

LORRAINE DRAIN
INTRA-COUNTY DRAINAGE BOARD
NOVEMBER 14, 2022
10:30 A.M.
AGENDA

**NOTE: THIS MEETING WILL BE HELD IN PERSON WITH TELECONFERENCE
OPTION FOR PUBLIC**

**Call in Number: 1-307-314-3902
Access Code: 199 831 865**

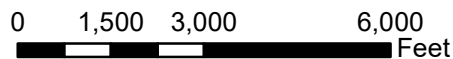
| | Page |
|--|------|
| 1. Call of meeting to order and roll call | |
| 2. Approval of Agenda for November 14, 2022 | |
| 3. Approval of Minutes for November 9, 2020 | 3 |
| 4. Public Participation | |
| 5. Lorraine Storm Drain Repair – Stephen Downing | 5 |
| Motion: To approve Robert Clancy Contracting, Inc. for the repairs and inspection for the total amount of \$25,405.00. | |
| 6. Consideration for approval of invoice (see attached) | 17 |
| 7. Financial Report – Bruce Manning | 18 |
| 8. Adjourn | |

LORRAINE STORM - ENCLOSED

CENTERLINE / WARREN - CHAPTER 20





Office of
Public Works



Drain Length (Feet/Miles):
22,710.79 / 4.301

Legend

-  Open Channel
-  Enclosed Gravity

An adjourned meeting of the Intra-County Drainage Board for the **LORRAINE DRAIN** was held via telephone conference per State Public Act 228 of 2020 due to the COVID-19 pandemic, on November 9, 2020, at 11:09 A.M.

PRESENT: Candice S. Miller, Chair
Bryan Santo, Member

ABSENT: Marv Sauger, Member

ALSO PRESENT: Robert Mijac, Macomb County Board of Commissioners; Brian Baker, Chief Deputy, Karen Czernel, Deputy, Stephen Downing, Construction & Maintenance Manager, Bruce Manning, Financial Manager, Tom Stockel, Construction Engineer, Jeff Bednar P.E., Environmental Resources Manager, Vince Astorino, Operations & Flow Manager, Kellie Kource, Drain Account Specialist, Macomb County Public Works

The meeting was called to order by the Chair, Candice S. Miller. A motion was made by Mr. Santo, supported by Ms. Miller to approve the agenda as presented.

Adopted: YEAS: 2
NAYS: 0

Minutes of the meeting of September 14, 2020 were presented. A motion was made by Mr. Santo, supported by Ms. Miller to approve the minutes as presented.

Adopted: YEAS: 2
NAYS: 0

The meeting was opened to public participation, then closed, there being no comments from the public.

Mr. Stockel updated the board that there was a sinkhole on a storm pipe under a resident's pool. We eliminated the tap that went into the drain, and moved the structure. We also added a structure to the north and re-tapped into the drain. The work is complete.

A motion was made by Mr. Santo, supported by Ms. Miller to receive and file the project update by Mr. Stockel.

Adopted: YEAS: 2
NAYS: 0

The Chair presented the invoice totaling \$37,640.00 to the board for review and approval.

A motion was made by Mr. Santo, supported by Ms. Miller to approve the invoice as presented.

Adopted: YEAS: 2
NAYS: 0

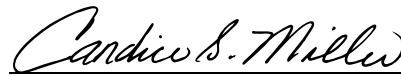
A motion to receive and file the financial report given by Mr. Manning was made by Mr. Santo and supported by Ms. Miller.

Adopted: YEAS: 2
NAYS: 0

There being no further business, it was moved by Mr. Santo, supported by Ms. Miller, that the meeting of the Lorraine Drain Board be adjourned.

Adopted: YEAS: 2
NAYS: 0

The meeting was adjourned at 11:14 a.m.



Candice S. Miller, Chair
Macomb County Public Works Commissioner

STATE OF MICHIGAN
COUNTY OF MACOMB

I certify that the foregoing is a true and correct copy of proceedings taking by the Intra-County Drainage Board for the Drainage District shown on the attached set of minutes, on November 9, 2020 the original of which is on file in the Public Works Commissioner's Office. Public notice of the meeting was given pursuant to Act No. 267, Public Acts of Michigan, 1975, including, in the case of a special or rescheduled meeting or a meeting secured for more than 36 hours, notice by posting at least 18 hours prior to the time set for the meeting.



Candice S. Miller, Chair
Macomb County Public Works Commissioner

DATED: 11/9/20



Candice S. Miller

Public Works Commissioner
Macomb County

To: Lorraine Storm Drain Drainage District Board Members

From: Stephen Downing, Construction & Maintenance Manager

Date: October 24, 2022

Subject: Lorraine Storm Drain Repair

The Macomb County Public Works Office (MCPWO) engineering staff were made aware of a potential collapsed portion of the Lorraine Storm Drain in the City of Warren. A site investigation revealed that a section of the 12" CMP that taps into the main Lorraine Storm Drain on Lorraine Ave. south of 11 Mile Road had failed. This failure resulted in stormwater flooding the nearby streets during rain events.

Based on review of the historical as-built drawings the repair would consist of excavation to remove the failed CMP and replace with reinforced concrete pipe (RCP). The approximate length of the failed section from the manhole structure to the main line of the drain is 20 linear-feet. A map of the location has been attached for reference.

The MCPWO solicited quotations from three contractors to perform the necessary repairs. The table below summarizes the quotations:

| Contractor | Cost |
|---------------------------------------|-------------|
| Robert Clancy Contracting, Inc. | \$16,325.00 |
| L.J. Construction, Inc. | \$31,950.00 |
| Cortis Brothers Trucking & Excavating | \$28,650.00 |

The Lorraine Storm Drain currently has \$9,346 of funds available. The MCPWO coordinated with the City of Warren to contribute toward the repair which they agreed to contribute half of the low bid (\$16,325) in the amount of \$8,162.50. The MCPWO elected to offset the remaining cost with existing drain grant funds. The work was awarded to the low bidder Robert Clancy Contracting, Inc.

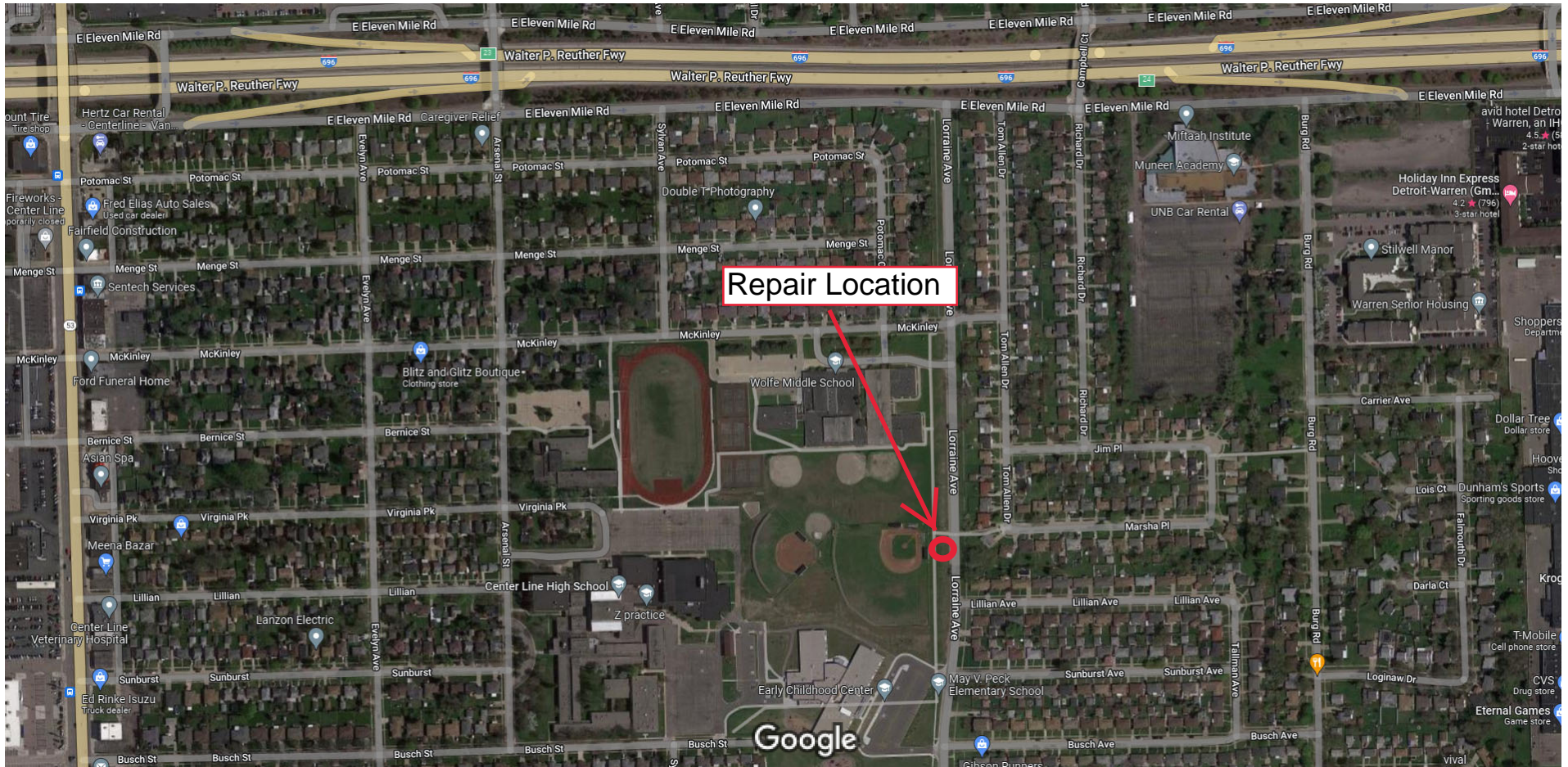
During the initial excavation for this work it was determined that the Lorraine Storm Drain was deeper than shown on the as-built-drawings. This required coordination in the field during the repair which resulted in additional cost due to the change condition encountered. The modified repair required construction of a drop structure with 30-inch RCP and a larger diameter core into the main line of the drain. The Contractor reduced their base bid from \$16,325 to \$15,000 as a result of using less linear feet of the 12-inch RCP. The cost increase related to the change condition

resulted in an increase of \$8,405. The total final cost for the repair is \$23,405 in addition to a \$2000 emergency inspection fee. The MCPWO elected to offset the additional cost through the use of drain grant funds. The table below summarizes the cost allocation for the total final repair and inspection cost:

| Funding Source | Allocation |
|-----------------------|-------------------|
| Lorraine Storm Drain | \$9,346.00 |
| City of Warren | \$8,162.50 |
| MCPWO Administration | \$7,896.50 |
| Total | \$25,405.00 |

The recommendation is that the Lorraine Storm Drain Drainage District Board authorize the MCPWO to pay Robert Clancy Contracting, Inc. for the repairs and inspection for the total amount of \$25,405.00.

Attachments: Location Map
Robert Clancy Contracting Invoice
Repair Photographs



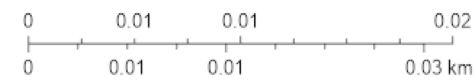
Imagery ©2022 Maxar Technologies, Sanborn, U.S. Geological Survey, USDA/FPAC/GEO, Map data ©2022 200 ft

SAW_Drains_Viewer_Map-Copy



7, 2022

1:564



Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENTAL, NRCAN, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, (Thailand), NGCC, (c) OpenStreetMap contributors, and the User Community



Invoice

ROBERT CLANCY CONTRACTING, INC.

Date **Invoice #**
 8/29/2022 10506

Bill To

Macomb County Public Works
 21777 Dunham Rd.
 Clinton Twp., MI. 48036

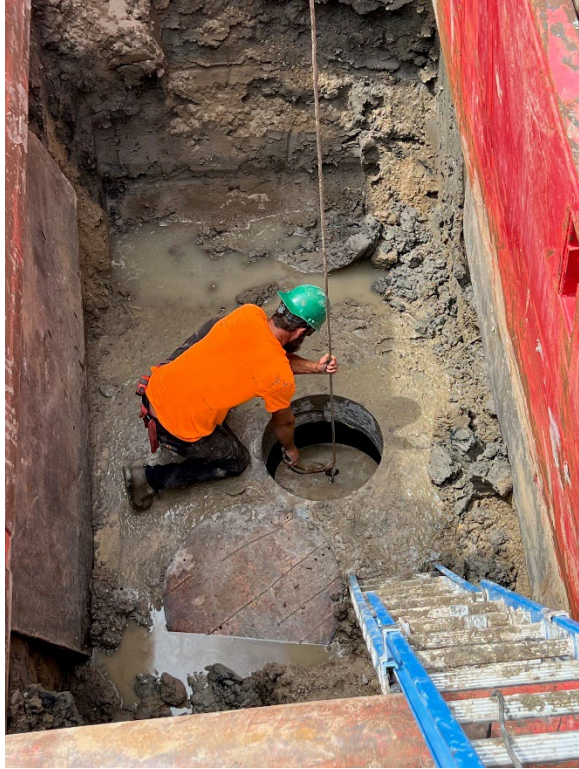
| <u>Terms</u> | <u>Due Date</u> | <u>Project</u> |
|----------------|-----------------|----------------------------|
| Due on receipt | 8/29/2022 | 8640 McKinley Lorain Drain |

| <u>Description</u> | <u>Qty.</u> | <u>U of M</u> | <u>Rate</u> | <u>Amount</u> |
|--|-------------|---------------|-------------|---------------|
| Job: Loraine Drain 8640 McKinley, Warren | | | | |
| August 15 - 16, 2022 Monday - Tuesday Demolish old storm sewer and replace with new storm sewer (as per proposal # 22079, dtd 6-30-2022, revised by RCC) | | | | |
| 1.) Mobilization 2.) Mobilize sheeting/shoring and trench box 3.) Provide and install traffic control 4.) Locate and demo existing 12" CMP 5.) Provide and install 12" RCP 6.) Core existing manhole and main drain 7.) Provide and install 21AA aggregate to spring line 8.) Provide and install concrete collars 9.) Tuck point inside of existing storm manhole 10.) Load and haul spoils off site 11.) Restore impacted area | 1 | LS | 15,000.00 | 15,000.00 |
| Additional Work: | | | | |
| 1.) Provide and install 30" RCP | 8 | LF | 125.00 | 1,000.00 |
| 2.) Provide steel plate and concrete at base of the 30" RCP | 1 | LS | 2,500.00 | 2,500.00 |
| 3.) Provide 21AA crushed concrete backfill | 30 | TON | 20.00 | 600.00 |
| 4.) Cat 315 Excavator & Operator | 8 | HRS | 210.00 | 1,680.00 |
| 5.) Cat 420D Backhoe & Operator | 3 | HRS | 150.00 | 450.00 |
| 6.) Laborer (3 @ 8 hrs/ea) | 24 | HRS | 75.00 | 1,800.00 |
| 7.) Load and haul spoils off site | 25 | CY | 15.00 | 375.00 |

Total \$23,405.00













Candice S. Miller

Public Works Commissioner
Macomb County

October 7, 2022

Warren Mayor James Fouts and Warren City Council

One City Square

Warren, MI 48093

Dear Mayor Fouts and City Council members,

I want to make you aware of several projects that the Macomb County Public Works Office has been working on in Warren. These activities are important in order to maintain and protect our underground infrastructure.

1. **Lorraine Drain sinkhole.** A 20-foot-long section of rotted metal pipe that provides drainage for part of a neighborhood was replaced after a sinkhole was discovered on the west side of Lorraine Avenue, south of 11 Mile Road. The newly installed tap to the Lorraine Drain is entirely concrete and will also alleviate occasional flooding at that location. Thank you to Mayor Fouts to bringing this sinkhole to our office's attention. We were happy to get construction completed before students who walk to nearby Wolfe Middle School headed back to classes. The cost of the sinkhole repair project was initially expected to be \$16,325. A reduction in the contractor's base bid was reduced to \$15,000. However, additional work including construction of a drop structure with larger reinforced concrete pipe, a larger concrete collar and additional manpower hours brought the final price to \$23,405. Per the original agreement, Warren will only pay \$8,162 with drain funds paying the remaining amount.
2. **Bear Creek Drain sinkhole.** After a sinkhole was discovered next to the curb lane of westbound 10 Mile Road near Mound Road, we inspected the underground pipe. That is an enclosed stretch of the Bear Creek Drain, just east of its connection with the Kutchev Drain. Inspectors discovered that the bottom of a 30-foot-long portion of the elliptical, corrugated metal pipe installed in the early 1960's had rotted. Storm water gets through those openings and can cause the dirt underneath to be washed away and the fill dirt above to sink. Meantime, the sinkhole grew wider. The contractor installed temporary internal bracing inside the pipe and a concrete mix was used to fill the sinkhole. A spray lining will be used to complete the drain rehabilitation and protect the pipe from further degradation and infiltration in that location for decades. We continue to proceed expeditiously and hope the contractor will begin mobilizing at the site next week, weather permitting. We

have approved pipe rehab/spray lining costs not to exceed \$196,873 and have sufficient funds in the Bear Creek Drain account to cover the cost of this project without any allocation requested of the city.

3. **Northampton Pump Station.** This pump station, which was constructed in 1984, is located at the southeast corner of 14 Mile and Chicago roads. Its purpose is to ensure effective conveyance of storm water for homes in the area around Northampton Drive. It is used infrequently. However, our office inspected the pump station and determined it needs to be updated and upgraded. We hope to have all electricity components replaced by the end of the year. The electrical upgrades will be connected to our Supervisory Control and Data Acquisition system so that we can monitor the pump station remotely. Phase 2 involves the rehabilitation of both pumps, one at a time. The rehab of each pump will take approximately 15 weeks. The entire cost of this two-phase project will be approximately \$150,000 and will be funded by the City of Warren. We appreciate the city's allocation to cover the costs.

I have attached some pictures to help you visualize these sites.

My office's mantra is "Water quality equals quality of life", and is the foundation for everything we do. Failure to invest in and maintain underground infrastructure including the network of underground pipes and pump stations and also our open channel drains, is vital to ensuring effective storm water management and sanitary sewage conveyance, and preventing costly infrastructure collapses like the 2016 sinkhole on 15 Mile Road in Fraser.

I look forward to continuing cooperation and partnership with the City of Warren, its elected officials and the administrative team whenever possible in order to best serve your community and protect the environment for current and future generations. If you have any questions, feel free to contact me.

Sincerely,



Candice S. Miller
Macomb County Public Works Commissioner

CC: County Commissioners Mia Xiong, Michelle Nard

| <u>Funding Source</u> | <u>Apportionment</u> | <u>Manager</u> | <u>Vendor</u> | <u>Amount</u> | <u>Invoice Detail</u> | <u>Project Summary</u> | <u>Project Balance</u> |
|-----------------------|----------------------|----------------|---------------------------|---------------|---------------------------|--|------------------------|
| Lorraine Drain | Chapter 20 Warren | Downing | Robert Clancy Contracting | \$ 2,000.00 | Invoice #9655 - 8.23.21 | Drain Integrity Inspection Emergency CMP Tap Repair | |
| | | Downing | Robert Clancy Contracting | \$ 23,405.00 | Invoice #10506 - 08.29.22 | | |
| | | Total | | \$ 25,405.00 | | | |

YTD Trial Balance

Lorraine Storm

As of Fiscal Period: Oct 1, 2022-Oct 31, 2022

| | O&M Balance 9/30/2022 | O&M | Total 10/31/2022 |
|----------------------------|--------------------------------------|----------------|-----------------------------|
| Cash - Operating | 0 | 0 | 0 |
| Accounts Receivable | | | 0 |
| Assets | | | 0 |
| Liabilities | | | 0 |
| Revenues | | | 0 |
| Expenditures | | | 0 |
| Equity | 0 | | 0 |