

**Ecomaine  
Cumberland County  
Portland, Maine  
A-283-70-E-A**

**Departmental  
Findings of Fact and Order  
Part 70 Air Emission License  
Amendment #2**

After review of the air emission license amendment application, staff investigation reports, and other documents in the applicant's file in the Bureau of Air Quality, pursuant to 38 M.R.S.A, Section 344 and Section 590, the Department finds the following facts:

**I. REGISTRATION**

A. Introduction

<b>Facility</b>	Ecomaine
<b>Part 70 License and Amendments</b>	A-283-70-A-I, A-283-70-B-A
<b>Current Amendment Type</b>	Part 70 502(b)(10) Change
<b>NAIC Code(s)</b>	562213 (Solid Waste Combustors and Incinerators)
<b>Nature of Business</b>	Municipal Waste Combustion
<b>Date of Part 70 License Issuance</b>	December 14, 2005
<b>Date of Part 70 License Expiration</b>	December 14, 2010
<b>Date of Part 70 502(b)(10) Change (A-283-70-E-A)</b>	March 10, 2008

This amendment revises the carbon injection averaging time in ecomaine's air emission license to be consistent with the changes made by EPA to 40 CFR Part 60, Subpart Eb, §60.58b(m), as incorporated by reference in the recently revised State regulation *Emission Limitations and Emission Testing of Resource Recovery Facilities*, 06-096 CMR 121.

B. Application Classification

This amendment has been processed as a Part 70 502(b)(10) Change since there will be no increase in licensed emissions, the revision is not considered a modification to the emission units, and the revised averaging time has already been established in both Federal and State regulations.

## **II. PART 70 502(b)(10) DESCRIPTION**

Ecomaine has proposed to include activated carbon injection averaging time language in air emission license A-283-70-A-I to be consistent with changes made to Federal and State regulations. Revisions to 40 CFR Part 60, Subpart Eb, §60.58b(m) to specify an 8-hour block averaging time for carbon injection became effective November 6, 2006. 06-096 CMR 121 was subsequently amended, effective November 14, 2007, to reference the new Federal requirements.

Conditions 14(G)(1)(b)(vi), 14(G)(8)(e), 14(H)(1) and 19(J) in air emission license A-283-70-A-I all include carbon injection language.

The Department approves revising the conditions to include the 8-hour block averaging time. Ecomaine shall continue to monitor and record, on an hourly basis, the powdered activated carbon injection feed rate (using carbon injection system operating parameters that are the primary indicator(s) of carbon mass feed rate). The hourly data shall be used to calculate the 8 hour block average.

### **ORDER**

Based on the above Findings and subject to conditions listed below the Department concludes that the emissions from this source:

- will receive Best Practical Treatment,
- will not violate applicable emission standards, and
- will not violate applicable ambient air quality standards, or increment standards either alone or in conjunction with emissions from other sources.

Therefore the Department grants this amendment A-283-70-E-A, subject to the conditions found in air emission license A-283-70-A-I and amendment A-283-70-B-A in addition to the following conditions:

#### **The following shall replace condition 14(G)(1)(b)(vi) in air emission license A-283-70-A-I:**

14(G)(1)(b)(vi) During performance stack tests for mercury and dioxin/furans, an average carbon mass feed rate shall be determined in pounds per hour based on powdered activated carbon injection system operating parameters (screw feeder speed, hopper volume, or hopper refill frequency, etc). The minimum carbon mass feed rate shall be at least 20 lb/hr on an 8-hour block average. The average carbon mass feed rate recorded per hour for each MWC train shall be submitted in

the performance test report for mercury and dioxin/furan control. [MEDEP Chapter 121]

**The following shall replace condition 14(G)(8)(e) in air emission license A-283-70-A-I:**

14(G)(8)(e) During operation of MWCs A and B, the powdered activated carbon injection system operating parameters that are the primary indicator(s) of carbon mass feed rate shall be averaged over a block 8-hour period, and the 8-hour block average must equal or exceed the level(s) documented during the most recent performance tests for mercury and dioxin/furans. In no case shall the minimum carbon mass feed rate be below 20 lb/hr on an 8-hour block average. [MEDEP Chapter 121]

**The following shall replace condition 14(H)(1) in air emission license A-283-70-A-I:**

14(H) MWC Parameter Monitoring

1. The following parameters shall be monitored and recorded as specified, for each MWC:

<b>Parameter</b>	<b>Monitor</b>	<b>Record</b>	<b>Origin and Authority</b>
MWC unit load level as steam flow and/or feed water	Continuously	Continuously	06-096 CMR 121
Electrostatic Precipitator inlet temperature	Continuously	Continuously	06-096 CMR 121
Powdered activated carbon injection feed rate (using carbon injection system operating parameters that are the primary indicator(s) of carbon mass feed rate)	Hourly	Hourly and 8-hour Block Average	06-096 CMR 121
Natural gas fuel flow	Daily	Daily	06-096 CMR 140, BPT 40 CFR Part 60, Subpart Db, 60.49b(d)

\* Note: “Continuously” is defined as no less than 2 points in a one hour period.

**The following shall replace condition 19(J) in air emission license A-283-70-A-I:**

19(J) Powdered Activated Carbon Injection System

For the activated carbon system used for mercury and dioxin/furan control, the following records shall be maintained:

1. The average carbon mass feed rate (lb/hr) determined during the dioxin/furan performance tests, and mercury tests (as applicable), with supporting calculations.
2. The average carbon mass feed rate (lb/hr) determined on an 8-hour block average basis during operation, with supporting calculations.
3. The total carbon usage for each calendar quarter, with supporting calculations. Quarterly usage determinations shall be based on the weight of carbon delivered to the plant and based on parameters used to determine the 8-hour block average carbon mass feed rate for each MWC during operation.
4. Powdered activated carbon injection system operating parameter data for the parameter(s) that are the primary indicator(s) of carbon feed rate (e.g., screw feeder speed).
5. Identification of the calendar dates when the 8-hour block average carbon mass feed rates recorded were less than either of the hourly carbon feed rates determined during performance tests for mercury or dioxin/furan emissions and recorded, with reasons for such feed rates and a description of corrective action taken.
6. Identification of the calendar dates when the powdered activated carbon injection system operating parameter(s) that are the primary indicator(s) of

carbon mass feed rate (e.g., screw feeder speed) recorded are below the level(s) determined during the performance tests, with reasons for such occurrences and a description of corrective action taken.

DONE AND DATED IN AUGUSTA, MAINE THIS 10th DAY OF MARCH, 2008.

DEPARTMENT OF ENVIRONMENTAL PROTECTION

BY: \_\_\_\_\_  
DAVID P. LITTELL, COMMISSIONER

**The term of this order shall be concurrent with the term of air emission license A-283-70-A-I.**

PLEASE NOTE ATTACHED SHEET FOR GUIDANCE ON APPEAL PROCEDURES

Date of initial receipt of application: October 17, 2007

Date of application acceptance: October 18, 2007

Date filed with Board of Environmental Protection: March 11, 2008

This order prepared by Kathleen E. Tarbuck, Bureau of Air Quality.