AUTHORIZATION TO DISCHARGE UNDER THE NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

In compliance with the provisions of the Federal Clean Water Act as amended, (33 U.S.C. §§1251 et seq.; the "CWA"), and the Massachusetts Clean Waters Act, as amended, (M.G.L. Chap. 21, §§26-53),

Taunton Municipal Lighting Plant (TMLP)

is authorized to discharge from the facility located at:

Cleary-Flood Generation Station
1314 Somerset Avenue
Taunton, MA 02780

to receiving waters named the Taunton River and to an Un-named Tidal Creek to the Taunton River, hereinafter referred to as the Discharge Creek (Taunton River Basin - MA62-02)

in accordance with effluent limitations, monitoring requirements and other conditions set forth herein.

The permit shall become effective on the first day of the calendar month immediately following sixty (60) days after signature.

This permit and the authorization to discharge expire at midnight, five (5) years from the last day of the month preceding the effective date.

This permit supersedes the permit issued on April 15, 1988.

This permit consists of: 16 pages of Part I including Sections A-G with Effluent Limitations, Monitoring Requirements, and State Permit Conditions, Attachment A, and Part II Requirements containing General Conditions and Definitions.

Signed this 13th day of September, 2006

/s/ SIGNATURE ON FILE

Linda M. Murphy, Director
Office of Ecosystem Protection
Environmental Protection Agency (EPA)
Boston, MA

Glenn Haas, Director
Division of Watershed Management
Massachusetts Department of Environmental Protection (MassDEP)
Boston, MA
PART I

A. EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

1. During the period beginning on the effective date and lasting through expiration, the permittee is authorized to discharge to the Discharge Creek from outfall serial number 001; once through Unit 8 non-contact cooling water and on an emergency basis, discharge of auxiliary equipment cooling water and Unit 8 gland seal containment leak off water. Such discharges shall be limited and monitored by the permittee as specified below:

<table>
<thead>
<tr>
<th>Effluent Characteristic</th>
<th>Discharge Limitations</th>
<th>Monitoring Requirements</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Average Monthly</td>
<td>Maximum Daily</td>
</tr>
<tr>
<td>Flow Rate (million gallons per day)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>From March 1 to November 30</td>
<td>5.8$^{11}$</td>
<td>36.00</td>
</tr>
<tr>
<td>From December 1 to February 29</td>
<td>8.2$^{11}$</td>
<td>36.00</td>
</tr>
<tr>
<td>pH (standard units)</td>
<td>≥ 6.5 and ≤ 8.5$^{1}$</td>
<td>1/Month</td>
</tr>
<tr>
<td>Temperature (°F)</td>
<td></td>
<td>90$^{2}$</td>
</tr>
<tr>
<td>Temperature Rise ($\Delta T$) (°F)</td>
<td></td>
<td>23$^{2}$</td>
</tr>
<tr>
<td>Total Residual Chlorine (ug/l)</td>
<td>7.5$^{4}$</td>
<td>13$^{4}$</td>
</tr>
<tr>
<td>Report Total Hours of Circulation Pump Operation for Each Month</td>
<td>Report</td>
<td>****************</td>
</tr>
</tbody>
</table>

Place No Discharge Code No. 9 (“NODI 9”) in each DMR field when there has been no discharge during the sampling period.

SEE PAGE 6 FOR FOOTNOTES.
2. During the period beginning on the effective date and lasting through expiration, the permittee is authorized to discharge to the Discharge Creek from **outfall serial number 002**; Units 8 and 9 boiler blowdown, boiler blowdown Quench Water, auxiliary equipment cooling water, carbon filter back wash, and neutralized demineralizer regeneration wastes, uncontaminated floor drain water, and storm water. Such discharges shall be limited and monitored by the permittee as specified below:

<table>
<thead>
<tr>
<th>Effluent Characteristic</th>
<th>Discharge Limitations</th>
<th>Monitoring Requirements</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Average Monthly</td>
<td>Maximum Daily</td>
</tr>
<tr>
<td>Flow Rate (million gallons per day)</td>
<td>0.239</td>
<td>0.469</td>
</tr>
<tr>
<td>pH (standard units)</td>
<td>≥ 6.5 and ≤ 8.5(^1)</td>
<td>Continuous Recorder</td>
</tr>
<tr>
<td>Temperature (°F)</td>
<td>90(^2)</td>
<td>Continuous Recorder</td>
</tr>
<tr>
<td>Total Suspended Solids-TSS (mg/l)</td>
<td>30</td>
<td>100</td>
</tr>
<tr>
<td>Oil and Grease (mg/l)</td>
<td>15</td>
<td>20</td>
</tr>
<tr>
<td>WHOLE EFFLUENT TOXICITY</td>
<td>Acute LC(_{50}) Report %</td>
<td>1/Year</td>
</tr>
</tbody>
</table>

Place No Discharge Code No. 9 (“NODI 9”) in each DMR field when there has been no discharge during the sampling period.

SEE PAGE 6 FOR FOOTNOTES.
3. During the period beginning on the effective date and lasting through expiration, the permittee is authorized to discharge to the Taunton River from **outfall serial number 003**; Unit 9 cooling tower blowdown. Such discharges shall be limited and monitored by the permittee as specified below:

<table>
<thead>
<tr>
<th>Effluent Characteristic</th>
<th>Discharge Limitations</th>
<th>Monitoring Requirements</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Average Monthly</td>
<td>Maximum Daily</td>
</tr>
<tr>
<td>Flow Rate (million gallons per day)</td>
<td>0.26</td>
<td>0.40</td>
</tr>
<tr>
<td>pH (standard units)</td>
<td>≥ 6.5 and ≤ 8.5(^1)</td>
<td></td>
</tr>
<tr>
<td>Total Residual Chlorine (ug/l)(^6,10)</td>
<td>7.5(^4)</td>
<td>13(^4)</td>
</tr>
<tr>
<td>Total Residual Chlorine (mg/l)(^6,10)</td>
<td>0.1</td>
<td>0.1(^7)</td>
</tr>
<tr>
<td>Temperature (°F)</td>
<td>83(^2)</td>
<td></td>
</tr>
<tr>
<td>Total Suspended Solids-TSS (mg/l)</td>
<td>30</td>
<td>75</td>
</tr>
<tr>
<td>Total Chromium (mg/l)</td>
<td>0.2</td>
<td>0.2</td>
</tr>
<tr>
<td>Total Zinc (mg/l)(^8,10)</td>
<td>0.086</td>
<td>0.095</td>
</tr>
<tr>
<td>Priority Pollutants</td>
<td>No Detectable Amount</td>
<td>No Detectable Amount</td>
</tr>
</tbody>
</table>

**Place No Discharge Code No. 9 (“NODI 9”) in each DMR field when there has been no discharge during the sampling period**

SEE PAGE6 FOR FOOTNOTES.
4. During the period beginning on the effective date and lasting through expiration, the permittee is authorized to discharge to the Taunton River from **outfall serial number 004**, traveling screen and service water pump strainer backwash. Such discharges shall be limited and monitored by the permittee as specified below:

<table>
<thead>
<tr>
<th>Effluent Characteristic</th>
<th>Discharge Limitations</th>
<th>Monitoring Requirements</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Average Monthly</td>
<td>Maximum Daily</td>
</tr>
<tr>
<td>Flow Rate (thousand gallons per day)</td>
<td>Report</td>
<td>Report</td>
</tr>
<tr>
<td>pH (standard units)</td>
<td>≥6.5 and ≤8.5$^1$</td>
<td>1/Year</td>
</tr>
</tbody>
</table>

*pH shall be measured at the discharge from the traveling screen

**Place No Discharge Code No. 9 (“NODI 9”) in each DMR field when there has been no discharge during the sampling period**

5. During the period beginning on the effective date and lasting through expiration, the permittee is authorized to discharge to the Taunton River from **outfall serial number 005**, screenhouse spray nozzle water. Such discharges shall be limited and monitored by the permittee as specified below:

<table>
<thead>
<tr>
<th>Effluent Characteristic</th>
<th>Discharge Limitations</th>
<th>Monitoring Requirements</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Average Monthly</td>
<td>Maximum Daily</td>
</tr>
<tr>
<td>Flow Rate (thousand gallons per day)</td>
<td>Report</td>
<td>Report</td>
</tr>
<tr>
<td>pH (standard units)</td>
<td>≥6.5 and ≤8.5$^1$</td>
<td>1/Year</td>
</tr>
</tbody>
</table>

**Place No Discharge Code No. 9 (“NODI 9”) in each DMR field when there has been no discharge during the sampling period**

SEE PAGE 6 FOR FOOTNOTES.
FOOTNOTES

1) pH shall not change more than 0.2 units outside the background value.

2) This limit is an instantaneous maximum (not to be exceeded at any time).

3) The permittee shall continuously monitor temperature and temperature rise (ΔT) and report the highest daily instantaneous maximum values that occur for the month to the EPA. The ΔT is to be measured at the Unit #8 condenser inlet and condenser outlet.

4) Chlorine may be used as a biocide for Units 8 and 9. No other biocide shall be used without explicit approval from EPA Regional Administrator and the Commissioner. The term "Regional Administrator" means the Regional Administrator of Region I of the U.S. Environmental Protection Agency (EPA) and the term "Commissioner" means the Commissioner of the Massachusetts Department of Environmental Protection (MassDEP) or their designees. Total residual chlorine may not be discharged from Units 8 or 9 for more than two hours per day. The quantity of total residual chlorine (TRC) discharged in the once-through cooling water from Outfall 001 shall not at any time exceed a maximum permitted concentration. The “Maximum Daily” TRC limit shall always mean the “value that shall not be exceeded or instantaneous maximum value.” The minimum level (ML) for total residual chlorine is defined as 20 ug/l using EPA approved methods found in 40 CFR §136 and the most currently approved version of USEPA Manual of Methods of Analysis of Water and Wastes. For effluent limitations less than 20 ug/l, compliance/non-compliance will be determined based on the ML. Sample results of 20 ug/l or less shall be reported as zero on the discharge monitoring report.

5) The permittee shall report the total number of hours the cooling water circulation pumps are operated each month.

6) The maximum daily and average monthly interim limits for total residual chlorine (TRC) shall be 100 ug/l until one (1) year from the effective date of the permit, or sooner if the outfall extension is completed. After one (1) year from the effective date of the permit, the interim TRC limits shall become final if Outfall No. 003 has been extended. After one (1) year from the effective date of the permit the TRC concentration limits shall be 13 ug/l maximum daily and 7.5 ug/l average monthly if Outfall No. 003 has not been extended. See Page 14, Section D.2 for compliance schedule.

7) Instantaneous maximum concentration (maximum concentration at any time).

8) The maximum daily and average monthly interim limits for total zinc shall be 1.0 mg/l until no later than one (1) year from the effective date of the permit. The interim total zinc limits shall become final when Outfall No. 003 has been extended. After one (1) year from the effective date of the permit, the water quality based total zinc concentration limits shall be 95 ug/l maximum daily and 86 ug/l average monthly if Outfall No. 003 has not been extended. See Page 14, Section D.2 for compliance schedule.
9) The permittee may, instead of sampling monthly, determine compliance with the limitations for the 126 priority pollutants by engineering calculations which demonstrate that the regulated pollutants are not detectable in the final discharge by the analytical methods in 40 CFR part 136.

10) See Compliance Section D of this permit.

11) The average monthly flow reported for the 001 condenser is based on the total monthly flow divided by the number of days per month.

12) The permittee shall conduct 48 hour static, non-renewal acute toxicity tests once per year. The permittee shall test the Daphnid (Ceriodaphnia dubia) only. Toxicity test samples shall be collected during the month of August each year. The test results shall be submitted by the last day of September. The tests must be performed in accordance with test procedures and protocols specified in Attachment B of this permit. The permittee shall monitor without a limit. The permittee shall report the LC$_{50}$. The LC$_{50}$ is the concentration of effluent which causes mortality to 50% of the test organisms.

If toxicity test(s) using receiving water as diluent show the receiving water to be toxic or unreliable, the permittee shall follow procedures outlined in Attachment A Section IV., DILUTION WATER in order to obtain permission to use an alternate dilution water. In lieu of individual approvals for alternate dilution water required in Attachment A, EPA-New England has developed a Self-Implementing Alternative Dilution Water Guidance document (called “Guidance Document”) which may be used to obtain automatic approval of an alternate dilution water, including the appropriate species for use with that water. If this Guidance document is revoked, the permittee shall revert to obtaining approval as outlined in Attachment A. The “Guidance Document” has been sent to all permittees with their annual set of DMRs and Revised Updated Instructions for Completing EPA’s Pre-Printed NPDES Discharge Monitoring Report (DMR) Form 3320-1 and is not intended as a direct attachment to this permit. Any modification or revocation to this “Guidance Document” will be transmitted to the permittees as part of the annual DMR instruction package. However, at any time, the permittee may choose to contact EPA-New England directly using the approach outlined in Attachment A.

B. CONDITIONS APPLICABLE TO ALL DISCHARGES

1. Except as specified in Parts I.A.1 through I.A.5 herein, the permittee shall not discharge to the Taunton River or the Discharge Creek a final effluent to which it has added any pollutants.
a. Discharges shall not impair any Class SB use of the Taunton River or the Discharge Creek and shall not violate any applicable narrative criteria from the state water quality standards, although discharges may exceed numeric temperature criteria included in state water quality standards to the extent that such discharges comply with temperature and flow limits specified herein pursuant to section 316(a) and 316(b) of the Clean Water Act.

b. The thermal plumes from the station shall: (a) not block zones of fish passage, (b) not interfere with spawning of indigenous populations, (c) not change the balanced indigenous population of the receiving water, and (d) have minimum contact with surrounding shorelines.

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

The permittee shall dispose of any and all known PCB equipment, articles, and wastes in accordance with 40 CFR 761. The permittee shall certify that this disposal has been accomplished within 180 days of the effective date of the permit.

d. Pollutants which are not limited by the permit, but have been specifically disclosed in the last permit application, may be discharged at the frequency and level disclosed in the application, provided that such discharge does not violate sections 307 and 311 of the Act or applicable water quality standards.

e. Any discharge shall not cause visible discoloration or turbidity in the receiving waters which would impair the uses designated by the classification of the receiving waters.

f. The effluent shall not contain metals and/or materials in concentrations or in combinations which are hazardous or toxic to aquatic life, or which would impair the uses designated by the classification of the receiving waters.

g. There shall be no discharge of floating solids, oil sheens or visible foam attributable to station operation in other than trace amounts.

h. The permittee may propose to conduct feasibility studies involving new chemicals not currently approved for water discharge. The permittee shall gain approval from the Regional Administrator and the Commissioner before any such studies take place. A report summarizing the results of any such studies shall be submitted to the Regional Administrator and the Commissioner regarding discharge frequency, concentration, and the impact, if any, on the indigenous populations of the receiving water. The Regional Administrator or the Commissioner may require Whole Effluent Toxicity testing as part of feasibility studies.
i. Any change in the location, design or capacity of the present structures, except those outlined in Section C or D of this permit, shall be approved by the Regional Administrator and the Commissioner.

j. Discharges to the Taunton River or the Discharge Creek shall be adequately treated to insure that the surface water remains free from pollutants in concentrations or combinations that settle to form harmful deposits, float as foam, debris, scum or other visible pollutants. They shall be adequately treated to insure that the surface waters remain free from pollutants which produce odor, color, taste, or turbidity in the receiving water which is not naturally occurring and would render it unsuitable for its designated uses.

k. There shall be no discharge of metal cleaning or chemical cleaning wastes as defined in 40 CFR §423.11. All metal cleaning shall be treated and disposed of off-site in accordance with all applicable local, state, and federal regulations.

l. There shall be no discharge of pollutants through floor drains.

m. This permit shall be modified, revoked or reissued to comply with any applicable effluent standard or limitation issued or approved under Sections 301(b)(2)(C) and (D), 304(b)(2), and 307(a)(2) of the Clean Water Act (CWA), if the effluent standard or limitation so issued or approved:

   (1) contains different conditions or is otherwise more stringent than any effluent limitation in this permit; or

   (2) controls any pollutant not limited by this permit.

n. All existing manufacturing, commercial, mining, and silvicultural dischargers must notify the Commissioner as soon as they know or have reason to believe (40 CFR §122.42):

   i. That any activity has occurred or will occur which would result in the discharge, on a routine or frequent basis, of any toxic pollutant which is not limited in the permit, if that discharge will exceed the highest of the following "notification levels:'

      (1) One hundred micrograms per liter (100 ug/l);

      (2) Five (5) times the maximum concentration value reported for that pollutant in the permit application in accordance with 40 CFR §122.21(g)(7); or
ii. That any activity has occurred or will occur which would result in the discharge, on a non-routine or infrequent basis, of any toxic pollutant which is not limited in the permit, if that discharge will exceed the highest of the following "notification levels:"

1. Five hundred micrograms per liter (500 ug/l);
2. One milligram per liter (1 mg/l) for antimony;
3. Ten (10) times the maximum concentration value reported for that pollutant in the permit application in accordance with 40 CFR §122.21(g)(7); or
4. Any other notification level established by the Commissioner in accordance with 40 CFR §122.44(f) and Massachusetts regulations.

C. SPECIAL CONDITIONS APPLICABLE TO THE COOLING WATER INTAKE STRUCTURE

1. The circulation water pumps of Unit 8 shall be operated only when Unit 8 is either producing electricity, during unit warm-up or cool-down, or for required testing, maintenance, or repair.

2. The permittee shall remove any accumulated sediment or debris from in front of the cooling water intake openings that is causing an increase in intake flow velocities above those calculated for the existing intake design and circulation pump flow requirements. The removal of sediment from the river shall be done in accordance with appropriate federal, state, and local regulation governing such activities in waterways.

3. All live fish and other aquatic organisms collected or trapped on the traveling screens shall be returned to the Taunton River without injury. All other material, except natural debris (e.g., leaves and twigs), shall be removed from the traveling screens and disposed of in accordance with all existing federal, state, and/or local laws and regulations that apply to waste disposal. Such material shall not be returned to the receiving waters. In addition:
   a. A low pressure spray wash that discharges at a rate of 30 psi or lower shall be installed and operated on both traveling screens. The low pressure spray shall be engineered to deliver aquatic organisms without injury to the fish return pipe.
b. Modify the existing fish return pipe as necessary to ensure that fish and other organisms can safely be returned to the river at all stages of tide and flow. Modifications include replacing any existing sharp angles in the pipe with multiple low-angle turns (<22.5°) or one continuous arc. Also, the end of the fish return pipe (Outfall 004) shall be extended a sufficient distance into the river to ensure the discharge flows directly into subtidal waters of the river at all stages of tide and flow. Along the fish return pipe, install an in-line fish tank or other means to allow for better counts of the impinged fish and to reduce the physical stress when fish transit from the traveling screen to the sluiceway. The construction of these modifications shall be done in accordance with appropriate federal, state, and local regulation governing construction of waterways and banks.

c. To increase the screen area and to reduce the through screen velocity, **whenever Unit 8 circulation pump(s) are operating**;

- both inlets and traveling screens are to be operated simultaneously, except when chlorinating or during periods of required maintenance, and
- only one circulation pump shall be operated unless both pumps are needed to comply with the permitted temperature limits, and
- the permittee shall take operational measures to further minimize intake velocity to the degree practicable, to minimize impingement of fish.

d. When Unit 9 is operating alone, the traveling screens shall be rotated at least once every eight hours, unless the fish impingement rate equals or exceeds five fish per hour. Should the fish impingement rate equal or exceed five fish per hour, then the traveling screens must be run continuously until the impingement rate decreases to less than five fish per hour. The operation of the traveling screens will be logged (actual times screens are activated and secured), and this information shall be submitted with the monthly discharge monitoring report.

e. Chlorine or other biocide treatments shall not be applied into the wet wells while traveling screens are being rotated, or during screen back washing.

f. In addition to Condition C3.c. above, the permittee shall take operational measures to further minimize intake velocity to the degree practicable, to minimize impingement of fish.
4. The intake flow for Unit 8 shall be limited as follows: **March 1 - November 30:** 36 MGD maximum daily/5.8 MGD average monthly; **December 1 - February 29:** 36 MGD maximum daily/8.2 average monthly. **This is also a flow limit required under 316(a).** (See Permit Page 2)

5. **Unusual Impingement Events**
   
i. The permittee shall rotate and visually inspect the traveling screens of the cooling water intake structure every eight hours for dead and live fish when circulation pumps are in operation. If the permittee observes on the traveling screens, or estimates based on time-limited observations, 25 dead fish within any 8 hour period, the permittee shall;
   
   ii. Report to the Regional Administrator and the Commissioner within 24 hours by telephone as required by Part II of this permit. A written confirmation report is to be provided within five business days. These oral and written reports shall include the following information:

   (1) All dead fish shall be enumerated and recorded by species. Report the species, size ranges (maximum and minimum length), and approximate number of organisms involved in the incident. In addition, a representative sample of 25% of each fish species killed, up to a maximum of 50 total fish specimens from each species, shall be measured to the nearest centimeter total length.

   (2) The time and date of the occurrence.

      (a) The operational mode of the specific system that may have caused the occurrence.

      (b) The opinion of the permittee as to the reason the incident occurred.

      (c) The remedial action that the permittee recommends to reduce or eliminate this type of incident.

6. **Discharge-Related Mortality of Aquatic Organisms**

   a. The permittee shall visually inspect the shoreline discharge locations and areas adjacent to these locations for any sign of environmental stress and/or fish mortality. These inspections shall be conducted periodically (at least once each operating day), when not in conflict with safety concerns, or other company policies and procedures. A fish shall be considered dead if it exhibits a loss of equilibrium.
Those fish identified as being washed off the traveling screens or dead fish floating from upstream shall be identified as such and placed in a separate category, along with the justification for making the determination.

b. If the permittee observes 25 or more dead fish within any 24 hour period, the permittee shall:

i. Report to the Regional Administrator and the Commissioner within 24 hours by telephone as required by Part II of this permit. A written confirmation report is to be provided within five business days. These oral and written reports shall include the following information:

   (1) Characterization of fish killed: All dead fish shall be enumerated and recorded by species. Report the species, size ranges, and approximate number of organisms involved in the incident. In addition, a representative sample of 25% of each fish species killed, up to a maximum of 50 total fish specimens from each species, shall be sampled as follows:

      (a) Length: The dead fish shall be measured to the nearest centimeter total length.

   (2) The time and date of the occurrence.

   (3) The operational mode of the specific facility system that was in operation that may have caused the occurrence.

   (4) The opinion of the permittee as to the reason the incident occurred.

   (5) The remedial action that the permittee recommends to reduce or eliminate this type of incident.

ii. Immediately collect a water sample of the discharge to be analyzed for Total Residual Chlorine (TRC). In addition, the permittee shall immediately initiate a separate hourly record showing: (1) the point of discharge temperature;

   (2) the dissolved oxygen levels at the intake structures and at the discharge; (3) the number of dead fish observed by species; and (4) the Total Residual Chlorine (TRC) level of the discharge. The record shall also contain as much of this data that is available from up to 24 hours prior to the event, in order to provide information as to the possible causes of the fish mortality event.
iii. Suspend all unit chlorination operations immediately after collection of water samples for TRC. If the discharge temperature is greater than 85°F, and the dead fish are located within the thermal influence of the Unit 8 discharge, the permittee will reduce the discharge temperature to 85°F within two hours.

iv. If at the end of the 24 hour period from the initial observation, fish mortalities do not exceed 25 or more dead fish within any 24-hour period from the areas near the shoreline discharge locations, the permittee will cease special monitoring and return to normal station operation (including unit chlorination).

D. SCHEDULES OF COMPLIANCE

1. The permittee shall install a dechlorination unit for flow entering the main water discharge from the Unit #8 Main Condenser (Outfall 001) no later than one (1) year from the effective date of the permit. The maximum daily and average monthly interim limits for TRC shall be 100 ug/l until one (1) year from the effective date of the permit, at which time the limits shall be 13 ug/l maximum daily and 7.5 ug/l average monthly.

2. The permittee shall install a discharge pipe extension into the Taunton River for Outfall 003 such that the discharge is below the low tide zone. The extension shall be completed no later than one (1) year from the effective date of the permit. The maximum daily and average monthly interim limits for TRC shall be 100 ug/l until one (1) year from the effective date of the permit, or sooner if the outfall extension is completed. If the outfall extension is not completed by one (1) year from the effective date of the permit, the TRC concentration limits shall be 13 ug/l maximum daily and 7.5 ug/l average monthly (See also footnote No. 4). Upon completion of the extended outfall, the final maximum daily and average monthly TRC limits shall be 0.1 mg/l.

The maximum daily and average monthly interim limits for total zinc shall be 1.0 mg/l until one (1) year from the effective date of the permit, at which time the limits shall become final. If the outfall extension is not completed by one (1) year from the effective date of the permit, the final limits shall be 0.095 ug/l maximum daily and 0.086 ug/l average monthly.

3. No later than six (6) months from the effective date of the permit, the permittee shall extend and modify the discharge pipe from Outfall 004 to include replacing any existing sharp angles in the pipe with multiple low-angle turns (<22.5°) or one continuous arc.

4. No later than six (6) months from the effective date of the permit, the permittee shall install low pressure (≤30 psi) headers on the Unit #8 Traveling Water Screen (Outfall 004).
5. **No later than one (1) year from the effective date of the permit**, the permittee shall do the following: 1) Install low pressure (≤30 psi) headers on the Unit 9 Traveling Water Screen (Outfall 004) including installation of a new low pressure water service to supply the new header. 2) Repair or replace Unit 9 Traveling Water Screen.

6. The permittee shall install a discharge pipe extension into the Taunton River for Outfall 004 such that the discharge is below the lowest level of tide and flow. The extension shall be completed **no later than one (1) year from the effective date of the permit**.

7. The permittee shall remove any sediment or debris from in front of the cooling water intake openings that is causing an increase in intake flow velocities above those calculated for the existing intake design and circulation pump flow requirements. The sediment removal shall be completed **no later than one (1) year from the effective date of the permit**.

8. **On the anniversary of the effective date of the permit** the permittee shall submit a report detailing completion or progress toward completion on schedules 1 through 7.

E. **MONITORING AND REPORTING**

Monitoring results obtained during the previous month shall be summarized for each month and reported on separate discharge monitoring report (DMR) forms postmarked no later than the 15th day of the month following the effective date of the permit.

Signed and dated originals of the DMRs, and all other reports required herein, shall be submitted to the EPA Director and the State at the following addresses:

U.S. Environmental Protection Agency  
Water Technical Unit (SEW)  
P.O. Box 8127  
Boston, Massachusetts 02114

The State Agency is:

Massachusetts Department of Environmental Protection  
Southern Regional Office - Bureau of Waste Prevention  
20 Riverside Drive  
Lakeville, Massachusetts 02347

In addition, copies of all Discharge Monitoring Reports and all other notifications and reports required by this permit shall be submitted to the following address:
In addition, all annual Biological/Thermal Monitoring Reports and all Discharge Related Mortality and Unusual Impingement Event notifications and reports required by this permit shall also be submitted to:

Eric Nelson (Phone Number: 617-918-1676)
U.S. Environmental Protection Agency
One Congress Street, Suite 1100 (CIP)
Boston, MA 02114-2023

F. STATE PERMIT CONDITIONS

1. This Discharge Permit is issued jointly by the U. S. Environmental Protection Agency and the Massachusetts Department of Environmental Protection under Federal and State law, respectively. As such, all the terms and conditions of this permit modification are hereby incorporated into and constitute a discharge permit issued by the Commissioner of the Massachusetts Department of Environmental Protection pursuant to M.G.L. Chap. 21, §43.

2. Each Agency shall have the independent right to enforce the terms and conditions of this permit. Any modification, suspension or revocation of this permit shall be effective only with respect to the Agency taking such action, and shall not affect the validity or status of this permit as issued by the other Agency, unless and until each Agency has concurred in writing with such modification, suspension or revocation. In the event any portion of this permit is declared, invalid, illegal or otherwise issued in violation of State law such permit shall remain in full force and effect under Federal law as an NPDES Permit issued by the U.S. Environmental Protection Agency. In the event this permit is declared invalid, illegal or otherwise issued in violation of Federal law, this permit shall remain in full force and effect under State law as a permit issued by the Commonwealth of Massachusetts.

G. REOPENER CLAUSE

1. This permit shall be modified, or alternatively, revoked and reissued, to comply with any applicable standard or limitation promulgated or approved under sections 301(b)(2)(C) and (d), 304(b)(2), and 307(a)(2) of the Clean Water Act, if the effluent standard or limitation so issued or approved:

   (a) Contains different conditions or is otherwise more stringent than any effluent limitation in the permit; or

   (b) Controls any pollutants not limited in the permit.