

NEW YORK STATE
DEPARTMENT OF



ENVIRONMENTAL
CONSERVATION

Update: Public Notice For the Northrop Grumman & The NWIRP Sites

Northrop Grumman and The Naval Weapons Industrial Reserve Plant (NWIRP) Inactive Hazardous Waste Sites, **Operable Unit 2 (OU2) Record of Decision Public Notice and Project Update.**

The New York State Department of Environmental Conservation (NYSDEC) is sending this public notice fact sheet as an update on the Northrop Grumman (Grumman Aerospace), Naval Weapons Industrial Reserve Plant (NWIRP) and the Grumman Steel Los Inactive Hazardous Waste Disposal Sites, located off Hicksville Road and South Oyster Bay Road, Bethpage Nassau County, New York (see map). The NYSDEC and the New York State Department of Health (NYSDOH) are pleased to announce the signing of the **Operable Unit 2 (OU2) Record of Decision** and the implementation of remedial design.

SITE HISTORY AND DESCRIPTION

The Northrop Grumman - Bethpage Facility, the Naval Weapons Industrial Reserve Plant - Bethpage (NWIRP) and the Grumman Steel Los Sites are inactive hazardous waste disposal sites, Site Nos. 1-30-003-A, 1-30-003B and 1-30-003C, respectively, and are located in east-central Nassau County, Long Island. Northrop Grumman, formerly known as the Grumman Aerospace Facility, was 600-acres, but through a program of investigation and remediation has been reduced in size. The NWIRP Site is approximately 105 acres in area and was once part of the Grumman Aerospace facility. The Grumman Steel Los Site was also once part of the Northrop Grumman Site. These sites are listed as Class 2 sites (No. 1-30-003A&B) in the New York State Registry of Inactive Hazardous Waste Disposal Sites. Class 2 is a listing assigned to sites where hazardous waste poses a significant threat to human health or the environment. The Grumman Steel Los Site, or the former Grumman Aerospace Plant 2 facility, relates to this project as it was once part of the Northrop Grumman Site and was one of the sources of the groundwater contamination. The surrounding community is supplied with drinking water from the Bethpage Water District (BWD). Public water supplies are monitored on a regular basis to assure they meet New York State drinking water standards.

INVESTIGATION SUMMARY: DESCRIPTION OF THE PROBLEM:

Northrop Grumman and the NWIRP have been in operation since the 1930s. Northrop Grumman has manufactured numerous aircraft for the Department of the Navy. This has resulted in the disposal of various hazardous wastes from industrial processes directly into the environment. On March 9, 1992 Northrop Grumman signed an Order on Consent with the State of New York to perform a remedial investigation and feasibility study (RI/FS). The State executed the Records of Decision (RODs) for the Northrop Grumman and NWIRP Sites in March and July 1995, respectively, for onsite Soils contamination. These RODs were known collectively as Operable Unit 1 (OU1). The RODs selected source control remedies for addressing the contamination in the unsaturated zones of site soils.

The groundwater contamination was deferred to OU2. The primary groundwater contaminants are chlorinated volatile organic compounds (VOCs) which were used and disposed of at the sites. These compounds include perchloroethene (PCE), trichloroethene (TCE), dichloroethenes (DCE), vinyl chloride and 1,1,1-trichloroethane (TCA). In addition, metals, specifically arsenic, barium, cadmium, chromium, lead, mercury, selenium, and silver, were detected in groundwater samples collected at the sites. However, only arsenic, cadmium, and chromium were detected at concentrations greater than the corresponding standards, and only in a small number of onsite monitoring wells, with chromium being the more prevalent.

**Public Notice
For the
Northrop Grumman
and the NWIRP Sites
Operable Unit 2
Record of Decision**

Main Document Repository
Bethpage Public Library
Powell Avenue
Bethpage, NY 11714

For More Information on the
Northrop Grumman, NWIRP
and Grumman Steel Los Sites:

NYSDEC Central Office
50 Wolf Road Room 242
Albany, NY 12233-7010
Att: Steven M. Scharf, P.E.
Project Engineer
(518) 402-9620
1-800-342-9296

NYSDOH
547 River Street
Troy, NY 12180
Attn: William Gilday
(518) 402-7880
1-800-458-1158 Extension
27880

EXTENT OF GROUNDWATER CONTAMINATION

By current estimates and confirmed by the Department of the Navy predesign drilling program, the groundwater plumes emanating from the three sites total 2,000 acres in area and are over 500 feet deep in several places. The highest concentrations of VOCs in groundwater were detected in on-site wells. The plume(s) emanating from the sites have impacted or threaten three public water supplies operated by the Bethpage Water District (BWD). Water from these wellfields is treated to remove VOCs prior to distribution to the community and water is monitored routinely. Nine (9) outpost or sentry wells were installed upgradient of the water supplies. These sentry wells have been sampled on a quarterly basis since March 1995.

OPERABLE UNIT 2 RECORD OF DECISION (ROD)

The Northrop Grumman **OU 2 Groundwater Remedy ROD** is now available for the public to review. This ROD details the selected remedy and contains a responsiveness summary for questions raised at the December 13th 2000 public meeting. The selected Alternative 3 includes: on-site plume containment, treatment and activated carbon air treatment, and discharge to on-site recharge basins; the off-site GM-38 area groundwater extraction and treatment system; the operation and maintenance of air strippers for BWD wellfields 4, 5 and 6; preparation of a wellhead treatment contingency plan for public water supply wells that are not currently affected but that may be affected by site-related VOCs in the future; a carbon polishing or equivalent treatment contingency for the BWD wellfields 4, 5 and 6; a vinyl chloride treatment contingency plan for the on-site containment IRM; long-term groundwater monitoring including comprehensive monitoring of plume attenuation; and long-term operation and maintenance of all operating treatment systems onsite and offsite.

Public Water Supply Protection Program

1. Protection of the Bethpage Water District Supply Wells Air Stripper systems that remove VOC contaminants have been installed at the three impacted or threatened public supply wellfields operated by the BWD. The systems at BWD plants 4 and 6 were funded by Grumman. The system at BWD Plant 5 was funded by the Navy as specified in the May 1995 Record of Decision for the NWIRP-Bethpage site. In order to insure funding for the BWD, these systems have initially been included as an IRM and are now part of the permanent remedy.

2. The installation and/or quarterly monitoring for VOCs of outpost monitoring wells installed with respect to potentially affected public and private water supply wells, including BWD well fields 4, 5 and 6. The remedial design will determine the best locations for any additional outpost wells. Outpost monitoring wells will be sampled quarterly.

3. A public water supply contingency plan for the design, construction, operation and maintenance of wellhead treatment systems. If evaluation of the long term groundwater monitoring or the outpost well data indicates that a public supply well has been or is in imminent danger of being impacted by Northrop Grumman/NWIRP site-related contaminants, then wellhead treatment or comparable alternative measure(s) for the impacted public water supply well(s) will be necessary. This determination will be made by NYSDEC, NYSDOH, and the Nassau County Department of Health in conjunction with the potentially impacted water district. The treatment system or comparable alternative measure(s) to produce potable water will be designed and constructed with input from the affected water district.

4. Northrop Grumman and the Department of the Navy have agreed to establish a goal for any given wellhead treatment or comparable technology for affected drinking water supplies which will provide water that is non-detect using USEPA Method 502.2 to a detection limit of 0.5 micrograms per liter (ug/l) with respect to VOCs for site related contamination as cited in the 2001 Water Quality Monitoring Requirements for Nassau County Public Water Systems.

Groundwater Remediation Program

2. Onsite Containment System: The groundwater IRM is containment of the plume below the sites. This groundwater IRM system went on-line full time in July, 1998. The IRM consists of four extraction wells, with the combined pumping rate of 3,375 gpm and is now known as the Onsite Containment System.

The long-term operation, maintenance and monitoring (OM&M) of the ONCT and GM-38 area extraction well(s). Monitoring will include the installation and use of upgradient and downgradient groundwater shallow, intermediate, deep and very deep monitoring wells. Testing will be done, at a minimum, on a quarterly basis unless otherwise approved by the NYSDEC, to verify the system performance. Additionally, monitoring of groundwater elevations will be done, initially on a quarterly basis (unless otherwise approved by the NYSDEC) to determine the groundwater capture zone in different seasons, and annually thereafter.

A specific investigative task will include current work and potentially include, but is not necessarily limited to, installation of additional groundwater monitoring wells, vertical profile borings (VPBs), and groundwater sampling to determine if there are any other areas of elevated groundwater contamination that warrant additional remediation under OU2 and/or creation of an Operable Unit 3. This task, which includes the recent and ongoing installation of VPBs, will be documented in a report to the NYSDEC. The NYSDEC will

then, based on the report, make a final determination.

Repositories: The public is encouraged to review the documents related to the site, which are available to the public at the following locations:

Bethpage Public Library NYSDEC Region 1 Headquarters

Powell Avenue
Bethpage, NY 11714
(516) 931-3907
Hours: M-F 9:30-9:00
Sat 9:30-5:00
(Karen Gruskin or Lois Lovisolo-Reference Librarians)

SUNY Campus
Loop Road Building 40
Stony Brook, NY 11790-2356
Attn: Mark Lowery, Citizen
Participation Specialist

NYSDEC Central Office

625 Broadway, 11th floor
Albany, NY 12233-7015
Attn: Steven M. Scharf, P.E.

For More Information regarding this site please contact the following:

NYSDEC Concerns

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