

The Corps' Investigation Work at the Tonawanda Landfill

Soil Sampling:

- 202 Sample locations in the Landfill
- 23 Sample locations along the residential fence line
- Soil samples analyzed for uranium, radium and thorium
- 80% of the sample locations had results at background levels normal for the area
- All sample locations within 50 feet of the residential fence line had results at background levels normal for the area

Groundwater Sampling:

- Groundwater is not used as a drinking water source for the area, and there are no private wells within 3 miles of the Landfill
- Groundwater samples collected from 10 Town of Tonawanda monitoring wells in the Landfill, and analyzed for uranium, radium and thorium
- The monitoring well closest to the fence line did not exceed Federal drinking water limits
- Of the 10 wells sampled, only 1 had uranium exceeding the Federal drinking water limit

Risks to Human Health:

- The Corps of Engineers took the sampling data and evaluated risks to human health from uranium, radium and thorium
- The Corps considered the presence of residences adjacent to the Landfill, and the fact that some residents may use the Landfill for recreational purposes
- The Corps evaluated the risk to residents coming onto the Landfill in its current uncapped condition, and after it is capped
- Risks were compared to risk limits established by the U.S. Environmental Protection Agency (USEPA)
- ***Risks from uranium, radium and thorium for current and future land uses are at or below USEPA risk limits***
- The Corps of Engineers also evaluated the dose from uranium, radium and thorium; and compared the dose to Federal limits and State guidelines
- ***Doses from uranium, radium and thorium for current and future land uses are below Federal limits and State guidelines***

**Closure Plans Discussed for
Town of Tonawanda Landfill
Public Meeting Agenda
February 8, 2007
7pm to 9pm**

Introductions – [REDACTED]
Hold Questions to End

Landfill History – [REDACTED]
(Show Recent Aerial Photo and Old Aerial Photo)

Closure Status – [REDACTED]
Work Completed – Site Grading (show Site Conditions Plan)
Phase 1 Berm
Intermediate Cover
Remaining Tasks – FUSRAP Resolution
NiMo Waste Relocation
Storm Wood - Chip Relocation/Odor Man. Plan
Surface Water Management System
Leachate Collection System
Grading / Capping
Viable and Productive End Use
Recreation
Green Space
Creative Alternatives

Regulatory Status – NYSDEC – [REDACTED]
Consent Order
Site Grading and Monitoring
AM-241
Post Maintenance and Monitoring

FURAP – USACE – [REDACTED]
FURAP History
Site History
Site Investigations
Investigation Findings

QUESTIONS?

Props :	Recent Aerial Photo	Site Conditions Plan
	Old Aerial Photo	NYDEC FACT SHEET



FACT SHEET

February 2007

Closure Plans Discussed for Town of Tonawanda Landfill



Fact Sheet/Public Meeting Announcement

Site No. 15S29

You are invited to attend a
PUBLIC MEETING

Regarding the
**Town of Tonawanda
Landfill Site**

to be held

February 8, 2007

at
7:00 PM
at

**Auditorium
Tonawanda High School
Hinds Street
Tonawanda, NY 14150**

At the meeting, Town of Tonawanda, DEC and the COE will discuss and answer questions regarding the investigation, remediation, and closure of the Town of Tonawanda Landfill.

INTRODUCTION

A public meeting will be held to discuss closure plans for the Town of Tonawanda Landfill. (See box at left for meeting details.) At the meeting, representatives from the Town of Tonawanda, Erie County Legislature, NYS Department of Environmental Conservation (DEC), and the United States Army Corps of Engineers (COE) will be present to answer questions, discuss environmental investigations completed at the site, and to provide an update on current and future activities for cleanup and closure of the landfill.

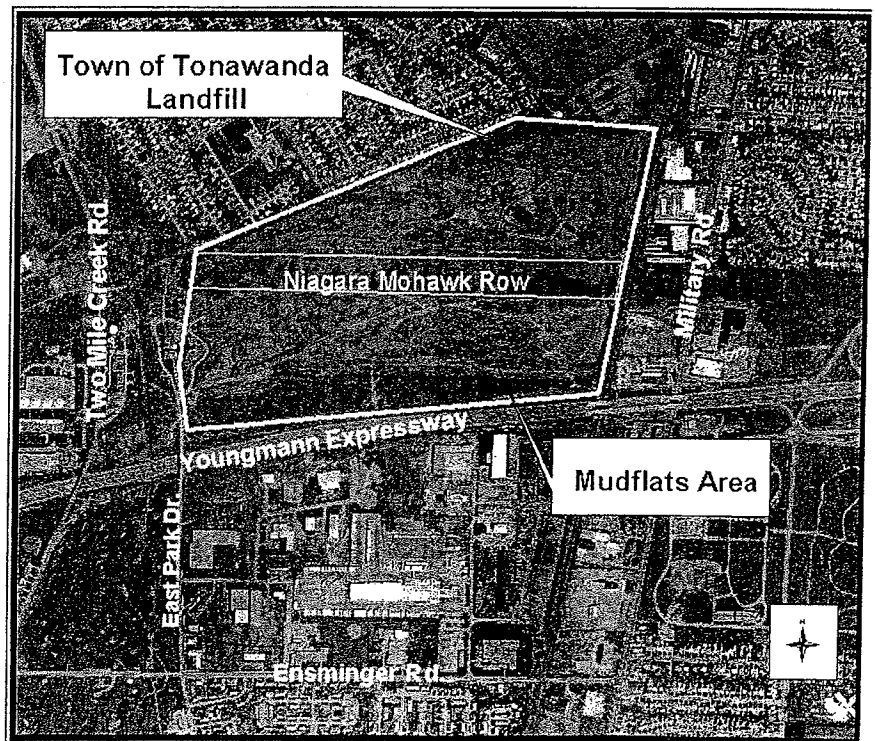
Planned landfill closure work will be performed by the Town in accordance with the New York State Part 360 Solid Waste Management Facility regulatory requirements. In addition, the COE is investigating the landfill property under the federal Formerly Utilized Sites Remedial Action Program (FUSRAP).

The goal of the landfill closure project is to construct a secure containment system so that contaminants in the landfill cannot adversely impact the public's health or the surrounding environment. This fact sheet is being provided to explain what the planned closure activities will involve, to offer information on the site's history, and to provide contact information should you have additional questions.

SITE BACKGROUND

The Tonawanda Landfill is a 55 acre property located off of East Park Drive, north of the I-290 Expressway and directly south of the City of Tonawanda in Erie County. (See map at right.) Properties immediately north of the site include a residential neighborhood with industrial and commercial properties to the east along Main Street/Military Avenue. A low-lying area generally referred to as the mudflats borders the southern section of the landfill.

The landfill was first used for the disposal of municipal wastes in the 1930s and continued to operate until 1989. Throughout this period, the landfill was primarily used for the disposal of household waste, incinerator ash from the burning of the Town's sewage sludge and garbage, incinerator by-pass waste, construction and demolition debris, and yard wastes.



After the landfill ceased operating in 1989, numerous investigations were conducted at the site to define the type and location of wastes, and to determine the quality of groundwater and surface water. To date, the landfill has not been properly closed in accordance with environmental regulations. In December of 2001, DEC negotiated with the Town of Tonawanda through a consent order, and required that the Town complete closure of the landfill.

Investigations were also conducted by the US Department of Energy (DOE) and the COE to identify and characterize the extent of radiological contamination at the site believed to be associated with activities performed under the Manhattan Engineer District (MED) from approximately 1945 to 1955. The Tonawanda Landfill was identified as a FUSRAP vicinity property, and the COE issued a Remedial Investigation Report for the site in March of 2006.

Additionally, it is known that wastes contaminated by Americium-241 (a radioactive material used in the making of smoke detectors) were deposited in the landfill in the early 1980s. Numerous investigations were conducted to define the extent of this waste. A NYS Task Force determined in 1989 that it was safe to leave the Am-241 material in place as long as several feet of fill and a landfill cap were placed over the waste.

As part of the consent order, DEC agreed to allow the Town to place additional, select waste in the landfill to bring it to the final grades needed to construct a proper cap. For the past several years, the Town's contractor, EnSol, Inc., has overseen the landfill's final grading. The majority of wastes used for final grading consist of roofing debris and non-hazardous soil material from gas and fuel oil spill cleanups. Final grading work is continuing, and the east portion of the landfill has reached final grade. Cap construction work will follow; however, a detailed schedule for this work is not yet available.

In addition, DEC has approved a plan to eliminate the source of the recent odor problems from piles of chipped storm debris that are stored on-site, and EnSol will soon begin to actively compost the debris.

DESCRIPTION OF PLANNED WORK ACTIVITIES

Cleanup and closure activities planned for the landfill include:

- Excavating buried waste located on the Niagara Mohawk Power Company right-of-way, and placing the excavated waste in the landfill;
- Composting all storm debris and yard waste;
- Grading the landfill with select waste fill until final slope is achieved;
- Constructing an impermeable cap over the entire landfill that includes gas venting;
- Constructing a leachate collection and discharge system;
- Constructing a surface water collection and control system; and
- Monitoring groundwater wells at the site during the closure and long term post-closure period.

Landfill closure work will proceed in two phases, with the timeframe somewhat depending upon the outcome of the COE's planned activities under FUSRAP. The future use of the closed landfill site will be determined by the Town of Tonawanda and is subject to DEC's review and approval process.

WHO SHOULD I CALL IF I HAVE QUESTIONS ABOUT THE SITE?

Should you have questions about the Tonawanda Landfill site, please contact the representatives identified below:

Site-Related Environmental Questions

██████████ Project Manager
NYS Department of Environmental Conservation
270 Michigan Avenue
Buffalo, NY 14203
(716) 851-7220

Site-Related Odor Concerns

██████████
NYS Department of Environmental Conservation
270 Michigan Avenue
Buffalo, NY 14203
(716) 851-7130

Site-Related Project Questions

██████████
Director of Water Resources
Town of Tonawanda
779 Two Mile Creek Rd.
Tonawanda, NY 14150
(716) 693-4900