, 2024, meeting to approve the new water rate effective July 1, 2024, of $6.92 per unit as well as increase the fixed quarterly fee by 5%. The Board recommends that Council proceed by approving amendments to the Water and Sewer Ordinance.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

The Department of Public Works requests Council approve the PROPOSED AMENDMENT TO THE LIVONIA CODE OF ORDINANCE, AS AMENDED: Department of Law, re: to Section 040 of Title 13, Chapter 08 (Water Services Rates and Revenues) to provide for changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.

	Old Rate 2023	**To New Rate 2024**
Water Billing per unit	$3.21	$3.57
Sewer Billing per unit	$3.04	$3.35
Total Per Unit	**$6.25**	**$6.92**

Individual Ordinance revisions are attached.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Water & Sewer services

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

n/a

DETAILED WORK BEING PERFORMED

n/a

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

n/a

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended since no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. 2024 Water Rate Ordinance Revisions (1)
2. 2024 Water Rates Res #6551
3. Water Rates Powerpoint 05.03.2024
4. Letter to Water Board - Water Rates 2024 (002)

APPROVED BY

Date: May 09, 2024

Don Rohraff, Director of Public Works

Date: May 09, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 09, 2024

Mike Fisher, Chief Assistant City Attorney

Date: May 13, 2024

Maureen Miller Brosnan, Mayor

LETTER TO THE LIVONIA CITY COUNCIL

21.

Clerk
June 4, 2024

MEETING DATE	PRESENTED BY
R061724	

AGENDA ITEM

ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 050 of Title 13, Chapter 08 (Water Service Rates and Revenues) to provide changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.
First reading given by Council Vice President Martha Ptashnik on June 3, 2024.

BACKGROUND DETAILS

N/a

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Second Read

ATTACHMENTS

1. R060324 New Data Recd 5-29-24 - Proposed Ordinance 13.08.050 - 2024
2. S052024 LTC and Study Minutes for Water Rates

APPROVED BY

AN ORDINANCE AMENDING SECTION 050 OF TITLE 13, CHAPTER 08 (WATER SERVICE RATES AND REVENUES) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 050 of Title 13, Chapter 08 the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

13.08.050 Fixed rates. A. In addition to the charge for water usage, effective with the first billing on and after July 1, 202~~3~~4, there will be a fixed quarterly charge, determined by meter size, as follows:

METER SIZE	QUARTERLY CHARGE
5/8 Inch	$ 2~~4.98~~6.81
3/4 Inch	$ 2~~4.98~~6.81
1 Inch	$ 2~~4.98~~6.81
1 1/2” Meter	$ ~~74.90~~80.36
2” Meter	$ ~~96.15~~103.14
3” Meter	$ ~~126.33~~135.53
4” Meter	$ ~~193.04~~207.09
6” Meter	$ ~~514.27~~551.70
8” Meter	$ ~~1,456.73~~1,562.74
10” Meter	$ ~~4,199.15~~4,504.72

B. Seasonal Flat rate Water, per quarter $ ~~89.18~~98.21.

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

Meeting was called to order at 9:00 p.m. by Council President McCullough. Present: Laura Toy, Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: None

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

22. REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

    Councilmember Donovic offered a motion to refer this item to the Capital Outlay and Infrastructure Committee.

    DIRECTION APPROVING COMMITTEE OF WHOLE

LETTER TO THE LIVONIA CITY COUNCIL

22.

DPW
May 7, 2024

MEETING DATE	PRESENTED BY
S052024/R060324	Don Rohraff, Director of Public Works Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

BACKGROUND DETAILS

Livonia's Department of Public Works and Finance Department have worked together on the water and sewer rates proposed for implementation on July 1, 2024. In calculating the new rates, a review was made to determine how the fiscal year 2023 rates performed in conjunction with the budget, along with an analysis of the effects of the proposed new rates on our low-, average- and high-volume water users.

Incorporating the increase in wholesale charges from the Great Lakes Water Authority and an expected reduction in water sales charges, the recommended new rates will impact customers in the following manner:

1. The proposed water and sewer rate increase is 8.68 percent (8.68%) this year for the average residential user, which is an increase of $16.90 per quarter. Average use is based on consumption of 20 units (2,000 cubic feet) per quarter, which is 15,000 gallons of water.
2. The rate increase is mainly due to a pass-through of the changes to the water charges from our wholesale provider coupled with an anticipated decrease in water sales. Overall, GLWA increased its wholesale rate by 3.06%. The GLWA increase by component amounts to the per-unit rate increased by $.06 or 5.3 percent (5.3%) from $1.13 to $1.19, and an increased monthly fixed fee by $12,500 from $662,000 to $674,500 or 1.89 percent (1.89%).
3. A fixed fee increase of 5% is recommended for all meters.
4. City of Livonia users still pay less for water than users in most surrounding communities pay for an equal amount of water.
5. The new rates will be in effect from July 1, 2024, through June 30, 2025.

Additional detailed information is included in the attached letter to the Water and Sewer Board.

At a meeting of the Water and Sewer Board of the City of Livonia, the following resolution was adopted:

#WS 6551 05/24 RESOLVED, that the Water and Sewer Board will request City Council at their May 20, 2024, meeting to approve the new water rate effective July 1, 2024, of $6.92 per unit as well as increase the fixed quarterly fee by 5%. The Board recommends that Council proceed by approving amendments to the Water and Sewer Ordinance.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

The Department of Public Works requests Council approve the PROPOSED AMENDMENT TO THE LIVONIA CODE OF ORDINANCE, AS AMENDED: Department of Law, re: to Section 040 of Title 13, Chapter 08 (Water Services Rates and Revenues) to provide for changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.

	Old Rate 2023	**To New Rate 2024**
Water Billing per unit	$3.21	$3.57
Sewer Billing per unit	$3.04	$3.35
Total Per Unit	**$6.25**	**$6.92**

Individual Ordinance revisions are attached.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Water & Sewer services

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

n/a

DETAILED WORK BEING PERFORMED

n/a

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

n/a

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended since no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. 2024 Water Rate Ordinance Revisions (1)
2. 2024 Water Rates Res #6551
3. Water Rates Powerpoint 05.03.2024
4. Letter to Water Board - Water Rates 2024 (002)

APPROVED BY

Date: May 09, 2024

Don Rohraff, Director of Public Works

Date: May 09, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 09, 2024

Mike Fisher, Chief Assistant City Attorney

Date: May 13, 2024

Maureen Miller Brosnan, Mayor

LETTER TO THE LIVONIA CITY COUNCIL

22.

Clerk
June 4, 2024

MEETING DATE	PRESENTED BY
R061724	

AGENDA ITEM

ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 050 of Title 13, Chapter 28 (Industrial Waste Surcharge) to provide for changes in the industrial waste surcharge rate to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

BACKGROUND DETAILS

N/a

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Second Read

ATTACHMENTS

1. R060324 New Data Recd 5-29-24 - Proposed Ordinance 13.28.050 - 2024
2. S052024 LTC and Study Minutes for Water Rates

APPROVED BY

AN ORDINANCE AMENDING SECTION 050 OF TITLE 13, CHAPTER 28 (INDUSTRIAL WASTE SURCHARGE) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 050 of Title 13, Chapter 28 the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

13.28.050 Schedule of charges. Industrial waste pollutant strength surcharges are adopted herein, made effective with the first billing on and after July 1, 202~~3~~4, for users of the wastewater system of the City of Livonia, and are to be computed as follows:

Computation of Industrial Waste Pollutant Strength Surcharge

The industrial waste pollutant strength surcharge shall be computed in accordance with the following formula:

SC = 0.0624 V [a (BOD-275) + b (TSS-350) + c (P-12) + d (FOG-100)]

Where:

SC	=	Pollutant strength surcharge fee in dollars for the billing period.
V	=	Volume of waste discharged in the billing period in Mcf (1,000 cubic feet).
BOD	=	Five-day biochemical oxygen demand of the waste expressed in milligrams per liter (ppm).
TSS	=	Total suspended solids in the waste expressed in milligrams per liter (ppm).
P	=	Phosphorus in the waste expressed in milligrams per liter (ppm).
FOG	=	Fats, oils, and grease in the waste expressed in milligrams per liter (ppm).

a, b, c, d	=	Surcharge rates in dollars/pound for treating BOD, TSS, P and FOG, respectively.
0.624	=	Factor which converts Mcf to MM lbs.
a	=	dollars/pound for treating BOD = $ 0.3~~61~~92/pound greater than 275 mg/l.
b	=	dollars/pound for treating TSS = $ 0.~~496~~525/pound greater than 350 mg/l.
c	=	dollars/pound for treating P = $ ~~6.629~~7.571/pound greater than 12 mg/l.
d	=	dollars/pound for treating FOG = $ 0.1~~15~~25/pound greater than 100 mg/l.

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

Meeting was called to order at 9:00 p.m. by Council President McCullough. Present: Laura Toy, Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: None

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

22. REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

    Councilmember Donovic offered a motion to refer this item to the Capital Outlay and Infrastructure Committee.

    DIRECTION APPROVING COMMITTEE OF WHOLE

LETTER TO THE LIVONIA CITY COUNCIL

22.

DPW
May 7, 2024

MEETING DATE	PRESENTED BY
S052024/R060324	Don Rohraff, Director of Public Works Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

BACKGROUND DETAILS

Livonia's Department of Public Works and Finance Department have worked together on the water and sewer rates proposed for implementation on July 1, 2024. In calculating the new rates, a review was made to determine how the fiscal year 2023 rates performed in conjunction with the budget, along with an analysis of the effects of the proposed new rates on our low-, average- and high-volume water users.

Incorporating the increase in wholesale charges from the Great Lakes Water Authority and an expected reduction in water sales charges, the recommended new rates will impact customers in the following manner:

1. The proposed water and sewer rate increase is 8.68 percent (8.68%) this year for the average residential user, which is an increase of $16.90 per quarter. Average use is based on consumption of 20 units (2,000 cubic feet) per quarter, which is 15,000 gallons of water.
2. The rate increase is mainly due to a pass-through of the changes to the water charges from our wholesale provider coupled with an anticipated decrease in water sales. Overall, GLWA increased its wholesale rate by 3.06%. The GLWA increase by component amounts to the per-unit rate increased by $.06 or 5.3 percent (5.3%) from $1.13 to $1.19, and an increased monthly fixed fee by $12,500 from $662,000 to $674,500 or 1.89 percent (1.89%).
3. A fixed fee increase of 5% is recommended for all meters.
4. City of Livonia users still pay less for water than users in most surrounding communities pay for an equal amount of water.
5. The new rates will be in effect from July 1, 2024, through June 30, 2025.

Additional detailed information is included in the attached letter to the Water and Sewer Board.

At a meeting of the Water and Sewer Board of the City of Livonia, the following resolution was adopted:

#WS 6551 05/24 RESOLVED, that the Water and Sewer Board will request City Council at their May 20, 2024, meeting to approve the new water rate effective July 1, 2024, of $6.92 per unit as well as increase the fixed quarterly fee by 5%. The Board recommends that Council proceed by approving amendments to the Water and Sewer Ordinance.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

The Department of Public Works requests Council approve the PROPOSED AMENDMENT TO THE LIVONIA CODE OF ORDINANCE, AS AMENDED: Department of Law, re: to Section 040 of Title 13, Chapter 08 (Water Services Rates and Revenues) to provide for changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.

	Old Rate 2023	**To New Rate 2024**
Water Billing per unit	$3.21	$3.57
Sewer Billing per unit	$3.04	$3.35
Total Per Unit	**$6.25**	**$6.92**

Individual Ordinance revisions are attached.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Water & Sewer services

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

n/a

DETAILED WORK BEING PERFORMED

n/a

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

n/a

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended since no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. 2024 Water Rate Ordinance Revisions (1)
2. 2024 Water Rates Res #6551
3. Water Rates Powerpoint 05.03.2024
4. Letter to Water Board - Water Rates 2024 (002)

APPROVED BY

Date: May 09, 2024

Don Rohraff, Director of Public Works

Date: May 09, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 09, 2024

Mike Fisher, Chief Assistant City Attorney

Date: May 13, 2024

Maureen Miller Brosnan, Mayor

LETTER TO THE LIVONIA CITY COUNCIL

23.

Clerk
June 4, 2024

MEETING DATE	PRESENTED BY
R061724	

AGENDA ITEM

ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: to Section 120 of Title 13, Chapter 20 (Livonia Sewage Disposal System) to provide for changes to the sewer disposal and maintenance rates to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

BACKGROUND DETAILS

N/a

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Second Read

ATTACHMENTS

1. R060324 New Data Recd 5-29-24 - Proposed Ordinance 13.20.120 - 2024
2. S052024 LTC and Study Minutes for Water Rates

APPROVED BY

AN ORDINANCE AMENDING SECTION 120 OF TITLE 13, CHAPTER 20 (LIVONIA SEWAGE DISPOSAL SYSTEM) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 120 of Title 13, Chapter 20 the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

13.20.120 Disposal and maintenance rates (sewer). A. Effective with the first billing on and after July 1, 202~~3~~4, the fixed quarterly charge for sewage system maintenance, determined by water meter size, shall be as follows:

METER SIZE	QUARTERLY CHARGE
5/8 Inch	$ ~~44.77~~46.44
3/4 Inch	$ ~~44.77~~46.44
1 Inch	$ ~~44.77~~46.44
1 1/2" Meter	$ ~~134.22~~139.22
2" Meter	$ ~~172.28~~178.70
3" Meter	$ ~~226.36~~234.80
4" Meter	$ ~~345.89~~358.79
6" Meter	$ ~~921.48~~955.84
8" Meter	$ ~~2,610.19~~2,707.53
10" Meter	$ ~~7,524.08~~7,804.67

B. 1. In addition to the fixed quarterly maintenance charge, effective with the first billing on and after July 1, 202~~3~~4, there will be a charge for sewage system use, which shall be assessed at the following rates:

Base Charge

Wayne County per 100 cubic feet of water used	$ ~~2.18~~2.30
City of Livonia per 100 cubic feet of water used	$ ~~0.86~~1.05
Base Charge per 100 cubic feet of water used	$ 3.~~04~~35

Large User (meters sizes 1.5 inch or larger)

Charge per 100 cubic feet of water used	$ ~~2.02~~2.15
Total Charge for Large Users per 100 cubic feet of water used	$ 5.~~06~~50

2. For each dwelling unit with an unmetered water supply, there shall be a flat quarterly sewage system charge of: $ 1~~05.57~~13.44

3. Users other than single-family and two-family residential shall be subject to monthly Industrial Waste Control Meter Charges, determined by meter size, in the following amounts:

METER SIZE	MONTHLY INDUSTRIAL WASTE CONTROL CHARGE
5/8 Inch	$ ~~3.64~~3.72
3/4 Inch	$ ~~5.46~~5.58
1 Inch	$ ~~9.10~~9.30
1 1/2” Meter	$ ~~20.02~~20.46
2” Meter	$ ~~29.12~~29.76
3” Meter	$ ~~52.78~~53.94
4” Meter	$ ~~72.80~~74.40
6” Meter	$ ~~109.20~~111.60
8” Meter	$ ~~182.00~~186.00
10” Meter	$ ~~254.80~~260.40
12” Meter	$ ~~291.20~~297.60
14” Meter	$ ~~364.00~~372.00
16” Meter	$ ~~436.80~~446.40
18” Meter	$ ~~509.60~~520.80
20” Meter	$ ~~582.40~~595.20
24” Meter	$ ~~655.20~~669.60
30” Meter	$ ~~728.00~~744.00

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

Meeting was called to order at 9:00 p.m. by Council President McCullough. Present: Laura Toy, Jim Jolly, Vice President Martha Ptashnik, Rob Donovic, Carrie Budzinski, Scott Morgan, and President McCullough. Absent: None

Elected and appointed officials present: Lori Miller, City Clerk; Carter Fisher, City Attorney; Mark Taormina, Planning and Economic Development Director; and Todd Zilincik, City Engineer.

22. REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

    Councilmember Donovic offered a motion to refer this item to the Capital Outlay and Infrastructure Committee.

    DIRECTION APPROVING COMMITTEE OF WHOLE

LETTER TO THE LIVONIA CITY COUNCIL

22.

DPW
May 7, 2024

MEETING DATE	PRESENTED BY
S052024/R060324	Don Rohraff, Director of Public Works Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

BACKGROUND DETAILS

Livonia's Department of Public Works and Finance Department have worked together on the water and sewer rates proposed for implementation on July 1, 2024. In calculating the new rates, a review was made to determine how the fiscal year 2023 rates performed in conjunction with the budget, along with an analysis of the effects of the proposed new rates on our low-, average- and high-volume water users.

Incorporating the increase in wholesale charges from the Great Lakes Water Authority and an expected reduction in water sales charges, the recommended new rates will impact customers in the following manner:

1. The proposed water and sewer rate increase is 8.68 percent (8.68%) this year for the average residential user, which is an increase of $16.90 per quarter. Average use is based on consumption of 20 units (2,000 cubic feet) per quarter, which is 15,000 gallons of water.
2. The rate increase is mainly due to a pass-through of the changes to the water charges from our wholesale provider coupled with an anticipated decrease in water sales. Overall, GLWA increased its wholesale rate by 3.06%. The GLWA increase by component amounts to the per-unit rate increased by $.06 or 5.3 percent (5.3%) from $1.13 to $1.19, and an increased monthly fixed fee by $12,500 from $662,000 to $674,500 or 1.89 percent (1.89%).
3. A fixed fee increase of 5% is recommended for all meters.
4. City of Livonia users still pay less for water than users in most surrounding communities pay for an equal amount of water.
5. The new rates will be in effect from July 1, 2024, through June 30, 2025.

Additional detailed information is included in the attached letter to the Water and Sewer Board.

At a meeting of the Water and Sewer Board of the City of Livonia, the following resolution was adopted:

#WS 6551 05/24 RESOLVED, that the Water and Sewer Board will request City Council at their May 20, 2024, meeting to approve the new water rate effective July 1, 2024, of $6.92 per unit as well as increase the fixed quarterly fee by 5%. The Board recommends that Council proceed by approving amendments to the Water and Sewer Ordinance.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

The Department of Public Works requests Council approve the PROPOSED AMENDMENT TO THE LIVONIA CODE OF ORDINANCE, AS AMENDED: Department of Law, re: to Section 040 of Title 13, Chapter 08 (Water Services Rates and Revenues) to provide for changes in the water service consumption rates to become effective with the first billing on or after July 1, 2024.

	Old Rate 2023	**To New Rate 2024**
Water Billing per unit	$3.21	$3.57
Sewer Billing per unit	$3.04	$3.35
Total Per Unit	**$6.25**	**$6.92**

Individual Ordinance revisions are attached.

SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Water & Sewer services

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

n/a

DETAILED WORK BEING PERFORMED

n/a

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

n/a

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended since no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. 2024 Water Rate Ordinance Revisions (1)
2. 2024 Water Rates Res #6551
3. Water Rates Powerpoint 05.03.2024
4. Letter to Water Board - Water Rates 2024 (002)

APPROVED BY

Date: May 09, 2024

Don Rohraff, Director of Public Works

Date: May 09, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 09, 2024

Mike Fisher, Chief Assistant City Attorney

Date: May 13, 2024

Maureen Miller Brosnan, Mayor

LETTER TO THE LIVONIA CITY COUNCIL

24.

Clerk
June 4, 2024

MEETING DATE	PRESENTED BY
R061724	

AGENDA ITEM

ROLL CALL: Proposed Amendment to the Livonia Code of Ordinance, as amended: Department of Law, re: Section 130 of Title 13, Chapter 20 (Livonia Sewage Disposal System) to provide for changes to the special rates for designated uses to become effective with the first billing on or after July 1, 2024.
First Reading given by Council Vice President Martha Ptashnik on June 3, 2024.

BACKGROUND DETAILS

N/a

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

Second Read

ATTACHMENTS

1. R060324 New Data Recd 5-29-24 - Proposed Ordinance 13.20.130 - 2024
2. S052024 LTC and Study Minutes for Water Rates

APPROVED BY

AN ORDINANCE AMENDING SECTION 130 OF TITLE 13, CHAPTER 20 (LIVONIA SEWAGE DISPOSAL SYSTEM) OF THE LIVONIA CODE OF ORDINANCES, AS AMENDED.

THE CITY OF LIVONIA ORDAINS:

Section 1. Section 130 of Title 13, Chapter 20 the Livonia Code of Ordinances, as amended, is hereby amended to read as follows:

13.20.130 Special rates—For designated uses. A. Effective with the first billing on and after July 1, 202~~3~~4, where sewage disposal service is furnished to users not situated within the city, the sewage disposal rate for such users shall be as follows:

1. For all unmetered houses or residential dwellings connected to and using the facilities of the sewage disposal system, such rate shall be a flat rate of one hundred ~~five~~ thirteen dollars and ~~fifty-seven~~ forty-four cents ($1~~05.57~~13.44) per quarter.

2. For all customers connected to and using the facilities of the sewage disposal system for which consumption data may be obtained, such rate shall be equal to the appropriate base rate established in 13.20.120(B)(1), plus the appropriate quarterly fixed charge as determined by meter size established in 13.20.120(A).

B. All seasonal users with kitchen or bathroom facilities shall pay 50% of the current per unit sewage charge, i.e.:

Base Charge	
Wayne County per 100 cubic feet	$ 1.~~08~~15
City of Livonia per 100 cubic feet	$ 0.~~37~~53
Base Charge per 100 cubic feet	$ 1.~~45~~68
Large User (meters sizes 1.5 inch or larger)	
Charge per 100 cubic feet	$ ~~0.96~~1.08
Total Base Charge for Large Users per 100 cubic feet of water used	$ 2.~~41~~76

C. The above rates do not include any rates imposed by the county for the treatment and disposal of sewage through its sewage treatment and disposal facilities. Any such rate shall be included and specified as a separate item in bills sent to users as hereinafter provided.

Section 2. All ordinances or parts of ordinances in conflict herewith are hereby repealed only to the extent necessary to give this ordinance full force and effect.

Section 3. Should any portion of this ordinance be held invalid for any reason, such holding shall not be construed as affecting the validity of any of the remaining portions of this ordinance.

_____

CITY OF LIVONIA – CITY COUNCIL
MINUTES OF STUDY MEETING HELD MAY 20, 2024

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    Councilmember Donovic offered a motion to refer this item to the Capital Outlay and Infrastructure Committee.

    DIRECTION APPROVING COMMITTEE OF WHOLE

LETTER TO THE LIVONIA CITY COUNCIL

22.

DPW
May 7, 2024

MEETING DATE	PRESENTED BY
S052024/R060324	Don Rohraff, Director of Public Works Debra Peck Lichtenberg, CPA, Finance Director

AGENDA ITEM

REQUEST TO ADJUST WATER AND SEWER CONSUMPTION RATES, INDUSTRIAL SURCHARGE RATE AND INDUSTRIAL WASTE CONTROL CHARGE: Public Works Division, re: to become effective on July 1, 2024.

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SPECIFIC NAME OF PRODUCT AND NUMBER TO BE PURCHASED (if more than one)

Water & Sewer services

CONTRACT: Amount and/or purchase price and length of contract (with dates if applicable)

n/a

DETAILED WORK BEING PERFORMED

n/a

FISCAL CONSIDERATIONS (Amount requested and Account(s) used. If applicable, Grant Funding information)

n/a

ACCEPTANCE OF BID (Please detail the following: Why accepted, why not lowest bidder, company name, contact person, full address)

n/a

REASON TO WAIVE BID PROCESS (Emergency, Professional services, No advantage to City and why, Consortium package, etc): Waive the formal bidding process in accordance with Section 3.04.140.E.3 of the Livonia Code of Ordinances, as amended since no advantage to the City would result from competitive bidding.

ATTACHMENTS

1. 2024 Water Rate Ordinance Revisions (1)
2. 2024 Water Rates Res #6551
3. Water Rates Powerpoint 05.03.2024
4. Letter to Water Board - Water Rates 2024 (002)

APPROVED BY

Date: May 09, 2024

Don Rohraff, Director of Public Works

Date: May 09, 2024

Debra Peck Lichtenberg, CPA, Finance Director

Date: May 09, 2024

Mike Fisher, Chief Assistant City Attorney

Date: May 13, 2024

Maureen Miller Brosnan, Mayor

LETTER TO THE LIVONIA CITY COUNCIL

25.

Treasurer
May 14, 2024

MEETING DATE	PRESENTED BY
R061724	Susan Nash, City Treasurer

AGENDA ITEM

ADOPTION OF A RESOLUTION PLACING SPECIAL ASSESSMENTS UPON REFERENCED PROPERTIES WHOSE OWNERS HAVE NOT PAID CHARGES CONNECTED WITH THE 2022 DELAYED SIDEWALK PROGRAM (CONTRACT 22-G) AND/OR THE 2023 SIDEWALK PROGRAM (CONTRACT 23-G), SINGLE LOT ASSESSMENTS: Office of the Treasurer, re: same. (CR 400-23 and CR 401-23)

BACKGROUND DETAILS

Please be informed that in accordance with the provisions of Section 308.150 of Title 3, Chapter 8, of the Livonia Code of Ordinances, property owners in the above captioned 2022 delayed and 2023 sidewalk programs were notified by letter (dated 04/01/24) of the charges for their respective properties.

PREFERRED COUNCIL RECOMMENDATION/RESOLUTION (Please complete this field. Attachments are not to be used in lieu of the recommendation)

In order that a council resolution may be adopted at your meeting on June 17,2024 we are enclosing a list representing unpaid items to determine that an assessment shall be placed on these properties.

ATTACHMENTS

1. CR 400-23 & CR 401-23
2. 2023 Sidewalk Billing Registers and Applications

APPROVED BY

Susan Nash

Date: May 14, 2024

Susan Nash, City Treasurer

#400-23 RESOLVED, that having considered the report and recommendation of the City Engineer, dated November 8, 2023, which bears the signature of the Director of Public Works, and is approved for submission by the Mayor, regarding repair of sidewalks in the City of Livonia pursuant to the 2022 Sidewalk Program, Contract 22-G, at the locations and in the amounts indicated in the attachment to the aforesaid communication (the "Attachment"), which work was done pursuant to Council Resolution 118-22, adopted on April 4, 2022, and in accordance with the provisions of Section 340 of Title 12, Chapter 4 of the Livonia Code of Ordinances, as amended, the City Treasurer is hereby directed to send a statement of charges to all property owners in the amounts listed in the Attachment in accordance with Section 150 of Title 3, Chapter 8 of the Livonia Code of Ordinances, as amended, and the Council does hereby establish the evening of Monday, June 17, 2024, at 7:00 p.m., at the Livonia City Hall, 33000 Civic Center Drive, Livonia, Michigan, as the time and place when the Council shall meet for the purpose of adopting a resolution placing a special assessment upon said property for such charges unless the same are paid prior to the date of such meeting; and the City Clerk and City Treasurer are hereby requested to do all things necessary or incidental to the full performance of this resolution.

#401-23 RESOLVED, that having considered the report and recommendation of the City Engineer, dated November 8, 2023, which bears the signature of the Director of Public Works, and is approved for submission by the Mayor, regarding repair of sidewalks in the City of Livonia pursuant to the 2023 Sidewalk Program, Contract 23-G, at the locations and in the amounts indicated in the attachment to the aforesaid communication (the "Attachment"), which work was done pursuant to Council Resolution 71-23, adopted on February 27, 2023, and in accordance with the provisions of Section 340 of Title 12, Chapter 4 of the Livonia Code of Ordinances, as amended, the City Treasurer is hereby directed to send a statement of charges to all property owners in the amounts listed in the Attachment in accordance with Section 150 of Title 3, Chapter 8 of the Livonia Code of Ordinances, as amended, and the Council does hereby establish the evening of Monday, June 17, 2024, at 7:00 p.m., at the Livonia City Hall, 33000 Civic Center Drive, Livonia, Michigan, as the time and place when the Council shall meet for the purpose of adopting a resolution placing a special assessment upon said property for such charges unless the same are paid prior to the date of such meeting; and the City Clerk and City Treasurer are hereby requested to do all things necessary or incidental to the full performance of this resolution.

Invoices # / Customer # / Parcel #	Srvc Code	Owner / Prop. Address	Mailing Address	Amt. Chg. / Pmts/Crdts	Amt. Billed / Amt. Due
0000000001	SIDE	BORSETH ALISON	18478 GLASTONBURY	525.80	525.80
025 04 0099 000		18478 GLASTONBURY	LIVONIA, MI	0.00	525.80
025 04 0099 000		LIVONIA, MI			
0000000002	SIDE	ELAHI MOHAMMAD ALI	49428 COOKE AVE	934.56	934.56
025 04 0058 000		19036 GLENGARRY	PLYMOUTH, MI	0.00	934.56
025 04 0058 000		LIVONIA, MI			
0000000003	SIDE	SCHULTZ DAVID W	18598 GOLFVIEW ST	229.68	229.68
029 01 0016 000		18598 GOLFVIEW	LIVONIA, MI	229.68	0.00
029 01 0016 000		LIVONIA, MI			
0000000004	SIDE	MENDRYGA ROBERT E	38576 SCOTT DR	388.08	388.08
089 02 0194 000		29864 BARKLEY	WESTLAND, MI	388.08	0.00
089 02 0194 000		LIVONIA, MI			
0000000005	SIDE	BARNIER DOROTHY M	30046 BENTLEY	360.50	360.50
092 02 0072 000		30046 BENTLEY	LIVONIA, MI	360.50	0.00
092 02 0072 000		LIVONIA, MI			
0000000006	SIDE	MUZYKA FREDERICK / SAN	14291 DENNE	461.44	461.44
091 04 0043 000		14291 DENNE	LIVONIA, MI	0.00	461.44
091 04 0043 000		LIVONIA, MI			
0000000007	SIDE	STRINGFIELD JAMES/ANGE	14116 HUBBELL ST	213.84	213.84
091 08 0242 000		14116 HUBBELL	LIVONIA, MI	213.84	0.00
091 08 0242 000		LIVONIA, MI			
0000000008	SIDE	DANSBY DAVE	29437 LINDA ST	393.38	393.38
089 02 0014 000		29437 LINDA	LIVONIA, MI	393.38	0.00
089 02 0014 000		LIVONIA, MI			
0000000009	SIDE	HOGG DUNCAN	29450 LINDA ST	182.16	182.16
089 02 0008 000		29450 LINDA	LIVONIA, MI	182.16	0.00
089 02 0008 000		LIVONIA, MI			
0000000010	SIDE	MILEK DOLORES A	29464 LINDA ST	526.33	526.33
089 02 0007 000		29464 LINDA	LIVONIA, MI	526.33	0.00
089 02 0007 000		LIVONIA, MI			
0000000011	SIDE	BEARD EDWARD	29515 LINDA ST	353.29	353.29
089 02 0017 000		29515 LINDA	LIVONIA, MI	353.29	0.00
089 02 0017 000		LIVONIA, MI			
0000000012	SIDE	ZMUDCZYNSKI DAVID/SHAW	14085 SUNSET ST	483.07	483.07
091 08 0210 000		14085 SUNSET	LIVONIA, MI	483.07	0.00
091 08 0210 000		LIVONIA, MI			
0000000013	SIDE	BATES AARON / ALICIA	14446 SUNSET	151.41	151.41
091 08 0188 000		14446 SUNSET	LIVONIA, MI	151.41	0.00
091 08 0188 000		LIVONIA, MI			
0000000014	SIDE	GERALD G CURTIS	14901 CAVOUR ST	1,325.54	1,325.54
094 01 0092 002		14901 CAVOUR	LIVONIA, MI	1,325.54	0.00
094 01 0092 002		LIVONIA, MI			
0000000015	SIDE	BOWERS TYLER/LISA	14902 CAVOUR	1,456.42	1,456.42
094 01 0094 000		14902 CAVOUR	LIVONIA, MI	1,456.42	0.00
094 01 0094 000		LIVONIA, MI			
0000000016	SIDE	SYNOWIEC JULIE A	14912 CAVOUR	378.25	378.25
094 01 0096 000		14912 CAVOUR	LIVONIA, MI	378.25	0.00
094 01 0096 000		LIVONIA, MI			
0000000017	SIDE	DOUGLAS & KATH ROGALLA	14944 CAVOUR ST	721.00	721.00
094 01 0100 000		14944 CAVOUR	LIVONIA, MI	721.00	0.00
094 01 0100 000		LIVONIA, MI			
0000000018	SIDE	GRIFFIN ROBERT / DONNA	14427 GARDEN ST	229.68	229.68
095 01 0069 000		14427 GARDEN	LIVONIA, MI	0.00	229.68
095 01 0069 000		LIVONIA, MI			
0000000019	SIDE	PRZYSTAS JEFF/TINA	14997 HALLER ST	742.63	742.63
094 01 0217 000		14997 HALLER	LIVONIA, MI	0.00	742.63
094 01 0217 000		LIVONIA, MI			
0000000020	SIDE	JOINER STACEY	15073 INKSTER	904.74	904.74
093 01 0190 000		15073 INKSTER	LIVONIA, MI	0.00	904.74
093 01 0190 000		LIVONIA, MI			

Invoices # / Customer # / Parcel #	Srvc Code	Owner / Prop. Address	Mailing Address	Amt. Chg. / Pmts/Crdts	Amt. Billed / Amt. Due
0000000021	SIDE	FORTMAN BRIAN	15085 INKSTER RD	216.30	216.30
093 01 0193 000		15085 INKSTER	LIVONIA, MI	0.00	216.30
093 01 0193 000		LIVONIA, MI			
0000000022	SIDE	GORMAN JR. TIMOTHY/JIL	29156 JACQUELYN DR	839.52	839.52
095 01 0075 000		29156 JACQUELYN	LIVONIA, MI	0.00	839.52
095 01 0075 000		LIVONIA, MI			
0000000023	SIDE	STABLES PARKING LLC	14950 MIDDLEBELT	2,184.63	2,184.63
094 01 0001 000		14920 MIDDLEBELT	LIVONIA, MI	0.00	2,184.63
094 01 0001 000		LIVONIA, MI			
0000000024	SIDE	MARLEY MARY	14833 SANTA ANITA	194.67	194.67
093 04 0052 000		14833 SANTA ANITA	LIVONIA, MI	194.67	0.00
093 04 0052 000		LIVONIA, MI			
0000000025	SIDE	SHAH KUMASH/JAGRUTI	14676 TAYLOR BLVD	901.25	901.25
093 07 0013 000		14676 TAYLOR	LIVONIA, MI	901.25	0.00
093 07 0013 000		LIVONIA, MI			
0000000026	SIDE	CAVELL WOODS HOMEOWNER	14650 TAYLOR BLVD	382.13	382.13
093 07 0016 000		14700 TAYLOR	LIVONIA, MI	382.13	0.00
093 07 0016 000		LIVONIA, MI			
0000000027	SIDE	LS EQUITY LLC	812 S MAIN ST, STE 200	(THIS INVOICE VOIDED!)	
099 99 0007 009		29250 PLYMOUTH	ROYAL OAK, MI		
		LIVONIA, MI			
0000000028	SIDE	FOUNTAIN PARK PLAZA LL	1405 XENIUM LANE NORTH	2,217.36	2,217.36
107 99 0015 004		33200 PLYMOUTH	MINNEAPOLIS, MN	2,217.36	0.00
107 99 0015 004		LIVONIA, MI			
0000000029	SIDE	FIFTH THIRD BANK	38 FOUNTAIN SQUARE PLZ	273.98	273.98
107 99 0015 005		33246 PLYMOUTH	CINCINNATI, OH	0.00	273.98
107 99 0015 005		LIVONIA, MI			
0000000030	SIDE	FOUNTAIN PARK PLAZA LL	4036 TELEGRAPH RD STE	1,263.59	1,263.59
107 99 0015 006		33328 PLYMOUTH	BLOOMFIELD HILLS, MI	0.00	1,263.59
107 99 0015 006		LIVONIA, MI			
0000000031	SIDE	WG-4511 MI LLC	PO BOX 1159	1,740.20	1,740.20
107 99 0015 002		33330 PLYMOUTH	DEERFIELD, IL	0.00	1,740.20
107 99 0015 002		LIVONIA, MI			
0000000032	SIDE	DOSTAL PAUL J	9226 PERE AVE	198.00	198.00
123 03 0156 000		9226 PERE	LIVONIA, MI	198.00	0.00
123 03 0156 000		LIVONIA, MI			
0000000033	SIDE	DIX ALLAN	35415 ELMIRA	86.52	86.52
125 04 0019 000		35415 ELMIRA	LIVONIA, MI	86.52	0.00
125 04 0019 000		LIVONIA, MI			
0000000034	SIDE	SCOTT JOSHUA	35429 ELMIRA	180.25	180.25
125 04 0020 000		35429 ELMIRA	LIVONIA, MI	0.00	180.25
125 04 0020 000		LIVONIA, MI			
0000000035	SIDE	GALATI LEA ANITA	35457 ELMIRA	237.60	237.60
125 04 0022 000		35457 ELMIRA	LIVONIA, MI	237.60	0.00
125 04 0022 000		LIVONIA, MI			
0000000036	SIDE	J WAHL & P PHELPS	21658 VAN K DR	198.00	198.00
125 04 0030 000		35498 ELMIRA	GROSSE POINTE WOODS, M	198.00	0.00
125 04 0030 000		LIVONIA, MI			
0000000037	SIDE	MERUKA NIKOLLA / LULJE	36510 HEES	205.92	205.92
127 04 0043 000		36510 HEES	LIVONIA, MI	0.00	205.92
127 04 0043 000		LIVONIA, MI			
0000000038	SIDE	MABEY ANDREW P	36271 LAWRENCE	205.92	205.92
128 04 0019 000		36271 LAWRENCE	LIVONIA, MI	205.92	0.00
128 04 0019 000		LIVONIA, MI			
0000000039	SIDE	GALANG CHARITO	35815 LEON ST	209.09	209.09
125 02 0489 000		35815 LEON	LIVONIA, MI	209.09	0.00
125 02 0489 000		LIVONIA, MI			
0000000040	SIDE	LANDIS KRISTOPHER / AM	35601 MINTON	(THIS INVOICE VOIDED!)	
125 01 0428 000		35601 MINTON	LIVONIA, MI		
		LIVONIA, MI			

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0000000041	SIDE	MICHALIK JR. ROY W/PER	14247 MERRIMAN RD	213.84	213.84
088 10 0370 000		14247 MERRIMAN	LIVONIA, MI	0.00	213.84
088 10 0370 000		LIVONIA, MI			
0000000042	SIDE	HECHLIK TIMOTHY / SHEL	35611 MINTON	180.25	180.25
125 01 0427 000		35611 MINTON	LIVONIA, MI	0.00	180.25
125 01 0427 000		LIVONIA, MI			
0000000043	SIDE	ADAS IVANAUSKAS	35519 MINTON CT	187.46	187.46
125 01 0433 000		35519 MINTON	LIVONIA, MI	187.46	0.00
125 01 0433 000		LIVONIA, MI			
0000000044	SIDE	FIELD LEAH / JOSEPH	35814 ORANGELAWN	180.25	180.25
125 02 0525 000		35814 ORANGELAWN	LIVONIA, MI	180.25	0.00
125 02 0525 000		LIVONIA, MI			
0000000045	SIDE	LUTZO MARK / DANA	11800 ARBORWOOD PRESER	209.09	209.09
125 01 0267 000		35453 PARKDALE	FORT MYERS, FL	0.00	209.09
125 01 0267 000		LIVONIA, MI			
0000000046	SIDE	HISHMEH CYNTHIA	35811 PINETREE ST	965.59	965.59
125 02 0633 000		35811 PINETREE	LIVONIA, MI	965.59	0.00
125 02 0633 000		LIVONIA, MI			
0000000047	SIDE	MOTTA ADAM / HEATHER	35836 RICHLAND	55.44	55.44
125 02 0615 000		35836 RICHLAND	LIVONIA, MI	0.00	55.44
125 02 0615 000		LIVONIA, MI			
0000000048	SIDE	DUDEK STEFANIA E/ALEKS	35844 RICHLAND	150.48	150.48
125 02 0616 000		35844 RICHLAND	LIVONIA, MI	150.48	0.00
125 02 0616 000		LIVONIA, MI			
0000000049	SIDE	COLANGELO ANTHONY	36610 RICHLAND	421.97	421.97
126 04 0010 000		36610 RICHLAND	LIVONIA, MI	0.00	421.97
126 04 0010 000		LIVONIA, MI			
0000000050	SIDE	LUYBEN GARY/PALMER EVE	35859 W CHICAGO ST	248.60	248.60
125 02 0589 000		35859 WEST CHICAGO	LIVONIA, MI	0.00	248.60
125 02 0589 000		LIVONIA, MI			
0000000051	SIDE	RICHARD HASSELL	9912 HAMBELTON ST	911.79	911.79
130 03 0101 000		9912 HAMBELTON	LIVONIA, MI	0.00	911.79
130 03 0101 000		LIVONIA, MI			
0000000052	SIDE	JEFFREY AND LORI KENNE	8946 NORWICH ST	363.83	363.83
132 05 0027 000		8946 NORWICH	LIVONIA, MI	363.83	0.00
132 05 0027 000		LIVONIA, MI			
0000000053	SIDE	NOVAK RONALD/IRENE	34105 TRILLIUM CT	180.25	180.25
132 09 0022 000		34105 TRILLIUM	LIVONIA, MI	180.25	0.00
132 09 0022 000		LIVONIA, MI			
0000000054	SIDE	BOWER PAUL / MARGARET	9012 HUBBARD	704.88	704.88
136 03 0375 000		9012 HUBBARD	LIVONIA, MI	704.88	0.00
136 03 0375 000		LIVONIA, MI			
0000000055	SIDE	KIEFER JESSICA D	9024 HUBBARD	1,095.92	1,095.92
136 03 0374 000		9024 HUBBARD	LIVONIA, MI	0.00	1,095.92
136 03 0374 000		LIVONIA, MI			
0000000056	SIDE	ST MICHAEL PARISH LIVO	12 STATE STREET	19,255.18	19,255.18
134 99 0001 000		11441 HUBBARD	DETROIT, MI	19,255.18	0.00
134 99 0001 000		LIVONIA, MI			
0000000057	SIDE	CUELLAR LARA/MICHAEL	31845 MAINE ST	506.88	506.88
136 03 0358 000		31845 MAINE	LIVONIA, MI	0.00	506.88
136 03 0358 000		LIVONIA, MI			
0000000058	SIDE	MCFALL JASON W / KASSA	11030 MELROSE	998.31	998.31
133 02 0352 002		11030 MELROSE	LIVONIA, MI	998.31	0.00
133 02 0352 002		LIVONIA, MI			
0000000059	SIDE	CRAIG MADELYNN	9823 MERRIMAN	703.52	703.52
133 04 1352 002		9823 MERRIMAN	LIVONIA, MI	0.00	703.52
133 04 1352 002		LIVONIA, MI			
0000000060	SIDE	SCHMIEDEKNECHT AUGUST	9829 MERRIMAN	743.50	743.50
133 04 1350 002		9829 MERRIMAN	LIVONIA, MI	0.00	743.50
133 04 1350 002		LIVONIA, MI			

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0000000061	SIDE	BROWN RACHELLE	31331 GRANDON	16.50	16.50
139 01 0048 002		31331 GRANDON	LIVONIA, MI	0.00	16.50
139 01 0048 002		LIVONIA, MI			
0000000062	SIDE	DOBY MICHAEL	29760 MACINTYRE	173.04	173.04
137 01 0317 000		29760 MACINTYRE	LIVONIA, MI	0.00	173.04
137 01 0317 000		LIVONIA, MI			
0000000063	SIDE	ROBART ANNETTE T	8992 OPORTO	348.48	348.48
140 01 0398 000		8992 OPORTO	LIVONIA, MI	348.48	0.00
140 01 0398 000		LIVONIA, MI			
0000000064	SIDE	AMENSON ERIC / COLETTE	30108 WEST CHICAGO	378.25	378.25
137 01 0029 000		30108 WEST CHICAGO	LIVONIA, MI	378.25	0.00
137 01 0029 000		LIVONIA, MI			
0000000065	SIDE	HOULE KELLY	30136 WEST CHICAGO	182.16	182.16
137 01 0030 000		30136 WEST CHICAGO	LIVONIA, MI	0.00	182.16
137 01 0030 000		LIVONIA, MI			
0000000066	SIDE	CORDING R BRENT	30177 W CHICAGO ST	142.56	142.56
140 03 0287 000		30177 WEST CHICAGO	LIVONIA, MI	142.56	0.00
140 03 0287 000		LIVONIA, MI			
0000000067	SIDE	GOYER CAITLIN / CHISTO	30323 WEST CHICAGO	348.48	348.48
140 03 0283 000		30323 WEST CHICAGO	LIVONIA, MI	348.48	0.00
140 03 0283 000		LIVONIA, MI			
0000000068	SIDE	ROBERT KING	11161 KAREN ST	380.16	380.16
142 01 0123 000		11161 KAREN	LIVONIA, MI	380.16	0.00
142 01 0123 000		LIVONIA, MI			
0000000069	SIDE	GANDOLFO FAMILY TRUST	9242 PERE	310.03	310.03
123 03 0155 000		9242 PERE	LIVONIA, MI	310.03	0.00
123 03 0155 000		LIVONIA, MI			
0000000070	SIDE	LS EQUITY LLC	5200 BUFFINGTON	2,008.27	2,008.27
099 99 0007 011		11700 MIDDLEBELT	ATLANTA, GA	0.00	2,008.27
099 99 0007 011		LIVONIA, MI			

Billing Items Summary		Item Amt.	Item Bal.
6"SW Totals	35 Billing Items	13,511.52	4,870.80
SAWCUT Totals	7 Billing Items	121.00	85.80
4"SW Totals	41 Billing Items	22,329.37	8,378.02
CITY Totals	32 Billing Items	0.00	0.00
H/O4" Totals	5 Billing Items	4,239.48	1,766.45
H/O6" Totals	2 Billing Items	1,180.08	388.08
DTE Totals	1 Billing Items	0.00	0.00
8"SW Totals	4 Billing Items	11,157.74	2,525.60
H/O8" Totals	2 Billing Items	2,706.00	342.76
R4-6"C Totals	1 Billing Items	16.50	16.50

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TOTALS	70 Invoices	55,261.69	0.00	55,261.69
		36,887.68		18,374.01

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0000000001 001 04 0313 000	SIDE	TURNER ISAAC 19914 DEERING LIVONIA, MI	19914 DEERING LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000002 001 04 0327 000 001 04 0327 000	SIDE	MULCAHY JAMES/EDITH 20027 DEERING LIVONIA, MI	17236 VICTOR DR NORTHVILLE, MI	938.28 938.28	938.28 0.00
0000000003 001 04 0404 002 001 04 0404 002	SIDE	RENA/TIMOTHY ARSEN 20014 FLORAL LIVONIA, MI	20014 FLORAL ST LIVONIA, MI	667.64 667.64	667.64 0.00
0000000004 001 04 0399 000 001 04 0399 000	SIDE	DIEHR PHILLIP 20044 FLORAL LIVONIA, MI	20044 FLORAL LIVONIA, MI	665.28 665.28	665.28 0.00
0000000005 001 04 0398 000 001 04 0398 000	SIDE	SERRICO MICHAEL 20052 FLORAL LIVONIA, MI	20052 FLORAL LIVONIA, MI	656.64 0.00	656.64 656.64
0000000006 001 04 0381 000 001 04 0381 000	SIDE	SIMONSON JUSTIN 20216 FLORAL LIVONIA, MI	3321 MIDDLEBURRY LANE CHARLESTON, SC	1,156.20 1,156.20	1,156.20 0.00
0000000007 001 04 0494 000 001 04 0494 000	SIDE	MURRAY ANDREW / ASHLEY 20269 GILLMAN LIVONIA, MI	20269 GILLMAN LIVONIA, MI	423.36 423.36	423.36 0.00
0000000008 001 01 0013 000	SIDE	BARRY / MURRAY FOREMAN 27500 GRAND RIVER LIVONIA, MI	27500 GRAND RIVER ST LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000009 001 04 0118 000 001 04 0118 000	SIDE	WILLIAMS ERIC J 27521 LONG LIVONIA, MI	27521 LONG LIVONIA, MI	691.20 691.20	691.20 0.00
0000000010 001 04 0119 000 001 04 0119 000	SIDE	DAMM ALEXANDER / ASHLE 27527 LONG LIVONIA, MI	27527 LONG LIVONIA, MI	506.12 0.00	506.12 506.12
0000000011 001 04 0121 000 001 04 0121 000	SIDE	LORI HAMILTON 27535 LONG LIVONIA, MI	27535 LONG ST LIVONIA, MI	216.00 216.00	216.00 0.00
0000000012 001 04 0201 000 001 04 0201 000	SIDE	CLARK HEATHER / JOHN 27649 LONG LIVONIA, MI	3505 JUNIOR DR PINCKNEY, MI	1,155.16 1,155.16	1,155.16 0.00
0000000013 001 04 0372 001 001 04 0372 001	SIDE	PERVAIZ MARIYA 27924 LONG LIVONIA, MI	4016 67TH AVE. N. PINELLAS PARK, FL	276.48 0.00	276.48 276.48
0000000014 001 04 0459 000 001 04 0459 000	SIDE	KYLMAN ASHLEY 28038 LONG LIVONIA, MI	28038 LONG LIVONIA, MI	535.72 0.00	535.72 535.72
0000000015 002 02 0058 000 002 02 0058 000	SIDE	GALAZKA GENEVIEVE M 19784 MAPLEWOOD LIVONIA, MI	19784 MAPLEWOOD LIVONIA, MI	717.76 717.76	717.76 0.00
0000000016 003 01 0447 003 003 01 0447 003	SIDE	DTC BUILDING LLC 19850 MIDDLEBELT LIVONIA, MI	33762 SCHOOLCRAFT RD LIVONIA, MI	1,963.33 1,963.33	1,963.33 0.00
0000000017 004 01 0409 000 004 01 0409 000	SIDE	PRUITT MARLENE 19644 RENSELLOR LIVONIA, MI	19644 RENSELLOR LIVONIA, MI	1,277.56 1,277.56	1,277.56 0.00
0000000018 001 04 0091 000 001 04 0091 000	SIDE	LOCKMAN WILLIAM 20029 RENSELLOR LIVONIA, MI	20029 RENSELLOR LIVONIA, MI	216.00 216.00	216.00 0.00
0000000019 001 04 0093 000 001 04 0093 000	SIDE	BARBARA WILLIAMS 20035 RENSELLOR LIVONIA, MI	20035 RENSELLOR ST LIVONIA, MI	1,537.92 1,537.92	1,537.92 0.00
0000000020 001 04 0108 000 001 04 0108 000	SIDE	HERNANDEZ GENARO 20201 RENSELLOR LIVONIA, MI	20201 RENSELLOR ST LIVONIA, MI	1,519.68 0.00	1,519.68 1,519.68

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0000000021 004 01 0116 000 004 01 0116 000	SIDE	LE MIEUX BARBARA ANN 19317 ST FRANCIS LIVONIA, MI	19317 SAINT FRANCIS ST LIVONIA, MI	682.56 682.56	682.56 0.00
0000000022 001 04 0238 000 001 04 0238 000	SIDE	STANTON SAMMANTHA / DU 19909 ST FRANCIS LIVONIA, MI	19909 ST FRANCIS LIVONIA, MI	3,106.48 0.00	3,106.48 3,106.48
0000000023 001 04 0246 000 001 04 0246 000	SIDE	SKOWRONEK H/NEWLAND V 20021 ST FRANCIS LIVONIA, MI	20021 SAINT FRANCIS ST LIVONIA, MI	881.28 0.00	881.28 881.28
0000000024 001 04 0229 000 001 04 0229 000	SIDE	STORIE DONALD/DONNA 20024 ST FRANCIS LIVONIA, MI	20024 SAINT FRANCIS ST LIVONIA, MI	443.00 0.00	443.00 443.00
0000000025 004 01 0538 002 004 01 0538 002	SIDE	JEFFREY / MARY HEARN 27448 SEVEN MILE LIVONIA, MI	27448 7 MILE RD LIVONIA, MI	4,520.83 4,520.83	4,520.83 0.00
0000000026 002 02 0153 001 002 02 0153 001	SIDE	KADADO HIBA/ KHALIL FA 19914 SUNBURY LIVONIA, MI	19914 SUNBURY LIVONIA, MI	443.00 0.00	443.00 443.00
0000000027 002 02 0105 000 002 02 0105 000	SIDE	CHRISTOPHER/TINA SZETE 20235 WEYHER LIVONIA, MI	20235 WEYHER ST LIVONIA, MI	207.36 207.36	207.36 0.00
0000000028 007 01 0043 000	SIDE	LARKIN MARY K 19515 BAINBRIDGE LIVONIA, MI	19515 BAINBRIDGE AVE LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000029 005 01 0097 002 005 01 0097 002	SIDE	CHAN JUSTIN / BRENDEN 20425 BEATRICE LIVONIA, MI	20425 BEATRICE LIVONIA, MI	3,183.24 0.00	3,183.24 3,183.24
0000000030 005 01 0070 001	SIDE	GREEN ACRES LANDSCAPIN 29615 EIGHT MILE LIVONIA, MI	35560 GRAND RIVER AVE FARMINGTON, MI	(THIS INVOICE VOIDED!)	
0000000031 005 01 0102 001 005 01 0102 001	SIDE	UJKAJ, LLC 29811 EIGHT MILE LIVONIA, MI	29811 EIGHT MILE LIVONIA, MI	3,287.77 3,287.77	3,287.77 0.00
0000000032 005 99 0051 000 005 99 0051 000	SIDE	VENUS REAL ESTATE INC 30105 EIGHT MILE LIVONIA, MI	28425 S HARWICH DR FARMINGTON HILLS, MI	1,157.76 1,157.76	1,157.76 0.00
0000000033 006 99 0002 001 006 99 0002 001	SIDE	WALDRON ENTERPRISES LL 30421 EIGHT MILE LIVONIA, MI	135 ORCHARD LAKE RD PONTIAC, MI	2,514.89 2,514.89	2,514.89 0.00
0000000034 005 01 0028 000 005 01 0028 000	SIDE	COPPOLA SUZAN 20321 FREMONT LIVONIA, MI	20321 FREMONT LIVONIA, MI	1,097.28 1,097.28	1,097.28 0.00
0000000035 005 01 0031 000 005 01 0031 000	SIDE	SANDRA A DE WATER 20335 FREMONT LIVONIA, MI	20335 FREMONT ST LIVONIA, MI	1,200.96 1,200.96	1,200.96 0.00
0000000036 005 01 0151 000 005 01 0151 000	SIDE	HUNTER DANYELLE 20310 MELVIN LIVONIA, MI	20310 MELVIN LIVONIA, MI	1,321.92 0.00	1,321.92 1,321.92
0000000037 007 99 0011 001 007 99 0011 001	SIDE	STEPKE ROBERT / MARY V 19710 MERRIMAN LIVONIA, MI	19710 MERRIMAN LIVONIA, MI	449.28 449.28	449.28 0.00
0000000038 008 01 0451 001	SIDE	GOODSON MARC 19805 MIDDLEBELT LIVONIA, MI	20820 MIDDLEBELT FARMINGTON HILLS, MI	(THIS INVOICE VOIDED!)	
0000000039 008 01 0495 001 008 01 0495 001	SIDE	LIVONIA HOUSING COMMIS 19550 PURLINGBROOK LIVONIA, MI	33000 CIVIC CENTER DR LIVONIA, MI	8,440.72 8,440.72	8,440.72 0.00
0000000040 008 99 0001 000 008 99 0001 000	SIDE	SCHNORBERGER RUSSELL/L 30294 SEVEN MILE LIVONIA, MI	30294 7 MILE RD LIVONIA, MI	432.00 432.00	432.00 0.00

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0000000041 012 01 0272 003 012 01 0272 003	SIDE	TOMCHUCK ANNE M 19116 AUBURNDALE LIVONIA, MI	34 NASHAWENA WEST HAVEN, CT	1,612.48 0.00	1,612.48 1,612.48
0000000042 010 01 0043 001 010 01 0043 001	SIDE	EIGHT & MICHAELS LLC 32825 EIGHT MILE LIVONIA, MI	33640 SCHOOLCRAFT LIVONIA, MI	613.44 613.44	613.44 0.00
0000000043 011 01 0027 001 011 01 0027 001	SIDE	MITRI C BIBI 19350 FARMINGTON LIVONIA, MI	19350 FARMINGTON RD LIVONIA, MI	432.00 432.00	432.00 0.00
0000000044 011 01 0027 001	SIDE	MITRI C BIBI 19350 FARMINGTON LIVONIA, MI	19350 FARMINGTON RD LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000045 012 01 0084 000 012 01 0084 000	SIDE	ANTHONY MUSU JR 19422 INGRAM LIVONIA, MI	19422 INGRAM ST LIVONIA, MI	708.24 708.24	708.24 0.00
0000000046 012 99 0012 002 012 99 0012 002	SIDE	MERRIMAN 19335 LLC 19335 MERRIMAN LIVONIA, MI	650 CHURCH PLYMOUTH, MI	2,948.91 2,948.91	2,948.91 0.00
0000000047 009 02 0013 000 009 02 0013 000	SIDE	LANCE S HARTIGAN 20352 OSMUS LIVONIA, MI	20352 OSMUS ST LIVONIA, MI	388.80 388.80	388.80 0.00
0000000048 009 02 0014 000 009 02 0014 000	SIDE	VANSICKLE CHERYL ANN 20374 OSMUS LIVONIA, MI	20374 OSMUS ST LIVONIA, MI	639.36 639.36	639.36 0.00
0000000049 016 02 0132 000 016 02 0132 000	SIDE	FEDEWA MATTHEW 34070 BRETTON LIVONIA, MI	34070 BRETTON LIVONIA, MI	190.08 190.08	190.08 0.00
0000000050 016 02 0141 000 016 02 0141 000	SIDE	ELIE/NADIA KHOURY 34286 BRETTON LIVONIA, MI	16909 SHREWSBURY ST LIVONIA, MI	250.56 250.56	250.56 0.00
0000000051 013 99 0032 006 013 99 0032 006	SIDE	NORTHRIDGE LIVONIA LLC 33543 EIGHT MILE LIVONIA, MI	28470 THIRTEEN MILE RD FARMINGTON HILLS, MI	904.88 904.88	904.88 0.00
0000000052 015 02 0135 000 015 02 0135 000	SIDE	BEASLEY TABETHA 34803 FAIRFAX LIVONIA, MI	34803 FAIRFAX DR LIVONIA, MI	1,014.16 1,014.16	1,014.16 0.00
0000000053 013 99 0017 001 013 99 0017 001	SIDE	DIAMOND JILL / ERIN 20019 FARMINGTON LIVONIA, MI	20019 FARMINGTON LIVONIA, MI	397.44 0.00	397.44 397.44
0000000054 013 99 0016 003 013 99 0016 003	SIDE	MARCOLINA MARCELL/JENN 20047 FARMINGTON LIVONIA, MI	20047 FARMINGTON LIVONIA, MI	440.64 440.64	440.64 0.00
0000000055 013 99 0016 002 013 99 0016 002	SIDE	BROWN CHRISTOPHER 20105 FARMINGTON LIVONIA, MI	20105 FARMINGTON LIVONIA, MI	1,501.92 0.00	1,501.92 1,501.92
0000000056 015 01 0034 000	SIDE	CHLEBEK JEFFREY/PAMELA 19200 GARY LIVONIA, MI	19200 GARY LN LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000057 015 01 0093 000 015 01 0093 000	SIDE	CABANAS DINAH D 19578 GARY LIVONIA, MI	19578 GARY LN LIVONIA, MI	719.24 0.00	719.24 719.24
0000000058 015 02 0111 000 015 02 0111 000	SIDE	AYYASH EDDIE/AMAL 19747 GARY LIVONIA, MI	19747 GARY LIVONIA, MI	596.16 596.16	596.16 0.00
0000000059 015 01 0100 000 015 01 0100 000	SIDE	WALKER RAYMOND / LAURA 34696 HALDANE LIVONIA, MI	34696 HALDANE LIVONIA, MI	345.04 345.04	345.04 0.00
0000000060 015 01 0099 000 015 01 0099 000	SIDE	VULAJ-WOOD MARIA 34722 HALDANE LIVONIA, MI	34722 HALDANE DR LIVONIA, MI	216.00 0.00	216.00 216.00

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0000000061	SIDE	YANCURA BRIAN/CRISTINA	20076 LAUREL DR	656.64	656.64
014 04 0035 000		20076 LAUREL	LIVONIA, MI	0.00	656.64
014 04 0035 000		LIVONIA, MI			
0000000062	SIDE	GANNON SUSAN E	35096 PEMBROKE	227.00	227.00
014 03 0590 000		35096 PEMBROKE	LIVONIA, MI	227.00	0.00
014 03 0590 000		LIVONIA, MI			
0000000063	SIDE	JAMES / TAMARA MESSER	35218 PEMBROKE AVE	(THIS INVOICE VOIDED!)	
014 03 0593 000		35218 PEMBROKE	LIVONIA, MI		
		LIVONIA, MI			
0000000064	SIDE	ZAMZAM ACQUISITIONS LL	2222 WEST GRAND RIVER	375.54	375.54
015 01 0077 000		34582 ST MARTINS	OKEMOS, MI	0.00	375.54
015 01 0077 000		LIVONIA, MI			
0000000065	SIDE	ALFRED & TERESA CARBON	34673 SAINT MARTINS ST	460.28	460.28
015 01 0085 000		34673 ST MARTINS	LIVONIA, MI	460.28	0.00
015 01 0085 000		LIVONIA, MI			
0000000066	SIDE	OLSCHANSKI TIMOTHY/AMY	20131 SOUTHAMPTON DR	227.00	227.00
013 01 0412 000		20131 SOUTHAMPTON	LIVONIA, MI	227.00	0.00
013 01 0412 000		LIVONIA, MI			
0000000067	SIDE	DILLON LEE / KELLY	20007 STAMFORD	293.76	293.76
013 01 0460 000		20007 STAMFORD	LIVONIA, MI	293.76	0.00
013 01 0460 000		LIVONIA, MI			
0000000068	SIDE	RUTKOWSKI DONALD / BET	31516 FONVILLE	915.84	915.84
012 02 0366 000		31516 FONVILLE	LIVONIA, MI	915.84	0.00
012 02 0366 000		LIVONIA, MI			
0000000069	SIDE	37550 SEVEN MILE ROAD	23800 INDUSTRIAL PARK	250.80	250.80
024 99 0030 003		37550 SEVEN MILE	FARMINGTON HILLS, MI	250.80	0.00
024 99 0030 003		LIVONIA, MI			
0000000070	SIDE	VICTOR EAST LLC	150 WEST SECOND ST. ST	3,747.89	3,747.89
024 99 0016 007		37640 SEVEN MILE	ROYAL OAK, MI	0.00	3,747.89
024 99 0016 007		LIVONIA, MI			
0000000071	SIDE	ELAHI MOHAMMAD ALI	49428 COOKE AVE	1,062.36	1,062.36
025 04 0058 000		19036 GLENGARRY	PLYMOUTH, MI	1,062.36	0.00
025 04 0058 000		LIVONIA, MI			
0000000072	SIDE	GIROLOMO CONNIE	37648 KINGSBURN	1,352.32	1,352.32
025 04 0048 000		37648 KINGSBURN	LIVONIA, MI	1,352.32	0.00
025 04 0048 000		LIVONIA, MI			
0000000073	SIDE	YOUNES GHASSAN/WAFAA	18370 QUEENSBURY DR	208.84	208.84
025 03 0018 000		18370 QUEENSBURY	LIVONIA, MI	208.84	0.00
025 03 0018 000		LIVONIA, MI			
0000000074	SIDE	CALLEBS TREASA KATHY	36332 BROOKVIEW	299.64	299.64
032 01 0062 000		36332 BROOKVIEW	LIVONIA, MI	0.00	299.64
032 01 0062 000		LIVONIA, MI			
0000000075	SIDE	MALKOWSKI LEONARD / CO	37129 CURTIS RD	590.20	590.20
030 04 0147 000		37129 CURTIS	LIVONIA, MI	590.20	0.00
030 04 0147 000		LIVONIA, MI			
0000000076	SIDE	CHARLES/BARBARA BENNIN	18266 HAMPTON CT	208.84	208.84
029 02 0006 000		18266 HAMPTON CT	LIVONIA, MI	208.84	0.00
029 02 0006 000		LIVONIA, MI			
0000000077	SIDE	LAMACCHIA THOMAS/ANNE	35698 VARGO ST	466.56	466.56
032 02 0414 000		35698 VARGO	LIVONIA, MI	466.56	0.00
032 02 0414 000		LIVONIA, MI			
0000000078	SIDE	THOMAS A / CAROLINE FE	17815 MYRON ST	440.64	440.64
036 02 0203 000		17815 MYRON	LIVONIA, MI	0.00	440.64
036 02 0203 000		LIVONIA, MI			
0000000079	SIDE	LAFERLE BARBARA	35995 NORTHGATE	263.32	263.32
032 01 0241 000		35995 NORTHGATE	LIVONIA, MI	263.32	0.00
032 01 0241 000		LIVONIA, MI			
0000000080	SIDE	NGUYEN TONY	33466 VARGO DR	216.00	216.00
036 01 0102 000		33466 VARGO	LIVONIA, MI	0.00	216.00
036 01 0102 000		LIVONIA, MI			

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0000000081	SIDE	ROMAN MARIA S	18221 WHITBY	443.00	443.00
033 03 0089 000		18221 WHITBY	LIVONIA, MI	443.00	0.00
033 03 0089 000		LIVONIA, MI			
0000000082	SIDE	BLEAU CHRISTOPHER/TERR	18232 WHITBY	1,105.92	1,105.92
033 03 0087 000		18232 WHITBY	LIVONIA, MI	0.00	1,105.92
033 03 0087 000		LIVONIA, MI			
0000000083	SIDE	WILLIAM / DENISE MACMA	17370 BROOKVIEW DR	925.56	925.56
044 07 0012 000		17370 BROOKVIEW	LIVONIA, MI	925.56	0.00
044 07 0012 000		LIVONIA, MI			
0000000084	SIDE	RICHARD GREGORY / SUSA	17323 CROSS WINDS RD	245.16	245.16
043 04 0009 000		17323 CROSS WINDS	LIVONIA, MI	245.16	0.00
043 04 0009 000		LIVONIA, MI			
0000000085	SIDE	LACARIA GIUSEPPE / GIO	17347 CROSS WINDS	233.28	233.28
043 04 0010 000		17347 CROSS WINDS	LIVONIA, MI	233.28	0.00
043 04 0010 000		LIVONIA, MI			
0000000086	SIDE	STACER BRAD/DAVID/CRAI	29710 LAMAR LN	1,307.00	1,307.00
041 02 0137 000		29710 LAMAR	LIVONIA, MI	0.00	1,307.00
041 02 0137 000		LIVONIA, MI			
0000000087	SIDE	DRIGGS PATRICIA / BREN	31079 MAYVILLE	389.84	389.84
043 03 0029 000		31079 MAYVILLE	LIVONIA, MI	389.84	0.00
043 03 0029 000		LIVONIA, MI			
0000000088	SIDE	RICARDO / HEATHER JOSE	31323 MAYVILLE ST	290.56	290.56
043 03 0036 000		31323 MAYVILLE	LIVONIA, MI	290.56	0.00
043 03 0036 000		LIVONIA, MI			
0000000089	SIDE	MARGUERITE MUGARDITCH	18926 PURLINGBROOK ST	198.72	198.72
042 04 0006 000		18926 PURLINGBROOK	LIVONIA, MI	198.72	0.00
042 04 0006 000		LIVONIA, MI			
0000000090	SIDE	TARNOWSKI RONALD/DAWN	17266 DOLORES ST	892.28	892.28
048 02 0181 000		17266 DOLORES	LIVONIA, MI	0.00	892.28
048 02 0181 000		LIVONIA, MI			
0000000091	SIDE	QUIGGINS ROBERT/MARY	17278 DOLORES ST	227.00	227.00
048 02 0180 000		17278 DOLORES	LIVONIA, MI	227.00	0.00
048 02 0180 000		LIVONIA, MI			
0000000092	SIDE	JOSEPH/JOANNE ZAMMIT	34660 BRISTOL ST	217.92	217.92
062 02 0550 000		34660 BRISTOL	LIVONIA, MI	217.92	0.00
062 02 0550 000		LIVONIA, MI			
0000000093	SIDE	SKARZYNSKA MARTA/SANTO	35028 ELLEN	254.24	254.24
062 03 0691 000		35028 ELLEN	LIVONIA, MI	254.24	0.00
062 03 0691 000		LIVONIA, MI			
0000000094	SIDE	L F L 334 LLC	15645 FARMINGTON	7,575.66	7,575.66
064 01 0236 000		15645 FARMINGTON	LIVONIA, MI	7,575.66	0.00
064 01 0236 000		LIVONIA, MI			
0000000095	SIDE	WILLIAMS RONALD/CAROLY	34260 GROVE DR	545.52	545.52
061 03 0296 000		34260 GROVE	LIVONIA, MI	545.52	0.00
061 03 0296 000		LIVONIA, MI			
0000000096	SIDE	MAURI STEVEN	34276 GROVE	466.56	466.56
061 03 0295 000		34276 GROVE	LIVONIA, MI	466.56	0.00
061 03 0295 000		LIVONIA, MI			
0000000097	SIDE	MILLER CHARLES / SUSAN	4475 STANLEY CT	172.80	172.80
061 03 0291 000		34458 GROVE	PLYMOUTH, MI	172.80	0.00
061 03 0291 000		LIVONIA, MI			
0000000098	SIDE	DAVID T WALSH	34474 GROVE DR	318.08	318.08
061 03 0290 000		34474 GROVE	LIVONIA, MI	318.08	0.00
061 03 0290 000		LIVONIA, MI			
0000000099	SIDE	DAVID / MARY ANN STOKE	35129 GROVE DR	317.80	317.80
062 01 0470 000		35129 GROVE	LIVONIA, MI	317.80	0.00
062 01 0470 000		LIVONIA, MI			
0000000100	SIDE	MILLION REBECCA	34266 MUNGER DR	155.52	155.52
061 03 0258 000		34266 MUNGER	LIVONIA, MI	155.52	0.00
061 03 0258 000		LIVONIA, MI			

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0000000101	SIDE	YOUNKER JEFFREY/TAMARA	34302 MUNGER DR	299.64	299.64
061 03 0257 000		34302 MUNGER	LIVONIA, MI	0.00	299.64
061 03 0257 000		LIVONIA, MI			
0000000102	SIDE	SCOTT QUIN	34634 MUNGER DR	267.84	267.84
062 01 0486 001		34634 MUNGER	LIVONIA, MI	267.84	0.00
062 01 0486 001		LIVONIA, MI			
0000000103	SIDE	EVANGELISTA DAVID/KIMB	34954 MUNGER DR	163.44	163.44
062 01 0472 000		34954 MUNGER	LIVONIA, MI	163.44	0.00
062 01 0472 000		LIVONIA, MI			
0000000104	SIDE	DICKEY CONSTANCE M.	33451 RAYBURN ST	1,395.76	1,395.76
064 01 0303 000		33451 RAYBURN	LIVONIA, MI	0.00	1,395.76
064 01 0303 000		LIVONIA, MI			
0000000105	SIDE	SMITH WILLIAM D / KARI	16017 RIVERSIDE	308.72	308.72
063 02 0624 000		16017 RIVERSIDE	LIVONIA, MI	0.00	308.72
063 02 0624 000		LIVONIA, MI			
0000000106	SIDE	MOSHIER GREGORY / LORI	16086 RIVERSIDE	541.56	541.56
063 02 0653 000		16086 RIVERSIDE	LIVONIA, MI	541.56	0.00
063 02 0653 000		LIVONIA, MI			
0000000107	SIDE	CORDLE STEPHEN F	16087 RIVERSIDE	444.92	444.92
063 02 0618 000		16087 RIVERSIDE	LIVONIA, MI	0.00	444.92
063 02 0618 000		LIVONIA, MI			
0000000108	SIDE	FIRSTENBERG KEITH/JAYN	16317 RIVERSIDE ST	(THIS INVOICE VOIDED!)	
062 02 0524 000		16317 RIVERSIDE	LIVONIA, MI		
		LIVONIA, MI			
0000000109	SIDE	KWON DONG-JOO	16460 RIVERSIDE ST	145.28	145.28
062 02 0537 000		16460 RIVERSIDE	LIVONIA, MI	0.00	145.28
062 02 0537 000		LIVONIA, MI			
0000000110	SIDE	MATSUMURA KYOKO	16452 WESTBROOK	214.40	214.40
062 02 0533 000		16528 RIVERSIDE	LIVONIA, MI	214.40	0.00
062 02 0533 000		LIVONIA, MI			
0000000111	SIDE	BELLE RODNEY L	16540 RIVERSIDE ST	595.20	595.20
062 01 0493 000		16540 RIVERSIDE	LIVONIA, MI	0.00	595.20
062 01 0493 000		LIVONIA, MI			
0000000112	SIDE	KELLY GARRETT	16543 RIVERSIDE	624.60	624.60
062 01 0515 000		16543 RIVERSIDE	LIVONIA, MI	0.00	624.60
062 01 0515 000		LIVONIA, MI			
0000000113	SIDE	MUCAHY MICHAEL / JOYCE	16559 RIVERSIDE	138.24	138.24
062 01 0514 000		16559 RIVERSIDE	LIVONIA, MI	0.00	138.24
062 01 0514 000		LIVONIA, MI			
0000000114	SIDE	FAKHOURI MATTHEW/FARIS	16720 RIVERSIDE ST	1,094.08	1,094.08
062 01 0428 000		16720 RIVERSIDE	LIVONIA, MI	1,094.08	0.00
062 01 0428 000		LIVONIA, MI			
0000000115	SIDE	DOA IOLE A	16734 RIVERSIDE	138.24	138.24
062 01 0427 000		16734 RIVERSIDE	LIVONIA, MI	138.24	0.00
062 01 0427 000		LIVONIA, MI			
0000000116	SIDE	LYN & PENELOPE BEESLEY	34283 6 MILE RD	345.60	345.60
061 03 0348 000		34283 SIX MILE	LIVONIA, MI	0.00	345.60
061 03 0348 000		LIVONIA, MI			
0000000117	SIDE	JOHN/PATRICIA DICELLO	34409 6 MILE RD	146.88	146.88
061 03 0349 000		34409 SIX MILE	LIVONIA, MI	146.88	0.00
061 03 0349 000		LIVONIA, MI			
0000000118	SIDE	CARLTON MARTHA	34441 6 MILE RD	276.48	276.48
061 03 0351 000		34441 SIX MILE	LIVONIA, MI	276.48	0.00
061 03 0351 000		LIVONIA, MI			
0000000119	SIDE	RONALD R MILLER	34615 6 MILE RD	371.52	371.52
061 03 0355 000		34615 SIX MILE	LIVONIA, MI	0.00	371.52
061 03 0355 000		LIVONIA, MI			
0000000120	SIDE	SALNA STEPHEN	34495 WOOD	1,632.96	1,632.96
061 03 0320 000		34495 WOOD	LIVONIA, MI	1,632.96	0.00
061 03 0320 000		LIVONIA, MI			

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0000000121 062 01 0400 000 062 01 0400 000	SIDE	OWENS BRIAN / AMY 34665 WOOD LIVONIA, MI	34665 WOOD LIVONIA, MI	163.44 163.44	163.44 0.00
0000000122 062 01 0406 000 062 01 0406 000	SIDE	OSWALT SANDRA A 34919 WOOD LIVONIA, MI	34919 WOOD LIVONIA, MI	290.56 290.56	290.56 0.00
0000000123 062 01 0419 002 062 01 0419 002	SIDE	JENKINSON JENNIFER 35169 WOOD LIVONIA, MI	35169 WOOD LIVONIA, MI	199.76 0.00	199.76 199.76
0000000124 065 01 0149 000 065 01 0149 000	SIDE	WYLIN BRADLEY / NOELLE 16854 COUNTRY CLUB LIVONIA, MI	16854 COUNTRY CLUB LIVONIA, MI	1,166.40 1,166.40	1,166.40 0.00
0000000125 068 99 0010 001 068 99 0010 001	SIDE	NICOLE OBREGON LIVING 35900 FIVE MILE LIVONIA, MI	17816 WINCHESTER DR NORTHVILLE, MI	749.26 0.00	749.26 749.26
0000000126 068 99 0009 001 068 99 0009 001	SIDE	HAMADE REALTY LLC 36000 FIVE MILE LIVONIA, MI	205 SOUTH ROSEVERE ST DEARBORN, MI	1,835.16 0.00	1,835.16 1,835.16
0000000127 068 99 0007 005 068 99 0007 005	SIDE	LIVONIA VENTURES LLC 36016 FIVE MILE LIVONIA, MI	28104 ORCHARD LAKE RD FARMINGTON HILLS, MI	2,211.71 2,211.71	2,211.71 0.00
0000000128 068 99 0007 004 068 99 0007 004	SIDE	P & R RICE PROPERTY MG 36100 FIVE MILE LIVONIA, MI	36100 5 MILE RD LIVONIA, MI	7,192.86 0.00	7,192.86 7,192.86
0000000129 068 99 0006 001 068 99 0006 001	SIDE	JAI GANESH, LLC 36180 FIVE MILE LIVONIA, MI	36180 5 MILE RD LIVONIA, MI	1,462.93 0.00	1,462.93 1,462.93
0000000130 068 99 0003 002 068 99 0003 002	SIDE	FIVE-LEVAN PLACE LLC 36274 FIVE MILE LIVONIA, MI	35296 BANBURY LIVONIA, MI	1,525.39 1,525.39	1,525.39 0.00
0000000131 068 99 0002 001 068 99 0002 001	SIDE	5 MILE & LEVAN AMOCO L 36300 FIVE MILE LIVONIA, MI	12598 MICHIGAN AVE DEARBORN, MI	250.56 0.00	250.56 250.56
0000000132 067 01 0072 000 067 01 0072 000	SIDE	THOMAS JENNIFER 36520 KINGSBURY LIVONIA, MI	36520 KINGSBURY LIVONIA, MI	451.64 0.00	451.64 451.64
0000000133 072 02 0088 000 072 02 0088 000	SIDE	BOWRING RICARDO / REBE 37659 LADYWOOD LIVONIA, MI	37659 LADYWOOD LIVONIA, MI	1,589.76 0.00	1,589.76 1,589.76
0000000134 067 02 0080 000 067 02 0080 000	SIDE	MAKLED MOHAMED 15546 LIVERPOOL LIVONIA, MI	15546 LIVERPOOL LIVONIA, MI	227.00 227.00	227.00 0.00
0000000135 067 04 0343 002	SIDE	HATTLE STEPHEN J 37141 MYRNA LIVONIA, MI	37141 MYRNA LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000136 065 05 0125 000 065 05 0125 000	SIDE	MARZOUQ YOUSEF J / MAR 16568 PARKLANE LIVONIA, MI	16568 PARKLANE LIVONIA, MI	250.56 0.00	250.56 250.56
0000000137 066 02 0022 000 066 02 0022 000	SIDE	CHOSS HENRY 16697 RENWICK LIVONIA, MI	16697 RENWICK ST LIVONIA, MI	129.60 129.60	129.60 0.00
0000000138 066 02 0023 000 066 02 0023 000	SIDE	PARRATTO LARRY/VIRGINI 16725 RENWICK LIVONIA, MI	16725 RENWICK LIVONIA, MI	838.08 838.08	838.08 0.00
0000000139 065 02 0244 000 065 02 0244 000	SIDE	BATTJES WAYNE/JULIE 16815 RONNIE LIVONIA, MI	16815 RONNIE LN LIVONIA, MI	501.32 501.32	501.32 0.00
0000000140 067 02 0069 000 067 02 0069 000	SIDE	BOYNTON EDWARD/BARBARA 37137 SHERWOOD LIVONIA, MI	37137 SHERWOOD ST LIVONIA, MI	181.44 181.44	181.44 0.00

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0000000141 067 02 0068 000 067 02 0068 000	SIDE	FLANAGAN NATALIE / DAR 37149 SHERWOOD LIVONIA, MI	37149 SHERWOOD LIVONIA, MI	236.08 236.08	236.08 0.00
0000000142 068 04 0169 000 068 04 0169 000	SIDE	LYNN/MARCIA SEBOLD 15561 WESTBROOK LIVONIA, MI	15561 WESTBROOK ST LIVONIA, MI	241.92 241.92	241.92 0.00
0000000143 066 02 0051 000	SIDE	MCCLAIN CHRISTOPHER / 36615 WHITCOMB LIVONIA, MI	36615 WHITCOMB LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000144 065 02 0245 000 065 02 0245 000	SIDE	BEIDOUN JAMIL 35511 WOOD LIVONIA, MI	35511 WOOD LIVONIA, MI	726.40 0.00	726.40 726.40
0000000145 068 04 0185 000 068 04 0185 000	SIDE	PLYMALE SAMUEL / CHELS 15645 WOODSIDE LIVONIA, MI	15645 WOODSIDE LIVONIA, MI	1,130.16 1,130.16	1,130.16 0.00
0000000146 069 03 0226 000 069 03 0226 000	SIDE	MARK/ROSELYN JOHNSON 15799 BLUE SKIES LIVONIA, MI	15799 BLUE SKIES DR LIVONIA, MI	190.68 190.68	190.68 0.00
0000000147 072 03 0041 000 072 03 0041 000	SIDE	COLEMAN ROBERT S / MAR 15375 W BLUE SKIES LIVONIA, MI	15375 W BLUE SKIES LIVONIA, MI	633.52 633.52	633.52 0.00
0000000148 072 03 0042 000 072 03 0042 000	SIDE	ASMAN CAROL A 15383 W BLUE SKIES LIVONIA, MI	15383 BLUE SKIES LIVONIA, MI	562.96 562.96	562.96 0.00
0000000149 069 03 0273 000 069 03 0273 000	SIDE	WILLIAM A/KIMBERLY A W 37465 BRISTOL LIVONIA, MI	37465 BRISTOL CT LIVONIA, MI	1,448.04 0.00	1,448.04 1,448.04
0000000150 069 03 0183 000 069 03 0183 000	SIDE	MICHAEL & SUSAN MIKAIL 16304 HOUGHTON LIVONIA, MI	16304 HOUGHTON DR LIVONIA, MI	259.20 259.20	259.20 0.00
0000000151 071 01 0192 000 071 01 0192 000	SIDE	SANCRICCA VITTORIO / K 38764 KINGSBURY LIVONIA, MI	38764 KINGSBURY LIVONIA, MI	254.24 254.24	254.24 0.00
0000000152 069 02 0069 000	SIDE	GOLANI RAUMSIN / ASHLE 38124 MALLORY LIVONIA, MI	38124 MALLORY LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000153 069 03 0247 000 069 03 0247 000	SIDE	DENNIS M PAULEY 37851 MUNGER LIVONIA, MI	37851 MUNGER DR LIVONIA, MI	1,421.28 1,421.28	1,421.28 0.00
0000000154 071 01 0093 000	SIDE	SAUCEDO MANUEL / MARTA 38772 ROYCROFT LIVONIA, MI	38772 ROYCROFT LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000155 070 01 0127 000	SIDE	MOREAU SHARON / JOSEPH 39038 STACEY LIVONIA, MI	39038 STACEY LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000156 066 02 0042 000 066 02 0042 000	SIDE	LUBANSKI CHRISTINE A 36524 WHITCOMB LIVONIA, MI	36524 WHITCOMB LIVONIA, MI	236.08 236.08	236.08 0.00
0000000157 069 01 0064 000 069 01 0064 000	SIDE	ERICSON KARI KAE 37683 SUNNYDALE LIVONIA, MI	37683 SUNNYDALE LIVONIA, MI	481.24 481.24	481.24 0.00
0000000158 075 04 0513 000 075 04 0513 000	SIDE	STEINER KATHRYN REV LI 14357 BASSETT LIVONIA, MI	14357 BASSETT LIVONIA, MI	236.08 236.08	236.08 0.00
0000000159 073 02 0292 000 073 02 0292 000	SIDE	MARSHALL DANIEL T 37852 HOWELL LIVONIA, MI	37852 HOWELL LIVONIA, MI	207.36 207.36	207.36 0.00
0000000160 073 01 0155 000 073 01 0155 000	SIDE	JAMES / SHARON MERRILL 14545 RICHFIELD LIVONIA, MI	14545 RICHFIELD ST LIVONIA, MI	227.00 227.00	227.00 0.00

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0000000161 073 01 0171 000 073 01 0171 000	SIDE	THADDEUS ZBIZEK 14758 RICHFIELD LIVONIA, MI	14758 RICHFIELD ST LIVONIA, MI	238.00 238.00	238.00 0.00
0000000162 073 02 0293 000 073 02 0293 000	SIDE	BENSCH PAUL/MARLENE - 15024 SUSANNA LIVONIA, MI	15024 SUSANNA ST LIVONIA, MI	1,193.40 1,193.40	1,193.40 0.00
0000000163 077 06 0207 000 077 06 0207 000	SIDE	KNISLEY THOMAS / NICOL 14812 GOLFVIEW LIVONIA, MI	14812 GOLFVIEW LIVONIA, MI	208.84 208.84	208.84 0.00
0000000164 077 07 0025 000	SIDE	KENNETH / MARGARET WOO 36158 LYNDON LIVONIA, MI	36158 LYNDON ST LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000165 077 09 0036 000 077 09 0036 000	SIDE	CANNON PATRICK T. 36066 PARKHURST LIVONIA, MI	36066 PARKHURST AVE LIVONIA, MI	1,053.28 1,053.28	1,053.28 0.00
0000000166 083 03 0141 000 083 03 0141 000	SIDE	GORDON KYLE D 35132 SCONE LIVONIA, MI	35132 SCONE ST LIVONIA, MI	217.92 0.00	217.92 217.92
0000000167 088 07 0581 000 088 07 0581 000	SIDE	DONALD/DENISE KAMINSKI 13959 BLACKBURN LIVONIA, MI	13959 BLACKBURN ST LIVONIA, MI	198.72 198.72	198.72 0.00
0000000168 088 07 0634 000 088 07 0634 000	SIDE	AGHOBJIAN MANUEIL / MA 14377 CRANSTON LIVONIA, MI	37652 BLOOMFIELD DR LIVONIA, MI	227.00 0.00	227.00 227.00
0000000169 086 02 0057 000 086 02 0057 000	SIDE	GAINES SCOTT/KIMBERLY 32955 LYNDON LIVONIA, MI	32955 LYNDON ST LIVONIA, MI	483.84 483.84	483.84 0.00
0000000170 086 02 0046 000 086 02 0046 000	SIDE	HEMPHILL RODNEY 33161 LYNDON LIVONIA, MI	33161 LYNDON LIVONIA, MI	227.00 227.00	227.00 0.00
0000000171 092 02 0044 000 092 02 0044 000	SIDE	HUYNH HUNG T/NGYEN DIE 30138 ACACIA LIVONIA, MI	30138 ACACIA ST LIVONIA, MI	274.32 274.32	274.32 0.00
0000000172 092 03 0032 002 092 03 0032 002	SIDE	DECOCKER DALE / CRYSTA 29601 JACQUELYN LIVONIA, MI	29601 JACQUELYN LIVONIA, MI	1,148.62 1,148.62	1,148.62 0.00
0000000173 092 03 0035 002 092 03 0035 002	SIDE	HILLMER MICHAEL 29645 JACQUELYN LIVONIA, MI	29645 JACQUELYN LIVONIA, MI	760.32 0.00	760.32 760.32
0000000174 092 03 0036 002 092 03 0036 002	SIDE	VEMA REAL ESTATE 1 LLC 29651 JACQUELYN LIVONIA, MI	1870 SPICEWAY TROY, MI	195.22 195.22	195.22 0.00
0000000175 092 03 0018 000 092 03 0018 000	SIDE	MC LUCKIE ALEXANDER R 29662 JACQUELYN LIVONIA, MI	29662 JACQUELYN DR LIVONIA, MI	463.08 0.00	463.08 463.08
0000000176 092 03 0016 002 092 03 0016 002	SIDE	BOYNTON AARON/THERESA 29676 JACQUELYN LIVONIA, MI	29676 JACQUELYN DR LIVONIA, MI	373.88 373.88	373.88 0.00
0000000177 092 03 0039 002 092 03 0039 002	SIDE	OLESUK KELLY A 29733 JACQUELYN LIVONIA, MI	29733 JACQUELYN DR LIVONIA, MI	670.00 0.00	670.00 670.00
0000000178 092 03 0041 002 092 03 0041 002	SIDE	BOLOGNA ALFONSO 29747 JACQUELYN LIVONIA, MI	29747 JACQUELYN DR LIVONIA, MI	240.62 240.62	240.62 0.00
0000000179 089 02 0111 000 089 02 0111 000	SIDE	PART CAROLINE/MAZZIE 29445 LORI LIVONIA, MI	29445 LORI ST LIVONIA, MI	1,832.76 1,832.76	1,832.76 0.00
0000000180 092 03 0046 000 092 03 0046 000	SIDE	SROCK HEATHER K 29830 OAKVIEW LIVONIA, MI	29830 OAKVIEW LIVONIA, MI	635.60 635.60	635.60 0.00

Invoices # / Customer # / Parcel #	Srvc Code	Owner / Prop. Address	Mailing Address	Amt. Chg. / Pmts/Crdts	Amt. Billed / Amt. Due
0000000181 095 05 0064 000 095 05 0064 000	SIDE	VISNAW MARK / NICOLE H 14145 BRENTWOOD LIVONIA, MI	14145 BRENTWOOD LIVONIA, MI	217.92 0.00	217.92 217.92
0000000182 093 04 0074 000 093 04 0074 000	SIDE	MUSICK RACHEL / JEFFRE 27903 OAKLEY LIVONIA, MI	27903 OAKLEY LIVONIA, MI	432.00 0.00	432.00 432.00
0000000183 096 03 0012 000 096 03 0012 000	SIDE	PHILLIP J / CHRISTINE 14114 RIGA LIVONIA, MI	14114 RIGA ST LIVONIA, MI	691.20 691.20	691.20 0.00
0000000184 095 02 0043 000 095 02 0043 000	SIDE	PALMER JACLYN FAITH 14395 SUNBURY LIVONIA, MI	14395 SUNBURY LIVONIA, MI	849.08 849.08	849.08 0.00
0000000185 094 02 0086 000 094 02 0086 000	SIDE	KROME CHARLES/GALLI AN 14947 SUNBURY LIVONIA, MI	14947 SUNBURY ST LIVONIA, MI	481.24 0.00	481.24 481.24
0000000186 120 04 0023 000 120 04 0023 000	SIDE	SHEPLER EDWARD 37788 CHASE LIVONIA, MI	37788 CHASE CT LIVONIA, MI	966.32 0.00	966.32 966.32
0000000187 123 03 0141 000 123 03 0141 000	SIDE	GINTER GLADYS 9146 ADAMS LIVONIA, MI	9146 ADAMS LIVONIA, MI	1,779.84 1,779.84	1,779.84 0.00
0000000188 123 02 0078 000 123 02 0078 000	SIDE	GIDDINGS MELISSA 9194 E BASSETT LIVONIA, MI	9194 BASSETT LIVONIA, MI	227.00 227.00	227.00 0.00
0000000189 123 99 0015 000 123 99 0015 000	SIDE	WILLIAMS RUTH ANN 9295 HIX LIVONIA, MI	9295 HIX LIVONIA, MI	490.32 0.00	490.32 490.32
0000000190 124 03 0038 000 124 03 0038 000	SIDE	ANN SCHROEDER 9423 WESTWIND LIVONIA, MI	9423 WESTWIND DR LIVONIA, MI	3,249.53 3,249.53	3,249.53 0.00
0000000191 130 03 0087 000	SIDE	PERRY LAWRENCE M / MA 34981 WEST CHICAGO LIVONIA, MI	34981 WEST CHICAGO LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000192 139 02 0039 000 139 02 0039 000	SIDE	BLASZCZAK DAWN 30450 MINTON LIVONIA, MI	30450 MINTON ST LIVONIA, MI	198.72 198.72	198.72 0.00
0000000193 139 02 0033 000 139 02 0033 000	SIDE	VADEHRA RAJKUMAR 30475 MINTON LIVONIA, MI	30475 MINTON ST LIVONIA, MI	853.52 853.52	853.52 0.00
0000000194 139 02 0040 000 139 02 0040 000	SIDE	STUBBS SAGE / LAUREN C 30476 MINTON LIVONIA, MI	30476 MINTON LIVONIA, MI	354.12 354.12	354.12 0.00
0000000195 138 03 0090 000 138 03 0090 000	SIDE	SUBRAMANIAN MALLIKA 30849 ORANGELAWN LIVONIA, MI	30849 ORANGELAWN LIVONIA, MI	886.00 886.00	886.00 0.00
0000000196 138 03 0093 000 138 03 0093 000	SIDE	WILBERT DAVID R 30878 ORANGELAWN LIVONIA, MI	30878 ORANGELAWN ST LIVONIA, MI	648.00 0.00	648.00 648.00
0000000197 138 03 0081 000 138 03 0081 000	SIDE	FARRIS TIMOTHY CHARLES 30975 ORANGELAWN LIVONIA, MI	30975 ORANGELAWN ST LIVONIA, MI	227.00 227.00	227.00 0.00
0000000198 141 03 0039 000 141 03 0039 000	SIDE	DONALD SEPANSKI 28436 CLEVELAND LIVONIA, MI	28436 CLEVELAND ST LIVONIA, MI	250.56 250.56	250.56 0.00
0000000199 144 03 0089 000 144 03 0089 000	SIDE	THEISEN MICHAEL/COREEN 9048 GILLMAN LIVONIA, MI	9048 GILLMAN LIVONIA, MI	231.54 0.00	231.54 231.54
0000000200 014 04 0009 000	SIDE	FACCHINI WALTER/PAMELA 34677 NAVIN LIVONIA, MI	34677 NAVIN AVE LIVONIA, MI	(THIS INVOICE VOIDED!)	

Invoices # / Customer # / Parcel #	Srvc Code	Owner / Prop. Address	Mailing Address	Amt. Chg. / Pmts/Crdts	Amt. Billed / Amt. Due
0000000201 014 04 0010 000	SIDE	OLDFIELD MARGARET LAF 34705 NAVIN LIVONIA, MI	34705 NAVIN LIVONIA, MI	(THIS INVOICE VOIDED!)	
0000000202 002 02 0079 000 002 02 0079 000	SIDE	KORCH THOMAS J 20124 MAPLEWOOD LIVONIA, MI	20124 MAPLEWOOD LIVONIA, MI	440.64 440.64	440.64 0.00
0000000203 012 01 0133 000 012 01 0133 000	SIDE	CLIFTON MARY A 19358 HARDY LIVONIA, MI	19358 HARDY ST LIVONIA, MI	29.70 0.00	29.70 29.70
0000000204 025 03 0022 000 025 03 0022 000	SIDE	DUDEK MAGDALENA 18518 QUEENSBURY LIVONIA, MI	18518 QUEENSBURY LIVONIA, MI	1,447.88 1,447.88	1,447.88 0.00
0000000205 133 02 0471 000 133 02 0471 000	SIDE	BRENDER JOHN / CLAIRE 9909 BERWICK LIVONIA, MI	9909 BERWICK LIVONIA, MI	181.60 181.60	181.60 0.00
0000000206 137 01 0205 000 137 01 0205 000	SIDE	WARD JOSEPH / NANNETTE 9971 FREMONT LIVONIA, MI	9971 FREMONT LIVONIA, MI	864.00 0.00	864.00 864.00

Billing Items Summary		Item Amt.	Item Bal.
4"SW Totals	122 Billing Items	86,823.36	30,214.08
6"SW Totals	102 Billing Items	40,524.04	14,369.10
SAWCUT Totals	15 Billing Items	330.00	94.60
CITY Totals	101 Billing Items	0.00	0.00
8"SW Totals	16 Billing Items	23,658.80	7,001.50
R4-6"C Totals	2 Billing Items	105.60	105.60
H/O4" Totals	6 Billing Items	3,265.92	1,494.72
H/O6" Totals	5 Billing Items	1,743.36	608.36

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TOTALS	206 Invoices	156,451.08	0.00	156,451.08
		102,563.12		53,887.96

Samantha Stanton,
Dustin Stanton, +
Name Derek Bandy

Address 19909 St. Francis, 48152

Telephone (734) 796-0348

Treasurer's Office

Tax Parcel #001-04-0238-000

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

RECEIVED
MAY 24 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $3106.48. Installment amount $1035.49 + applicable interest (see box below)

Reason: The total is a bit too high for us to cover all at once. We've had to replace and/or repair multiple things in the home recently and weren't prepared for the additional cost of the sidewalk replacement.

Yours truly,

Samantha Stanton
Signed

5/23/2024
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name M. SERRICO

Address 20052 FLORAL

Telephone 734 649 5540

Treasurer's Office

Tax Parcel # 001-04-0398-000

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $656.64. Installment amount $218.88 + applicable interest (see box below)

Reason: Very Recent Unexpected CAR REPAIR!

Yours truly,

M Serrico
Signed

5-22-24
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name Justin Chan

Address 20425 Beatrice St.

Telephone 734-658-4076

Treasurer's Office

Tax Parcel #005-01-0097-002

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

RECEIVED
MAY 24 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $3183.24. Installment amount $1061.08 + applicable interest (see box below)

Reason: I wish I could pay this balance off in full, but I cannot afford to at this current time. If you'd allow me to be billed in the Labled Installments, that would be the best affordible route for me. Thank you.

Yours truly,

Signed

5/17/24
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name Christopher Brown

Address 20105 Farmington Rd.

Telephone 336-416-5691

Treasurer's Office

Tax Parcel #013-99-0016-002

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

COPY PROVIDED
MAY 30 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $1501.92. Installment amount $500.64 + applicable interest (see box below)

Reason: Original estimate for work was around $500 total. Per letter from Karen J. Worley, the estimator missed a tree beside sidewalk and increased bill by 200%. Our Family did not budget for this and would like to distribute the cost over time.

Yours truly,

Signed

5/30/2024
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name DINAH D. CABANAS

Address 19578 GARY LANE, LIVONIA, MI

Telephone (734) 353-7822 48152

Treasurer's Office

Tax Parcel #015-01-0093-000

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

RECEIVED
APR 10 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council

c/o City of Livonia Treasurer's Office

33000 Civic Center Drive

Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $719.24. Installment amount $239.75 + applicable interest (see box below)

Reason: Financial.

Yours truly,

Dinah D. Cabanas
Signed

04/08/2024
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name CONSTANCE DICKEY

Address 33451 RAYBURN

Telephone (734) 421-0459

Treasurer's Office

Tax Parcel # 064-01-0303-000

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

RECEIVED
MAY 21 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $1395.76. Installment amount $465.25 + applicable interest (see box below)

Reason: RECENTLY SUFFERED A STROKE AND HAVE MEDICAL BILLS AND ONGOING COSTS.

Yours truly,

Signed

5/9/24
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name Rebecca Borring
Address 37659 Ladywood
Telephone 248-342-8750

Treasurer's Office
Tax Parcel # 072-02-0088-000
SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

RECEIVED
APR 11 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $1589.76. Installment amount $529.92 + applicable interest (see box below)

Reason: My husband's job was cut back to part time. While he looks for alternative work, this would help.
Can you also confirm quantity replaced. 4 were city replaced due to pitch error in orginal replacement.

Yours truly,

Rebecca Borring
Signed

4-7-24
Date

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Name Stacy Joner
Address 15073 Inkster Rd
Telephone 313-510-5864

Treasurer's Office

Tax Parcel # 093-01-0190-000

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

COPY PROVIDED
MAY 31 2024
TREASURER'S OFFICE
CITY OF LIVONIA

Honorable Members of the Council
c/o City of Livonia Treasurer's Office
33000 Civic Center Drive
Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $904.74. Installment amount $301.58 + applicable interest (see box below)

Reason: I am requesting the amount be billed in 4 installments in my winter tax. I am requesting smaller payments due to losing my job in Nov. 2023. And not being employed for 2mths. I have struggled financially to regain the income lost over those 2mths.

Yours truly,

Signed Stacy Joner

Date 5/30/2024

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.

Ret. FF/Sgt.

Name David R. Wilbert M.A.

Address 30878 Orangelawn St.

Telephone 734-634-7607 Livonia, MI 48150

Treasurer's Office

Tax Parcel #138-03-0093-000

SAD District # 915

APPLICATION FOR INSTALLMENT PAYMENTS

ON SIDEWALK ASSESSMENT

This application must be received by the Treasurer's Office no later than May 31st, 2024.

Any requests received after this date **WILL NOT** be approved.

RECEIVED
APR 10 2024
TREASURER'S OFFICE
CITY OF LIVONIA

~~Honorable Members of the Council~~

c/o City of Livonia Treasurer's Office

33000 Civic Center Drive

Livonia, MI 48154

Dear Council Members:

I would like to request my sidewalk assessment be billed in three installments, transferred to my winter tax bill beginning with 2024 and the next two consecutive winter tax bills.

Amount $648.00. Installment amount $216.00 + applicable interest (see box below)

Reason: I am a Firefighter/Sergeant Retired from Westland, and a resident of Livonia for near 80% of my life! I am on a FIXED income and can't afford that sidewalk payment in full by May, 2024. I request respectfully to be allowed the payment plan as presented above! Thank you! God Bless!

Yours truly,

David R. Wilbert M.A.

Signed

4-8-24

Date

(+) please Bill my (winter taxes) in 3 yearly installments! as stated above!

City Council may authorize these installments. The current policy is to approve installments over a 3 year period plus an annual rate of interest to be determined by Council. Installments can be requested by letter or appearing at the meeting. If the above policy is still a hardship, a homeowner may request a longer installment period and it is recommended that they appear in person at the meeting to explain their circumstances.