

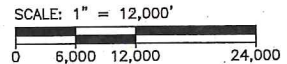
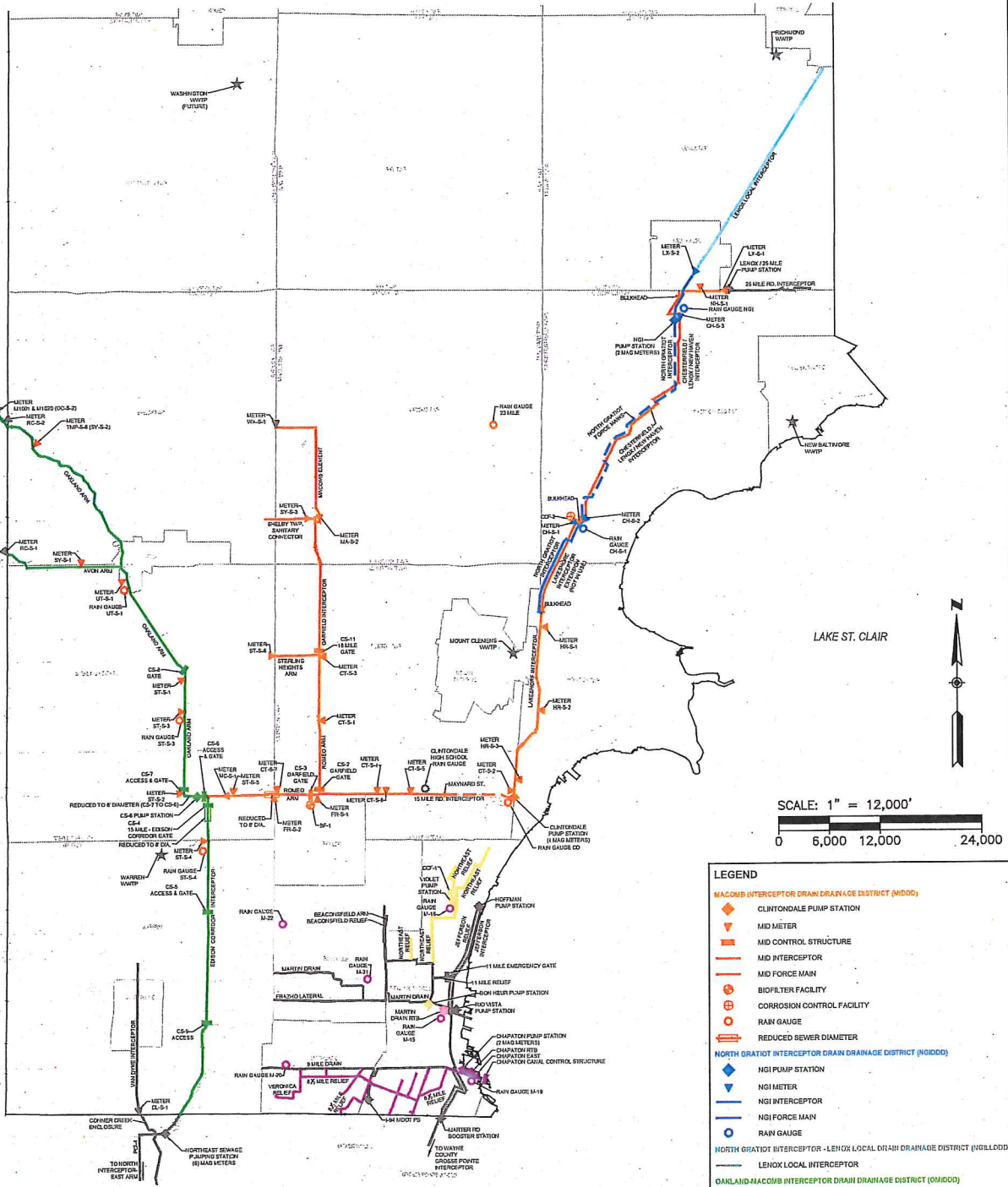
MARTIN SANITARY DIVERSION DRAIN
INTRA-COUNTY DRAINAGE BOARD
JULY 13, 2020
10:15 A.M.
AGENDA

NOTE: THIS MEETING WILL BE HELD BY TELECONFERENCE

Call in Number: 1-408-418-9388
Access Code: 129 599 9683

	Page
1. Call of meeting to order and roll call	
2. Approval of Agenda for July 13, 2020	
3. Approval of Minutes for June 8, 2020	3
4. Public Participation	
5. Project Update – Vince Astorino	
6. Chapaton and Martin RTB Disinfection System Pump Purchase Recommendation - Vince Astorino	5
<p>Motion: To approve the quotation from Watson Marlow, Inc. for the fabrication and delivery of the hose pumps for the Chapaton & Martin Retention Treatment Basin Disinfection Improvement Project for a Lump Sum cost of \$111,182.00 (Martin share \$31,766).</p>	
7. Consideration for approval of invoices (see attached)	10
8. Financial Report – Bruce Manning	11
9. Adjourn	

MACOMB COUNTY WASTEWATER SYSTEMS



- LEGEND**
- MACOMB INTERCEPTOR DRAIN DRAINAGE DISTRICT (MIDD)**
 - ◆ CLINTONDALE PUMP STATION
 - ▼ MID METER
 - ▬ MID CONTROL STRUCTURE
 - ▬ MID INTERCEPTOR
 - ▬ MID FORCE MAIN
 - ⊕ BIOFILTER FACILITY
 - ⊕ CORROSION CONTROL FACILITY
 - RAIN GAUGE
 - ▬ REDUCED SEWER DIAMETER
 - NORTH GRATIOT INTERCEPTOR DRAIN DRAINAGE DISTRICT (NGIDD)**
 - ◆ NGI PUMP STATION
 - ▼ NGI METER
 - ▬ NGI INTERCEPTOR
 - ▬ NGI FORCE MAIN
 - RAIN GAUGE
 - NORTH GRATIOT INTERCEPTOR - LENOX LOCAL DRAINAGE DISTRICT (NGLLDD)**
 - ▬ LENOX LOCAL INTERCEPTOR
 - OAKLAND-MACOMB INTERCEPTOR DRAIN DRAINAGE DISTRICT (OMIDD)**
 - ◆ CS-6 PUMP STATION
 - ▼ OMD METER
 - ▬ OMD CONTROL STRUCTURE
 - ▬ OMD INTERCEPTOR
 - ▬ REDUCED SEWER DIAMETER
 - 5 1/2 MILE RELIEF DRAIN DRAINAGE DISTRICT**
 - ◆ CHAPATON WEST PUMP STATION
 - ◆ CHAPATON RETENTION TREATMENT BASIN
 - ▬ CHAPATON CANAL CONTROL GATE
 - ▬ 5 1/2 MILE INTERCEPTOR
 - RAIN GAUGE
 - SEACWOS PUMP STATION**
 - ◆ SEACWOS PUMP STATION
 - ⊕ CORROSION CONTROL FACILITY
 - ▬ SEACWOS INTERCEPTOR
 - MARTIN SANITARY DIVERSION DRAINAGE DISTRICT (MSDD)**
 - ◆ MARTIN DRAIN RETENTION TREATMENT BASIN
 - OTHER SYSTEMS**
 - ◆ PUMP STATION
 - ▼ METER
 - ★ WWTP
 - ▬ INTERCEPTOR

Candice S. Miller
MACOMB COUNTY PUBLIC WORKS COMMISSIONER



UPDATED: APRIL 2017

An adjourned meeting of the Intra-County Drainage Board for the **MARTIN SANITARY DIVERSION DRAIN** was held via telephone conference per the State of Michigan Executive Order due to the COVID-19 pandemic, on June 8, 2020, at 10:28 A.M.

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

ALSO PRESENT: Marvin Sauger, Robert Mijac, Jim Carabelli, Macomb County Board of Commissioners; Brian Baker, Chief 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; Monique Owens, Mayor of Eastpointe; Fritz Klingler, Zack Carr, FK Engineering

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

Adopted: YEAS: 3
NAYS: 0

Minutes of the meeting of May 11, 2020 were presented. A motion was made by Mr. Santo, supported by Mr. Haugh to approve the minutes as presented.

Adopted: YEAS: 3
NAYS: 0

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

The Chair presented the invoices totaling \$7,496.73 to the board for review and approval.

A motion was made by Mr. Haugh, supported by Mr. Santo to approve the invoices as presented.

Adopted: YEAS: 3
NAYS: 0

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

Adopted: YEAS: 3
NAYS: 0

There being no further business, it was moved by Mr. Haugh, supported by Mr. Santo that the meeting of the Martin Sanitary Diversion Drain Board be adjourned.

Adopted: YEAS: 3
NAYS: 0

The meeting was adjourned at 10:31 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 June 8, 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: 6/8/20



Candice S. Miller
Public Works Commissioner
Macomb County

To: 8 ½ Mile Relief Drain Drainage District Board Members
Martin Sanitary Diversion Drainage District Board Members

CC: File

From: Vincent Astorino, Operations & Flow Manager

Date: July 8, 2020

Subject: Chapaton and Martin RTB Disinfection Improvements – Pump Purchase Recommendation

In January 2020, the Macomb County Public Works Office (MCPWO) contracted with Wade Trim Associates, Inc. to prepare plans and specifications for the replacement of the disinfection systems at the Chapaton and Martin RTBs. These systems were installed in approximately 1978 and have exceeded the end of their useful life. A 2018 study of these existing disinfection systems, also prepared by Wade Trim, confirmed that they should be entirely replaced. For the 2019-2020 budgets, 8.5 Mile approved \$1,000,000 and Martin approved \$200,000 for this replacement

Although scheduled to be replaced as part of this project, the existing Pulsafeeder diaphragm pumps at both RTBs are of increasing concern of the operations staff. The pumps are expensive to repair and have lately been inoperable for longer periods of time during these repairs. In an effort to expedite the implementation of the new disinfection system, MCPWO staff is recommending that the new disinfection pumps be purchased ahead of the public bid. The lead-time on the pumps is approximately 5-6 weeks so by purchasing separately the goal is to have the pumps on-site by the time the contractor is ready to begin work. The current schedule is to go out to bid for this work by the end of July and then bring the recommendation for the selected contractor by the August/September board meeting.

The 2018 study recommended the installation of peristaltic pumps, commonly referred to as hose pumps, for sodium hypochlorite application. Since receiving this recommendation, MCPWO staff has toured the Dearborn Heights CSO facility to view their disinfection system which consists of Bredel hose pumps manufactured by Watson Marlow. At this visit it was noted that several regional CSO/RTB facilities use and have had success with Bredel pumps. Following that visit, a demo Bredel hose pump was temporarily installed in the Chapaton East Building for staff to try out. MCPWO is sufficiently comfortable with the Bredel pump specified in the Wade Trim plans. Since all prospective contractors would be quoting and installing the same pumps there is no added cost to the project by removing them from the public bid package. In fact, there is likely a cost savings since there will be no chance for contractor mark-up associated with the pump procurement.

The quote received from Watson Marlow, Inc. for seven (7) new Bredel hose pumps, associated equipment, and shipping is **\$111,182.00**. Since all seven pumps are identical, the costs can be split proportionally between Chapaton (five pumps) and Martin (two pumps). The cost breakdown is as follows:

- Task 1 - Chapaton = \$79,416
- Task 2 - Martin = \$31,766

Upon approval from the 8 ½ and Martin Boards, MCPWO staff will then proceed with executing a purchase order with Watson Marlow. Their proposal has been attached for reference.

Recommended Motion: To approve the quotation from Watson Marlow, Inc. for the fabrication and delivery of the hose pumps for the Chapaton & Martin Retention Treatment Basin Disinfection Improvement Project for a Lump Sum cost of \$111,182.00.

Attachments: Watson Marlow quote dated 07/01/20

Scope of Supply



Fluid Technology Group

Watson-Marlow, Inc.
37 Upton Technology Park
Wilmington, MA 01887
Tel: 800-282-8823

info@wmftg.com
wmftg.com

July 1, 2020

To: All Bidding Contractors
Subject: Watson Marlow Inc.—Scope of Supply
Quote #: WMB153903R1
Project: Macomb County Wastewater Disposal District
Location: Macomb County, MI
Engineer: Wade Trim
Bid Due: TBD

Specification Sections Included:

Section 22 14 30 - Chemical Systems - Chemical Metering Pump System

Equipment Included:

**Quantity (7) Bredel 32 Peristaltic Hose Pump Assembly
Sodium Hypochlorite**

- Nominal Displacement: 0.165 Gallons/Rev
- Fully Supported Cast Iron Rotor Assembly with Twin Sliding Aluminum Shoes
- High Strength Twin Bearing Hub
- Cast Iron Bolted Cover with Sight Window
- Pump Supports: Galvanized Steel
- Pump Hardware and Hose clamps: Galvanized Steel
- 1.5" 150# ANSI Flanges & Flange Brackets for Suction & Discharge: Galvanized Steel
- 32mm Machined Hose with inner layer in EPDM
- PVC Wetted Hose Inserts
- Bredel Genuine Hose Lubricant
- Buffer Zone Seals Lubricant Inside Pumphead to Protect Gearing
- 2-Stage Flanged Helical In-Line Gearing, 61 RPM Output Speed @ 1750 RPM Input, NEMA 56C Input Flange, Bredel Red Epoxy Paint
- Baldor 2 HP Premium Efficient Motor, Inverter Capable 20:1 CT Turndown, 1750 RPM, 230/460 VAC – 3Ø – 60 Hz, 56C Frame, TEFC, Bredel Red Epoxy Paint
- Pump Position: 1 (Ports Left), 2 (Ports Right [**Standard**]); *Verify Prior to Ordering*
- High Level Switch

Price Each (Includes Freight).....\$12,433

Price Total (Includes Freight).....\$87,026

Scope of Supply



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Ancillary & Spare Equipment:

Quantity (7) Revolution Counter & Nema-4X Display.....	\$1,455 ea
Quantity (7) 1.5" Onyx Ring-Style Pressure Switch w/Gauge.....	\$1,775 ea
Quantity (2) SPARE 32mm Machined Hose – EPDM.....	\$575 ea
Quantity (1) SPARE 5-Gal Can of Hose Lubricant.....	\$396 ea

Total Price w/Freight:.....\$111,182

Total Start-Up Service & Training: To be Provided by Mattoon & Lee

Watson-Marlow is the Engineer's approved manufacturer of this pumping equipment. All above equipment is in accordance with the specification referenced with the following notes considered:

General: Watson-Marlow is an equipment supplier, not a contractor and assumes no roles of the contractor.

Quote based on verbal request in lieu of engineer's written specifications.

This proposal includes only equipment mentioned herein and does not include, nor infers inclusion of, any additional equipment, piping, valves, anchor bolts (or its design), wiring, factory performance testing, field seismic or vibration testing, hydrostatic testing, services, videotaping, etc. regardless of its relation to the quoted equipment. The specifications listed above are the only specifications which shall apply to this proposal either directly or by reference. Any additional specifications, with equipment or requirements specified therein, that are not specifically included as part of this proposal are excluded from this offering. Watson-Marlow offers this proposal as an Equipment Supplier exclusively, not as a Contractor or Sub-Contractor.

Pricing does not include any applicable taxes.

Watson-Marlow will prepare the required submittals for equipment specifically listed under this scope letter. Typical shop drawings will be available for shipment 2-3 weeks after receipt of written Purchase Order. Watson-Marlow will not finalize procurement or shipment of equipment until full written approval of the shop drawings/submittals has been received.

Watson-Marlow offers field service strictly in accordance with the number of trips and onsite 8-hour man-days offered in this proposal. Watson-Marlow cannot commit to availability of a service technician without two (2) weeks advanced notice in writing of required on site dates.

Above equipment is offered within the terms and conditions set forth by Watson-Marlow. Terms and conditions are available at: <https://www.watson-marlow.com/us-en/support/terms/>

These terms and conditions will apply to any purchase order resulting from this proposal unless alternate terms and conditions are specifically negotiated in writing and are signed/accepted by Watson-Marlow at the time of purchase. In no event will consequential and/or liquidated damages be accepted by Watson-Marlow.

Scope of Supply



Fluid Technology Group

Watson-Marlow, Inc.
37 Upton Technology Park
Wilmington, MA 01887
Tel: 800-282-8823

info@wmftg.com
wmftg.com

To facilitate speedy order processing, please list purchaser contact, telephone, and fax number and reference this quotation number. If you are a first time customer of Watson-Marlow, Inc. please provide with your order a copy of your trade references and, if tax exempt, please provide a resale or tax exemption certificate. Purchase order should be sent to the attention of the Contract Administrator, and payment remitted to:

Watson-Marlow, Inc.
P.O. Box 536285
Pittsburgh, PA 15253-5904

Quote Validity: 30 Days from date of issue

Shipment after receipt of written approval of submittals and release for shipment:

WM Equipment: 5-6 Weeks

Sincerely,
Chris Miller
Chris Miller, Central District Sales Manager

Prepared by: JB- Application Engineer

Funding Source	Apportionment	Manager	Vendor	Amount	Invoice Detail	Project Summary	Project Balance	
Martin Sanitary Diversion Drain	Chapter 20 Roseville - 78.09% St. Clair Shores - 21.91%	Manning	County of Macomb	\$ 43,144.76	Invoice #AR200303 - 4.27.20	Personnel/Operating 1st Quarter		
		Astorino	Cummins Bridgeway	\$ 808.75	Invoice #56-46833 - 6.1.20	Full PM Service - Generator		
		Astorino	Cummins Bridgeway	\$ 634.68	Invoice #56-46834 - 6.1.20	2 Hour Load Bank Test - Generator		
		Astorino	Cummins Bridgeway	\$ 1,469.40	Invoice #S6-43798 - 4.7.20	Preventative Maintenance Parts - Generator		
		Astorino	Fishbeck	\$ 4,320.00	Invoice #392746 - 6.22.20	As-needed Engineering Services through 6.12.20	\$ 36,241.95	
		Manning	Macomb County Treasurer	\$ 1,400.00	Invoice #6-2020 - 3.31.20	Accounting Services		
		Astorino	Wade Trim	\$ 2,255.00	Invoice #2018185 - 6.1.20	Martin RTB Disinfection Improvements	\$ 22,043.75	
		Astorino	Wade Trim	\$ 4,555.00	Invoice #2018400 - 7.2.20	Disinfection Improvements		
		Total			\$ 58,587.59			

YTD Budget

Fund: Martin Sanitary Diversion

As of Fiscal Period: Oct 1, 2019-June 30, 2020

DESCRIPTION	2020 FINAL BUDGET	ENCUMBERED	ACTUAL	REMAINING BUDGET	PCT UTILIZED
REVENUE ACCOUNTS					
State-Grants	-			-	100.0%
Investment Inc-Interest	5,000		3,104	1,896	62.1%
Reimb-Local Communities	838,682		838,682	-	100.0%
PY Revenue-Fund Balance	286,915			286,915	0.0%
<i>Total Revenue Accounts</i>	1,130,597	-	841,786	288,811	74.5%
EXPENSE ACCOUNTS					
Application/Permit Fee	3,000		6,000	(3,000)	200.0%
Dues, Training, Conf, Subs.	3,150			3,150	0.0%
Engineering					
-As Needed Engineering	15,000		4,708	10,292	31.4%
- Disinfection System Replacement	200,000		27,406	172,594	13.7%
-CCTV of Dewatering Line and Influent and Effluent Boxes	25,000		246	24,754	1.0%
-Design Flushing System Upgrades & First Flush Capture	375,000			375,000	0.0%
-Replace Drain Gate Hydraulic Accumulator*	-		1,329	(1,329)	0.0%
-Design Basin Equipment Hatch	12,000		2,050	9,950	17.1%
New Equipment	12,900			12,900	0.0%
Operating Supplies	55,900		17,830	38,071	31.9%
Other Professional Svcs	18,000		4,067	13,933	22.6%
Personnel Services	188,558		86,367	102,191	45.8%
Repair & Maintenance	138,740		65,617	73,123	47.3%
Scada System	24,894		13,548	11,346	54.4%
Utilities	43,150		10,851	32,299	25.1%
Capital Reserve	15,305		15,305	-	100.0%
<i>Total Expense Accounts</i>	1,130,597	-	255,323	875,274	22.6%

	O&M Balance 9/30/2019	O&M	Total 6/30/2020
Cash - Operating	687,459	586,463	1,273,922
Accounts Receivable			0
Assets			0
Liabilities			0
Revenues		841,786	841,786
Expenditures		255,323	255,323
Equity	687,459		1,273,922

Detail of 2019 Equity

Design Basin Equipment Hatch	12,000
Sampling Pumps	7,500
Replace Drain Gate Hydraulic Accumulator*	50,000
Design Flushing System Upgrades & First Flush Capture	200,000
SCADA Reserves	11,610
Capital Reserves	406,349

* Project was projected to be completed during 18/19 budget cycle. However it was not completed, so funds designated in 18/19 for this project will be used in 19/20