STATE OF NORTH CAROLINA
DEPARTMENT OF ENVIRONMENTAL QUALITY
DIVISION OF WATER RESOURCES

PERMIT

TO DISCHARGE WASTEWATER UNDER THE

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

In compliance with the provisions of North Carolina General Statute 143-215.1, other lawful standards and regulations promulgated and adopted by the North Carolina Environmental Management Commission, and the Federal Water Pollution Control Act, as amended,

Duke Energy Progress, LLC

is hereby authorized to discharge wastewater from a facility located at the

Asheville Steam Electric Plant
200 CP&L Drive
Arden, North Carolina
Buncombe County

to receiving waters designated as the French Broad River, UT to French Broad River and Lake Julian in the French Broad River Basin in accordance with effluent limitations, monitoring requirements, and other applicable conditions set forth in Parts I, II, and III hereof.

This Major Modification shall become effective May 1, 2020.

This permit and the authorization to discharge shall expire at midnight on November 30, 2023.

Signed this day April 9, 2020.

for S. Daniel Smith, Director
Division of Water Resources
By Authority of the Environmental Management Commission

SUPPLEMENT TO PERMIT COVER SHEET

All previous NPDES Permits issued to this facility, whether for operation or discharge are hereby revoked. As of this permit issuance, any previously issued permit bearing this number is no longer effective. Therefore, the exclusive authority to operate and discharge from this facility arises under the permit conditions, requirements, terms, and provisions included herein.

Duke Energy Progress, LLC

is hereby authorized to:

1. Continue to operate the following systems located at **Asheville Steam Electric Plant**, 200 CP&L Drive, Arden, Buncombe County:

   - **Ash Pond 1964/Rim Ditch Treatment System (Outfall 001).** Outfall 001 discharges directly to the French Broad River. The ash pond/rim ditch receives ash transport water, coal pile runoff, storm water runoff, groundwater, FGD wastewater, various low volume wastes (such as boiler blowdown, cooling tower blowdown, Heat Return Steam Generator (HRSG) blowdown, oil water separator wastewater, backwash from the water treatment processes, ash hopper seal water, plant drains), air preheater cleaning water and chemical metal cleaning wastewater discharged from Internal Outfall 004 (potentially) and Internal Outfall 005 (potentially).

   - **Evaporator system discharge (Outfall 002).** This waste stream is discharged directly to Lake Julian via Outfall 002.

   - **Chemical Metal Cleaning Treatment System (Internal Outfall 004)**. This waste stream may occasionally be discharged via Internal Outfall 004 to the ash pond treatment system. Generally chemical metal cleaning wastes are treated by evaporation in boilers. **This Outfall shall discontinue discharge on 02/01/2020.**

   - **Flue Gas Desulfurization (FGD) wet scrubber wastewater treatment system.** This waste stream will discharge to the secondary settling basin (after the Ash Pond) via **internal Outfall 005** (with ultimate discharge via **Outfall 001**). The facility can also discharge the FGD wastewater to the local POTW. **This Outfall shall discontinue discharge on 02/01/2020.**

   - **3 toe drains from 1964 ash pond <u>combined</u> into Outfall 101 (lat. 35.468, long. – 82.549)**;

   - **Internal Outfall 001A.** This Outfall will discharge to the secondary settling basin. It contains cooling tower blowdown and HRSG blowdown.

   - **Internal Outfall 001B.** This Outfall will discharge to the secondary settling basin. It contains stormwater discharges from containment areas around fuel oil storage tanks, transformers, and other plant equipment. This stormwater/wastewater is treated in the oil water separator prior to the discharge through Internal Outfall.

- **Internal Outfall 001C.** This Outfall will discharge to the secondary settling basin. It contains cooling tower blowdown and HRSG blowdown.

- **Internal Outfall 001D.** This Outfall will discharge to the secondary settling basin. It contains stormwater discharges from containment areas around fuel oil storage tanks, transformers, and other plant equipment. This stormwater/wastewater is treated in the oil water separator prior to the discharge through Internal Outfall.

- and

2. Discharge from said treatment works and/or outfalls at the locations specified on the attached map into the French Broad River (via **Outfall 001),** UT to French Broad River (via **Outfall 101**) and Lake Julian (via **Outfall 002**) classified as B waters (French Broad River and UT to French Broad River) and C waters (Lake Julian) in the French Broad River Basin.

Part I

A. (1.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 001-dewatering) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]
During the period beginning on the effective date of the permit and lasting until expiration, the Permittee is authorized to discharge from **Outfall 001 (Ash Pond Treatment System, and Rim Ditch)**. Such discharges shall be limited and monitored[2] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location[1]
Flow, MGD			Weekly	Instantaneous	Effluent
Oil and Grease	15.0 mg/L	20.0 mg/L	Weekly	Grab	Effluent
Total Suspended Solids[6]	30.0 mg/L	50.0 mg/L	Weekly	Grab	Effluent
pH[7]	6.0 ≤ pH ≤ 9.0		Weekly	Grab	Effluent
Total Mercury[3]	47.0 ng/L		Weekly	Grab	Effluent
Total Arsenic, µg/L			Weekly	Grab	Effluent
Total Selenium, µg/L			Weekly	Grab	Effluent
Total Beryllium, µg/L			Weekly	Grab	Effluent
Total Cadmium, µg/L			Weekly	Grab	Effluent
Total Chlorides, mg/L			Weekly	Grab	Effluent
Total Chromium, µg/L			Weekly	Grab	Effluent
Total Copper, µg/L			Weekly	Grab	Effluent
Total Fluoride, mg/L			Weekly	Grab	Effluent
Total Lead, µg/L			Weekly	Grab	Effluent
Total Nickel, µg/L			Weekly	Grab	Effluent
Total Silver, µg/L			Weekly	Grab	Effluent
Total Zinc, µg/L			Weekly	Grab	Effluent
Total Bromides, mg/L			Weekly	Grab	Effluent
Hardness –Total as [$CaCO_3$], mg/L			Weekly	Grab	Effluent
TDS, mg/L			Weekly	Grab	Effluent
Total Nitrogen (NO2+NO3+TKN), mg/L			Monthly	Grab	Effluent
Total Phosphorus, mg/L			Monthly	Grab	Effluent
Chronic Toxicity[4]			Monthly	Grab	Effluent
Turbidity[5], NTU			Weekly	Grab	Effluent
Temperature, °C			Monthly	Grab	Instream[8]

Notes:

1. Sample locations: Effluent.
2. Please see Special Condition A. (18.).
3. The facility shall use EPA test method 1631E. The limit is an annual average limit based on a calendar year.
4. Chronic Toxicity Limit (*Ceriodaphnia dubia*) at 1.8%; See Special Condition A. (10.).
5. The discharge from this facility shall not cause turbidity in the receiving stream to exceed 50 NTU. If the instream turbidity exceeds 50 NTU due to natural background conditions, the discharge cannot cause turbidity to increase in the receiving stream. Therefore, if the effluent measurement exceeds 50 NTU, the Permittee shall sample upstream and downstream turbidity in the receiving waterbody, within 24 hours, to demonstrate the existing turbidity

level in the receiving waterbody was not increased. All data shall be reported on the DMRs. (See 15A NCAC 2B .0211 (21)).

6. The facility shall continuously monitor TSS concentration and the dewatering pump shall be shutoff automatically when one-half of the Daily Maximum limit (15 minutes average) is exceeded. Pumping will be allowed to continue if interruption might result in a dam failure or damage. The continuous TSS monitoring is only required when the pumps are employed for dewatering.
7. The facility shall continuously monitor pH and the dewatering pump shall be shutoff automatically when 15 minutes running average pH falls below 6.1 standard units or rises above 8.9 standard units. Pumping will be allowed to continue if interruption might result in a dam failure or damage. The continuous pH monitoring is only required when the pumps are employed for dewatering.
8. The facility shall not exceed the instream water temperature of 29°C at the location approximately 41 meters downstream of Outfall 001 and at the location approximately 8 meters from Outfall on the transect across the river. The facility shall not exceed 2.8 °C rise above the background temperature, the difference will be determined between the upstream location identified in the Special Condition A. (14.) and the downstream location 41 meters downstream of Outfall 001.

There shall be no discharge of floating solids or visible foam in other than trace amounts.

There shall be no discharge of polychlorinated biphenyl compounds such as those commonly used for transformer fluid.

If any one of these pollutants (As, Se, Hg, Ni, and Pb) reaches 85% of the allowable monthly average effluent discharge concentration during dewatering, the facility shall immediately discontinue discharge of the wastewater and report the event to the DWR Asheville Regional Office and DWR Complex NPDES Permitting via telephone and e-mail.

The rate for lowering the liquid level in a coal ash pond shall not exceed one (1) foot per day unless a higher rate is supported to the satisfaction of DEMLR and in accordance with NCAC, Title 15A, Subchapter 2K.

By January 31, 2020 there shall be no discharge of pollutants in fly ash transport water. This requirement only applies to fly ash transport water generated after January 31, 2020.

By January 31, 2020 there shall be no discharge of pollutants in bottom ash transport water. This requirement only applies to bottom ash transport water generated after January 31, 2020.

The facility shall treat the wastewater discharged from the ash pond using physical-chemical treatment, if necessary, to assure state Water Quality Standards are not contravened in the receiving stream. Duke Energy shall notify DWR Complex NPDES Permitting and DWR Asheville Regional Office, in writing, within seven calendar days of installing additional physical-chemical treatment at this Outfall.

A. (2.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 002) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of the permit and lasting until expiration, the Permittee is authorized to discharge from **Outfall 002 (Evaporator System Discharge)**. Such discharges shall be limited and monitored[2] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Maximum	Measurement Frequency	Sample Type	Sample Location[1]
Flow, MGD			Monthly	Pump Logs	Effluent
Total Chromium, µg/L			Monthly	Grab	Effluent
Total Copper, µg/L			Monthly	Grab	Effluent
Temperature	44.4°C		Monthly	Recorder	Effluent
pH	6.0 ≤ pH ≤ 9.0		Weekly	Grab	Effluent

Notes:
1. Sample locations: Effluent.
2. Please see Special Condition A. (18.).

The mixing zone has been defined as all of Lake Julian.

Based upon studies conducted by the permittee and submitted to the Division, it has been determined pursuant to Section 316(a) of the Clean Water Act that the thermal component of the discharge assures the protection and propagation of a balanced, indigenous population of shellfish, fish and wildlife in the receiving water body.

There shall be no chromium, zinc, or copper added to the discharge except as pre-approved additives to biocidal compounds.

There shall be no discharge of polychlorinated biphenyl compounds such as those commonly used for transformer fluid. There shall be no discharge of floating solids or visible foam in other than trace amounts.

A. (3.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 004) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of the permit and lasting until expiration, the Permittee is authorized to discharge from **Internal Outfall 004 (Chemical Metal Cleaning Treatment System)**. Such discharges shall be limited and monitored[2] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location[1]
Flow, MGD			Per discharge event	Instantaneous	Effluent
Total Copper	1.0 mg/L	1.0 mg/L	Per discharge event	Grab	Effluent
Total Iron	1.0 mg/L	1.0 mg/L	Per discharge event	Grab	Effluent

Notes:
1. Sample locations: Effluent, prior to mixing with any other waste stream.
2. Please see Special Condition A. (18.).

The chemical metal cleaning waste shall be discharged after pretreatment.

There shall be no discharge of polychlorinated biphenyl compounds such as those commonly used for transformer fluid. There shall be no discharge of floating solids or visible foam in other than trace amounts.

This Outfall shall discontinue discharge on 02/01/2020.

A. (4.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 005) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of this permit and lasting until expiration, the Permittee is authorized to discharge from **Internal Outfall 005 (treated FGD wet scrubber wastewater)**. Such discharges shall be limited and monitored[3] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location[1]
Flow, MGD			Monthly	Instantaneous	Effluent
Total Suspended Solids	30.0 mg/L	100.0 mg/L	Monthly	Grab	Effluent
Total Mercury[2], ng/L	356.0 ng/L[4]	788.0 ng/L[4]	Quarterly	Grab	Effluent
Total Arsenic	8.0 µg/L[4]	11.0 µg/L[4]	Quarterly	Grab	Effluent
Total Selenium	12.0 µg/L[4]	23.0 µg/L[4]	Quarterly	Grab	Effluent
Nitrate/nitrite as N	4.4 mg/L[4]	17.0 mg/L[4]	Quarterly	Grab	Effluent

Notes:

1. Sample locations: Effluent from the physical-chemical treatment system.
2. The facility shall use EPA method 1631E.
3. Please see Special Condition A. (18.).
4. In accord with the Steam Electric Effluent Limitations Guidelines for FGD wastewater (40 C.F.R. 423), these limits shall become effective on January 31, 2020. This permit may be reopened and modified if changes are made to 40 CFR 423.

The facility can also discharge the FGD wastewater to the Buncombe County MSD.

This Outfall shall discontinue discharge on 02/01/2020.

A. (5.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 101)
[15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of this permit and lasting until expiration, the Permittee is authorized to discharge from **Outfall 101 – Toe Drain effluent** (1964 pond 3 toe drains). Such discharges shall be limited and monitored[1] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency[2]	Sample Type	Sample Location
Flow, MGD			Monthly/Quarterly	Estimate	Effluent
pH	6.0 ≤ pH ≤ 9.0		Monthly/Quarterly	Grab	Effluent
TSS	30.0 mg/L	100.0 mg/L	Monthly/Quarterly	Grab	Effluent
Oil and Grease	15.0 mg/L	20.0 mg/L	Monthly/Quarterly	Grab	Effluent
Total Fluoride, mg/L			Monthly/Quarterly	Grab	Effluent
Total Mercury[3], ng/L			Monthly/Quarterly	Grab	Effluent
Total Barium, mg/L			Monthly/Quarterly	Grab	Effluent
Total Zinc	125.7 µg/L	125.7 µg/L	Monthly/Quarterly	Grab	Effluent
Total Arsenic, µg/L			Monthly/Quarterly	Grab	Effluent
Total Boron, µg/L			Monthly/Quarterly	Grab	Effluent
Total Cadmium, µg/L			Monthly/Quarterly	Grab	Effluent
Total Chromium, µg/L			Monthly/Quarterly	Grab	Effluent
Total Copper, µg/L			Monthly/Quarterly	Grab	Effluent
Total Thallium, µg/L			Monthly/Quarterly	Grab	Effluent
Total Lead, µg/L			Monthly/Quarterly	Grab	Effluent
Total Nickel	25.0 µg/L	335.2 µg/L	Monthly/Quarterly	Grab	Effluent
Total Selenium	5.0 µg/L	56.0 µg/L	Monthly/Quarterly	Grab	Effluent
Nitrate/nitrite as N, mg/L			Monthly/Quarterly	Grab	Effluent
Total Sulfates, mg/L			Monthly/Quarterly	Grab	Effluent
Total Chlorides	230.0 mg/L	230.0 mg/L	Monthly/Quarterly	Grab	Effluent
Total Bromides			Monthly/Quarterly	Grab	Effluent
Hardness –Total as [$CaCO_3$], mg/L			Monthly/Quarterly	Grab	Effluent
TDS, mg/L			Monthly/Quarterly	Grab	Effluent
Total Hardness, mg/L			Monthly/Quarterly	Grab	Effluent
Temperature, °C			Monthly/Quarterly	Grab	Effluent
Conductivity, µmho/cm			Monthly/Quarterly	Grab	Effluent

Notes:
1. Please See Special Condition A. (18.).
2. The facility shall conduct monthly sampling from the effective date of the permit. After one year from the effective date of the permit the monitoring will be reduced to quarterly.
3. The facility shall use EPA method 1631E.

If no discharge occurs during the reporting period or the Permittee is unable to obtain a representative sample due to low-flow conditions at the seep, the Permittee shall submit its DMR, as required, and indicate "No Flow" for the seep (15A NCAC 02B .0506(a)(1)(E)).

There shall be no discharge of floating solids or visible foam in other than trace amounts.

A. (6.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 001A) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of this permit and lasting until expiration, the Permittee is authorized to discharge from **Internal Outfall 001A** (cooling tower blowdown and HRSG blowdown). Such discharges shall be limited and monitored[1] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location
Flow, MGD			Monthly	Estimate	Effluent
Total Suspended Solids	30.0 mg/L	100.0 mg/L	Monthly	Grab	Effluent
Oil and Grease	15.0 mg/L	20.0 mg/L	Monthly	Grab	Effluent

Notes:
1. Please see Special Condition A. (18.).

A. (7.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 001B) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of this permit and lasting until expiration, the Permittee is authorized to discharge from **Internal Outfall 001B** (oil water separator). Such discharges shall be limited and monitored[1] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location
Flow, MGD			Monthly	Estimate	Effluent
Total Suspended Solids	30.0 mg/L	100.0 mg/L	Monthly	Grab	Effluent
Oil and Grease	15.0 mg/L	20.0 mg/L	Monthly	Grab	Effluent

Notes:
1. Please see Special Condition A. (18.).

A. (8.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 001C) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of this permit and lasting until expiration, the Permittee is authorized to discharge from **Internal Outfall 001C** (cooling tower blowdown and HRSG blowdown). Such discharges shall be limited and monitored[1] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location
Flow, MGD			Monthly	Estimate	Effluent
Total Suspended Solids	30.0 mg/L	100.0 mg/L	Monthly	Grab	Effluent
Oil and Grease	15.0 mg/L	20.0 mg/L	Monthly	Grab	Effluent

Notes:
1. Please see Special Condition A. (18.).

A. (9.) EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS (Outfall 001D) [15A NCAC 02B .0400 et seq., 02B .0500 et seq.]

During the period beginning on the effective date of this permit and lasting until expiration, the Permittee is authorized to discharge from **Internal Outfall 001D** (oil water separator). Such discharges shall be limited and monitored[1] by the Permittee as specified below:

PARAMETER	LIMITS		MONITORING REQUIREMENTS		
	Monthly Average	Daily Maximum	Measurement Frequency	Sample Type	Sample Location
Flow, MGD			Monthly	Estimate	Effluent
Total Suspended Solids	30.0 mg/L	100.0 mg/L	Monthly	Grab	Effluent
Oil and Grease	15.0 mg/L	20.0 mg/L	Monthly	Grab	Effluent

Notes:
1. Please see Special Condition A. (18.).

A. (10.) CHRONIC TOXICITY PERMIT LIMIT (Outfall 001)
[15A NCAC 02B .0200 et seq.]

The effluent discharge shall at no time exhibit observable inhibition of reproduction or significant mortality to ***Ceriodaphnia dubia*** at an effluent concentration of 1.8 %.

The permit holder shall perform at a minimum, *monthly* monitoring using test procedures outlined in the "North Carolina *Ceriodaphnia* Chronic Effluent Bioassay Procedure," Revised December 2010, or subsequent versions or "North Carolina Phase II Chronic Whole Effluent Toxicity Test Procedure" (Revised- December 2010) or subsequent versions. Effluent sampling for this testing must be obtained during representative effluent discharge and shall be performed at the NPDES permitted final effluent discharge below all treatment processes.

If the test procedure performed as the first test of any month results in a failure or ChV below the permit limit, then multiple-concentration testing shall be performed at a minimum, in each of the two following months as described in "North Carolina Phase II Chronic Whole Effluent Toxicity Test Procedure" (Revised-December 2010) or subsequent versions.

All toxicity testing results required as part of this permit condition will be entered on the Effluent Discharge Monitoring Form (MR-1) for the months in which tests were performed, using the parameter code **TGP3B** for the pass/fail results and **THP3B** for the Chronic Value. Additionally, DWR Form AT-3 (original) is to be sent to the following address:

Attention: North Carolina Division of Water Resources
Water Sciences Section/Aquatic Toxicology Branch
1621 Mail Service Center
Raleigh, North Carolina 27699-1621

Or, results can be sent to the email, ATForms.ATB@ncdenr.gov

Completed Aquatic Toxicity Test Forms shall be filed with the Water Sciences Section no later than 30 days after the end of the reporting period for which the report is made.

Test data shall be complete, accurate, include all supporting chemical/physical measurements and all concentration/response data, and be certified by laboratory supervisor and ORC or approved designate signature. Total residual chlorine of the effluent toxicity sample must be measured and reported if chlorine is employed for disinfection of the waste stream.

Should there be no discharge of flow from the facility during a month in which toxicity monitoring is required, the permittee will complete the information located at the top of the aquatic toxicity (AT) test form indicating the facility name, permit number, pipe number, county, and the month/year of the report with the notation of "No Flow" in the comment area of the form. The report shall be submitted to the Water Sciences Section at the address cited above.

Should the permittee fail to monitor during a month in which toxicity monitoring is required, monitoring will be required during the following month. Assessment of toxicity compliance is based on the toxicity testing quarter, which is the three month time interval that begins on the

first day of the month in which toxicity testing is required by this permit and continues until the final day of the third month.

Should any test data from this monitoring requirement or tests performed by the North Carolina Division of Water Resources indicate potential impacts to the receiving stream, this permit may be re-opened and modified to include alternate monitoring requirements or limits.

NOTE: Failure to achieve test conditions as specified in the cited document, such as minimum control organism survival, minimum control organism reproduction, and appropriate environmental controls, shall constitute an **invalid test** and will require immediate follow-up testing to be completed no later than the last day of the month following the month of the initial monitoring.

A. (11.) CLEAN WATER ACT SECTION 316(a) THERMAL VARIANCE

[40 CFR 125, Subpart H]

The thermal variance granted under Section 316(a) terminates on expiration of this NPDES permit. Should the permittee wish a continuation of its 316(a) thermal variance beyond the term of this permit, reapplication for such continuation shall be submitted in accordance with 40 CFR Part 125, Subpart H and Section 122.21(m)(6) not later than 180 days prior to permit expiration. Reapplication shall include a basis for continuation such as a) plant operating conditions and load factors are unchanged and are expected to remain so for the term of the reissued permit; b) there are no changes to plant discharges or other discharges in the plant site area which could interact with the thermal discharges; and c) there are no changes to the biotic community of the receiving water body which would impact the previous variance determination.

The next 316(a) studies shall be performed in accordance with the Division of Water Resources approved plan. The temperature analysis and the balanced and indigenous study plan shall conform to the specifications outlined in 40 CFR 125 Subpart H, the EPA's Draft 316(a) Guidance Manual, dated 1977, and the Region 4 letter to NCDENR, dated June 3, 2010. EPA shall be provided an opportunity to review the plan prior to the commencement of the study.

Copies of all the study plans, study results, and any other applicable materials should be submitted to:

1) Electronic Version Only (pdf and CD)
   Division of Water Resources
   WQ Permitting Section - NPDES
   1617 Mail Service Center
   Raleigh, NC 27699-1617
2) Electronic Version (pdf and CD) and Hard Copy
   Division of Water Resources
   Water Sciences Section
   1621 Mail Service Center
   Raleigh, NC 27699-1621

A. (12.) CLEAN WATER ACT SECTION 316(b)
[40 CFR 125.95]

The permittee shall comply with the Cooling Water Intake Structure Rule per 40 CFR 125.95. Pursuant to the Rule and after review of the required submitted information, the Director has determined that operating and maintaining the new closed-cycle recirculating system meets the impingement and entrainment requirements for BTA.

Nothing in this permit authorizes take for the purposes of a facility's compliance with the Endangered Species Act.

A. (13.) STRUCTURAL INTEGRITY INSPECTIONS OF ASH POND DAM
[15A NCAC 02K.0208]

The facility shall meet the dam design and dam safety requirements per 15A NCAC 2K.

A. (14.) INSTREAM MONITORING (Outfall 001)
[15A NCAC 02B.0500 ET SEQ.]

The facility shall conduct monthly in-stream monitoring (~5,500 ft. upstream (approximately 35.4552, -82.5470 decimal degrees) and ~2,900 ft. downstream (approximately 35.5014, -82.5927 decimal degrees) of the Outfall 001) for total arsenic, total selenium, total mercury, total chromium, dissolved lead, dissolved cadmium, dissolved copper, dissolved zinc, total bromide, total hardness (as $CaCO_3$), temperature, turbidity, and total dissolved solids (TDS). The monitoring results shall be reported on the facility's Discharge Monitoring Reports and included with the NPDES permit renewal application.

A. (15.) APPLICABLE STATE LAW (State Enforceable Only)
[NCGS 143-215.1(b)]

This facility shall meet the General Statute requirements under NCGS § 130A-309.200 *et seq.* This permit may be reopened to include new requirements imposed under these Statutes.

A. (16.) TOXICITY RE-OPENER CONDITION
[NCGS 143-215.1(b)]

This permit shall be modified, or revoked and reissued to incorporate toxicity limitations and monitoring requirements in the event toxicity testing or other studies conducted on the effluent or receiving stream indicate that detrimental effects may be expected in the receiving stream as a result of this discharge.

A. (17.) FISH TISSUE MONITORING NEAR ASH POND DISCHARGE (Outfall 001)
[NCGS 143-215.3 (a) (2)]

The facility shall conduct fish tissue monitoring annually and submit the results with the NPDES permit renewal application. The objective of this monitoring is to evaluate potential uptake of pollutants by fish tissue near the ash pond discharge. The parameters analyzed in fish tissue shall include arsenic, selenium, and mercury. The monitoring shall be conducted in accordance with the sampling plan approved by the Division. The plan should be submitted to the Division within 180 days from the effective date of the permit. Upon approval, the plan becomes an enforceable part of the permit.

Copies of all the study plans, study results, and any other applicable materials should be submitted to:

1) Electronic Version Only (pdf and CD)
   Division of Water Resources
   WQ Permitting Section - NPDES
   1617 Mail Service Center
   Raleigh, NC 27699-1617

2) Electronic Version (pdf and CD) and Hard Copy
   Division of Water Resources
   Water Sciences Section
   1621 Mail Service Center
   Raleigh, NC 27699-1621

A. (18.) ELECTRONIC REPORTING OF DISCHARGE MONITORING REPORTS
[G.S. 143-215.1(b)]

Federal regulations require electronic submittal of all discharge monitoring reports (DMRs) and program reports. The final NPDES Electronic Reporting Rule was adopted and became effective on December 21, 2015.

NOTE: This special condition supplements or supersedes the following sections within Part II of this permit (*Standard Conditions for NPDES Permits*):

- Section B. (11.) Signatory Requirements
- Section D. (2.) Reporting
- Section D. (6.) Records Retention
- Section E. (5.) Monitoring Reports

1. **<u>Reporting Requirements [Supersedes Section D. (2.) and Section E. (5.) (a)]</u>**

   The permittee shall report discharge monitoring data electronically using the NC DWR's Electronic Discharge Monitoring Report (eDMR) internet application.

Monitoring results obtained during the previous month(s) shall be summarized for each month and submitted electronically using eDMR. The eDMR system allows permitted facilities to enter monitoring data and submit DMRs electronically using the internet. Until such time that the state's eDMR application is compliant with EPA's Cross-Media Electronic Reporting Regulation (CROMERR), permittees will be required to submit all discharge monitoring data to the state electronically using eDMR and will be required to complete the eDMR submission by printing, signing, and submitting one signed original and a copy of the computer printed eDMR to the following address:

NC DENR / Division of Water Resources / Water Quality Permitting Section
ATTENTION: Central Files
1617 Mail Service Center
Raleigh, North Carolina 27699-1617

If a permittee is unable to use the eDMR system due to a demonstrated hardship or due to the facility being physically located in an area where less than 10 percent of the households have broadband access, then a temporary waiver from the NPDES electronic reporting requirements may be granted and discharge monitoring data may be submitted on paper DMR forms (MR 1, 1.1, 2, 3) or alternative forms approved by the Director. Duplicate signed copies shall be submitted to the mailing address above. See "How to Request a Waiver from Electronic Reporting" section below.

Regardless of the submission method, the first DMR is due on the last day of the month following the issuance of the permit or in the case of a new facility, on the last day of the month following the commencement of discharge.

Starting on **December 21, 2020**, the permittee must electronically report the following compliance monitoring data and reports, when applicable:

- Sewer Overflow/Bypass Event Reports;
- Pretreatment Program Annual Reports; and
- Clean Water Act (CWA) Section 316(b) Annual Reports.

The permittee may seek an electronic reporting waiver from the Division (see "How to Request a Waiver from Electronic Reporting" section below).

2. Electronic Submissions

In accordance with 40 CFR 122.41(l)(9), the permittee must identify the initial recipient at the time of each electronic submission. The permittee should use the EPA's website resources to identify the initial recipient for the electronic submission.

Initial recipient of electronic NPDES information from NPDES-regulated facilities means the entity (EPA or the state authorized by EPA to implement the NPDES program) that is the designated entity for receiving electronic NPDES data [see 40 CFR 127.2(b)].

EPA plans to establish a website that will also link to the appropriate electronic reporting tool for each type of electronic submission and for each state. Instructions on how to access and

use the appropriate electronic reporting tool will be available as well. Information on EPA's NPDES Electronic Reporting Rule is found at: http://www2.epa.gov/compliance/final-national-pollutant-discharge-elimination-system-npdes-electronic-reporting-rule.

Electronic submissions must start by the dates listed in the "Reporting Requirements" section above.

3. How to Request a Waiver from Electronic Reporting

The permittee may seek a temporary electronic reporting waiver from the Division. To obtain an electronic reporting waiver, a permittee must first submit an electronic reporting waiver request to the Division. Requests for temporary electronic reporting waivers must be submitted in writing to the Division for written approval at least sixty (60) days prior to the date the facility would be required under this permit to begin submitting monitoring data and reports. The duration of a temporary waiver shall not exceed 5 years and shall thereupon expire. At such time, monitoring data and reports shall be submitted electronically to the Division unless the permittee re-applies for and is granted a new temporary electronic reporting waiver by the Division. Approved electronic reporting waivers are not transferrable. Only permittees with an approved reporting waiver request may submit monitoring data and reports on paper to the Division for the period that the approved reporting waiver request is effective.

Information on eDMR and the application for a temporary electronic reporting waiver are found on the following web page:

http://deq.nc.gov/about/divisions/water-resources/edmr

4. Signatory Requirements [Supplements Section B. (11.) (b) and Supersedes Section B. (11.) (d)]

All eDMRs submitted to the permit issuing authority shall be signed by a person described in Part II, Section B. (11.)(a) or by a duly authorized representative of that person as described in Part II, Section B. (11.)(b). A person, and not a position, must be delegated signatory authority for eDMR reporting purposes.

For eDMR submissions, the person signing and submitting the DMR must obtain an eDMR user account and login credentials to access the eDMR system. For more information on North Carolina's eDMR system, registering for eDMR and obtaining an eDMR user account, please visit the following web page:

http://deq.nc.gov/about/divisions/water-resources/edmr

Certification. Any person submitting an electronic DMR using the state's eDMR system shall make the following certification [40 CFR 122.22]. NO OTHER STATEMENTS OF CERTIFICATION WILL BE ACCEPTED:

"I certify, under penalty of law, that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified

personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations."

5. **Records Retention [Supplements Section D. (6.)]**
The permittee shall retain records of all Discharge Monitoring Reports, including eDMR submissions. These records or copies shall be maintained for a period of at least 3 years from the date of the report. This period may be extended by request of the Director at any time [40 CFR 122.41].

A. (19.) ADDITIONAL CONDITIONS AND DEFINITIONS

[NCGS 143-215.3 (a) (2) and NCGS 143-215.66]

1. EPA methods 200.7 or 200.8 (or the most current versions) shall be used for analyses of all metals except for total mercury (EPA Method 1631E).
2. All effluent samples for all external outfalls shall be taken at the most accessible location after the final treatment but prior to discharge to waters of the U.S. (40 CFR 122.41(j)).
3. The term *low volume waste sources* mean wastewater from all sources except those for which specific limitations are otherwise established in this part (40 CFR 423.11 (b)).
4. The term *chemical metal cleaning waste* means any wastewater resulting from cleaning any metal process equipment with chemical compounds, including, but not limited to, boiler tube cleaning (40 CFR 423.11 (c)).
5. The term *metal cleaning waste* means any wastewater resulting from cleaning [with or without chemical cleaning compounds] any metal process equipment including, but not limited to, boiler tube cleaning, boiler fireside cleaning, and air preheater cleaning (40 CFR 423.11 (d)).
6. For all outfalls where the flow measurement is to be "estimated" the estimate can be done by using calibrated V-notch weir, stop-watch and graduated cylinder, or other method approved by the Division.
7. The term "FGD wet scrubber wastewater" means wastewater resulting from the use of the flue-gas desulfurization wet scrubber.
8. There shall be no discharge of polychlorinated biphenyl compounds.
9. The permittee shall report the presence of cenospheres observed in any samples on the DMRs in the comment section.
10. Nothing contained in this permit shall be construed as a waiver by the permittee of any right to a hearing it may have pursuant to State or Federal laws and regulations.

A. (20.) BIOCIDE CONDITION

[NCGS 143-215.1]

The permittee shall not use any biocides except those approved in conjunction with the permit application. The permittee shall notify the Director in writing not later than ninety (90) days prior to instituting use of any additional biocide used in cooling systems which may be toxic to aquatic

life other than those previously reported to the Division of Water Resources. Such notification shall include completion of Biocide Worksheet Form 101 and a map locating the discharge point and receiving stream. Completion of Biocide Worksheet Form 101 is not necessary for those outfalls containing toxicity testing. Division approval is not necessary for the introduction of new biocides into outfalls currently tested for whole effluent toxicity.

A. (21.) COMPLIANCE BOUNDARY
[15A NCAC 02L.0107]

The compliance boundary for the disposal system shall be specified in accordance with 15A NCAC 02L .0107(a) or (b) dependent upon the date permitted. An exceedance of groundwater standards at or beyond the compliance boundary is subject to remediation action according to 15A NCAC 02L .0106(c), (d), or (e) as well as enforcement actions in accordance with North Carolina General Statute 143-215.6A through 143-215.6C. The compliance boundary map for this facility is incorporated herein and attached hereto as Attachment A.