

July 7, 2017

Via Email:

[gary.setzer@maryland.gov](mailto:gary.setzer@maryland.gov)

Mr. Gary Setzer  
Maryland Department of the Environment  
1800 Washington Boulevard  
Baltimore, MD 21230

**Re:** Comments on Maryland Department of Environment's Subtitle 08 Chapter 11 Maryland Water Quality Nutrient and Sediment Trading and Offset Program Draft Regulations

Dear Mr. Setzer:

On behalf of the undersigned organizations, please accept these comments on the draft Nutrient and Sediment Trading and Offset Program regulations that were distributed on June 7. These comments were formulated in a collaborative effort between the Maryland Clean Agriculture Coalition (MCAC) and the Choose Clean Water Coalition (CCWC).

Our comments are based upon the MCAC guiding principles on nutrient pollution trading, which are attached. In general, we believe that any nutrient pollution trading program must be designed to reduce pollution to the Chesapeake Bay and its tributaries with a level of transparency and accountability to ensure its effectiveness.

### **Comments on Draft Regulations**

We commend Maryland Department of the Environment (MDE) for listening to many of the concerns of our members and other stakeholders in creating actual regulations rather than trying to establish a trading program simply relying on guidance. We urge MDE to include more details in the regulations and make some changes to improve the regulations in order to make a robust trading program that will not endanger water quality in the Bay or the local level.

#### **1. The regulations must adhere to the EPA technical memoranda on nutrient trading.**

The Environmental Protection agency (EPA) has developed a series of technical memoranda that provide details on EPA's expectations for nutrient trading programs designed to meet the Bay TMDL target allocations.<sup>1</sup> Specifically, the technical memoranda elaborate on Appendix S and Section 10 of the TMDL.<sup>2</sup> These are not merely guidance, but reflect the fundamentally important "expectations" of EPA, the Chesapeake Bay Program partner responsible for ensuring accountability in the TMDL

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<sup>1</sup> U.S. EPA, Trading and Offset Technical Memoranda for the Chesapeake Bay Watershed, <https://www.epa.gov/chesapeake-bay-tmdl/trading-and-offset-technical-memoranda-chesapeake-bay-watershed>.

<sup>2</sup> U.S. EPA, Accounting for Uncertainty in Offset and Trading Programs – EPA Technical Memorandum, 4 (Feb. 12, 2014).

implementation. If Maryland chooses to ignore the memoranda, it runs the risk not only of forcing EPA to object to permits and reject credits or offsets for use in meeting TMDL allocations, but also of losing credibility in the eyes of other partners and the public.

## **2. The draft regulations must require the use of a 2:1 uncertainty ratio for all trades involving nonpoint credit generators.**

The pollution loads from nonpoint sources of pollution, which by definition lack discrete “point” source outfalls, are very difficult to measure. When these nonpoint sources implement Best Management Practices (BMPs) to reduce pollution loads, the reductions are equally difficult to measure. In practice, these loads and pollution reductions are never measured, but are instead estimated. Nutrient credits generated by nonpoint sources are therefore inherently uncertain.

Adding to that basic uncertainty is the fact that most estimates of BMP effectiveness are generated from carefully controlled research experiments – not real-world demonstrations. The National Research Council (NRC) observed that

*BMP efficiencies are often derived from limited research or small-scale, intensive, field-monitoring studies in which they may perform better than they would in aggregate in larger applications . . . Thus, estimates of load reduction efficiencies are subject to a high degree of uncertainty.*<sup>3</sup>

Note that the NRC authors are suggesting that the uncertainty is largely in one direction—BMP efficiencies are likely to overestimate actual nutrient removals. Indeed, the authors go on to say that “[p]ast experience . . . has shown that credited BMP efficiencies have more commonly been decreased rather than increased in the light of new field information.”<sup>4</sup>

In other words, BMP effectiveness estimates tend to overestimate pollution reductions. The Chesapeake Bay Program has modified certain BMP effectiveness estimates to address some, but not all, of this bias (to “remove unwarranted optimism”).<sup>5</sup> There has been some confusion on this point. For example, in 2011 Maryland Department of Agriculture (MDA) stated that “[a]ny uncertainty associated with [BMPs] has already been taken into account by the Chesapeake Bay Program in the adoption of the stipulated efficiency.”<sup>6</sup> But this is incorrect. Not all BMPs have been adjusted as described above, and not all sources of uncertainty have been addressed. According to EPA:

*The CBP partnership BMP effectiveness values vary across the Chesapeake Bay watershed for conditions such as implementation date, growth rate of crops, and physiographic region. These adjustments generate BMP effectiveness values that are unbiased and realistic but not necessarily conservative because they were established using realistic estimates for load reductions that do not reflect additional sources of uncertainty, especially hydrological variability and operation and maintenance over the*

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<sup>3</sup> National Research Council (NRC), *Achieving Nutrient and Sediment Reduction Goals in the Chesapeake Bay* 73 (2011).

<sup>4</sup> *Id.* at 76.

<sup>5</sup> U.S. EPA, *Accounting for Uncertainty in Offset and Trading Programs* – EPA Technical Memorandum, 8 (Feb. 12, 2014).

<sup>6</sup> MDA, *Producing and Selling Credits in Maryland’s Nutrient Trading Market*, 9 (Mar. 14, 2011).

*lifetime of BMPs. The uncertainty ratio recommended in this technical memorandum is designed partially to account for those additional sources of uncertainty.*<sup>7</sup>

Therefore, there is a reasonable probability that a BMP may not generate the pollution reductions that it is given credit for. In order to avoid a net increase in pollution loads, EPA expects the states to use an uncertainty ratio “of at least 2:1” for trades between nonpoint credit generators and point source credit buyers.<sup>8</sup> In other words, a credit buyer hoping to offset one pound of new nitrogen load would have to purchase credits worth two pounds of nonpoint nitrogen. EPA allows for two possible exceptions to this policy. The first is where “direct and representative monitoring of a nonpoint source is performed at a level similar to that performed at traditional NPDES point source.”<sup>9</sup> The second is where land conservation is made “permanent” through a conservation easement or other deed attachment.<sup>10</sup>

In general, however, Maryland is required to apply a 2:1 ratio to all nonpoint-point trades. The draft regulation defines uncertainty ratios, but does not include any substantive language about them. Perhaps this is an error in drafting – since MDE included a definition, we presume that the Department intended to include substantive language. Maryland’s most recent guidance manual<sup>11</sup> includes some language about uncertainty ratios, but misses the mark. Specifically, the manual requires a 2:1 uncertainty ratio for trades between nonpoint credit generators and “wastewater point sources,” but does not require a 2:1 ratio for trades between nonpoint credit generators and “stormwater point sources.”<sup>12</sup> This is an arbitrary distinction, and it is impermissible. The characteristics of the credit purchaser are irrelevant to the policy goal that a 2:1 uncertainty ratio is intended to serve. The uncertainty ratio is there to ensure that credits do not overestimate the pollution reductions achieved by the credit generator.

Virginia has adopted an uncertainty ratio requirement that comports with the TMDL and EPA’s expectations:

Credits used to offset new or increased nutrient loads under this subdivision shall be:

(1) Subject to a trading ratio of two pounds reduced for every pound to be discharged if certified as a nonpoint source credit by the board pursuant to § 62.1-44.19:20 of the Code of Virginia. On a case-by-case basis the board may approve nonpoint source to source trading ratios of less than 2:1 (but not less than 1:1) when the applicant demonstrates factors that ameliorate the presumed 2:1 uncertainty ratio for credits generation by nonpoint sources such as:

(a) When direct and representative monitoring of the pollutant loadings from a nonpoint source is performed in a manner and at a frequency similar to that performed at VPDES point sources and there is consistency in the effectiveness of the operation of the nonpoint source best management practice (BMP) approaching that of a conventional point source.

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<sup>7</sup> U.S. EPA, Accounting for Uncertainty in Offset and Trading Programs – EPA Technical Memorandum, 8 (Feb. 12, 2014) (emphasis added).

<sup>8</sup> U.S. EPA, Accounting for Uncertainty in Offset and Trading Programs – EPA Technical Memorandum, 4 (Feb. 12, 2014).

<sup>9</sup> *Id.* at 5.

<sup>10</sup> *Id.*

<sup>11</sup> MDE and MDA, Maryland Trading and Offset Policy and Guidance Manual, Chesapeake Bay Watershed (Apr. 17, 2017).

<sup>12</sup> *Id.* at 13.

(b) When nonpoint source credits are generated from land conservation that ensures permanent protection through a conservation easement or other instrument attached to the deed and when load reductions can be reliably determined;<sup>13</sup>

MDE should adopt similar language and apply it to all trades and offsets.

Furthermore, the same logic should apply to all trades involving nonpoint credit generators, including the sale of credits to nonpoint credit purchasers. Again, the uncertainty ratio is there to ensure that credits do not overestimate the pollution reductions achieved by the credit generator. The characteristics of the credit purchaser are irrelevant.

In short, MDE must require the use of a 2:1 uncertainty ratio for all trades involving nonpoint nutrient credits, including but not limited to trades between nonpoint credit generators and “stormwater point sources.”

### **3. Use a retirement ratio to ensure net improvement to water quality.**

Trading programs must result in actual net improvements to water quality. The current draft regulations do not include a retirement ratio. They include a “reserve ratio”, which is inadequate, because it does not ensure that there is a net reduction of pollution from any trade. We urge MDE to reinstate the retirement ratios that have long been part of Maryland’s draft trading manual.<sup>14</sup> MDE should require that 5% of credits generated by point sources, and 10% of credits generated by nonpoint sources, be “retired.” An earlier iteration of the Maryland Department of Agriculture’s nutrient trading policy included the following “fundamental principle”:

*Trades must result in a net decrease in loads. To ensure this net decrease is achieved, 10 percent of the agricultural credits sold in a trade will be “retired” and applied toward Tributary Strategies or TMDL goals. The buyer will retire the credits following the transaction, and this determination should be reflected in the buyer/seller contract.<sup>15</sup>*

At the January 8<sup>th</sup>, 2016 trading symposium, MDE stated that a percentage of credits will be retired for the sake of net water quality benefit. We agree with this policy and urge MDE to ensure that these levels are included. As noted above, the current draft omits the retirement ratio and instead includes a ‘reserve ratio.’ The reserve ratio alone is insufficient for two reasons. First, it is not a retirement ratio, and does not ensure a net reduction in pollution loads. Second, at the end of the year there is nothing that prevents MDE from distributing the reserved credits to noncompliant dischargers. This creates a perverse incentive to polluters to fall short of their pollution reduction targets. We have no objection to applying a reserve ratio if MDE also incorporates the appropriate retirement ratio.

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<sup>13</sup> 9 Va. Admin. Code 25-820-70, Part II.B.1.b.(1).

<sup>14</sup> See, e.g., MDE and MDA, Draft Maryland Trading and Offset Policy and Guidance Manual, 19 and 45 (Jan. 2016).

<sup>15</sup> MDA, Producing and Selling Credits in Maryland’s Nutrient Trading Market, 5 (Mar. 14, 2011).

We recommend the following in words or substance:

*“A retirement ratio will be applied to each trade, and represents the percentage of the total purchased credits to be retired towards net water quality benefit. The retirement ratio is 1.05 for point source credits and 1.1 percent for nonpoint credits. This means that credit purchasers will have to purchase 1.05 pounds of point source credits, or 1.1 pounds of nonpoint credits, before accounting for any other trading ratios, to offset one pound of pollution.”*

#### **4. Ensure that trading does not cause degradation of local waters or pollution hotspots.**

We strongly support the intent of the language in section .05.B. The TMDL and EPA’s technical memorandum on local water quality both prohibit trades that would cause or contribute to local water quality impairments, including any exceedances of water quality standards.<sup>16</sup> We commend MDE for limiting trading to credits generated upstream of where the water discharge reaches impaired waters as a good practice to help ensure compliance with local water quality standards. However, section .05.B.1, as written, is too narrow and is inconsistent with section .05.B, the TMDL, and EPA’s technical memorandum. Section .05.B. prohibits trades that would cause or contribute to an impairment or to an exceedance of water quality standards. We would strongly urge MDE to consider language that would avoid creating pollution “hot spots” for local communities by requiring that all trades be executed within a small watershed, with credit generators upstream of credit purchasers. At a minimum, however, we request the following:

Strike:

*“Where necessary to ensure compliance with local water quality standards, the exchange of credits in an area within the Chesapeake Bay Watershed subject to an approved local TMDL for total nitrogen, total phosphorus, or total suspended solids with allocations more stringent than the Chesapeake Bay Watershed TMDL shall be limited to those credits generated upstream of where the discharge reaches impaired waters.”*

And replace with:

*“Where necessary to ensure compliance with local water quality standards and to prevent local water quality impairments, the exchange of credits in areas where a credit purchaser may cause or contribute to a violation of water quality standards, an impairment, or a violation of a local TMDL, shall be limited to credits generated upstream of where the credit purchaser’s discharge reaches impaired waters.”*

We also urge MDE to ensure that permittees, particularly MS4 jurisdictions, do not use trading to meet the entirety of their pollution reduction requirements. Trading should not be allowed to offset more

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<sup>16</sup> U.S. EPA, Chesapeake Bay Total Maximum Daily Load for Nitrogen, Phosphorus and Sediment, S-4 (Dec. 29, 2010); U.S. EPA, Local Water Quality Protection when Using Credits for NPDES Permit Issuance and Compliance, EPA Technical Memorandum, (March 17, 2014).

than 50% of a permittee's requirements. This will ensure that local waters are not significantly degraded and also ensure that MS4s do not abandon all stormwater and polluted runoff reduction efforts within the boundaries of their jurisdictions.

In addition, the three broad "Trading Regions" authorized in Section 05.F(1) are far too broad, and will not ensure the protection of local water quality, unless they are subject to the revised language that we have proposed for Section 05.B(1). Our proposed language would remedy this problem.

**5. Include additional details on enforcement: The regulations should ensure greater enforcement against fraud in the program and repeat offenders.**

Since nutrient trading creates a host of new enforcement issues, the draft regulation must add significantly more detail on enforcement. Section 11 should outline specific enforcement measures that MDE would pursue in response to credit failure, willfully fraudulent trading or verification misrepresentations, and repeat offenders.

As a starting point, the regulation should clearly and comprehensively state that credit purchasers are responsible for credit failure, and that a credit failure is a permit violation subject to Clean Water Act and state law enforcement. Section .08.A.1(d) states that "in the event of a default in a trade contract or the invalidation of credits, the MS4 permittee using those credits remains responsible for complying with MS4 permit requirements that would apply if the trade had not occurred." This is a step in the right direction, but it does not go far enough and only applies to MS4 credit purchasers. The draft regulation should expand this language to state that permittees are subject to enforcement for permit violations in the cases of credit default, and apply that language to all credit purchasers.

Enforcement provisions should recognize that there will likely be minor infractions, or a failure of a BMP performance, that can be corrected expeditiously. They should authorize administrative compliance orders to address these and other violations, coupled with penalties for failure to comply.

In addition, we recommend that the regulations expand the enforcement sanctions for willfully fraudulent trading or verification, and for repeat offenders. A noncompliant verifier working with a willful counterfeiter of credits could jeopardize the integrity of the entire trading system and the health of the Chesapeake Bay. Greater enforcement mechanisms are necessary to reduce the temptation to falsify credit verification reports, particularly when the verifiers are third party entities.

Both the MDA and MDE should have the authority to impose on any noncompliant party a ban from the nutrient trading system of up to 10 years, as well as a lifetime ban for the most serious and/or repeat offenders. MDA should also refer cases of fraud to the State Attorney General to take appropriate action under the state's general civil and criminal fraud laws.

Finally, we recommend the Department include a definition of "significant noncompliance" since this term is used in .04E.(1) to describe one basis for becoming ineligible to participate in the trading program.

## **6. The draft regulation must include more detail on certification and verification of credits**

The draft regulation currently includes very little detail on verification, despite the fact that Maryland has adopted a comprehensive Best Management Practice verification plan.<sup>17</sup> Much of the verification under this plan will be done by MDA, but the plan also assigns numerous responsibilities to MDE (e.g., stormwater BMP and wastewater treatment plant verification, review and submittal to the Chesapeake Bay Program of MDA verification data, etc.). To the extent that the BMP verification plan may overlap with the nutrient trading regulation, MDE should incorporate the overlapping policies and language.

In addition, section .05.E(5) suffers from both substantive and drafting problems. First, section .05.E(5) states that “permanent credits are available in perpetuity and . . . may be verified annually.” This suggests that permanent credits may not be verified at all. Nothing is truly “permanent,” and MDE must prescribe some form of follow-up verification for any practice used to generate credits. Maryland’s BMP verification plan lays out a schedule for initial and follow-up inspections for virtually every kind of credit-generating practice.<sup>18</sup> EPA’s technical memorandum on verification simply says that the Agency expects “all credit generating projects and practices to be verified on an annual basis.”<sup>19</sup> MDE must ensure that the draft regulation is consistent with that plan.

Section .05.E(5) goes on to exempt two types of practices from the preceding language, but because the preceding language includes three clauses, it is unclear what the practices in .05.E(5)(a) and (b) are exempted from. If the language exempts (a) and (b) from the “may be verified annually” clause, then MDE is effectively stating that these two practices – converting septic systems to wastewater treatment plant hookups and land conversions with deed restrictions – cannot be verified after initial project completion. It makes no sense for MDE to tie its hands in this way. Since .05.E(5) does not require anything beyond initial verification on project completion, there is no reason to exempt any practices, and the word “except” and parts .05.E(5)(a) and (b) should be deleted.

## **7. Credit timing**

The draft regulation presents a conflicted set of requirements for the use of credits over time. On one hand, credits are generally valid for one year and cannot be banked for future years – a good policy (section .05.E(4)). On the other hand, the draft regulation contemplates “permanent credits” (.05.E(5)), and “[p]ermittees are required to secure credits in perpetuity or the term of their permit,” (section .05.E(6)), or for up to 20 years (section .07.A.(3)(b)(ii)). The draft regulations fail to explain how a permittee could “secure” credits for 20 years (or in perpetuity) when most credits are annual and expire a year after they are created.

This issue requires careful thought on MDE’s part. The Department may wish to require that long-term credit purchases be limited to long-term credit generating practices such as land conversion with deed

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<sup>17</sup> Maryland’s DRAFT Best Management Practice BMP Verification Protocol (Nov. 2015), [http://www.chesapeakebay.net/documents/MD\\_BMP\\_Verification\\_Protocols\\_Final.pdf](http://www.chesapeakebay.net/documents/MD_BMP_Verification_Protocols_Final.pdf).

<sup>18</sup> *Id.*

<sup>19</sup> U.S. EPA, Certification and Verification of Offsets and Trading Credits in the Chesapeake Bay Watershed, Technical Memorandum, 7 (July 21, 2015).

restrictions. Alternatively, the Department will have to provide a mechanism by which permittees can “secure” credits in a way that the Department can validate and track. A simple contract between a permittee and a broker, where the broker promises to find annual credits every year for the next 20 years, is plainly insufficient. A binding contract with one or more credit generators to provide future credits by implementing and maintaining BMPs that are already in place or easy to implement and verify might be sufficient to satisfy the requirements in Section 07.A(3) that NPDES permit holders using credits demonstrate their availability during future years.

Unfortunately, EPA has provided very little guidance on this issue, but the Agency does expect that “[t]he procurement of credits should be documented in the permit, the fact sheet, and the administrative record. This includes documented assurances in place to show that credits have been secured from a project and/or practice certified by a person properly authorized to do so for the duration of the authorization to discharge.”<sup>20</sup>

MDE must adhere to EPA’s expectations in the following ways: (1) It must revise the draft regulation to specify that “securing” credits means lining up credits from specific projects and/or practices (not from brokers), and (2) it must include details about how the credits were secured in the relevant permit, fact sheet, and administrative record.

## **8. The draft regulations should explicitly prohibit bubble permits and interstate trading**

As written, the draft regulation would allow for “multiple facilities in a watershed” to form an association and obtain a single permit (a “bubble permit”) as co-permittees (Section 07.A(4)). This provision is not authorized under the Clean Water Act and has no basis for inclusion in nutrient trading regulations.

Moreover, even if a way could be found to design a bubble permit that is consistent with the Clean Water Act, we have serious concerns about the impact of bubble permits, which create a laundry list of potential problems for local water quality, transparency, accountability, and enforcement, and must be avoided. For example, as drafted, the term “watershed” is not defined and could allow permittees anywhere within the Chesapeake Bay watershed to combine their discharge limits. Worse, the draft regulation establishes no restrictions at all on the number of owners forming an association. Theoretically, a single bubble permit could be written for all nutrient dischargers in Maryland’s part of the Chesapeake Bay watershed.

Even a bubble permit involving a limited number of facilities poses significant permit-writing and enforcement questions. For example, how will MDE ensure that there are no local water quality impacts at all locations? How will MDE even conduct a “reasonable potential” analysis, which it must do pursuant to the Clean Water Act, to determine whether Water Quality-Based Effluent Limitations are required? Will co-permittees report their discharges individually, as a group, or both? These are just a few of the questions that are not addressed in the draft regulations.

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<sup>20</sup> U.S. EPA, Permanence of Credits Used for NPDES Permit Issuance and Compliance, Technical Memorandum, 5 (Aug. 19, 2014).



MDE should initiate an entirely new rulemaking process and create a new set of regulations to address all of the complex issues and potentially dangerous consequences of bubble permitting. It is inappropriate to address this issue with only five lines of text in an unrelated regulatory proposal that contains no reference to bubble permits in the Statement of Purpose.

## **9. Interstate trading**

The draft regulation is silent about interstate nutrient trading, but we are aware that Maryland is considering this possibility. We are strongly opposed to interstate trading for several important reasons:

- Accountability and transparency, which are both difficult enough to achieve at the state level, will be much harder to achieve on an interstate basis, as each state will have its own system for credit tracking.
- Interstate trading increases the likelihood of local water quality issues by increasing the distance between credit generators and credit purchasers (making it more likely that they are in different sub-watersheds).
- Interstate trades will be complicated by the fact that a credit is calculated differently in each state. How would Maryland ensure that interstate trades are “apples-to-apples?”
- We are concerned that interstate trading will lead to a “race to the bottom” in terms of trading program standards. For example, consider a credit buyer in state A, and two credit sellers, one in state A and one in state B. Assume that state A has a stringent trading program, and that state B has a weak program. It would presumably be more expensive for a credit generator in state A to install and maintain the practices necessary to qualify for credit generation, and to generate the pollution reductions. The credit seller in state A would set its price accordingly. The credit seller in state B could offer much cheaper credits. The credit buyer would probably buy the credits from state B. If this became a pattern, pollution reductions would tend to accrue to state B. State A, trying to meet TMDL goals for pollution reduction, would have a strong incentive to weaken its program to facilitate more in-state trades.
- Interstate trading would create major obstacles to enforcement. If a Maryland permittee purchased credits from a Pennsylvania credit seller, and those credits failed, how would MDE enforce the permit across state lines? In the meantime, how would MDE verify that the credits secured for 20 years continued to materialize (in Pennsylvania)? Appendix S of the TMDL specifically lists as one its “common elements” the following language under the “certification and enforceability” element: “Ensuring that transactions can be enforced by the jurisdiction. Articulating how transactions can otherwise be protected by the jurisdiction.”<sup>21</sup> MDE has no authority to inspect BMPs in another state, or to bring enforcement actions in the event of violations.

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<sup>21</sup> TDML, Appendix S, S-5.

For all of these reasons, we strongly believe that interstate trading is impermissible, vulnerable to abuse, and would likely lead to net increases in pollution loads. We strongly encourage MDE to avoid interstate trading.

## **10. Baselines must be better defined**

Section .07.B(2)(d) is unclear. Subsection (d)(i) begins with “If greater than 6,100 pounds per year total nitrogen load cap and 457 pounds per year total phosphorus load cap.” It is unclear what is (or is not) greater than these load caps. It may be baselines, but it may also be “previously assigned 2004 Point Source Tributary Strategy” goals (section .07.B(2)(d)(i)). MDE should clarify.

That section goes on to describe how the baseline can be “no more than 50 percent of the amount that is above [the load caps].” This is unclear mathematically. Why would the baseline be half of the excess above the load caps? We strongly encourage MDE to clarify this language as well.

Furthermore,, section .07.B(4) suggests that the baseline for significant industrial dischargers will be “based on a combination of historical performance levels, the amount of loading reductions already achieved since the initial baselines established in 1985, and establishment on a case-by-case basis of additional potential loading reductions.” This language is ambiguous and appears to be a statement of purpose, but is not appropriate in the context of a regulation. MDE should settle on a baseline definition and provide a precise statement for the benefit of the regulated community and public.

The baseline provisions must be rewritten to ensure full compliance with EPA’s Technical Memorandum on Establishing Offset and Trading Baselines (February 2, 2016). In particular, for any point source discharger, the baseline must include compliance with any technology-based requirements and with any Water Quality Based Effluent Limitations (WQBELs) established by the permit. For nonpoint source dischargers, baseline requirements must ensure compliance with any applicable load allocation “for the appropriate sector [of which the nonpoint source is a member]...and...needed to facilitate improved environmental compliance with WQS.”<sup>22</sup> The load allocated to an individual nonpoint source within a sector should be calculated to ensure that that source is doing its fair share to contribute towards achieving compliance with any applicable Water Quality Standards so as to avoid inequitable burdens being placed on members of the sector whose baselines are established at a later date. While many, if not most, baselines for nonpoint sources will be established by MDA under its regulations, MDE will likely be called on to establish some of these, and its regulations therefore must include appropriate provisions to enable it to do so.

## **11. MDE cannot allow capacity credit generation or capacity trading**

The Water Quality Trading Advisory Committee rightly reached a decision that wastewater treatment plants should not be allowed to sell credits representing their extra capacity. Not only does it fail to comport with Clean Water Act principles and the fundamentally important principle of *additionality*

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<sup>22</sup> See EPA , Technical Memorandum, Establishing Offset and Trading Baselines p. 4 (February 2, 2016).

embedded in the TMDL,<sup>23</sup> capacity trading can also flood the market with ‘free’ credits that interfere with the creation of the viable marketplace that MDE is trying to create.

Several MS4s have already declared their intent to use this allowance as a loophole to get out of financing new stormwater projects if it becomes available. In subparagraph .08A.(1)(b)(iv), the regulations allow an MS4 to purchase capacity credits if other sources of credit generation do not “reasonably” meet the demand. This provision is both ambiguous and inappropriate. The entire purpose of these regulations is to create the rules for the marketplace. This open-ended provision does not precisely define what is “reasonable.” It furthermore represents a very clear and bold loophole that could sabotage the marketplace and, more importantly, all of the past and present efforts to meet our commitment to the Bay TMDL and attain local water quality standards. By making capacity credits the trade of last resort, the Department is in essence declaring that (a) capacity credits are not an appropriate or effective means of reducing pollution; (b) the purchase of these undesirable credits is preferable to stimulating demand for new and effective pollution reduction projects and practices through market signals (higher prices); and (c) that giving pollution allowances away is preferable to the enforcement of existing pollution limits set out in Clean Water Act permits.

Wastewater treatment plants should only be able to generate credits if they invest in new projects or undertake other new initiatives that create additional pollution load reductions which would not otherwise occur. Credits fail this additionality test if, for example, they are not set at a baseline consistent with the nutrient load concentrations envisioned in state law (3 mg/L for nitrogen; and 0.3 mg/L for phosphorus) and created by wastewater treatment plant upgrade projects that have already been completed and financed with taxpayer dollars. We strongly urge MDE to create clear eligibility requirements for credit generation by wastewater treatment plants. These criteria could include, for example, the submission by the facility of an application created by the department that allows the proposed credit generator to describe what additional capital projects or operational changes the facility will undertake, an estimate of the load reduction to be achieved, and the formula that the applicant will use in this estimate and that the department will use to ultimately certify the number of credits created. The formula must ensure that credits are only certified for reductions that are based on (1) new or additional projects, investments, or actions taken; (2) reductions below the “enhanced nutrient removal” load concentration levels set by the General Assembly and codified in Title 9, Subtitle 16 of the Environment Article; and (3) load concentration levels which are, in fact, lower than historic levels for the facility.

Again, the trading of excess capacity fails the principle of additionality and violates the TMDL and the Clean Water Act. MDE is not authorized to permit capacity trading.

**12. Increase Transparency: Provide an opportunity for the public to comment on an application for credit approval when MDA or MDE receives a completed Certification and Registration Form.**

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<sup>23</sup> See, e.g., U.S. EPA, Components of Credit Calculation, Technical Memorandum, 5 (May 14, 2014).

The regulation needs to include more opportunities for transparency in the nutrient trading program. The MDA regulations give some guidance as to what MDE should include in the regulations. These regulations state in Sections 07.B and C the essential requirements that must be met before a credit can be certified. Section 07.F of the MDA regulations specifies that credits may be “certified” once these requirements are met, and Section 07.G says that following approval each credit shall be given a “unique registration number” and registered. This or similar language should also be included for other nonagricultural credit generation.

There are also additional components MDE should add to this regulation. After credits are certified, MDE must include a system for tracking each credit, as required by the EPA Technical Memorandum on Certification and Verification of Offset and Trading Credits in the Chesapeake Bay Watershed.<sup>24</sup>

Furthermore public notice and comment should be required when MDA or MDE receives a completed Certification and Registration Form, along with the other documents and information required by Sections 07.A and .B. of the MDA trading generation regulations. Without the publication by the department of an announcement of the credit request and a reasonable period for comments, there is no meaningful transparency in the program. Requiring public notice and comment is the only opportunity for interested parties to review the proposed credit(s) and supporting documentation and evaluate and comment on whether: (1) the applicant has properly complied with baseline requirements, (2) the requirements that the Nutrient Management Plan and Soil Conservation and Water Quality Plan be fully implemented are demonstrated, (3) the effectiveness and likely duration of the credits have been properly calculated, (4) whether calculations requiring application of the Maryland Nutrient Trading tool have been properly performed and documented, and (5) the other information required by Section 07.A and B has been provided by the applicant.

In addition, MDA and MDE should both receive a copy of the application no later than the date of the public announcement. MDE has an important interest in any measure that could affect achievement of TMDL goals and water quality standards. In most, if not all cases, any credit purchased and used by a point source discharger will be incorporated into an NPDES permit, which is issued by MDE. In cases where a credit application is submitted to MDA, MDE should have an opportunity at this time to review the credit application and provide comments to MDA. In the event MDE believes there is anything unsatisfactory in the credit, the correction should be addressed before the credit has been approved, registered, purchased, and included with a permit application to MDE.

The MDA regulations in Section 08.D appear to recognize the important role played by MDE because they require that MDE be provided with a copy of the verifier’s report generated after an annual verification inspection. However, MDE regulations should also require the original application be shared with MDE as well to assist in verification.

These important elements of the process can be effectively accomplished by adding a new subsection C under Section .07. The existing Subsection 07.C should then be designated as 07.D. The new Section 07.C should provide, in words or substance, as follows:

*C. Promptly after a determination by MDE or MDA that an application for approval and registration of one or more credits includes all of the documents specified in this Section*

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<sup>24</sup> U.S. EPA, “Certification and Verification of Offset and Trading Credits in the Chesapeake Bay Watershed”, p. 9 (July 21, 2015).

*07, and Sections 08, 09 and 10, as applicable,, the Department shall post on its website an announcement of the application and identifying a location where the application and related documents can be inspected and copied, and allowing a time for public comments on the application of not less than 30 days following the date of publication of the announcement. In addition, not later than the date of publication, MDE or MDA, as appropriate, shall provide the other with a copy of the application and supporting information.*

Finally, the Department should get copies of disputed information reports. Section 09.E of the MDA regulations allows the owner or operator of a facility to “dispute information in” the verifier’s report by filing a statement of written concerns with the Maryland Department of Agriculture within 30 days of his or her receipt of the report. MDE should require that a copy of the written concerns be provided to MDE at the same time as MDA. MDE will have received the verifier’s report, and should be advised if there is a challenge to it by the owner/operator.

We appreciate the opportunity to submit these comments. We would be pleased to discuss any aspect of them and answer any questions. Please contact Abel Russ, with Environmental Integrity Project, with any questions, comments, or concerns at [aruss@environmentalintegrity.org](mailto:aruss@environmentalintegrity.org).

Respectfully submitted,

Audubon Naturalist Society  
Common Cause Maryland  
Environmental Integrity Project  
Maryland League of Conservation Voters  
Maryland Sierra Club  
Midshore Riverkeeper Conservancy  
Rachel Carson Council  
Waterkeepers Chesapeake  
West/Rhode Riverkeeper

*cc by email:*

**Ben Grumbles**, Secretary, Maryland Department of the Environment, [ben.grumbles@maryland.gov](mailto:ben.grumbles@maryland.gov)  
**Lynn Y. Buhl**, Assistant Secretary, Maryland Department of the Environment, [lynn.buhl@maryland.gov](mailto:lynn.buhl@maryland.gov)  
**Nick DiPasquale**, Director, Chesapeake Bay Program, [Dipasquale.nicholas@Epa.gov](mailto:Dipasquale.nicholas@Epa.gov)  
**Rich Batiuk**, Associate Director for Science, Accountability and Implementation, Chesapeake Bay Program, [batiuk.richard@epa.gov](mailto:batiuk.richard@epa.gov)