

AGENDA

Red Run Intercounty Drain Drainage Board Macomb and Oakland Counties

December 16, 2020 – 10 a.m.
Virtual/Teleconference Meeting

1. Call meeting to order

Board Members:

Michael Gregg, Chair, Michigan Department of Agriculture and Rural Development
Candice Miller, Macomb County Public Works Commissioner
Jim Nash, Oakland County Water Resources Commissioner

2. Approval of the meeting agenda for December 16, 2020
3. Approval of Drainage District Board Meeting Minutes from November 18, 2020
4. Public Comment
5. Engineering Service Agreement between HRC and the Drainage District for engineering services on the Freedom Hill north bank project
6. Present special assessment roll for approval
7. HRC update
8. Present trial balance
9. Present for approval HRC invoice no. 184206 in the amount of \$1,490.35
10. Determine date and location of next meeting
11. Other business
12. Adjourn

December Clinton River Spillway, Gibson and Red Run Drain Board Meetings
Wed, Dec 16, 2020 10:00 AM - 11:30 AM (EDT)

Telephone Conference

Dial In: 1-813-370-0538

Access Code: 704 367 699

Video Conference (link)

<https://meet.google.com/cog-mjjx-jkd>

Agenda Item No. 3

Board Meeting Minutes from
November 18, 2020

Minutes of the Meeting
of the Intercounty Drainage Board for the
Red Run Drain

November 18, 2020

A meeting of the Drainage Board for the Red Run Intercounty Drain was held via GoToMeeting on November 18, 2020. The meeting was called to order by the Chairperson at 10:57 a.m.

Present: Michael Gregg, Chairperson and Deputy for Gary McDowell, Director of the Michigan Department of Agriculture and Rural Development; Candice Miller, Member and Macomb County Public Works Commissioner; and Anne Vaara, Chief Deputy for Jim Nash, Secretary and Oakland County Water Resources Commissioner.

Also Present: Representing the office of Macomb County Public Works Commissioner: Brian Baker, Jeff Bednar, Emily Engelman, Amanda Oparka, Karen Czernel. Representing the office of the Oakland County Water Resources Commissioner: Steven Korth, George Nichols and Megan Koss. Others in attendance: Jamie Burton (Hubbell, Roth & Clark).

1. Call meeting to order.

Chairperson Gregg called the meeting to order at 10:57 a.m. The Chairperson made a brief statement regarding the ongoing COVID-19 pandemic and, as a result, the need for the meeting to be held virtually. He noted that the meeting was being held in compliance with PA 228 of 2020. Pursuant to the aforementioned, Commissioner Gregg indicated he was participating from Mason, Michigan, Commissioner Miller indicated she was participating from Harrison Township, Michigan and Chief Deputy Commissioner Vaara indicated she was participating from Royal Oak, Michigan.

2. Agenda.

Motion by Vaara, supported by Miller, to approve the November 18, 2020 agenda as presented.

ROLL CALL VOTE:

GREGG: AYE
MILLER: AYE
VAARA: AYE

3. Minutes.

Motion by Vaara, supported by Miller, to approve the minutes of the October 21, 2020 meeting.

ROLL CALL VOTE:

GREGG: AYE
MILLER: AYE
VAARA: AYE

4. Public Comment. None.

5. Memorandum regarding HRC design services related to the Freedom Hill North Bank Restoration Project.

Mr. Nichols and Mr. Burton presented a memorandum recommending the Board approve engineering design services related to the Freedom Hill North Bank Restoration Project be awarded to Hubbell, Roth & Clark in the amount of \$238,490. It was noted that given the anticipated projects associated with the North Bank Project (i.e. invasive species control, native plantings and pathway extension), the following design services were necessary: data collection, survey and field assessment; soil boring analysis; preliminary design plans; final design plans and bid documents; project coordination.

Mr. Burton stated HRC hoped to begin work immediately and have 30% preliminary design plans for presentation to the Board in the spring. Questions were posed and discussion ensued regarding the aforementioned. Mr. Burton furthered that HRC anticipated bringing the project to the communities in early 2021 and that given the scale and overlap of the projects, along with funding and grant opportunities, parsing out how to distribute the funds appropriately would be an undertaking in and of itself.

Motion by Vaara, supported by Miller, to approve engineering design services related to the Freedom Hill North Bank Restoration Project be awarded to Hubbell, Roth & Clark in the amount of \$238,490.

ROLL CALL VOTE:

GREGG: AYE

MILLER: AYE

VAARA: AYE

6. Memorandum regarding HRC supplemental services for the Freedom Hill North Bank Restoration Project.

Mr. Nichols and Mr. Burton provided a brief overview of a memorandum recommending the Board approve the requested compensation on an as-needed basis in the amount of \$88,570 for Hubbell, Roth & Clark for supplemental services related to the Freedom Hill North Bank Restoration Project. It was noted that the supplemental services (securing permits, documentation to ensure adherence to grant requirements, meetings and USACE phase 2 coordination and project signage) were outside the scope of the engineering design services for the project. It was emphasized that those services would be on an as-need basis.

Motion by Miller, supported by Vaara, to approve the requested compensation on an as-needed basis in the amount of \$88,570 for Hubbell, Roth & Clark for supplemental services related to the Freedom Hill North Bank Restoration Project.

ROLL CALL VOTE:

GREGG: AYE

MILLER: AYE

VAARA: AYE

7. Memorandum regarding apportionment to communities.

Mr. Nichols presented a memorandum requesting the Board to authorize Oakland County Fiscal Services to execute the Army Corps of Engineer's Self-Certification of Financial Capability document on behalf of the District and direct staff to prepare an apportionment to

the communities to secure \$166,666 of matching funds for the Army Corps. He indicated that he was approached by the Army Corps who suggested the Drainage District capture excess funding to use toward the South Bank Project. He noted that the affected communities would need to be assessed and that he would work to communicate the Drainage District's intent to the communities now, with formal Board action on the assessment in early 2021 and payment due in the spring of 2021. It was also noted the funds were available to start the project forthwith.

Motion by Vaara, supported by Miller, to approve that the Board authorize Oakland County Fiscal Services to execute the Army Corps' Self-Certification of Financial Capability document on behalf of the District and direct staff to prepare an apportionment to the communities to secure \$166,666 of matching funds for the Army Corps.

ROLL CALL VOTE:

GREGG: AYE
MILLER: AYE
VAARA: AYE

8. Funding/Grant Application Update.

Mr. Burton provided a brief update regarding the various funding and grant application efforts. Mr. Burton stated that the Macomb County Public Works Office (MCPWO) applied for a 319 grant for the North Bank Project. He noted that while the application had been submitted, it could take approximately six months before a decision was rendered. He reiterated that coordinating the financing of overlapping projects with MCPWO and the Macomb County Road Commission would be advantageous in terms of grant funding leverage, cost savings, time and effort.

Motion by Miller, supported by Vaara, to receive and file the verbal funding and grant application update.

ROLL CALL VOTE:

GREGG: AYE
MILLER: AYE
VAARA: AYE

9. Trial Balance.

Mr. Korth presented the Trial Balance report dated November 10, 2020 (as attached) indicating a net cash balance of \$38,583.97. It was moved by Vaara, supported by Miller, to receive and file the updated Trial Balance as provided.

ROLL CALL VOTE:

GREGG: AYE
MILLER: AYE
VAARA: AYE

10. Next meeting.

It was established that the next meeting would be held virtually on December 16, 2020 at 10 a.m.

11. Other Business. None.

12. Adjourn.

Motion by Vaara, supported by Miller, to adjourn the November 17, 2020 meeting at 11:37 a.m.

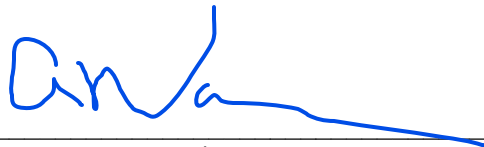
ROLL CALL VOTE:

GREGG: AYE

MILLER: AYE

VAARA: AYE

Next Regular Meeting: December 16, 2020. Due to the ongoing COVID-19 pandemic, the December meeting will be held virtually.

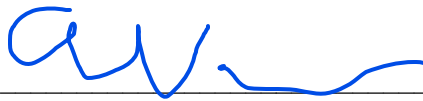


Anne Vaara, Acting Secretary
Red Run Intercounty Drain Drainage Board

STATE OF MICHIGAN)
)SS.
COUNTY OF OAKLAND)

I hereby certify that the foregoing is a true and complete copy of the minutes of the Red Run Intercounty Drain Drainage Board, at a meeting held on the 18th day of November, 2020 and that the meeting was conducted and public notice was given in compliance with the Open Meetings Act being Act 267, Public Acts of Michigan, 1976, as may be amended from time to time and that the minutes were kept and will be or have been made available to the public as required by the Act.

IN WITNESS WHEREOF, I have hereunto affixed my official signature on this 30th day of November, 2020.



Anne Vaara, Acting Secretary
Red Run Intercounty Drain Drainage Board

Agenda Item No. 4

Public Comment

Agenda Item No. 5

Engineering
Services
Agreement

**ENGINEERING SERVICES AGREEMENT
RED RUN DRAIN**

OAKLAND & MACOMB COUNTY, MICHIGAN

BETWEEN

HUBBELL, ROTH & CLARK, INC.

AND

**THE RED RUN INTER-COUNTY DRAIN
DRAINAGE DISTRICT**

**BUILDING 95 WEST – ONE PUBLIC WORKS DRIVE
WATERFORD, MICHIGAN 48328-1907**

The Red Run Inter-County Drain Drainage District, One Public Works Drive Bldg. 95 West, Waterford, MI 48328 ("Owner") and Hubbell, Roth & Clark, Inc., 555 Hulet Drive, Bloomfield Hills, MI 48302-0360 ("Engineer") enter into this Engineering Services Agreement ("Agreement"), effective the ____ day of _____, 2020.

1. DOCUMENTS CONSTITUTING THE AGREEMENT

1.1. The Red Run Drain Engineering Services Agreement Standard Terms and Conditions (DC-391 Part B) attached hereto are incorporated into this Agreement by reference. This Agreement is the entire and integrated contract between the Owner and the Engineer and supersedes all prior negotiations, representations, or agreements, whether written or oral. The Engineer's proposal is not part of the Agreement. The Agreement may only be amended by Engineering Work Orders that have been properly executed by the parties.

1.2. Reference Hubbell, Roth & Clark, Inc. Design Engineering Services for the Red Run Drain Freedom Hill North Bank Restoration proposal dated November 6, 2020 (Exhibit 'A').

1.3. Reference Hubbell, Roth & Clark, Inc. Design Engineering Supplemental Services for the Red Run Drain Freedom Hill Restoration Proposal dated November 11, 2020 (Exhibit 'B').

2. PROPOSED IMPROVEMENTS

The Owner owns, operates, and maintains the Red Run Drain. The Owner is requesting design engineering services for the Freedom Hill North Bank Stabilization Project including but not limited to the following:

- 2.1.** Data Collection, Survey and Field Assessment
- 2.2.** Preliminary Design Plans
- 2.3.** Final Design Plans and Bid Documents
- 2.4.** Project Coordination

3. PROJECT-SPECIFIC SERVICES

In addition to the standard services required by the Red Run Drain Engineering Services Agreement Standard Terms and Conditions, the Engineer shall provide the Project-Specific services listed below. The Owner may authorize the Engineer to provide Additional Special Services by Work Order during the course of the Project.

3.1. Preliminary Engineering (Study) Phase

3.1.1. The Project-Specific services consist of: *Not Applicable*

3.2. Design Phase

3.2.1. The Project-Specific services consist of:

3.2.1.1. The Engineer will review existing LiDAR information and record documents, evaluate permit needs and perform field assessments.

3.2.1.2. Upon review of the Michigan Department of Environmental, Great Lakes, and Energy permit requirements and Drain Code exemptions, the Engineer will determine if the project requires a Part 301 permit.

3.2.1.3. The Engineer will coordinate a pre-application meeting with EGLE and USACE.

3.2.1.4. The Engineer will survey the proposed trail path to gather topographic information and perform tree tagging.

3.2.1.5. Soil Borings will be obtained due to the project's proximity to a former landfill.

3.2.1.6. The Engineer will prepare 30% design plans that include the base survey plan, site grading, earthwork calculations, soil boring locations, and proposed ADA path options.

3.2.1.7. The Engineer will prepare 60%, 90% and Final design plans and specifications for bidding. Addendum services will also be provided by the Engineer.

3.2.1.8. The Engineer will host a kickoff meeting with representatives from the Owner. In addition, the Engineer will host monthly meetings (supplemented with bi-weekly meetings, as needed) with the Technical team staff from each county.

Final Drawings and Specifications, or other Construction Documents or Construction Contract Documents submitted by ENGINEER to OWNER for review and approval or to any Contractors for bidding or negotiation, shall be prepared using, ENGINEER's professional judgment and in accordance with the standard of practice in the industry, be complete and unambiguous and in compliance with applicable codes, ordinances, statutes, laws and regulations in effect as of the date of the Agreement, except to the extent expressly and specifically otherwise stated in detail in writing by ENGINEER at the time of such submission. The enactment or revisions of codes, laws or regulations subsequent to the date of this Agreement may be the basis for modifications to ENGINEER's scope of services, times of performance, or compensation. By submitting Final Drawings and Specifications, or other Construction Documents for Construction Contract purposes, ENGINEER acknowledges that ENGINEER has informed OWNER in writing of any tests, studies, analyses or reports that are necessary or advisable to be performed by or for OWNER at that point in time.

ENGINEER shall be responsible for the professional quality, technical accuracy, and coordination of all Drawings, Specifications and design documents relating to ENGINEER's design and used on the Project, regardless of whether such Drawings, Specifications or other design documents are prepared by ENGINEER or by ENGINEER's consultants. If preliminary or design development work has been performed by others engaged by ENGINEER, ENGINEER is nevertheless fully responsible for and accepts full responsibility for such earlier work when ENGINEER performs subsequent phases of the basic services called for under this Agreement, as fully as if the preliminary, schematic and design development work had been performed by ENGINEER itself. ENGINEER shall be responsible for coordination and internal checking of all

Drawings and for the accuracy of all dimensional and layout information contained therein, as fully as if each Drawing were prepared by ENGINEER. Such review and responsibility does not extend to confirming or checking the accuracy of manufacturer's specifications or product data.

OWNER shall not be responsible for discovering deficiencies in ENGINEER's Drawings, Specifications, or other design documents. At OWNER's election, ENGINEER shall be required to correct all work arising out of ENGINEER's errors or omissions; however, OWNER shall have no obligation to compensate ENGINEER for such corrective services, except to the extent such action is directly attributable to deficiencies in OWNER furnished information.

3.3. Construction Phase

3.3.1. The Project-Specific services consist of: *Not Applicable*.

3.4. Asset Management Services

3.4.1. The Project-Specific services consist of: *Not Applicable*.

3.5. Construction Surveying, Layout, and Construction Observation

3.5.1. The Project-Specific services consist of: *Not Applicable*.

3.6. Resident Project Representative

3.6.1. The Project-Specific services consist of: *Not Applicable*.

3.7. Additional Special Services

ENGINEER shall provide Additional Special Services on an as needed basis upon specific prior written request of OWNER. No payment, of any nature whatsoever, will be made to ENGINEER, for additional work or services, without such prior written approval by OWNER. Authorization for such work or services, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order or equal, issued by OWNER, stating the scope of the additional work, and the basis for payment. Those services are as follows:

3.7.1. Securing permits from EGLE and USACE

3.7.2. Documentation to ensure adherence to Grant Requirements

3.7.3. Meetings and USACE Phase 2 Coordination

3.7.4. Project Signage

4. COMPENSATION FOR ENGINEERING SERVICES

4.1. Preliminary Engineering (Study) Phase

4.1.1. The Project-Specific services consist of: *Not Applicable*

4.2. Design Phase

4.2.1. The Engineer's compensation for Engineering Design Services **shall not exceed \$238,490** and shall be based on the following formula for those specific services:

Actual direct hourly payroll wages plus an overhead rate of 1.97 times direct payroll wages plus a fixed fee of 13% resulting in a total multiplier on direct payroll wages of 3.10.

4.2.2. Mark-up on Engineer's Consultant's charges and reimbursable expenses required to complete the work shall not exceed 10%.

4.2.3. Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.2.4. Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.2.5. The Owner may require the Engineer to support its invoices with data and documentation for each charge.

4.3. Construction Phase

4.3.1. In the event the Owner issues an Engineering Work Order for Construction Phase Service, the Engineer's compensation for providing such services shall be based on the following formula for those specific services:

Actual direct hourly payroll wages plus an overhead rate of 1.97 times direct payroll wages plus a fixed fee of 13% resulting in a total multiplier on direct payroll wages of 3.10.

4.3.2. Mark-up on Engineer's Consultant's charges and reimbursable expenses required to complete the work shall not exceed 10%.

4.3.3. Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.3.4. Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.3.5. The Owner may require the Engineer to support its invoices with data and documentation for each charge.

4.4. Asset Management Services

4.4.1. In the event the Owner issues an Engineering Work Order for Asset Management Services as an Additional Special Service, the Engineer's compensation for providing such services shall be based on the following formula for those specific services:

Actual direct hourly payroll wages plus an overhead rate of 1.97 times direct payroll wages plus a fixed fee of 13% resulting in a total multiplier on direct payroll wages of 3.10.

4.4.2. Mark-up on Engineer's Consultant's charges and reimbursable expenses required to complete the work shall not exceed 10%.

4.4.3. Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.4.4. Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.4.5. The Owner may require the Engineer to support its invoices with data and documentation for each charge.

4.5. Construction Surveying, Layout, Observation, and Resident Project Representative Services

4.5.1. In the event the Owner issues an Engineering Work Order for Construction Surveying, Layout, Observation, and Resident Project Representative Services as an Additional Special Service, the Engineer's compensation for providing such services shall be based on the following formula for those specific services:

Actual direct hourly payroll wages plus an overhead rate of 1.97 times direct payroll wages plus a fixed fee of 13% resulting in a total multiplier on direct payroll wages of 3.10.

4.5.2. Mark-up on Engineer's Consultant's charges and reimbursable expenses required to complete the work shall not exceed 10%.

4.5.3. Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.5.4. Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.5.5. The Owner may require the Engineer to support its invoices with data and

documentation for each charge.

4.6. Engineering Redesign

4.6.1. In the event the Owner issues an Engineering Work Order for Engineering Redesign as an Additional Special Service, the Engineer's compensation for providing such services shall be based on the following formula for those specific services:

Actual direct hourly payroll wages plus an overhead rate of 1.97 times direct payroll wages plus a fixed fee of 13% resulting in a total multiplier on direct payroll wages of 3.10.

4.6.2. Mark-up on Engineer's Consultant's charges and reimbursable expenses required to complete the work shall not exceed 10%.

4.6.3. Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.6.4. Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an itemized invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.6.5. The Owner may require the Engineer to support its invoices with data and documentation for each charge.

4.7. Additional Special Services

4.7.1. The Engineer's compensation for Additional Special Services **shall not exceed \$88,570** and shall be based on the following formula for those specific services:

Actual direct hourly payroll wages plus an overhead rate of 1.97 times direct payroll wages plus a fixed fee of 13% resulting in a total multiplier on direct payroll wages of 3.10.

4.7.2. Once the Engineer has evaluated existing data and the current field conditions are known, it will determine which items noted previously will require additional attention and what level of effort may be needed. These services will only be used upon written authorization from the Owner for a mutually agreed upon scope and cost.

4.7.3. Mark-up on Engineer's Consultant's charges and reimbursable expenses required to complete the work shall not exceed 10%.

4.7.4. Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.7.5. Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.7.6. The Owner may require the Engineer to support its invoices with data and documentation for each charge.

4.8 Termination for Convenience

4.8.1 Should the Owner terminate the Engineer for convenience, the Engineer will be paid for services satisfactorily performed or furnished in accordance with this Agreement through date of termination plus actual expenses directly caused by the termination. The Engineer will not be paid for unperformed services, poorly performed services, or anticipated profit on unperformed services.

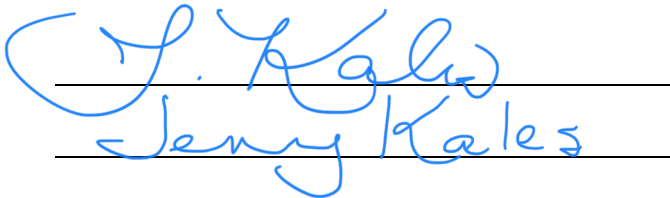
4.8.2 Payment to the Engineer is conditioned upon receipt of Project funds by the Owner.

4.8.3 Provided that Project funds have been received by the Owner, monthly progress payments shall be made to the Engineer in response to an itemized invoice presented to the Owner by the Engineer. Such monthly progress payments shall be made within thirty (30) days after the invoice is approved by the Owner.

4.8.4 The Owner may require the Engineer to support its invoices with data and documentation for each charge.


IN WITNESS WHEREOF, the parties hereto have executed this Agreement as of the day and year first referenced in this Agreement.

WITNESS:



Jenny Kales

HUBBELL, ROTH, & CLARK, INC.


By: James F. Burton
Its: V.P.

WITNESS:

**RED RUN INTER-COUNTY DRAIN DRAINAGE
DISTRICT SECRETARY**

Jim Nash

APPROVED AS TO FORM:

By: _____
Oakland County Water Resources
Commissioner's Legal Counsel

EXHIBIT 'A'

Hubbell, Roth & Clark, Inc.

Design Engineering Services

Red Run Drain Freedom Hill Restoration

November 6, 2020

November 6, 2020

Drainage Board for the Red Run Intercounty Drain
c/o Oakland County Water Resources Commissioner
One Public Works Drive
Building 95 West
Waterford, Michigan 48328

Attn: Mr. George P. Nichols, P.E. Civil Engineer III

Re: Red Run Drain Freedom Hill Restoration
Design Engineering Services

HRC Job No. 20200852

Dear Mr. Nichols:

The project team (Team) of Hubbell, Roth & Clark, Inc. and the Spicer Group, Inc. is pleased to offer engineering services to the Red Run Drainage Board for the subject project. On September 16, 2020, the Red Run Inter-County Drainage Board (ICDB) approved the *Study for the Repair, Maintenance, and Management of the Red Run Intercounty Drain* final report. From the report, the stabilization of the Red Run Drain along Freedom Hill was identified as a priority project. On October 21, 2020, the ICDB approved utilizing funds from the National Fish and Wildlife Foundation (NFWF) Southeast Michigan Resilience Fund and local Act 51 funding to proceed with Phase 1 of the Red Run Drain Freedom Hill Restoration project, as well as administer the associated NFWF grant work for the design and construction of a trail and plantings along the Sterling Relief Drain and Freedom Hill park.

The proposed Red Run Drain Freedom Hill Restoration is being funded by NFWF grant, Act 51, and ICDB funds. The grants have defined budgets, developed by others, with some scope items that overlap with the Freedom Hill Bank Stabilization Phase 1 scope developed by the Team. Since we were not involved with the development of the grant budgets, it is important to review these budgets in greater detail to refine the final project cost as the ICDB considers apportionment needs. The proposed engineering services are based on an estimated \$2 million construction budget. As more information is gathered and design progresses, the Team will provide an updated construction estimate. We propose that all items of work be completed under the terms and conditions of our existing Agreement for Professional Engineering Services. A breakdown of our proposed engineering design services and budgeted hours are summarized below and in the attached table:

- ≡ **Data Collection, Survey and Field Assessment** –The Team will review existing LiDAR information and record documents, evaluate permit needs, and perform field assessments to guide the project design. A review of Michigan Department of Environment, Great Lakes, and Energy (EGLE) permit requirements and Drain Code exemptions will be conducted to determine if the project requires a Part 301 permit. The project will require a United States Army Corps of Engineers (USACE) 408 review since the Red Run Drain project is not being constructed through USACE. Included in this effort is a pre-application meeting with EGLE and USACE. In addition, the Team will survey the proposed trail path to gather topographic information and perform tree tagging. The survey will note each drain's Right of Way, utilities, and encroachments that may impact the project. Five (5) soil borings will be obtained due to the project's proximity to a former landfill. The borings will be analyzed to verify that any proposed grading will not be impacted by potential contamination and guide restoration efforts and trail construction. Once the preliminary survey is completed, the Team will coordinate with the project partners to finalize the path location to best meet grant and ADA requirements.

Estimated Hours = 218

Delhi Township
2101 Aurelius Rd.
Suite 2A
Holt, MI 48842
517-694-7760

Detroit
535 Griswold St.
Buhl Building, Ste 1650
Detroit, MI 48226
313-965-3330

Grand Rapids
1925 Breton Road SE
Suite 100
Grand Rapids, MI 49506
616-454-4286

Howell
105 W. Grand River
Howell, MI 48843
517-552-9199

Jackson
401 S. Mechanic St.
Suite B
Jackson, MI 49201
517-292-1295

Kalamazoo
834 King Highway
Suite 107
Kalamazoo, MI 49001
269-665-2005

Lansing
215 S. Washington SQ
Suite D
Lansing, MI 48933
517-292-1488

- ≡ **Preliminary Design Plans** – The Team will prepare 30% design plans that include the base survey plan, site grading, earthwork calculations, soil boring locations, and proposed ADA path options. Based on the outcomes of the 30% design, the Team will evaluate the benefits of completing the project as a modified design build (as proposed in the awarded NFWF grant application) vs. a traditional design bid project and present them to the ICDB and project partners.

Estimated Hours = 248

- ≡ **Final Design Plans and Bid Documents**–The Team will prepare 60%, 90%, and Final design plans and specifications for bidding. Included in this task is the preparation of bid addendums.

Estimated Hours = 1289

- ≡ **Project Coordination** – The Team will host a kickoff meeting with the project partners in both counties. In addition, we will host monthly meetings (supplemented with bi-weekly meetings, as needed) with the Technical team staff from each county during the duration of the project (25 meetings) and attend monthly ICDB meetings (12 meetings). Monthly engineering design progress reports are included, as needed.

Estimated Hours = 154

Task	Hours	Cost
1.) Data Collection, Survey and Field Assessment	218	\$ 27,170.00
2.) Soil Boring Analysis (5 locations) *	-	\$ 10,000.00
3.) Preliminary Design Plans	248	\$ 30,900.00
4.) Final Design Plans and Bid Documents	1289	\$ 150,420.00
5.) Project Coordination	154	\$ 20,000.00
Totals	1909	\$ 238,490.00

* Analysis performed by others

We appreciate your consideration for the proposed project totaling \$238,000. This phase of design engineering will begin immediately upon approval and preliminary design plans (30%) will be presented to the ICDB by April 2021. The timing of final design plans will be scheduled once other submitted grant funding opportunities are known. If you have any questions or require any additional information, please contact the undersigned.

Very truly yours,

HUBBELL, ROTH & CLARK, INC.

James F. Burton, P.E.
Vice President

Attachment

pc: Spicer; R. Velez, S. Roznowski
HRC; L. Seymour, File

Hubbell, Roth & Clark, Inc.

2020 Hourly Rate Schedule

Prepared for:

Oakland County Water Resources

<u>Category</u>	<u>Billable Rates</u>
Principal	132.00 - 190.00
Sr. Associate/Managing Engineer	170.00 - 190.00
Associate/Managing Engineer	114.00 - 167.00
Department Manager	129.00 - 162.00
Manager	126.00 - 151.00
Supervisor	87.00 - 130.00
Sr. Project Engineer/Architect/Surveyor	118.00 - 164.00
Project Engineer/Architect/Surveyor	100.00 - 137.00
Staff Engineer/Architect/Surveyor	90.00 - 110.00
Senior Project Analyst	131.00 - 132.00
Project Analyst	97.00 - 134.00
Graduate Engineer/Architect I/II	66.00 - 112.00
Technical Specialist	146.00 - 146.00
Designer	93.00 - 132.00
Sr. Cadd Technician	76.00 - 111.00
Cadd Technician	53.00 - 59.00
Survey Technician	100.00 - 101.00
Survey Party Chief	77.00 - 116.00
Survey - Field Technician	49.00 - 77.00
Project Representatives	97.00 - 170.00
Sr. Construction Observer	77.00 - 92.00
Construction Observer I/II	46.00 - 75.00
Construction - Office Technician	49.00 - 67.00
Testing Engineer	99.00 - 99.00
Testing Coordinator	78.00 - 78.00
Testing Technician	48.00 - 78.00
Administrative Support**	43.00 - 135.00

*Wage rates shown above are for 2020.

Billable rates for Hubbell, Roth & Clark, Inc. include Unemployment and Payroll taxes, contributions for Social Security, Retirement benefits, Medical and Life insurance benefits, normal printing cost, telephones, fax, computer time, mileage, other overhead costs and profit.

Allowable Reimbursable expenses will be invoiced at our cost which is defined as the direct costs plus 12% .

** This Category includes Computer, Reproduction and Administrative Staff.

EXHIBIT 'B'

Hubbell, Roth & Clark, Inc.

Design Engineering Supplemental Services

Red Run Drain Freedom Hill Restoration

November 11, 2020

November 11, 2020

Drainage Board for the Red Run Intercounty Drain
c/o Oakland County Water Resources Commissioner
One Public Works Drive
Building 95 West
Waterford, Michigan 48328

Attn: Mr. George P. Nichols, P.E. Civil Engineer III

Re: Red Run Drain Freedom Hill Restoration
Design Engineering Supplemental Services

HRC Job No. 20200852

Dear Mr. Nichols:

The project team (Team) of Hubbell, Roth & Clark, Inc. and the Spicer Group, Inc. is pleased to offer supplemental engineering services to the Red Run Drainage Board for the subject project. Our base design engineering services proposal was provided under separate cover, dated November 6, 2020.

On October 21, 2020, the ICDB approved to utilize funds from the National Fish and Wildlife Foundation (NFWF) Southeast Michigan Resilience Fund and local Act 51 funding to proceed with Phase 1 of the Red Run Drain Freedom Hill Restoration project, as well as administer the associated NFWF grant work for the design and construction of a trail and plantings along the Sterling Relief Drain and Freedom Hill park. The proposed Red Run Drain Freedom Hill Restoration is being funded by NFWF grant, Act 51, and ICDB funds. The project has multiple funding agencies with each having its own governing agency responsible for the oversight of the funds.

As requested by the ICDB, we have identified the additional tasks beyond typical design engineering that the Team can assist with to make the implementation of Red Run Drain Freedom Hill Restoration Phase 1 efficient and complete. In general, utilizing grant funding requires additional project requirements to be met in addition to more robust stakeholder and agency coordination. We propose that all items of work be completed under the terms and conditions of our existing Agreement for Professional Engineering Services. A breakdown of our proposed engineering design services and budget are summarized below:

- ≡ **Permitting** – The Team will apply for all necessary permits required for the project and prepare all documentation required. Under the engineering services proposal provided under separate cover, the Team will hold a pre-application permit meeting with the Michigan Department of Environment, Great Lakes, and Energy (EGLE) and United States Army Corps of Engineers (USACE). Based on earlier conversations with the USACE, the project will require a 408 review since the Red Run Drain project is not being constructed through USACE. The Team will coordinate with EGLE and USACE to prepare and submit the required information. A Soil Erosion and Sedimentation Control (SESC) permit will not be required from the City of Sterling Heights since the ICDB is administering the project and will utilize its APA designation for complying with SESC requirements. The preparation of the SESC requirements is included under a separate scope previously provided under separate cover.

Budget = \$14,570

- ≡ **Drainage District Assistance** – The Team will prepare a draft apportionment that reflects the supplemental benefits received from the project to the drainage district municipalities. Supplemental benefits will consider items such as trail construction, Sterling Relief Drain plantings, and other aspects not directly related to the repair, maintenance, and management of the Red Run Drain. Supplemental benefits should be memorialized in

Delhi Township
2101 Aurelius Rd.
Suite 2A
Holt, MI 48842
517-694-7760

Detroit
535 Griswold St.
Buhl Building, Ste 1650
Detroit, MI 48226
313-965-3330

Grand Rapids
1925 Breton Road SE
Suite 100
Grand Rapids, MI 49506
616-454-4286

Howell
105 W. Grand River
Howell, MI 48843
517-552-9199

Jackson
401 S. Mechanic St.
Suite B
Jackson, MI 49201
517-292-1295

Kalamazoo
834 King Highway
Suite 107
Kalamazoo, MI 49001
269-665-2005

Lansing
215 S. Washington SQ
Suite D
Lansing, MI 48933
517-292-1488

agreements with the participating entities. The Team will assist legal counsel to draft, negotiate, and obtain these agreements. In addition, the team will compare the Right of Way (ROW) survey work to the historical ROW to determine if the ICDB needs to consider acquiring new easement to properly maintain the Drain. Finally, the team will assist with the preparation of agency agreements necessary to perform the work outside of the Red Run Drain Right of Way.

Budget = \$15,500

- ≡ **Monitoring Coordination** – The Team will assist with overseeing and coordinating the grant monitoring requirements with Six Rivers Land Conservancy and the Clinton River Watershed Council over the two-year project. Oversight will include reviewing Quality Assurance Project Plans, managing treatment scheduling and monitoring schedules, and providing updates to the ICDB and county partners.

Budget = \$7500

- ≡ **Grant Reporting** – The Team will prepare grant monthly progress reports, grant budget updates, and prepare the final report. The monthly progress reports will be presented to the ICDB for review. This task also includes assistance with NFWF and Act 51, as needed.

Budget = \$20,000

- ≡ **Meetings** – The Team will host meetings to coordinate grant requirements with the appropriate county agencies and assist with ICDB with apportionment /benefit meetings with municipalities. In addition, we will prepare the necessary supporting documents for each meeting. Approximately 155 hours is budgeted for this task.

Budget = \$20,000

- ≡ **USACE Phase 2 Coordination** – The Team will assist with the coordination of Red Run Drain Freedom Hill Restoration Phase 2 being designed through the USACE. The USACE is anticipating beginning design of Phase 2 in 2021, after design work will be well underway for Phase 1. It will be critical to share data to ensure the project is designed on the same data and with the same design approach. We will assist with the transferring of data, provide the basis of design for the overall project previously prepared, and meet with USACE and its design engineers, as needed.

Budget = 10,000

- ≡ **Project Signage** – The Team will assist with project signage development to inform the public of the project scope and partners. A sign layout will be developed and provided to assist with fabrication and installation.

Budget = \$1000

We appreciate your consideration for the above budgets totaling \$88,570. As noted, separate budgets are provided for each task. Our Team's time will be tracked separately and only at the discretion of the ICDB or lead staff from the county. This phase of supplemental design engineering assistance will begin immediately upon approval and be completed by December 31, 2022. If you have any questions or require any additional information, please contact the undersigned.

Very truly yours,

HUBBELL, ROTH & CLARK, INC.



James F. Burton, P.E.
Vice President

Attachment

pc: Spicer; R. Velez, S. Roznowski
HRC; L. Seymour, File

Hubbell, Roth & Clark, Inc.

2020 Hourly Rate Schedule

Prepared for:

Oakland County Water Resources

<u>Category</u>	<u>Billable Rates</u>
Principal	132.00 - 190.00
Sr. Associate/Managing Engineer	170.00 - 190.00
Associate/Managing Engineer	114.00 - 167.00
Department Manager	129.00 - 162.00
Manager	126.00 - 151.00
Supervisor	87.00 - 130.00
Sr. Project Engineer/Architect/Surveyor	118.00 - 164.00
Project Engineer/Architect/Surveyor	100.00 - 137.00
Staff Engineer/Architect/Surveyor	90.00 - 110.00
Senior Project Analyst	131.00 - 132.00
Project Analyst	97.00 - 134.00
Graduate Engineer/Architect I/II	66.00 - 112.00
Technical Specialist	146.00 - 146.00
Designer	93.00 - 132.00
Sr. Cadd Technician	76.00 - 111.00
Cadd Technician	53.00 - 59.00
Survey Technician	100.00 - 101.00
Survey Party Chief	77.00 - 116.00
Survey - Field Technician	49.00 - 77.00
Project Representatives	97.00 - 170.00
Sr. Construction Observer	77.00 - 92.00
Construction Observer I/II	46.00 - 75.00
Construction - Office Technician	49.00 - 67.00
Testing Engineer	99.00 - 99.00
Testing Coordinator	78.00 - 78.00
Testing Technician	48.00 - 78.00
Administrative Support**	43.00 - 135.00

*Wage rates shown above are for 2020.

Billable rates for Hubbell, Roth & Clark, Inc. include Unemployment and Payroll taxes, contributions for Social Security, Retirement benefits, Medical and Life insurance benefits, normal printing cost, telephones, fax, computer time, mileage, other overhead costs and profit.

Allowable Reimbursable expenses will be invoiced at our cost which is defined as the direct costs plus 12% .

** This Category includes Computer, Reproduction and Administrative Staff.

These Standard Terms and Conditions (DC-391 Part B) are incorporated by reference into each Engineering Services Agreement (DC-391 Part A) ("Agreement") issued by the Red Run Inter-County Drain Drainage District ("Owner").

1. **DEFINITIONS**

Wherever used in the Agreement, the following terms have the meanings indicated, which are applicable to both the singular and plural thereof:

1.1. Addenda. Written or graphic instruments issued prior to the opening of Bids, which clarify, correct, or change the Bidding Documents.

1.2. Agreement. The Engineering Services Agreement between Owner and Engineer, including these Standard Terms and Conditions, properly executed Engineering Work Orders, all modifications to it, and all exhibits incorporated by express reference.

1.3. Application for Payment. The form acceptable to Engineer which is to be used by Contractor when requesting progress or final payments for Work completed and which is to be accompanied by such supporting documentation as is required by the Contract Documents.

1.4. Application for Final Payment. The Application for Payment which Contractor submits to the Owner after Contractor has completed each of requirements for Final Payment as set forth in the Contract Documents.

1.5. Baseline Conditions Assessment Report. The assessment of the existing conditions upon which the design of the Project or parts of the Project is predicated. This necessarily includes, but is not limited to, an accurate description of topographic, geologic, geotechnical, hydrogeological, hydraulic, environmental, community, public, and private factors that any aspect of the design depends upon.

1.6. Bid. The offer or proposal of the Bidder submitted on the prescribed form identifying the prices for the Work to be performed, and agreeing to perform the Work in accordance with the Contract Documents.

1.7. Bidder. A company submitting a Bid to perform the Work.

1.8. Bidding Documents. The Advertisement, Invitation to Bid, Information for Bidders, the Proposal and attachments, the Bid bond, if any, the proposed Contract Documents, and all Addenda, if any.

1.9. Bulletin. Bulletin is defined as instrument providing clarification, supplemental information, documentation, or other such communication which neither involves Contract Time or Construction Cost adjustments to the Contract, nor changes the general character of the Work as a whole. Further, Bulletin provides means to transmit written information in a manner which is succinct, easily prepared and issued, and simply documented for future reference, as required. Bulletin does not represent, or suggest, a material change to the Contract. The Owner or the Engineer may act as the issuing party.

1.10. Change Order. A written instrument issued by the Owner, on a Change Order form

furnished by the Owner, and signed by the Owner, Contractor, and Engineer, modifying (i) the scope of the Work, (ii) the Contract Sum or any other cost or fee, or (iii) the Contract Time and/or updated CPM Schedule.

1.11. Claim. Any actual, alleged, or threatened loss, claim, complaint, demand for relief or damages, suit, cause of action, proceeding, judgment, deficiency, liability, question regarding the Agreement or Contract Documents, penalty, litigation, cost, or expense, including, but not limited to, attorney fees, engineering fees, witness fees, court costs, investigation expenses, litigation expenses, amounts paid in settlement, and/or other amounts or liabilities of any kind which are imposed on, incurred by, or asserted against the Owner, or for which the Owner may become legally and/or contractually obligated to pay or defend against, whether direct, indirect, or consequential, whether based upon any alleged violation of the federal or the State constitution, any federal or State statute, rule, regulation, or any alleged violation of federal or State common law, whether any such claims are brought in law or equity, tort, contract, or otherwise, and whether commenced or threatened.

1.12. Construction Agreement. The written instrument, also known as the Agreement, contained in the Contract Documents, between Owner and Contractor concerning the Work.

1.13. Construction Contract. The written instrument, which is evidence of the entire and integrated written agreement between the Owner and Contractor covering the Work required by the Contract Documents.

1.14. Construction Cost. The total cost to Owner of those portions of the entire Project designed or specified by the Engineer. Construction Cost does not include compensation and costs of the Engineer or other design professionals and other consultants, the cost of land, rights-of-way, or compensation for or damages to properties, or Owner's legal, accounting, insurance counseling or auditing services, or interest and financing charges incurred in connection with the Project or the cost of other services to be provided by others to Owner. Construction Cost is one of the items comprising Total Project Costs.

1.15. Consultant. A person or entity providing professional services for the Engineer for all or a portion of the Work. To the extent required by Michigan law, a Consultant shall be lawfully licensed to provide the required professional services.

1.16. Contractor. The person or entity with whom Owner enters into a written agreement covering the Work required to be performed or furnished with respect to the Project.

1.17. Contract Documents. The set of individual documents that together form the complete and fully integrated agreement between the Owner and Contractor. The Contract Documents may include the Construction Agreement between Owner and Contractor, Addenda, Contractor's Bid, General Conditions, Supplementary Conditions, Specifications, Drawings, and Change Orders. Shop Drawings and reports of subsurface and other physical site conditions are not Contract Documents unless specifically identified as such.

1.18. Contract Price. The moneys payable by Owner to Contractor for proper completion of the Work in accordance with the Contract Documents and as stated in the Construction Contract.

1.19. Contract Sum. The total of all moneys payable by Owner to Contractor for completion of the Work in accordance with the Contract Documents and as stated in the Construction Agreement. The terms Contract Sum and Contract Price may be used interchangeably.

1.20. Contract Time(s). The Contract Time is the number of calendar days described in the Construction Agreement in which (or, alternatively, the date set forth in the Construction Agreement by which) Substantial Completion shall be achieved, subject to any extensions granted in executed Change Orders or otherwise specifically permitted by the Contract Documents. Any references to Contract Time shall be interpreted to mean Construction Time. Contract Time also may refer to the days or the dates identified in the Construction Agreement for Contractor to complete the Work so that it is ready for final payment as evidenced by Engineer's written recommendation of final payment.

1.21. CPM Schedule. The term "CPM Schedule" means and refers to the man-power loaded, logic-based progress schedule for the Project using critical path method (or similar, pre-approved method) scheduling technique to create and maintain a current and accurate schedule depicting the actual and expected progress of the Work.

1.22. Critical Path. The term "Critical Path" means the longest continuous chain of activities through the network schedule that establishes the minimum time to achieve Final Completion of the Work.

1.23. Defective Work. Work not conforming to the requirements of the Contract Documents. Substitutions not specifically approved by the Owner and Engineer shall be considered "Defective Work."

1.24. Documents. Data, Reports, Drawings, Specifications, Record Drawings, and other deliverables, whether in printed or electronic media format, provided or furnished in appropriate phases by Engineer to Owner for use by the Contractor pursuant to this Agreement as well as Data, Reports, Drawings, Specifications, and other deliverables provided by Contractor where the Contract Documents require Contractor to both design and construct certain aspects of the Work, such as tunnel liners and temporary earth retention systems.

1.25. Drawings. That part of the Contract Documents prepared or approved by Engineer or prepared or approved by Contractor's design professionals which graphically show the scope, extent, and character of the Work to be performed by Contractor. Shop Drawings are not Drawings as so defined.

1.26. Engineering Work Order. A document which is signed by Engineer and only the Owner or his or her Deputy Commissioners and approved by a Drainage Board when required to authorize an addition, deletion or revision in the services to be performed by Engineer under this Agreement, or an adjustment in the compensation to be paid to Engineer.

1.27. Field Order. A written order issued by Engineer which directs minor changes in the Work but which does not involve a change in the Contact Price or Contract Time.

1.28. Final Acceptance. "Final Acceptance" of the Work will have occurred when Owner has acknowledged Final Completion of the Work and the Contractor has satisfied (i) all close-out obligations set forth in the Contract Documents to qualify for Final Payment, including, but not limited to, the conditions set forth in Article VII of the agreement between the Owner and

Contractor, and (ii) the Owner has authorized final payment to the Contractor.

1.29. Final Completion. Final Completion of the Work or a designated portion thereof will have occurred when the Work is fully and finally completed in accordance with the Contract Documents to the satisfaction of Owner and Engineer and Owner issues a written acknowledgement of such completion. Following the receipt of the Owner's written acknowledgement of Final Completion, the Contractor shall be entitled to apply for Final Payment.

1.30. General Conditions. That part of the Contract Documents which sets forth terms, conditions, and procedures that govern the Work to be performed or furnished by Contractor with respect to the Project.

1.31. Laws and Regulations. Any and all applicable laws, rules, regulations, ordinances, codes, standards, and orders of any and all governmental bodies, authorities and courts having jurisdiction.

1.32. MDEQ. The Michigan Department of Environmental Quality

1.33. Observer. A field representative authorized by the Owner.

1.34. OCIP. Owner Controlled Insurance Program

1.35. Project. The project referenced and described in the Agreement and Contract Documents.

1.36. Record Drawings. The Drawings issued for construction on which the Engineer shall show changes due to Addenda or Change Orders or other information which the Engineer considers significant. The Record Drawings shall be prepared and updated during the prosecution of the Work. The Engineer shall maintain said Record Drawings in good condition and shall use colored pencils or other methods reasonably acceptable to the Owner to mark-up said set with "record information" in a legible manner to show: (i) deviations from the Drawings made during construction; (ii) details in the Work not previously shown; (iii) changes to existing conditions or existing conditions found to differ from those shown on any existing Drawings based on information provided by the Contractor or Observer; (iv) the actual installed position of various components of the Work; and (v) such other information as the Owner may reasonably request.

1.37. Resident Project Representative (RPR). The authorized representative of Engineer, if any, assigned to assist Engineer at the Site during the Construction Phase. The RPR will be Engineer's agent or employee and under Engineer's supervision. As used herein, the term RPR includes any assistants of RPR agreed to by Owner, including an observer.

1.38. Request for Information (RFI). A written communication from the Contractor to the Engineer requesting clarification of design Drawings, Specifications, or other Contract Documents, or requesting information needed to perform the Work and not included in the Contract Documents. Contractor also shall submit an RFI if Contractor discovers a conflict or inconsistency in the design documents that cannot be resolved by a thorough review of the Contract Documents or application of the priority of documents provisions set out herein.

1.39. Risk Register. The Risk Register is a report identifying the parties and the governmental agencies affected by, with jurisdiction over, or an interest in the Project and describing the nature

of the impact each may incur during the construction of the Project.

1.40. Samples. Physical examples of materials, equipment, or workmanship that are representative of some portion of the Work and which establish the standards by which such portions of the Work will be judged. Samples shall be protected and remain available until after Final Completion.

1.41. Schedule. The term "Schedule" means and refers to the CPM Schedule required by the Contract Documents.

1.42. Site. Land or areas indicated in the Contract Documents as being furnished by Owner upon which the Work is to be performed, rights-of-way and easements for access thereto, and such other lands furnished by Owner which are designated for Contractor's use.

1.43. Shop Drawings. All drawings, diagrams, illustrations, schedules, and other data or information which are specifically prepared or assembled by or for Contractor and submitted by Contractor to Engineer for review and response. Shop Drawings illustrate some portion of the Work. Engineer shall transmit a final reviewed copy of the Shop Drawings to Owner.

1.44. Specifications. That part of the Contract Documents consisting of written technical descriptions of materials, equipment, systems, standards, and workmanship as applied to the Work and certain administrative details applicable thereto.

1.45. Substantial Completion. The time at which the Work (or a specified part thereof) has progressed to the point, where, in the opinion of Owner and Engineer, the Work (or a specified part thereof) is sufficiently complete, in accordance with the Contract Documents, so that the Work (or a specified part thereof) can be utilized for the purposes for which it is intended and Contractor has (i) submitted the final versions of all operations and maintenance manuals, and/or other information that may be required by the Contract Documents, embodying such corrections and modifications from initial versions as the Owner shall reasonably request, (ii) completed all training and start up requirements in the Contract Documents; and (iii) completed all other requirements for Substantial Completion as may be defined elsewhere in the Contract Documents and as evidenced by the Owner's issuance of an acknowledgement of Substantial Completion. The terms "substantially complete" and "substantially completed" as applied to all or part of the Work refer to Substantial Completion thereof.

1.46. Total Project Costs. The sum of the Construction Cost; the total costs of services of Engineer and other design professionals and Consultants; the cost of land, rights-of-way, and compensation for damage to properties; the Owner's costs for consulting, legal, accounting, insurance counseling, and auditing services; the Owner's cost for interest and financing charges incurred for the Project; the Owner's internal management costs; and the cost of other services to be provided by others to Owner.

1.47. Work. The entire completed construction or the various separately identifiable parts thereof required to be provided by the Contractor under the Contract Documents to construct the Project. Work includes and is the result of performing or furnishing labor, services (including design services), and documentation necessary to produce such construction and furnishing, installing, and incorporating all materials and equipment into such construction, all as required by the Contract Documents. The scope of the Work also shall include any or all deviations in the Contract Documents required to meet job conditions and to complete the Work in conformance

with the intent of the specific Contract requirements. The Work shall not include activities to be performed, or labor, services, materials, supplies and equipment to be supplied, by Owner hereunder.

1.48. Work Directive. A written directive to the Contractor issued on or after the effective date of the Construction Agreement and signed by Owner, ordering an addition, deletion or revision in the Work, or responding to differing or unforeseen subsurface or physical conditions under which the Work is to be performed or to emergencies. A Work Directive will not change the Contract Sum or the Contract Times but may be issued when the parties expect that the change directed or documented by a Work Directive may be incorporated in a subsequently issued Change Order following negotiations by the parties as to its effect, if any, on the Contract Sum or Contract Times. A Work Directive also may be issued when the Contractor and the Owner are in a dispute as to whether there is a change in the Contract Documents, or whether a change is compensable to the Contractor, or requires a credit to the Owner. In such case, the Work Directive requires the Contractor to proceed with the Work addressed therein, without any determination or evidence of any intent to enter into a Change Order, or right to an increase in the Contract Sum or additional time.

2. THE PRELIMINARY ENGINEERING (STUDY) PHASE

The Engineer shall perform the services listed in this section, unless the service is specifically excluded from the Engineer's scope of services for the Project by the Project-Specific Services section of the Agreement. Unless a service is specifically excluded from the Engineer's scope of services, the omission of a particular service from the list in this section does not excuse the Engineer from performing any regular or normal service necessary to accomplish an effective, efficient, and economical Project within the Standard of Care.

2.1. Complete a Basis of Design Report developing and identifying all necessary disciplines and design criteria for necessary for the Project, such as hydraulic, hydrogeological, geotechnical, structural, civil, architectural, process, electrical, mechanical, environmental, plumbing, and instrumentation and control disciplines or designs.

2.2. Provide calculations and complete hydraulic profiles and any other hydraulic, work required to complete the Project

2.3. Set up, coordinate, and maintain for the duration of the Project a document exchange website using a system acceptable to the Owner for electronic file transfer between the Engineer, the Owner, Contractor, the municipalities in which Project is located, and other parties involved in the Project that require access to Project documents.

2.4. Gather and review all scope of work and background documents including those (if any) provided by the Owner during the Request For Proposal Phase of the project.

2.5. Perform all necessary field investigations and surveying to complete the Basis of Design Report.

2.6. Complete a study and investigation and provide preliminary recommendations regarding easement requirements for the Project and compile this information in the Basis of Design Report.

2.7. Investigate, identify, and describe existing and proposed utilities in the Project vicinity for possible conflict with, and use for, the Project. Provide documentation and proof to Owner that all utility owners potentially impacted by the Project have been contacted. Engineer shall follow-up as needed with non-responsive utility owners and shall obtain the required information. Identify all regulations regarding existing utilities, such as clearance, tolerance, and public notice requirements that may impact the constructability or schedule for the Project.

2.8. Complete all other design standard and code review work for the Project and determine permits necessary to construct it. The Basis of Design Report shall identify and discuss the standards, codes, and regulatory requirements applicable to the Project. It shall also specifically identify and discuss permit requirements that may impact constructability or scheduling of the Project.

2.9. Provide preliminary design drawings, including schematics as required for civil, architectural, structural, process, mechanical, plumbing, instrumentation and control, electrical and any other discipline necessary to complete the Basis of Design.

2.10. Prepare preliminary and final Basis of Design Reports with technical memoranda as required.

2.11. Provide recommendations and analysis for equipment and systems required for the Project.

2.12. Complete all investigations, studies, and other work regarding floodplains and wetlands necessary for the Project.

2.13. Identify and describe potential impacts the Project may have on the environment, community, public and private infrastructure and utilities, and the Owner's other facilities and property. The Engineer shall summarize these impacts and the magnitude of them for each of the design or configuration options being considered for the Project in the Basis of Design Report.

2.14. Engineer shall prepare a Risk Register and shall lead and conduct meetings (the number of which is quantified in the Project-Specific Services section of the Agreement) with parties listed in it for discussion and feedback on the options being considered for the Project. The Risk Register must clearly say how the risks are to be managed during the Project. The Risk Register does not necessarily need to list individual homeowners or residents, but must be specific enough to enable the Owner to identify sets of stakeholders (e.g. "Residents of Foxfire Subdivision").

2.15. Assist Owner in presenting the Project as necessary for approval by governmental agencies with jurisdiction over it, the municipalities the Project is located in, affected municipalities, and any others listed on the Risk Register. Engineer shall lead and conduct up to **six** meetings to provide technical support, and for discussion and feedback on the options being considered for the project. Engineer shall also prepare agenda and meeting minutes for these meetings.

2.16. Prepare an estimated Construction Cost, Total Project Cost, and Construction Time in collaboration with the Owner for the Owner's use in budget preparation and refinement of the Project. The Engineer shall prepare options for the Project to ensure the Total Project Cost stays within the Owner's budget while still achieving the Owner's goals. The estimated Construction Cost, Total Project Cost, and Construction Time for each option being considered for the Project

shall be separately identified in this analysis.

2.17. In the event the Engineer intends to allocate or delegate responsibility for part of the Work's design to the Contractor, the Engineer will discuss the part considered for delegation in the Basis of Design Report. The Engineer shall also identify and perform all necessary investigations, including but not limited to topographic, geologic, geotechnical, hydrogeological, hydraulic, and environmental, to enable the Contractor to meet the same Standard of Care this Agreement imposes on the Engineer. The Engineer will also identify potential impacts the Contractor-designed Work may have on environment, community, public and private infrastructure and utilities, the Owner's other facilities and property, and on the Project and will discuss the Engineer's plan for managing those impacts. Finally, the Engineer will identify the advantages and disadvantages associated with the allocation of responsibility for that part of the Work's design to the Contractor. This work, should the Engineer choose to delegate design to the Contractor, shall serve as a foundation for the Baseline Conditions Assessment Report that must be provided as a Design Phase service for the Owner's Chief Engineer's approval.

2.18. The Engineer shall advise the Owner of other Preliminary Phase services that (i) should be provided if the Engineer is to meet its Standard of Care obligations, or (ii) are reasonably necessary to accomplish the Owner's goals for the Project. In the event the Engineer has determined such additional services are necessary, Engineer shall so notify Owner in writing and receive prior written approval from Owner before proceeding with them. No payment, of any nature whatsoever, will be made to Engineer, for such additional services, without such prior written approval by the Owner, his or her Deputy Commissioners, or the Drainage Board, as applicable. Authorization for such services, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order, issued by Owner, stating the scope of the additional services, and the basis for payment.

2.19. Provide six paper copies in binder format and an electronic PDF of the draft and final Basis of Design Reports compiling the above technical memoranda, including schematic layouts, sketches, design criteria, preliminary facility/equipment sizing and the estimate of probable Construction Cost, Total Project Cost, and Contract Time prior to proceeding with the Design Phase of the project.

3. THE DESIGN PHASE

After completion of the Preliminary (Study) Phase of the Project and upon acceptance of the final Basis of Design Report by the Owner, the Engineer shall perform the services listed in this section, unless the service is specifically excluded from the Engineer's scope of services for the Project by the Project-Specific Services section of the Agreement. Unless a service is specifically excluded from the Engineer's scope of services, the omission of a particular service from the list in this section does not excuse the Engineer from performing any regular or normal service necessary to accomplish an effective, efficient, and economical Project within the Standard of Care.

3.1. Assist Owner as needed in procuring financing for the Project and in developing documents necessary for financing agreements between the Owner and municipal entities affected by the Project.

3.2. Revise and update the final Basis of Design report to reflect any changes that occur during

the Design Phase.

3.3. Review in accordance with Section 10 (on Owner's Responsibilities) the validity and accuracy of information provided by the Owner, such as record drawings from previous projects, previous hydraulic, hydrogeological, geotechnical, and structural models or reports, used in the design of the Project as necessary for the Engineer to comply with terms of this Agreement and the Standard of Care. Advise the Owner in accordance with Section 10 if the Engineer believes additional tests or inspections are necessary to complete the design in accordance with the Standard of Care and the needs of the Project.

3.4. Perform any and all additional investigations, calculations, and modeling not completed during the Preliminary (Study) Phase necessary to complete the design documents.

3.5. Develop a new hydraulic model to predict and analyze the hydraulic behavior of the new facility (water system, sewer system, storm sewer system, drain, etc.) and to determine how it will operate and function in relation to the existing system.

3.6. Update the Risk Register to include all properties (including street address, property tax identification number or Sidwell number, and owner) adjacent to the Project and to the haul routes that will be established for construction of the Project or that could be affected during construction of the Project.

3.7. Finalize recommendations to the Owner concerning easement and right-of-way needs. Show limits of all easements and easement conditions on the plans and/or specifications, including current tax identification (Sidwell) numbers for acreage parcels and lots, lot numbers and street addresses. Surface topography must include all features of natural or man-made origin, subsurface structures and utilities, except house or building connections. The extent of tree and shrub locations, etc. within proposed easements shall be governed by the following conditions:

3.7.1. In landscaped areas, all trees and shrubs shall be identified, located and physically numbered with a numbered metal tag.

3.7.2. In undeveloped field areas, where tree cover is sparse, trees shall be identified, located and physically numbered with a numbered metal tag.

3.7.3. In forested undeveloped areas, the tree area limits shall be outlined, typical tree species and average size shall be identified, and tree coverage density shall be estimated. Further, any tree that is 4" in diameter or larger shall be identified, located and physically numbered with a numbered metal tag.

3.8. Provide a complete design for the proposed work for each system recommended in the Basis of Design Report. Complete design work in the engineering disciplines required to construct the Project including but not limited to geotechnical, hydrogeological, civil/site, architectural and structural, process, mechanical, plumbing, heating ventilating and cooling, electrical, instrumentation/control and SCADA, traffic control and construction route, and soil erosion and sedimentation control (SESC) plan.

3.9. Provide surveying services to design the project including sufficient surveying control and bench marks and coordinates to enable the project to be constructed and staked by the contractor during the Construction Phase. All elevations in the documents shall be based on NAVD 88.

3.10. Provide topographic detail with spot elevations and elevation contours as appropriate for the Project (two-foot vertical intervals).

3.11. Investigate the means of storm drain bypass to facilitate construction of the Project. If bypass design is not being delegated to the Contractor, prepare the design for the means of bypass.

3.12. Investigate the means of sanitary sewer bypass to facilitate construction of the Project. If bypass design is not being delegated to the Contractor, prepare the design for the means of bypass.

3.13. Investigate means of bypass of any and all other existing systems which may require bypassing for construction of the Project including, but not limited to, mechanical, electrical, instrumentation and control, potable and non-potable water systems. If bypass design is not being delegated to the Contractor, prepare the design for the means of bypass.

3.14. Develop a detailed work description and construction sequence for the project to be included with the plans and specifications, as required by the needs of the Project. Engineer shall conduct two separate meetings with WRC Staff to review the proposed work description and construction sequence.

3.15. Develop a detailed and clear sequence of operations/functional intent for the instrumentation and control system/SCADA system to be included with the plans and specifications. Engineer shall conduct two separate meetings to review the functional intent with WRC Staff.

3.16. Provide technical assistance, criteria, written descriptions, application completion services, and design data for Owner's use in securing necessary permits from or approvals of governmental agencies with jurisdiction over any aspect of the Project.

3.17. Identify and assist the Owner in procuring all necessary permits required by governmental authorities with jurisdiction over the Project.

3.18. Submit plans and specifications for the Owner's approval when the Engineer's design for the Project reaches the 30-, 50-, and 90-percent complete milestones. Provide six sets of paper sets of the plans and specifications and electronic PDF at the 30-, 50- and 90-percent design milestones for review by Owner in 24" x 36" format and in half size (12" x 24") format.

3.19. Prepare an estimated Construction Cost, Total Project Cost, and Construction Time at the 50-percent, 90-percent, and final design milestones in collaboration with the Owner for the Owner's use in budget preparation and refinement of the Project.

3.20. Facilitate design meetings with the Owner to review the design at key stages of development and prepare agendas and meeting notes/minutes. The Engineer shall plan to hold a minimum of five meetings: at the start (kick-off), 30-, 50-, 90-percent stages of the design and at final design.

3.21. Secure approval of the construction plans from the appropriate agencies such that the required permits (building, electrical, mechanical, plumbing, ROW, etc.) can be procured by the

construction contractor upon payment of permit fees. Engineer shall attend meetings with the affected municipalities and other agencies when required for this process. Permits and approvals include but may not be limited to:

3.21.1. MDEQ Part 41 Permit for Wastewater Systems;

3.21.2. MDEQ Part 365 Threatened and Endangered Species Permit (Schedule should allow contractor to address tree removal over winter to avoid survey that would be needed to determine if endangered bats are present in the project area. Cost of survey is not included in design fee.);

3.21.3. MDEQ Part 327 Water Withdrawal Permit (Contractor will need to obtain based on dewatering system they determine necessary to address their means and methods.)

3.21.4. MDEQ Part 303 Wetlands Permit;

3.21.5. Oakland County Health Department Dewatering Well Permit. (Contractor will need to obtain based on dewatering system they determine necessary to address their means and methods.);

3.21.6. Soil Erosion and Sedimentation Control Permit;

3.21.7. Building Permit;

3.21.8. Right of Way Permit;

3.21.9. Woodlands Permit;

3.21.10. Planning Commission;

3.21.11. Zoning Board of Appeals; and

3.21.12. Parks and Recreation Commission.

3.22. The Engineer shall revise the preliminary drawings and specifications to conform to comments and requirements of governmental agencies with jurisdiction over the Project. In the event the revisions result from an error or omission of the Engineer, the Engineer shall make the revision at no cost to the Owner.

3.23. Prior to publishing any Drawings or Specifications that delegate design responsibility for part of the Work's design to the Contractor, the Engineer shall develop and present for the Owner's Chief Engineer's approval a separate Baseline Conditions Assessment Study report. The Baseline Conditions Assessment Report shall be a continuation of the related work completed related to delegated design during the Study Phase. The Baseline Conditions Assessment Report shall identify the proposed performance parameters and accurate baseline conditions that the Contractor shall base their design upon. The Engineer will include an assessment of the risk associated with the proposed performance parameters, baseline conditions, and the design options the Contractor is likely to pursue and an assessment of the potential impact each of them will have on the Construction Cost, Total Project Cost, environment, community, and Project.

3.24. The Engineer will determine the criteria for Substantial Completion of the Work,

accounting for Owner-supplied fixtures and equipment, software, and training. The Engineer will also determine the criteria for partial Substantial Completion as it may apply to various components or aspects of the Work, if partial Substantial Completion is part of the Owner's plan for the Project.

3.25. The Engineer shall prepare final Drawings and Specifications that describe a constructible Project.

3.26. The Engineer shall develop a model schedule of values or set of contract line items for payment that accurately identifies discrete Work activities for measurement and payment to the Contractor. The Engineer will develop an Engineer's Estimate of the Construction Cost and of the unit prices for each contract line item or activity based upon the item or activity's estimated cost of labor, materials, equipment plus a reasonable proportionate share of the Contractor's anticipated profit, overhead, and other indirect costs.

3.27. The Engineer shall develop a comprehensive list of submittals based on the Contract Documents of all submittals required to be submitted by the Contractor during construction of the project.

3.28. Final Drawings and Specifications, or other Construction Documents or Construction Contract Documents submitted by Engineer to Owner for review and approval or to any Contractors for bidding or negotiation, shall be complete and unambiguous in accordance with the Standard of Care and shall comply with all applicable Laws and Regulations applicable to the Project. The enactment or revisions of codes, laws or regulations subsequent to the date of this Agreement may be the basis for modifications to Engineer's scope of services, times of performance, or compensation; however the Engineer shall still produce Final Drawings and Specifications that comply with them. By submitting Final Drawings and Specifications, or other Construction Documents for Construction Contract purposes, Engineer acknowledges that Engineer has informed Owner in writing of any tests, studies, analyses or reports that are necessary or advisable to be performed by or for Owner for the successful implementation of the Project.

3.29. Assist Owner in securing bids; attend the pre-bid meeting; prepare minutes for the pre-bid meeting; and issue these minutes as an addendum to the bid documents.

3.30. Prepare additional addendums to the bid documents as needed during the bidding process.

3.31. Provide drawings and specifications as required to potential bidders and maintain an official bidders list.

3.32. Attend the bid opening at Owner's office and analyze bids received and prepare a tabulation of the bids.

3.33. The Engineer shall evaluate and identify bids that contain lump sum or unit prices that do not reflect reasonable actual costs of labor, equipment, materials, plus a reasonable proportionate share of the bidder's anticipated profit, overhead costs, and other indirect costs.

3.34. Coordinate and lead a pre-award meeting and prepare agendas and minutes.

- 3.35.** Provide a written recommendation as to award of the construction contract.
- 3.36.** Provide six bound copies (using three-ring binders) for signature of the contract books and for distribution by the Owner.
- 3.37.** Provide six copies of the final construction plans in D+ (24" x 36") size and six copies in half size (12" x 18") and an electronic PDF of the construction plans and specifications to be used for construction to the Owner.
- 3.38.** The Engineer shall advise the Owner of other Design Phase services that (i) should be provided if the Engineer is to meet its Standard of Care obligations, (ii) would be expected of an Engineer performing Design Phase services competently, or (iii) are reasonably necessary to accomplish the Owner's goals for the Project. In the event the Engineer has determined such additional services are necessary, Engineer shall so notify Owner in writing and receive prior written approval from Owner before proceeding with them. No payment, of any nature whatsoever, will be made to Engineer, for such additional services, without such prior written approval by Owner or his or her Deputy Commissioners or the Drainage Board as applicable. Authorization for such services, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order, issued by Owner, stating the scope of the additional services, and the basis for payment.

4. THE CONSTRUCTION PHASE

The Construction Phase will commence with the execution of the first Construction Contract for the Project or any part thereof and will terminate upon Final Acceptance of the entire project by the Owner. If the Project involves more than one prime contract, Construction Phase services may be rendered at different times in respect to the separate contracts. Otherwise, the Engineer shall perform the services listed in this section, unless the service is specifically excluded from the Engineer's scope of services for the Project by the Project-Specific Services section of the Agreement. Unless a service is specifically excluded from the Engineer's scope of services, the omission of a particular service from the list in this section does not excuse the Engineer from performing any regular or normal service necessary to accomplish an effective, efficient, and economical Project within the Standard of Care.

- 4.1.** Coordinate and lead a pre-construction meeting and prepare agendas and minutes.
- 4.2.** Coordinate and lead bi-weekly progress meetings and other meetings as required during construction and prepare agendas and minutes. Coordinate and lead additional meetings as required by the Contract Documents.
- 4.3.** The Engineer and the Engineer's representatives, employees, or Consultants with expertise in each engineering discipline used in the design of the Work shall visit the Work site as needed, but no less than weekly during construction, to assist the RPR and the Owner's inspector. The Engineer shall observe the quality of the Contractor's Work and shall report any deficiencies observed to the Owner. Engineer shall also maintain a "24/7" access line to immediately address questions that arise in field.
- 4.4.** Furnish consultation and advice to Owner during construction.

4.5. Procure independent construction testing services, including laboratory testing services and field testing services to perform inspections, tests, and approvals of samples, materials and equipment required by the Contract Documents. Engineer shall provide Owner with an appropriate professional interpretation of the results of such inspections, tests and approvals. Such construction and field testing includes the testing of soils, asphalt, pipe, concrete, etc. The cost for these services shall be paid for as an Additional Special Service.

4.6. Receive and review all certificates of inspections, tests, and approvals required by the Contract Documents.

4.7. Review and approve or take other appropriate action with respect to Contractor's suggested alternates, value engineering solutions, and proposals to determine (1) the benefit to the Owner in furtherance of the Project; (2) compliance with applicable laws, statutes, ordinances, codes, orders, rules and regulations in effect as of the date of this Agreement, and (3) conformance with the information given in the Contract Documents and compatibility with the design concept of the completed Project as a functioning whole as indicated in the Contract Documents.

4.8. Review and approve or take other appropriate action with respect to items such as detailed construction, erection and Shop Drawings, product data, samples, submittals, and other data which Contractor is required to submit, but only for determining (1) compliance with applicable laws, statutes, ordinances, codes, orders, rules and regulations in effect as of the date of this Agreement, and (2) conformance with the information given in the Contract Documents and compatibility with the design concept of the completed Project as a functioning whole as indicated in the Contract Documents.

4.8.1. In the event the submittal pertains to a performance specification or to a delegated part of the design, the Engineer will conduct a peer review of the Contractor's design and will ensure the Contractor's design adequately accounts for baseline conditions identified in the Baseline Conditions Assessment Report and the risks previously identified in the Risk Register. Such reviews and approvals or other action will not extend to means, methods, techniques, sequence or procedures of construction or to safety precautions and programs incident thereto. Engineer will review Contractor's submittals in a timely manner to avoid delay in the progress of the Work.

4.9. Ensure Contractor-designed Work is coordinated with the design expressed in the Drawings and Specifications and the Contract Documents. Notwithstanding performance Specifications or delegation of design to the Contractor, the Engineer remains responsible for coordination and integration of all design disciplines.

4.10. Issue necessary clarifications and interpretations of the Contract Documents as appropriate to the orderly completion of the Work. Such clarifications and interpretations will be consistent with the intent of and reasonably inferable from the Contract Documents.

4.11. Review and approve or take other appropriate action with respect to the Contractor's proposed schedule of values, unit prices, or balancing of the Construction Cost across contract line items to ensure unit prices accurately reflect the actual cost of the unit.

4.12. Based on Engineer's observations as an experienced and qualified design professional and on review of Applications for Payment and accompanying supporting documentation, recommend disposition of (i) work directives for changes and extras to the Construction Contract

and (ii) periodic progress and final payments to the Contractor.

4.12.1. Such recommendations of payment will be in writing and will constitute Engineer's representation to Owner, based on such observations and review, that, to the best of Engineer's knowledge, information and belief, the Work has progressed to the point indicated, the quality of the Work is generally in accordance with the Contract Documents (subject to an evaluation of the Work as a functioning whole prior to or upon Substantial Completion, to the results of any subsequent tests called for in the Contract Documents and to any other qualifications stated in the recommendation), and the conditions precedent to Contractor's being entitled to such payment appear to have been fulfilled in so far as it is Engineer's responsibility to observe the Work. Engineer's recommendations of payment will include final determinations of quantities and classifications of Work (subject to any subsequent adjustments allowed by the Contract Documents), and note the relationship of the payment requested to the schedule of values, work completed and materials and equipment delivered at the Site but not incorporated in the Work.

4.12.2. By recommending payment, Engineer shall not thereby be deemed to have represented that observations made by Engineer to check the quality or quantity of the Work as it is performed and furnished have been exhaustive, extended to every aspect of the Work in progress, or involved detailed inspections of the Work beyond the responsibilities specifically assigned to Engineer in the Agreement and the Contract Documents. Neither Engineer's review of the Work for the purpose of recommending payments nor Engineer's recommendation of any payment including final payment will impose on Engineer responsibility to supervise, direct, or control the Work in progress or the means, methods, techniques, sequences, or procedures of construction or safety precautions or programs incident thereto, or Contractor's compliance with laws and regulations applicable to Contractor's furnishing and performing the Work. Similarly, the Engineer's recommendation for payment and the Owner's payment to the Contractor do not constitute acceptance of the Contractor's performance or prevent the Owner from asserting its rights against the Contractor for any deficiency in the Contractor's performance.

4.13. Review and take appropriate action with respect to the Contractor's construction schedules and pace of work. Should the Owner enlist a project scheduling consultant, Engineer shall coordinate its construction schedule reviewing efforts with this consultant.

4.14. In the event the Contractor's performance falls behind a submitted schedule, the Engineer will immediately advise the Owner and Contractor and immediately issue appropriate notice of the nonconformity to the Contractor, which may include a demand for the Contractor's corrective action.

4.15. Work with the Contractor to organize and maintain a document control website acceptable to the Owner for the duration of the Project, as initially established during the Study Phase. The Engineer shall provide the Owner, the municipalities in which Project is located, and other parties involved in the Project that require access to Project documents with complete and continuous access to this system for the duration of the Project.

4.16. Promptly respond to Requests for Information and Requests for Substitution submitted by the Contractor to avoid delaying the Work.

4.17. Determine whether the Work conforms to the Contractor's submittals approved by Engineer and to the requirements of the Contract Documents; immediately advise the Owner and Contractor of all suspected non-conformities; and immediately issue appropriate notice of non-

conformity and demands for correction to the Contractor.

4.18. Prepare required documents and sketches to resolve any differing field conditions encountered.

4.19. Prepare Work Directives, Field Orders, Change Orders, and Bulletins as necessary to ensure the proper performance of the Work and the completion of the Work within the Contract Time.

4.20. Coordinate, witness, and document equipment start-up, facility commissioning, and testing for individual equipment components and systems and for the entire Work as required per the Contract Documents and as outlined in the Owner's Equipment Turnover Flowchart, which Engineer shall incorporate into the Contract Documents.

4.21. Prepare a detailed overall operations and maintenance (O & M) manual for the new facility. Provide six copies of the new O & M manual in three-ring binders and in electronic PDF formats.

4.22. Promptly after notice from Owner or as described in the Contract Documents that Contractor considers the entire Work ready for its intended use, in company with Owner and Contractor, conduct an inspection to determine if the Work is Substantially Complete.

4.23. Prepare and issue documentation to memorialize or certify Substantial Completion or partial Substantial Completion of discrete parts of the Work, as it may apply.

4.24. The Engineer shall prepare all punch lists.

4.25. Prepare final Record Drawings based on mark-ups provided by Contractor, RPR, and Owner's inspector. Furnish Owner with two (2) complete D+ (24" x 36") sets of reproducible Record Drawings and an electronic PDF, and in the latest version of AutoCAD. These items shall be furnished to Owner within 60 calendar days after final payment to the Contractor.

4.26. Promptly after notice from Owner or as described in the Contract Documents that Contractor considers the entire Work has been completed in accordance with the Contract Documents, conduct an inspection to determine if the Contractor has achieved Final Completion.

4.27. Prepare and issue documentation to memorialize or certify Final Completion.

4.28. Perform all duties assigned to the Engineer by the Construction Contract that are not specifically identified in this Agreement.

4.29. The Engineer shall advise the Owner of other Construction Phase services that (i) should be provided if the Engineer is to meet its Standard of Care obligations, (ii) would be expected of an Engineer performing Construction Phase services competently, or (iii) are reasonably necessary to accomplish the Owner's goals for the Project. Should Engineer determine other Construction Phase services should be provided, Engineer shall so notify Owner in writing and receive prior written approval from Owner before performing them. No payment, of any nature whatsoever, will be made to Engineer for such additional services without prior written approval by Owner or his or her Deputy Commissioners or the Drainage Board, as applicable. Authorization for such services, in accordance with this provision of this Agreement, shall be in the form of an

Engineering Work Order, issued by Owner, stating the scope of the additional services, and the basis for payment.

5. ASSET MANAGEMENT SERVICES

The Engineer shall provide the following asset management services:

5.1. Design Phase

5.1.1. The Engineer shall develop a draft Asset Registry for Owner's review and approval as part of the 90-percent complete milestone submittal. The Asset Registry shall be a table listing the assets as defined by the Owner (existing and proposed) associated with the project that will be installed, constructed, replaced, or that will undergo major renovation as part of the proposed Work. The Asset Registry shall include the equipment identifier noted in the Drawings, the asset identifiers (Collaborative Asset Management System (CAMS) Legacy Identifier's (IDs)) provided by the Owner, and various attributes required by the Owner such as equipment nameplate information (phase, volts, amps, horsepower, rpm, etc.), structure physical dimensions, etc.

5.1.2. The Asset Registry shall be developed by the Engineer using the definition of an asset and template(s) provided by the Owner that reflects the required hierarchy, attribution and schema for integration into the Owner's CAMS. The Engineer shall include the final, Owner-approved Asset Registry in the final bid documents.

5.1.3. The Engineer shall develop Process Flow Diagrams of the various systems as applicable for Owner's review and approval at various stages of the design process. These diagrams/drawings shall include all assets that will be newly-constructed, replaced or undergo major renovation as part of the proposed Work. Any related existing assets that will not be modified or replaced as part of the Work shall be included and differentially indicated for reference. The Engineer shall include the final, Owner-approved Process Flow Diagram in the final bid documents.

5.2. Construction Phase

5.2.1. The Engineer shall ensure the Contractor includes the Owner's asset identifiers supplied in the Asset Registry and the corresponding equipment identifier in all required submittals throughout the Project, such as shop drawings, operation and maintenance manuals, spare parts lists, startup reports, and test reports. The Engineer shall provide for the Owner an updated and accurate Asset Registry at the end of the project that includes the as-constructed attribution for all assets. This final Asset Registry shall be provided by the Engineer within 60 calendar days after final payment to the Contractor as part of final record drawing deliverables.

5.2.2. The Engineer shall also update the Process Flow Diagrams and other related documents to reflect the as-constructed arrangement. Related documents include any process control narratives, piping and instrumentation diagrams, and/or loops diagrams that describe the system's operational logic and connection of instrumentation and control devices to the equipment, piping and control systems.

6. CONSTRUCTION SURVEYING, LAYOUT, AND CONSTRUCTION OBSERVATION

These services shall be performed by Engineer only if designated as a Project-Specific Service in the Agreement or upon the specific prior written request of Owner. No payment, of any nature whatsoever, will be made to Engineer, for additional work or services, without such prior written approval by Owner. Authorization for such work or services, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order, issued by Owner, stating the scope of the additional work, and the basis for payment. Those services are as follows:

6.1. Provide construction surveying layout, including staking and re-staking to establish such lines, points, grades and benchmarks as necessary to locate and control construction in accordance with the construction plans.

6.2. Provide easement document preparation, negotiate with land owners, and prepare estimates of the cost to procure and maintain necessary easements.

7. RESIDENT PROJECT REPRESENTATIVE (RPR)

This service shall be performed by Engineer only if designated as a Project-Specific Service in the Agreement or upon the specific prior written request of Owner. No payment, of any nature whatsoever, will be made to Engineer, for additional work or services, without such prior written approval by Owner. Authorization for such work or services, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order, issued by Owner, stating the scope of the additional work, and the basis for payment.

7.1. General.

7.1.1. With the understanding that Owner has not designated a representative from its own staff to perform a similar observation function, provide the services of a Resident Project Representative (RPR) and/or inspector(s), on a full time basis or part time basis as designated by Owner, to provide more continuous and extensive observations of the Work.

7.1.2. RPR is Engineer's agent at the Site, will act as directed by and under the supervision of Engineer, and will confer with Engineer regarding RPR's actions. RPR's dealings in matters pertaining to the on-site Work shall in general be with Engineer and Contractor, keeping Owner advised as necessary.

7.1.3. Through more extensive on-site observations of the Work in progress and field checks of materials and equipment by the RPR and assistants, Engineer shall endeavor to provide further protection for Owner against defects and deficiencies in the Work of the Contractor, observe and monitor the proper progress and quality of the Work, and determine if such Work is proceeding in accordance with the Contract Documents. However, Engineer shall not, during such visits or as a result of such observations of the Work in progress, supervise, direct, or have control over the Work nor shall Engineer have authority over or responsibility for the means, methods, techniques, sequences or procedures selected by Contractor, nor for safety precautions and programs incident to the Work. While Engineer shall not be responsible for the acts or omissions of any Contractor, or any subcontractor, any supplier, or of any other person or organization performing or furnishing any of the Work, Engineer shall not knowingly permit the Work of such persons or organizations to deviate from the requirements of the Contract Documents.

7.2. Duties and Responsibilities of RPR**7.2.1. Schedules.**

7.2.1.1. Review the progress schedule, schedule of Shop Drawings submittals and schedule of values prepared by Contractor and consult with Engineer concerning their quality and conformance to the Contract Documents. Based on the information obtained during such visits and such observations, the RPR shall keep Engineer and Owner informed of the progress of the Work.

7.2.2. Conferences and Meetings.

7.2.2.1. Attend meetings with Contractor, such as pre-construction conferences, progress meetings, job conferences and other Project-related meetings, and prepare and circulate copies of minutes thereof.

7.2.3. Liaison.

7.2.3.1. Serve as Engineer's liaison with Contractor, working principally through Contractor's superintendent and assist in understanding the intent of Contract Documents; and assist Engineer in serving as Owner's liaison with Contractor when Contractor's operations affect Owner's on-site operations.

7.2.3.2. Assist in obtaining from Owner additional details or information, when required for proper execution of the Work.

7.2.4. Shop Drawings and Samples.

7.2.4.1. Record date of receipt of Shop Drawings and Samples.

7.2.4.2. Receive Samples which are furnished at the Site by Contractor, and notify Engineer of availability of Samples for examination.

7.2.4.3. Advise Engineer and Contractor of the commencement of any work requiring a Shop Drawing or Sample if the submittal has not been approved by Engineer.

7.2.4.4. Determine whether the Work conforms to the Contractor's submittals approved by Engineer and to the requirements of the Contract Documents; immediately advise the Owner and Contractor of all suspected non-conformities; and immediately issue appropriate notice of non-conformity and demands for correction to the Contractor.

7.2.5. Review of Progress, Work, Rejection of Defective Work, Inspections, and Tests.

7.2.5.1. Conduct on-site observations of the Work in progress to assist Engineer in determining if the Work is in general proceeding in accordance with the Contract Documents.

7.2.5.2. Report to Engineer whenever RPR believes that any Work will not be completed within the durations set forth in Contractor's schedule or within the Contract Time; advise Engineer of potential corrective measures; and assist with notice of non-conformity to the Contractor regarding

its progress and with appropriate demand for corrective action.

7.2.5.3. Report to Engineer whenever RPR believes that any Work will not produce a completed Project that conforms generally to the Contract Documents or will prejudice the integrity of the design concept of the completed Project as a functioning whole as indicated in the Contract Documents, or has been damaged, or does not meet the requirements of any inspection, test or approval required to be made; and advise Engineer of Work that RPR believes should be corrected or rejected or should be uncovered for observation, or requires special testing, inspection or approval.

7.2.5.4. Verify that tests, equipment and systems start-ups and operating and maintenance training are conducted in the presence of appropriate Owner's personnel and that Contractor maintains adequate records thereof; and observe record and report to Engineer appropriate details relative to the test procedures and start-ups.

7.2.5.5. Accompany visiting inspectors representing public or other agencies having jurisdiction over the Project, record the results of these inspections and report to Engineer.

7.2.6. Interpretation of Contract Documents.

7.2.6.1. Report to Engineer when clarifications and interpretations of the Contract Documents are needed and transmit to Contractor clarifications and interpretations as issued by Engineer.

7.2.7. Modifications.

7.2.7.1. Consider and evaluate Contractor's suggestions for modifications in Drawings or Specifications and report with RPR's recommendations to Engineer. Transmit to Contractor in writing decisions as issued by Engineer.

7.2.8. Records.

7.2.8.1. Maintain at the Site orderly files for correspondence, reports of job conferences, Shop Drawings and Samples, reproductions of original Contract Documents including all Work Change Directives, Addenda, Change Orders, Field Orders, and additional Drawings issued subsequent to the execution of the Contract. Engineer's clarifications and interpretations of the Contract Documents, progress reports, Shop Drawing submittals received from and delivered to Contractor and other Project related documents.

7.2.8.2. Prepare a daily report or keep a diary or log book, recording Contractor's hours on the job site, weather conditions, data relative to questions of Work Change Directives, Change Orders or changed conditions, list of job site visitors, daily activities, decisions, observations in general, and specific observations in more detail as in the case of observing test procedures; and send copies to Engineer.

7.2.8.3. Record names, addresses and telephone numbers of all Contractors, subcontractors and major suppliers of materials and equipment.

7.2.9. Reports.

7.2.9.1. Furnish to Engineer daily reports as required of progress of the Work and of Contractor's compliance with the progress schedule and schedule of Shop Drawing and Sample submittals.

7.2.9.2. Consult with Engineer in advance of scheduled major tests, inspections or start of important phases of the work.

7.2.9.3. Report immediately to Engineer and Owner the occurrence of any accident.

7.2.10. Completion.

7.2.10.1. Before Engineer issues a Certificate of Substantial Completion, submit to Contractor a list of observed items requiring completion or correction.

7.2.10.2. Observe whether Contractor has performed inspections required by laws, rules, regulations, ordinances, codes, or orders applicable to the Work, including but not limited to those to be performed by public agencies having jurisdiction over the Work.

7.2.10.3. Conduct a final inspection in the company of Engineer, Owner, and Contractor and prepare a final list of items to be completed or corrected.

7.2.10.4. Observe whether all items on final list have been completed or corrected and make recommendations to Engineer concerning acceptance and issuance of the notice of acceptability of the Work.

7.3. Limitations on RPR's Authority.

The Resident Project Representative **shall not**:

7.3.1. Authorize any deviation from the Contract Documents or substitution of materials or equipment (including "or-equal" items), unless authorized by Engineer and approved by Owner.

7.3.2. Exceed limitations of Engineer's authority as set forth in the Agreement or the Contract Documents.

7.3.3. Undertake any of the responsibilities of Contractor, Subcontractors, Suppliers, or Contractor's superintendent.

7.3.4. Advise on, issue directions relative to or assume control over any aspect of the means, methods, techniques, sequences or procedures of construction unless such advice or directions are specifically required by the Contract Documents or unless absent such advice, any work will not produce a completed Project that conforms generally to the Contract Documents or will prejudice the integrity of the design concept of the completed Project as a functioning whole as indicated on the Contract Documents.

7.3.5. Advise on, issue directions regarding or assume control over safety precautions and programs in connection with the Work. However, if RPR observes and recognizes a life-threatening situation arising from the Work, as the Owner's representative, RPR shall have the authority to stop the progress of the Work to protect the safety of any persons, or to protect against property damage. Engineer shall not be responsible for any Contractor delay claims as a result of issuing such directive(s), unless such claims arise out of or relate to a negligent act, error or

omission of Engineer or its RPR.

7.3.6. Accept Shop Drawing or Sample submittals from anyone other than Contractor.

7.3.7. Participate in specialized field or laboratory tests or inspections conducted by others except as specifically authorized by Engineer.

8. ENGINEERING REDESIGN

8.1. The Owner shall have the right to disapprove any portion of Engineer's services on the Project, including, but not limited to, preliminary design phase documents, final design phase documents or Construction Documents, on any reasonable basis, or because in Owner's opinion, the Total Project Cost or the Construction Cost of such design is likely to render the Work or the Project not feasible. In the event any phase of Engineer's services is not approved by Owner, Engineer shall proceed, when requested by Owner, with revisions to the design or documents prepared for that phase to address Owner's objections. These revisions will be made without adjustments to the compensation provided for hereunder, unless revisions are made to Drawings provided under previous phases, and which were accepted by Owner, in which case such revision services shall be paid as an Additional Special Service. Owner may consider Engineer's request for an equitable adjustment in compensation where changes to the design of the Project do not result in a change in Construction Cost.

8.2. Should there be substantial revisions to the Project after the approval of the Drawings, which changes substantially increase the scope of design services to be furnished hereunder, Engineer shall so notify Owner in writing and receive prior written approval from Owner, before proceeding with revisions necessitated by such changes. No payment, of any nature whatsoever, will be made to Engineer, for additional work or services, without such prior written approval by Owner's Chief Engineer or the Engineer assigned to the Project by Owner. Authorization for engineering redesign or revisions to the Drawings and Specifications, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order, issued by Owner, stating the scope of the additional services, and the basis for payment.

9. ADDITIONAL SPECIAL SERVICES

9.1. Engineer shall provide Additional Special Services on an as needed basis upon specific prior written request of Owner. No payment, of any nature whatsoever, will be made to Engineer, for additional work or services, without such prior written approval by Owner. Authorization for such work or services, in accordance with this provision of this Agreement, shall be in the form of an Engineering Work Order, issued by Owner, stating the scope of the additional work, and the basis for payment. The following are generally considered to be additional services:

9.1.1. Development of detailed shop drawings for special structure, mill, shop and/or laboratory inspection of materials and equipment.

9.1.2. Land surveys, establishment of boundaries and monuments, and related office computations pertaining to the land acquisition and easement descriptions or for other reasons.

9.1.3. Photogrammetry, if the necessity is confirmed by Owner and by Engineer.

9.1.4. Additional copies of reports and Contract Documents above the number specified to be furnished herein.

9.1.5. Assistance in connection with Bid protests, re-bidding or renegotiating contracts for construction, materials, equipment or services, provided that such assistance is necessitated as a result of some action or inaction on the part of Owner.

9.1.6. Assistance to Owner for preparation or appearance as an expert witness in litigation arising from the development or construction of the Project, unless the Claim relates to Engineer's acts, errors or omissions, in which case the Engineer shall assist the Owner at no additional cost.

9.1.7. Preparation of applications and supporting documents for government grants or advances for public works projects, i.e. SRF Funding.

9.1.8. Environmental studies and/or reports, additional engineering, etc., as may be required by the MDEQ or other governmental entities as part of their permitting process.

9.1.9. Any other services resulting from significant changes in the scope, extent or character of the portions of the Project designed or specified by Engineer or its design requirements when such changes are issued as a result of some action or inaction on the part of Owner, including, but not limited to, changes in size, complexity, Owner's schedule, character of construction or method of financing; and revising previously accepted studies, reports, Drawings, Specifications or Contract Documents when such revisions are required by changes in laws, rules, regulations, ordinances, codes or orders enacted subsequent to the preparation of such studies, reports, drawings, specifications, or Contract Documents, or are due to other causes beyond Engineer's control.

9.2. Notwithstanding anything to the contrary expressed elsewhere in the Agreement, no additional or other engineering services made necessary by any fault or omission of Engineer to properly perform its professional services in conformance with the Standard of Care shall be compensated as an Additional Special Service under this Agreement. In the event that Engineer's negligent acts, errors or omissions are determined by the final and unappealable ruling of a tribunal having jurisdiction of the claims not to be the sole cause for such additional or other engineering services, Engineer shall receive compensation only for those services which are not attributable to its negligent acts, errors or omissions.

10. OWNER'S RESPONSIBILITIES

10.1. The Engineer may use and rely upon information provided by the Owner in performing the Engineer's services under the Agreement; however, the Engineer shall critically review that information and determine it is sufficiently accurate or valid to support the Engineer's services. Nothing contained herein shall relieve Engineer of its responsibility to review any such information received from the Owner and to recommend verification when such verification would be appropriate for Engineer to perform its duties in accordance with the Standard of Care. The information or services provided by the Owner shall not, under any circumstances, be a substitute for or relieve Engineer of any responsibility or expense for the services or its duties to render services pursuant to this Agreement in accordance with the Standard of Care.

10.2. Should the Engineer discover deficiencies or inaccuracies in the information provided by the Owner, the Engineer shall immediately notify the Owner and shall determine the additional verification or services that are necessary to correct or address the deficiency or inaccuracy.

10.3. In the event the Engineer believes the Owner has failed to meet the Owner's obligations under this Agreement, the Engineer will give the Owner written notice of the failure within seven days of its occurrence, after which time the Owner shall have a reasonable time to cure the event or condition complained of. The Engineer's failure to give written notice in accordance with this paragraph shall operate as a release and waiver of the Engineer's right to seek damages from the Owner for the event or condition.

11. ADDITIONAL TERMS AND CONDITIONS**11.1. Standard of Care**

11.1.1. The services to be provided by Engineer include the professional discipline and expertise necessary to achieve the Project in the best interest of the Owner, its constituents, and the budget established for this purpose. The Engineer understands the Owner places trust and confidence in it and therefore accepts the fiduciary responsibilities imposed by this Agreement.

11.1.2. Engineer shall adhere to its duty as a licensed professional Engineer to protect the health, safety, and welfare of the public.

11.1.3. All services hereunder shall be performed by employees, agents, and Consultants of Engineer who are experienced and suitably skilled in their profession. The Engineer's services shall meet or exceed the professional skill and care ordinarily provided by Engineers and consultants practicing in the same profession, in the same or similar locality, under the same or similar circumstances.

11.1.4. Furthermore, the Engineer understands the Owner's goal of managing and mitigating risks imposed by the Project. The Engineer shall identify potential impacts each part of the Project may have on the surrounding environment and community and shall advise the Owner of those impacts.

11.1.5. The Owner relies on the experience and expertise of the Engineer to design a Project that effectively meets the Owner's goals and objectives. The Engineer understands those goals and objectives, will assist the Owner in refining or revising them when necessary, and will provide

services that enable the Owner to achieve them.

11.1.6. The Engineer will advise the Owner of additional services that should be obtained or provided for the success of the Project, including services that are necessary to quantify or mitigate the impact of the Project on the surrounding environment and community and necessary to quantify or reduce the Construction Cost or Total Project Cost.

11.1.7. The Engineer will comply with all legal requirements applicable to the Project. Similarly, the Engineer represents, warrants and covenants that its services are in and will be in compliance with all applicable federal, state, and local laws, regulations and rules governing the project. The Engineer, its staff, and its Consultants will maintain, at their own expense, all licenses and certifications necessary to perform the services required by this Agreement.

11.2. Technical Accuracy

11.2.1. The Engineer shall be responsible for the technical accuracy of its services and documents resulting therefrom and Owner shall not be responsible for discovering deficiencies therein. Engineer shall correct any deficiencies without additional compensation. The Engineer shall be responsible for the professional quality, technical accuracy, and coordination of all Drawings, Specifications, baseline condition studies and reports, and design documents used on the Project, regardless of whether such Drawings, Specifications or other design documents are prepared by Engineer or by Engineer's Consultants.

11.2.2. The Engineer's Drawings, Specifications and design documents will describe constructable Work and will describe a completed Project that complies with all applicable federal, state, and local laws, regulations, standards, and rules. If preliminary or design development design services or geotechnical investigations have been performed by others engaged by Engineer, Engineer is nevertheless fully responsible for and accepts full responsibility for such earlier services when Engineer performs subsequent phases of the services called for under this Agreement, as fully as if such services had been performed by Engineer itself. Engineer shall be responsible for coordination and internal checking of all Drawings and for the accuracy of all dimensional and layout information contained therein, as fully as if each Drawing were prepared by Engineer. Such review and responsibility does not extend to confirming or checking the accuracy of manufacturer's specifications or product data.

11.2.3. The Engineer will affix its professional endorsement (seal) upon all designs, Drawings, Specifications, estimates, and engineering data furnished to the Owner and will comply with all requirements of 1980 PA 299 Article 20, MCL 339.2001 through 399.2014.

11.2.4. In the event the Contract Documents impose design responsibility on the Contractor for part of the Work, the Engineer will nevertheless be responsible for coordinating and integrating the Contractor's design with the Engineer's designs. The Engineer will also perform sufficient review of the Contractor's design to ensure it meets the Standard of Care established by this Agreement and does not expose the Owner and those listed on the Risk Register to a greater degree of liability or harm than originally described in the Engineer's initial risk assessment.

11.2.5. All questions that may arise concerning the quality, acceptability, timeliness, or satisfactory performance of the Engineer's services shall be decided by the Owner, subject to the dispute resolution procedures in the Agreement.

11.3. Consultants

11.3.1. The Engineer may retain such Consultants as it reasonably deems necessary to assist in the performance of its duties under this Agreement. The Engineer must submit the name, qualifications, cost, and proposed scope of work for each Consultant to the Owner for the Owner's prior review and approval. The Engineer shall not retain a Consultant to which the Owner has made a reasonable objection. The Engineer is not obligated to retain a Consultant that has been recommended by the Owner to which the Engineer has made a reasonable objection.

11.3.2. The Engineer shall be responsible to the Owner for the acts and the omissions of the Engineer's Consultants. The Engineer shall require each Consultant, to the extent of the services to be performed by it, to be bound to the Engineer by terms of this Agreement, and to assume toward the Engineer all the obligations and responsibilities that the Engineer assumes toward the Owner, including, but not limited to, the Standard of Care, insurance requirements, ownership of intellectual property, and participation in dispute resolution proceedings. Each consulting agreement shall preserve and protect the rights of the Owner to enforce its rights and remedies against the Consultant as a third-party beneficiary.

11.3.3. Engineer shall bear full responsibility under this Agreement for all services of its Consultants, including, without limitation, such Consultant's negligent errors and omissions and failure to comply with applicable Laws and Regulations and the applicable Standard of Care.

11.4. Time for Performance

11.4.1. Time is of the essence in the performance of the Engineer's services. The Engineer agrees to perform its services expeditiously, with professional skill and care necessary to ensure the orderly and timely progress of the Project. The Engineer will comply with any scheduling requirements that are provided in writing by the Owner.

11.5. Payment

11.5.1. The Engineer will comply with the Owner's standard billing procedures governing submittal and timing of invoicing. In all cases, the Engineer's invoices shall include documentation required by the Owner to support the Engineer's request for payment, such as time sheets, employee classifications, hours worked, hourly rates, and a breakdown showing mark-ups, overhead rate, and profit, and invoices from vendors and Consultants.

11.5.2. The Engineer shall submit with its invoice a written narrative summary of all work performed during the billing period.

11.5.3. The Engineer shall keep full and detailed records and accounts related to the cost of its services and exercise such controls as may be necessary for proper financial management under this Agreement and to substantiate all costs incurred. The accounting and control systems shall be satisfactory to the Owner.

11.5.3.1. The Owner and the Owner's auditors shall, during regular business hours and upon reasonable notice, be afforded access to, and shall be permitted to audit and copy, the Engineer's records and accounts, including complete documentation supporting accounting entries, books, correspondence, e-mails, letters, memos, instructions, drawings, receipts, Consultant agreements, Consultants' proposals, purchase orders, vouchers, memoranda and other data

relating to this Agreement.

11.5.3.2. The Engineer shall preserve these records for a period of three years after final payment, or for such longer period as may be required by governmental agencies providing financing for the Project.

11.5.3.3. The Engineer will compensate the Owner for all errors in billing and payment to the Engineer.

11.6. No Waiver of Rights

11.6.1. Owner's review, approval, acceptance of, or payment for any of the services required under the Agreement shall not be construed to operate as a waiver by Owner of the rights under the Agreement or of any cause of action arising out of the performance of the Agreement by the Engineer.

11.6.2. Notwithstanding any other provision in this Agreement, no provision in this Agreement is intended, nor shall any such provision be construed, as either waiving or constituting a waiver of any public or governmental immunity afforded to the Owner, and/or Owner's agents, employees, representatives as provided by applicable statutes and/or court decisions.

11.7. Response to Claims

11.7.1. The Engineer shall assist and cooperate with the Owner in the investigation of, response to, and defense of any Claims occurring on or arising out of the Project, whether those Claims are in the formal or informal stages or proceedings.

11.7.2. In the event the Claim arises out of, is related to, or is connected with, in whole or in part, the Engineer's activities under this Agreement, the Engineer shall support the Owner's response by providing access to documents and witnesses, by providing requested analysis of the Claim, and by providing the Owner with a defense to the Claim, whether that defense is provided by Engineer's insurance carrier or at Engineer's own expense. The Engineer shall reimburse the Owner for attorney fees and Consultant costs the Owner incurs for such Claims.

11.7.3. Notwithstanding the above, Engineer's reimbursement obligation for Owner's attorney fees, only, and not otherwise covered and paid by Engineer's professional liability insurance, shall be limited to 15% of Engineer's design fee for services under this agreement.

11.7.3.1. Engineer shall be obligated to pay no more than its proportionate share of any damages awarded to a third party in a final and unappealable ruling of a court having jurisdiction of the Claim(s) for which the court has determined that the Owner and/or Owner's agents, employees, or representatives caused, in whole or in part, such damages because of their negligence or fault.

11.7.3.2. To the extent that the Owner is found negligent or at fault, the Engineer shall be reimbursed for those costs associated with the defense of the Owner in a percentage consistent with the Owner's degree of fault as determined by the court.

11.8. Default

11.8.1. If Engineer at any time: A) fails to meet the Standard of Care; B) fails to prosecute its

services with promptness and diligence; C) causes delay or in any way interferes with the progress of the Work or the Project, D) fails to pay its Consultants or vendors; or, E) fails to perform any obligation imposed by this Agreement, the Owner may declare the Engineer to be in default and take any action the Owner deems expedient or necessary to remedy the default, including, but not limited to, suspension of payment or performance of the Engineer's services itself or with another Engineer or Consultant. The Owner will endeavor to give the Engineer an opportunity to cure the default if, in the Owner's sole opinion, the Engineer can cure the default without harm to the Project.

11.8.2. The Owner may deduct the costs it incurs as a result of the default (including internal staff costs and attorney and professional fees) from any money then due or thereafter to become due to Engineer under this Agreement. The Engineer's default under this Agreement shall operate as a cross-default under any other agreement between the Engineer and the Owner and shall entitle the Owner to suspend payments otherwise due to the Engineer under those other agreements. In the event of default, Engineer shall not be entitled to receive any further payment until the services have been wholly finished or the defaults have been cured. If the expense of finishing the services, correcting the defaults, and correcting the consequences of the defaults exceeds the unpaid balance due to Engineer under this Agreement, then Engineer shall pay the difference to the Owner. Failure by the Owner to exercise the options contained in this paragraph shall in no way prejudice or limit the Owner's right to pursue damages for Engineer's breach of this Agreement.

11.9. Suspension and Termination

11.9.1. The Owner may suspend the Project for its convenience for a period of 180 days. The Engineer will be equitably compensated for actual costs it incurs as a proximate result of the suspension, provided the Engineer has not caused or contributed to the Owner's need to suspend the Project. The parties may mutually agree to a suspension that exceeds 180 days.

11.9.2. The obligation to provide further services under this Agreement may be terminated for cause:

11.9.2.1. By the Owner upon seven days' written notice in the event of substantial failure by the Engineer to perform an obligation imposed by this Agreement.

11.9.2.2. By the Engineer upon seven days' written notice if Engineer believes that Engineer is being requested by Owner to furnish or perform services contrary to Engineer's responsibilities as a licensed professional; or upon seven days' written notice if the Engineer's services for the Project are stopped or suspended for more than 180 days for reasons unrelated to the Engineer.

11.9.2.3. Notwithstanding the foregoing, this Agreement will not terminate as a result of such substantial failure if the party receiving such notice begins, within seven days of receipt of such notice, to correct its failure to perform and proceeds diligently to cure such failure within no more than 30 days of receipt thereof; provided, however, that if and to the extent such substantial failure cannot be reasonably cured within such 30-day period, and if such party has diligently attempted to cure the same and thereafter continues diligently to cure the same, then the cure period provided for herein shall extend up to, but in no case more than, 60 days after the date of receipt of the notice.

11.9.3. The Owner may terminate this Agreement for its convenience upon seven days written

notice to the Engineer, without regard to any fault or failure to perform by any party.

11.9.4. Compensation to Engineer in the event of termination:

11.9.4.1. If the termination is for the convenience of Owner, compensation of Engineer shall be made in accordance with the specific provisions of the Agreement, but the Engineer will not be paid for unperformed services, poorly performed services, or anticipated profit on unperformed services.

11.9.4.2. If the termination is due to the failure of Engineer to fulfill its contractual obligations, including, without limitation, substandard performance by Engineer, or careless, or negligent, or incompetent, or deficient services by Engineer, Owner may take over the work and prosecute the same to completion by contract or otherwise and Owner shall be compensated by Engineer for any losses, costs or additional expenses (including, without limitation, legal fees and expenses and internal engineering time and expenses) it incurs by virtue of termination and alternative completion of the work.

11.9.5. Upon receipt of a termination notice, whether for cause or the convenience of Owner, the Engineer shall immediately discontinue all services affected (unless the notice directs otherwise), deliver to Owner copies of all data, Drawings, Specifications, reports, estimates, summaries, and such other information and materials as may have been accumulated by Engineer in performing this Agreement whether completed or in process, assign to Owner any subcontracts, purchase orders or other agreements which Owner requests, and perform any other services upon termination as required in other provisions of this Agreement.

11.9.6. Termination of the Engineer only relieves it of the duty to perform work; all other obligations imposed by this Agreement, such as cooperation and indemnification, continue.

11.10. Cooperation With Successor Engineer

11.10.1. In the event of a termination under this Agreement, Engineer consents to Owner's selection of another Engineer of Owner's choice to assist Owner in any way in completing the Project. Engineer further agrees to cooperate and provide any information requested by Owner in connection with the completion of the Project and consents to and authorizes the making of any reasonable changes to the design of the Project by Owner and such other Engineer as Owner may desire. Engineer shall not be held responsible for any changes made to the design of the Project by its successor. Any services provided by Engineer which are requested by Owner after termination shall be fairly compensated by Owner.

11.11. Ownership of Documents

11.11.1. Unless Engineer is in default under this Agreement, at such time as 90 percent of full compensation has been paid to Engineer for its Study and Design Phase services, all original design drawings and specifications prepared or created by Engineer pursuant to this Agreement or any obligation hereunder, shall be deemed Works for Hire and become the exclusive property of Owner. Until such time, original Drawings and Specifications are the property of Engineer; however, because the Project is the property of the Owner, Engineer may not use the Drawings and Specifications therefor for any purpose not related to the Project without Owner's consent. Owner shall be furnished with such reproductions of Drawings and Specifications as Owner may reasonably require.

11.11.1.1. Upon completion of the Work or any earlier termination of this Agreement, Engineer will revise Drawings to reflect changes made during construction and it will promptly furnish Owner with two complete D+ (24" x 36") sets of reproducible Record Drawings and an electronic PDF, and in the latest version of AutoCAD. Prints shall be furnished, as an Additional Special Service if requested by Owner, at any other time prior to completion of the Work. Owner

11.11.2. All Drawings and Specifications shall be the property of Owner who may use them without Engineer's permission for any proper purpose relating to the Project, including, but not limited to, additions to or completion of the Project.

11.11.2.1. Any use or modification of the Drawings and Specifications after Final Completion by the Owner without written verification or adaptation by Engineer will be at Owner's sole risk and without liability or legal exposure to Engineer or to Engineer's Consultants. The Owner shall defend and hold harmless the Engineer and the Engineer's Consultants from all claims, damages, losses and expenses arising out of or resulting from such unauthorized use or modifications.

11.11.3. The Owner shall be entitled to a copy of all data, analysis, work sheets, designs, Drawings, survey notes, field notes, e-mails, memos, letters, or any other information or document developed by the Engineer in the performance of this Agreement or used in preparation of the Drawings and Specifications. The Engineer shall retain such items 10 years and upon request furnish copies of the same to Owner.

11.11.4. Any computer programs or modifications to a program for the specific benefit of Owner shall become the property of Owner. Any and all documentation pertaining to any program or modification for the specific benefit of Owner shall be surrendered to and become the property of Owner.

11.11.5. Owner shall be provided with a copy of the source code and script for any programs provided which are critical to the operation of the system.

11.11.6. Any computer services or products requiring the use of pre-existing or proprietary computer programs or software of the Engineer, shall, upon request, be provided for the Owner's use in effecting completion of the specific objectives of this Agreement and for use by Owner in operating and maintaining the Project during its useful life.

11.11.7. Notwithstanding any other provisions of this Agreement, all of Engineer's pre-existing or proprietary computer programs or software developed by Engineer outside of this Agreement shall remain the exclusive property of Engineer.

11.12. Insurance

11.12.1. Engineer will, at no cost to the Owner, obtain and maintain for the duration of this Agreement the following insurance coverages with insurance companies licensed to do business in the State of Michigan. The Engineer will further maintain coverages required by this Agreement for a period of six years following the completion of the Project, to the extent such insurance coverage is commercially available. All such insurance obtained by the Engineer shall be non-cancelable by endorsement without 30 days prior to written notice to the Owner. The Engineer will provide certificates of insurance, endorsements, and copies of insurance policies to the Owner

upon execution of this Agreement. The Engineer will not engage or employ any Consultant who does not maintain the insurance coverages required by this Agreement. The Engineer will provide the Owner certificates of insurance and endorsements that establish its Consultants are maintaining the insurance coverages required under this Agreement.

11.12.1.1. Professional Liability/Errors and Omissions Coverage in the minimum amount of **(\$5,000,000)** per occurrence/claim and aggregate.

11.12.1.2. Commercial General Liability policy (New ISO Designation) in the minimum amount of **(\$3,000,000)** combined single limit per occurrence and aggregate, including contractual liability recognizing this contract.

11.12.1.3. In the event the Engineer provides on-site services, such as construction surveying, layout, observation, or RPR services, the Engineer shall procure an endorsement to its Commercial General Liability policy naming the County of Oakland, Michigan, Owner, and the drainage district, as applicable, and its or their elected and/or appointed officials employees and agents, as additional insureds, with coverage for completed operations. The Engineer's insurance shall be primary and non-contributory.

11.12.1.4. Comprehensive Automobile Liability policy to cover bodily injury and property damage arising out of the ownership, maintenance or use of any motor vehicle owned, non-owned or hired vehicles in the minimum amount of **(\$1,000,000)** combined single limit per occurrence. No fault coverage complying with the statutory requirements of the State of Michigan is also required.

11.12.1.5. Workers' Compensation Insurance including Employer's Liability to cover employee injuries or disease compensable under the Workers' Compensation statutes of the State of Michigan and the states in which work is conducted under the Agreement, disability benefit laws, if any; or federal compensation acts such as U.S. Longshoremen or Harbor Workers, Maritime Employment, or Railroad Compensation Act(s), if applicable. Self-insurance plans approved by the regulator authorities in the state in which Work on the Project is performed and the State of Michigan are acceptable. Employee's liability coverage shall be in the minimum amount of **(\$500,000)** per occurrence.

11.12.2. In the event the Owner establishes an Owner controlled insurance program (OCIP), the Engineer will enroll and participate in the program.

11.13. Indemnification

11.13.1. Engineer shall be liable to Owner in accordance with applicable law for all damages to Owner caused in whole or part by the Engineer's and Engineer's Consultants' acts, errors, or omissions in the performance of any of the services furnished under the Agreement or breach of this Agreement.

11.13.1.1. Engineer agrees to indemnify, defend, and hold harmless the Owner and Owner's agents, employees, and representatives against any and all Claims, loss, liability, damages, costs, and expenses, including, but not limited to, all fees and charges of Engineers, architects, attorneys and other professionals, all internal engineering and other time and expenses incurred by Owner using its own staff, and all court or other dispute resolution costs, that arise out of and to the extent caused by the acts, errors, or omissions of the Engineer, its agents, Consultants, employees or representatives, regardless of whether or not such Claim, loss, liability, damage,

cost, or expense is caused or contributed to, in part, by a party hereunder. However, the Engineer shall not be required to indemnify or hold harmless the Owner or other indemnified parties for their sole negligence or breach of this Agreement.

11.13.2. The Engineer shall pay all costs incurred by the Owner to enforce this indemnification obligation, including, but not limited to, the Owner's internal staff costs and its attorney fees.

11.13.3. Engineer shall have no rights against the Owner for indemnification, contribution, subrogation, or reimbursement under any theory except as expressly provided herein.

11.14. Dispute Resolution

11.14.1. Claims and disputes between the Owner and Engineer shall be resolved by litigation in the Circuit Court for Oakland County, Michigan (a court Engineer agrees has personal jurisdiction over it and is a convenient venue) unless the Owner, at its sole option, elects to have the Claim or dispute resolved in a different venue (such as the Michigan Court of Claims) or by arbitration. The Engineer shall be bound by the Owner's election, and any litigation already commenced shall be transferred to the Owner's chosen venue or stayed pending the conclusion of the arbitration proceedings.

11.14.2. If the Owner elects arbitration, the proceeding, unless the parties agree otherwise, shall be conducted in accordance with the American Arbitration Association's Construction Industry Arbitration Rules then in effect. The Owner, at its sole discretion, may consolidate an arbitration conducted under this provision with any other arbitration to which it is a party, provided the arbitrations to be consolidated involve common questions of law or fact. The Owner may also, at its sole discretion, include by joinder persons or entities involved in a dispute with a common question of law or fact such as the Contractor or an insurer. This agreement to arbitrate with the Owner and others shall be specifically enforceable in any court having jurisdiction. The award rendered by the arbitrator or arbitrators shall be final, and judgment may be entered upon it in accordance with applicable law in any court having jurisdiction.

11.14.3. Regardless of the Owner's election to arbitrate or litigate, the Owner and the Engineer agree to participate in non-binding facilitative mediation before the arbitration hearing or trial, as the case may be. The Engineer agrees to participate in facilitative mediation with all third parties the Owner believes necessary to resolve the dispute, such as the Contractor or an insurer.

11.14.4. The Engineer shall continue to perform its obligations under this Agreement during the pendency of any Claim or dispute resolution proceedings.

11.14.5. Engineer waives all Claims against the Owner for consequential damages (such as home office overhead, lost profits on this or other projects, and lost opportunity to pursue other projects) arising out of or relating to this Agreement, including any consequential damages due to its termination.

11.14.6. The period of limitations on any claim by the Owner against Engineer shall begin on termination of the Engineer's services under this Agreement. The statute of limitations or period during which the Owner may prosecute an action against Engineer is extended to match the period of limitations governing an action against the Owner by the Contractor.

11.15. Assignment

11.15.1. The Engineer shall not assign this Agreement without the written consent of Owner and Engineer shall not unreasonably object to any assignment of this Agreement by Owner, except to the extent that any assignment is mandated by law or the effect of this limitation may be restricted by law. Any attempted assignment by the Engineer in violation of this paragraph shall be void.

11.15.2. Contingent on the Owner's written acceptance, the Engineer assigns to the Owner any claim the Engineer has against a Consultant or vendor for goods or services provided on the Project.

11.16. Miscellaneous

11.16.1. If there is a discrepancy between the obligations of the Engineer as provided for herein, and those set forth in the General Conditions of the Construction Contract, then the terms of this Agreement shall govern Engineer's obligations and responsibilities to Owner.

11.16.2. The Engineer will not replace its key people assigned to the Project without the prior written approval of the Owner, which will not be unreasonably withheld.

11.16.3. The Engineer shall not make any public presentation or public relations communication regarding the Project without the express written consent of the Owner.

11.16.4. The Engineer understands the Project may be subject to Federal, State of Michigan, or local requirements for such things as prompt payment and equal opportunity in employment. The Engineer will ascertain the applicability of any such requirement and comply with it.

11.16.5. Modifications to this Agreement may only be made in a writing executed by the Owner or his or her Deputy Commissioners, or Drainage Board as applicable.

11.16.6. The parties shall perform this Agreement in compliance with all federal, state, and local laws and regulations. This agreement is made and performed in Oakland County, Michigan and shall be interpreted, enforced, and governed under the laws of the State of Michigan.

11.16.7. The language of all parts of this Agreement shall be construed as a whole according to its fair meaning and not construed strictly for or against any party. Any use of the singular or plural number, any reference to the male, female, or neuter gender(s), possessive or non-possessive, in this Agreement shall also be deemed to include the appropriate other when the context so suggests or requires.

Agenda Item No. 6

Special Assessment

**Red Run Drain Drainage District
Freedom Hill Bank Stabilization
Oakland and Macomb County
Estimate of Probable Project Cost
December 1, 2020**

1) CONTRACTED SERVICES - CONSTRUCTION	
Estimated Construction Cost - North Bank	\$ 1,900,000
Estimated Construction Cost - South Bank	<u>\$ 2,400,000</u>
Subtotal - Contracted Services - Construction	\$ 4,300,000
2) CONTRACTED SERVICES - PROJECT DEVELOPMENT	
Engineering - Hubbell, Roth & Clark	
Consulting Engineer (ENGCON)	
Design Phase - North Bank	\$ 238,490
Design Engineering Supplemental Services	\$ 88,570
Grant Application	<u>\$ 6,900</u>
Subtotal - Contracted Services - Project Development	\$ 333,960
3) OTHER DRAIN SERVICE EXPENSES	
Invasive Species Control Services Work (2020)	\$ 20,000
USACE Freedom Hill South Bank Match Contribution	<u>\$ 166,666</u>
Subtotal - Other Drain Services	\$ 186,666
4) COUNTY SERVICES	
Administration (ADM)	\$ 2,000
Engineering (ENG)	\$ 64,000
Right-of-Way (ROW)	<u>\$ 3,000</u>
Subtotal - County Services	\$ 69,000
5) SUBTOTAL	\$ 4,889,626
6) CURRENT AVAILABLE FUNDS	
ACT51 Funds	\$ 54,000
Trial Balance (as of November 2020)	\$ 38,500
National Fish & Wildlife Foundation	<u>\$ 60,000</u>
Subtotal - Available Funds	\$ 152,500
7) FUTURE FUNDS	
ACT51 Funds	\$ 259,000
Mich. Dept of Environment, Great Lakes & Energy's Nonpoint Source Program Grant	\$ 500,000
National Fish & Wildlife Foundation	\$ 240,000
US Army Corps of Engineers	<u>\$ 500,000</u>
Subtotal - Future Funds	\$ 1,499,000
8) ESTIMATE OF PROJECT COST	\$ 3,238,126

Prepared by: _____
George P. Nichols, P.E. - Civil Engineer III

Date: _____

Approved by: _____
Steve Korth, P.E. - Manager

Date: _____

RED RUN DRAIN DRAINAGE DISTRICT
Freedom Hill North Bank Design Services
Freedom Hill South Bank Match Contributions
December 16, 2020

Contracted Services - Project Development	\$285,390.00
Invasive Species Control Services	\$20,000.00
US Army Corps of Engineers South Bank Match Contribution	\$166,666.00
Administrative County Services	\$25,000.00
Available ACT51 Funds	(\$54,000.00)
Available National Fish & Wildlife Foundation Grant Funds	(\$60,000.00)
Estimated Assessment Amount	\$383,056.00

Governmental Entity	Percentage Apportioned	Total Cost to be Assessed
State of Michigan		
Dept. of Transportation (MDOT)	3.0000%	\$11,491.68
Public Corporations in Oakland County		
County of Oakland	10.0000%	\$ 38,305.60
City of Berkley	1.5230%	\$ 5,833.94
City of Birmingham	0.9490%	\$ 3,635.20
City of Clawson	1.2860%	\$ 4,926.10
City of Ferndale	2.2760%	\$ 8,718.35
City of Hazel Park	1.6060%	\$ 6,151.88
City of Huntington Woods	0.8710%	\$ 3,336.42
City of Madison Heights	4.5820%	\$ 17,551.63
City of Oak Park	2.8920%	\$ 11,077.98
City of Pleasant Ridge	0.3260%	\$ 1,248.76
City of Rochester Hills	3.7340%	\$ 14,303.31
City of Royal Oak	6.9640%	\$ 26,676.02
City of Southfield	1.7250%	\$ 6,607.72
City of Troy	16.2980%	\$ 62,430.47
Township of Royal Oak	0.4090%	\$ 1,566.70
Village of Beverly Hills	0.1480%	\$ 566.92
Subtotal	55.5890%	\$ 212,937.00
Public Corporations in Macomb County		
County of Macomb	5.6500%	21,642.66
City of Centerline	2.3110%	8,852.42
City of Sterling Heights	12.9380%	49,559.79
City of Warren	18.2360%	69,854.09
Township of Clinton	0.1600%	612.89
Township of Shelby	2.1160%	8,105.46
Subtotal	41.4110%	\$ 158,627.32
Grand Total	100%	\$383,056.00

I hereby certify that I have prepared the Special Assessment Roll for the design of the Red Run Drain North Bank Freedom Hill Bank Stabilization Project and South Bank US Army Corps match contribution in accordance with the direction of the Drainage Board for the Red Run Drain and the statutory provisions applicable hereto.

Dated: _____

Jim Nash, Secretary
Red Run Drain Drainage District

The foregoing special assessment roll for the maintenance of the Red Run Drain was approved by the Red Run Drain Drainage Board on _____, 2020.

Michael R. Gregg, Chairperson
Red Run Drain Drainage Board

Jim Nash, Secretary
Red Run Drain Drainage Board

Agenda Item No. 7

HRC update

Agenda Item No. 8

Trial balance

Run By: 27706

Run: 12/08/2020 at 09:26 AM

Scope: 82902 Red Run Federal Drain Ch21

YTD Trial Balance
Fund: 82902 Red Run Federal Drain Ch21
As of Fiscal Period: Month 3, 2021

ACCOUNT		Fiscal Year BEG BAL	Current FY Net Activity	ENDING BAL
100100	Cash - Operating	69,822.61	(7,723.47)	62,099.14
104100	Accrued Interest on Investment	4,928.40	(91.42)	4,836.98
228100	Deposits	(26,244.40)	0.00	(26,244.40)
230852	Accounts Payable	(5,510.21)	5,510.21	0.00
	Revenues	0.00	(175.43)	(175.43)
	Expenditures	0.00	2,480.11	2,480.11
	Special Items- Uses	0.00	0.00	0.00
381350	FB Restricted Programs	(42,996.40)	0.00	(42,996.40)
		(0.00)	0.00	(0.00)

Cash as 11/10/2020	\$	62,099.14
Permit Deposits Held		(26,244.40)
Vouchers Payable AP		0.00
Total Net Cash Balance	\$	<u><u>35,854.74</u></u>

Agenda Item No. 9

Invoice



HUBBELL, ROTH & CLARK, INC.
CONSULTING ENGINEERS
PO BOX 824
BLOOMFIELD HILLS, MICHIGAN 48303-0824
(248) 454-6300

December 10, 2020
Project No: 20200852.09
Invoice No: 0184206

OAKLAND COUNTY WATER RESOURCES
COMMISSIONERS OFFICE
ONE PUBLIC WORKS DRIVE
WATERFORD, MI 48328-1907

RED RUN DRAIN FREEDOM HILL RESTORATION

PROJECT 20200852.09
CONTRACT ADMINISTRATION

Professional Services for period ending November 28, 2020

Professional Personnel

	Hours	Rate	Amount
KOCH, REMINGTON	2.50	30.00	75.00
PETRIELLO, STEPHANIE	5.00	33.00	165.00
SEYMOUR, LYNNE	5.50	47.60	261.80
Totals	13.00		501.80
	1.0 times	501.80	501.80
	2.97 times	501.80	1,490.35

Total Labor

Total Due this Invoice

\$1,490.35

Billings to Date

	Current	Prior	Total
Labor	1,490.35	0.00	1,490.35
Totals	1,490.35	0.00	1,490.35

Reviewed and approve this invoice

George P. Nichols 12/14/2020

82902 - 155020 - 730373 - 4855 - 1-2895 - Ch.
21 - std V#628
exp. 8/31/21
li# 38141

Agenda Item No. 10

Next meeting

Agenda Item No. 11

Other business

Agenda Item No. 12

Adjourn