CLEAN Newsletter Article August 28, 2019

Seismic Testing Begs Public Process Questions



Earlier this month, some residents surrounding Cayuga Lake became alarmed at the sound of explosions coming from the water, which originated from a seismic research vessel reportedly owned by Walker Marine Geophysical Company. The Department of Environmental Conservation (DEC) confirmed that Cargill, Inc. contracted the testing, which started August 8 and was completed by August 23.

David Lemon, DEC Region 7 Fisheries Manager, said that testing was conducted in water at least 30 feet deep, from Long Point south. The vessel pulled a pneumatic air gun array and a string of underwater microphones to study underground rock formations. Blasts were emitted from an air cannon below the surface of the water behind the stern at a rate of about one every five seconds.

Residents expressed concern that they had not been notified of the seismic testing. Lemon was unsure of the DEC's responsibility to alert residents, including when seismic testing was conducted in 2016. CLEAN member Brian Eden said the process was neither transparent nor democratic and that the public should be notified by these types of large-scale testing in New York waters.

Hilary Lambert of the Cayuga Watershed Network learned from the DEC that no permit is required for the seismic testing. Lambert is concerned about the effect of the testing on endangered lake sturgeon living in Cayuga's waters. Lake sturgeon can take 14 years to reach sexual maturity; males have a lifespan of at least 50 years and females can live more than 80 years. Little is known about the effect of seismic testing on their growth, behavior, and populations.

There has been growing interest in the geology of the lake due to risks associated with the salt mine that lies below the lake. Two thousand feet below the lake's surface, Cargill, Inc. has mined out salt beneath eight miles of Cayuga Lake's 32-mile length. Despite the fact that salt under Cayuga Lake is a publicly-owned resource and that Cargill consultants have expressed concerns about geological anomalies in the rock between Taughannock Park and Cayuga Power, Cargill has been unwilling to release their 2016 seismic study for review by third-party experts. Consequently, the public and possibly the DEC have little idea as the level of risk related to mining northwards under Cayuga Lake. In any case, if the existing mined voids under the lake were to flood—either by accident or on purpose--saturated brine seven times the salinity of seawater might then vent into the lake for hundreds of years.

CLEAN is advocating for public access to the data from this survey and other studies conducted by Cargill and for an end to salt mining under and near Cayuga Lake.

On August 20th a group of local residents gathered in kayaks, a pontoon boat, and a sailboat in the lake in front of Cargill with signs of protest in response to the seismic research vessel. Residents expressed concerns that seismic testing could harm aquatic life and said the expansion of the mine increases the risk to the health of the lake. Cayuga Lake has already experienced a significant increase in salinity due to salt mining and some experts believe that catastrophic damage to the drinking water for surrounding municipalities would occur if the mine collapsed.



Increasing salinization is already a concern in Cayuga Lake. It is increasing pH levels now at about 8.5 and formerly below 7. Recent studies have demonstrated that salt water induces cyanobacteria to produce more toxins, possibly encouraging some of the recent harmful algal blooms.

Concerned residents should ask their representatives for a transparent public process with all future testing and urge them to protect the lake as a source of drinking water by halting both mining under the lake and mining under land that remains connected to the mine under the lake.

Please call or write:

- Basil Saggos, Commissioner, New York State Department of Environmental Conservation, 625 Broadway, Albany, NY 12233 tel: 518-402-8545
- Assemblyman Steve Englebright, Chair of Assembly Environmental Conservation Committee, 149 Main Street East Setauket, NY 11733 tel: 631-751-3094. Albany Office. LOB 621. Albany, NY 12248 tel: 518-455-4804. E-mail: EngleS@nyassembly.gov
- State Senator Pamela Helming, Legislative Office Building, Room 946,
 Albany, NY 12247 Phone: 518-455-2366 Pamela Helming
 <ABero@nysenate.gov>
- Shawn Wilczynski, Plant Manger, Cargill Deicing Technology, 191 Portland Point Rd, Lansing, NY 14882 tel: 607-533-4221; e-mail: Shawn_Wilczynski@cargill.com

Subsidence Study Update:

We now have a link on our website to sign up for our subsidence study. If you or anyone you know lives near the salt mine, please consider signing up to participate in our subsidence study. Please follow this link to sign up:

https://cleancayugalake.org/cargill-salt/

Well Study Update:

We have begun our well study for 6 residential wells surrounding Cargill's Shaft 4. Three of the wells are downgradient and three are upgradient of the shaft. We are hoping to have a month of baseline readings before Cargill begins reaming the shaft in September and will keep our listserve updated to any aquifer contamination that may occur due to Cargill's activities.

Coal Ash Landfill Petition Update:

We now have a link on our website to sign the petition asking the DEC to require Cayuga Power to clean up the Coal Ash Landfill that has been contaminating groundwater since 1977. Please follow this link to sign the petition:

https://cleancayugalake.org/coal-ash-landfill/

Lake Water Quality Update:

We are continuing our pilot project to collect baseline water quality data with our Manta +35 in two locations on Cayuga Lake. We have begun graphing the data and hope to make the data available to the public in the fall. As we prepare to expand this research project next summer, we are looking for lakeside property owners who may be willing to invest in/sponsor research equipment to be kept at

their dock for data collection. If you would like more information, please contact us at CLEAN.CayugaLake@gmail.com.

We appreciate your continued support. Tax-deductible donations can be made to CLEAN here.

Thank you, Cayuga Lake Environmental Action Now

Clean the Lake. Protect the Lake.