pennsylvania
DEPARTMENT OF ENVIRONMENTAL PROTECTION

Northcentral Regional Office
CLEAN WATER PROGRAM

Application Type	**Renewal**	Application No.	**PA0233692**
Facility Type	**Municipal**	APS ID	**1007853**
Major / Minor	**Minor**	Authorization ID	**1299120**

NPDES PERMIT FACT SHEET
INDIVIDUAL SEWAGE

Applicant and Facility Information

Applicant Name	**South Creek Township**	Facility Name	**South Creek Township WWTP**
Applicant Address	PO Box 60	Facility Address	Walsh Lane
	Gillett, PA 16925-0060		Fassett, PA 16925
Applicant Contact	Charles Root	Facility Contact	Charles Root
Applicant Phone	(570) 529-3542	Facility Phone	(570) 529-3542
Client ID	72922	Site ID	671451
Ch 94 Load Status	Not Overloaded	Municipality	South Creek Township
Connection Status	No Limitations	County	Bradford
Date Application Received	December 10, 2019	EPA Waived?	Yes
Date Application Accepted	December 19, 2019	If No, Reason	

Purpose of Application: Application for the renewal of the existing individual NPDES permit.

Summary of Review

South Creek Township has submitted an application for the renewal of the existing NPDES Permit PA0233692 for the Department's review. DEP will publish notice of the receipt of the NPDES permit application and a tentative decision to issue the individual NPDES permit in the *Pennsylvania Bulletin* in accordance with 25 Pa. Code § 92a.82. Upon publication in the *Pennsylvania Bulletin*, DEP will accept written comments from interested persons for a 30-day period (which may be extended for one additional 15-day period at DEP's discretion), which will be considered in making a final decision on the application. Any person may request or petition for a public hearing with respect to the application. A public hearing may be held if DEP determines that there is significant public interest in holding a hearing. If a hearing is held, notice of the hearing will be published in the *Pennsylvania Bulletin* at least 30 days prior to the hearing and in at least one newspaper of general circulation within the geographical area of the discharge.

Approve	Deny	Signatures	Date
X		/s/ Jonathan P. Peterman Jonathan P. Peterman / Project Manager	March 18, 2020
X		/s/ Nicholas W. Hartranft Nicholas W. Hartranft, P.E. / Environmental Engineer Manager	March 20, 2020

Discharge, Receiving Waters and Water Supply Information

Outfall No.	001	Design Flow (MGD)	0.025
Latitude	41º 57' 19.53"	Longitude	-76º 47' 30.42"
Quad Name		Quad Code	
Wastewater Description:	Sewage Effluent		
Receiving Waters	South Creek (CWF)	Stream Code	30922
NHD Com ID	48523708	RMI	6.0
Drainage Area	22.37	Yield (cfs/mi^2)	0.00082
Q_{7-10} Flow (cfs)	0.1834	Q_{7-10} Basis	Stream No. 1516500
Elevation (ft)	1116	Slope (ft/ft)	0.0001
Watershed No.	4-B	Chapter 93 Class.	CWF
Existing Use	CWF	Existing Use Qualifier	N/A
Exceptions to Use	None.	Exceptions to Criteria	N/A
Assessment Status	Attaining Use(s)		
Cause(s) of Impairment	N/A		
Source(s) of Impairment	N/A		
TMDL Status	N/A	Name	N/A
Nearest Downstream Public Water Supply Intake	Assumed at NY Border		
PWS Waters	South Creek	Flow at Intake (cfs)	0.2725
PWS RMI	1.0	Distance from Outfall (mi)	1.0

Changes Since Last Permit Issuance: The updated Q_{7-10} data was obtained from the updated stream gage information obtained from *Stuckey, M.H., and Roland, M.A., 2011, Selected Streamflow Statistics for Streamgage Locations In and Near Pennsylvania*. A comparative stream analysis was previously conducted to determine a comparative stream gage (1516500) based on basin characteristics. The Q_{7-10} calculations, which are attached in Appendix A, indicate that the Q_{7-10} is 0.18 cfs in lieu of 0.21 cfs that was used in previous reviews.
Other Comments: None.

TMDL Impairment

The Departments Geographical Information System indicates that South Creek is attaining its use and there are no associated TMDLs for this segment.

Chesapeake Bay Requirements

In accordance with the Wastewater Supplement to Phase II WIP, a review of the existing caps loads indicated that the previous permit included Total Nitrogen and Total Phosphorus offsets in the cap load. For new Phase 5 sewage discharges, there is no anticipated capacity available in the aggregate WLAs. Therefore, DEP will issue new permits containing Cap Loads of “0” and these new facilities will be expected to purchase credits and/or apply offsets to achieve compliance, with the exception of small flow and single residence facilities. Given that offsets can only be used for compliance and cannot be used for nutrient trading, and in accordance with the Phase II WIP the offsets will be removed from the cap load and recognized in a footnote included in Part A of the permit.

The limitations and monitoring requirements specified below are proposed for the draft permit, to comply with Pennsylvania's Chesapeake Bay Tributary Strategy:

Outfall 001, Effective Period: Permit Effective Date through Permit Expiration Date

Discharge Parameter	Effluent Limitations					Monitoring Requirements	
	Mass Units (lbs/day)		Concentrations (mg/L)			Minimum Measurement Frequency	Required Sample Type
	Monthly	Annual	Minimum	Monthly Average	Maximum		
Ammonia---N	Report	Report		Report		2/month	Grab
Kjeldahl---N	Report			Report		2/month	Grab
Nitrate-Nitrite as N	Report			Report		2/month	Grab
Total Nitrogen	Report	Report		Report		1/month	Calculation
Total Phosphorus	Report	Report		Report		2/month	Grab
Net Total Nitrogen	Report	0*				1/month	Calculation
Net Total Phosphorus	Report	0**				1/month	Calculation

*TN (Offset) = 2,450 lb/yr
**TP (Offset) = 151 lb/yr

Anti-Backsliding

In accordance with 40 CFR 122.44(l)(1) and (2), this permit does not contain effluent limitations, standards, or conditions that are less stringent than the previous permit.

Treatment Facility Summary

Treatment Facility Name: South Creek Township Wastewater Treatment Plant
Tributary Sewer System Information: The South Creek Township Wastewater Treatment Plant serves the flows from the village of Fassett located in South Creek Township.

WQM Permit No.	Issuance Date
0807401	11/21/2007
0808402	07/15/2009

Waste Type	Degree of Treatment	Process Type	Disinfection	Avg Annual Flow (MGD)
Sewage	Secondary	Extended Aeration	Chlorine with Dechlorination	0.025
Hydraulic Capacity (MGD)	**Organic Capacity (lbs/day)**	**Load Status**	**Biosolids Treatment**	**Biosolids Use/Disposal**
0.025	46	Not Overloaded	Aerobic Digestion	Landfill

Treatment System Components for Outfall 001:
- One (1) Communitor with barscreen.
- One (1) Equalization Tank.
- One (1) Distribution Box.
- One (1) Anoxic Tank.
- Three (3) Extended Aeration Tanks.
- One (1) Clarifier.
- One (1) Tablet Erosion Chlorine Disinfection System.
- One (1) Chlorine Contact Tank.
- One (1) Tablet Erosion Dechlorination System.
- One (1) Polishing Clarifier.
- One (1) Flow Meter.
- One (1) Outfall 001.
- One (1) Post Aeration Tank.
- Two (2) Aerobic Digesters.

Changes Since Last Permit Issuance: None.
Other Comments: None.

Existing Effluent Limitations and Monitoring Requirements

Existing Limits

Discharge Parameter	Limitations							
	Mass (lb/day)		Concentration (mg/L)				Monitoring Requirements	
	Monthly Average	Daily Maximum	Minimum	Average Monthly	Average Weekly	Instantaneous Maximum	Minimum Frequency	Sample Type
Flow (MGD)	Report	Report					Continuous	Meter
C-BOD_5	5.0	8.0		25	40	50	2/ Month	Grab
BOD_5 Raw Sewage Influent	Report	Report		Report			2/ Month	Grab
TSS	6.0	9.0		30	45	60	2/ Month	Grab
TSS Raw Sewage Influent	Report	Report		Report			2/ Month	Grab
TRC				0.5		1.1	1/ Day	Grab
pH (Std. Units)			6.0			9.0	1/ Day	Grab
D.O.			4.0				1/ Day	Grab
NH_3-N (5/1–10/31)	2.5			12		24	2/ Month	Grab
NH_3-N (11/1-4/30)				Report		Report		
Fecal Coliforms (5/1-9/30)	200 colonies/100 ml as a geometric mean					1,000	2/ Month	Grab
Fecal Coliforms (10/1-4/30)	2,000 colonies/100 ml as a geometric mean					10,000		

*The existing effluent limits for Outfall 001 were based on a design flow of 0.025 MGD.

Development of Effluent Limitations

Outfall No. 001 **Design Flow (MGD)** 0.025
Latitude 41º 59' 16.12" **Longitude** -76º 46' 24.78"
Wastewater Description: Sewage Effluent

Technology-Based Limitations

The following technology-based limitations apply, subject to water quality analysis and BPJ where applicable:

Pollutant	Limit (mg/l)	SBC	Federal Regulation	State Regulation
$CBOD_5$	25	Average Monthly	133.102(a)(4)(i)	92a.47(a)(1)
	40	Average Weekly	133.102(a)(4)(ii)	92a.47(a)(2)
Total Suspended Solids	30	Average Monthly	133.102(b)(1)	92a.47(a)(1)
	45	Average Weekly	133.102(b)(2)	92a.47(a)(2)
pH	6.0 – 9.0 S.U.	Min – Max	133.102(c)	95.2(1)
Fecal Coliform (5/1 – 9/30)	200 / 100 ml	Geo Mean	-	92a.47(a)(4)
Fecal Coliform (5/1 – 9/30)	1,000 / 100 ml	IMAX	-	92a.47(a)(4)
Fecal Coliform (10/1 – 4/30)	2,000 / 100 ml	Geo Mean	-	92a.47(a)(5)
Fecal Coliform (10/1 – 4/30)	10,000 / 100 ml	IMAX	-	92a.47(a)(5)
Total Residual Chlorine	0.5	Average Monthly	-	92a.48(b)(2)

Water Quality-Based Limitations

To establish whether or not water-quality based effluent limitations (WQBELs) are required, the Department models in-stream conditions. In order to determine limitations for CBOD5, ammonia-N and dissolved oxygen, the Department utilizes the WQM 7.0 v1.0b model and in order to determine limitations for toxics, the Department utilizes the PENTOXSD v2.0d model.

WQM 7.0 for Windows, Version 1.0b, Wasteload Allocation Program for Dissolved Oxygen and Ammonia Nitrogen
Since there have been no changes to the watershed or the facility, the previous modeling results shall be utilized. The model was previously run using the Q7-10 stream flow, background water quality, average annual design flow, and other discharge characteristics. The existing technology based effluent limits for $CBOD_5$ (25 mg/l) and existing water quality-based effluent limits for NH3-N (25 mg/l; BPJ) were used as inputs for the modeling. The DO minimum daily average criterion from §93.7 (6.0 mg/L for CWF) was used for the in-stream objective for the model. The summary of the output is as follows:

Parameter	Effluent Limit		
	30 Day Average	Maximum	Minimum
CBOD5	25	N/A	N/A
Ammonia-N	12	24	N/A
Dissolved Oxygen	N/A	N/A	3

The previous model did not recommend water-quality based effluent limitations with regards to CBOD5 and dissolved oxygen. However, the model did recommend water quality-based effluent limits for ammonia-nitrogen as shown above. These effluent limits were previously implemented and will remain. Refer to Appendix B for the WQM 7.0 inputs and results.

PENTOXSD v2.0d model / Reasonable Potential Analysis
A “Reasonable Potential Analysis” and PENTOXSD v2.0d modeling were not utilized in this review.

Best Professional Judgement (BPJ) Limitations

See Dissolved Oxygen section below.
Comments: None.

Additional Considerations
None

Proposed Effluent Limitations and Monitoring Requirements

The limitations and monitoring requirements specified below are proposed for the draft permit, and reflect the most stringent limitations amongst the abovementioned technology, water quality, and BPJ. Instantaneous Maximum (IMAX) limits are determined using multipliers of 2 (conventional pollutants) or 2.5 (toxic pollutants). Sample frequencies and types are derived from the "NPDES Permit Writer's Manual" (362-0400-001) and/or BPJ.

Proposed Limits - Outfall 001, Effective Period: Permit Effective Date through Permit Expiration Date

Discharge Parameter	Limitations							
	Mass (lb/day)		Concentration (mg/L)				Monitoring Requirements	
	Monthly Average	Daily Maximum	Minimum	Average Monthly	Average Weekly	Instantaneous Maximum	Minimum Frequency	Sample Type
Flow (MGD)	Report	Report					Continuous	Meter
C-BOD_5	5.0	8.0		25	40	50	2/ Month	Grab
BOD_5 Raw Sewage Influent	Report	Report		Report			2/ Month	Grab
TSS	6.0	9.0		30	45	60	2/ Month	Grab
TSS Raw Sewage Influent	Report	Report		Report			2/ Month	Grab
TRC				0.5		1.1	1/ Day	Grab
pH (Std. Units)			6.0			9.0	1/ Day	Grab
D.O.			4.0				1/ Day	Grab
NH_3-N (5/1–10/31)	2.5			12		24	2/ Month	Grab
NH_3-N (11/1-4/30)				Report		Report		
Fecal Coliforms (5/1-9/30)	200 colonies/100 ml as a geometric mean					1,000	2/ Month	Grab
Fecal Coliforms (10/1-4/30)	2,000 colonies/100 ml as a geometric mean					10,000		

*The proposed effluent limits for Outfall 001 were based on a design flow of 0.025 MGD.

Effluent Limit Determination for Outfall 001

General Information
All of the limits proposed above are consistent with other permits issued for Phase V wastewater treatment plants in the region. The associated mass-based limits (lbs/day) for all parameters were based on the formula: design flow (average annual) (MGD) x concentration limit (mg/L) at design flow x conversion factor (8.34). All effluent limits were then rounded down in accordance with the rounding rules established in the *Technical Guidance for the Development and Specification of Effluent Limitations (362-0400-001)*, Chapter 5 - Specifying Effluent Limitations in NPDES Permits. The existing monitoring frequencies and sample types for these parameters generally correspond with the *Technical Guidance for the Development and Specification of Effluent Limitations* (362-0400-001) Table 6-3 and will remain.

Flow
The existing monitoring frequency (Continuous) and sample type (Meter) for Flow correspond with the *Technical Guidance for the Development and Specification of Effluent Limitations* (362-0400-001) Table 6-3.

Carbonaceous Biochemical Oxygen Demand ($CBOD_5$)
The results of the WQM 7.0 model show that the previously applied secondary treatment standards (25 PA Code §92a.47 (a) (1&2)) for $CBOD_5$ are protective of water quality.

Total Suspended Solids (TSS)
The previously applied technology based secondary treatment standards (25 PA Code §92a.47 (a) (1&2)) for TSS will remain as well.

pH
CFR Title 40 §133.102(c) and 25 PA Code §95.2(1) provide the basis of effluent limitations for pH.

Fecal Coliforms
The existing fecal coliform limits with I-max limits were updated from the previous Chapter 92 code to correspond with what is specified in the updated 25 PA Code § 92a.47 (a)(4)&(5).

Total Residual Chlorine (TRC)
A TRC model evaluation was conducted by using the technology-based effluent limitations recommended as input. (See the Appendix for the spreadsheet results.) In accordance with 25 Pa. Code § 92a.48(b)(2), a value of 0.5 mg/l (which was also the existing limit) was used in the evaluation. The attached TRC model indicates that the existing water quality-based effluent limits are still protective of water quality and will remain.

Ammonia-Nitrogen (NH3-N)
WQM 7.0 modeling results for summer indicates that the existing average monthly limit of 12 mg/L is acceptable. A year-round monitoring requirement for ammonia-nitrogen will be maintained from the previous permit.

Dissolved Oxygen (DO)
A minimum Dissolved Oxygen (DO) standard in Chapter 93 for cold water fishes of 4.0 mg/L will be established as a minimum BPJ limit. Discharges of concentrations less than this value have the potential to create localized areas of DO concentrations below criteria.

Influent BOD_5 and TSS
The Department requires the reporting of raw sewage influent monitoring for BOD_5 and TSS in all POTW permits. This provides the Department with the ability to monitor the percent removal of each parameter as stipulated in section 2 of the Part A conditions and maintain records of the BOD_5 loading as required by 25 Pa. Code Chapter 94. The monitoring frequencies and sample types are identical to the effluent sampling.

Compliance History

Summary of Inspections -The last inspection of the facility was conducted by the Department on 10/16/2019. The inspection report noted the effluent violations listed below, the permit renewal application submission was late, and indicated that the facility was operating properly.
WMS Query Summary - A WMS Query was run at *Reports - Violations & Enforcements – Open Violations for Client Report* to determine whether there are any unresolved violations associated with the client that will affect issuance of the permit (per CSL Section 609). This query revealed no open violations.
eDMRs Summary - Upon review of the eDMR results (See list of violations below), the facility has violations (Fecal Coliforms) over the previous permit term.

Attachments

Appendices

Compliance History

DMR Data for Outfall 001 (from February 1, 2019 to January 31, 2020)

Parameter	JAN-20	DEC-19	NOV-19	OCT-19	SEP-19	AUG-19	JUL-19	JUN-19	MAY-19	APR-19	MAR-19	FEB-19
Flow (MGD) Average Monthly	0.004	0.005	0.0030	0.005	0.006	0.008	0.007	0.008	0.009	0.008	0.006	0.0045
Flow (MGD) Daily Maximum	0.0106	0.01	0.0058	0.0161	0.0097	0.0177	0.0118	0.0159	0.0177	0.0150	0.0113	0.0085
pH (S.U.) Minimum	7.7	7.5	7.6	7.7	7.4	7.8	7.6	7.3	7.8	7.6	7.6	7.5
pH (S.U.) Maximum	8.1	8.1	8.2	8.0	8.1	8.1	8.0	8.2	8.0	8.1	8.2	8.1
DO (mg/L) Minimum	11.27	11.03	9.93	9.13	9.01	8.71	8.55	8.39	9.47	10.32	11.25	11.26
TRC (mg/L) Average Monthly	0.16	0.21	0.24	0.25	0.22	0.26	0.24	0.27	0.30	0.27	0.18	0.10
TRC (mg/L) Instantaneous Maximum	0.71	0.63	0.70	0.76	0.79	0.71	0.98	0.98	0.85	0.93	0.70	0.33
CBOD5 (lbs/day) Average Monthly	0.12	0.14	0.16	0.07	0.11	0.28	0.21	0.20	0.18	0.46	0.15	0.12
CBOD5 (lbs/day) Raw Sewage Influent Average Monthly	199.5	8.22	6.90	4.53	13.90	16.95	19.96	13.04	11.93	16.39	9.45	7.49
CBOD5 (lbs/day) Daily Maximum	0.13	0.17	0.18	0.07	0.12	0.41	0.25	0.26	0.19	0.69	0.17	0.12
CBOD5 (lbs/day) Raw Sewage Influent Daily Maximum	202	8.51	9.69	4.60	17.05	20.37	20.06	15.15	12.17	25.65	10.53	7.81
CBOD5 (mg/L) Average Monthly	3.10	3.85	4.45	3	3.05	3.5	3	3	3	5.25	3.45	3
CBOD5 (mg/L) Raw Sewage Influent Average Monthly	7.91	227	222	187	370	263.5	294	205.5	197.5	177.5	239	195
CBOD5 (mg/L) Weekly Average	3.10	3.85	4.45	3	3.05	3.5	3	3	3	5.25	3.45	3
TSS (lbs/day) Average Monthly	0.235	0.36	0.18	0.12	0.19	0.38	0.35	0.33	0.30	0.26	0.30	0.20

TSS (lbs/day) Raw Sewage Influent Average Monthly	181	8.20	6.52	3.47	10.30	12.95	24.23	6.88	9.66	18.75	10.16	5.62
TSS (lbs/day) Daily Maximum	0.25	0.54	0.23	0.12	0.20	0.51	0.41	0.44	0.32	0.38	0.32	0.20
TSS (lbs/day) Raw Sewage Influent Daily Maximum	232	9.04	9.96	4.01	15.83	13.53	32.28	6.92	10.07	33.15	15.13	5.76
TSS (mg/L) Average Monthly	6	9.75	5	5	5	5	5	5	5	3	7	5.25
TSS (mg/L) Raw Sewage Influent Average Monthly	6.98	227	215	143.5	291	186	378.5	114	160.5	178.15	223	147
TSS (mg/L) Weekly Average	6	9.75	5	5	5	5	5	5	5	3	7	5.5
Fecal Coliform (CFU/100 ml) Geometric Mean	279.6	519	74	5	18	341	72	4	29	382	2192	1939
Fecal Coliform (CFU/100 ml) Instantaneous Maximum	2419.6	2419.6	83.6	5.2	78.9	2419.6	73.8	4.1	115.3	816.4	2419.6	2419.6
Nitrate-Nitrite (mg/L) Average Monthly	24	28.6	30.20	30.5	39	32.5	36.7	19	19.4	17.5	17.4	19.2
Nitrate-Nitrite (lbs) Total Monthly	29.3	31.9	31	22.9	43.4	75.6	78.9	34.3	35.9	43.6	23.7	20.4
Total Nitrogen (mg/L) Average Monthly	25.88	30.57	32.28	32.26	40.14	33.83	37.77	20.31	20.86	19.75	19.19	20.98
Total Nitrogen (lbs) Effluent Net Total Monthly	31.6	34.2	33	24.2	44.7	78.9	81.4	37	38.6	49.9	26.2	22.4
Total Nitrogen (lbs) Total Monthly	31.6	34.2	33	24.2	44.7	78.9	81.4	37	38.6	49.9	26.2	22.4
Total Nitrogen (lbs) Effluent Net Total Annual					00							
Total Nitrogen (lbs) Total Annual					552							
Ammonia (lbs/day) Average Monthly	0.3	0.1	0.23	0.3	0.3	0.6	0.4	0.6	0.3	0.3	0.3	0.1
Ammonia (mg/L) Average Monthly	0.21	0.12	0.21	0.4	0.242	0.255	0.19	0.26	0.16	0.1	0.22	0.11

Ammonia (lbs) Total Monthly	0.3	0.1	0.23	0.3	0.3	0.26	0.4	0.6	0.3	0.3	0.3	0.1
Ammonia (lbs) Total Annual					6							
TKN (mg/L) Average Monthly	1.88	2.02	2.08	1.76	1.191	1.38	1.12	1.31	1.46	2.25	1.79	1.83
TKN (lbs) Total Monthly	2.3	2.3	2	1.3	1.3	3.3	2.5	2.7	2.7	6.4	2.4	1.9
Total Phosphorus (mg/L) Average Monthly	3.77	5.32	6.11	6.53	7.22	6.41	6.02	4.59	3.16	3.05	3.33	3.08
Total Phosphorus (lbs) Effluent Net Total Monthly	4.6	6	7	4.9	8	15.5	13.3	8.5	5.8	7.3	4.8	3.3
Total Phosphorus (lbs) Total Monthly	4.6	6	7	4.9	8	15.5	13.3	8.5	5.8	7.3	4.8	3.3
Total Phosphorus (lbs) Effluent Net Total Annual					00							
Total Phosphorus (lbs) Total Annual					99							

Effluent Violations for Outfall 001, from: March 1, 2019 To: January 31, 2020

Parameter	Date	SBC	DMR Value	Units	Limit Value	Units
Fecal Coliform	03/31/19	Geo Mean	2192	CFU/100 ml	2000	CFU/100 ml
Fecal Coliform	08/31/19	Geo Mean	341	CFU/100 ml	200	CFU/100 ml
Fecal Coliform	08/31/19	IMAX	2419.6	CFU/100 ml	1000	CFU/100 ml

Tools and References Used to Develop Permit	
☒	Q7-10 Analysis and Stream Data (see Appendix **A**)
☒	WQM 7.0 Model Input/Output (see Appendix **B**)
☐	Toxics Screening Analysis v2.4 (see Appendix)
☐	PENTOXSD v2.0d Model Input/Output (see Appendix)
☒	Facility Map and Schematic (see Appendix **D**)
☒	TRC Evaluation Spreadsheet (see Appendix **C**)
☐	Lake Model Output (see Appendix)
☐	WETT Spreadsheet (see Appendix)
☒	Water Quality Toxics Management Strategy, 361-0100-003, 4/06.
☒	Technical Guidance for the Development and Specification of Effluent Limitations, 362-0400-001, 10/97.
☐	Policy for Permitting Surface Water Diversions, 362-2000-003, 3/98.
☐	Policy for Conducting Technical Reviews of Minor NPDES Renewal Applications, 362-2000-008, 11/96.
☐	Technology-Based Control Requirements for Water Treatment Plant Wastes, 362-2183-003, 10/97.
☐	Technical Guidance for Development of NPDES Permit Requirements Steam Electric Industry, 362-2183-004, 12/97.
☐	Pennsylvania CSO Policy, 385-2000-011, 9/08.
☐	Water Quality Antidegradation Implementation Guidance, 391-0300-002, 11/03.
☐	Implementation Guidance Evaluation & Process Thermal Discharge (316(a)) Federal Water Pollution Act, 391-2000-002, 4/97.
☒	Determining Water Quality-Based Effluent Limits, 391-2000-003, 12/97.
☐	Implementation Guidance Design Conditions, 391-2000-006, 9/97.
☒	Technical Reference Guide (TRG) WQM 7.0 for Windows, Wasteload Allocation Program for Dissolved Oxygen and Ammonia Nitrogen, Version 1.0, 391-2000-007, 6/2004.
☐	Interim Method for the Sampling and Analysis of Osmotic Pressure on Streams, Brines, and Industrial Discharges, 391-2000-008, 10/1997.
☐	Implementation Guidance for Section 95.6 Management of Point Source Phosphorus Discharges to Lakes, Ponds, and Impoundments, 391-2000-010, 3/99.
☐	Technical Reference Guide (TRG) PENTOXSD for Windows, PA Single Discharge Wasteload Allocation Program for Toxics, Version 2.0, 391-2000-011, 5/2004.
☒	Implementation Guidance for Section 93.7 Ammonia Criteria, 391-2000-013, 11/97.
☐	Policy and Procedure for Evaluating Wastewater Discharges to Intermittent and Ephemeral Streams, Drainage Channels and Swales, and Storm Sewers, 391-2000-014, 4/2008.
☒	Implementation Guidance Total Residual Chlorine (TRC) Regulation, 391-2000-015, 11/1994.
☐	Implementation Guidance for Temperature Criteria, 391-2000-017, 4/09.
☐	Implementation Guidance for Section 95.9 Phosphorus Discharges to Free Flowing Streams, 391-2000-018, 10/97.
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