**Docket No. 217 – Development and Management Plan Inspection**

Northeast Utilities Service Company Certificate of Environmental Compatibility and Public Need for the construction of a 345-kV electric transmission line and reconstruction of an existing 115-kV electric transmission line between Connecticut Light and Power Company's Plumtree Substation in Bethel, through the towns of Redding, Weston, and Wilton, and to the Norwalk Substation in Norwalk, Connecticut.

**Date:** February 16, 2006

**Inspector:** Diana Walden

**Location:** Transition Stations: Hoyts Hill, Archers Lane, Norwalk Junction

**Storm/ Rain Event:** Approximately 0.13" of precipitation fell, mostly in the form of snow between 2/11-2/12 as reported by NOAA. Totals may actually be higher than reported.

| Areas of Inspection | Observation | Recommended Action |
|---|---|---|
| Access Roads and Adjacent Roadways | - **Hoyts Hill:** Access is gained off Hoyts Hill Road. Ruts and sedimentation remain at the access point in the stone 1/19-2/16/06.<br>-Crews were on site to drill excavations and install structures. 2/16/06. | - Ruts should be smoothed out and additional stone installed along this portion to prevent further erosion and sedimentation. 12/30-2/16/06.<br>- Additional haybales were installed and will have to be monitored for effectiveness. 1/26-2/16/06 |
| | -**Archers Lane**: Conditions were muddy. Water levels at the wetland crossings on the access road to the ROW had increased since the last site visit but were not at the previous problem levels. 2/16/06.<br>- Stakes are up along the access drive from Diamond Hill Rd for 345kV trenching. 2/16/06 | -Sediment accumulation in the wetlands will have to be addressed. 2/2-2/16/06.<br>- Snow removal for the ROW work caused sediment to the wetlands . 2/16/06<br><br>- The stone wall and natural barriers here appear to keep any sediment from the wetlands along the drive. 2/2-2/16/06 |
| | - **Norwalk Junction**: Sediment tracking did not appear to be an issue at this time. Snow removal caused some additional issues with snow and sediment pushed into the swale. 2/16/06. | -Continue to monitor Rt. 7 at the main access pad. 2/16/06.<br>- See erosion control section for more details on the sediment. 2/16/06 |

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| Foundation construction | - At **Hoyts Hill:** Excavation was occurring at the time of inspection for placing some of the steel structures on the pad. 2/16/06.<br>- Some stockpiles were present on the pad and were going to be removed. 2/16/06 | -The station pad itself is in good shape but the adjacent areas need some attention. 1/19-2/16/06.<br>- See the dewatering section for more details as well. 2/16/06 |
| Foundation construction continued | - Additional work may be necessary on the outlet/dissipater pads as erosive gullies and sedimentation continue to worsen. 12/01-2/16/06. | -The stone may need to be extended based on the noted erosion issues. This will likely happen in the spring. See erosion control section. 12/01-2/16/06. |
| | -At **Archers Lane**, several steel structures had been installed within the station pad. 2/16/06<br>- Excavation and vault installation was occurring in the station pad as part of the 345kV work. 2/16/06 | -None at this time. The area is contained. 2/16/06 |
| | -At **Norwalk Junction:** Several steel structures had been constructed while other foundations remain under plastic covering. Soil remained stockpiled as it was still too wet to be removed from site at this time. 2/9-2/16/06<br>- Dewatering was also necessary and a riprap attenuation swale was built to the river. 2/16/06 | - See erosion control/ dewatering sections for more information. 2/16/06. |
| Erosion and Sediment Controls<br>(includes inspection within 24 hours of a storm event) | -**Hoyts Hill**: The perimeter silt fence was impacted to some degree by the snow fall. 2/16/06<br>- Sedimentation continues to overwhelm the fence in the spot previously noted. Sedimentation continued to build through the fence and in the wetland.1/19-2/16/06 | - Repair/restaple the silt fence as necessary. 2/16/06<br>- Repair or install additional controls in the spot which washed through. More importantly- control the source of sedimentation (gullies) 1/19-2/16/06<br>- Gullies should be repaired and a stronger method of stabilization, such as erosion |

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| Erosion and Sediment Controls continued | - The erosive gullies remain under snow cover on both the northern and southern slopes resulting in increasing sediment deposits along the silt fence. 10/27-2/16/06.<br>-Less severe erosion was noted along the face of the southern silt fence. 1/26-2/16/06 | control mats should be considered. 10/27-2/9/06<br>-Extension of the outlet stone pad and restoration of erosion will likely occur in the spring when access is stable. 2/16/06 |
| | - Haybales and fence were installed in front of the catch basin on the pad to filter run-off and eventually dewatering from the site. 2/16/06 | - Haybales will also be installed at the outlet and at the sedimentation spot in the silt fence when dewatering occurs. 2/16/06 |
| | - A sand pile for mixing concrete was being stored in the driveway across from Rt. 58. 2/16/06 | - Silt fence should be installed at the base of the pile if it going to remain in place. 2/16/06 |
| | - **Archers Lane:** Controls along the access road to the ROW were somewhat degraded from snow plowing and sedimentation continues in the 1st wetland crossing to varying degrees from a fine layer over the leaf litter to several inches of accumulation. 1/26-2/16/06 | - Water levels have increased here to some degree.<br>- Any easily accessible deposits of sediment will need to be removed. Fine layers of silt can remain. 1/26-2/10/06 |
| | -The drainage pipe from the station directs run-off to the stone swale that empties at the silt fence near the 2nd wetland crossing. 2/16/06 | -Issues from snow plowing for ROW use require attention from those crews. Sediment was pushed over the controls and into the wetlands. 2/16/06 |
| | - Haybales remain in the swale and dewatering was not necessary for the vault installation. Past run-off has resulted in sediment accumulation here. 2/16/06 | - Current use is going well but sediment will need to be carefully removed from this area as well. 1/26-2/16/06 |
| | - **Norwalk Junction**: Haybales remain along the perimeter fence on site as an additional control. The silt fence remained adjacent to the | - The haybales appear to be working well, keeping mud and soil from the site from reaching the silt fence but there is a gap now due to the |

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| | river but needs to be toed-in in some locations, especially as snow/sediment pile were placed beyond the haybales. 1/26-2/16/06.<br><br>-The wetland area outside the silt fence adjacent to the river, remain partially flooded with pooled, turbid water. 12/30-2/16/06<br>- Snow piles with sediment were placed directly in and along the swale. 2/16/06<br><br>- Erosive gullies/soil slumping remain in a number of locations along a portion of the drainage swale due to site run-off, resulting in further sedimentation to the swale. 12/30-2/16/06.<br>Haybales remained in the inlets. 2/2-2/16/06<br><br>-Need for dewatering has resulted in a riprap swale built to the Norwalk River. Hoses are on top of the silt fence. A pump was also left overnight adjacent to the river. 2/16/06<br><br>- Soil remains contained on site although efforts are being made to remove it. 2/9-2/16/06 | dewatering hose. 1/26-2/16/06<br>-Toe in silt fence due to the presence of the snow/dirt piles<br><br>This area receives direct runoff from the site through the swale making water quality important. The adjacent site is disturbed resulting in this turbidity. 1/19-2/16/06<br>- These piles need o be pulled back from the swale to prevent potential sedimentation as they melt. Take care when removing snow. 2/16/06<br><br>- The erosion control matting on the swale likely needs to be extended up and over the top of slope to prevent further erosion until the growing season. 12/30-2/16/06<br><br>- Be sure to restore this area when work is complete and consider placing haybales or stakes to support the hose over the controls. Place secondary containment on the pump. See dewatering section. 2/16/06<br><br>- Soil was too wet at this time to transport. 2/9-2/16/06 |
| Inland Wetland and Watercourse encroachment and mitigation | - **Hoyts Hill**: As part of the transition station, a small area of wetland was cleared and altered. The outer silt fence is still up as a work limit but could use some maintenance. 2/16/06.<br>- Sedimentation continues to flush through the fence at this time and accumulate in a small area of the wetland beyond. Sedimentation also continues to accumulate in the wetland | -In general, keep all equipment and materials out of wetlands not to be disturbed. 11/10-2/16/06<br><br>- The fence needs repair and additional controls in this spot- such as haybales. Pull back sediment by hand where feasible when conditions are stable. Control the sediment at |

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| | on the work side of the fence. 1/19-2/16/06 | its source- (the gullies). 1/19-2/16/06 |
| | **-Archers Lane:** Watch run-off velocity down the completed slopes and walls. Pick up deposited sediment adjacent to and in the wetlands at the ROW access road crossings. 1/26-2/16/06 | - Pull back the sediment as a result of the snow plowing. See the ROW report for more details. 2/16/06<br>-See erosion control section for details on the turbidity issues which appear to be a result of work on site as well as the access road in the ROW 1/19-2/16/06 |
| | - **Norwalk Junction**: A riprap swale was built right to the river for dewatering on-site. Water is sent through several controls first and has been mostly clear. 2/16/06 | -Continue to monitor. 2/16/06 |
| | - The outlet of the drainage swale is at the headwall of the wetland area. Turbidity issues continue to be noted here in the wetlands but have not had a significant impact on the river. 12/30-2/16/06. | -See Erosion Control Section for more details. Reduce turbidity by controlling its source- disturbed surfaces on site. 12/30-2/16/06 –Remove sediment/snow from the swale 2/16/06 |
| State species of concern, threatened and endangered species | - No species of concern are located in these areas of construction. | - N/A |
| Vegetative clearing limits (including trees to save or danger trees noted) | -**Hoyts Hill**: The slopes and areas surrounding the site had begun to experience noticeable increase in growth before the cold weather but erosion issues continue and will need attention. 11/17-2/16/06<br>- Clearing is almost complete adjacent to the site for the 345kV XLPE portion of the project.2/16/06 | - It will be difficult to obtain sufficient growth due to the late time of year. Outlet pads will likely be extended in the spring. 2/16/06<br>- Contractors have good erosion controls in place and are aware of the wetland status of the area. 2/16/06 |
| | **- Archers Lane:** no additional clearing was noted here. 2/16/06 | -None at this time. 2/16/06 |

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| | - **Norwalk Junction**: The area that had been cleared outside the silt fence (11/23) now has pooled turbid water. 12/30-2/16/06 | - This area was not restored or enclosed in silt fence but is now partially flooded. 2/16/06 |
| Dewatering | -Dewatering had not yet occurred at Hoyts Hill but it was scheduled soon. It will be directed through the catch basin on the pad and through the outlet pipe. Haybales are in front of the CB and will be installed at the outlet. 2/16/06<br><br>- Dewatering was not necessary at Archers Lane at the time of inspection for the 345kV vault installation. Haybales remain installed across the swale. 2/16/06<br><br>- Foundation excavation at Norwalk Junction has created the need for dewatering. Recently, larger amounts of water have been present. Well points are dewatered to a frac tank which is allowed to settle and then is pumped to a new riprap swale to the Norwalk River. 2/16/06 | -Prior to dewatering, the silt fence also needs to be toed in at the sedimentation area and haybales should be placed here to reinforce the area . 2/16/06<br>- If water is still turbid by the time it reaches this spot, a filter bag should be used above the CB. 2/16/06<br>- Water is directed to a stone swale which infiltrates to a drainage pipe under the access road. Water levels in the wetlands have increased since the last visit but are not at problem levels again. 2/16/06<br><br>-Allow the water to run the length of the swale and don't discharge at the end near the river. 2/16/06<br>- The pump should also be placed in secondary containment and not left near the river overnight. 2/16/06 |
| Blasting | - All blasting is complete at this time. 2/16/06 | - None at this time. |
| Soils | - A small soil stockpile resulted from excavation at the Hoyts Hill pad. 2/16/06<br><br>- A soil stockpile at Norwalk Junction remains on site and will be removed to Clean Harbors. 2/9-2/16/06 | - The pile remains contained but will be removed appropriately. 2/16/06<br><br>- The soil remains contained but has been too wet to move. 2/9-2/16/06 |

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| Spills and Material Storage | -Make sure the dewatering pump has secondary containment i.e. a plastic sheet or box while in place near the river at Norwalk Junction. 2/16/06 | - Continue to keep all vehicles maintained well (i.e. no apparent fluid leaks) if they will be used or stored on site<br>- Report spills immediately, even if they are being controlled.<br>- Take care not to get carried away and to be vigilant when refueling. Avoid refueling in the areas near the wetlands. Se proper storage for all materials. |
| Additional Observations | - When snow removal is necessary, place it in areas away from the flow patterns of run-off- i.e. not in swales which can drain to wetlands and carry the sediment. | |

**Next likely scheduled inspection:** Wednesday-Thursday, February 22-23, 2006

I have personally examined and am familiar with the information submitted in this document and all attachments and certify that based on reasonable investigation, including my inquiry of those individuals responsible for obtaining the information, the submitted information is true, accurate and complete to the best of my knowledge and belief, and I understand that any false statements made in this document or its attachments may be punishable as a criminal offense in accordance with Section 22a-6 under Section 53a-157 of the Connecticut General Statutes.

**Inspector's Signature:** *Diana Walden*

Hoyts Hill Transition Station: Photo on the left shows a stockpile of sand for mixing concrete placed across Rt. 58 from the station. Silt fence should be installed at the base to prevent sedimentation. Photo on the right shows where sediment continues to accumulate beyond the silt fence. Haybales should be installed here and the fence should be fixed, especially as dewatering is scheduled. 2/16/06

Photo on the left shows the perimeter silt fence where snow has pulled it down in some areas. The controls should be repaired. Photo on the right is a view of controls placed at the catch basin for future dewatering. 2/16/06.

Photo on the left shows a view of the drilling/excvation for installing structures on the pad. Photo on the right shows a resulting stockpile which will eventually be removed appropriately from site. 2/16/06.

Archers Lane: Photo on the left looks towards the excavation as part of the 345kV work to install a vault in the station yard. Photo on the right shows the retaining walls, construction trailer and some of the structure work which has occurred. 2/16/06.

Photo on the left shows the stockpile resulting from the 345kV vault work with some of the installed structure work behind it.. Photo on the right shows where sediment continues to accumulate in the wetland adjacent to the access road. Sediment will need to be removed when and where feasible. 2/16/06.

Photo on the left shows the access road within the ROW when snow plowing has created some sedimentation issues to the wetland. Water levels have increased following the snow but have not returned to the problem causing amounts previously seen. Photo on the right shows the increasing water levels in the 1st wetland along the ROW access road where sediment will need to be removed. 2/16/06

Norwalk Junction: Photo on the left shows an overview of the yard with some of the steel structure work underway. Photo on the right shows a view of sediment and snow plowed into the swale. This should be removed prior to snowmelt to avoid additional sediment inputs to the swale. 2/16/06

Photo shows an overview of the swale with several sediment/snow piles along the slope. This should be pulled back and care taken to keep sediment from stormwater run-off pathways the next time plowing is necessary. 2/16/06

Photo shows the riprap swale built to the Norwalk River for dewatering well points within the station yard. Water is being directed to a frac tank where it can settle before it is pumped to the swale. Take care to let water run the length of the swale for further filtration and provide secondary containment for the pump. 2/16/06

Photo on the left shows the perimeter of Norwalk Junction. Since snow/sediment piles have been placed in the vicinity, make sure the silt fence is toed in. Consider using haybales or stakes to support the dewatering hose and keep it from pulling down the fence. Photo on the right shows the pooled area at the end of the swale. 2/16/06