



December 29, 2010

Cargill Deicing Technology
Cayuga Mine
P.O. Box B
191 Portland Point Road
Lansing, NY 14882

Mr. Matthew Podniesinski
Chief, Resource Development Section
Bureau of Resource Management & Development
Division of Mineral Resources
New York State Department of Environmental Conservation
625 Broadway, Third Floor
Albany, New York 12233-6500

RECEIVED
DEC 30 2010

RE: Annual Report for Mine File #709-3-29-0052; Cayuga Salt Mine
Permit ID#0-9999-00075-00001
Towns of Lansing and Ulysses, County of Tompkins
Town of Covert, County of Seneca

Dear Mr. Podniesinski:

Enclosed is an annual report required in accordance with the Special Conditions section (item numbers 13.a through 13.g) of DEC permit number 0-9999-00075/00001. This report will address each reporting requirement separately (13a.1, 13.a.2, etc.) and drawings are attached as required. As requested, all technical data associated with monitoring of mine stability will be sent to J.T. Boyd and Associates with attention to Dr. Vincent Scovazzo. A second copy of the report is in the mail to Steve Army, the Region 7 Mined Land Reclamation Specialist.

If any questions arise please bring them to my attention at your earliest convenience.

With Best Regards,

Russell Givens
Mine Manager – Cargill Deicing Technology

Reporting, Monitoring, and Notifications

13.a.1 - Cargill Cayuga Mine Manager Certification:

I, Russell S. Givens, Mine Manager – Cargill Deicing Technology, certify that all mining activities, to the best of my knowledge, conducted during the reporting period from January 1, 2010 to present were in conformance with the DEC Permit # 0-9999-00075/00001 and the approved plans. No variances occurred and none were reported.

Signed:  Date: 12-29-10

13.a.2 - Summary of all non-routine mining incidents:

The Cayuga Mine is not aware of any non-routine incidents associated with the mining, processing, or other mine related activities that would have adversely affected any of the following;

- Mine stability
- Ground and surface water
- Natural resources
- Health, safety, welfare or property of the general public

On occasion, the underground production crews encounter rock structures that delay or hinder our mining plan. The Cayuga Mine continues to encounter a rock formation when mining to the east from the southern development (E-6 and E-7).

13.a.3 - 3 Year Mining Plan

A map is attached depicting the current and proposed mining for the next three years.

The Cayuga Mine is currently operating in two different regions of the mine. There are two crews mining south (S-3) along the west shoreline of Cayuga Lake and east (E8) from S-3 toward the east shore. Panels E8, E9, and E10 will be mined as conditions allow. The rest of the mining is located in the northern region of the mine where production crews continue to mine panels U-60, U-62, U63, U65 development and NW3 development. Panel U-65 will be started in early 2011 calendar year and is planned to be utilized in conjunction with NW3 for mainline infrastructure to support future mining to the north.

13.a.4 - Summary of In-situ Measurements of Rock Mechanics:

The Cayuga Mine continues to collect mine convergence data in accordance with the guidelines previously established in the Mined Land Use Plan. Convergence stations are typically installed at the "face" of active tunnels in mining panels with a profile of three stations located in the center and edges of the panel. The convergence stations are usually read daily during the first week and then shifted to a weekly schedule until the next profile is installed. The initial profile will then be monitored on a monthly or quarterly schedule for the duration of mining of the panel. After abandonment of the panel, specific convergence stations are monitored quarterly and annually. Currently, there are approximately 180 quarterly and 500 annual convergence stations being monitored. In addition, about 30 closure stations in the abandoned "east workings" are read about every 5 years. Those were not read during the past year. Once all of the data from the annual convergence stations have been collected it is evaluated both internally and externally for trends to ensure that each panel and the mine are behaving properly.

Evaluation of weekly, quarterly, and annual convergence data indicate that no unusual trends have been identified and the mine is behaving as expected, with the exception of the U-40B and U12 areas. Since backfill placement in the U40B area has been completed the convergence rates have slowed and are trending back toward historical rates. The U-12 panel also shows higher than normal closure near the breakthrough with SW-2 and near the U-12A sub-panel. These areas are being monitored more frequently as we try to understand why the rates are increased. Both of these areas were backfilled during the 1990's.

13.a.5 - Summary of Subsidence Monitoring:

Surface subsidence measurements continue to be performed in accordance with the Mined Land Use Plan. No subsidence surveys were conducted this year. Past measurements indicate that the mine is behaving as expected with no anomalous subsidence zones. Plans are being made to conduct subsidence surveys of the west shore lines in the 2011 calendar year.

13.a.6 Source and Volume of Water Inflow Into the Mine and Disposition of Such Water:

The following is a list of sources and associated flow rates of water into the Cayuga Mine:

Production Shaft (#1 shaft) – 16 gallons per minute

Ventilation Shaft (#2 shaft) – 4 gallons per minute

ED Plant Concentrate discharge – 7 gallons per minute

Total Water Inflow = 27 gallons per minute

Water consumption for dust control – 8 gallons per minute

Total Water Requiring Disposal = 19 gallons per minute (based on 10,000,000 gallons measured annual flow).

All of the water is directed to a settling pond located on the 4-level of the mine. The water is then pumped from the settling pond to abandoned areas on 4-level. Recent volume calculations indicated that at our current rate (10,000,000 gallons per year) we have approximately 21 years of disposal life remaining on 4-level. Access to the storage ponds on 4-level is limited therefore the ponds have not been checked this year and the pond limits are estimated based on the measured flow rates. See the attached underground (4 level) pond map.

Action plans are in place to continue to reduce the inflow into the mine over the next year. A system for collecting the #1 shaft water inflow and for pumping it to surface for processing has been installed but is not yet operational awaiting installation of the piping in the #1 shaft. Once the piping installation is completed, this system is expected to reduce inflow by an additional 6 gpm (~3,000,000 gallons per year).

13.a.7 - Summary of SPDES Monitoring Data:

The following is a summary of the past year's outfall results (December 2009 – November 2010) and waste water treatment plant results (December 2009 – November 2010). No exceedences were identified during this time. If an exceedence occurs in the future it will be reported to the DEC in two ways. Once an exceedence has been identified the DEC is informed via telephone of the occurrence. Each event is also captured in the monthly Report of Non-Compliance, which also lists corrective action

taken. Several years ago, outfalls 004 and 005 were physically routed into outfall 003 so there is no longer any data from them.

Outfall results: Note - no exceedences were identified

CHLORIDE

Limit	40K	10K	10K	5K	5K	5K	5K	5K	5K
Outfall Number	001	002	003	004	005	006	007	008	012
Month/Year									
Dec 2009	14,000	2,300	840	Combined with 003	Combined with 003	1,400	450	Eliminated	2,100
Jan 2010	23,000	NF	NF			NF	1,600		NF
Feb	8,900	2,00	9,400			4,197	NF		NF
March	19,000	2,800	3,000			4,200	990		8,300
April	8,000	1,100	1,200			1,400	380		NF
May	8,700	880	1,200			1,700	400		2,500
June	35,000	2,600	1,500			2,600	810		2,200
July	21,000	NF	1,300			NF	NF		NF
August	21,000	2,500	790			3,600	1,700		2,200
Sept	19,000	NF	1,300			NF	1,500		NF
Oct	13,000	1,200	980			1,300	350		640
Nov	17,000	1,800	840			1,400	520		3,800

CYANIDE

Limit	1.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1
Outfall Number	001	002	003	004	005	006	007	008	012
Month/Year									
Dec 2009	1.03	<.01	<.01	Combined with 003	Combined with 003	<.01	<.01	Eliminated	<.01
Jan 2010	.22	NF	NF			NF	<.01		NF
Feb	.052	<.01	<.01			<.01	NF		NF
March	.063	<.01	<.01			.013	<.01		<.01
April	.056	<.01	<.01			<.01	<.01		NF
May	.054	.011	<.01			.013	<.01		.011
June	.11	.01	<.01			<.01	<.01		<.01
July	.6	NF	<.01			NF	NF		NF
August	.3	<.01	<.01			<.01	<.01		<.01
Sept	.83	NF	.01			NF	<.01		NF
Oct	.12	.011	<.01			<.01	<.01		<.01
Nov	.34	<.01	<.01			<.01	<.01		<.01

Outfall Results Continued:

TOTAL DISSOLVED SOLIDS

Limit	80K	40K	40K	10K	10K	10K	10K	10K	10K
Outfall Number	001	002	003	004	005	006	007	008	012
Month/Year									
Dec 2009	26,000	4,800	2,500	Combined with 003	Combined with 003	3,200	1,300	Eliminated	4,500
Jan 2010	3,700	NF	NF			NF	2,900		NF
Feb	1,500	4,100	1,700			7,000	NF		NF
March	31,000	5,300	6,000			8,100	1,900		8,300
April	14,000	2,600	2,900			2,500	1,200		NF
May	15,000	2,200	2,900			3,100	1,100		4,600
June	52,000	4,800	3,300			4,100	1,900		4,000
July	35,000	NF	3,400			NF	NF		NF
August	34,000	4,700	2,500			6,200	3,500		4,200
Sept	32,000	NF	2,900			NF	3,000		NF
Oct	24,000	2,500	2,100			2,400	860		1,400
Nov	26,000	5,400	2,400			2,600	1,200		6,700

ZINC

Outfall #001

Limit	20 mg/l
Month/Year	001
Dec 2009	.31
Jan 2010	.028
Feb.	.2
March	.02
April	.45
May	.022
June	2.1
July	.42
August	.1
Sept	1
Oct	.15
Nov	.4

Outfall Results Continued:

NON-CONTACT COOLING WATER Outfall #014

Limit	NA	75 deg. Max	500 GPM Max
Month/Year	Min/Max Intake Water Temp. deg. F.	Min/75 Max Effluent Water Temp. deg. F.	500 Max Gpm. Flow Rate Effluent Gross
Dec 2009	57.3/57.3	58.2/58.2	350
Jan 2010	48/50	50/52	350
Feb.	58.9/59.3	61.2/63	350
March	57/58	60/62	350
April	65/66	66/67	350
May	66.5/67	67/68	350
June	68.1/68.1	69.2/69.2	375
July	73.4/73.4	74.4/74.4	388.5
August	72/73.1	73.2/74.5	383
Sept	65.5/66.5	67.5/68.5	350
Oct	60.5/61.5	62.5/62.5	350
Nov	55.3/55.9	55.9/56.5	350

Waste Water Treatment Plant Outfall #009

	Flow Rate Ave.	BOD		PH.		Tot. Susp. Solids		Settleable	Total Resid.	Fecal Coliform	
		Ave.	Max.	Min.	Max.	Ave.	Max.	Solids	Chlorine	# Per 100 ml	
		30 Day	7 Day Ave			30 Day	7 Day Ave	Daily Max.	Daily Ave.	30 Day	7 Day Ave
Permit Limit		30	45	6.0	9.0	30	45	0.3 mg/l	1.0 mg/l	Report	Report
Dec. '09	1009	33	22	6.5	7.4	25	25	<0.1	.8	1	1
Jan. '10	1120	3	3	7.2	7.9	20	20	<0.1	.5	20	20
Feb.	966	19	19	6.1	7.2	8	8	<0.1	1	1	1
March	1038	5	5	6.5	7	23	23	<0.1	.7	1	1
April	869	7	7	6.5	6.9	13	13	<0.1	.5	1	1
May	896	10	10	6.3	7.2	24	24	<0.1	.5	1	1
June	829	10	10	6.5	7	24	24	<0.1	.6	4	4
July	1126	8	8	6.7	7.5	7	7	<0.1	.6	1	1
August	947	2	2	6.6	7.6	8	8	<0.1	.6	150	150
Sept	947	1	1	6.6	7.6	36	36	<0.1	.6	181	181
Oct	931	6	6	6.5	7.3	9	9	<0.1	.5	96	96
Nov	750	14	14	6.5	6.9	12	12	<0.1	.4	77	77

13.b - Notification of Non-routine Mining Incidents:

There were no incidents meeting the guidelines for notification as identified in section 13.a.2.

13.c. - MSHA Correspondence Involving Non-routine Mining Incidents:

The Cayuga Mine has not received any citations or correspondence from MSHA regarding non-routine mining incidents.

13.d. - Changes in Mining Method:

There have been no changes to the Cayuga Mine layout in the past year.

13.e. - Surface Subsidence:

Surface subsidence surveys continue to be done in accordance with the Mined Land Use Plan. See section 13.a.5 of this report.

13.f. - In-situ Rock Mechanics Measurements:

See section 13.a.4 of this report.

13.g. - Written Citizen Complaints:

There have been no written citizen complaints received by Cargill concerning the Cayuga Mine.