Paul Hlavinka, Industrial Stormwater Permits Division Maryland Department of the Environment Water and Science Administration 1800 Washington Blvd., Ste. 455 Baltimore, MD 21230-1708 paul.hlavinka@maryland.gov

Re: Comments on Remand of General Permit for Discharges from Stormwater Associated with Industrial Activities - 20-SW / MDR000.

Dear Mr. Hlavinka,

Blue Water Baltimore, Chesapeake Bay Foundation, Chesapeake Legal Alliance, the Environmental Integrity Project, Gunpowder Riverkeeper, Potomac Riverkeeper Network, and Waterkeepers Chesapeake, along with the other stakeholders listed below submit these comments on the Maryland Department of Environment's ("Department") limited remand of the November 18, 2022 final determination to issue the General Permit for Discharges from Stormwater Associated with Industrial Activities, Permit No. 20-SW / MDR000 ("Permit", or "20SW"). We thank you for the opportunity to comment.

The 20SW is unquestionably one of the most important permits issued by the Department. Rather than regulating a single facility, this Permit regulates nearly 1,500. And rather than regulating a facility required to thoroughly treat its wastewater before discharging it into a nearby waterway, these permittees generally release thousands of different, untreated chemicals directly into state waters.

An average acre of impervious surfaces in central Maryland produces nearly one million gallons of stormwater per year - almost one and a half Olympic-size swimming pools - carrying with it well-studied toxic contaminants, including gasoline and oil byproducts, dioxins, PCBs, PAHs, PFAS, and pesticides, as well as hundreds of pounds of acutely toxic heavy metals like lead.<sup>1</sup> To give context to this vast amount of pollution coursing through our urban areas, consider that the National Academy of Sciences recently issued a report that found that the largest source of oil in the oceans is not from spills from ships, leaks from wells, or catastrophes like the Deepwater Horizon or Exxon Valdez, but rather from urban runoff.<sup>2</sup>

As described further below and in our organizations' comments during the original

<sup>&</sup>lt;sup>1</sup> Based on a review of data from the National Stormwater Quality Database.

<sup>&</sup>lt;sup>2</sup> Oil in the Sea IV: Inputs, Fates, and Effects. National Academies of Sciences, Engineering, and Medicine. 2022. Available at: https://doi.org/10.17226/26410.

comment period for this Permit, the industrial facilities polluting our communities and waterways with toxic runoff are not evenly distributed across the state of Maryland. Rather, they tend to be clustered in urban areas and in specific census tracts. For those living in fenceline communities closest to the numerous dense clusters of industrial facilities, all of this pollution means continual toxic exposure from pollution on their sidewalks, in their soil, and even from tracking toxic residue on carpets in people's homes. As the Maryland Attorney General recently said "[i]n the communities adjacent to industrial facilities, even a small amount of stormwater runoff can be dangerous for public health and the environment." In the record prepared by the Department for this general permit, one document from Virginia DEQ analyzed PCB monitoring data and found that industrial stormwater facilities emit PCBs in concentrations that are vastly higher than other classes of water pollution dischargers.<sup>4</sup>

For these and many other reasons, the Department has an opportunity to substantially increase the level of protection for urban communities and waterways in Maryland by altering this permit. Through this permit remand, we urge the Department to fix three of the most glaring problems with this statewide permit: its ineffective environmental justice provisions; the insufficient no-exposure provisions and broader issue of unpermitted discharges; and the use of outdated rainfall data. We strongly urge the Department to make significant changes to the General Permit in order to advance the State's priorities with respect to environmental justice, climate change, and protection of water quality for the Chesapeake and Atlantic coastal bays. A few recommended changes and an explanation of our concerns are included in three separate sections below.

I. Strengthen the Permit's Environmental Justice Provisions By Adding New Requirements for Permittees in Areas with a Maryland EJScore of .76 or above

The Permit's environmental justice provisions, found in Part V.A.2.b, the "Comprehensive Site Compliance Evaluation" section, are insufficient to address the significant environmental justice harms caused by industrial stormwater pollution. The Permit's Annual Comprehensive Site Compliance Evaluation reporting provision only applies to a minority of the facilities in census tracts with a Maryland EJScore of .76 or above (approximately 40 facilities were identified by MDE). Even when they do apply, they fail to include any substantive monitoring or compliance requirements - they are simply a requirement to submit an existing compliance evaluation.

<sup>&</sup>lt;sup>3</sup> Maryland Enters into Consent Decree with ABF Freight System to Resolve Allegations of Clean Water Act Violations. March 20, 2023. Press Release from Anthony G. Brown, Maryland Attorney General. Available at: https://www.marylandattorneygeneral.gov/press/2023/032023.pdf.

<sup>&</sup>lt;sup>4</sup> The Relationship between PCBs, VPDES Wastewater/Stormwater Facilities, Stormwater Industrial General Permitted Facilities and the Standard Industrial Classification System (virginia.gov)

Maryland law defines environmental justice as "equal protection from environmental and public health hazards for all people regardless of race, income, culture, and social status." As a recipient of federal funding, the Department is bound to comply with Executive Order 14008, which requires consideration of environmental justice issues in decision making, and Title VI of the Civil Rights Act of 1964, which prohibits agencies receiving federal funds from discriminating on the basis of race, color, and national origin.<sup>6</sup>

The Department's 2022 EJ Policy and Implementation Plan ("Department EJ Policy") acknowledges that "[n]ational studies show that [EJ] Communities bear a disproportionate share of the negative environmental consequences resulting from industrial activities." This is certainly true for the facilities covered under the Permit.

The Center for Progressive Reform and Environmental Integrity Project's 2017 analysis found that many of the industrial facilities covered under the Permit are clustered in and around low-income neighborhoods.<sup>8</sup> Of 300 facilities in Baltimore City and Baltimore County, 40% were located in overburdened census tracts.<sup>9</sup> In Baltimore City, 69% of facilities were in overburdened tracts.<sup>10</sup> Eight facilities were located in the top 10 percent of census tracts most burdened by environmental justice factors.<sup>11</sup> Commenters further found that census tracts with a large number of industrial facilities were flagged in the EPA environmental justice data screening tool as having an extremely elevated risk of exposure to environmental threats.<sup>12</sup> The disproportionate proximity of lower income communities and communities of color to industrial facilities is not by chance, but the result of structural racism and discriminatory housing and zoning practices.<sup>13</sup>

The high concentration of polluting facilities in these communities also contributes to growing health disparities. For example, residents of South Baltimore, an area of significant industrial activity, experience higher rates of asthma emergency room visits and hospitalizations, cancer, and heart attacks compared to the state, on average.<sup>14</sup>

<sup>&</sup>lt;sup>5</sup> MD Env. § 1-701.

<sup>&</sup>lt;sup>6</sup> 42 U.S.C. §§ 2000d et seq.; see also 40 C.F.R. §§ 7.30, 7.35 (EPA Title VI regulations).

<sup>&</sup>lt;sup>7</sup> 2022 EJ Policy and Implementation Plan. Available at:

https://mde.maryland.gov/Environmental\_Justice/PublishingImages/Pages/Landing%20Page/Environmental\_al%20Justice%20Policy%20and%20Implementation%20Plan%202022.pdf

<sup>&</sup>lt;sup>8</sup> Chesapeake Accountability Project (CAP), Comments on Tentative Determination Renewal of the General Permit for Discharges from Stormwater Associated with Industrial Activities - 20-SW / MDR000 (Apr. 14, 2021) ("CAP 2021 Comments").

<sup>&</sup>lt;sup>9</sup> *Id*.

<sup>&</sup>lt;sup>10</sup> *Id*.

<sup>&</sup>lt;sup>11</sup> *Id*.

<sup>&</sup>lt;sup>12</sup> *Id* 

<sup>&</sup>lt;sup>13</sup> Rothstein, R. *The Color of Law, A Forgotten History of How Our Government Segregated America,* Liveright Publishing Corporation (2018).

<sup>&</sup>lt;sup>14</sup> CAP 2021 Comments.

To protect these overburdened communities, the Department's EJ Policy states that it will "increase compliance in areas disproportionately impacted by health and environmental factors to prevent and reduce burdens on those communities." To do this and protect environmental justice communities and their waters, this permit should add the following provisions to Part V.A.2.b of the Permit. These requirements would apply to all permitted facilities in census tracts with a Maryland EJScore of .76 or above:

# a) Enforceable benchmark monitoring for every covered facility for pH, sediment (TSS), total organic carbon (TOC) and other pollutants

One of the key requirements in the Permit is that runoff be controlled using structural and/or non-structural control measures "to minimize onsite erosion and sedimentation, and the resulting discharge of pollutants," and "divert, infiltrate, reuse, contain, or otherwise reduce stormwater runoff, to minimize pollutants in your discharges." Permit III.B.1.b.v-vi. As MDE acknowledges, benchmarks are one of only two ways to determine whether a permittee's stormwater management plan is actually working.

When is a permittee in compliance or non-compliance with the "management of runoff" [requirement] and how is this measured? Compliance with the "management of runoff" condition, like other conditions is site-specific. The operator is required to implement sector-specific best management practices and other mitigation actions that effectively reduce the exposure of stormwater contaminants as well as any migration of contaminants. **Exceeding benchmarks or evidence of pollutants in visual monitoring indicates that this "management of runoff" condition has not been met and the implementation of corrective actions (i.e., additional or alternative best management practices) is required. And, if benchmarks and visual monitoring requirements are met, the permittee is in compliance.** 

Department Response to Comments<sup>15</sup> at p. 43-44 (emphasis added). Visual monitoring is inadequate for many stormwater pollutants, including most toxic metals since they do not significantly change the visual appearance of the water. Without benchmarks then, there is no way of enforcing the permit requirements to manage runoff and not to cause or contribute to an exceedance of water quality standards. Federal regulations require that permits include monitoring to "assure compliance with permit limitations."<sup>16</sup> Generally, "an NPDES permit is unlawful if a permittee is not required to effectively

<sup>&</sup>lt;sup>15</sup> Department Response to Comments. Available at: <a href="https://mde.maryland.gov/programs/permits/WaterManagementPermits/Documents/GDP%20Stormwater/2">https://mde.maryland.gov/programs/permits/WaterManagementPermits/Documents/GDP%20Stormwater/2</a> <a href="https://documents/gdp-%20Stormwater/2">OSW/20SW-Response-to-Comments.pdf</a> <a href="https://documents.gdp-%20Stormwater/2">40 C.F.R. § 122.44</a>.

monitor its permit compliance."17 This makes sense - "[e]nforcing compliance with a permit is the key to an effective NPDES program. 18

In these overburdened EJ areas, ensuring compliance with the "management of runoff" provision is needed in order to, per the Department's EJ Policy, "increase compliance in areas disproportionately impacted by health and environmental factors to prevent and reduce burdens on those communities." To assure compliance with this permit limitation, the Permit should add quarterly benchmarks for pH, sediment (TSS), total organic carbon (TOC), and any pollutants in the runoff discharging into waters impaired for that pollutant for every permittee in areas with a Maryland EJScore of .76 and above.

Adding these universal quarterly benchmarks in these vulnerable EJ areas would also be a step in partially rectifying one of the Permit's most glaring flaws - that the Permit is weaker than its federal counterpart, EPA's Multi-Sector General Permit (MSGP) industrial stormwater general permit, because the Permit lacks universal benchmarks for pH, sediment (TSS), and total organic carbon (TOC).<sup>19</sup>

We further request that these benchmarks apply throughout the permit term, since they are a key tool needed to "increase compliance in areas disproportionately impacted by health and environmental factors to prevent and reduce burdens on those communities," as MDE's 2022 EJ Policy directs.

### b) Exclude facilities that have been in significant noncompliance within the previous five years from permit coverage

Communities and their waters are only protected by the 20SW Permit's pollution controls if permitted facilities comply with the Permit's terms. Far too many permitted facilities flagrantly disregard, without significant consequences, basic requirements of the 20SW Permit, like filing Discharge Monitoring Reports ("DMRs") and compiling Annual Reports. As Chesapeake Accountability Project noted in its April 2021 comments, noncompliance from permittees covered under the previous permit is rampant in Maryland - averaging about 70% year after year, according to Department inspection reports. Enforcement of permit noncompliance is also low: the Department took only 14 formal enforcement actions against industrial stormwater permittees from 2017 to 2020, although

https://www.epa.gov/sites/default/files/2021-01/documents/2021 msgp - fact sheet.pdf; cf. 33 U.S.C. § 1370 (states may not adopt or enforce standards that are less stringent than federal standards); City of Burbank v. State Water Resources Control Bd., 108 P.3d 862, 870 (Cal. 2005) ("Nothing in the federal Clean Water Act suggests that a state is free to disregard or to weaken the federal requirements for clean water when an NPDES permit holder alleges that compliance with those requirements will be too costly.").

<sup>&</sup>lt;sup>17</sup> NRDC v. Cnty. of Los Angeles, 725 F.3d 1194, 1207 (9th Cir. 2013).

<sup>&</sup>lt;sup>18</sup> NRDC 2015 v. EPA, 808 F.3d 556, 581 (2d Cir. 2015).

<sup>&</sup>lt;sup>19</sup> EPA MSGP Fact Sheet at p.4. Available at:

approximately 70% of permittees overall were in noncompliance. Essentially, there are little to no consequences for industrial stormwater permittees who cannot or choose not to comply with their permit. This lack of enforcement results in unmitigated harm to communities and waterways.

The Department's failure to enforce the 20SW Permit and the rollback of some permit terms impacts those environmental justice communities where the permitted facilities are clustered. As a case study, from 2020 to 2021 a sweep of industrial stormwater permittees in Baltimore City identified clusters of noncompliant facilities in overburdened communities in West, East, and South Baltimore, totalling 37 facilities between the three areas. All of these facilities had repeated benchmark limit exceedances and permit violations and were located in overburdened areas with elevated EJ scores. Only a few of these noncompliant facilities had recent enforcement actions against them and all have been allowed to operate and pollute under the terms of the Permit.<sup>20</sup>

The Department can and should ramp up inspections and enforcement. It should also add protections against repeat violators into the 20SW Permit for areas with a Maryland EJScore of .76 or above. Specifically, in order to "[i]ncrease compliance in areas disproportionately impacted by health and environmental factors to prevent and reduce burdens on those communities," per MDE's 2022 EJ Policy, the 20SW Permit should include a new limitation on coverage. We request new language that coverage under the 20SW Permit is not available to facilities who: 1) have been in Significant Noncompliance<sup>21</sup> with the 12SW or 20SW permit within the last five years; and 2) are located in census tracts with an index score of .76 or above on Maryland's EJ Score.

Given these facilities' previous noncompliance, these facilities would instead be required to apply for and obtain permits that would include more tailored water quality protections, public notice and comment requirements, and better community protection. This would have a direct positive impact on reducing burdens to the communities in Baltimore City and other urbanized areas in Maryland.

c) Require that every facility, regardless of size, restore twenty percent of the site's impervious surface with runoff controls or their equivalent

The previous 12SW permit's requirement that permittees of more than 5 acres within the Chesapeake Bay watershed must restore 20% of the unrestored impervious surface

<sup>&</sup>lt;sup>20</sup> Chesapeake Accountability Project ("CAP") Priorities and Concerns with Enforcement of the Maryland General Permit for Discharges from Stormwater Associated with Industrial Activities. July 19, 2021. Available at: https://shorturl.at/acesO.

<sup>&</sup>lt;sup>21</sup> See 40 CFR §§ 123.45(a)(2); Appendix A to § 123.45 (federal definitions of Significant Noncompliance/Category I violations).

over the five-year period covered by their permits was one of the most effective ways of reducing stormwater pollution and reducing the cumulative impacts of aggregate point sources in the Chesapeake. However, many industrial stormwater permittees in areas with a Maryland EJ score of .76 or above are on lots smaller than five acres. Given the significant health and environmental justice impacts of industrial runoff, it is inappropriate to effectively treat facilities of less than five acres as *de minimis* contributors of pollution, especially those in these already-overburdened EJ areas. Requiring that these smaller facilities also restore 20% of the unrestored impervious surface over the five-year period will contribute to long-term improvements in water quality. We request new language that requires that every permitted facility located in census tracts with an index score of .76 or above on Maryland's EJ Score, regardless of size, restore twenty percent of the site's impervious surface with runoff controls or their equivalent unless they have already been required to do so in the previous permit term.

### d) Improve community accountability

As noted, the existing industrial stormwater permittees collectively have an abysmal compliance history. More often than not, those facilities' neighbors are the ones who pay the price for this pervasive and continuous state of noncompliance. Additionally, the application of 20SW permit coverage to a specific facility does not require public notice or provide an opportunity for public comment and engagement. The 20SW Permit should therefore, at a minimum, require that information be posted so that these neighbors have basic tools to protect their community. We ask that the 20SW require that every covered facility located in census tracts with an index score of .76 or above on Maryland's EJ Score post a sign that is visible from a public road with the name of the facility, permit number, a description of the purpose of the industrial stormwater permit, and a MDE phone number and email to contact for complaints.

### 2) Conduct a Cumulative Impacts Analysis

In addition to these requests for changes to Part V.A.2.b of the 20SW Permit, we ask that the Department take steps now to ensure that, when drafting the 2026 industrial stormwater general permit, the permit is not contributing to disproportionate, significant cumulative impacts on already overburdened communities.

Cumulative impacts are the totality of exposures to combinations of chemical and non-chemical stressors and their effects on community health, well-being, and quality of life outcomes. In already overburdened communities like areas with a Maryland EJScore of .76 or above, disproportionate impacts can arise from unequal environmental conditions and exposure to multiple stressors.<sup>22</sup> A key element of any environmental

<sup>&</sup>lt;sup>22</sup> https://www.epa.gov/healthresearch/cumulative-impacts-research#Cumulative%20Impacts%20Report.

At the same time, the benefits of additional runoff retention practices can have multiple benefits to

justice work is the consideration of cumulative impacts. Under the 2022 Department EJ Policy, the Department has stated that it will "assess the availability and use of tools that could be used to assess cumulative risks of MDE permitting actions to factor into future permitting decisions." The 20SW permitting process is precisely the tool to be used to reduce cumulative impacts in the very communities whose health have suffered from unmitigated and untreated urban toxic contaminants for decades.

To assess such cumulative risks, we ask that the Department conduct a cumulative impacts analysis to determine whether stormwater from industrial facilities in these communities, including unpermitted facilities, pose a public health hazard to vulnerable Marylanders and identify specific industries or facilities with high pollution impacts. MDE can then use this information in the upcoming 2026 industrial stormwater general permit to do the following:

- a) Exclude facilities found to pose a hazard or contribute significant amounts of pollution from coverage under the industrial stormwater general permit.
- b) Require permit coverage for unpermitted facilities under the permit's Sector AD, which allows the Director to require permit coverage for facilities that contribute to a violation of a water quality standard or are a significant contributor of pollutants to waters of the United States. 40 CFR 122.26(a)(9)(i)(D).
- c) Deny general permit coverage of facilities due to cumulative impacts.

In sum, if the Department makes the changes described above, the 20SW Permit can be a key tool in implementing the Department's 2022 EJ Policy and federal equal protection requirements. As it currently stands, the Permit does little or nothing to advance environmental justice, in contravention of the Department's 2022 EJ Policy.

### II. The Permit Must Incorporate Updated Rainfall Data that Adequately Accounts for Climate Change and Provide Guidance to Permittees on Required SWPPP Updates (Part III.C.)

As discussed further below, all relevant data show that climate change is driving more intense and frequent storm events throughout the state. The 20SW permit fails to require permittees to manage the higher volumes of stormwater resulting from storms occurring today. This permit re-opening is an opportunity for the Department to use more recent rainfall data than what the current permit requirements are based upon to update the

surrounding communities according to this report: "An ACE Output "Quantifying benefits of reducing air pollution and emissions of climate forcers" will examine the potential impacts of urban green infrastructure on local-scale air quality, heat islands, carbon capture, stormwater management, and other ecosystem services."

stormwater volume controls permittees must comply with pursuant to the Stormwater Design Manual. The Department also has an opportunity to better address environmental justice concerns in areas with multiple industrial facilities by assessing the impact of multiple sources of pollutants before granting permit coverage.

Scientists have demonstrated that for every 1 degree C of temperature increase, the atmosphere holds 7% more moisture that, in turn, falls as more intense precipitation<sup>23</sup>. A stormwater permit that is protective of human health and safety, as well as water quality standards, must reflect this reality and not assume what has worked in the past will continue to work into the future. Indeed, the National Oceanic and Atmospheric Administration ("NOAA") and academic partners throughout the Mid-Atlantic partnered with the RAND corporation to update the region's period of record to include some of the largest storm events and predict climate-fueled increases. Although the final deliverables associated with this effort were concurrent with the issuance of the 20SW permit, this limited remand gives the Department the opportunity to update the permit with this vital information.

The Mid-Atlantic Regional Integrated Sciences and Assessments ("MARISA") program was established by NOAA in September 2016. MARISA supports integrated, flexible processes for building adaptive capacity to climate variability and change in diverse Mid-Atlantic regional and subregional settings. Intensity, duration, and frequency ("IDF") curves that are commonly used in engineering practice, specifically NOAA's Atlas 14, are based on historical precipitation observations and do not account for recent and projected future changes in the region's climate. MARISA's Intensity, Duration and Frequency curve tool (hereafter referred to as "the IDF curve tool") provides users with change factors (e.g., a 20 percent increase) that could be used to scale design storm depths from Atlas 14 to account for future climate change.<sup>24</sup>

The 20SW permit provision directing permittees to update their Stormwater Pollution Prevention Plans ("SWPPPs") based on new information and experiences with major storm events without any guidance from the Department will lead to inadequate stormwater control measures and result in large amounts of stormwater runoff into local waters. MARISA includes a suite of data tools the Department must utilize to update the stormwater design manual applicable to the 20SW permit, and other permits like the Municipal Separate Storm Sewer System (MS4), and provide

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<sup>&</sup>lt;sup>23</sup> National Aeronautics and Space Administration, *Steamy Relationships: How Atmospheric Water Vapor Amplifies Earth's Greenhouse Effect.* February 8, 2022. Available at:

https://climate.nasa.gov/explore/ask-nasa-climate/3143/steamy-relationships-how-atmospheric-water-vapor-amplifies-earths-greenhouse-effect/

<sup>&</sup>lt;sup>24</sup> https://www.rand.org/pubs/perspectives/PEA2794-1.html

recommendations to covered facilities on how to incorporate existing and reasonably expected future conditions into their SWPPPs.<sup>25</sup>

The 20SW permit does not account for a rapidly changing climate because it relies upon outdated information that is not reflective of the intensity, frequency, and duration of today's storms. The Department must update the stormwater design manual using new rainfall data from the MARISA IDF curve tool that was released in 2022 following the close of the initial public comment period. Following the update, the Department must mandate compliance with the updated stormwater design manual requiring the minimum Environmental Site Design Volume to be designed for the 2-year, 24-hour storm and adjusted to MARISA's 15% projected increase to create a standard of 3.7 inches. The 20SW permit must also include a link or reference to the volume requirements and specify that the facilities' identified best management practices must be able to handle the designated volume of stormwater. Lastly, any exceedance of the volume requirements must trigger an immediate change in the SWPPP to accommodate the increase in volume.

Additionally, the Department must address stormwater outfalls that are near tidal elevations where high tide events could exacerbate site flooding. Some systems depend on gravity to help water move through the pipes. Flat topography can make this a difficult approach that is further compromised by flooding that causes outfalls to be partially or completely submerged. This combination can greatly prolong a flooding event and expose more industrial pollutants to discharge waters when tides fall. Coastal flooding at outfalls may drive backflow into the system, causing upland flooding through street drains and drainage ditches. The prolonged presence of saltwater can damage stormwater infrastructure. Shoreline erosion near such an outfall may further expose stormwater infrastructure to potential damage. Flooding may introduce debris that can clog storm drains, pipes, and outfalls. Storm drains covered by leaves in the early fall may cause backup flooding. More frequent, higher, and longer-lasting high-water events may drive up already high groundwater levels in some coastal facilities. This change may reduce the soil's ability to absorb stormwater, especially in areas previously designated as "no exposure", thus increasing runoff and pollution to surface waters.

NOAA has developed helpful assessment tools that the Department must recommend to covered facilities, especially those discharging into tidal waters, to address this concern. Available resources include the Quick Flood Assessment tool, which calculates current and future coastal flood frequency and impacts at user-designed thresholds,<sup>26</sup> and a tool to complete detailed analysis to determine if, how,

<sup>&</sup>lt;sup>25</sup> MARISA, a NOAA Mid-Atlantic RISA Team, 2020. Available at: https://www.midatlanticrisa.org/data-tools.html

<sup>&</sup>lt;sup>26</sup> National Oceanic and Atmospheric Administration, Assess Flood Risks. Available at: https://coast.noaa.gov/stormwater-floods/assess/

and when stormwater systems will be compromised by coastal flooding.<sup>27</sup> The Department must combine these tools with outfall inspection and mapping to identify potential outfalls susceptible to tidal flooding and make clear that repairs, replacement or elevation of outfalls or the installation of one-way flapper valves may be required within SWPPPs to address flooding concerns.

# III. The Protection of Water Quality and Community Health Demands Stronger - Not Weaker - Certifications of "No Exposure" and Related Permit Improvements

While most attention is paid to the strength of the terms and conditions of this (and any) permit, it is also critically important to ensure that the *scope* of the permit is adequate. This means several things. First and foremost, it means restricting the ability of potential permittees to exclude themselves from coverage under the permit. In this case, that means strengthening, or at least not weakening, the "No Exposure certification" provisions of the permit. Separately, advocates have long been concerned that the Department has not committed enough resources to detecting *unpermitted* facilities and compelling them to seek coverage. If neither of these issues are addressed, even a strong permit will fail to achieve the ultimate aim of reducing exposure of Maryland waterways and communities to toxic industrial runoff as far too many facilities will be operating completely outside the regulatory system.

Last year, the Department weakened the final version of the 20SW Permit by proposing to allow facilities to exclude themselves from coverage of the Permit without the submission of documentation from an independent third party engineer or other such professional, <sup>28</sup> as was required in the expired 12SW permit<sup>29</sup> and included in the draft version of the 20SW permit.<sup>30</sup> The Department's document describing its responses to comments received in the comment period disclosed each of the changes it made to the draft permit.<sup>31</sup> One such change was to establish this new process by which industrial facilities meeting certain criteria would be able to submit a "No Exposure certification" without an actual certification from an independent third party.<sup>32</sup> Thus, under the final permit only facilities located in a floodplain or in areas with an "Environmental Justice Score greater than 0.76" would be required to have a professional certify that there is no

<sup>&</sup>lt;sup>27</sup> National Oceanic and Atmospheric Administration, *Analyze Stormwater Systems. Available at:* https://coast.noaa.gov/stormwater-floods/analyze/

<sup>&</sup>lt;sup>28</sup> Final determination to issue the General Permit for Discharges of Stormwater Associated with Industrial Activities, Permit No. 20-SW, No. MDR00, Part I.F.

<sup>&</sup>lt;sup>29</sup> General Permit for Discharges from Stormwater Associated with Industrial Activities, Permit No. 12-SW, Part I.F. ("expired Permit" or "12SW Permit").

<sup>&</sup>lt;sup>30</sup> Tentative determination to issue the General Permit for Discharges of Stormwater Associated with Industrial Activities, Permit No. 20-SW, No. MDR00, Part I.F ("draft Permit").

<sup>&</sup>lt;sup>31</sup> Response to Public Comments, State General Discharge Permit Number 20-SW ("Response to Comments")

<sup>&</sup>lt;sup>32</sup> *Id.* ("The permit allows the submission of photos in lieu of a professional engineer for operators with less than five acres, except in areas identified with an EJ Score greater than 0.76 or in flood plains.")

potential for stormwater to be exposed to certain pollutants on site. In other words, the Department is proposing to allow most industrial facilities that would otherwise be subject to the permit to self-certify their eligibility for exclusion from the terms of the Permit, without securing the opinion of a third party engineer or other relevant professional.

For the reasons described below this not only constitutes an inappropriate and arguably illegal weakening of the permit, it is incompatible with numerous recommendations to improve protections for the most vulnerable Maryland communities and waterways, which are disproportionately impacted by industrial runoff.

### 1) No Exposure in the Prior Permit and Calls for Improvement

Long before the Department issued a draft of the 20SW permit, experts and advocates had called for a stronger approach to the No Exposure provision and, more broadly, to ensure that a greater percentage of industrial runoff in Maryland is controlled by our water pollution control laws. For example, the National Academy of Sciences expert panel investigating the past federal regulatory regime for controlling industrial stormwater specifically singled out Maryland's approach to requiring third party engineer verification of a No Exposure request.<sup>33</sup> In other words, a preeminent body of scientists, engineers, and industrial stormwater experts had determined that the very approach to vetting permittees seeking exclusion from this regulatory program that other state permitting agencies should be emulating is the same one that the Department is now seeking to eliminate.

In July 2020, prior to the public comment period, a number of our organizations sent a letter to the Department that included a section of recommendations on improving the No Exposure certification process.<sup>34</sup> This specific section of the comments on No Exposure certification included a "strong recommendation" that the permit, *at a minimum*, should retain the third party verification "to avoid self-certification and the potential for impermissible self-regulation."<sup>35</sup> (Emphasis added). The letter also went well beyond that minimum suggestion and recommended that "MDE should not allow any new certifications unless the applicant demonstrates that all stormwater is retained on-site; otherwise, this certification is not taking into consideration the potential for discharge of pollutants from deposition or run-on." After all, the National Stormwater Quality Database shows that the concentrations of toxic contaminants are highly elevated in many urban areas, meaning that it is extraordinarily unlikely (essentially impossible) that a 20SW permittee with a "No Exposure" certification would actually be discharging no pollution.

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<sup>&</sup>lt;sup>33</sup> National Academy of Sciences, Improving the Next-Generation EPA Multi-Sector General Permit for Industrial Stormwater Discharges (2019) at 59-60.

<sup>&</sup>lt;sup>34</sup> Comments of the Chesapeake Accountability Project at 523.

<sup>&</sup>lt;sup>35</sup> *Id*.

This letter followed several meetings with Department staff that included, among other comments, our concerns about the widespread problem of unpermitted industrial stormwater discharges. We pointed to the Department's previous efforts to retain contractual assistance to perform desktop analyses devoted specifically to identifying industrial sites that - knowingly or not - were evading permit coverage, harming local communities while also creating an unfair business advantage over their law-abiding competitors.

Additionally, around the same time that the Department was preparing the renewal of this Permit, it was also preparing a rare and possibly unprecedented enforcement action against a facility with unpermitted discharges.<sup>36</sup> This action resulted from a referral from some of our organizations after discovering an entire cluster of industrial facilities in one Maryland community discharging stormwater to a single stream without a permit. This action was also followed by an early collaborative action of the Moore Administration and new Attorney General Anthony Brown. On March 20, 2023, the Attorney General stated in a press release that "[i]n the communities adjacent to industrial facilities, even a small amount of stormwater runoff can be dangerous for public health and the environment."<sup>37</sup> We strongly agree. We had hoped these actions and press releases would signal a sea change in the way the Department would approach the problem of unpermitted discharges moving forward. We were, needless to say, highly disappointed to review the final determination of the 20SW permit, but hope the Department will take this present opportunity to change course.

More recently in the Summer of 2023, a team of students working through the Yale Conservation Scholars program alongside staff at the Potomac Riverkeeper Network embarked on an effort to understand the extent of unpermitted industrial facilities in Maryland's portion of the Potomac watershed operating under industrial sector codes that would typically require coverage under the permit. Unsurprisingly, the team found a vast number of industrial sites that were not listed in the Department's permit database. While not every one of those sites would necessarily be required to apply for the 20SW permit under its designation criteria, many surely would and are presently evading this regulatory program. In any case, it is likely that all of these sites are, in fact, discharging pollutants to waters of the state.

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<sup>&</sup>lt;sup>36</sup> "MARYLAND TAKES ENFORCEMENT ACTION TO PROTECT THE MAGOTHY RIVER." *Maryland Department of the Environment*. April 19, 2021. Available at: <a href="https://shorturl.at/uFKLW">https://shorturl.at/uFKLW</a>. ("The Maryland Department of the Environment and the Maryland Attorney General have filed a suit alleging that a waste management and recycling business in Anne Arundel County operated without required permits and in violation of an agreement to prevent water pollution from the site.")

<sup>&</sup>lt;sup>37</sup> Maryland Enters into Consent Decree with ABF Freight System to Resolve Allegations of Clean Water Act Violations. March 20, 2023. Press Release from Anthony G. Brown, Maryland Attorney General. Available at: https://www.marylandattorneygeneral.gov/press/2023/032023.pdf.

Notably, the team of researchers at Potomac Riverkeeper Network found that the problem of unpermitted industrial discharges was typically evident in clusters, which again emphasizes how toxic industrial runoff has a disproportionate impact on a relatively small number of communities or waterways, based on the way they are zoned and co-located with other pollution-generating sites. It may be obvious, but nevertheless worth stating here, water flows downhill and downstream, crossing census tract boundaries, zoning boundaries, and property boundaries without regard for their official status or designation. This is the pollution that Maryland law mandates be regulated and controlled. But this is far from the reality on the ground today - a reality we strongly urge the Department to change without delay.

#### 2) Comments on the Draft 20SW

As the Department is aware, the concept of a "general permit to discharge" is not well understood by the public, in large part because it is not site-specific. It is thus unsurprising that the comments submitted to the Department during the comment period consisted predominantly of submittals from either public interest advocacy organizations representing the public's broader interests in health, safety, justice, and environmental quality or from the regulated sector. Nevertheless, of the few comments sent by individual Marylanders, *one of the only issues discussed* pertained to the No Exposure certification and, specifically, the need to *strengthen* this provision of the permit.<sup>38</sup> One individual indeed recommended revocation of the No Exposure certification for facilities found to be in noncompliance and suggested making facilities with a past record of noncompliance ineligible for future certification, which the commenter suggested should be renewed *annually*.<sup>39</sup>

However, rather than strengthening the draft permit to require the commenter's inclusion of *additional* photographic evidence in support of a certification request, the Department *weakened* the permit from the draft to the final version by waiving third party verification for many facilities and allowing for the submission of *only* photographic evidence instead. A review of the response to comments document shows *no comments at all* urging the Department to repeal the independent verification (which, again, was something the

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<sup>&</sup>lt;sup>38</sup> In Response to Comment 45 of the Response to Comments document, the Department summarized the comment by stating that "[t]he commenter suggests that the State mandate that facilities applying for a "No Exposure" certification submit photographic evidence to support claim(s)." Nowhere in the comment or the Department's response was a suggestion that this additional "mandate" was anything other than an urging of the Department to strengthen the No Exposure process. In fact, the Department's document containing all of the comments received during the comment period shows that this particular comment was one of seven comments submitted regarding the No Exposure certification process, and specifically, the additional requirements that should apply. See TD Permit Comments Regarding General Permit for Discharges from Stormwater Associated with Industrial Activities State Discharge Permit Application No. 20SW NPDES Permit No. MDR00000 at 29-32 ("TD Permit Comments").

National Academy lauded Maryland for).<sup>40</sup> The Department's decision thus represents an unexplained inconsistency with its prior standard and was announced with no reasoned explanation in support of it or even a reference to a recommendation made by an interested party. The Department simply made a decision on a whim, reversing a prior standard that was not only reasonable, but explicitly held out as an exemplar by the foremost experts on industrial stormwater.

In our other comments, some of our organizations and others further expanded upon some of the pre-comment period recommendations regarding the No Exposure certification and the associated problem of unpermitted industrial discharges. For example, in addition to urging the Department to retain the requirement for third party oversight for No Exposure applications, we also recommended that the Department "deny a 'No Exposure' certification to any new sources from newly established facilities, thus providing an incentive to **fully retain stormwater and/or pre-treat runoff** as a state-based new source performance standard built into the process of establishing new facilities with industrial stormwater discharges." This would have been a forward thinking but relatively low-burden condition given that it would only affect new facilities, not any of the large number of existing ones.

Additionally, we noted the seemingly obvious but underappreciated fact that "it is physically impossible and fundamentally inconsistent with the Bay TMDL and Maryland's Water Pollution Control Subtitle to establish a presumption that stormwater pollution will not be discharged from a site [per a No Exposure certification] without full retention of stormwater onsite."<sup>42</sup> This is because, as the Department has emphasized previously, pollutants *not* associated with industrial activities most certainly also constitute regulable discharges from industrial sites, particularly as it relates to nutrient and sediment pollution.

For example, in Maryland's Phase I Watershed Implementation Plan (WIP) submitted to the U.S. Environmental Protection Agency as required under the Total Maximum Daily Load for the Chesapeake Bay, industrial stormwater permit holders were included as part of a broader "urban regulated" sector. When the Department subsequently released the 12SW general permit in 2013, it included a special condition to restore 20 percent of previously untreated impervious surfaces for certain permittees that met specified criteria having nothing to do with industrial category or the types of pollutants generated onsite. While all permittees covered by the 12SW permit were subject to specific controls and effluent limitations, it was the 20 percent impervious surface restoration standard that was specifically designed to achieve the wasteload allocation for the "urban regulated"

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<sup>&</sup>lt;sup>41</sup> Comments of the Chesapeake Accountability Project at 103.

<sup>&</sup>lt;sup>42</sup> *Id.* at 102.

sector in the Phase II WIP to control nitrogen, phosphorus, and sediment. The Department calculated the aggregate reductions in nitrogen and phosphorus for all industrial stormwater dischargers to achieve by 2025 as 86,846 pounds per year and 5,713 pounds per year, respectively, based on average nutrient removal efficiencies and event mean concentrations developed from monitoring data (2.0 mg/l N; 0.27 mg/l P).

In sum, the Department determined that to meet the overall 21 percent reduction in nitrogen from "Regulated Stormwater" the state would need to "retrofit" at least 28 percent of impervious surface area from this sector *each permit cycle*. Importantly, the Department selected the applicable permittees to be subject to this special condition based *only on the extent of impervious surface* (and location) but *not* based on the nature of the industrial activities or pollutants at the site. This makes logical sense because many pollutants (e.g., nitrogen and sediment) are understood to be discharged by *all* industrial sites (and in fact *all impervious surfaces*) and caused by factors not related to industrial classification (e.g., deposition, scour, passive leaching of non-industrial chemicals, generation and conveyance of high velocity flows).

Thus, it is inconsistent with science, the WIP, and the state's water pollution control laws to allow any facility to exempt itself from this state-issued permit based on any federally designed "No Exposure" template. Rather, we would suggest the Department take heed of the National Academy of Science's recommendations that regulatory agencies avail themselves of the opportunity to develop regulatory tiers based on risk. No industrial facility should be fully exempt from the permit, as would be allowable under the "No Exposure" certification. Instead, some facilities that are able to prove their own industrial pollutants are not exposed to the elements could be subjected to lesser obligations reflective of the presence of fewer (but not "no") contaminants, which might include nitrogen, phosphorus, and sediment or other pollutants discharged from the site largely as the result of passive conveyance. Notably, even passive conveyance of pollutants can have a substantial deleterious effect on surrounding residential communities (e.g., flooding, toxic contaminant exposure of children). Such discharges certainly warrant at least some government response to correct past injustices (e.g., redlining).

The comments submitted to the Department also included letters from nationally recognized stormwater engineers. Dr. Richard Horner, one of the National Academy report contributors, for example, noted that the draft 20SW "provides no guidance to assist the applicant in preparing the [No Exposure] verification." Dr. Horner suggested that "[t]he provision should be upgraded to specify the conditions for a comprehensive verification. It should designate the industrial materials, activities, and equipment to be

<sup>&</sup>lt;sup>43</sup> One of the most fundamental flaws of the 20SW is that it introduces a massive rollback by eliminating this crucial 20 percent restoration standard that was supposed to be repeated in this current permit cycle.

considered in evaluating exposure." Dr. Horner further queried the status of "materials or products exposed to precipitation or runoff during loading and unloading or transporting activities" and whether there are "particulate matter deposits or other visible residuals from roof stacks or vents not otherwise regulated (*i.e.*, under an air quality control permit) and evident in the stormwater outflow?" How does the Department explain the weakening of the No Exposure provision of the permit without any evidence of support for doing so in the record, while simultaneously ignoring the legitimate suggestions of one of the nation's foremost stormwater experts? Where is the reasoned elaboration associated with the change - and lack thereof - in the 20SW's No Exposure section?

Another expert reviewing the 20SW draft permit, Dr. Robert Roseen, also noted that there are "no provisions for No Exposure Certifications that would require certification of treatment prior to discharge to groundwater." This is yet another important acknowledgement of another instance in which the 20SW might not adequately address the additional requirements of state law and further endanger public health and water quality. Once again, none of these experts' recommendations were heeded by the Department.

Implicit in each of these highlighted comments and questions, which were the product of nationally recognized industrial stormwater experts' review of the 20SW and thousands of hours of research and analysis by water pollution control advocates, is that the No Exposure standard of the 12SW was only the starting point that *ought to have been built upon and expanded in the 20SW*. That we see not a strengthening, but a critical weakening of that provision in the 20SW, is a sure sign that we will not only fail to bring likely hundreds of industrial sites within the scope of permit coverage but may indeed allow even more facilities to escape coverage. This is simply incompatible with the Department's recent pledges to enhance environmental justice and its responsibility to protect water quality and public health in Maryland.

Any action to weaken the No Exposure certification requirement - or even to merely maintain the status quo - flies in the face of broader efforts to reduce community exposure to urban toxic runoff. In fact, the Biden Administration, which, like the Moore Administration, has indicated its desire to make the promotion of environmental justice a top priority, released a report in 2022 detailing EPA's legal tools to advance environmental justice. Among the tools discussed was the Agency's "residual designation authority" allowing for the extension of Clean Water Act permit coverage over additional commercial, industrial, and institutional sites in order to protect water

quality.<sup>44</sup> EPA has moved forward in recent years on such residual designation actions to bring more sources of contaminated runoff within our permit system for the purpose of protecting urban waters in places like Boston and Los Angeles. Notably, EPA has received a petition to do the same in Baltimore.

With broad discretion under federal and state law and a mandate to advance environmental justice, all momentum is supposed to be pointed in the direction of greater protections for urban communities. And yet, with this Permit, the Department is proposing to move in the very opposite direction; this includes not only ignoring the rampant problem of facilities evading permit coverage but also making it easier for those industrial facilities that are already subject to a permit to excuse themselves from regulatory obligations based on a legal fiction and not grounded on sound science.

We strongly urge the Department, under its new leadership and consistent with its new priorities, to introduce major changes through the Permit and outside of it to protect the health of urban communities and waterways. Specifically, the Department should, at a minimum, restore the previous requirement of independent third party verification of all no exposure certification requests. Additionally, the Department should require a minimum set of controls and permit requirements for facilities that are able to verify no exposure of contaminants associated with their on-site industrial activities to recognize the independent validity of state law and its prohibition on the discharge of any pollutants without treatment. Such requirements could include benchmark monitoring for nitrogen and sediment. We urge the Department to immediately undertake a concerted effort (i.e., with additional resources) to identify unpermitted sites that have not sought coverage under the Permit in order to increase the scope of protections of the permit and limit the prevalence of unregulated pollution in urban areas that cause impairments of urban waters, perpetuate environmental injustices, and expose fenceline community members to unnecessary health risks. Finally, consistent with 40 CFR 122.4(i) and Appendix S of the Bay TMDL, the Department should prohibit no exposure certification for any new source constructed after the effective date of the 20SW.

<sup>&</sup>lt;sup>44</sup> EPA Legal Tools to Advance Environmental Justice at 81 (May 2022). Environmental Protect Agency, Office of General Counsel. Available at: https://shorturl.at/agiN1..

# IV. Summary Chart of Requested Changes to Permit

Permit Section	Requested Additional Provision
Part V.A.2.b	Benchmark monitoring for every permitted facility in for pH, sediment (TSS), total organic carbon (TOC) and other pollutants in census tracts with a Maryland EJScore of .76 or above
Part V.A.2.b	Exclude from coverage facilities that: 1) have been in Significant Noncompliance with the 20SW permit within the last five years; and 2) located in census tracts with an index score of .76 or above on Maryland's EJ Score.
Part V.A.2.b	Require that every permitted facility located in census tracts with an index score of .76 or above on Maryland's EJ Score, regardless of size, restore twenty percent of the site's impervious surface with runoff controls or their equivalent unless they have already been required to do so in the previous permit term
Part V.A.2.b	Require every permitted facility located in census tracts with an index score of .76 or above on Maryland's EJ Score to post a sign that is visible from a public road with the name of the facility, permit number, a description of the purpose of the industrial stormwater permit, and a MDE phone number and email to contact for complaints.
Part III.C	Include a link or reference to the stormwater design manual's updated volume requirements (designed for the 2-year, 24-hour storm and adjusted to MARISA's 15% projected increase for a standard of 3.7 inches) and specify that the facilities' identified best management practices must be able to handle the designated volume of stormwater.
Part III.C	Add a requirement to the Permit that any exceedance of the volume requirements must trigger an immediate change in the SWPPP to accommodate the increase in volume.
Part III.C	Require permittees to combine NOAA's assessment tools with outfall inspection and mapping to identify potential outfalls susceptible to tidal flooding and make clear that repairs, replacement or elevation of

	outfalls or the installation of one-way flapper valves may be required within SWPPPs to address flooding concerns.
Part I.F	At a minimum, restore the previous requirement of independent third party verification of all no exposure certification requests.
Part I.F	Require a minimum set of controls and permit requirements for facilities that are able to verify no exposure of contaminants associated with their on-site industrial activities to recognize the independent validity of state law and its prohibition on the discharge of any pollutants without treatment. Such requirements could include benchmark monitoring for nitrogen and sediment.
Part I.F	Immediately undertake a concerted effort (i.e., with additional resources) to identify unpermitted sites that have not sought coverage under the Permit in order to increase the scope of protections of the permit and limit the prevalence of unregulated pollution in urban areas that cause impairments of urban waters, perpetuate environmental injustices, and expose fenceline community members to unnecessary health risks.
Part I.F	Prohibit no exposure certification for any new source constructed after the effective date of the 20SW in order to comply with 40 CFR 122.4(i) and the Bay TMDL.

Thank you for the opportunity to comment! Please reach out if you have any questions regarding our comments or references.

## Sincerely,

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