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MEMORANDUM

From: Deni Chambers, Northgate
Josh Otis, Northgate

Date: September 29, 2010

To: Shannon Harbour, NDEP

RE: Results of Barrier Wall Permeability Testing, Tronox Facility, Henderson, Nevada

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As requested by NDEP, Tronox is transmitting the results of permeability testing performed on four samples collected from the barrier wall at the Tronox Facility in Henderson, Nevada (the Site) on July 29th and 30th, 2010. Shallow trenches were excavated using a backhoe to expose the barrier wall material, and samples were collected using thin-walled Shelby Tube samplers. The top of the barrier wall was encountered at depths ranging from 1 foot below the ground surface (bgs) to 4.9 feet bgs. Each sample was analyzed for hydraulic conductivity by ASTM D-5084, Method C by Vector Engineering of Grass Valley, California. Enclosed, please find the laboratory report containing the test results.

The average hydraulic conductivity measured for the four samples is 8.8×10^{-7} cm/sec, meeting the design criteria for the barrier wall of a hydraulic conductivity less than 1×10^{-6} cm/sec. As shown in the attached report, three of the four samples meet the design criteria, with the test result of the fourth sample (BWI-LOC 2) slightly below the criteria, at 2.3×10^{-6} cm/sec. Tronox believes that these results confirm that the barrier wall is an effective barrier to groundwater flow as intended.