

#### **IMPLEMENTATION TECHNICAL PAPER No. 2**

TO:

EPA Regional and Authorized State NPDES Permit and Enforcement Coordinators

and State Information Technology Staff

FROM:

Randolph L. Hill, Director,

Enforcement Targeting and Data Division

US EPA/OECA

DATE:

19 April 2018

SUBJECT:

Implementation Technical Paper No. 2: Data requirements for NPDES Electronic

Reporting Rule Sewer Overflow, Bypass, POTW, and LTCP-specific Data Elements

The NPDES Electronic Reporting Rule ("final rule") requires the electronic reporting and sharing of NPDES program data. As part of EPA's collaboration with the states to move forward with converting the NPDES program from paper to electronic reporting, EPA is developing a series of implementation technical papers to help EPA Regions and state NPDES programs make a smooth transition. This is the second of these technical papers and this particular paper addresses sewer overflows and bypasses as well as information specific to Publicly-Owned Treatment Works (POTWs) and combined sewer system Long Term Control Plans (LTCPs).

This paper was developed based on input from the EPA-state Sewer Overflow Technical Workgroup. This workgroup usually met bi-weekly from August 2016 to March 2017 and included a total of 66 subject matter experts from EPA Headquarters, six EPA Regions, and 20 states. EPA distributed the second version of this paper to EPA Regional and state NPDES permitting and enforcement coordinators as well as state information technology staff (the Exchange Network NPDES Integrated Project Team and ICIS-NPDES users). EPA thanks the commenters for their time and efforts to review this paper and provide feedback. This version incorporates these comments. EPA will publish this paper on its website to assist authorized NPDES programs with implementation of the final rule.¹ EPA also plans to provide updates on the progress states are making in sharing these data through regularly scheduled meetings (e.g., ICIS-NPDES IPT monthly meetings, ICIS-NPDES user monthly meetings), the EPA Enforcement and Compliance History Online (ECHO) "NPDES eRule Readiness and Data Completeness Dashboard," as well as through e-mail news alerts.<sup>2,3</sup>

<sup>&</sup>lt;sup>1</sup> See: https://www.epa.gov/compliance/npdes-ereporting

<sup>&</sup>lt;sup>2</sup> See: https://www.epa.gov/compliance/npdes-ereporting-help

<sup>&</sup>lt;sup>3</sup> See: https://echo.epa.gov/trends/npdes-erule-dashboard-public

Among other things, the final rule lists the information ("data elements") to be provided, groups this information by types of reports and identifies the regulatory citations requiring the information. EPA has taken a number of steps to assist the states and regulated community in moving forward with submission of this information. This includes development of electronic reporting forms and outreach efforts to test these forms for ease of submission and accessibility. This paper represents another step in EPA's effort to aid the electronic reporting effort.

This paper supports implementation of the final rule by providing further information for the data elements identified in the final rule (Appendix A to 40 CFR 127). In particular, this technical paper provides more detail for data elements specific to noncompliant sewer overflows, bypasses, and data specific to POTWs and LTCPs.

These data are gathered during the NPDES permit application/Notice of Intent (NOI) process (individually permitted facilities and general permit covered facilities), noncompliance reporting, and authorized NPDES program management and oversight of NPDES-regulated entities.

EPA will use this technical paper to guide development of its electronic reporting tools and NPDES national data system (ICIS-NPDES), update NPDES data sharing protocols and schemas, update its procedures for automatically detecting noncompliance, and to help development of its forthcoming NPDES Noncompliance Report (NNCR).

EPA will work collaboratively with authorized NPDES programs on the recommended actions in this paper. Authorized NPDES programs can request data entry help from EPA by sending an email to: NPDESeReporting@epa.gov.

DISCLAIMER: This implementation technical paper provides data entry guidance for sewer overflows and bypasses as well as information specific to Publicly-Owned Treatment Works (POTWs) and combined sewer system Long Term Control Plans (LTCPs). While this document cites statutes and regulations that contain legally binding requirements, it does not itself impose legally binding requirements on EPA, states, tribes, other regulatory authorities, or the regulated community and its content might not apply to a particular situation based upon the circumstances. EPA, state, tribal, and other decision makers retain the discretion to adopt approaches on a case-by-case basis that differ from those provided in this document as appropriate and consistent with statutory and regulatory requirements. This document does not confer legal rights or impose legal obligations upon any member of the public. This document does not constitute a regulation, nor does it change or substitute for any CWA provision or EPA regulations. EPA could update this document as new information becomes available.

# Implementation Technical Paper No. 2 Data requirements for NPDES Electronic Reporting Rule Sewer Overflow, Bypass, POTW, and LTCP-specific Data Elements

#### 1. Overview of Sewer Overflow, Bypass, POTW, and LTCP-specific Data Elements

This technical paper supports implementation of the final rule by providing further information for the data elements identified in the final rule (Appendix A to 40 CFR 127). In particular, this technical paper provides more detail for the data elements specific to sewer overflows, bypasses, Publicly-Owned Treatment Works (POTWs), and combined sewer system Long Term Control Plans (LTCPs). These data elements are part of the following NPDES Data Groups:

- Core NPDES Permitting, Compliance, and Enforcement Data [40 CFR parts 122, 123, 403, 503];
- General Permit Report: Notices of Intent to discharge (NOIs) [40 CFR 122.28];
- Discharge Monitoring Reports [40 CFR 122.41(I)(4)]; and
- Sewer Overflow/Bypass Event Reports [40 CFR 122.41(I)(6) and (7), (m)].

These data are gathered as part of the NPDES program:

- NPDES permit application/NOI and permit writing process (individually permitted facilities and general permit covered facilities);
- NPDES program oversight of POTWs and other Treatment Works Treating Domestic Sewage (TWTDS) [deficiencies identified through the sewer overflow/bypass compliance monitoring, oversight of LTCP and Combined Sewer Overflow (CSO) controls];
- Approved anticipated CSO-related bypass events [as reported on the Discharge Monitoring Report (DMR)];
- Wet-weather CSO discharges that are not compliant with permit requirements [as reported on the DMR] and other noncompliant sewer overflows (as reported on the Sewer Overflow/Bypass Event Report); and
- Anticipated and unanticipated bypasses (as reported on the Sewer Overflow/Bypass Event Report).

Sanitary sewer systems collect and transport domestic, commercial, and industrial wastewater and limited amounts of stormwater and infiltrated ground water to treatment facilities for appropriate treatment. Sanitary sewers are different from combined sewers, which are designed to collect large volumes of stormwater in addition to sewage and industrial wastewater. Occasionally, sanitary sewers will release raw sewage. These types of releases are called sanitary sewer overflows (SSOs). A number of factors can cause or contribute to an SSO, including high levels of inflow and infiltration; blockages caused by roots, grease, sediment or other materials; and structural, mechanical or electrical failures. The proper operation and maintenance of collection system assets is critical to minimizing the frequency and volume of SSOs (1 June 2010; 75 FR 30395). Most of the time, combined sewer systems transport all of their wastewater to a sewage treatment plant, where it is treated and then discharged to a water body. Combined Sewer Overflow (CSO) discharges are releases of untreated rainwater runoff, domestic sewage, and industrial wastewater into the environment.

Noncompliant sewer overflows include:

- wet-weather CSO discharges that are not compliant with permit requirements;
- dry-weather discharges from combined sewer systems (prohibited under the CSO Control Policy
   see 19 April 1994; 59 FR 18689);
- sanitary sewer overflows (SSOs) that discharge to waters of the United States; and
- SSOs that result from noncompliance with the standard NPDES permit requirements in 40 CFR 122.41.

EPA's NPDES regulations define "bypass" as the "intentional diversion of waste streams from any portion of a treatment facility." See 40 CFR 122.41(m)(1)(i). EPA regulations require permittees to report these bypass events within 24-hours for unanticipated bypass events and 10-days before any anticipated bypass events. The CSO Policy discusses how a CSO-related anticipated bypass of the secondary treatment portion of the POTW treatment plant may be approved in an NPDES permit under 122.41(m)(4)(ii).

The standard NPDES permit conditions require the permittee to "properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the permittee to achieve compliance with the conditions of this permit." See 40 CFR 122.41(e). Another standard permit condition regarding the duty to mitigate states that "the permittee shall take all reasonable steps to minimize or prevent any discharge... in violation of [the] permit which has a reasonable likelihood of adversely affecting human health or the environment" [see 40 CFR 122.41(d)]. SSOs that result in discharges to waters of the United States or result from noncompliance with standard conditions including failure to properly operate and maintain the collection system constitute noncompliance (see 1 June 2010; 75 FR 30395, 30398, and NPDES Compliance Inspection Manual, EPA-305-K-17-001, Page 299, Interim Revised Version, January 2017).

Prior to the final rule, data related to sewer overflows, bypasses, POTWs, and LTCPs were most often reported on paper or in non-standard formats. This limits the availability and utility of these data on a national scale. For example, EPA has very limited information on the location and other data (e.g., duration of discharge, overflow volume, and type of potential impact of discharge) regarding noncompliant sewer overflows.

A goal in the final rule is to ensure that "there is consistent and complete reporting nationwide." The standardization of this noncompliance reporting will help EPA and authorized NPDES programs provide more effective and efficient oversight. EPA developed an implementation plan for the final rule, which utilizes several methods for incorporating electronic reporting requirements, including noncompliant sewer overflow reporting and bypass reporting, into NPDES permits (see "Ensuring Compliance with the Implementation Schedule" at 22 October 2015; 80 FR 64073). EPA provided further clarification in the comment response document for the final rule regarding how EPA developed the data elements for bypass and noncompliant sewer overflow report, "This rule simply changes the reporting under existing requirements from paper to electronic reporting. Appendix A identifies the information on the data that must be submitted on a Sewer Overflow Event Report or <u>Discharge Monitoring Reports (DMRs)</u> to ensure consistency." [emphasis added]

<sup>&</sup>lt;sup>4</sup> U.S. EPA, 2015, "Comment Response Document for the NPDES Electronic Reporting Rule (Final Rule)," DCN 0218 EPA Docket Number EPA-HQ-OECA-2009-0274, Page 340 of 1,867. Available at: http://www.regulations.gov.

Authorized NPDES programs are required to share these data with EPA in a timely, accurate, complete, and consistent format (see Subpart C to 40 CFR 127). Authorized NPDES programs will directly enter these Appendix A data elements with EPA's national NPDES data system (ICIS-NPDES) or through electronic data transfers.<sup>5</sup>

Upon full implementation of the final rule, authorized NPDES programs, EPA, and the public will be able to better estimate the location, frequency, magnitude, and duration of bypasses and noncompliant sewer overflows, the environmental and public health impacts, and the potential causes. Additionally, these data can be used to prioritize decisions on how best to upgrade aging infrastructure and could be integrated with health warnings by local municipalities to protect public health.

Finally, full implementation of the final rule will also provide a more complete set of information on POTWs and the effectiveness of LTCP and CSO controls. Under the CSO Control Policy, communities with combined sewer systems are expected to develop LTCPs that provide for attainment of technology-based and water quality-based requirements (including state water quality standards). Information collected under the final rule will be used to evaluate compliance with technology-based and water quality-based permit requirements.

#### 2. Sewer Overflow Noncompliance Reporting and Bypass Reporting

The main concern regarding raw sewage releases associated with sewer overflows and bypasses is typically pathogens, including bacteria, viruses, and protozoa. Sewer overflows and bypasses can contain other pollutants, including nutrients, toxics from industrial, commercial and residential sources, and wastewater solids and debris. Sewer overflows and bypasses can release raw sewage into drinking water supplies, basements, parks, recreational streams, beaches, on city streets and backyards, and other areas where people are in close contact with the overflow. Sewer overflows and bypasses are of special concern to public health because they may expose citizens to bacteria, viruses, intestinal parasites, and other microorganisms that can cause serious illness such as gastroenteritis, hepatitis, cryptosporidiosis, and giardiasis. Sensitive populations, children, the elderly and those with weakened immune systems, can be at a higher risk of illness from exposure to sewage from sewer overflows and bypasses. The threat to public health and the environment posed by sewer overflows and bypasses is not necessarily limited to large volume or extended-duration overflows.

The final rule includes standardized reporting requirements for sewer overflow noncompliance reporting and bypass reporting. In particular, the final rule modified the "Conditions applicable to all permits" section in EPA's NPDES regulations (see 40 CFR 122.41). The requirements provided in §122.41 apply to all types and categories of NPDES permits and must be included in all permits (see §123.25 for applicability to state NPDES permits). Part 122.41 includes requirements for noncompliance reporting, bypasses reporting, and DMRs. These noncompliance reporting requirements also apply to all copermittees (including satellite sewer systems that are co-permittees).

<sup>&</sup>lt;sup>5</sup> Note: Some authorized NPDES programs uses EPA's national NPDES data system (ICIS-NPDES) as their NPDES data system.

<sup>&</sup>lt;sup>6</sup> U.S. EPA, 2001. Guidance: Coordinating CSO Long-Term Planning with Water Quality Standards Reviews, EPA-833-R-01-002, July 31.

<sup>&</sup>lt;sup>7</sup> U.S. EPA, 2010. NPDES Permit Writers' Manual, EPA-833-K-10-001, Page 1-1, September.

The following sections describe how EPA will implement standardization for noncompliant sewer overflow reporting and bypass reporting. This reporting will be conducted on the "Sewer Overflow/Bypass Event Report" or on the DMR for some wet-weather CSOs that are not compliant with permit requirements. NPDES permittees must electronically submit this noncompliant sewer overflow reporting and bypass reporting starting no later than 21 December 2020 (see Table 1 to 40 CFR 127.16), which is part of Phase 2 implementation of NPDES electronic reporting.

Prior to the final rule, permittees used a variety of methods to report noncompliance. Most NPDES permittees reported noncompliance on non-standard paper submissions. However, some authorized NPDES programs used the DMR to collect data on wet-weather CSO discharges. For example, some authorized NPDES programs established effluent limits for specific CSO outfalls. If the CSO outfall is subject to effluent limits (e.g., Number of Discharge Events, Discharge Volume), then the authorized NPDES program can determine noncompliance by comparing monitoring data reported on the DMR to the effluent limit. Alternatively, the permit may prescribe narrative requirements such as "This permit does not authorize a discharge from a CSO outfall that causes adverse impacts that threaten characteristic uses of the receiving water as identified by the water quality standards." The DMR includes instructions for how to report noncompliance, "Where violations of permit requirements are reported, attach a brief explanation to describe cause and corrective actions taken, and reference each violation by date." As shown below in Figure 1, the DMR also provides a box for filers to provide non-standardized information regarding any noncompliance with the permit.



**Figure 1:** Bottom Portion of DMR (Yellow-Highlight added for emphasis) See: https://www3.epa.gov/npdes/pubs/dmr.pdf

The final rule did not change the method or procedures for determining the outfalls that should be subject to monitoring and reporting on the DMR. EPA's NPDES reporting requirements specify that all permits should specify the, "[r]equired monitoring including type, intervals, and frequency sufficient to yield data which are representative of the monitored activity including, when appropriate, continuous monitoring." See 40 CFR 122.48. This means that the permit will determine the outfalls that require reporting on the DMR, what data must be reported, and the required frequency. NPDES permits may also allow the permittee to use modelling or best professional judgment to estimate the volume of CSO discharges. EPA's national NPDES data system (ICIS-NPDES) has the capability for distinguishing these data based on estimations and other data based on actual monitoring.

EPA's national NPDES data system (ICIS-NPDES) has the capability to aggregate reported results across more than one outfall. For example, if a TWTDS has three outfalls that discharge to a river, the monitoring data for these three outfalls can be aggregated and reported as one "Sum" outfall. Use of

<sup>&</sup>lt;sup>8</sup> Taken from NPDES boiler plate requirements for CSO discharges in Washington State (Example at WA0029181 - <a href="https://fortress.wa.gov/ecy/wqreports/public/WQPERMITS.document\_pkg.download\_document?p\_document\_id=135861">https://fortress.wa.gov/ecy/wqreports/public/WQPERMITS.document\_pkg.download\_document?p\_document\_id=135861</a>)

<sup>&</sup>lt;sup>9</sup> The final rule modified 40 CFR 122.48 to include, "All results must be electronically reported in compliance with 40 CFR part 3 (including, in all cases, subpart D to part 3), §122.22, and 40 CFR part 127."

this feature may be helpful if the permitting authority wishes to know aggregate information about reported CSOs but does not need to know about specific information about individual outfalls.

Note that authorized NPDES programs can require the permittee to report specific pollutant information related to CSOs on their DMRs. This may include specific pollutant (e.g., BOD, TSS, fecal coliform) or bulk parameters (e.g., amount of solids/floatables recovered, rainfall precipitation). The authorized NPDES program may require this information on the DMR to determine the efficacy of the LTCP.

DMRs can require reporting data on wet-weather CSO discharges. When a permit requires a permittee to use a DMR to report on both compliant and non-compliant wet-weather CSO discharges, it is important that the permit should require each submission includes data that can distinguish between wet-weather CSO discharges that are compliant with permit requirements against wet-weather CSO discharges that are not compliant with permit requirements. This paper recommends the usage of the forthcoming parameter, "Type of Potential Impact of Sewer Overflow/Bypass," which will be used to distinguish between compliant and non-compliant wet-weather CSO discharges. This is important so that EPA and authorized NPDES programs are able to conduct proper and effective oversight of discharges that are not compliant with permit requirements. EPA will provide outreach and training to authorized NPDES programs on how to incorporate this new parameter into permit reporting requirements for DMR submissions.

Finally, EPA recognizes that some permits currently include additional sewer overflow and bypass reporting in the form of monthly, quarterly, or annual reports. While these reports are not required to be submitted electronically as part of the final rule implementation, EPA will continue to work with authorized NPDES programs to periodically evaluate whether the "Sewer Overflow/Bypass Event Report" or the DMR form should be enhanced to accommodate electronic reporting of these data.

#### Sewer Overflow/Bypass Event Report

The final rule modified EPA's NPDES requirements for noncompliance reporting [see 40 CFR 122.41(I)(6) and (7)] and bypass reporting [see 40 CFR 122.41(m)]. In particular, the final rule requires authorized NPDES programs to issue NPDES permits so that they require these submissions to be electronic and compliant with 40 CFR 127 (NPDES Electronic Reporting). The final rule identified the "Sewer Overflow/Bypass Event Report," which is NPDES Data Group No. 9 (see Table 1, Appendix A to 40 CFR 127), and the DMR (for non-compliant wet weather CSOs that do not endanger health or the environment), which is NPDES Data Group No. 3, for this reporting. As noted in the preamble to Appendix A to 40 CFR 127, one goal of the final rule is to ensure that "there is consistent and complete reporting nationwide, and expeditious collection and processing of the data, thereby making it more accurate and timely." The data elements supporting noncompliant sewer overflow and bypass reporting are listed in Attachment 1. A mock-up of the "Sewer Overflow/Bypass Event Report" is provided in Attachment 2. The "Sewer Overflow/Bypass Event Report" will be used for the following:

anticipated and unanticipated bypasses;

-1/

<sup>&</sup>lt;sup>10</sup> For example, the final rule inserted following text into 40 CFR 122.41(I)(6): "As of December 21, 2020 all reports related to combined sewer overflows, sanitary sewer overflows, or bypass events submitted in compliance with this section must be submitted electronically by the permittee to the Director or initial recipient, as defined in 40 CFR 127.2(b), in compliance with this section and 40 CFR part 3 (including, in all cases, subpart D to part 3), §122.22, and 40 CFR part 127." [emphasis added]

- wet-weather CSOs that "endanger health or the environment;"
- dry-weather discharges from combined sewer systems (see CSO Control Policy at 19 April 1994;
   59 FR 18689);
- sanitary sewer overflows (SSOs) that discharge to waters of the United States; and
- SSOs that are not in compliance with the standard NPDES permit requirements in 40 CFR 122.41.

The authorized NPDES program can also require the permittee to use the "Sewer Overflow/Bypass Event Report" to provide information on wet-weather CSO discharges that are not compliant with permit requirements but do not "endanger health or the environment."

It is important to note that the final rule does not require reports for wet-weather CSO discharges that are compliant with permit requirements. However, a permit may require the permittee to provide information on these discharges on the "Sewer Overflow/Bypass Event Report" or on some other report (e.g., DMR). Authorized NPDES programs can also elect to use DMRs to report approved anticipated CSO-related bypass events.

#### Noncompliant Sewer Overflow Reporting on the DMR

With respect to sewer overflows, as described above, authorized NPDES programs will require permittees to use the "Sewer Overflow/Bypass Event Report" for wet-weather CSOs that "endanger health or the environment," dry-weather CSOs, and SSOs. Under 40 CFR 122.41(I)(7), authorized NPDES programs have the option to require permittees to use the DMR to report information on wet-weather CSO discharges that are not compliant with permit requirements but do not "endanger health or the environment;" however, the final rule standardized this noncompliance reporting, as described below.

The final rule modified the NPDES regulation governing the DMR with the following addition, "As of December 21, 2016 all reports and forms submitted in compliance with this section must be submitted electronically by the permittee to the Director or initial recipient, as defined in 40 CFR 127.2(b), in compliance with this section and 40 CFR part 3 (including, in all cases, subpart D to part 3), §122.22, and 40 CFR part 127." The reference to Part 127 includes the requirement for authorized NPDES programs to electronically collect and share the "minimum set of NPDES data" (see Appendix A to 40 CFR 127). In particular, the final rule standardized this noncompliance reporting on DMRs by requiring the inclusion of the following three parameters on the DMR: (1) Duration of Discharge; (2) Overflow Volume; and (3) Type of Potential Impact of Sewer Overflow/Bypass. These three parameters are included in Appendix A to 40 CFR 127 for inclusion on the DMR (NPDES Data Group No. 3) and the "Sewer Overflow/Bypass Event Report" (NPDES Data Group No. 9).

Attachment 3 gives an example of how to incorporate the three required data elements from the final rule into DMRs for wet-weather CSO discharges. The following considerations are important to note when considering the use of the DMR for wet-weather CSO monitoring.

EPA encourages authorized NPDES programs to incorporate the above three parameters into NPDES permit DMR reporting requirements for wet-weather CSOs that are not compliant with permit requirements but do not "endanger health or the environment" over the next several years. This will be part of Phase 2 implementation of the final rule. EPA's Office of Compliance will work collaboratively with the Office of Wastewater Management, EPA Regions, and authorized NPDES programs during this implementation. EPA will also use the newly published "NPDES Electronic Reporting Readiness and Data

Completeness Dashboard" to identify strengths and weaknesses in incorporating DMR electronic reporting requirements for wet-weather CSO monitoring.

The following table summarizes the various scenarios for sewer overflow and bypass reporting.

Table 1: Implementation Options for Noncompliant Sewer Overflow Reporting and Bypass Reporting

Table 1: Implementation Options for Noncompliant Sewer Overflow Reporting and Bypass Reporting					
			Electronic Reporting Form Options for		
			Authorized NPDES I	•	
Description	Reporting	Regulatory	in NPDES	Permits	
Description	Frequency	Citation	Discharge	Sewer	
			Monitoring	Overflow/Bypass	
			Report	Event Report	
Wet-weather CSOs that are authorized by permit requirements	As required by permit	40 CFR 122.41(I)(4)	Yes (data collection <u>not</u> standardized by final rule)	Yes (data collection <u>not</u> standardized by final rule)	
Sewer overflows and bypasses that may "endanger health or the environment"	Within 5-days of the time the permittee becomes aware of the overflow	40 CFR 122.41(I)(6)	No	Yes (data collection standardized by final rule)	
Wet-weather CSOs that are not compliant with permit requirements but do not "endanger health or the environment"	Same Frequency as Other Required Reporting (e.g., DMRs)	40 CFR 122.41(I)(7)	Yes (data collection standardized by final rule)	Yes (data collection standardized by final rule)	
Dry-weather CSOs, SSOs, and bypasses that are not compliant with permit requirements but do not "endanger health or the environment"	Same Frequency as Other Required Reporting (e.g., DMRs)	40 CFR 122.41(I)(7)	No	<b>Yes</b> (data collection standardized by final rule)	
Anticipated bypass events	At least 10-days before the date of the bypass	40 CFR 122.41(m)(3)(i)	No	Yes (data collection standardized by final rule)	
Unanticipated bypass events	Within 5-days of the time the permittee becomes aware of the bypass	40 CFR 122.41(m)(3)(ii)	No	Yes (data collection standardized by final rule)	
Approved Anticipated CSO- related bypass events	Frequency established in permit (e.g., DMRs)	40 CFR 122.41(I)(4) and 122.41 (m)(4)(ii)	Yes (data collection standardized by final rule)	Yes (data collection standardized by final rule)	

**Note:** In all scenarios, the permittee will follow the reporting requirements in their NPDES permit.

EPA also notes that all TWTDS have the potential to discharge sewer overflows and bypasses that may "endanger health or the environment." Accordingly, authorized NPDES programs should identify all permitted TWTDS with "G09" (Sewer Overflow/Bypass Event Report) for the "NPDES Data Group Number" data element. EPA previously requested that authorized NPDES programs share these "NPDES Data Group Number" data with ICIS-NPDES by 1 September 2017. 11

#### 3. POTW-Specific Data Elements

The final rule includes POTW-specific data elements in Appendix A. The source of these data elements are shown in Table 2.

**Table 2:** Source of POTW-specific Data Elements

NPDES Data Group	NPDES Data Group Description	Regulatory Citation	Permit Application Process	Electronic Data Generator
1	Core NPDES Permitting, Compliance, and Enforcement Data	40 CFR parts 122, 123, 403, 503	Individual permit application: NPDES Form 2A, permitting process	Authorized NPDES Program
2a	General Permit Report	40 CFR 122.28	Notice of Intent to discharge (NOI)	NPDES Permittee

The POTW-specific data elements are collected through: (1) individual NPDES permit applications (NPDES Form 2A) and the individual permit writing process; and (2) Notice of Intent to discharge (NOI) for a POTW seeking coverage under a NPDES general permit. The final rule does not require POTWs to electronically submit individual NPDES permit applications; however, authorized NPDES programs may elect to require POTWs to electronically submit individual NPDES permit applications. The final rule requires NOIs to be electronically submitted starting no later than 21 December 2020 (Phase 2 implementation). A detailed description of these data elements is provided in Attachment 4.

The following data elements apply to each unique collection system that provides flow to the permittee (i.e., if a POTW collects sewage from multiple collection systems, these data would be filled out multiple times). This includes unincorporated connector districts and satellite collection systems, which are sanitary sewers owned or operated by another entity that conveys sewage or industrial wastewater to the permit applicant.

- Name of Collection System
- Owner Type of Collection System
- Collection System Identifier
- Population of Collection System
- Percentage of Collection System That Is a Combined Sewer System

<sup>&</sup>lt;sup>11</sup> U.S. EPA, 2017. "Implementation Technical Paper No. 3: Implementation Technical Paper No. 3: Data Elements for Tracking Electronic Reporting Progress and Other Phase 1 Data Elements," John Dombrowski, Director, Enforcement Targeting and Data Division, Office of Compliance, to EPA Regional and Authorized State NPDES Permit and Enforcement Coordinators and State Information Technology Staff.

The following five data elements are only completed once for each POTW, regardless of the number of collection systems.

- Permit Application Total Design Flow
- Permit Application Total Actual Average Flow
- POTW Wastewater Treatment Technology Level Description
- POTW Wastewater Disinfection Technology
- POTW Wastewater Treatment Technology Unit Operations

Attachment 5 is a mockup of how EPA might collect these POTW-specific data elements.

#### 4. LTCP and CSO Control Data Elements

All Phase II and post-Phase II combined sewer system NPDES permittees are required to complete and implement a long-term CSO control plan (LTCP) as described in EPA's Combined Sewer Overflow (CSO) Control Policy (19 April 1994; 59 Federal Register 18688-18698). The final rule data elements related to LTCPs and other CSO controls are listed in Appendix A and below:

- Long-Term CSO Control Plan Permit Requirements and Compliance
- Nine Minimum CSO Controls Developed
- Nine Minimum CSO Controls Implemented
- LTCP Submission and Approval Type
- LTCP Approval Date
- Enforceable Mechanism and Schedule to Complete LTCP and CSO Controls
- Actual Date Completed LTCP and CSO Controls
- Approved Post-Construction Compliance Monitoring Program
- Other CSO Control Measures with Compliance Schedule

These data will be updated by the authorized NPDES program on a timely basis as changes occur with the combined sewer system and the LTCP, as well as with the POTW's implementation and compliance with the LTCP.

A detailed description of these data elements is provided in Attachment 6. A mock-up of how these POTW-specific data elements might be collected is provided in Attachment 7.

#### 5. Sewer Overflow Inspection Data Element

EPA's regulations require authorized NPDES programs to have "inspection and surveillance procedures to determine, independent of information supplied by regulated persons, compliance or noncompliance with applicable program requirements." See 40 CFR 123.26(b). EPA's NPDES Compliance Monitoring Strategy (CMS) also provides compliance monitoring goals for authorized NPDES programs. <sup>12</sup> This means that authorized NPDES programs must inspect POTWs and other TWTDS on a regular basis.

<sup>&</sup>lt;sup>12</sup> U.S. EPA, 2014. Issuance of Clean Water Act National Pollutant Discharge Elimination System Compliance Monitoring Strategy, Memorandum from Lisa Lund, Director, Office of Compliance, July 21. See https://www.epa.gov/compliance/clean-water-act-national-pollutant-discharge-elimination-system-compliance-monitoring.

The final rule includes the following data element to track each deficiency in the control of combined sewer overflows, sanitary sewer overflows, or bypass events for each compliance monitoring activity (e.g., inspections, audits) by the regulatory authority.

Data Name: Deficiencies Identified Through the Sewer Overflow/Bypass Compliance Monitoring

**Data Description:** This is the unique code/description that identifies each deficiency in the TWTDS's control of combined sewer overflows, sanitary sewer overflows, or bypass events for each compliance monitoring activity (e.g., inspections, audits) by the regulatory authority. This data element includes unique codes to identify when a TWTDS has failed to provide 24-hour notification to the NPDES permitting authority or failed to submit the Sewer Overflow/Bypass Event Report within the required 5-day period. This data element also includes unique codes to identify when the POTW failed to comply with any applicable long-term CSO control plan, permit requirements, or enforcement actions. The values for data element will distinguish between noncompliance and significant noncompliance (SNC).

**CWA, Regulatory (40 CFR), or Other Citation:** 122.41(h), 122.41(l)(6) and (7), 122.43, 123.26, 123.41(a), and CWA sections 308 and 402(q)(1)

NPDES Data Group Number: 1

A mock-up of how EPA might collect this data element is provided in Attachment 8.

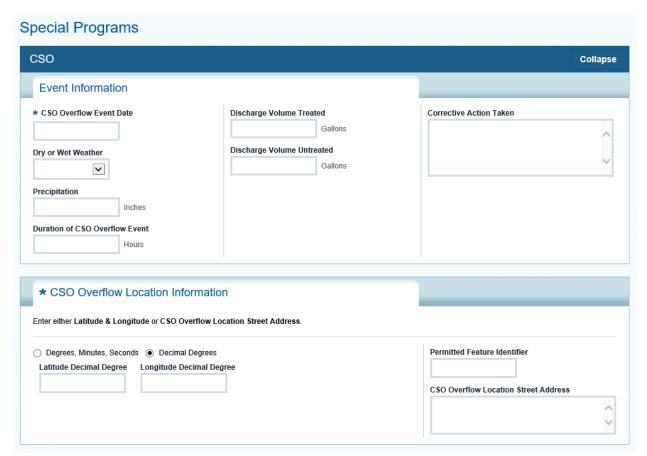
Law Sections

(CSO)

Members of the workgroup also recommended removing the ICIS-NPDES business rule that requires overflow data be shared when the inspection relates to sewer overflows. For example, when the "308[A][B]: Records and Reports; Inspections: NPDES - Combined Sewer Overflows (CSO)" checkbox is checked, the current ICIS-NPDES application requires information on a CSO discharge. See figure below.

# 3 selected Check all × Uncheck all CWA: 308[A][B]: Records and Reports; Inspections: NPDES - Concentrated Animal Feeding Operations (CAFOs) CWA: 308[A][B]: Records and Reports; Inspections: NPDES - Combined Sewer Overflows

"Law Section" in the ICIS-NPDES Application (Inspection/Evaluation Data Entry)



CSO Inspection Data Entry Fields in Current ICIS-NPDES Application (Inspection/Evaluation Data Entry)
[the symbol (\*) indicates a required data entry field]

Removing this business rule will allow an inspector to record that they did an inspection related to sewer overflows (CSO, SSO, Bypass events) but did not find any sewer overflows or other related violations.

Members of the workgroup also recommended that the following new reference values be added to the "Compliance Monitoring Type Compliance" data element: Sewer Overflow Event Inspection (SSO), Sewer Overflow Event Inspection (CSO), Sewer Overflow Event Inspection (Bypass), Sanitary Sewer System Inspection, and Combined Sewer System Inspection.

Finally, members of the workgroup also recommended revising the ICIS-NPDES violation codes to better align them to NPDES electronic reporting. These new violation codes are provided in Attachment 9.

#### 6. Linkages to Authorized NPDES Programs Compliance Monitoring and Enforcement Actions

The data elements in this paper will be linkable to compliance monitoring activities (e.g., inspections) and enforcement actions. This will help distinguish between resolved and unresolved violations found through authorized NPDES programs compliance monitoring activities (e.g., inspections) or compliance monitoring reports from permittees (e.g., DMRs, Sewer Overflow/Bypass Event Reports). These linkages will also identify if the authorized NPDES program has taken an enforcement action for any given violation.

**ACTION:** EPA will update its national NPDES data system (ICIS-NPDES) so that POTWs and other TWTDS can be linked to the data elements in this paper as well as with other information (e.g., inspections, enforcement actions). EPA requests the 46 states that are authorized for the NPDES program to likewise update their data systems. This will help create a more complete picture of state enforcement and compliance monitoring for the sewer overflows and bypasses.

#### Attachment 1: Data Elements for Sewer Overflow and Bypass Event Reporting (Appendix A to 40 CFR 127)

#### **Compliance Monitoring Activity Information (Data Elements Specific to Sewer Overflow/Bypass Event Reports)**

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Sewer Overflow/Bypass Identifier	This data element will allow the reporting of multiple sewer overflows or bypasses on one report. Each individualized sewer overflow or bypass will be given a unique identifier (e.g., 1, 2, 3, and so on) for each Sewer Overflow/Bypass Event Report. This field can be system generated to accommodate one or more individual sewer overflows or bypasses. If the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system, the POTW or other TWTDS can use this data element to indicate that the number of sewer overflows cannot be tabulated as they are too numerous to count.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9
Sewer Overflow Longitude for Unpermitted Feature (Sewer Overflow/Bypass Event Report)	This data element is required for each Sewer Overflow/Bypass Identifier without a corresponding identifier in the 'Permitted Feature Identifier (Permit)' data element, which is reported on the NPDES permit application or Notice of Intent for NPDES permit coverage. This data element is the measure of the angular distance on a meridian east or west of the prime meridian for the sewer overflow location. The format for this data element is decimal degrees (e.g., -77.029289) and the WGS84 standard coordinate system. The 'Permitted Feature Identifier (Compliance Monitoring Activity)' data element is used to identify the location of each sewer overflow at a permitted feature. If the sewer overflow is associated with a private residence the longitude of the nearest collection system structure (e.g., manhole) can be used for this data element to the extent that reporting is required. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count. This data element can also be system generated if the Sewer Overflow/Bypass Event Report collects the street location of the sewer overflow and the street location can be used to generate an accurate longitude value. (Note: "Post Office Box" addresses and "Rural Route" addresses are generally not geocodable).	122.41(I)(4), (6), and (7)	3, 9

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Sewer Overflow Latitude for Unpermitted Feature (Sewer Overflow/Bypass Event Report)	This data element is required for each Sewer Overflow/Bypass Identifier without a corresponding identifier in the 'Permitted Feature Identifier (Permit)' data element, which is reported on the NPDES permit application or Notice of Intent for NPDES permit coverage. This data element is the measure of the angular distance on a meridian north or south of the equator for the sewer overflow location. The format for this data element is decimal degrees (e.g., -77.029289) and the WGS84 standard coordinate system. The Permitted Feature Identifier (Compliance Monitoring Activity) data element is used to identify the location of each sewer overflow at a permitted feature. If the sewer overflow is associated with a private residence, the latitude of the nearest collection system structure (e.g., manhole) can be used for this data element to the extent that reporting is required. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count. This data element can also be system generated if the Sewer Overflow/Bypass Event Report collects the street location of the sewer overflow and the street location can be used to generate an accurate longitude value. (Note: "Post Office Box" addresses and "Rural Route" addresses are generally not geocodable).	122.41(l)(4), (6), and (7)	3, 9
Type of Sewer Overflow/Bypass (Sewer Overflow/Bypass Event Report)	A unique code/description that identifies the type of sewer overflow or bypass (e.g., CSO or SSO from the POTW's or other TWTDS's collection system, anticipated bypass from the treatment works, unanticipated bypass from the treatment works) for each Sewer Overflow/Bypass Identifier. For bypass events, the permittee will also use this data element to identify if any NPDES effluent limitations were violated as a result of the bypass.	122.41(I)(4), (6), and (7) and 122.41(m)(3)	3, 9

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Type of Sewer Overflow/Bypass Structure	A unique code/description that identifies the type of sewer overflow or bypass structure (e.g., manhole, CSO outfall) for each Sewer Overflow/Bypass Identifier. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9
Sewer Overflow/Bypass Cause	The one or more unique codes/descriptions that best represent the likely cause of the sewer overflow or bypass (e.g., broken pipe, fats/oil/grease, mechanical failure, pump station electrical failure, wet weather, vandalism) for each Sewer Overflow/Bypass Identifier.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9
Duration of Sewer Overflow/Bypass (hours) (Sewer Overflow/Bypass Event Report)	Estimated duration of the sewer overflow or bypass (in hours) for each Sewer Overflow/Bypass Identifier. If the discharge has not been corrected, this is the best professional judgment from the sewer owner or in the case of a bypass, the treatment plant owner, of the time the sewer overflow or bypass is expected to continue. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9
Sewer Overflow/Bypass Discharge Volume (gallons) (Sewer Overflow/Bypass Event Report)	Best professional judgment from the sewer owner on the estimated number of gallons of sewer overflow or bypass for each Sewer Overflow/Bypass Identifier. If the discharge has not been corrected, this is the best professional judgment from the sewer owner or in the case of a bypass, the treatment plant owner, of the volume of overflow or bypass prior to cessation. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Receiving Waterbody Name for Unpermitted Feature (Sewer Overflow/Bypass Event Report)	This data element identifies the receiving waterbody name for each Sewer Overflow/Bypass Identifier that does not have a corresponding value in the 'Permitted Feature Identifier (Permit)' data element. This data element will use the best professional judgment of the sewer owner to identify the name of the waterbody that is or will likely receive the discharge from each Sewer Overflow/Bypass Identifier. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count.	122.41(I)(4), (6), and (7)	3, 9
Wet Weather Occurrence for Sewer Overflow/Bypass Status	The unique code (e.g., "Yes", "No") that represents the best professional judgment of the sewer owner, or in the case of a bypass, the treatment plant owner, regarding whether the sewer overflow or bypass, by Sewer Overflow/Bypass Identifier, occurred during wet weather.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9
Corrective Actions Taken or Planned for Sewer Overflow/Bypass (Sewer Overflow/Bypass Event Report)	The unique code/description that describes the steps taken or planned to reduce, eliminate, and prevent reoccurrence of future sewer overflows or bypasses for each Sewer Overflow/Bypass Identifier and the related impacts to health or the environment. This data element can be used to identify the portion of the sewer overflow or bypass that was contained and recovered prior to any discharge to waters of the U.S. This data element will also identify if any monitoring of the receiving waterbody was done during and/or after the sewer overflow or bypass to gauge the potential impact to health or the environment. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Type of Potential Impact of Sewer Overflow/Bypass (Sewer Overflow/Bypass Event Report)	The unique code/description that describes the type of potential health or environmental impact(s) (e.g., beach closure) for each Sewer Overflow/Bypass Identifier. Under 40 CFR 122.41(I)(6), "the permittee shall report any noncompliance which may endanger health or the environment." This data element provides information regarding the nature of such potential endangerment. The POTW or other TWTDS can leave this data element blank on the Sewer Overflow/Bypass Event Report if the sewer overflows are caused by an extreme weather event (e.g., hurricane) that floods the entire sewer system and are too numerous to count.	122.41(l)(4), (6), and (7) and 122.41(m)(3)	3, 9

#### Attachment 2: Mockup of Sewer Overflow/Bypass Event Report

<Note: The purpose of this mock-up is intended to help EPA and authorized NPDES programs review different options for collecting these data. The final version of this data entry form will collect the same data but will likely be different. With two exceptions, all of these data collected in this form are included in Appendix A to 40 CFR 127. Members of the workgroup recommended the inclusion of two optional data elements: "Type of Treatment at Outfall" and "Method for Quantifying Discharge" as these data are often included in NPDES permit reporting requirements and will be useful for state oversight. Members of the workgroup also noted that state and/or EPA NPDES data systems can be configured to send emails or other notifications to alert state and/or EPA staff of these submissions.>

**INSTRUCTIONS:** EPA's reporting regulations require permittees to electronically submit a report after a bypass or noncompliant sewer overflow event [see 40 CFR 122.41(I)(4), (6), (7), and (m)]. These electronic reporting requirements apply to all treatment works treating domestic sewage (TWTDS), which includes Federally owned TWTDS and privately owned TWTDS (e.g., camps, mobile home parks). Please also note that your permitting authority and/or EPA may contact you after you submit this report for more information.

#### 1. Identification of Treatment Works Treating Domestic Sewage (TWTDS) and Reporting Period

Please select the NPDES ID number below for this Sewer Overflow/Bypass Event Report:

<The user selects the NPDES ID from a picklist, which is pre-populated as they enter username and password into EPA's CDX. Once the user selects a NPDES ID and clicks on the "Load Facility Data" button, the following example uneditable information is shown to the user.>

**NPDES ID:** RI1100030

Facility Name: OCEAN STATE POTW
Street: 1 CROMPTON AVENUE
City: EAST GREENWICH

State: RI Zip Code: 02818 Please select the start and end date for this Sewer Overflow/Bypass Event Report.

Reporting Period Start Date *	•	Reporting Period End Date *
02/26/2018		02/28/2018

<Note: The "Start Date of Reporting Period" is the approximate start of sewer overflows/bypasses. The "End Date of Reporting Period" is the end or projected end of sewer overflows/bypasses that are included in this report. The permittee should use the permit reporting requirements and the permittee's best professional judgment for these two dates. For example, noncompliant sewer overflows and bypasses that may endanger human health or the environment must be reported "within 5 days of the time the permittee becomes aware of the circumstances."</p>
See 40 CFR 122.41(I)(6). The Sewer Overflow/Bypass Event Report allows permittees to provide information on multiple sewer overflows. For example, this form can be used to report multiple sewer overflows for a single wet-weather event. For example, permittees can the Sewer Overflow/Bypass Event Report to provide information on submit notice of multiple sewer overflows that do not "endanger human health or the environment" on a schedule set forth in the applicable permit. See 40 CFR 122.41(I)(7).>

<Note: The Sewer Overflow/Bypass Event Report will also automatically generate the following Appendix A data, which are used to properly manage these submissions. This means that these data do not need to be entered by the filer: (1) NPDES Data Group Number (Program Report) [which is equal to "9" for this report]; (2) Electronic Submission Type (Compliance Monitoring Activity); (3) Program Report Event ID; and (4) Program Report Received Date.>

<Note: This form will allow co-permittees (e.g., satellite collection systems) to report sewer overflows. Satellite collection systems that are copermittees should use the NPDES ID assigned to them by their permitting authority and the "Collection System ID" corresponding to the sewer system that they own or operate. The combination of "NPDES ID," "Collection System ID," and "Permitted Feature ID" creates a unique key for each sewer overflow or bypass associated with a permitted feature. When a permittee or co-permittee is reporting information on one or more sewer overflows or bypasses that are not associated with a permitted feature (i.e., filer is using latitude and longitude to identify the location of the sewer overflow or bypass), the filer should only use this form to provide information on sewer overflows or bypasses associated with the one or more collection systems that they own or operate.>

# 2. Sewer Overflow/Bypass Outfall Information

No

overflows cannot be tabulated as they are too numerous to count?
Yes
If yes, please identify the type of sewer overflows (check all that apply):
Wet-weather CSO discharges to waters of the U.S. Wet-weather SSO discharges to waters of the U.S. Unanticipated Bypasses to waters of the U.S.

For each individual sewer overflow or bypass please identify the associated permitted feature(s) (if any) **OR** the latitude and longitude if not associated with a permitted feature.

_	Approx.	Sewer Overflow/Bypass Reporting Requirement		Identify Permitted Feature ID <mark>OR</mark> Lat/Lon		
Sewer Overflow/Bypass Unique Identifier <system generated=""></system>	Start time and date of Sewer Overflow/ Bypass	(e.g., 1 = 5-day reporting for noncompliance that may endanger health or the environment; 2 = Other noncompliance reporting; 3 = 10-day anticipated bypass reporting; 4 = reporting requirement not related to noncompliance reporting).	Collection System ID	Permitted Feature ID	Overflow, Associ Permitt	ewer /Bypass <mark>NOT</mark> ated with ed Feature
					Latitude	Longitude
1						
2						
3						

[Note: The above table will allow users to report on more than one sewer overflow or bypass with one Sewer Overflow/Bypass Event Report. For example, large storms can produce multiple sewer overflows. Permittees can report these multiple overflows and bypasses on one report if they occur over the same approximate date range (e.g., during one storm event). The 'Sewer Overflow/Bypass Unique Identifier' will be system generated and will be used throughout this report. Users do not need to report the latitude and longitude of the individual sewer overflow if it is associated with a permitted feature (as that information should already be in EPA's ICIS-NDPES). The "Collection System ID" will be used to first identify the collection system associated with the sewer overflow or bypass. This will help narrow down the list of permitted features (if there is more than one collection system). If there is only one collection system, then the "Collection System ID" can be pre-populated on the form to reduce data entry burden. The use of the "Collection System ID" will also help clarify the location of the sewer overflow or bypass as the combination of "NPDES ID," "Collection System ID," and "Permitted Feature ID" creates a unique key for each permitted feature. If the sewer overflow is associated with a private residence the longitude of the nearest collection system structure (e.g., manhole) can be used for this data element to the extent that reporting is required.]

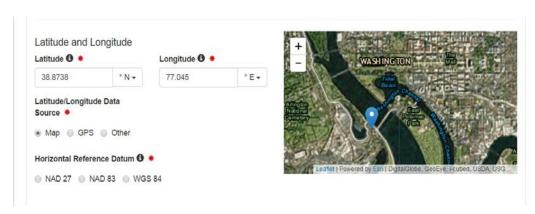
[Note: In addition to the above table, the user will likely have the ability to pan and zoom on a map or input a street address to identify the location of each sewer overflow/bypass for each event report. This feature will automatically identify the latitude and longitude metadata (e.g., Horizontal Reference Datum).]

Please use the map tool below or the nearest street address to identify the location of each sewer overflow/bypass for this report.

Please identify the nearest street address of each sewer overflows/bypasses NOT associated with a permitted feature.

Street Address				
City				
State	Zip Code			

Please use this map to identify the latitude and longitude of each sewer overflows/bypasses NOT associated with a permitted feature.



#### 3. Sewer Overflow/Bypass Information

Please provide the following information for each Sewer Overflow/Bypass Unique Identifier.

Sewer Overflow/	Sewer Overflow/ Bypass	Type of Treatment at Outfall (include all that apply)	Type of Sewer Overflow/ Bypass Structure	Ouration of Sewer ( <states 'ap="" 'end="" 'sewer="" and="" by<="" can="" date'="" each="" of="" overflow="" period'="" permitte="" reporting="" require="" th="" time=""><th>ees report the 'Start Time d Date' <b>OR</b> the 'Start Date prox. Duration (hours)' for</th><th></th><th>•</th><th>Select To Sew Overflow, by Wea</th><th>Receiving</th></states>	ees report the 'Start Time d Date' <b>OR</b> the 'Start Date prox. Duration (hours)' for		•	Select To Sew Overflow, by Wea	Receiving					
Bypass Unique Identifier <system generated=""></system>	Category (SSO, CSO, Allowable Bypass, Prohibited Bypass)	(e.g., none, screening, primary treatment, disinfection, dechlorination, other)	O, screening, primary treatment, disinfection, dechlorination,	(e.g., manhole, broken pipe, pumping station, CSO outfall, bypass outfall, basement backup, other outfall)	broken pipe, pumping station, cSO outfall, bypass outfall, tion, basement backup,	screening, primary pumping station, treatment, disinfection, dechlorination, bypass outfall, basement backup,	Approx. End time and date of Sewer Overflow/ Bypass	Approx. Duration of Sewer Overflow/ Bypass (hours) *	Sewer Overflow/ Bypass Discharge Volume (gallons) * [Note: Please provide your best estimate.]	Sewer Overflow/ Bypass Discharge Rate (gallons per hour) *	Method for Quantifying Discharge (e.g., direct measurement, modeling, best professional judgement)	Dry	Wet	Waterbody Name for Unpermitted Feature
1														
2														
3														

#### Notes:

- Members of the workgroup recommended the inclusion of two optional data elements: "Type of Treatment at Outfall" and "Method for Quantifying Discharge" as these data are often included in NPDES permit reporting requirements and will be useful for state oversight.
- EPA may use a web service for the 'Receiving Waterbody Name' data element to help standardize waterbody names. This form will allow the filer to use one or more codes when the overflow did not discharge into waters of the U.S. (e.g., discharge on ground/soil, discharge in building, discharge on road or other impervious surface).
- Permittees will report the 'Start Time and Date' and 'End Time and Date' or the 'Start Date of Reporting Period' and 'Approx. Duration (hours)' for each 'Sewer Overflow/Bypass Unique Identifier.' The authorized NPDES program will identify the method that the permittee will use.
- Columns marked with (\*) means that the user will round to nearest whole number (if .5 or above, round up, if below .5, round down).
- The "Sewer Overflow/Bypass Reporting Requirement" and the "Sewer Overflow/Bypass Category" fields on this form are used to define the "Type of Sewer Overflow/Bypass" data element.
- For purposes of reporting, 'Allowable Bypasses' are discharges of sewage or sewage mixtures (e.g., sewage and stormwater) that are unavoidable with no feasible alternatives and the permittee completes the reporting requirements [permittee submits notice to permitting authority 10 days prior to anticipated bypass, permittee submits notice to permitting authority within 5 days from when the permittee becomes aware of the unanticipated bypass]. The permitting authority will review this submission and may approve an anticipated bypass, after considering its adverse effects. See 40 CFR 122.41(m). All other bypasses of sewage or sewage mixtures are 'Prohibited Bypasses.' The authorized NPDES program will review Sewer Overflow/Bypass Event Report, associated with anticipated bypasses, to determine if these events should be allowed or if the permittee should not perform the bypass. Authorized NPDES programs will share the data associated with these determinations with EPA's national NPDES data system (ICIS-NPDES). This will allow ICIS-NPDES to identify the bypass as an "Allowable Bypass" or "Prohibited Bypass" based on the authorized NPDES program's determination as well as whether the permittee ultimately conducted the bypass.

# 4. Known or Likely Cause of Sewer Overflow/Bypasses

Please indicate the known or likely cause(s) of the sewer overflow or bypass. Select at least one cause for each 'Sewer Overflow/Bypass Unique Identifier.' Check all that apply.

Course Collection Contain Ducklama	Se	Sewer Overflow/Bypass Unique Identifier					
Sewer Collection System Problems	1	2	3	•••			
Mechanical Failure							
Fats/Oil/Grease							
Pump Station Electrical Failure							
Pump Station Capacity							
Inadequate Sewer System Capacity							
Tree Roots							
Rags/wipes							
Debris							
High Levels of Inflow and/or Infiltration							
Broken Pipe (due to unforeseen circumstances)							
Broken Pipe (caused by construction or maintenance activity)							
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>			
Plant Onevetion Duckland	Sewer Overflow/Bypass Unique Identifier						
Plant Operation Problems	1	2	3	•••			
Blockage at TWTDS Operations							
Inadequate TWTDS Capacity Due to TWTDS Operating at Design Capacity							
Inadequate TWTDS Capacity Due to Stormwater Event							
Flooding of TWTDS Due to Hurricane or Large Stormwater Event							
Flooding of TWTDS Due to Snowmelt							
TWTDS Electrical Failure							
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>			

# 5. Corrective Actions Taken or Planned for Sewer Overflow/Bypasses

Please indicate the corrective action(s) taken or planned for this sewer overflow or bypass. Select at least one corrective action for each 'Sewer Overflow/Bypass Unique Identifier.' Check all that apply.

Short Term Response Actions	Sewer Overflow/Bypass Unique Identifier					
e.g. Actions which prevent sewage from reaching water of the state	1	2	3	•••		
Fix electrical problem						
Street sweeping and cleaning, disinfection						
Sewer flushing, rodding, blockage/debris removal						
Fix broken pipe						
Catch basin cleaning, disinfection						
Fix mechanical problem						
Limit access						
Post signs						
None available						
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>		
Long Term Corrective Actions	Sewer Overflow/Bypass Unique Identifier					
e.g. Actions which prevent reoccurrence of issues	1	2	3	•••		
Options Specific to CSOs	s and Bypasses					
Sewer separation						
Disinfection						
Upgrade WWTP capacity						
Swirl concentrators/vortex separators						
Primary sedimentation						
Outfall elimination						
Retention basins						
Storage tunnels and conduits						
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>		
Options Specific	to SSOs					
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>		

Options Available to All CSOs, SSO, and Bypasses						
Sewer rehabilitation						
Upgrade pump station capacity						
Public education program						
Increase routine cleaning frequency						
Increase routine inspection frequency						
Evaluate off-road easement maintenance program						
Pipe/manhole rehabilitation/repair						
Evaluate FOG control program						
Perform hydraulic capacity analysis						
Implement Inflow and Infiltration Control Program						
Pump station repair						
Pump station capacity evaluation						
Evaluation force main maintenance/testing procedures						
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>		

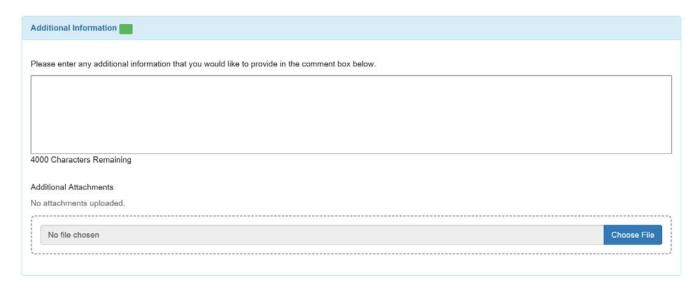
# 6. Known or Potential Impacts of Sewer Overflow/Bypasses

Please indicate the type of known or potential impacts of the reported sewer overflow/bypass event. Select at least one known or potential impact for each 'Sewer Overflow/Bypass Unique Identifier.' Check all that apply.

Consul largest	Sewer Overflow/Bypass Unique Identifier					
General Impact	1	2	3	•••		
Discharge to Waters of the U.S.						
Human Health Impacts of Sewer Overflow Event	Sc	ewer Overflow/By	pass Unique Ident	tifier		
numan nearth impacts of Sewer Overnow Event	1	2	3			
Beach closures						
Odors						
Shellfish bed closures						
Drinking water contamination						
Fishing and shell-fishing restrictions						
Sewage backup in building (caused by problem in sewer collection system, not private lateral)						
Sewage on land surface with potential human exposure (caused by problem in sewer collection system, not private lateral)						
No effects						
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>		
Facility and the latest of Court Court from the	Se	ewer Overflow/By	pass Unique Ident	tifier		
Environmental Impacts of Sewer Overflow Event	1	2	3	•••		
Aesthetic impairment						
Aquatic life impairment						
Fish kills						
Aquatic habitat impairment						
Eutrophication						
Algal blooms						
No effects						
Other (please specify):	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>	<insert text=""></insert>		

#### 7. Additional Information and Attachments

**INSTRUCTIONS:** Please enter any additional information in the comment box below (limit to 3,900 characters) that you would like to provide. Please select the button below to add any necessary attachments.



#### 8. Electronic Certification and Submission



**Attachment 3:** Standard DMR Mock-up for Reporting Wet-Weather CSO Discharges

		Qua	ntity or Loa	ading		Quality or Co	oncentration	1	Number of	Frequency	
Parameter		Q1	Q2	Units	C1	C2	С3	Units	Excursions	of Analysis	Sample Type
Duration of Discharge	Sample Measurement	*	*	*	*	<#>	*	HOURS	*		
(Parameter Code 50037)	Permit Requirement	*	*	·	*	REQ. MON.	*	HOUKS	*	<permit></permit>	ESTIMATED
Overflow Volume (Parameter Code	Sample Measurement	<#>	*		*	*	*		*		
51428, 51500, 51709, 51735, 52370, 74063, or 82220)	Permit Requirement	REQ. MON.	*	GALLONS	*	*	*	*	*	<permit></permit>	ESTIMATED
Type of Potential Impact of Sewer Overflow/Bypass	Sample Measurement	<code></code>	<code></code>		<code></code>	<code></code>	<code></code>		*		
(New Parameter Code to Be Established)	Permit Requirement	OPT. MON.	OPT. MON.	*	OPT. MON.	REQ. MON.	OPT. MON.	*	*	<permit></permit>	VISUAL
<other parameters<="" td=""><td>Sample Measurement</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></other>	Sample Measurement										
as Required by Permit>	Permit Requirement										

<Note: The top three data elements are included in Appendix A to 40 CFR 127.>

EPA's NPDES regulations require all NPDES permits to specify monitoring requirements, "including the type, intervals, and frequency sufficient to yield data which are representative of the monitored activity." See 40 CFR 122.48(b). EPA's NPDES regulations also state that "monitoring results shall be established on a case-by-case basis with a frequency dependent on the nature and effect of the discharge, but in no case less than once a year." See 40 CFR 122.44(i)(2). The final rule modified this requirement to include, "All results must be electronically reported in compliance with 40 CFR part 3 (including, in all cases, subpart D to part 3), §122.22, and 40 CFR part 127." The following are important notes for using the standard DMR form for reporting wet-weather CSO discharges that are not compliant with permit requirements but do not "endanger health or the environment." As noted in Section 2, use of these DMR parameters will help ensure nationally consistent reporting of wet-weather CSO discharges that are not compliant with permit requirements.

- DMR data are reported by permitted feature, meaning that NPDES permittees would be entering the information above for each permitted feature for which the NPDES permit requires this monitoring and reporting.
- The (\*) indicate fields that do not need to be completed.
- This DMR form would require at least one code for the 'Type of Potential Impact of Sewer Overflow/Bypass' parameter (see "REQ. MON."). DMR filers also have the option to report four additional codes for this parameter (see "OPT. MON."). This parameter will use the same codes as the codes used in the "Sewer Overflow/Bypass Event Report." EPA will work closely with states when it develops these reference values for the 'Type of Potential Impact of Sewer Overflow/Bypass' parameter. EPA will also provide training to states and permittees on how to use these codes so that there is national consistency in this reporting. EPA prefers this option to creating multiple parameter codes that can be answered with a yes or no (i.e., 1 or 0).
- The permitting authority can require other parameters to be monitored and reported on the DMR (e.g., BOD, Fecal Coliform, Total Suspended Solids, Percent Overflow Wastewater Discharged, Solids/Floatables Total Volume Removed and Disposed).
- The frequency of analysis would be specified in the permit. The permitted features that require monitoring and reporting would also be specified in the permit. The permit writer may also aggregate monitoring for multiple outfalls under a "Sum" outfall for DMR reporting.
- <u>Duration of Discharge</u> is reported in hours and can use the following parameter code: 50037. This is the duration of CSO discharges (in hours) at each CSO outfall over the entire month (or reporting period). This value can be estimated or measured by recording equipment. Permittees should round to nearest whole number (if .5 or above, round up, if below .5, round down). The permittee can use a No Data Indicator (NODI) code if there is no noncompliance at the permitted feature for the monitoring period.
- Overflow Volume is reported in millions of gallons and can use the following parameter codes: 51428, 51500, 51709, 51735, 52370, 74063, 82220. This is the total volume of CSO discharges (in millions of gallons) at each CSO outfall over the entire month (or reporting period). This value can be estimate or measure by recording equipment. Permittees should round to nearest whole number (if .5 or above, round up, if below .5, round down). The permittee can use a No Data Indicator (NODI) code if there is no noncompliance at the permitted feature for the monitoring period.
- Type of Potential Impact of Sewer Overflow/Bypass is the permittee's reporting of the potential impacts at each CSO outfall. For example, this may include codes for beach closures (BEA), odors (ODO), shellfish bed closures (SBC), and drinking water contamination (DWC). The permittee can include up to five different codes per outfall per monitoring period and separate each code with a comma. See Question 9, Attachment 2, for a full listing of these potential codes. The permittee can use a No Data Indicator (NODI) code if there is no noncompliance at the permitted feature for the monitoring period. If there are multiple events within one reporting period, the permittee would report all types of potential impacts.
- As noted in Section 2, authorized NPDES programs can elect to use DMRs to report approved anticipated CSO-related bypass events.

Specialized DMR Mock-up for Reporting Wet-Weather CSO Discharges That Are Not Compliant with Permit Requirements (Where Noncompliance Reporting on DMR is Required by the Permit). This is a streamlined version of the DMR and may be easier for some permittees to complete.

N	NPDES ID:		
r	Month:		
•	Year:		

Parameter	Outfall: 101	Outfall: 102	Outfall: 103	Outfall: 104	Outfall: 105	Outfall:
Duration of Discharge (Hours)	#	#	#	#	#	#
Overflow Volume (Million Gallons)	#	#	#	#	#	#
Type of Potential Impact of Sewer Overflow/Bypass	<up 5="" codes="" separate="" to=""></up>					
<other as="" by="" parameters="" permit="" required=""></other>						
<other as="" by="" parameters="" permit="" required=""></other>						

<Note: These three data elements are included in Appendix A to 40 CFR 127.>

The following are important notes for using the specialized DMR form for reporting wet-weather CSO discharges that are not compliant with permit requirements. EPA and states have the option to use the standard DMR form or the specialized DMR form. Use of these DMR parameters will help ensure nationally consistent reporting of wet-weather CSO discharges that are not compliant with permit requirements.

- DMR data are reported by permitted feature, meaning that NPDES permittees would be entering the information above for each permitted feature for which the NPDES permit requires this monitoring and reporting.
- The NPDES permit will identify the monitoring frequency (e.g., monthly, quarterly).
- The three parameters in this specialized DMR form are for reporting wet-weather CSO discharges that are not compliant with permit requirements and do not endanger health or the environment. If there is no noncompliance in the reporting period, the permittee can use a No Data Indicator (NODI) code in this specialized DMR form.
- The permitting authority can require other parameters to be monitored and reported on the DMR (e.g., BOD, Fecal Coliform, Total Suspended Solids, Percent Overflow Wastewater Discharged, Solids/Floatables Total Volume Removed and Disposed).
- The permit writer may also aggregate monitoring for multiple outfalls under a "Sum" outfall for DMR reporting.
- The EPA or state electronic reporting tool that uses this specialized DMR form will need to create a DMR submission (using XML) to pass the data to EPA's national NPDES data system (ICIS-NPDES).
- <u>Duration of Discharge</u> is reported in hours and can use the following parameter code: 50037. This is the duration of CSO discharges (in hours) at each CSO outfall over the entire month (or reporting period). This value can be estimated or measured by recording equipment. Permittees should round to nearest whole number (if .5 or above, round up, if below .5, round down).
- Overflow Volume is reported in millions of gallons and can use the following parameter codes: 51428, 51500, 51709, 51735, 52370, 74063, 82220. This is the total volume of CSO discharges (in millions of gallons) at each CSO outfall over the entire month (or reporting period). This value can be estimate or measure by recording equipment. Permittees should round to nearest whole number (if .5 or above, round up, if below .5, round down).
- Type of Potential Impact of Sewer Overflow/Bypass is the permittee's reporting of the potential impacts at each CSO outfall. For example, this may include codes for beach closures (BEA), odors (ODO), shellfish bed closures (SBC), and drinking water contamination (DWC). The permittee can include up to five different codes per outfall per monitoring period and separate each code with a comma. See Question 9, Attachment 2, for a full listing of these potential codes. If there are multiple events within one reporting period, the permittee would report all types of potential impacts.
- As noted in Section 2, authorized NPDES programs can elect to use DMRs to report approved anticipated CSO-related bypass events.

# Attachment 4: POTW-specific Data Elements (Appendix A to 40 CFR 127)

### POTW Information on NPDES Permit Application or Notice of Intent

[Note: Unless otherwise indicated, all POTWs and other dischargers designated by the Director must provide the information in this table.]								
Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	Data Group Number					
Permit Application Total Design Flow	This is the design flow rate that a permitted facility was designed to accommodate, in millions of gallons per day (MGD).	122.21, 122.28(b)(2)(ii), 403.10(f)	1,2					
Permit Application Total Actual Average Flow	This is the annual average daily flow rate that a permitted facility will likely accommodate at the start of its permit term, in MGD.	122.21,122.28(b)(2)(ii), 122.41, 403.10(f)	1,2					
Collection System Identifier	This data element will be a unique identifier for each collection system that provides flow to the permittee. A unique identifier should be used for each unincorporated connector district and satellite collection system included in the NPDES permit. Authorized NPDES programs have the option to use this data element to separately identify sections of the one or more collection system owned or operated by the permittee. The unique identifier will be alpha-numeric and allow up to 20 characters in length. See below for additional information and examples of how authorized NPDES programs can use this data element below.	122.1(b) and 122.21(j)(1)(iv), 122.28(b)(2)(ii)	1,2					
Name of Collection System	This is the unique name of each collection system that provides flow to the permittee. This includes unincorporated connector districts and satellite collection systems, which are sanitary sewers owned or operated by another entity that conveys sewage or industrial wastewater to this permittee.	122.1(b) and 122.21(j)(1)(iv), 122.28(b)(2)(ii)	1,2					
Owner Type of Collection System	The unique code/description that identifies the ownership type for each unique collection system that provides flow to the permittee (e.g., municipality owned, privately owned). This includes unincorporated connector districts and satellite collection systems.	122.1(b) and 122.21(j)(1)(iv), 122.28(b)(2)(ii)	1,2					
Population of Collection System	This is the estimated population served for each unique collection system that provides flow to the permittee (round to the nearest 1,000). This includes unincorporated connector districts and satellite collection systems.	122.1(b) and 122.21(j)(1)(iv), 122.28(b)(2)(ii)	1,2					
Percentage of Collection System That Is a Combined Sewer System	For each unique collection system that provides flow to the permittee, this is the estimated percentage of the collection system that is a combined sewer system (round to the nearest whole number). This includes unincorporated connector districts and satellite collection systems. This estimated percentage is calculated separately for each unique collection system that provides flow to the permittee and is based on the service population of each unique collection system.	122.1(b) and 122.21(j)(1)(iv) and (vii), 122.28(b)(2)(ii)	1,2					

# POTW Information on NPDES Permit Application or Notice of Intent

[Note: Unless otherwise indicated, all POTWs and other dischargers designated by the Director must provide the information in this table.]

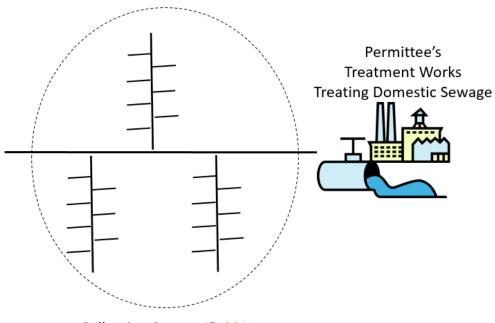
Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
POTW Wastewater Treatment Technology Level Description	This data element describes the level of wastewater treatment technology [e.g., raw discharge (no treatment), primary treatment, secondary wastewater treatment, advanced treatment] used at the facility.	122.21(j)(3)(iii), 122.28(b)(2)(ii) and CWA section 516	1,2
POTW Wastewater Disinfection Technology	The one or more unique codes/descriptions that describe the types of disinfection technology that are used at the facility (e.g., chlorination, ozonation, ultraviolet disinfection). This data element will also use a code/description to identify if this facility is using dechlorination, which may be required if the facility uses chlorination for disinfection.	122.21(j)(3)(iii), 122.28(b)(2)(ii)	1,2
POTW Wastewater Treatment Technology Unit Operations	The one or more unique codes/descriptions that describe the wastewater treatment technology unit operations (e.g., grit removal, flow equalization, complete mix activated sludge secondary treatment, trickling filter, facultative lagoon, biological nitrification) used at the facility. This data element is required for POTWs that have a design flow capacity equal to or above 10 million gallons per day (MGD) and is optional for POTWs with a design flow capacity below 10 MGD.	122.21(j)(2)(ii)(A), 122.28(b)(2)(ii) and CWA section 516	1,2

#### **Collection System Identifier – Additional Information**

This data element will be a unique identifier for each collection system that provides flow to the permittee. A unique identifier should be used for each unincorporated connector district and satellite collection system covered by the NPDES permit. Authorized NPDES programs have the option to use this data element to separately identify sections of the one or more collection system owned or operated by the permittee. Below are some examples of how this data element can be used to identify different collection systems or sections of collection systems. The authorized NPDES program will determine how to create and assign these Collection System IDs.

#### Example #1 - One Collection System ID - One Permittee (One Collection System ID Used for the Permittee's Entire Sewer System)

In this example, the authorized NPDES program has decided to use one Collection System ID for the permittee's entire sewer system. There are no unincorporated connector districts or satellite collection systems that provide flow to the permittee.



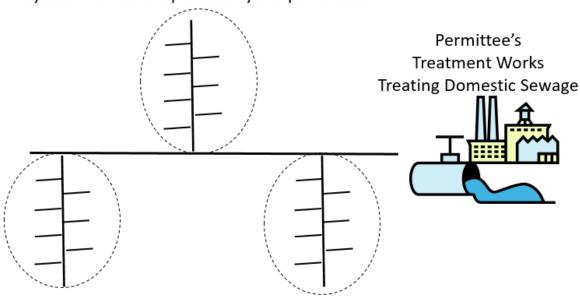
Collection System ID <u>001</u>: This is the sewer collection system owned or operated by the permittee.

#### <u>Example #2</u> - Multiple Collection System IDs – One Permittee (Each Used for Different Sections of the Permittee's Sewer System).

In this example, the authorized NPDES program has decided to divide up the permittee's sewer system into different sections with each section having a different Collection System ID. The authorized NPDES program should ensure that all sections of the sewer system are provided a unique Collection System ID. There are no unincorporated connector districts or satellite collection systems that provide flow to the permittee.

# Collection System ID <u>001</u>:

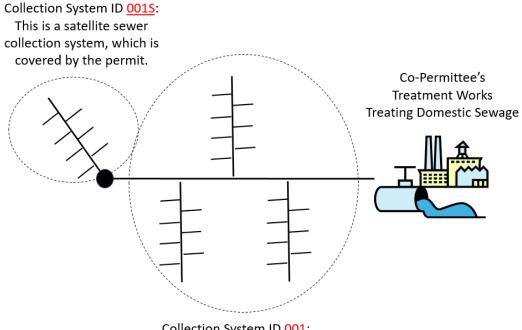
This is a section of the sewer collection system owned or operated by the permittee.



Collection System ID <u>002</u>: This is a section of the sewer collection system owned or operated by the permittee. Collection System ID <u>003</u>: This is a section of the sewer collection system owned or operated by the permittee.

## Example #3 - Multiple Collection System IDs (Different Collection System IDs Used to Distinguish Ownership Between Multiple Collection Systems).

In the example below, the authorized NPDES program is using two different Collection System IDs to distinguish between the owners or operators of the two different sewer collection systems covered by the NPDES permit. One Collection System ID is used for the main sewer system (e.g., 001) and the other Collection System ID is used for the satellite collection system (e.g., 001S). The authorized NPDES program should ensure that each unincorporated connector district and satellite collection system has at least one unique Collection System ID.



Collection System ID <u>001</u>:

This is a sewer collection system owned or operated by the co-permittee that also owns or operates the treatment works treating domestic sewage.

#### Attachment 5: Mock-up of Data Entry Screens for POTW-specific Data Elements

[Note: This is a mock-up of how authorized NPDES programs might submit these data elements to their NPDES program data system or to EPA's national NPDES data system (ICIS-NPDES) for individually permitted facilities. These data elements may also be included in NOIs by facilities seeking coverage under a general permit. This mock-up is intended to show how these data might be collected by an authorized program and the available reference values. These data elements are included in Appendix A to 40 CFR 127.]

#### **Collection System Information**

Provide information on municipalities and areas served by the permit applicant. The following five questions are required for each collection system that provides flow to the permit applicant and include unincorporated connector districts and satellite collection systems. These data elements must be filled out multiple times if a permittee collects sewage from two or more different sewer collection systems.

#### 1 → Collection System Unique Identifier\*

This data element will be a unique identifier for each collection system that provides flow to the permittee. This includes unincorporated connector districts or satellite collection systems that provide flow to the permittee. The unique identify will be alpha-numeric and allow up to 20 characters in length.

Type your answer here...

#### 2 → Collection System Name\*

This is the unique name of each collection system that provides flow to the permittee. This includes unincorporated connector districts or satellite collection systems that provide flow to the permittee.

Type your answer here...

### 3 → Owner Type of Collection System

The unique code/description that identifies the ownership type for each unique collection system that provides flow to the permittee (e.g., municipality owned, privately owned). This includes unincorporated connector districts or satellite collection systems that provide flow to the permittee.

Publicly owned (Owned by State, municipality, or Tribal government.

This includes a district association or other public body created by or pursuant to State law and having jurisdiction over the disposal of sewage).

Privately owned (Owned by private individual or organization)

C Federally owned

	This is the estimated population served for each unique collection system that provides flow to the permittee (round to the nearest 1,000). This includes unincorporated connector districts or satellite collection systems that provide flow to the permittee.
	Type your answer here
5 +	Percentage of Collection System That Is a Combined Sewer
	System*
	For each unique collection system that provides flow to the permittee, this is the estimated percentage of the collection system that is a combined sewer system (round to the nearest whole number). This includes unincorporated connector districts or satellite collection systems that provide flow to the permittee. This estimated percentage is calculated separately for each unique collection system that provides flow to the permittee and is based on the service population of each unique collection system.
	Type your answer here
	<b>te:</b> The following questions are only completed once for each NPDES ID, regardless of the number of ection systems.]
<u>PO</u>	
Plea	ection systems.]
Plea	ection systems.]  TW Design and Annual Average Daily Flow Rates  ase provide the design flow rate that the permitted facility is designed to accommodate, in millions of
Plea gall	ection systems.]  We Design and Annual Average Daily Flow Rates  ase provide the design flow rate that the permitted facility is designed to accommodate, in millions of ons per day (MGD).
Plea gall	Ection systems.]  TW Design and Annual Average Daily Flow Rates  ase provide the design flow rate that the permitted facility is designed to accommodate, in millions of ons per day (MGD).  Million gallons per day (MGD)  ase provide the annual average daily flow rate that the permitted facility will likely accommodate at

#### **POTW Treatment Level**

	Informa	the levels of wastewater treatment that are provided at this facility. Check all that apply. tion about the POTW's disinfection treatment system is gathered in a following
		Preliminary Treatment (e.g., grit removal, flow equalization, screening)
		Primary Treatment (e.g., primary clarification, chemically-enhanced primary treatment)
		Secondary Treatment [e.g., suspended growth biological treatment; attached growth and combined biological treatment].
		Advanced Nitrogen Removal Treatment
		Advanced Phosphorus Removal Treatment
		Other Wastewater Treatment (not otherwise identified, not disinfection)
		(Please provide a text description for this other treatment)
POTW	Wastew	ater Disinfection Technology Information
	Please of that app	describe the types of disinfection technology that are used at the POTW. Please select all ply.
		Chlorination
		Ozonation
		Ultraviolet Light Disinfection
		Dechlorination
		Peracetic Acid
		Other (Please use the text box below to describe)

### **POTW Wastewater Treatment Technology Unit Operations**

Please use the selectors below to describe the wastewater treatment technology unit operations at this POTW. You must answer this question for all POTWs that have a design flow capacity equal to or above 10 million gallons per day (MGD). This question is optional for POTWs with a design flow capacity below 10 MGD. The following selectors group the unit operations (which are derived from the Clean

Watersheds Needs Survey). [**NOTE:** Please see attached 'UNIT\_OPERATION\_REF' table for the full listing. EPA plans to update this list as needed.]

- Activated Sludge Process & Modifications
- Aeration
- Attached Growth Biological Treatment
- Bioremediation
- Chemical Treatment (lime)
- Clarification
- Coagulation and Flocculation
- Dechlorination
- Disinfection
- Equalization
- Evaporation
- Evapotranspiration
- Granular Activated Carbon
- Imhoff Tank
- Ion Exchange
- Lagoon/Pond
- Land Application
- Media Filter
- Membrane Process
- Nitrogen Control (Biological)
- Nitrogen Removal (Attached Growth)
- Nitrogen Removal (Biological)
- Nitrogen Removal (Physical)
- pH control
- Phosphorus Removal (Biological)
- Phosphorus Removal (Chemical)
- Powdered Activated Carbon
- Preliminary Treatment
- Sedimentation
- Septic Tank/Leach Field
- Wetlands

# Technical Paper No. 2, Attachment 5 - Mock-up of Data Entry Screens for POTW-specific Data Elements "POTW Wastewater Treatment Technology Unit Operations" Note: This spreadsheet lists POTW treatment technology unit operations (uniquely identified by the 'UNIT\_OPERATION\_ID'). The 'POTW Treatment Category' column groups the unit operations.

UNIT_OPERATION_ID	UNIT_OPERATION_NAME	POTW TREATMENT CATEGORY	NOTES/DEFINITONS/COMMENTS
35	Activated Sludge, Anaerobic/Anoxic/Oxic	Activated Sludge Process & Modifications	
33	Activated Sludge, Complete Mix	Activated Sludge Process & Modifications	
31	Activated Sludge, Contact Stabilization	Activated Sludge Process & Modifications	
29	Activated Sludge, Conventional	Activated Sludge Process & Modifications	
37	Activated Sludge, Extended Aeration	Activated Sludge Process & Modifications	
30	Activated Sludge, High Rate	Activated Sludge Process & Modifications	
36	Activated Sludge, Other Mode	Activated Sludge Process & Modifications	
32	Activated Sludge, Pure Oxygen	Activated Sludge Process & Modifications	
34	Activated Sludge, Step Aeration	Activated Sludge Process & Modifications	
43	Activated Sludge, With Biological Denitrification	Activated Sludge Process & Modifications	One unit process links to two treatment categories.
49	Growth Process, Other Suspended	Activated Sludge Process & Modifications	
165	Package Plant (Other)	Activated Sludge Process & Modifications	
38	Reactor (Oxidation Ditch)	Activated Sludge Process & Modifications	
28	Reactor, Sequencing Batch (SBR)	Activated Sludge Process & Modifications	
39	Reactor, Vertical Loop	Activated Sludge Process & Modifications	
209	Aeration (general)	Aeration	
87	Aeration (post-treatment)	Aeration	
10	Aeration (pre-treatment)	Aeration	
208	Aerobic Unit	Aeration	
47	Filter (Activated Bio-)	Attached Growth Biological Treatment	
62	Filter, Slow Sand	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment" or "Biofilter."
210	Filter, Anaerobic	Attached Growth Biological Treatment	
63	Filter, Moving Bed	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
66	Filter, Rock	Attached Growth Biological Treatment	
48	Growth Process, Other Attached	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
27	Package Plant, Rotating Biological Contactor (RBC)	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
214	Trickling Filter (Unspecified Media)	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
26	Trickling Filter, Other Media	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
24	Trickling Filter, Plastic Media	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."

UNIT_OPERATION_ID	UNIT_OPERATION_NAME	POTW TREATMENT CATEGORY	NOTES/DEFINITONS/COMMENTS
25	Trickling Filter, Redwood Slats	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
23	Trickling Filter, Rock Media	Attached Growth Biological Treatment	Could also be "Fixed Film Biological Treatment."
227	Alley Cropping	Bioremediation	Alley cropping is an agroforestry practice where agricultural or horticultural crops are grown in the alleys between widely spaced rows of trees and/or shrubs. Alley cropping can be used for other purposes as well. For example, short rotation woody crops of fast growing tree species, harvested on 6-10 year rotations, can be combined with forage or row crops. Such designs may be used to produce fuelwood and fodder, as well as treat areas exposed to municipal sludge, wastewater, or livestock waste effluent.
22	Duckweed (Lemna)	Bioremediation	
225	Duckweed (Spirodela)	Bioremediation	
226	Duckweed (Wolffia)	Bioremediation	
262	Forage Harvest Management (AC)(511)	Bioremediation	Forage crops can be used for nutrient uptake from livestock manure, sewage effluent, and canning plant wastewater.
453	Lime Treatment	Chemical Treatment (lime)	Could be removing metals, hardness, or nutrients.
74	Lime Treatment, Single Stage Primary	Chemical Treatment (lime)	Could be removing metals, hardness, or nutrients.
75	Lime Treatment, Single Stage Tertiary	Chemical Treatment (lime)	Could be removing metals, hardness, or nutrients.
76	Lime Treatment, Two Stage Primary	Chemical Treatment (lime)	Could be removing metals, hardness, or nutrients.
77	Lime Treatment, Two Stage Tertiary	Chemical Treatment (lime)	Could be removing metals, hardness, or nutrients.
90	Clarification, In-Channel	Clarification	
89	Clarification, Intermediate	Clarification	
91	Clarification, Secondary	Clarification	
88	Clarification, Tube Settlers	Clarification	
108	Flotation	Clarification	Dissolved air flotation is one example.
58	Microstrainer, Primary	Clarification	
59	Microstrainer, Secondary	Clarification	
182	Screen (Fine and Microstrainers)	Clarification	
85	Chemical Addition (Polymer)	Coagulation and Flocculation	
107	Flocculation	Coagulation and Flocculation	
99	Dechlorination	Dechlorination	
94	Disinfection, Breakpoint Chlorination	Disinfection	
100	Disinfection, Chlorination	Disinfection	
191	Disinfection, Gaseous Chlorine	Disinfection	

UNIT_OPERATION_ID	UNIT_OPERATION_NAME	POTW TREATMENT CATEGORY	NOTES/DEFINITONS/COMMENTS
190	Disinfection, Liquid Chlorine	Disinfection	
103	Disinfection, Other	Disinfection	
192	Disinfection, Other Chemical	Disinfection	
101	Disinfection, Ozonation	Disinfection	
102	Disinfection, Ultraviolet	Disinfection	
186	Disinfection, UV Radiation	Disinfection	
179	Equalization, At POTW	Equalization	
7	Equalization, Flow	Equalization	
106	Evaporation	Evaporation	
207	Evapotranspiration Bed	Evapotranspiration	An evapotranspiration (ET) bed treats wastewater by using evapotranspiration the loss of water from the soil by evaporation and by transpiration from plants growing there. ET beds are used where the soil cannot treat wastewater before it percolates to groundwater, such as in rocky soils, or where the soil prevents wastewater from percolating from the soil absorption field, such as in heavy clay soils.
70	Activated Carbon, Granular	Granular Activated Carbon	
9	Imhoff Tank	Imhoff Tank	Used for a population of 5,000 or less (not most conventional WWTPs). Operates like a large septic tank.
93	Ion Exchange	Ion Exchange	
199	Lagoon	Lagoon/Pond	
18	Lagoon, Aerated	Lagoon/Pond	
15	Lagoon, Anaerobic	Lagoon/Pond	
2853386	Lagoon, Facultative	Lagoon/Pond	
60	Lagoon, Polishing	Lagoon/Pond	
316	Pond (NO.) (378)	Lagoon/Pond	
14	Pond, Stabilization	Lagoon/Pond	
19	Pond, Total Containment	Lagoon/Pond	
437	Ponds/Basins	Lagoon/Pond	
452	Retention Ponds	Lagoon/Pond	
364	Waste Treatment Lagoon (NO.) (359)	Lagoon/Pond	
56	Land Application, Slow Rate, W/O Underdrain	Land Application	
55	Land Application, Slow Rate, With Underdrain	Land Application	

UNIT_OPERATION_ID	UNIT_OPERATION_NAME	POTW TREATMENT CATEGORY	NOTES/DEFINITONS/COMMENTS
54	Rapid Infiltration System, W/O Underdrain	Land Application	
53	Rapid Infiltration System, With Underdrain	Land Application	
206	Filter (Sand/Gravel-Pretreatment)	Media Filter	
205	Filter (Sand-Intermittent)	Media Filter	
204	Filter (Sand-Recirculating)	Media Filter	
64	Filter, Mixed Media	Media Filter	
61	Filter, Rapid Sand	Media Filter	
418	Filtration Basins And Sand Filters	Media Filter	
104	Membrane Process (Dialysis)	Membrane Process	
96	Membrane Process (Electrodialysis)	Membrane Process	
97	Membrane Process (Reverse Osmosis)	Membrane Process	
41	Nitrification, Biological (Combined and BOD Reduction)	Nitrogen Control (Biological)	
40	Nitrification, Biological (Separate Stage)	Nitrogen Control (Biological)	
68	Filter, Denitrification with Coarse Media	Nitrogen Removal (Attached Growth)	
69	Filter, Denitrification with Fine Media	Nitrogen Removal (Attached Growth)	
42	Biological Denitrification, (Separate Stage)	Nitrogen Removal (Biological)	
95	Ammonia Stripping	Nitrogen Removal (Physical)	
92	Neutralization	pH control	
73	Recarbonation	pH control	
44	Phosphorus Removal, Biological	Phosphorus Removal (Biological)	
46	Phosphorus Removal, Biological (Modified Bardenpho)	Phosphorus Removal (Biological)	
45	Phosphorus Removal, Biological (Phostrip)	Phosphorus Removal (Biological)	
79	Chemical Addition (Alum), Primary	Phosphorus Removal (Chemical)	
80	Chemical Addition (Alum), Secondary	Phosphorus Removal (Chemical)	
81	Chemical Addition (Alum), Tertiary	Phosphorus Removal (Chemical)	
82	Chemical Addition (Ferric Chloride), Primary	Phosphorus Removal (Chemical)	
83	Chemical Addition (Ferric Chloride), Secondary	Phosphorus Removal (Chemical)	
84	Chemical Addition (Ferric Chloride), Tertiary	Phosphorus Removal (Chemical)	
71	Activated Carbon, Powdered	Powdered Activated Carbon	
13	Aerated Grit Chambers	Preliminary Treatment	
5	Comminution	Preliminary Treatment	

UNIT_OPERATION_ID	UNIT_OPERATION_NAME	POTW TREATMENT CATEGORY	NOTES/DEFINITONS/COMMENTS
212	Grinder Pump- Low Pressure Sewer	Preliminary Treatment	
4	Grit Removal	Preliminary Treatment	
181	Screen (Bar Rack and Coarse)	Preliminary Treatment	
2	Screen, Bar	Preliminary Treatment	
12	Screen, Mechanical Bar	Preliminary Treatment	
6	Scum Removal	Preliminary Treatment	
184	Swirl Concentrator	Preliminary Treatment	
341	Sediment Basin (NO.) (350)	Sedimentation	Can be a stormwater management device.
395	Sediment Basins	Sedimentation	Can be a stormwater management device.
183	Sedimentation	Sedimentation	
188	Sedimentation, Chemical Precipitation	Sedimentation	
8	Sedimentation, Primary	Sedimentation	
202	Leach Field (Multiple Unit with Soil Absorption)	Septic Tank/Leach Field	This unit operation relates to residential septic tank.
201	Leach Field (Standard)	Septic Tank/Leach Field	This unit operation relates to residential septic tank.
51	Septage Treatment - Separate Stage	Septic Tank/Leach Field	This unit operation relates to residential septic tank.
200	Septic Tank	Septic Tank/Leach Field	This unit operation relates to residential septic tank.
410	Constructed Wetlands	Wetlands	
455	Constructed Wetlands (Resource Extraction)	Wetlands	
21	Freesurface/Wetland(Marsh System)	Wetlands	
20	Subsurface Flow	Wetlands	
198	Wetland (Subsurface)	Wetlands	
197	Wetland (Surface)	Wetlands	

# Attachment 6: LTCP and CSO Control Data Elements (Appendix A to 40 CFR 127)

#### **Combined Sewer Overflow Information**

[Note: All Phase II and post-Phase II combined sewer system NPDES permittees are required to complete and implement a long-term CSO control plan (LTCP) as described in EPA's Combined Sewer Overflow (CSO) Control Policy (19 April 1994; 59 Federal Register 18688-18698). These data will be updated by the authorized NPDES program on a timely basis as changes occur with the combined sewer system and the LTCP as well as with the POTW's implementation and compliance with the LTCP.]

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Long-Term CSO Control Plan Permit Requirements and Compliance	This data element uses a unique code/description that identifies whether the permit requires the permit holder to complete and implement a LTCP and whether the permit holder is in compliance with these permit requirements.	122.41(h), 122.43, 123.41(a) and CWA section 402(q)(1), Combined Sewer Overflow (CSO) Control Policy (59 FR 18688- 18698, 19 April 1994)	1
Nine Minimum CSO Controls Developed	This data element uses a unique code/description to identify by number each of the nine minimum control measures outlines in the CSO Control Policy that the permit holder has developed in compliance with the applicable permit and/or enforcement mechanism. These unique codes are: (1) Proper operation and regular maintenance programs for the sewer system and the CSOs; (2) Maximum use of the collection system for storage; (3) Review and modification of pretreatment requirements to assure CSO impacts are minimized; (4) Maximization of flow to the publicly owned treatment works for treatment; (5) Prohibition of CSOs during dry weather; (6) Control of solid and floatable materials in CSOs; (7) Pollution prevention; (8) Public notification to ensure that the public receives adequate notification of CSO occurrences and CSO impacts; and (9) Monitoring to effectively characterize CSO impacts and the efficacy of CSO controls. For example, if the permit holder has only developed the "Maximum use of the collection system for storage" minimum control measure then the permitting authority will record "2" for this data element. Likewise, if the permit holder has developed all nine minimum control measures then permitting authority will record 1, 2, 3, 4, 5, 6, 7, 8, and 9 for this data element.	122.41(h), 122.43, 123.41(a) and CWA section 402(q)(1), Combined Sewer Overflow (CSO) Control Policy (59 FR 18688- 18698, 19 April 1994)	1

#### **Combined Sewer Overflow Information**

[Note: All Phase II and post-Phase II combined sewer system NPDES permittees are required to complete and implement a long-term CSO control plan (LTCP) as described in EPA's Combined Sewer Overflow (CSO) Control Policy (19 April 1994; 59 Federal Register 18688-18698). These data will be updated by the authorized NPDES program on a timely basis as changes occur with the combined sewer system and the LTCP as well as with the POTW's implementation and compliance with the LTCP.]

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
Nine Minimum CSO Controls Implemented	This data element uses a unique code/description to identify, by number, each of nine minimum control measures outlined in the CSO Control Policy that the permit holder has implemented in compliance with the applicable permit and/or enforcement mechanism. These unique codes are: (1) Proper operation and regular maintenance programs for the sewer system and the CSOs; (2) Maximum use of the collection system for storage; (3) Review and modification of pretreatment requirements to assure CSO impacts are minimized; (4) Maximization of flow to the publicly owned treatment works for treatment; (5) Prohibition of CSOs during dry weather; (6) Control of solid and floatable materials in CSOs; (7) Pollution prevention; (8) Public notification to ensure that the public receives adequate notification of CSO occurrences and CSO impacts; and (9) Monitoring to effectively characterize CSO impacts and the efficacy of CSO controls. For example, if the permit holder has only implemented the "Maximum use of the collection system for storage" minimum control measure then the permitting authority will record "2" for this data element. Likewise, if the permit holder has implemented all nine minimum control measures then permitting authority will record 1, 2, 3, 4, 5, 6, 7, 8, and 9 for this data element.	122.41(h), 122.43, 123.41(a) and CWA section 402(q)(1), Combined Sewer Overflow (CSO) Control Policy (59 FR 18688- 18698, 19 April 1994)	1
LTCP Submission and Approval Type	This data element uses a unique code/description to identify whether the most recent version of the LTCP was received and approved by the permitting authority (e.g., most recent version of the LTCP was submitted by permit holder and was approved by the permitting authority, most recent version of the LTCP was submitted by permit holder but has not yet been approved by permitting authority, permit holder is required to submit a revised LTCP but the permitting authority has not yet received the revised LTCP from the permit holder, permit holder has not yet submitted a LTCP).	122.41(h), 122.43, 123.41(a) and CWA section 402(q)(1), Combined Sewer Overflow (CSO) Control Policy (59 FR 18688- 18698, 19 April 1994)	1
LTCP Approval Date	This data element identifies the date when the permitting authority approved the most current version of the LTCP. This data element will be updated for each revision to the LTCP. The date must be provided in YYYY-MM-DD format where YYYY is the year, MM is the month, and DD is the day.	122.41(h), 122.43, 123.41(a) and CWA section 402(q)(1), Combined Sewer Overflow (CSO) Control Policy (59 FR 18688- 18698, 19 April 1994)	1

#### **Combined Sewer Overflow Information**

[Note: All Phase II and post-Phase II combined sewer system NPDES permittees are required to complete and implement a long-term CSO control plan (LTCP) as described in EPA's Combined Sewer Overflow (CSO) Control Policy (19 April 1994; 59 Federal Register 18688-18698). These data will be updated by the authorized NPDES program on a timely basis as changes occur with the combined sewer system and the LTCP as well as with the POTW's implementation and compliance with the LTCP.]

Data Name	Data Description	CWA, Regulatory (40 CFR), or Other Citation	NPDES Data Group Number
		122.41(h), 122.43,	
Enforceable Mechanism		123.41(a) and CWA	
and Schedule to	This data element uses a unique code/description to identify whether the permit	section 402(q)(1),	
Complete LTCP and CSO	holder is on an enforceable schedule to complete all required LTCP and CSO controls	Combined Sewer	1
Controls	and the type of enforcement mechanism.	Overflow (CSO) Control	
Controls		Policy (59 FR 18688-	
		18698, 19 April 1994)	
		122.41(h), 122.43,	
	This data element identifies the date by which the permit holder completed	123.41(a) and CWA	
Actual Date Completed	construction and implementation of all currently required LTCP and CSO controls. This	section 402(q)(1),	
LTCP and CSO Controls	data element will be updated for each revision to the LTCP and CSO controls. The date	Combined Sewer	1
LICE and CSO Controls	must be provided in YYYY-MM-DD format where YYYY is the year, MM is the month,	Overflow (CSO) Control	
	and DD is the day.	Policy (59 FR 18688-	
		18698, 19 April 1994)	
		122.41(h), 122.43,	
		123.41(a) and CWA	
Approved Post-	This data element uses a unique code/description to indicate whether the permit holder is currently implementing an approved post-construction compliance monitoring program.	section 402(q)(1),	
Construction Compliance		Combined Sewer	1
Monitoring Program		Overflow (CSO) Control	
		Policy (59 FR 18688-	
		18698, 19 April 1994)	
		122.41(h), 122.43,	
	This data element uses a unique code/description to identify whether the permit	123.41(a) and CWA	
Other CSO Control		section 402(q)(1),	
Measures with	holder has other CSO control measures specified in a compliance schedule, beyond those identified in the nine minimum controls, long-term CSO control plan (LTCP), or a plan for sewer system separation.	Combined Sewer	1
Compliance Schedule		Overflow (CSO) Control	
		Policy (59 FR 18688-	
		18698, 19 April 1994)	

### **Attachment 7:** Mock-up of Data Entry Screens for LTCP and CSO Control Data Elements

Is the POTW required to complete and implement a LTCP? (select one)\*

Is the POTW currently in compliance with its LTCP (select one)\*

1.a

1.b

() Yes

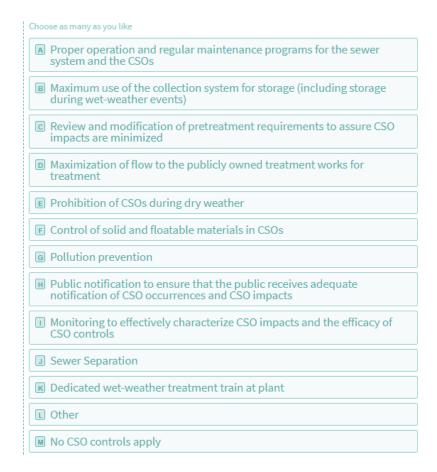
() No

() Yes

[Note: This is a mock-up of how authorized NPDES programs might submit these data elements to their NPDES program data system or to EPA's national NPDES data system (ICIS-NPDES). This mock-up is intended to show how these data might be reported and the available reference values. These data elements are included in Appendix A to 40 CFR 127.]

	() No
(	Please identify each of the CSO control measures that the POTW has developed in compliance with the permit or enforcement mechanism (check all that apply).*
	Choose as many as you like
	A Proper operation and regular maintenance programs for the sewer system and the CSOs
	Maximum use of the collection system for storage (including storage during wet-weather events)
	Review and modification of pretreatment requirements to assure CSO impacts are minimized
	Maximization of flow to the publicly owned treatment works for treatment
	E Prohibition of CSOs during dry weather
	E Control of solid and floatable materials in CSOs
	Pollution prevention
	H Public notification to ensure that the public receives adequate notification of CSO occurrences and CSO impacts
	Monitoring to effectively characterize CSO impacts and the efficacy of CSO controls
	■ Sewer Separation
	■ Dedicated wet-weather treatment train at plant
	L Other
İ	M No CSO controls apply

3 Please identify each of the CSO control measures that the POTW is currently implementing in compliance with the permit or enforcement mechanism (check all that apply).



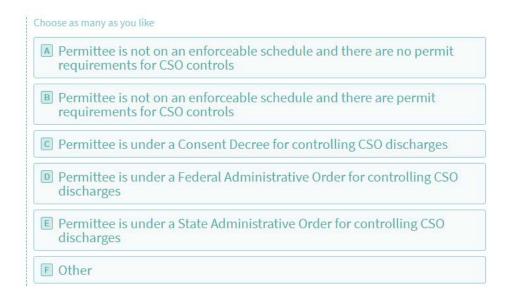
Please identify the date of the most recent revision to the LTCP submitted to the permitting authority.

MM / DD / YYYY

Please identify the date of the most recent approved revision to the LTCP. [Note: This data element will be updated by the permitting authority for each approved revision to the LTCP.]\*

# MM / DD / YYYY

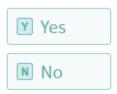
6→ Identify the one or more enforcement mechanisms for the LTCP and CSO controls.\*



→ Please identify the date by which the permit holder completed construction and implementation of all currently required LTCP and CSO controls. [Note: This date will be updated for each revision to the LTCP and CSO controls.]\*

YYYY / MM / DD

8→ Please identify if the permit holder is currently implementing an approved post-construction compliance monitoring program.\*



Please provide a short description of any other CSO control measures specified in the permit or a compliance schedule, beyond those identified in the LTCP.\*



**Attachment 8:** Mock-up of Data Entry Screen for "Deficiencies Identified Through the Sewer Overflow/Bypass Compliance Monitoring" Data Element

[Note: This is a mock-up of how authorized NPDES programs might submit these data elements to their NPDES program data system or to EPA's national NPDES data system (ICIS-NPDES). This mock-up is intended to show how these data will be collected and the available reference values. This data element is included in Appendix A to 40 CFR 127. It is current practice for an EPA or state inspector to document their findings made during an inspection and note any 'deficiencies.' Typically, their manager will review these 'deficiencies' and decide if any of them warrant identification as violations (see Attachment 9).]

Con	nbined Sewer Systems
	Failure to properly operate and maintain a program for controlling combined sewer overflows as required by the permit or approved LTCP. This includes failure to comply with schedules set forth in either the permit or approved LTCP as well as failure to properly operate and maintain the combined sewer system to achieve compliance with requirements set forth in the either the permit or approved LTCP [40 CFR 122.41(e)].
	Failure to comply with the requirements set forth in the either the permit or approved LTCP to minimize or prevent one or more discharges from the combined sewer system to waters of the U.S. that have a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].
	Failure to comply with the requirements set forth in the either the permit or approved LTCP to minimize or prevent one or more discharges from the combined sewer system (but not to waters of the U.S.) that have a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].
	Failure to maximize the use of the combined sewer collection system for storage of sewage and stormwater as required by the permit or approved LTCP.
	Failure to review and modify pretreatment requirements to ensure that impacts from the release of sewage and stormwater from a combined sewer system are minimized.
	Failure to maximize the flow of sewage and stormwater to TWTDS for treatment as required by the permit or approved LTCP.
	Failure to eliminate all releases from a combined sewer system during dry-weather.
	Failure to control solids and floatable materials in any releases of sewage from a combined sewer system as required by the permit or approved LTCP.
	Failure to establish pollution prevention programs as required by either the permit or approved LTCP.
	Failure to provide public notification to ensure adequate notice of any releases from a combined sewer system and the related potential impacts to human health and the environment.
	Failure to monitor and effectively characterize the impacts of releases from the combined sewer system and the efficacy of controls as required by either the permit or the approved LTCP, which includes failure to implement a post-construction compliance monitoring program.
	Failure to provide immediate notice (within 24-hours) to the permitting authority of any releases from the combined sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].

# Deficiencies Identified Through the Sewer Overflow/Bypass Compliance Monitoring (continued) (check all that apply)

Cor	nbined Sewer Systems
	Failure to submit a noncompliance report (within 5-days) to the permitting authority that provides details of the one or more releases from the combined sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].
	Failure to submit a noncompliance report (within reporting frequency set forth in the permit) to the permitting authority that provides details of the one or more releases from the combined sewer system that do not endanger health or the environment [40 CFR 122.41(I)(7)].
	Failure to report combined sewer overflow information on the DMR as required by either the permit, approved LTCP, or enforcement order [40 CFR 122.41(I)(4)(i)].
	Failure to submit combined sewer overflow information to the permitting authority as required by either the permit, approved LTCP, or enforcement order (Not Related to Sewer Overflow/Bypass Event Report or DMR)
	Failure to develop or submit adequate LTCP.
	Failure to eliminate or relocate combine sewer outfalls from identified sensitive areas as required in the approved LTCP.
	Failure to comply to provide information regarding the combined sewer system or releases from a combined sewer system in accordance with a CWA Section 308 information collection request.
	Failure to submit required permit application information regarding the combined sewer system or releases from a combined sewer system (includes co-permittee satellite systems).
	Failure to comply with recordkeeping requirements related to a combined sewer system or releases from a combined sewer system as required by either the permit, approved LTCP, or enforcement order [40 CFR 122.41(j)].
	Discharge from a combined sewer system to waters of the U.S. without NPDES permit coverage (includes co-permittee satellite systems).
	Other noncompliance related to a combined sewer system or releases from a combined sewer system (e.g., violation of permit requirement, enforcement order, or sewer moratorium).

# Deficiencies Identified Through the Sewer Overflow/Bypass Compliance Monitoring (check all that apply)

Sep	Separate Sewer Systems		
	Failure to take all reasonable steps to minimize or prevent any discharge from the sanitary sewer system to waters of the U.S. that has a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].		
	Failure to take all reasonable steps to minimize or prevent any discharge from the sanitary sewer system (but not to waters of the U.S.) that has a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].		
	Failure to properly operate and maintain the sanitary sewer system to achieve compliance with the conditions of the permit [40 CFR 122.41(e)].		
	Failure to provide immediate notice (within 24-hours) to the permitting authority of any releases from the sanitary sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].		
	Failure to submit a noncompliance report (within 5-days) to the permitting authority that provides details of the one or more releases from the sanitary sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].		
	Failure to submit a noncompliance report (within reporting frequency set forth in the permit) to the permitting authority that provides details of the one or more releases from the sanitary sewer system that do not endanger health or the environment [40 CFR 122.41(I)(7)].		
	Failure to submit sanitary sewer overflow information to the permitting authority as required by either the permit or enforcement order (Not Related to Sewer Overflow/Bypass Event Report or DMR).		
	Failure to comply to provide information regarding the sanitary sewer system or releases from a sanitary sewer system in accordance with a CWA Section 308 information collection request.		
	Failure to submit required permit application information regarding the sanitary sewer system or releases from a sanitary sewer system (includes co-permittee satellite systems).		
	Failure to comply with recordkeeping requirements related to a sanitary sewer system or releases from a sanitary sewer system as required by either the permit or enforcement order [40 CFR 122.41(j)].		
	Discharge from a sanitary sewer system to waters of the U.S. without NPDES permit coverage (includes co-permittee satellite systems).		
	Other noncompliance related to a sanitary sewer system or releases from a sanitary sewer system (e.g., violation of permit requirement, enforcement order, or sewer moratorium).		

# Deficiencies Identified Through the Sewer Overflow/Bypass Compliance Monitoring (check all that apply)

Вур	Bypass Events		
	Failure to take all reasonable steps to minimize or prevent an unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] to waters of the U.S.		
	Failure to take all reasonable steps to minimize or prevent an unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] but not to waters of the U.S.		
	Failure to properly operate and maintain the sewer system as required by the permit, enforcement order, or approved LTCP [40 CFR 122.41(e)], which results in an unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)].		
	Failure to provide immediate notice (within 24-hours) to the permitting authority of any unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] that may endanger health or the environment [40 CFR 122.41(l)(6) and (m)(3)(ii)].		
	Failure to submit report (within 5-days) to the permitting authority of any unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] that may endanger health or the environment [40 CFR 122.41(l)(6) and (m)(3)(ii)].		
	Failure to submit a noncompliance report (within reporting frequency set forth in the permit) to the permitting authority that provides details of the one or more unanticipated prohibited bypasses [per 40 CFR 122.41(m)(3)(ii)] that do not endanger health or the environment [40 CFR 122.41(l)(7) and (m)(3)(ii)].		
	Failure to submit notice (10-days prior to anticipated bypass) to the permitting authority of an anticipated bypass [40 CFR 122.41(m)(3)(i)].		
	Failure to submit bypass information to the permitting authority as required by the permit or enforcement order (Not Related to Sewer Overflow/Bypass Event Report).		
	Failure to comply to provide information regarding bypasses in accordance with a CWA Section 308 information collection request.		
	Failure to submit required permit application information regarding bypasses (includes co-permittee satellite systems).		
	Failure to comply with recordkeeping requirements related to bypasses as required by either the permit or enforcement order [40 CFR 122.41(j)].		
	Bypass discharge to waters of the U.S. without NPDES permit coverage (includes co-permittee satellite systems).		
	Other noncompliance related to bypasses (e.g., violation of permit requirement, enforcement order, or sewer moratorium).		

#### Attachment 9: Recommended ICIS-NPDES Violation Codes Reference Values

#### Overview

This list of reference values is intended to be a comprehensive list of sewer overflow and bypass-related violation codes which will exist within the ICIS-NPDES database. The following table of violation codes apply to violations identified through EPA or state inspections.

It is important to note that Single Event Violations (SEVs) include one-time events as well as violations with longer durations. These are violations that are generally not automatically flagged by the data system (e.g., inspection identified violations, sewer overflow, spill of industrial waste, discharges without an NPDES permit). These violation determinations are often manually generated by the authorized NPDES program as opposed to violations that can be system created or generated (e.g., effluent exceedances of permit limits are automatically flagged by ICIS-NPDES). The NPDES eRule requires authorized NPDES programs to share SEV data on all facilities (major and non-major). However, this requirement does not include SEV data generated from construction stormwater inspections where the regulatory authority did not take a formal enforcement action. As noted in preamble to the final rule, EPA made this distinction based on the large number of facilities in this segment of the NPDES universe (approximately 200,000 new construction sites each year). See 22 October 2015; 80 FR 64079. Prior to the NPDES eRule, states only had to share data on SEVs from majors.

The violations that are found through an inspection have a code that starts with "F" and will be manually entered by the regulatory authority. Violations reported on the "Sewer Overflow/Bypass Event Report" or the DMR will automatically create violation codes and these codes start with an "R". These two sets of sewer overflow/bypass violation codes end with "S". EPA's national NPDES data system will accept or automatically create these violation codes based on the following business rules. EPA recommends that authorized NPDES programs only create a "F"-code violation, which is identified through an inspection, when there is no corresponding "R"-code violation for the <u>same violation</u>. This will prevent one violation from being counted twice (one through an inspection and another through a compliance monitoring report submission).

EPA's national NPDES data system (ICIS-NPDES) will track detected violations to determine whether the violation is resolved (e.g., regulatory authority has concluded a formal enforcement action against the violator), is resolved pending (e.g., the regulatory authority has initiated a formal enforcement action against the violator), or is still unresolved (e.g., regulatory authority has not initiated any formal enforcement action against the violator).

## Noncompliance Identified by State or EPA

EPA's regulations require authorized NPDES programs to have "inspection and surveillance procedures to determine, independent of information supplied by regulated persons, compliance or noncompliance with applicable program requirements." See 40 CFR 123.26(b). Noncompliance that is detected during an inspection will have a violation code that starts with "F" and end with an "S" as shown in the table below. Regulatory authorities will share these violation data with EPA's national NPDES data system (ICIS-NPDES) in a timely fashion (within 40 days of violation determination). These codes were developed to distinguish noncompliance between combined sewer systems and sanitary sewer systems as well as noncompliance related to unapproved prohibited bypasses.

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Combined Sewer Systems		
Failure to properly operate and maintain a program for controlling combined sewer overflows as required by the permit or approved LTCP. This includes failure to comply with schedules set forth in either the permit or approved LTCP as well as failure to properly operate and maintain the combined sewer system to achieve compliance with requirements set forth in the either the permit or approved LTCP [40 CFR 122.41(e)].		F001S
Failure to comply with the requirements set forth in the either the permit or approved LTCP to minimize or prevent one or more discharges from the combined sewer system to waters of the U.S. that have a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].		F002S
Failure to comply with the requirements set forth in the either the permit or approved LTCP to minimize or prevent one or more discharges from the combined sewer system (but not to waters of the U.S.) that have a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].		F003S
Failure to maximize the use of the combined sewer collection system for storage of sewage and stormwater as required by the permit or approved LTCP.		F004S

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Failure to review and modify pretreatment requirements to ensure that impacts from the release of sewage and stormwater from a combined sewer system are minimized.		F005S
Failure to maximize the flow of sewage and stormwater to TWTDS for treatment as required by the permit or approved LTCP.		F006S
Failure to eliminate all releases from a combined sewer system during dryweather.		F007S
Failure to control solids and floatable materials in any releases of sewage from a combined sewer system as required by the permit or approved LTCP.		F008S
Failure to establish pollution prevention programs as required by either the permit or approved LTCP.		F009S
Failure to provide public notification to ensure adequate notice of any releases from a combined sewer system and the related potential impacts to human health and the environment.		F010S
Failure to monitor and effectively characterize the impacts of releases from the combined sewer system and the efficacy of controls as required by either the permit or the approved LTCP, which includes failure to implement a post-construction compliance monitoring program.		F011S
Failure to provide immediate notice (within 24-hours) to the permitting authority of any releases from the combined sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].		F012S
Failure to submit a noncompliance report (within 5-days) to the permitting authority that provides details of the one or more releases from the combined sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].	These notices will be made through submission of the Sewer Overflow/Bypass Event Report. This violation code will be generated if the permittee fails to file this report.	F013S

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Failure to submit a noncompliance report (within reporting frequency set forth in the permit) to the permitting authority that provides details of the one or more releases from the combined sewer system that do not endanger health or the environment [40 CFR 122.41(I)(7)].	These notices will be made through submission of the Sewer Overflow/Bypass Event Report or DMR. EPA is allowing permitting authorities to give CSS-permittees the option to use DMR submissions for wet-weather CSOs that are not compliant with permit requirements but do not "endanger health or the environment." This violation code will be generated if the permittee is required to report wet-weather CSOs that are not compliant with permit requirements but do not "endanger health or the environment" on the Sewer Overflow/Bypass Event Report but fails to do so.	F014S
Failure to report combined sewer overflow information on the DMR as required by either the permit, approved LTCP, or enforcement order [40 CFR 122.41(I)(4)(i)].	Some permits require reporting of CSO discharges on unscheduled DMRs. This violation code will track instances when the permitted should have filed an unscheduled DMR to report wet-weather CSOs that are not compliant with permit requirements but do not "endanger health or the environment" but failed to so. The permittee shall report all instances of noncompliance not reported under paragraphs (I)(4), (5), and (6) of this section, at the time monitoring reports are submitted.	F015S
Failure to submit combined sewer overflow information to the permitting authority as required by either the permit, approved LTCP, or enforcement order (Not Related to Sewer Overflow/Bypass Event Report or DMR)		F016S
Failure to develop or submit adequate LTCP.		F017S
Failure to eliminate or relocate combine sewer outfalls from identified sensitive areas as required in the approved LTCP.		F018S
Failure to comply to provide information regarding the combined sewer system or releases from a combined sewer system in accordance with a CWA Section 308 information collection request.		F019S
Failure to submit required permit application information regarding the combined sewer system or releases from a combined sewer system (includes copermittee satellite systems).		F020S

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Failure to comply with recordkeeping requirements related to a combined sewer system or releases from a combined sewer system as required by either the permit, approved LTCP, or enforcement order [40 CFR 122.41(j)].		F021S
Discharge from a combined sewer system to waters of the U.S. without NPDES permit coverage (includes co-permittee satellite systems).	This code should only be used when F002S does not apply.	F022S
Other noncompliance related to a combined sewer system or releases from a combined sewer system (e.g., violation of permit requirement, enforcement order, or sewer moratorium).		F023S
Separate Sewer Systems		
Failure to take all reasonable steps to minimize or prevent any discharge from the sanitary sewer system to waters of the U.S. that has a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].		F024S
Failure to take all reasonable steps to minimize or prevent any discharge from the sanitary sewer system (but not to waters of the U.S.) that has a reasonable likelihood of adversely affecting human health or the environment [40 CFR 122.41(d)].		F025S
Failure to properly operate and maintain the sanitary sewer system to achieve compliance with the conditions of the permit [40 CFR 122.41(e)].		F026S
Failure to provide immediate notice (within 24-hours) to the permitting authority of any releases from the sanitary sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].		F027S
Failure to submit a noncompliance report (within 5-days) to the permitting authority that provides details of the one or more releases from the sanitary sewer system that may endanger health or the environment [40 CFR 122.41(I)(6)].	This violation code will be generated if the inspector identifies that the permittee has failed to submit one or more Sewer Overflow/Bypass Event Report as required by the permit.	F028S
Failure to submit a noncompliance report (within reporting frequency set forth in the permit) to the permitting authority that provides details of the one or more releases from the sanitary sewer system that do not endanger health or the environment [40 CFR 122.41(I)(7)].	This violation code will be generated if the inspector identifies that the permittee has failed to submit one or more Sewer Overflow/Bypass Event Report as required by the permit. The permittee shall report all instances of noncompliance not reported under paragraphs (I)(4), (5), and (6) of this section, at the time monitoring reports are submitted.	F029S

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Failure to submit sanitary sewer overflow information to the permitting authority as required by either the permit or enforcement order (Not Related to Sewer Overflow/Bypass Event Report or DMR).		F030S
Failure to comply to provide information regarding the sanitary sewer system or releases from a sanitary sewer system in accordance with a CWA Section 308 information collection request.		F031S
Failure to submit required permit application information regarding the sanitary sewer system or releases from a sanitary sewer system (includes co-permittee satellite systems).		F032S
Failure to comply with recordkeeping requirements related to a sanitary sewer system or releases from a sanitary sewer system as required by either the permit or enforcement order [40 CFR 122.41(j)].		F033S
Discharge from a sanitary sewer system to waters of the U.S. without NPDES permit coverage (includes co-permittee satellite systems).	This code should only be used when F024S does not apply.	F034S
Other noncompliance related to a sanitary sewer system or releases from a sanitary sewer system (e.g., violation of permit requirement, enforcement order, or sewer moratorium).		F035S
Bypass Events		

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Failure to take all reasonable steps to minimize or prevent an unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] to waters of the U.S.	For purposes of reporting, 'Allowable Bypasses' are discharges of sewage or sewage mixtures (e.g., sewage and stormwater) that are unavoidable with no feasible alternatives and the permittee completes the reporting requirements [permittee submits notice to permitting authority 10 days prior to anticipated bypass, permittee submits notice to permitting authority within 5 days from when the permittee becomes aware of the unanticipated bypass]. The permitting authority may approve an anticipated bypass, after considering its adverse effects. See 40 CFR 122.41(m). All other bypasses of sewage or sewage mixtures are 'Prohibited Bypasses.' EPA and states will review anticipated bypass events reported on the 'Sewer Overflow/Bypass Event Reports', sent at least 10 days prior to the planned discharge, to determine if these events should be allowed.	F036S
Failure to take all reasonable steps to minimize or prevent an unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] but not to waters of the U.S.	For purposes of reporting, 'Allowable Bypasses' are discharges of sewage or sewage mixtures (e.g., sewage and stormwater) that are unavoidable with no feasible alternatives and the permittee completes the reporting requirements [permittee submits notice to permitting authority 10 days prior to anticipated bypass, permittee submits notice to permitting authority within 5 days from when the permittee becomes aware of the unanticipated bypass]. The permitting authority may approve an anticipated bypass, after considering its adverse effects. See 40 CFR 122.41(m). All other bypasses of sewage or sewage mixtures are 'Prohibited Bypasses.' EPA and states will review anticipated bypass events reported on the 'Sewer Overflow/Bypass Event Reports', sent at least 10 days prior to the planned discharge, to determine if these events should be allowed.	F037S
Failure to properly operate and maintain the sewer system as required by the permit, enforcement order, or approved LTCP [40 CFR 122.41(e)], which results in an unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)].	Silvata de allowea.	F038S

Violation Description	Notes	Recommended Violation Code (EPA/State Inspections)
Failure to provide immediate notice (within 24-hours) to the permitting authority of any unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] that may endanger health or the environment [40 CFR 122.41(l)(6) and (m)(3)(ii)].		F039S
Failure to submit report (within 5-days) to the permitting authority of any unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)] that may endanger health or the environment [40 CFR 122.41(I)(6) and (m)(3)(ii)].	These reports will be made through submission of the Sewer Overflow/Bypass Event Report. This violation code will be generated if the permittee fails to file this report within 5-days of the unanticipated prohibited bypass [per 40 CFR 122.41(m)(3)(ii)].	F040S
Failure to submit a noncompliance report (within reporting frequency set forth in the permit) to the permitting authority that provides details of the one or more unanticipated prohibited bypasses [per 40 CFR 122.41(m)(3)(ii)] that do not endanger health or the environment [40 CFR 122.41(l)(7) and (m)(3)(ii)].	These reports will be made through submission of the Sewer Overflow/Bypass Event Report. This violation code will be generated if the permittee fails to file this report within the frequency set by the authorized NPDES program [per 40 CFR 122.41(I)(7) and (m)(3)(ii)].	F041S
Failure to submit notice (10-days prior to anticipated bypass) to the permitting authority of an anticipated bypass [40 CFR 122.41(m)(3)(i)].	These notices will be made through submission of the Sewer Overflow/Bypass Event Report. This violation code will be generated if the permittee fails to file this report 10-days prior to the anticipated bypass.	F042S
Failure to submit bypass information to the permitting authority as required by the permit or enforcement order (Not Related to Sewer Overflow/Bypass Event Report).		F043S
Failure to comply to provide information regarding bypasses in accordance with a CWA Section 308 information collection request.		F044S
Failure to submit required permit application information regarding bypasses (includes co-permittee satellite systems).		F045S
Failure to comply with recordkeeping requirements related to bypasses as required by either the permit or enforcement order [40 CFR 122.41(j)].		F046S
Bypass discharge to waters of the U.S. without NPDES permit coverage (includes co-permittee satellite systems).	This code should only be used when F036S does not apply.	F047S
Other noncompliance related to bypasses (e.g., violation of permit requirement, enforcement order, or sewer moratorium).		F048S

### Noncompliance Reported by Permittee

As described in this paper, permittees are required to report noncompliance to their permitting authority. Noncompliance that is reported on the on "Sewer Overflow/Bypass Event Report" or the DMR will automatically generate a violation code that starts with "R" and end with an "S" as shown in the table below. Regulatory authorities that initially receive these data will share these violation data with EPA's national NPDES data system (ICIS-NPDES) in a timely fashion (within 40 days of receipt of the report from the permittee).

Violation Description	Recommended Violation Code Description	Business Rules for violation determinations based on Sewer Overflow/Bypass Event Report and DMR Submissions
Combined Sewer Systems		
Wet-weather CSO discharge to waters of the U.S. that may "endanger health or the environment"	R001S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".
Wet-weather CSO, no discharge to waters of the U.S., that may "endanger health or the environment"	R002S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "No".
Dry-weather CSO discharge to waters of the U.S. that may "endanger health or the environment"	R003S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".
Dry-weather CSO, no discharge to waters of the U.S., that may "endanger health or the environment"	R004S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "No".

Violation Description	Recommended Violation Code Description	Business Rules for violation determinations based on Sewer Overflow/Bypass Event Report and DMR Submissions
Wet-weather CSO discharge to waters of the U.S. that are not compliant with permit requirements but do not "endanger health or the environment"	R005S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes". Some permitting authorities allow permittees to report this type of noncompliance on the DMR. This violation code will be generated with the permittee reports a value for the "Type of Potential Impact of Sewer Overflow/Bypass" parameter on the DMR.
Wet-weather CSO, no discharge to waters of the U.S., that are not compliant with permit requirements but do not "endanger health or the environment"	R006S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "No".
Dry-weather CSO discharge to waters of the U.S. that are not compliant with permit requirements but do not "endanger health or the environment"	R007S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".
Dry-weather CSO, no discharge to waters of the U.S., that are not compliant with permit requirements but do not "endanger health or the environment"	R008S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = CSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "No".
Failure to submit report (within 5-days) to the permitting authority of any CSOs that may endanger health or the environment [40 CFR 122.41(I)(6)]	R009S	"Program Report Received Date" is 5-days or more after the "End Date of the Reporting Period" or the "Program Report Received Date" is 5-days or more after the "Approx. End Time and Date of Sewer Overflow/Bypass" for any one "Sewer Overflow/Bypass Unique Identifier". Sewer Overflow/Bypass Category = CSO.

Violation Description	Recommended Violation Code Description	Business Rules for violation determinations based on Sewer Overflow/Bypass Event Report and DMR Submissions		
Separate Sewer Systems				
Wet-weather SSO discharge to waters of the U.S. that may "endanger health or the environment"	R010S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".		
Wet-weather SSO, no discharge to waters of the U.S., that may "endanger health or the environment"	R011S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "No".		
Dry-weather SSO discharge to waters of the U.S. that may "endanger health or the environment"	R012S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".		
Dry-weather SSO, no discharge to waters of the U.S., that may "endanger health or the environment"	R013S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "No".		
Wet-weather SSO discharge to waters of the U.S. that are not compliant with permit requirements but do not "endanger health or the environment"	R014S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".		
Wet-weather SSO, no discharge to waters of the U.S., that are not compliant with permit requirements but do not "endanger health or the environment"	R015S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "No".		

Violation Description	Recommended Violation Code Description	Business Rules for violation determinations based on Sewer Overflow/Bypass Event Report and DMR Submissions
Dry-weather SSO discharge to waters of the U.S. that are not compliant with permit requirements but do not "endanger health or the environment"	R016S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".
Dry-weather SSO, no discharge to waters of the U.S., that are not compliant with permit requirements but do not "endanger health or the environment"	R017S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = SSO; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "No".
Failure to submit report (within 5-days) to the permitting authority of any SSOs that may endanger health or the environment [40 CFR 122.41(I)(6)]	R018S	"Program Report Received Date" is 5-days or more after the "End Date of the Reporting Period" or the "Program Report Received Date" is 5-days or more after the "Approx. End Time and Date of Sewer Overflow/Bypass" for any one "Sewer Overflow/Bypass Unique Identifier". Sewer Overflow/Bypass Category = SSO.
Bypass Events		
Anticipated prohibited bypass discharge to waters of the U.S wet weather	R019S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 3 (10-day anticipated bypass reporting); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".
Anticipated prohibited bypass discharge to waters of the U.S dry weather	R020S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 3 (10-day anticipated bypass reporting); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".
Unanticipated prohibited bypass discharge to waters of the U.S. that may "endanger health or the environment" - wet weather	R021S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".

Violation Description	Recommended Violation Code Description	Business Rules for violation determinations based on Sewer Overflow/Bypass Event Report and DMR Submissions
Unanticipated prohibited bypass discharge to waters of the U.S. that may "endanger health or the environment" - dry weather	R022S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 1 (5-day reporting for noncompliance that may endanger health or the environment); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".
Unanticipated bypass discharge to waters of the U.S. that are not compliant with permit requirements but do not "endanger health or the environment" - wet weather	R023S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".
Unanticipated bypass discharge to waters of the U.S. that are not compliant with permit requirements but do not "endanger health or the environment" - dry weather	R024S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 2 (Other noncompliance reporting); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Dry; and Discharge to Waters of the U.S. = "Yes".
Failure to submit report (within 10-days of planned bypass) to the permitting authority of any anticipated bypass [40 CFR 122.41(m)(3)(ii)]	R025S	"Program Report Received Date" is fewer than 10-days prior to the 'Start Date of the Reporting Period' or the 'Program Report Received Date' is fewer than 10-days prior to the 'Approx. Start time and date of Sewer Overflow/Bypass' for any one individual bypass event. This applies to both 'Allowable Bypass' and 'Prohibited Bypass' types.
Failure to submit report (within 5-days) to the permitting authority of any unanticipated bypass that may endanger health or the environment [40 CFR 122.41(m)(3)(ii) & 40 CFR 122.41(l)(6)]	R026S	"Program Report Received Date" is 5-days or more after the "End Date of the Reporting Period" or the "Program Report Received Date" is 5-days or more after the "Approx. End Time and Date of Sewer Overflow/Bypass" for any one "Sewer Overflow/Bypass Unique Identifier". This applies to both 'Allowable Bypass' and 'Prohibited Bypass' types.
Anticipated prohibited bypass discharge to waters of the U.S wet weather	R027S	This violation will be generated when: Sewer Overflow/Bypass Reporting Requirement = 3 (10-day anticipated bypass reporting); Sewer Overflow/Bypass Category = Prohibited Bypass; Type of Sewer Overflow/Bypass by Weather = Wet; and Discharge to Waters of the U.S. = "Yes".