

Fond du Lac Band of Lake Superior Chippewa Reservation Business Committee

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By E-MAIL

April 30, 2021

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Re: Federal Court Remand for CWA Section 401(a)(2) Determination in *Fond du Lac Band of Lake Superior Chippewa v. Newton*, No. 19-cv-2489-PJS-LIB (D. Minn.)

Dear Administrator Regan and Acting Regional Administrator Newton:

On behalf of the Fond du Lac Band of Lake Superior Chippewa (“Band”), I am submitting this letter and attached exhibits as part of the remand in *Fond du Lac Band of Lake Superior Chippewa v. Newton*, No. 19-cv-2489-PJS-LIB (D. Minn.) for the Administrator to make a determination of whether discharges that may result from the NorthMet Mining Project (“Project”) “may affect . . . the quality of the waters” of the Band.

This determination will be made pursuant to Section 401(a)(2) of the Clean Water Act (“CWA”), 33 U.S.C. § 1341(a)(2). Based on the science and the Band’s extensive and expert submissions regarding the Project for more than a decade, EPA should have made a positive “may affect” determination in January 2019 under the prior Trump Administration. The Band now understands from a recent report issued by EPA’s Office of Inspector General (“OIG”) that Region 5 previously employed an erroneous legal interpretation of Section 401(a)(2) in order to “allow” EPA to “deny a potential administrative remedy to the [Band] simply by neglecting to assess downstream effects.” As a result of federal litigation initiated by the Band, EPA now intends to make that determination by June 4, 2021.



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Executive Director,
Tribal Enterprises
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The Band repeatedly requested Tribal consultation with EPA since the federal district court granted EPA's request for a voluntary remand. The Band sought Tribal consultation with respect to both EPA's process and substantive determination. As discussed during the one consultation meeting EPA offered on April 23, 2021, the Band is disappointed with EPA's responses to the Band's requests and believes that EPA must do more to meet its obligation to meaningfully consult with the Band. The Band believes that as the process moves forward it is imperative that EPA meaningfully consult with the Band as the pending decision directly impacts the Band and the health and welfare of its members. Collaboration and follow-up are also an essential element of consultation and as EPA reviews the Band's submission the Band implores EPA to work with appropriate Band staff to answer any questions.

President Biden has stated that it "is a priority of my Administration to make respect for Tribal sovereignty and self-governance, commitment to fulfilling Federal trust and treaty responsibilities to Tribal Nations, and regular, meaningful, and robust consultation with Tribal Nations cornerstones of Federal Indian policy."¹ Administrator Regan has said that EPA has "much more work to do" when it comes to advancing environmental justice.² He recognized that indigenous communities "continue to suffer from disproportionately high pollution levels and the resulting adverse health and environmental impacts." He said that EPA "must do better" and that it "will be one of my top priorities as Administrator, and I expect it to be one of yours as well." To that end, Administrator Regan directed all EPA offices to, among other things, "engage in regular, meaningful, and robust consultation with Tribal officials." The Band is hopeful that as we move forward EPA will work to diligently carry out these directives and engage with the Band early, often, and in a meaningful manner.

We note that the OIG found that Region 5 previously did not comply with the intent of Tribal consultation and principles of environmental justice when its actions "barred the Fond du Lac Band's access to the administrative process by which it could formally voice its concerns." The Band has spent considerable time and resources over the past decade to ensure that the Project complies with the Band's downstream water quality standards. Those standards protect Band members in the exercise of their Treaty rights and the use of water for subsistence purposes and to maintain their cultural and religious traditions. Historical and current effects from a lack of enforcement against mining activities upstream of the Reservation have led a situation where the Band's water quality is impaired because the fishery Band members rely on is now so high in mercury that members cannot safely feed fish to their children. This remand implicates serious environmental justice issues that must be given appropriate consideration.

¹ Presidential Memorandum on Tribal Consultation and Strengthening Nation-to-Nation Relationships (Jan. 26, 2021), <https://www.whitehouse.gov/briefing-room/presidential-actions/2021/01/26/memorandum-on-tribal-consultation-and-strengthening-nation-to-nation-relationships/>.

² Michael Regan Administrator Message to EPA Employees on Commitment to Environmental Justice (Apr. 7, 2021), <https://www.epa.gov/sites/production/files/2021-04/documents/regan-messageoncommitmenttoenvironmentaljustice-april072021.pdf>.

EPA was an important partner with the Band in trying to ensure that the Project complies with the CWA prior to an inexplicable change under the Trump Administration. The Band oversees and invests heavily in protecting its Treaty resources within the Reservation and in its Treaty-protected Ceded Territory. The Band hopes that EPA will once again be a partner with the Band in protecting these critical resources. EPA also has a trust obligation to protect the Band's rights and resources that is deeply rooted in the relationship between the Band and the United States. It is important to the Band to have a cooperative and positive relationship with the EPA as its trustee.

Below, we provide background on this remand, address the significance of environmental justice concerns and then discuss the Administrator's "may affect" determination, which Region 5 career staff correctly described previously as a "low bar." As part of the "may affect" determination, we first reiterate the current water quality issues for the Band's waters and then set out additional new information for EPA to consider in addition to the Band's prior submissions. This information concerns a new memorandum from Dr. Brian Branfireun that discusses the Project's downstream mercury impacts and highlights a new scientific paper regarding the connection between upstream industrial sources and mercury impacts in the St. Louis River. The Band has also adopted a new water quality standard for specific conductance that EPA approved in October 2020 and which now applies to the Project and must be considered as part of this process. Finally, the Band requested an evaluation of the Project's potential effects on riparian wetlands, streams, and interior wetlands within the Reservation. Based on the Band's information, the Administrator should determine that the Project's discharges "may affect" the Band's water quality and issue notice to the Band accordingly.

I. Background on this Remand.

EPA should have issued notice to the Band within 30 days of MPCA issuing its 401 Certification on December 20, 2018. This would have given the Band the right to object to the 404 Permit, request a hearing on those objections, and ensure that the Project's discharges comply with the Band's water quality standards.³ There are multiple CWA permits for discharges that have been issued for the Project. Contrary to the CWA, none of those permits ensure compliance with the Band's water quality standards.

The Project, if developed, will be located in the heart of the Band's Ceded Territory, operate for at least 20 years, and require wastewater treatment both during the mine's operation and into perpetuity after the mine closes. The Project will destroy approximately 900 acres of pristine wetlands and discharge polluted wastewater containing mercury, sulfate, and other pollutants into tributaries of the St. Louis River, affecting the Band's downstream waters.

Throughout the Project's environmental review and permitting processes, the Band repeatedly raised its concerns regarding the Project's inability to comply the Band's water quality standards. The Band supported its position over the years with science-based and independent analysis. Despite the Band's expertise and water quality jurisdiction, the permitting agencies completely

³ See 33 U.S.C. § 1341(a)(2).

ignored the Band and issued CWA permits that do not comply with the Band's water quality standards.

Region 5 initially recognized the Project's inability to comply with the Band's water quality standards. In March 2017, a Region 5 manager told the Band's water quality staff it was probable that the Project would not comply with the Band's water quality standards. During that conversation, the Region 5 manager committed to the Section 401(a)(2) process in order to ensure the Project complied with the Band's water quality standards. However, Region 5 inexplicably changed its position sometime after the appointment of Cathy Stepp as Regional Administrator in December 2017.

The Band sent three written requests to EPA for notice pursuant to Section 401(a)(2) on October 31, 2018, January 10, 2019, and February 5, 2019, respectively. Those requests outlined the Band's determination that the Project will not comply with the Band's water quality standards. The Band also explained why MPCA's 401 Certification is completely insufficient to ensure there will be no downstream effects in the St. Louis River. MPCA's 401 Certification actually concedes there is "sufficient uncertainty" of downstream impacts, which is an acknowledgement that by itself justifies a positive "may affect" determination. EPA has never even responded to the Band's well-founded requests for notice under Section 401(a)(2). In fact, it was only very recently that we actually understood EPA's purported rationale for failing to provide the Band notice pursuant to Section 401(a)(2).

In particular, the Band filed suit in the federal district court for Minnesota on September 10, 2019 to remedy EPA's arbitrary and unlawful conduct with respect to Section 401(a)(2). The Band also filed a complaint with EPA's Office of Inspector General ("OIG"), which opened a full investigation into Region 5's handling of the NPDES Permit and the Project's Section 401(a)(2) process. The OIG issued its report on April 21, 2021.

The OIG found that "Region 5 repeatedly declined to make a formal determination under CWA § 401(a)(2) regarding whether federally permitted discharges from the NorthMet project may impact the water quality of the Fond du Lac Band."⁴ The OIG further found that "Region 5's interpretation of CWA § 401(a)(2) allowed the EPA to deny a potential administrative remedy to the tribe simply by neglecting to assess downstream [e]ffects, despite repeated requests."⁵ The OIG also found "EPA arguably did not meet the intent of its tribal and environmental justice policies . . . which aim to ensure consultation, fair treatment, and meaningful involvement of tribes in EPA decisions affecting their health or environment."⁶

⁴ Improved Review Processes Could Advance EPA Regions 3 and 5 Oversight of State-Issued National Pollutant Discharge Elimination System Permits, Report No. 21-P-0122, at 19 (Apr. 21, 2021), https://www.epa.gov/sites/production/files/2021-04/documents/_epaig_20210421-21-p-0122.pdf.

⁵ *Id.*

⁶ *Id.*

The OIG noted that the “Region 5 Office of Regional Counsel asserted that the phrase ‘as determined by the Administrator’ in CWA § 401(a)(2) indicates that it is within the EPA’s discretion whether to make such a determination at all, irrespective of requests from downstream states.”⁷ As the OIG noted, Region 5’s interpretation “*allowed* the EPA to deny a potential administrative remedy to” the Band.⁸ The district court ruled that “EPA had a legal duty to make a ‘may affect’ decision” within 30 days of MPCA’s 401 Certification.⁹ The court concluded that it had jurisdiction to review EPA’s “may affect” determination.¹⁰ As result, EPA requested a voluntary remand so that EPA could make the “may affect” determination required by Section 401(a)(2). The district court granted that motion on March 8, 2021. Based on the Band’s extensive prior comments and submissions regarding the Project, as well as this letter and attached exhibits, EPA must now determine that the Project’s discharges “may affect” the Band’s water quality.

II. Environmental Justice.

The proposed Project presents significant environmental justice issues that have never been fully addressed or analyzed by EPA or the U.S. Army Corps of Engineers. For years, including throughout the NEPA review process, the Band has raised environmental justice concerns because the Project would allow a company to enjoy substantial financial gains while creating a disproportionately high and adverse human health and environmental effects on minority and low-income populations. During the April 23, 2021 Tribal consultation, members of the Reservation Business Committee, the Band’s governing body, also highlighted that the impacts from the Project will only exacerbate legacy mining impacts that adversely affect the Reservation and the St. Louis watershed today and result in the Band and its members once again being disproportionately affected given their reliance on the waters and related natural resources.

Executive Order 12,898 directs “each Federal agency shall make achieving environmental justice part of its mission by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of its programs, policies, and activities on minority populations and low-income populations in the United States”¹¹ This includes collecting and maintaining and analyzing “information on the consumption patterns of populations who primarily rely on fish and/or wildlife for subsistence.”¹²

EPA’s Environmental Justice Policy affirms the agency’s commitment to provide federally recognized tribes “fair treatment and meaningful involvement in EPA decisions that may affect

⁷ *Id.* at 23.

⁸ *Id.* at 19 (emphasis added).

⁹ *Fond du Lac Band of Lake Superior Chippewa v. Wheeler*, No. 19-CV-2489 (PJS/LIB), 2021 WL 603754, at *12 (D. Minn. Feb. 16, 2021).

¹⁰ *Id.* at **10-12.

¹¹ Exec. Order No. 12,898, § 1-101, 59 Fed. Reg. 7629, 7629 (Feb. 16, 1994).

¹² *Id.* § 4-401.

their health or environment.”¹³ This includes “early meaningful involvement opportunities for federally recognized tribes . . . at all stages of Agency activity, including the development of public participation activities, the administrative review process, and any analysis conducted to evaluate environmental justice issues.”¹⁴ EPA policy also provides that “[j]ust as EPA’s deliberations and activities have traditionally involved the interests and/or participation of State Governments, EPA will look directly to Tribal Governments to play this lead role for matters affecting reservation environments.”¹⁵

Additionally, federal agencies have the duty to consider and protect treaty rights in making decisions.¹⁶ The Band’s exercise of its 1854 Treaty rights in the Ceded Territory and within its Reservation requires natural resources that are not contaminated.¹⁷ EPA’s own policies further acknowledge that “[i]n keeping with th[e] trust responsibility, the Agency will endeavor to protect the environmental interests of Indian tribes when carrying out its responsibilities that may affect the reservation.”¹⁸

A. Legacy Mining Environmental Justice Impacts.

Under the Treaty of LaPointe of September 30, 1854 (“1854 Treaty”),¹⁹ in exchange for ceding large portions of land in northeastern and east-central Minnesota, several member Bands of the Minnesota Chippewa Tribe, including the Fond du Lac Band, retained the right to hunt, fish, and gather in their Ceded Territory in northeastern Minnesota.²⁰ Those Band members, including members of the Fond du Lac Band, rely to this day on their Treaty rights to hunt, fish and gather within the Ceded Territory for subsistence and as an integral part of their culture. The 1854 Treaty also established a Reservation along the St. Louis River for the Fond du Lac Band as the Band’s permanent homeland where Band members all have the right to hunt, fish and gather.²¹

¹³ EPA Policy on Environmental Justice for Working with Federally Recognized Tribes and Indigenous Peoples at 1 (July 24, 2014), <https://www.epa.gov/sites/production/files/2017-10/documents/ej-indigenous-policy.pdf>.

¹⁴ *Id.* at 2.

¹⁵ EPA Policy for the Administration of Environmental Programs on Indian Reservations at ¶ 2 (Nov. 8, 1984), <https://www.epa.gov/sites/production/files/2015-04/documents/indian-policy-84.pdf>.

¹⁶ *E.g., Nw. Sea Farms, Inc. v. U.S. Army Corps of Eng’rs*, 931 F. Supp. 1515, 1519-20 (W.D. Wash. 1996) (citing *Seminole Nation v. United States*, 316 U.S. 286, 296-97 (1942)).

¹⁷ *See Michigan v. U.S. EPA*, 581 F.3d 524, 525 (7th Cir. 2009) (recognizing that a tribe’s “cultural and religious traditions . . . require the use of pure natural resources derived from a clean environment”).

¹⁸ EPA Policy for the Administration of Environmental Programs on Indian Reservations at ¶ 5 (Nov. 8, 1984), <https://www.epa.gov/sites/production/files/2015-04/documents/indian-policy-84.pdf>.

¹⁹ 10 Stat. 1109.

²⁰ *Id.* art. 1.

²¹ *Id.* art. 2.

The Project will be located in within the St. Louis Watershed and the Mesabi Iron Range. The St. Louis River watershed (called *Chi-gamii-ziibi* by the Ojibwe) is encompassed within the Ceded Territory and has been home to the Band for centuries.

Ancestors of present day Band members resided in th[e Project] area for centuries and many Band members followed traditional practices extensively until about a generation ago when the effects of mining devastated the rice beds in the Embarrass and St. Louis River watersheds and closed access to large tracts of public (USFS) land where traditional harvest and collection areas occur. Th[e] proposed Tribal Historic district encompasses complex trail system, Indian villages, trading posts, encampments for fishing, hunting, wild rice harvest and processing, sugar bush, and other traditional subsistence practices. It includes what was essentially a ‘water highway’ used by the Ojibwe at the time of European contact, and subsequently by Voyagers during the era of heavy fur trading. In addition, numerous medicinal plant gathering sites, Midewewin lodges, vison quest locales and other sacred places occur.²²

The Mesabi Iron Range is the largest mining complex in the nation. Mining throughout the Mesabi Iron Range has been occurring since the 1880s, focused in large part on ore extraction. As natural iron ore supplies decreased, industry began to use taconite to develop iron-ore. The taconite iron-ore industry produces significantly more tailings as a byproduct than natural ore. Pollution from mining activities makes its way downstream, heavily affecting natural resources in the lower portions of the watershed.²³ “It is well documented that mining effluent has increased levels of contaminants such as heavy metals in downstream water bodies. This creates health hazards for both people and wildlife.”²⁴

By 1987 the St. Louis River was identified as a “Great Lakes Area of Concern” which is defined by the EPA “as ‘specifically designated geographic areas within the Great Lakes basin that have experienced severe environmental degradation, largely due to the impact of decades of uncontrolled pollution.’”²⁵ Even after discharges of pollutants were treated as later required by the Clean Water Act, “remaining concerns included legacy contamination, habitat degradation, and excess sediment and nutrient inputs.”²⁶ The St. Louis River remains one of the 38 remaining Areas of Concern in the Great Lakes region—and the only Area of Concern in Minnesota.²⁷ In particular,

Mining is the largest source of mercury emissions in the Lake Superior basin, and is detrimental to the environment and human health. Elemental mercury is converted to methylmercury through bacterial activity, at which point it becomes

²² Ex. 7, Tribal Cooperating Agencies Cumulative Effects Analysis, at 8-9 (Sep. 2013).

²³ Ex. 9, Earth Economics – The Value of Nature’s Benefits in the St. Louis River Watershed Report at 7 (Jun. 2015) (citing U.S. EPA, 1968).

²⁴ *Id.* at 28.

²⁵ *Id.* at 26 (citing U.S. EPA, 2014).

²⁶ *Id.* (citing LimnoTech, 2013).

²⁷ *Id.*

available to the aquatic food web. Methylmercury then bioaccumulates at high concentrations in fish, wildlife, and humans, resulting in human and ecological health risks. Some tributaries of the St. Louis River have concentrations of sulfate, manganese, and mercury at levels exceeding Minnesota Water Quality Standards (Bois Forte Band of Chippewa et al., 2013). In addition, land conversion from forest and wetland for the creation of open-pit mines creates contaminated landscapes and results in the loss of benefits like water purification, habitat, and flood risk reduction.²⁸

A study published in 2011 highlights the severity of the environmental degradation within the St. Louis watershed—it found that approximately 10% of newborns in the region “have concentrations of mercury above safe levels,” likely due to their mother’s consumption of mercury contaminated fish.²⁹

Thus, with development of non-Indian economies over time, the Band has seen its wild rice waters (called *manoomin* in Ojibwe) degraded and its lake sturgeon wiped out by water quality degradation and pollution. The remaining fish are now so high in mercury that the Band members cannot safely feed the fish to their children. Many of these impacts are attributable to mines upstream of the Reservation and failed enforcement of Minnesota’s water quality standards on the mining industry. Despite these impacts, the Band continues to work hard and actively exercises its authority to restore and protect its waters and Treaty resources for future generations.

B. The Project’s Environmental Justice Impacts.

Construction and operation of the Project will have a combined impact on the natural and physical environment that will significantly and adversely affect the Band. The adverse cultural, social, economic, and ecological impacts to the Band are interrelated to the adverse impacts to the natural and physical environment that will result from the Project. The additional environmental effects of the Project will be significant and will have an adverse impact on the Band that appreciably exceed or will likely appreciably exceed the effects on the general population.

The Project is an open-pit sulfide mine which is sought by a privately-owned company and intended, first and foremost, to generate profits for that company. Although the Project may generate a “small number of jobs” and some tax revenues, those are the only potential benefits which may inure to the public and will very likely be negated by the potential adverse environmental impacts of the project that are projected to occur during construction, operation, and indefinite reclamation of the Project.

Significantly, the Project will result in a loss of Band members’ ability to exercise their Treaty rights within the Project area and, as noted above, will result in the destruction of around 900 acres of pristine wetlands in the Ceded Territory. The Project will be a source of discharges and pollution in northern Minnesota in perpetuity—aside from operations, the Project will have a permanent

²⁸ *Id.* at 28.

²⁹ *Id.*

reactive waste rock stockpile, a tailings basin built on top of an old existing tailings basin, which holds legacy tailings that currently contaminate ground and surface water, and a massive pit lake requiring water treatment in perpetuity. The Project will not only impact Treaty rights and resources in the Ceded Territory but result in adverse impacts to the Band's Reservation, including violations of the Band's federally approved water quality standards.

As detailed below and in numerous submissions sent to or shared with EPA, the Project is likely to adversely and disproportionately impact to the Band's downstream Reservation waters and Treaty natural resources. For example, in an October 31, 2018 letter to EPA and other agencies the Band explained that the St. Louis River downstream of the Project and within the Band's Reservation is already impaired and fails to meet the Band's water quality standards.³⁰ And after reviewing the Project for years, the Band's water quality staff determined that it will negatively impact the Band's waters, including with respect to mercury.³¹ This is significant because Band members rely on fish within the St. Louis for subsistence and cultural purposes. A relatively recent study undertaken by the Band also details the socio-economic value of the St. Louis River and watershed to the Band.³² That Study provides an overview of the negative impacts to the watershed that Indian tribes, including the Band, have experienced over time due to changes in land cover and land use.³³ Additional impacts to the Band's waters and Reservation resources will only further compound the harmful environmental and health effects that the Band is already experiencing. These harms will directly impact Band members health and welfare within the Reservation.

Moreover, the Mount Polley dam failure in British Columbia and the Brumadinho mine disaster in Brazil are tragic reminders of the real life impacts that mining operations can have on surrounding communities.³⁴ The Mount Polley dam was an upstream dam that failed in 2014 because the mining company did not properly characterize its foundation, which meant that the upstream dam "lifts" did not meet necessary safety factors. The dam's failure discharged 24 million cubic meters of mining waste into local watersheds.³⁵ Similarly, the Brumadinho mine incident was caused by the collapse of an upstream tailings dam, which discharged 11.7 million

³⁰ Ex. 12, Fond du Lac Band of Lake Superior Chippewa Letter to EPA, at 3 (Oct. 31, 2018).

³¹ *Id.* at 3-4.

³² Ex. 9, Earth Economics – The Value of Nature's Benefits in the St. Louis River Watershed Report (Jun. 2015).

³³ *Id.* at 71-74.

³⁴ "Between 2007 and 2017, there were at least 10 very serious mine tailings dam failures around the world. These involved multiple loss of life, approximately 20 lives per incident and/or the release of at least one million cubic metres of water." United Nations, Dam or be Damned: Mining Safety under Scrutiny, <https://www.unenvironment.org/news-and-stories/story/dam-or-be-damned-mining-safety-under-scrutiny>; see also Vale tailings dam collapse add to long list of mining disasters, <https://www.reuters.com/article/us-vale-sa-disaster-accidents-factbox/factbox-vale-tailings-dam-collapse-adds-to-long-list-of-mining-disasters-idUSKCN1PN1T6>.

³⁵ *Mount Polley Mine Disaster: 3 Years Later Concerns Still Remain*, CBS News (Aug. 4, 201), <https://cbc.ca/news/canada/british-columbia/mount-polley-mining-fears-1.4235913>.

cubic meters of tailings.³⁶ The incident resulted in hundreds of human deaths and unknown impacts to natural resources and local economies. This tragedy is a somber reminder that it is essential that mining operations like the NorthMet Project are not only fully and properly evaluated *before* they are permitted and constructed; but that adequate and enforceable conditions are placed in final permits to protect against such incidents, which result in massive discharges of contaminated pollutants, cause tragic and unnecessary deaths, as well as environmental destruction.

Here, PolyMet proposes to pile millions of tons of reactive mine waste—covered with a 1000-acre lake—behind an earthen dam that will grow to 252 feet high. This dam will be constructed on the uncertain foundations of a prior mining company’s unlined earthen tailings dam. The original dam was constructed in stages beginning in the 1950s and PolyMet’s tailings will be added on top of the older tailings.³⁷ As tailings are added, the perimeter dams of the tailings basin will be raised using an upstream construction method.³⁸ The dam will then be expected to hold back waste from the prior mining company and PolyMet for hundreds of years, long after mining has ceased. As real events have shown, this method of construction is more likely to fail over time.³⁹ The environmental review completely failed to require PolyMet to perform an analysis showing the impacts from a catastrophic failure of the dam despite the impacts such a failure are almost certainly to have on the Band’s Treaty resources and downstream Reservation.⁴⁰ Even so, PolyMet’s insufficient and limited analysis of a dam breach on the north side of the tailings dam showed that a breach would inundate watersheds that flow into the Embarrass River.⁴¹ As a tributary to the St. Louis such discharges, releases of pollutants, and impacts are likely to impact the Band downstream.

In sum, the environmental justice impacts that will be created by the Project would have a disproportionately high and adverse health and environmental effects on minority populations and low-income populations.

III. Treatment of Tribes as States.

The Band has treatment as State (“TAS”) status for purposes of the CWA.⁴² EPA has acknowledged that Congress did not intend “to treat Tribes as ‘second class’ States under the CWA.”⁴³ As with States, EPA recognizes that it may “object to the upstream NPDES permit and,

³⁶ Death toll rises in Brazil dam collapse as mining company faces criticism, <https://www.cnn.com/2019/01/27/americas/brazil-dam-collapse/index.html>.

³⁷ Final Environmental Impact Statement (“FEIS”) at 3-89.

³⁸ FEIS at 3-104 to 3-105.

³⁹ *See, e.g.*, United Nations, Mine Tailings Storage: Safety is no Accident at 29 (“Centerline and upstream dams are not as inherently safe as downstream construction.”), https://gridarendal-website-live.s3.amazonaws.com/production/documents/s_document/371/original/RRA_MineTailings_lo_res.pdf?1510660693.

⁴⁰ *See, e.g.*, Ex. 22 (FDL Comments and Objections on Draft Permit to Mine); Ex. 23 (FDL Comments on Dam Safety Permits).

⁴¹ Ex. 4, Barr Tech. Mem. re FTB Dam Break Analysis (Dec. 4, 2012).

⁴² 33 U.S.C. § 1377(e).

⁴³ 56 Fed. Reg. 64,876, 64,886 (Dec. 12, 1991).

if necessary, to assume permitting authority” to ensure compliance with the water quality standards of a downstream Tribe with TAS.⁴⁴ Likewise, EPA recognizes that Section 401(a)(2) provides for “a State or Tribe to participate in extraterritorial actions that will affect its waters if a Federal license or permit is involved.”⁴⁵ Thus, a Tribe with TAS may adopt more stringent water quality standards and those standards may be enforced against upstream dischargers.⁴⁶

IV. The Administrator’s “May Affect” Determination is a “Low Bar” of Possible Effects on Water Quality.

Region 5 career staff correctly acknowledged in 2016 that EPA’s “may affect” determination is a “low bar.” Indeed, the statute’s plain language simply calls for a determination of possible effects on another State’s water quality.⁴⁷ An undefined term in Section 401(a)(2) must be construed “in accordance with its ordinary or natural meaning.”⁴⁸ The word “may” means to “be a possibility.”⁴⁹ An “affect” means to “produce an effect on.”⁵⁰ Thus, the Administrator must determine whether a Project’s discharges have the possibility of affecting another State’s water quality.

According to Section 401(a)(2)’s plain language, the water quality effects simply need to be possible – not certain, and not even probable.⁵¹ The breadth of Section 401(a)(2) reflects its importance as an interstate water pollution mechanism. As the district court noted in this case, the purpose of Section 401(a)(2) is “to provide a mechanism to work out potential interstate conflicts over water pollution.”⁵² Issues concerning “[i]nterstate waters have been a font of controversy since the founding of the Nation.”⁵³ The district court noted Congress’s policy in the CWA “to recognize, preserve, and protect the primary responsibilities and rights of States to prevent, reduce, and eliminate pollution, to plan the development and use (including restoration, preservation, and enhancement) of land and water resources and to consult with the Administrator in the exercise of his authority under [the CWA].”⁵⁴ Because there is no other qualifying language, the water quality effects may be direct, indirect, cumulative, beneficial, benign, adverse, or of an undetermined

⁴⁴ *Id.* at 64,887.

⁴⁵ *Id.* at 64,890.

⁴⁶ *See id.* at 64,886; *City of Albuquerque v. Browner*, 97 F.3d 415, 423-24 (10th Cir. 1996); *Wisconsin v. EPA*, 266 F.3d 741, 748 (7th Cir. 2001) (Tribe with TAS “has the power to require upstream off-reservation dischargers, conducting activities that may be economically valuable to the state (e.g., zinc and copper mining), to make sure that their activities do not result in contamination of the downstream on-reservation waters”).

⁴⁷ *See* 33 U.S.C. § 1341(a)(2).

⁴⁸ *S.D. Warren Co. v. Maine Bd. of Env’tl. Protection*, 547 U.S. 370, 376 (2006) (quoting *FDIC v. Meyer*, 510 U.S. 471, 476 (1994)).

⁴⁹ Black’s Law Dictionary (11th ed. 2019).

⁵⁰ *Id.*

⁵¹ To be sure, the Band has consistently demonstrated that the Project’s discharges will affect its water quality so it is certainly more than probable.

⁵² *Wheeler*, 2021 WL 603754, at *9.

⁵³ *Id.* (quoting *Arkansas v. Oklahoma*, 503 U.S. 91, 98 (1992)).

⁵⁴ *Id.* (quoting 33 U.S.C. § 1251(b)).

nature.⁵⁵ In other words, the Administrator's *only* basis for making a negative determination under Section 401(a)(2) is that it's impossible for discharges to affect another State's water quality. Certainly, that is not the case here with respect to the Band's water quality.

In the context of Section 401(a)(2), an "effect" is a result, outcome, or consequence from any discharge that may result from a federally permitted project on "the quality of the waters of any other State." 33 U.S.C. § 1341(a)(2). In the CWA context, this could be a chemical, physical, or biological effect on the Band's waters.⁵⁶ This includes, for example, a discharge's effects on fishing, fish habitat, and aquatic life downstream.⁵⁷

EPA's regulations simply require the determination to be "in writing, be dated, and identify the materials provided by the Federal agency."⁵⁸ EPA's prior practice with other determinations made and notices issued under Section 401(a)(2) confirm the low standard. EPA is not called upon to make a "will affect" determination because the statute assigns that responsibility to the affected State.⁵⁹ In short, the Administrator simply needs to determine whether it is possible that the Project's discharges "may affect" the Band's water quality.⁶⁰

V. Current Water Quality Issues in the St. Louis River.

The Band has demonstrated for years that mining activities upstream of the Reservation result in existing water quality issues in the St. Louis River. The reach of the St. Louis River within the Reservation has consistently exceeded the Band's mercury standard of 0.77 ng/L. EPA has acknowledged this impairment on several occasions, including in Region 5's 2018 comments on PolyMet's draft NPDES Permit. Fish tissue collected by the Band in 2001, 2008, and 2015 demonstrated mercury concentrations that exceed human health risk levels and required advisories

⁵⁵ Likewise, the U.S. Fish and Wildlife Service has interpreted the same standard of "may affect" for purposes of the Endangered Species Act ("ESA") as being triggered "by the possibility of take . . . regardless of how unlikely that possibility may have seemed." *Pac. Shores Subdivision Cal. Water Dist. v. U.S. Army Corps of Eng'rs*, 538 F. Supp. 2d 242, 261 (D.D.C. 2008). The ESA standard shares a similar purpose with Section 401(a)(2) in that they both are designed to allow federal agencies satisfy their duty to ensure compliance with relevant environmental standards. Compare 33 U.S.C. § 1341(a)(2) (federal permitting agency must "insure compliance with applicable water quality requirements") with *Karuk Tribe of Cal. v. U.S. Forest Serv.*, 681 F.3d 1006, 1027 (9th Cir. 2012) ("may affect" is a "low" threshold for triggering consultation because its purpose is "to allow Federal agencies to satisfy their duty to 'insure' that their actions do not jeopardize listed species or adversely modify critical habitat").

⁵⁶ See 33 U.S.C. § 1251(a) (CWA's purpose is "to restore and maintain the chemical, physical, and biological integrity of the Nation's waters").

⁵⁷ See, e.g., *S.D. Warren*, 547 U.S. at 385; *El Dorado Chemical Co. v. EPA*, 763 F.3d 950, 957-59 (8th Cir. 2014) (upholding EPA's authority to consider effects on aquatic life in downstream waters).

⁵⁸ 40 C.F.R. § 121.12(c)(1).

⁵⁹ See 33 U.S.C. § 1341(a)(2).

that recommend Band members limit consumption of traditional preferred species. These conditions have affected Band members in their use of the St. Louis River for subsistence and cultural purposes. The St. Louis River within the Reservation is impaired for mercury and mercury in fish tissue and it is not meeting its designated uses.

Additionally, sulfate is transported downstream from currently operating mines, abandoned mine pits, and tailing basins in the Mesabi Range to the Reservation. Sulfate transported downstream from mining activity causes elevated levels of toxic methylmercury in the fish in the St. Louis River within the Reservation. Sulfate also affects wild rice because wild rice grows best in waters with low sulfate concentrations.

The Band has also traced upstream mining discharges to elevated specific conductance, which is the ability of dissolved solids to conduct an electric current. Specific conductance has adverse effects on aquatic life. The Band has shown that elevated specific conductance levels can persist for nearly 126 miles downstream of the nearest upstream mining discharge site.⁶¹ Specific conductance affects fish species that are culturally important to the Band. For example, lake sturgeon is a culturally important species for the Ojibwe and were nearly extirpated in the St. Louis River by habitat degradation and pollution. Lake sturgeon are sensitive to industrial pollutants. Since the 1990s, the Band's Natural Resources Program has been stocking sturgeon eggs and fry to stock and re-establish sturgeon in the Band's reach of the St. Louis River. The Band is especially concerned about protecting water quality in the St. Louis River in order to promote the Band's decades-long efforts to re-establish lake sturgeon in the River.

VI. Effects on the Band's Water Quality.

The Project's discharges will affect the Band's water quality. This section is aimed at providing a summary of new information for EPA to consider based on expert memoranda that have been developed for this remand, which confirms the Band's and EPA's prior analyses on this issue. In addition to the effects discussed in this section, EPA must consider all of the Band's prior submissions and additional relevant materials that are attached as exhibits to this letter, which are described in the accompanying Index.

As the Band has consistently asserted, the CWA requires the Project to comply with the Band's water quality standards, including the Band's narrative and numeric criteria, designated uses, and antidegradation provisions.⁶²

The Band has a human health numeric criterion for mercury of 0.77 ng/L.⁶³ This mercury standard is significantly lower than Minnesota's GLI standard for mercury of 1.3 ng/L. The Band's standards are more protective of water quality and have been calculated to assume a higher fish consumption rate by Band members of 60 grams/day than both the general public (17.5 grams/day) and Minnesota's consumption rate for the Lake Superior Basin (30 grams/day). The Band also

⁶¹ Ex. 7, Tribal Cooperating Agencies Cumulative Effects Analysis, at 16.

⁶² 33 U.S.C. § 1341(a)(2); 40 C.F.R. §§ 122.4(d), 230.10(b)(1).

⁶³ Ex. 28, Water Quality Standards of the Fond du Lac Reservation, Appendix 1.

recently adopted a numeric criterion for specific conductance of 300 $\mu\text{S}/\text{cm}$ to protect aquatic life.⁶⁴ The Band also has a numeric criterion for sulfate of 10 mg/L for any “lake or stream which supports wild rice growth.”⁶⁵

The Band’s water quality standards include narrative criteria that also apply, such as the Band’s narrative standards for waters to “be free from . . . substances that enter the waters as a result of human activity . . . that will adversely affect aquatic life”;⁶⁶ to “be free from substances entering the waters as a result of human activity in concentrations that are toxic”;⁶⁷ and “[w]ater . . . quality and habitat alterations that may limit the growth and propagation of, or otherwise cause or contribute to an adverse effect to wild rice and other flora and fauna of cultural importance to the Band.”⁶⁸

The Band’s water quality standards also provide designated uses that apply, including designated uses for subsistence fishing and cultural purposes.⁶⁹ The Band’s water quality requirements are more stringent than Minnesota’s because they protect specific uses that are unique to the Band, such as subsistence fishing and Ojibwe traditional lifeways. Finally, the Band has antidegradation provisions.⁷⁰

EPA Region 5’s own analysis has acknowledged effects on the Band’s water quality. In particular, Region 5’s written comments on PolyMet’s draft NPDES permit recognized that “downstream receiving waters exceed the applicable . . . downstream state human health and wildlife water quality standard for mercury.”⁷¹ Region 5 noted that PolyMet’s “pilot study states that the effectiveness of the treatment system to remove mercury is unknown.”⁷² Region 5 commented that “MPCA should ensure that its permit will ensure compliance with downstream state WQS.” Region 5 “believe[d] the facility has a reasonable potential to exceed WQS”

Region 5 also found effects from PolyMet’s “draining of over 900 acres of wetlands, which are dominated by peat bogs.”⁷³ Region 5 found “[t]his activity is expected to release significant

⁶⁴ *Id.* § 301(k).

⁶⁵ *Id.* § 301(p).

⁶⁶ *Id.* § 301(a).

⁶⁷ *Id.* § 301(e).

⁶⁸ *Id.* § 301(n).

⁶⁹ *Id.* § 302(C)(3), (E); *see also PUD No. 1 of Jefferson Cnty. v. Wash. Dep’t of Ecology*, 511 U.S. 700, 715 (1994) (project must “be consistent with *both* components, namely, the designated use *and* that water quality criteria”) (emphasis in original).

⁷⁰ Ex. 28, Water Quality Standards of the Fond du Lac Reservation § 105.

⁷¹ Ex. 11, Letter from Kevin M. Pierard, Chief, Region 5 NPDES Program Branch, EPA, to Jeff Udd, Metallic Mining Dir., Minn. Pollution Control Agency, re: EPA Comments on Public Notice Draft NPDES Permit (Apr. 5, 2018). The Band notes that it has since been established through testimony by Mr. Pierard in a separate state proceeding regarding the NPDES Permit that this comment referred to the Band and its water quality standards.

⁷² *Id.*

⁷³ *Id.* at 5.

amounts of mercury into downstream navigable waters.”⁷⁴ Region 5 concluded that “mercury from this aspect of the project” was “wholly unregulated.”⁷⁵

A. Mercury and Methylmercury.

Dr. Brian Branfireun, an internationally recognized expert on mercury dynamics, has once again opined on the Project’s mercury impacts. Dr. Branfireun’s new memorandum appears in Exhibit 30.

Dr. Branfireun states that he maintains his “professional opinion that the weight of the scientific evidence indicates that the NorthMet project would create a substantial risk of ecologically significant increases in water column and fish methylmercury concentrations in downstream waters (including the St. Louis River) due to project-driven changes in hydrology to headwater streams and wetlands, and the release of excess sulfate which stimulates the process of mercury methylation.” Dr. Branfireun describes MPCA’s monitoring in the 401 Certification as “scientifically indefensible” because it will be impossible to detect relevant changes. Dr. Branfireun finds that PolyMet’s cross-media analysis “was so narrowly drawn that more profound mechanisms by which mercury and methylmercury in waters downstream of the NorthMet project were disregarded.” Dr. Branfireun finds conclusions drawn by PolyMet and its consultants “that the proposed development will not have appreciable impacts on water quality are unsupported by data, scientific consensus in the literature, or even a sound conceptual model.”

Dr. Branfireun shows the connection between the headwater wetlands and Partridge and Embarrass Rivers and water quality in the St. Louis River. He discusses how the “potential for transport of either methylmercury or inorganic mercury considerable distances such as from the development site to downstream locations where they contribute ecosystem impairments is no longer in the realm of speculation.” Dr. Branfireun explains a new scientific paper published earlier this year:

A very recent published paper used natural abundance stable isotopes of mercury to trace the origins of mercury in biota in the St. Louis River Estuary (Janssen et al., 2021), and shows unequivocally that SLRE sediment mercury showed significant proportions attributed to industrial sources likely associated with in the estuary. Importantly, some locations well upstream of the estuary also had significant industrial Hg proportions, suggesting the long-distance transport of industrially-derived mercury from unnamed upstream sources. The mercury in biota and fish was a more complex pattern but also reflected these differences, clearly demonstrating that the locations of mercury release, methylations, and bioaccumulation need not be spatially contiguous.

In conclusion, it is my opinion that the releases of mercury, methylmercury and sulfate from the headwater region of the St. Louis River that are likely to be broadly impacted by the NorthMet development will far exceed estimates provided by

⁷⁴ *Id.*

⁷⁵ Ex. 13, EPA Memorandum – Review Summary of NPDES Permit (Dec. 18, 2018).

PolyMet in support of the project's 401 Certification. These releases may affect water quality standards, downstream ecosystem function, and designated uses of aquatic resources by the Fond du Lac Band of Lake Superior Chippewa.

B. Specific Conductance.

The Band recently adopted a numeric criterion for specific conductance of 300 $\mu\text{S}/\text{cm}$ to protect aquatic life.⁷⁶ EPA approved this standard on October 5, 2020.

Specific Conductance (a measure of the ability of water to conduct electrical current) is a collective measure of all dissolved ions in water (including sulfate). The toxicity of these dissolved ions to aquatic life depends on concentrations and combinations which may have additive effects that are not predictable from specific conductance measurements alone (Chapman et al. 2000; Kimmel and Argent, 2009). Hydrological processes and geology govern natural ranges in specific conductance, and its relative stability defines aquatic ecosystem structure and function from watershed to watershed. Acidic discharges from mining activities are most frequently implicated in changes that result in negative consequences for aquatic life.

As discussed above, legacy mining impacts have already resulted in elevated specific conductance in the St. Louis watershed that impairs fish habitat. Based on the land and environmental impacts, discharges, and releases of pollutants, such as sulfate (an acid anion), from the Project, it is likely that there will be additional increases, and variability in, conductance in the St. Louis River that will reach the Band's downstream waters. These impacts are likely to affect the Band's specific conductance water quality standards and negatively affect the Tribal fishery and aquatic life within the Reservation.

C. Effects on the Reservation's Riparian Wetlands, Streams, and Interior Wetlands.

The Project's discharges will also affect water quality in the Reservation's riparian wetlands, streams, and interior wetlands. The Band requested an evaluation of the potential for discharges to affect the Reservation's riparian wetlands, streams and creeks, and interior wetlands.

Matt Schweisberg, a wetlands expert and the former Chief of EPA Region 1's Wetlands Protection Program, identified approximately 9,400 acres of riparian wetlands along the St. Louis River. Mr. Schweisberg's memorandum appears at Exhibit 31. Mr. Schweisberg concluded that seasonal flooding affects approximately 2,400 acres of these riparian wetlands. Mr. Schweisberg also identified three major streams on the Reservation—Fond du Lac Creek, Stony Brook, and Simian Creek—and their adjacent wetlands that would receive water from the St. Louis River due to seasonal flooding. The wetlands are known sites where mercury methylation occurs because they contain organic-rich soils, such as peats. The wetlands can also support the growth of wild rice.

Because there is a direct surface water connection between the Mine and Plant Sites and the St. Louis River, Mr. Schweisberg concluded that the Project's contaminated discharges would be

⁷⁶ Ex. 28, Water Quality Standards of the Fond du Lac Reservation § 301(k).

transported to the Reservation's riparian wetlands and Fond du Lac Creek, Stony Brook, Simian Creek, and their adjacent wetlands. Mr. Schweisberg concluded that this will result in non-compliance with the Band's designated uses and antidegradation standards:

I expect that discharged waters from the Mine and Plant sites containing elevated levels of mercury and sulfates will interact with dissolved organic matter to generate methylmercury that will be transported downriver to Reservation waters and wetlands, especially in the event of floods. Methylmercury will bioaccumulate and biomagnify in fish and other aquatic life in the River, streams and wetlands and impair designated uses such as subsistence fishing, warm water fish, wildlife (especially piscivorous birds and mammals such as herons and river otter), and, potentially, wild rice areas.

[T]he unavoidable leakages and releases of process water, leachate, and stormwater containing mercury, sulfides/sulfates, and inorganic and methylmercury, will almost certainly result in degrading the ecological functions and services of the affected Reservation waters and wetlands, including existing uses, as well as the loss of their ecological integrity.

* * *

The science is clear that the Project's discharges "may affect" the Band's water quality. The Band urges EPA to make that positive determination and issue notice to the Band pursuant to Section 401(a)(2).

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Sincerely,



Kevin R. Dupuis, Sr.
Chairman

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