

Memo

**Devens
Enterprise
Commission**

Date: August 25, 2009
To: Devens Enterprise Commission
Cc:
From: Peter Lowitt, Director
RE: Evergreen Noise Resolution Update

Much activity has taken place since the last DEC meeting regarding Evergreen's noise violation. The VOC combustion blower enclosures (3), the last cooling tower intake silencer (1), and gas PRV Station attenuation were all installed as required by condition #5 of the July 14, 2009 Evergreen Noise Resolution. The ground-mounted gas pumps and sound enclosures are in the process of being installed and are on schedule for completion by August 28, 2009 according to Evergreen.

A number of measurements of facility noise levels have also been taken in accordance with the requirements of the July 14, 2009 Evergreen Noise Resolution. As per condition#1, Evergreen has measured, and the DEC has confirmed, a nighttime measurement of 42 dBA by July 27, 2009 and a daytime measurement of 43dBA by August 17, 2009. Since the July 27, 2009 interim nighttime measurement, Evergreen has not been successful in achieving a DEC observed nighttime compliance measurement required as per Condition #1 of the Resolution (sustained measurement of no more than 38 dBA at the R1 location at Dunroven Farm under specific conditions). Part of the difficulty in sustaining a measurement of 38dBA during this time period has been the fluctuating ambient noise levels, in addition to varying weather patterns. The railroad continues to be a dominant noise source during the overnight hours when measurements are taking place (trains idling or moving). DEC Staff contacted the Railroad to identify times where there is no train activity. The Railroad is a 24/7 operation under federal jurisdiction, not subject to local regulation, however they agreed to provide a window where they would not operate any trains, in order to provide proper conditions for Evergreen to measure compliance in accordance with the resolution. This window occurred on August 15, 2009, however, as the DEC's noise consultant has pointed out, it was likely not representative of a 33dBA ambient night, most likely due to the high humidity and elevated ambient noise levels from air conditioners and HVAC units from all directions, not just Evergreen.

Elevated evening noise levels have also been measured consistently by CTA and appear to spike regularly just after 8PM on weekdays. This is consistent with the start-up of recent Route 2 construction activity which has included drilling, jack hammering and pavement reclamation. These construction activities also involve extensive lighting operations that are run by diesel engines. While this activity is a significant distance away, it is audible from Old Mill Road areas.

As a result, the DEC has asked Evergreen to develop an alternative measurement protocol that will help reduce the affect of the ambient noise levels on compliance measurements and provide a clearer measurement of the actual facility-generated noise levels – to avoid having to wait for ideal conditions in which to take compliance measurements. This can be accomplished by erecting an interim noise meter closer to the facility which will pick up more of the facility sounds and less of the ambient sources. Such a revised protocol is being developed and will be reviewed and approved by the DEC's Noise Consultant prior to its use.

Evergreen continues to submit monitoring reports as per condition #6. Evergreen has also conducted a preliminary worst-case scenario test (in accordance with condition #9) during the day on August 17, 2009, the results of which will be provided to the DEC this evening.

The DEC has continued to receive complaints from Myrick Lane, Dunroven Farms and residents on Old Mill Road regarding periodic and continuous loud noises that are thought to be originating from Evergreen. The DEC's Noise Consultant has investigated the Myrick Lane complaint and has found that the offending tone is similar to an adjacent property's window-mounted air conditioner. While this air conditioner may not be the source of the actual complaint, it has a similar tonal characteristic. Both the DEC and Evergreen Noise Consultants have investigated this complaint and determined that due to the distance and tonal characteristics of the noise complaint, the source of the noise is not the Evergreen facility. Modeling Specialties also conducted spot measurements around the Evergreen facility to determine low-frequency noise sources on August 4th and identified Evergreen as a source occasionally contributing above 65 dBA at 31.5 Hz tone. Since this measurement, additional cooling tower attenuation has taken place. The DEC's consultant will be taking additional noise measurements to determine if the cooling towers are still producing above 65 dBA at the 31.5 Hz tone.

The DEC's Noise Consultant is continuing to take spot measurements in other locations near facilities on Devens to identify or rule out any additional noise sources from Devens that may be contributing to elevated ambient noise levels in this area that residents continue to complain about.

Condition #28 of the original unified permit required:

"Should there be a valid noise complaint issued against the applicant, the applicant shall be responsible for taking the appropriate measures to reduce noise levels. This may include the installation of the sound barrier originally proposed. A waiver for a structure within the side yard setback will be required from the DEC."

Evergreen has constructed several individual walls closer to the sources (SDX unit, ASX and VOC units, High Pressure Gas line) and submitted a report from their noise consultant that states these individual walls address the noise sources better than the originally designed 550-foot long and 20' high wall. The DEC's noise consultant has reviewed this report and concurs that these individual walls will have a greater effect at reducing noise levels from the facility. If the DEC agrees, a finding should be made for the record that these individual walls are sufficient to meet the requirement of condition #28 of the original Phase 1 Unified Permit Record of Decision issued by the DEC on August 14, 2007. This would not rule out the need for any additional walls that may be necessary to be constructed by Evergreen to achieve full compliance with DEC Rules and Regulations.