

**Statement of Basis for Proposed Permit Modification: NPDES General Permit for Stormwater Discharges from Small Municipal Separate Storm Sewer Systems (MS4s) to Certain Waters in the Commonwealth of Massachusetts**

In consultation with various parties, EPA is proposing to make the following modifications to the Clean Water Act (CWA) National Pollutant Discharge Elimination System (NPDES) general permit for stormwater discharges from small Municipal Separate Storm Sewer Systems (MS4s) to certain waters of the Commonwealth of Massachusetts (Massachusetts Small MS4 General Permit), as modified on November 7, 2018.

EPA has received input during settlement negotiations arising from litigation brought by the multiple parties challenging this permit (and the New Hampshire Small MS4 General Permit).<sup>1</sup> It is EPA's view that the proposed modifications are consistent with the Clean Water Act (CWA) and 40 C.F.R. § 122, including 40 C.F.R. § 122.62, and based on the causes for modification specified in 40 C.F.R. § 122.62(a)(2).

These proposed modifications would be consistent with the CWA and implementing regulations. A comprehensive summary of the basis of all permit conditions, including all applicable statutory and regulatory authorities, is included in the original Massachusetts Small

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<sup>1</sup> *Center for Regulatory Reasonableness, et al. v. EPA*, No. 16-1246 (D.C. Circuit) (2016 Massachusetts Small MS4 General Permit consolidated cases); *Center for Regulatory Reasonableness et. al v. EPA, Conservation Law Foundation, Intervenor* No. 17-1060 (D.C. Circuit) (2017 New Hampshire Small MS4 General Permit consolidated cases).

MS4 General Permit fact sheet,<sup>2</sup> responses to comments for the final permit,<sup>3</sup> and as described below. Any proposed modifications relating to 40 C.F.R. § 122.34 reflect the requirements of that regulatory section as revised by EPA in January 2017.

In accordance with 40 C.F.R. § 122.62, EPA is only reopening for public comment the conditions subject to these proposed modifications to the Final 2016 Massachusetts Small MS4 General Permit. The proposed modifications also include corrections of typographical errors and omissions throughout. These modifications were done in accordance with 40 C.F.R. § 122.63. All persons, including permittees, who believe any of these proposed permit modifications are inappropriate must raise all issues and submit all available arguments and all supporting material for their arguments in full by the close of the public comment period, to Newton Tedder, U.S. EPA, Water Division, Stormwater and Construction Permits Section, 5 Post Office Square, Suite 100, Boston, Massachusetts 02109-3912 or [tedder.newton@epa.gov](mailto:tedder.newton@epa.gov). Any person, prior to such date, may submit a request in writing for a public hearing to consider the Draft Permit to EPA. Such requests shall state the nature of the issues proposed to be raised in the hearing. A public hearing may be held if the criteria stated in 40 C.F.R. § 124.12 are satisfied. In reaching a final decision on the Draft Permit, the EPA will respond to all significant comments and make these responses available to the public at EPA's Boston office and online.

Following the close of the comment period, and after any public hearings, if any such hearing(s) is (are) held, the EPA will issue a final permit decision and forward a copy of the final

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<sup>2</sup> “Fact Sheet: Draft General Permits for Stormwater Discharges from Small Municipal Separate Storm Sewer Systems in Massachusetts,” Sept. 30, 2014. Available at <https://www3.epa.gov/region1/npdes/stormwater/ma/2014FactSheet.pdf>.

<sup>3</sup> “EPA’s Response to Comments on the National Pollutant Discharge Elimination System (NPDES) General Permits for Stormwater Discharges from Small Municipal Separate Storm Sewer Systems in Massachusetts,” April 4, 2016. Available at <https://www3.epa.gov/region1/npdes/stormwater/ma/2016fpd/rtc-2016-ma-sms4-gp.pdf>.

decision to the permittees and each person who has submitted written comments or requested notice. Under section 509(b) of the Clean Water Act, judicial review of any modification of the final general permit can be requested by filing a petition for review in the United States Court of Appeals within 120 days after the permit modification is considered issued. Under section 509(b)(2) of the Clean Water Act, the requirements in this permit may not be challenged later in civil or criminal proceedings to enforce these requirements. In addition, this permit may not be challenged in other agency proceedings.

EPA may not issue a permit unless the Massachusetts Department of Environmental Protection (MassDEP) either certifies that the permit conditions are stringent enough to assure that the discharge will not cause the receiving water to exceed State Water Quality Standards or it is deemed that the state has waived its right to such certification. Regulations governing state certification are set forth in 40 CFR § 124.53 and §124.55. EPA has requested permit certification by the State pursuant to 40 CFR § 124.53 and expects that the State will certify the draft permit.

### Part 1.3

EPA is not proposing to modify this permit Part. That said, EPA includes it here to note that certain infiltration practices that may be used for permit compliance may be classified as Class V Underground Injection Control (UIC) Wells and subject to 310 CMR 27.00. In general, these circumstances will be limited to subsurface infiltration practices, such as dry wells. When an infiltration practice is considered a Class V UIC well, the party installing the infiltration practice will need to register the well with MassDEP, per Massachusetts law. MassDEP has developed a specific technical registration compliance document for stormwater infiltration

practices to streamline the registration process. That technical compliance form can be found here: <https://www.mass.gov/service-details/underground-injection-control-uic-technical-compliance-forms> (retrieved October 2, 2019). For additional information regarding UIC Well registration, please contact MassDEP at [ask.uic@state.ma.us](mailto:ask.uic@state.ma.us).

### Part 2.0

EPA proposes slight modifications to Part 2.0 to clarify that it is the foundation for the subsequent water quality-based effluent limitations (WQBELs) in Part 2.1.1 but is not grounds for a separate permit violation.

### Part 2.1

EPA proposes to replace “includes provisions to ensure that discharges from the permittee’s small MS4 do not cause or contribute to an exceedance of water quality standards, in addition to requirements to reduce the discharge of pollutants to the maximum extent practicable” with “this permit includes provisions to ensure that discharges from the permittee’s small MS4 meet applicable water quality standards as set forth in part 2.1.1. below.” The proposed modified Part 2.1 would set up the specific WQBELs in Part 2.1.1 and would not be grounds for a separate permit violation. CWA section 402(p)(3)(B)(iii) and 40 C.F.R. § 122.34(a) authorize including these permit requirements.

### Part 2.1.1

EPA is proposing various modifications to Part 2.1.1 consistent with the modification EPA is proposing for Part 2.0 above.

EPA also proposes including a footnote to clarify the meaning of “applicable water quality standards” for the purposes of this permit. The footnote would clarify that applicable water quality standards are the state standards that have been federally approved or promulgated as of the effective date of this permit. EPA has compiled those standards at <http://www.epa.gov/waterscience/standards/wqslibrary/>.

EPA would specify, as it did with the requirements of the 2016 permit, that permittees meet appropriate water quality standards by complying with Part 2.1.1.b (and Appendix F) or 2.1.1.c (and Appendix H), as appropriate. For requirements to meet water quality standards that are not covered by Parts 2.1.1.b or 2.1.1.c, compliance would be determined instream after mixing, as applicable.

EPA proposes to require that any other discharge of a pollutant that: (i) is not addressed by Part 2.1.1.b, Part 2.1.1.c, Part 2.2.1, and/or Part 2.2.2, (ii) is not the result of an illicit discharge subject to Part 2.3.4, and (iii) does not meet applicable water quality standards, either independently or in conjunction with other discharges, shall comply with Part 2.1.1.d. Part 2.1.1.d would require the permittee to address such discharges within 60 days or establish a schedule of actions to achieve a remedy or elimination of the discharge in the shortest time that is not impracticable.

EPA proposes to clarify this Part to make clear that an MS4’s compliance with this Part would be judged solely by its compliance with relevant permit requirements. Thus, for Parts 2.1.1.b and 2.1.1.c, EPA would judge compliance based upon the requirements contained in Appendices F and H, respectively. As such, a permittee’s non-compliance with Appendices F and H would constitute non-compliance with 2.1.1.a, and such non-compliance would not also constitute an additional or separate violation of the permit’s WQBELs.

Compliance with Part 2.1.1.d would be judged by whether the permittee complies with the text of 2.1.1.d itself, which would specify what a permittee must do if EPA or MassDEP notifies the permittee that its discharge exceeds applicable water quality standards in the receiving water after any applicable mixing and the discharge of that pollutant is not subject to Part 2.2.1, Part 2.2.2 and/or Part 2.3.4. EPA does not expect the scenario described above, which would result in a discharge of a pollutant being subject to Part 2.1.1.d, to arise often (if ever), but would include this provision as a reasonable approach for the permittee to take to address any such discharge.

All modified provisions in this Part would be authorized by CWA section 402(p)(3)(B)(iii) and 40 C.F.R. § 122.34(a).

#### Part 2.1.2

Stakeholders requested that EPA clarify part 2.1.2. EPA is proposing to modify part 2.1.2.a to clarify that if an applicable MassDEP approval specifies conditions or requirements related to the increased discharge, such conditions may be independently enforceable under state law and may be adopted into a future permit. EPA is not proposing to modify part 2.1.2.b. For discharges to impaired waters, permit part 2.1.2.b contemplates area-wide pollutant reductions for compliance.

#### Part 2.2

EPA is proposing to modify this Part to make it explicit that dischargers to certain water quality-limited waters shall be subject to the applicable requirements in Part 2.2.1, Appendix F, or an approved alternative structural control implementation schedule, and/or the applicable

requirements in Part 2.2.2 or Appendix H. These proposed modifications would account for the proposed new concept of alternative structural control implementation schedules, explained in the Appendix F portion of this Statement of Basis. Permittees may implement TMDL requirements in the permit as part of an integrated plan.

### Part 2.2.2

EPA proposes targeted modifications to this Part, which requires permittees to take certain actions if they discharge into certain water quality-limited waters.

First, EPA proposes to clarify that if there is a discharge from the MS4 to a water quality-limited waterbody where pollutants typically found in stormwater (specifically nutrients (Total Nitrogen or Total Phosphorus), solids (TSS or Turbidity), bacteria/pathogens (E. Coli, Enterococcus or Fecal Coliform), chloride (Chloride), metals (Cadmium, Copper, Iron, Lead or Zinc) and oil and grease (Petroleum Hydrocarbons or Oil and Grease)) are the cause of the impairment and is not subject to Part 2.1.1.b for those pollutants or the MS4 is located in a town listed in Part 2.2.2.a.-b, the permittee shall comply with the provisions in Appendix H applicable to it.

Second, EPA is proposing to add the following language to this Part to clarify that permittees' discharges may become subject to Appendix H requirements during the permit term under certain circumstances: "Permittees notified by EPA or MassDEP during the permit term that they are discharging to a water quality-limited water shall update their SWMP in accordance with Appendix H."

Finally, EPA is proposing to specify that Part 2.2.2 and Appendix H apply where no approved TMDL has been established "as of the issuance date of this permit." For this purpose,

“the issuance date of this permit” means the date that the permit was originally issued, that is, April 4, 2016.

### Part 2.3.3

EPA is proposing to modify permit Part 2.3.3.a as follows, adding the underlined language: “All public involvement activities shall comply with state public notice requirements (MGL Chapter 30A, Sections 18 – 25 – effective 7/10/2010). The SWMP, all documents submitted to EPA in accordance with Appendix F, and all annual reports shall be available to the public utilizing the permittee’s website, other website, or other means.” These proposed modifications would further EPA’s goal of making all documents submitted to EPA under the proposed Alternative Schedule Request mechanism in Appendix F available to the public.

### Part 2.3.5

EPA is proposing to modify Part 2.3.5 to more clearly organize the permit requirements for construction activity. In this proposal, EPA has rewritten and reorganized many of this Part’s provisions to clearly delineate permittees’ responsibilities. The substantive requirements of this Part have not been changed.

As proposed, this Part would clarify that permittees may rely on Stormwater Pollution Prevention Plans (SWPPPs) prepared by construction operators developed in accordance with EPA’s 2017 Construction General Permit as part of the actions necessary to meet the requirements of Part 2.3.5, so long as those SWPPPs also meet local requirements.

EPA is proposing to define the term “infeasible” in Appendix A and is used in this Part to clarify when Low Impact Development (LID) strategies should be incorporated into site plans. This definition is from 40 C.F.R. § 450.11(b), the Construction and Development Effluent Limitations Guidelines and New Source Performance Standards. While small MS4s are not subject to 40 C.F.R. § 450, the definition of “infeasible” in the Construction and Development Effluent Limitations Guidelines and New Source Performance Standards is suitable for the Construction Site Stormwater Control Minimum Control Measure in this Permit, due to the similar nature of the discharges and for consistency with EPA’s 2017 Construction General Permit.

EPA also proposes to add dates for all manuals referenced in this Part and elsewhere in the permit.

#### Part 2.3.6

EPA is proposing to modify Part 2.3.6 to remove references to specific parts of the Massachusetts Stormwater Standards contained in the Massachusetts Stormwater Handbook and instead would require that permittees’ ordinance or other regulatory mechanism (ordinance or bylaw) be at least as stringent as the 2008 Stormwater Handbook for stormwater management system design. The Permit would retain the requirement that permittees’ ordinance for new and re-development contain the same pollution reduction requirements specified in the original Permit but provides clarity regarding the available options for meeting those requirements.

EPA proposes to clarify that permittees’ ordinance must implement the use of Low Impact Development (LID) to reduce the discharge of stormwater from development on all sites, unless the use of LID is infeasible on that site.

As proposed, this Part would clarify that permittees' ordinance must require stormwater management systems be designed to meet average annual pollutant removal requirements for total suspended solids and total phosphorus. The permittees may choose one of four methods to achieve these average annual pollutant removal requirements: 1) installing BMPs that meet the pollutant removal requirements based on EPA guidance, 2) retaining the volume of runoff equivalent to one inch multiplied by the total post-construction impervious surface area, 3) a combination of method 1 (treatment) or method 2 (retention), or 4) utilizing offsite mitigation that meets the above standards within the same USGS HUC12 watershed as the development site.

As described in method 4 above, EPA proposes to add the option to meet pollution reduction requirements for new development sites using offsite mitigation, so long as the offsite mitigation is within the same HUC-12 watershed. This provision is proposed as an option that permittees could choose to include in their ordinance to meet the pollution removal requirements for new development. The flexibility proposed in this permit for new development is intended to allow municipalities, through their stormwater management plans and policies, to consider various factors, including circumstances where constructing BMPs on-site is infeasible, when deciding where to require mitigation. For new development, specifically, retention or treatment on-site is generally considered to be a key tool for maximizing stormwater pollution mitigation and creating retention or treatment systems on-site during construction is often the most cost effective tool.. Local watershed characteristics are often the most determinative factors for consideration of where the most effective stormwater mitigation is placed. Where, for example, local block-by-block flooding is of concern to a municipality, on-site mitigation (or mitigation in the immediate vicinity of a development project) may be in the best interests of the municipality.

In other cases, such as where municipalities may be consolidating green infrastructure projects (e.g., in a town park) in areas that may be more flood-prone or more effective at treating stormwater before it is discharged into a receiving water, offsite mitigation may be in the best interests of the municipality. A mix of onsite and offsite mitigation may also be in the interests of a municipality and site developers.

EPA proposes to retain the offsite mitigation option to meet the pollution reduction requirements for redevelopment in the original permit. EPA proposes to require that any offsite mitigation be within the HUC -12 watershed consistent with the proposed option for new development, described above, instead of the HUC-10 watershed specified in the original permit.

EPA proposes to add dates for all manuals referenced in this Part (as well as elsewhere in the permit) and is updating all links.

#### Part 2.3.7

Consistent with the proposed modification for Part 2.0 above, EPA proposes to replace “includes provisions to ensure that discharges from the permittee’s small MS4 do not cause or contribute to an exceedance of water quality standards, in addition to requirements to reduce the discharge of pollutants to the maximum extent practicable” with “this permit includes provisions to ensure that discharges from the permittee’s small MS4 meet applicable water quality standards.”

#### Part 4.1

EPA is proposing to clarify that EPA or MassDEP may request specific changes to the SWMP based on annual report review as needed to satisfy the conditions of the permit. Once the

permit is issued, EPA or MassDEP may not require additional actions or measures not already required by the permit but may request that permittees change their SWMP to ensure that they are satisfying the requirements of the permit.

#### Part 4.4

Consistent with the modification EPA is proposing in Part 2.0 above, EPA proposes to replace “includes provisions to ensure that discharges from the permittee’s small MS4 do not cause or contribute to an exceedance of water quality standards, in addition to requirements to reduce the discharge of pollutants to the maximum extent practicable” with “this permit includes provisions to ensure that discharges from the permittee’s small MS4 meet applicable water quality standards as set forth in part 2.1.1. below.”

#### Part 5.1.5

EPA is proposing to add this Part to the permit to specify permit requirements for non-traditional MS4s located in the Charles River Watershed.

#### Part 6.5

EPA is proposing to add this Part to the permit to specify permit requirements for transportation MS4s located in the Charles River Watershed

#### Appendix A

EPA is proposing to add the term “infeasible” as defined at 40 CFR § 450.11(b):

*Infeasible.* Infeasible means not technologically possible, or not economically practicable and achievable in light of best industry practices.

#### Appendix F

EPA is proposing to modify Appendix F Part I to allow permittees to submit information to EPA to request an alternative schedule to meet the phosphorus reduction requirements for permittees in the Charles River Watershed in circumstances that warrant a schedule change. While the schedules to meet phosphorus reductions in each phase of the phosphorus control plan (PCP) contained in the original permit are assumed to represent a schedule achievable by all permittees, EPA has become aware that there may be extenuating circumstances that make meeting the schedules in Appendix F Part I impracticable, even when the permittee is working to meet the original phosphorus reduction milestones. EPA expects that the need to request an alternative schedule would happen rarely, especially during Phase 1 of PCP implementation. However, EPA would evaluate each request when local circumstances warrant extended schedules to meet phosphorus reduction requirements in Appendix F Part I. The proposed permit modification describes the process for a permittee to request a change to the Appendix F Part I schedules and begins with the permittee submitting an Alternative Schedule Request (ASR) package in cases where meeting the schedules in Appendix F Part I are impracticable. . Each Charles River PCP phase in Appendix F Part I contains specific information that permittees seeking an alternative schedule must submit as part of the ASR package and the term “impracticable” would be interpreted based on the required information to be submitted with each ASR package.

For Phase 1, permittees would only be able to submit an ASR when the milestones in Table F-1 are unaffordable, and the ASR could only include an alternative schedule to meet the milestones of Table 1 numbers 1-11 through 1-14. The submittal would need to include information on permittee PCP implementation to date, including information demonstrating the applicant's efforts and extent of progress made to meet the applicable phosphorus reduction milestones, a narrative of the reasons why an alternative schedule is being sought, detailed cost information for planned structural controls to meet the Phase I milestones on the requested schedule, a detailed affordability analysis including information related to funding mechanisms, and a requested schedule to meet all phosphorus reduction milestones in Phase 1.

Phase 2 and Phase 3 Alternative Schedule Requests would need to contain all the information above, as well as information on any other conditions concerning capital improvement project scaling, permitting and land acquisition impediments and other practicability information supporting the need for an alternative schedule.. An ASR would need to include an affordability assessment and planning document detailing the reasons an alternative schedule is warranted and must include a plan to meet the phosphorus reduction requirements of the phase from which relief is sought.

The proposed modification would require that when a permittee submits an ASR to EPA, the permittee must make all documents available to the public utilizing their website, another website or other means consistent with the proposed modification to Part 2.3.3. EPA would also notify a list of interested parties via email upon the receipt of any Alternative Schedule Request package and EPA plans to provide a link on its website to allow interested parties to be added to the email notification list.

Under the proposed permit modifications, EPA would review the ASR package for completeness and may request more information from the permittee to determine that the request is complete. If EPA were to not act to determine that the ASR package is complete within 30 days of receipt or did not request additional information within 30 days of receipt, the ASR would be deemed complete. If EPA were to find the ASR to be complete (or automatically deemed complete), EPA would post the ASR package on its website for 30 days and take public comment on the ASR.

Following the 30-day public comment period, EPA would take action in writing to approve or deny an Alternative Schedule Request to meet the phosphorus reduction milestones for the phase in which relief is sought within 90 days of the close of the public comment period. EPA would address all relevant comments received during the comment period during the approval or denial process and may change the Alternative Schedule requested by the permittee prior to approval, with the permittee's consent. If EPA were to fail to take action on the ASR within 90 days of the close of the public comment period, the request would be deemed approved automatically. EPA would retain discretion to deny a permittee's request based on permit non-compliance and use enforcement mechanisms where appropriate for those permittees. Any action by EPA approving or denying an ASR (or automatic approval after 90 days of inaction after the close of public comment period) would be a final agency action subject to judicial review in federal district court.

Upon approval of an Alternative Schedule, the permittee would be required to update its PCP to include the approved alternative schedule milestones and implement their PCP according to the new approved schedule. Until ASR approval, permittees would remain subject to the original schedules and milestones contained in Appendix F Part I. Under the proposed

modifications, permittees would submit separate ASRs for each PCP phase and EPA would treat each submittal as distinct from any previous request.

EPA is proposing to update the required phosphorus reductions contained in Table F-2 and Table F-3 of Appendix F Part I. The proposed increase in required phosphorus reduction target represents the removal of the presumptive watershed-wide IDDE phosphorus reduction applied to each permittee's required phosphorus reduction target. EPA would recalculate the watershed wide phosphorus reduction due to IDDE implementation by all permittees following completion of each permittee's IDDE program (10 years after the permit effective date). The watershed wide phosphorus reduction realized through IDDE implementation would then be distributed among the permittees to reduce each permittee specific required phosphorus reduction target following IDDE program completion. This proposed approach would more accurately reflect the phosphorus load reduced watershed wide from removal of illicit discharges.

Consistent with the proposed modification to Appendix F Part I described above, EPA is proposing to modify Appendix F Part II to allow permittees to submit an Alternative Schedule Request (ASR) when compliance with the Part II phosphorus reduction milestones are determined to be impracticable. Unlike the requirements in Appendix F Part I, there are no Phases in Lake and Pond Phosphorus Control Plan implementation. Therefore, the ASR for Appendix F Part II would be an affordability assessment and planning document detailing the reasons an alternative schedule is warranted and would be required to include a plan to meet the full phosphorus reduction requirements of Table F-6 of Appendix F Part II. In addition, each ASR package would need to contain the elements discussed above and the review process would be the same as the ASR process discussed above.

EPA is proposing to update Appendix F Attachment 2 to fix typographical and formatting errors and to include estimated nitrogen reductions from non-structural controls to be consistent with the most recent information applicable to non-structural controls implemented in New England.

EPA is proposing to update Appendix F Attachment 2 to fix typographical and formatting errors and to include estimated nitrogen reductions from non-structural controls based on data gathered and modeling conducted since 2016.

EPA is proposing to completely replace Appendix F Attachment 3 to fix typographical and formatting errors and to include estimated nitrogen reductions from structural controls based on data gathered and modeling conducted since 2016. In addition, based on additional modeling, EPA is proposing to update the biofilter, sand filter, and dry extended detention point pollutant removal estimates to be consistent with the most recent information applicable to structural controls implemented in New England. Appendix F, Attachment 3 does not impose any requirements on permittees. It describes the types of structural stormwater controls for which EPA currently has quantifiable pollutant removal information and how to determine the resulting load reductions for pollutants. Permittees could choose, but are not required, to install the specific stormwater controls described in Appendix F, Attachment 3.

#### Appendix H

Consistent with the proposed modification to Part 2.2.2., EPA proposes to modify Appendix H Part I, II, III and IV to specify that if a permittee becomes aware that it is discharging to an impaired water that is impaired due to a pollutant addressed by Appendix H

during the permit term, the permittee has 90 days to update its SWMP to be consistent with the requirements in Appendix H associated with the identified pollutant. All deadlines in Appendix H for the identified pollutant would be extended and based off the date of identification instead of the effective date of the permit. For example, if EPA were to approve a new 303(d) impaired waters list during the permit term, all permittees would be given 90 days to update their SWMPs as necessary to address any new listed waterbodies where the impairment would cause the permittee to be subject to the requirements in Appendix H.

Consistent with the proposed modification to Part 2.0, EPA is proposing edits to one of the metrics for discontinuing Appendix H requirements for certain pollutants. In several places in Appendix H, the permittee would be relieved of Appendix H requirements for specific pollutants when the discharge is determined to meet applicable water quality standards, rather than applicable water quality criteria.

EPA also proposes to edit several footnotes in Appendix H to read that applicable water quality standards are the state standards that have been federally approved or promulgated as of the issuance date of the permit rather than the effective date. EPA has compiled those standards at <http://www.epa.gov/waterscience/standards/wqslibrary/>. For this purpose, “the issuance date of this permit” means the date that the permit was originally issued, that is, April 4, 2016.