



CARE Meeting Notes – January 23, 2020

Thursday, January 23, 2020, 1:00 PM – 3:00 PM CST
Student Union and Library Building, Room 321
Purdue University Northwest – Hammond Campus

In Attendance: Michelle Caldwell, Michael Spinar (IDEM); Joe Exl (NIRPC); John Fekete (CARE Co-chair); Paul Labus (TNC); Jenny Orsburn (IDNR); Maureen Turman (NiSource), Mariya Trenkinshu (ArcelorMittal)

Via phone: Jim Bailey, Dav Parry (IDEM); Carl Wodrich, Bri Ciara (IDNR); Victoria Wittig (Save The Dunes); Will Tucker (U.S. FWS); Kay Nelson (NWI Forum)

Public Attendees: None

1. Introductions:

John Fekete opened the meeting at 1:05 pm and took roll of those in person and on the phone. John and Michael noted that there were two differences from the published agenda: (1) the Army Corps navigational dredging was moved from item 2(d) to item 2(a) of the agenda and (2) the presentation on the AOC Plankton monitoring would be postponed until next month.

2. Sediment Management Actions (BUIs #1-2, #4-7) Update

a. Dredging of Navigational Channel

Michael updated the CARE members on the various sediment projects within the AOC. During 2019, the contractor for the U.S. Army Corps of Engineers continued work to clear the dredging backlog of the Congressionally-authorized federal navigation channel. In addition, the Corps continues to oversee the dredging of selected berthing areas outside the federal channel at the request of local property owners. All dredged materials are deposited in the Indiana Harbor Confined Disposal Facility (CDF) in East Chicago. Last year's dredging was completed in November. 167,845 cubic yards of sediment were removed, including isolated areas containing sediment with PCB levels above 50 parts per million. The areas, for which sediment disposal is regulated by the Toxic Substances Control Act (TSCA), were dredged to a depth of approximately 28 feet and a stone cap was placed post-dredging. Non-TSCA regulated cover material was then obtained from the LTV dockfaces adjacent to Reaches 2 and 3. The total amount dredged to address the TSCA areas, including for the cover in the CDF, was 19,593 cubic yards.

The Army Corps estimates that the remaining sediment backlog will be cleared with this year's dredging. A three-year hiatus in dredging activities is planned from 2021-2023 to allow for the CDF's dikes to be raised 11 feet which will double its capacity to



4.8 million cubic yards from the current 2.7 million cubic yards. Routine maintenance dredging of the federal channel is expected to commence in 2024. The additional capacity of the CDF will be utilized to store sediments dredged over the next 30 years (through approximately 2053). CARE Committee members asked whether the facility be maintained as open water throughout the dike raise process and if there been any studies or documentation regarding the effectiveness of the wildlife deterrence program. A comment was also made that the fencing at the site along Indianapolis Boulevard was being replaced with pillars for aesthetic purposes.

b. Lake George Branch Middle & East

The East Portion extends from Indianapolis Boulevard in East Chicago to the CSX railroad bridge. Approximately 40 percent of the Lake George East project area is within the federal navigation channel. The Middle Portion extends from the CSX bridge to the BP land bridge.

The Great Lakes Legacy Act Project Agreement between EPA and the non-federal sponsors (the East Chicago Waterway Management District [ECWMD], Atlantic Richfield Co., and BP) has been approved and the US Army Corps has been contracted by EPA to complete the project design for the capping of the middle and dredging of the east portions of the Lake George Branch. In the meantime, BP has begun source control work on the South Tank Farm. Because this source control work will not be completed prior to the end of the 2020 dredging season, the Army Corps will not be able to dredge along the South Tank Farm prior to initiating the CDF dike raise. The Army Corps is planning to split the East project dredging into two phases; the first phase would occur in 2020 with the majority of the dredged material from Lake George Branch East being disposed of in the Indiana Harbor CDF while the smaller second phase would consist of off-site disposal of dredged material.

The first phase dredging is anticipated to occur this year, with capping of the middle portion to occur in 2021, completion of BP's source control measures at the South and West Tank Farms in 2022, the CDF dike raise in 2023, and the second phase dredging of the East project area in 2023 or 2024.

In response to questions, it was clarified that the first phase East Branch project dredging, as proposed, would include both areas within and outside of the federal navigation channel. The area along the south bank (adjacent to the South Tank Farm) would not be dredged due in order to preserve bank stability. In addition, John stated that there is a pipeline running by the canal which requires a buffer when dredging. Also, the ECWMD is currently evaluating future uses of the South Tank Farm.

c. East Branch, Phase II



East Branch Phase II includes the dredging and capping of 2.5 miles of the East Branch of the Grand Calumet River between Cline Avenue and the US Steel Reach in Gary, as well as closure of the Ralston Street Lagoon in Gary. The Gary Sanitary District is the primary non-federal sponsor for this project.

The 30% Remedial Design for this project has been completed. This work should help refine the project costs and design specifications. It is currently anticipated that additional nonfederal match will be required to proceed into the project phase.

In response to a question, Michael said he would inquire on next steps of U.S. EPA.

Victoria asked whether there would be any relation to the economic development center being built in the City of Gary. In order to clarify the nature of the project, Victoria said she would send information on the project.

d. Junction Reach

The Junction Reach includes approximately 1.5 miles of the Indiana Harbor Ship Canal south of Columbus Drive and approximately 1.4 miles of the Grand Calumet River between Indianapolis Boulevard and Kennedy Avenue. It is currently anticipated that only containment will be utilized for the portion of the Grand Calumet River from the Junction to Kennedy Avenue. Both removal and containment are anticipated for the remainder of the project area.

A 70% design of the Junction Reach was completed in 2015, with the report being released in early 2016. EPA, IDEM, and the East Chicago Waterway Management District are still working to identify non-federal cost share for the project. The agreement signed between AR/BP and the ECWMD includes a provision that any non-federal cost share overmatch on the Lake George Branch Middle and East Project could be applied to this reach.

e. BUI #7 Removal Target Update

IDEM continues to work to revise the removal target for BUI #7: Restrictions on Dredging Activities. Once the draft target has been further refined, it will be vetted through the CARE Committee. IDEM currently plans to complete revision of this BUI removal target in 2020.

3. Habitat Management Actions (BUI #3 & BUI #14) Update

a. Management Action #1 – Dune, Swale, and Riverine Restoration

Carl Wodrich reported on this project work. Field crews from the Department of Natural Resources (IDNR) and The Nature Conservancy (TNC) have been conducting dormant season work on the preserves. TNC has posted job openings for its summer positions.



Although the project has had numerous positive results, there have been several challenges with respect to the project. These have included delays in woody clearing efforts caused principally by abnormally warm winters and lack of frozen ground in 2016-2017 and 2017-2018 and hydrologic changes to portions of several properties, particularly Pine Station Nature Preserve. These changes, which include drainage changes caused by the sliplining of an old stormwater drainage pipe at Pine Station a few years ago and high water levels throughout the AOC have destabilized certain areas, leading to invasion by phragmites and other invasives. The high water levels have also made it challenging for crews to access sites that they need to treat.

Staff from IDEM, IDNR, TNC and Lake County Parks met with staff from GLNPO on January 10, 2020 to discuss progress made to date on the Dune and Swale project and these challenges. The parties have made an informal request of GLNPO to assess whether a grant extension and future additional funding may be possible and are currently awaiting feedback from EPA.

Michael mentioned that another challenge involved the establishment of native vegetation on modified lands where the soils or structure have been substantially altered. Paul mentioned that these lands may need different conservation goals than the more intact dune and swale remnants.

Jenny Orsburn stated that Paul Buszka had mentioned at the Northwest Indiana Urban Waters federal Partnership that the USGS was conducting hydrologic monitoring at Pine Station Nature Preserve. She inquired as to whether this project is just for data collection, or if it will impact management actions at the site. Paul Labus noted that a considerable change in water levels has occurred over the last several years and this has led to numerous issues. For instance, the sandscapes developed resilient native plant communities that were resistant to invasive pressures. However, now that they have been flooded, phragmites and cattails are invading. Carl stated that the IDNR hopes to take the data and information gathered by the USGS to understand hydrology at the site that should hopefully inform the Division of Nature Preserves how to best manage the property.

Michael, Carl, and Paul discussed that the CARE habitat subcommittee is reviewing the removal targets for BUIs #3 (Degradation of Fish and Wildlife Habitat) and #14 (Loss of Fish and Wildlife populations to ensure that they are realistic and appropriate. The group will also reach out to Amy Roe of the U.S. Fish and Wildlife Service, who is the Technical Review Lead (TRL) for the two BUIs. A meeting is being held on January 28 to discuss the matter in more detail. Once the draft target has been further refined, it will be vetted through the CARE Committee. IDEM currently plans to complete any needed revisions of these BUI removal targets in 2020.

b. Management Action #2 – River Corridor Establishment



Michael stated that IDEM had updated the draft river corridor grant application/workplan in November 2019 and held a meeting with several City of Gary departments in December to discuss the access agreements for several parcels, most notably for those within the footprint of the Gary Airport. IDEM subsequently provided Gary staff with a draft of an updated agreement in early January and is working to resolve any remaining issues. The agency plans to submit a final project application once additional agreements, including those involving the City of Gary, are signed.

Kay Nelson inquired as to whether IDEM has had any difficulties due to turnover at the City of Gary. Michael responded that we have typically been working with attorneys for the various boards and departments and have not encountered an issue, but will be prepared to explain the project should new staff be appointed.

c. Management Action #3 – Lake George Branch Wetlands Restoration

Carl stated that this project includes portions of George Lake, Lake Mary, and the wetlands along the Lake George Canal in Hammond. IDNR was awarded supplemental GLRI funding last year for this project and is working on a contract extension for Conservation Land Stewardship (CLS), now Davey Resource Group. Orbis Environmental conducted the project monitoring in 2019 under a contract with IDNR. IDNR is currently reviewing the monitoring report. Carl expressed uncertainty as to whether this project site will be in a long-term management condition at the end of the 2020 growing season. IDNR will know more when the growing season begins and DNR visits the site with its contractor. IDNR feels that it will be pretty close to long-term management. High water levels have impacted this project area as well, drowning out plant plugs installed several years ago and making access in portions of the project area more difficult for the contractor.

John Fekete stated that INDOT contacted the ECWMD in regards to high water levels along Calumet Avenue. The high water is eroding the area adjacent to the road and INDOT has inquired whether the ECWMD can assist in lowering the water levels. Carl mentioned that BP is planning to commence construction to repair culverts in the land bridge of the Lake George Branch of the IHSC. Once repaired, this structure should better allow flow moving east to the IHSC and prevent water from flowing west under the land bridge toward Calumet Avenue. Michael and Carl added that the Hammond Port Authority/Lost Marsh Golf Course has a water control structure that allows water to flow through the ditch along Calumet Avenue and into the Lake George Branch of the IHSC from the SW corner of the south basin of George Lake. CARE members were not aware of the last time that the Port Authority used the structure.

d. Management Action #4 – Prescribed Fire Plan/Contractual Burns



Will Tucker from the U.S. Fish and Wildlife Service, Carl Wodrich, and Paul Labus provided the update for this item. There are no substantive updates on this item and no burns have been conducted during the current season, which extends from fall 2019 through spring 2020, due to lack of appropriate conditions.

e. Management Action #5 – Pine Station Ponds and Oxbow

Carl informed the CARE Members that TetraTech has been selected to work for IDNR on the design for this project to the two large borrow ponds at the east side of Pine Station. This project will also address an erosion issue on the southern end of the property along the Grand Calumet River. IDNR is currently awaiting a scope of work (SOW) from the contractor for review. The SOW will need to be finalized and a contract can then be executed by DNR.

In addition, the Gary Sanitary District has initiated an invasive vegetation control/removal project on the oxbow that was required under its 2016 Clean Water Act Consent Decree this past fall. Initial work was focused on herbicide application to Phragmites and cattails.

f. Early Detections

There have been no new early detections since the August 2019 CARE Workgroup Meeting. The invasives (black swallow-wort and sericea lespedeza) have been treated and hopefully have been eliminated from the AOC managed sites.

4. Beach Closures (BUI #10) Update

Michelle Caldwell provided the BUI #10 update, pointing out that IDEM plans to present additional detail on the 2019 beach season at the February CARE Meeting. IDEM and U.S. EPA staff met with representatives of the City of East Chicago to discuss beach best management practices, or BMPs, designed to reduce levels of *E. coli*. IDEM and the City will be working to enhance public outreach on several beach BMPs, including prevention of hand-feeding of wildlife and proper trash and pet waste disposal. Previously, IDEM had reported that the City had procured new equipment to improve its ability to groom the Jeorse Park and Buffington Harbor beaches. East Chicago has informed the agency that that is not the case.

Final 2019 beach season results confirm that Jeorse Park I did not meet the 15 percent sample exceedance threshold in 2019 that would have contributed towards meeting the removal target. Whihala West performed worse and the East Chicago beaches, better, than in 2018. Michelle suspected that the lack of a dog program at Whihala during 2019 may have contributed to this. Since three years are required to meet the 15 percent threshold out of the same five year period, the removal target cannot be met prior to 2021.



IDEM continues to pursue an upgrade to its BeachGuard program. The upgrade would allow for new features, including an improved mapping interface and sub-daily advisories. IDEM still anticipates rolling out the upgraded system in time for the 2020 beach season.

In addition, as the agency has described at the August 2019 CARE Workgroup Meeting, it has contracted with Purdue University Northwest to develop Artificial Neural Network (ANN) predictive models to predict levels of *E. coli* in near-real time. This modeling approach is unique in that it utilizes machine learning to identify potential relationships among a large suite of potential inputs and then train a model to identify expected outcomes. The preliminary findings are quite promising, and the project is proceeding on schedule. It is anticipated that the models will be completed in March 2020.

In January, IDEM held a meeting with Asher Agency, a contractor working to develop an educational video for policymakers and other interested parties on beach best management practices, while highlighting the AOC beaches. Asher staff have expressed great enthusiasm for the task. The video is anticipated to be approximately 5 to 10 minutes long, broken out into chapters or sub-units for display at outreach events, on YouTube, or other venues. It is anticipated to cover information on *E. coli*, the sources of *E. coli*, BMPs, and information on project partners.

Finally, Michael updated the group on the gull depredation pilot project for which the U.S. Department of Agriculture's (USDA's) Animal and Plant Health Inspection Service (APHIS) has a GLRI grant. USDA is working with local entities to conduct egg oiling of ring-billed gull nests at the Indiana Harbor peninsula in East Chicago and the US Steel Midwest Plant in Portage. There are more than 20,000 nests at this site, contributing to the species' overpopulation and *E. coli* exceedances at nearby AOC beaches. IDEM, USDA, ArcelorMittal, and its contractor met on January 13, 2020 to continue planning efforts for the project, due to be implemented this spring.

5. Aesthetics (BUI #11) Update

Michael stated that aesthetics monitoring was not conducted during 2019; however, IDEM has been working to address aesthetics issues noted during previous monitoring. IDEM contacted U.S. Steel's Environmental Department in October 2019 to inform it of the aesthetics issues in the vicinity of the culvert leading between the West Grand Calumet Lagoon and the headwaters of the Grand Calumet River. U.S. Steel subsequently removed the logs blocking the culvert and cleared debris from the surface. It was still evaluating whether accumulation had occurred on the portions of the grates below the water line. If such accumulation is occurring, U.S. Steel will evaluate what further steps, if any, are needed to address the matter.

In addition, IDEM staff met with representatives of Gary, East Chicago, Hammond, and Lake County in mid-October to discuss debris removal at the Old Cline Avenue Bridge. The discussion was positive and the parties are currently conducting additional fact-finding to inform future decisions. Discussions on next steps are ongoing and will likely require eventual decisions from policymakers.



6. AOC Plankton Monitoring Presentation (BUI #8 and #13)

Michael discussed that IDEM had received final reports from Dr. Ann St. Amand of PhycoTech, Inc. and Dr. Joe Shaw of IU Bloomington at the end of September. IDEM staff reviewed the reports and other data collected and submitted a final project report to U.S. EPA at the end of December. IDEM is currently working to develop a presentation based on the final report, including the key overall project findings, for the CARE Committee. This presentation will be given at the February CARE Workgroup Meeting.

With respect to the removal targets, IDEM is currently reviewing draft concepts for revised removal targets for BUIs #8 and #13. Once these are in a more finalized state, they will be shared with CARE Members for feedback.

7. Outreach/Education Activities

Michael updated CARE members on the presentation he gave to the Lakeshore Chamber on December 11, 2019, in concert with Fernando Treviño, Executive Director of the East Chicago Waterway Management District, and Scott Cieniawski of U.S. EPA's Great Lakes National Program Office (GLNPO). Fernando had arranged the presentation with the Lakeshore Chamber and invited Michael and Scott as co-presenters.

Fernando gave an update on the ECWMD and the Great Lakes Legacy Act project agreements relating to sediment management work on the Lake George Branch and Junction Reach projects. Michael then presented an overview of the Great Lakes Areas of Concern Program and past navigational dredging, enforcement, Great Lakes Legacy Act, and habitat projects conducted within the AOC. Finally, Scott discussed the big picture of the work done to date, future work to be conducted, and an appeal for non-federal sponsors. In particular, Scott addressed the misconception that an entity should apply as a project partner solely to discharge environmental liability and mentioned that all number of groups have contributed at various AOCs. Michael mentioned that several attendees discussed how they were not aware of all the work going on to restore the Grand Calumet River AOC, which indicated that CARE and others have additional outreach and education work to do. Victoria suggested that IDEM or CARE members conduct more informal coffee chats to inform the public about the AOC restoration work and made suggestions as to venues that might be helpful. Save the Dunes has found these coffee chats to be useful in its outreach efforts. Michael suggested that he and Victoria speak offline to gather additional information.

8. Great Lakes Trash Free Waters Grant Opportunity

Michael updated the CARE Workgroup that U.S. EPA has recently released a Request for Applications (RFA), covering two 2020 Great Lakes Trash Free Waters Grant opportunities available through the Great Lakes Restoration Initiative (GLRI).

The first funding opportunity is entitled "Trash Removal in Great Lakes Communities":



- Will provide approximately 10 awards, ranging from \$50k-\$300k, for trash removal projects at beaches and other recreation areas, shorelines, coastal wetlands, harbors, river mouths and riparian corridors immediately adjacent to the Great Lakes.
- Funding can support mobilization of cleanup volunteers and support staff, provide equipment for safe and efficient trash removal, and help offset the cost of recycling or disposing of the collected material. Projects may also include funding for the purchase and placement of appropriate waste receptacles to effectively contain trash in the future.
- Applicants operating on behalf of a coalition may receive extra points in the project scoring.

The second is “Trash Removal from Great Lakes Rivermouths and Harbors”:

- Will provide approximately 3 awards, ranging from \$250k-\$500k, for trash removal projects that include the use of devices/machinery to remove trash from Great Lakes rivermouths and harbors.
- Funding will support the purchase and use of devices/machinery -- such as small vessels to skim or otherwise remove trash -- and can help offset the cost of recycling or disposing of the collected material. Projects may also include the purchase and placement of appropriate waste receptacles in the rivermouth and harbor areas to effectively contain trash in the future.

A few notes on the opportunities:

- Applications are due Friday, February 14, 2020 at 11:59 pm EST.
- The recommended project period is up to 24 months.
- Eligible waterways must be within 5 river miles of a Great Lake or connecting channel.
- Ineligible projects include those: (1) utilizing unproven and/or experimental trash removal devices, (2) focused on research or development of new techniques/technologies, (3) conducting work on federal land (e.g., the Indiana Dunes National Park), and (4) for which the applicant is a for-profit entity.

U.S. EPA has set up a website (<https://www.epa.gov/great-lakes-funding/glri-trash-free-waters-fy2020-request-applications-rfa>), which IDEM would be happy to provide to interested parties.

Jenny Orsburn inquired as to whether this was similar to the Marine Debris funding opportunity. CARE Members were aware that this opportunity was available through the National Oceanic and Atmospheric Administration (NOAA), but were not able to provide much additional detail on the differences in the opportunities.

9. Table Talk/Other Comments

a. Lake Michigan Watershed Seminar

Michael noted that IDEM is working with several partners to host a watershed seminar on March 16 in the South Bend area. The seminar is targeted at watershed groups with approved watershed management plans, or those working on watershed protection and restoration within the entire Indiana portion of the Lake Michigan basin. The goals are



to remove communication and other barriers from these groups. Please refer interested parties to Michael.

b. Army Corps Update

Kay Nelson advised the group that leadership within the Chicago District of the U.S. Army Corps of Engineers is requesting information on participation in activities throughout Northwest Indiana other than the dredging of the Indiana Harbor Ship Canal. She also suggested that, as projects have recently been transferred to the Chicago District from neighboring ones, it would be useful for CARE members to think of ways to better engage the agency. CARE members agreed to try to gather information on current projects that they are aware of that have USACE Chicago District involvement.

c. Updated Waters of the United States Rule

Carl noted that the updated Navigable Waters Protection Rule to define “Waters of the United States” was just finalized. The rule establishes federal regulatory authority under the Clean Water Act. See: <https://www.epa.gov/nwpr> for more information.

10. Meeting Adjournment

Michael mentioned that future CARE meetings in 2020 would be held in the third floor room of the Student Union Building at Purdue University Northwest’s Hammond Campus and that meeting invites would be forthcoming. John then closed down the meeting.

Next Workgroup Meeting: Thursday, February 27, 2020, 1:00 pm – 3:00 pm
Purdue Northwest’s Hammond Campus