

The Public Health Action Plan (PHAP) for the Brookhaven Landfill site contains a description of actions to be taken by ATSDR and/or NYS DOH at and near the site subsequent to the completion of this health consultation. For those actions already taken at the site, please see the Background and Statement of Issues section of this health consultation (note that PHAPs discussed in the draft health consultation are now accomplished and discussed elsewhere in the document). The purpose of the PHAP is to ensure that this health consultation not only identifies public health hazards, but also provides a plan of action designed to mitigate and prevent adverse human health effects resulting from exposure to hazardous substances in the environment. Included is a commitment on the part of ATSDR and NYS DOH to follow-up on this plan to ensure that it is implemented. The public health actions to be implemented are as follows:

- A. NYS DOH will work with NYS DEC to respond to future community concerns if any are identified.

ATSDR will reevaluate and expand the PHAP as needed. New environmental, toxicological, or health outcome data, or the results of implementing the above proposed actions may determine the need for additional actions at this site.

contamination eliminated. The area resident feels the remedial measures to prevent further contamination are not enough.

Response #22: The remedial measures implemented at the landfill are discussed in the Water Quality subsection. We have evaluated the groundwater contamination as it relates to the potential for human exposure and mitigated exposures, where needed. We feel that remedial measures are in place to minimize further contamination and that the provision of potable water to residents is one of our primary public health concerns. The issue of eliminating existing contamination will be shared with the NYS DEC and the town of Brookhaven.

Comment #23: In the Groundwater Related Exposure Pathways subsection, the document speculates about the "probable" ingestion of VOCs, the "probable" inhalation of vaporized VOCs, and the "probable" dermal absorption of VOCs that were "likely" to have come from the landfill. It also implies that such inhalation and absorption continue to be a problem. The data, referred to in the health consultation, does not support these conclusions. Moreover, there is evidence to the contrary. The conclusion of a report prepared by the town is that a localized spill, rather than the plume, is responsible for the detection of certain organic compounds downgradient of the landfill.

Response #23: Although there is some uncertainty in the exact source of the VOCs in the private wells monitored, based on the town's (Tonjes and Heil, 1996) and USGS reports, it is reasonable to state that some of the VOCs may have originated from the landfill. For this reason the health consultation did not definitively state that the VOCs were from the landfill. This does not contradict the conclusion drawn in the health consultation that leachate from the landfill has impacted groundwater and is consistent with the conclusion that area residents were likely exposed.

Comment #24: Several residents requested private well testing and extending public water. The Public Health Action Plan (PHAP) in the draft health consultation recommended identifying private wells that may be affected by contamination from the landfill.

Response #24: The draft health consultation included a recommendation to survey private wells near the landfill to determine the number of private wells in use for drinking water and to decide which of these wells, if any, should be sampled. Since the draft health consultation was written, the private well survey was completed and the results are included in the Groundwater Contamination section.

A community group provided additional completed private well survey forms and asked to have them included in the survey. The additional locations were included in the NYS DOH private well survey of the area. One survey response indicated that a neighboring private well on Burnett Lane was possibly used for drinking water. The Suffolk County Department of Health Services investigated this possibility in 1996 and found that the Suffolk County Water Authority served all the homes on that road for drinking water.

(HARP) found that no follow-up health actions are indicated at this time. Planning should be a priority of this panel to assure the residents that all health risk aspects have been considered.

Response #42: HARP was a panel of experts in the fields of toxicology, epidemiology, health education, and engineering. This panel no longer exists as HARP, but its tasks are conducted by experts at ATSDR and NYSDOH who contribute to this health consultation. The purpose of the HARP was to review the available data and objectively determine if health related activities were necessary. This purpose, as well as the general protection of public health, are addressed through this health consultation. Past remedial activities have reduced exposures and review of all available data indicates that the exposures to the levels of contaminants identified (see Discussion section) do not warrant any further formal health-related or epidemiologic activities. The PHAP now states that "NYS DOH will work with NYS DEC to respond to future community concerns if any are identified" and they will "re-evaluate and expand the PHAP as needed."

Comment #43: With the increased amounts of incinerator ash to be processed at the site, we find it premature to lower the classification of the site to an intermediate health hazard. Remedial efforts with the hydrogen sulfide and plume problems are occurring with some success. The draft health consultation itself states, however, that there has been limited and therefore insufficient testing of ambient air quality associated with this facility.

Response #43: The NYS DOH and ATSDR assigned the classification of indeterminate (not intermediate as written in the comment) public health hazard to the site conditions in the draft health consultation because of the insufficient air monitoring data at that time. The ATSDR criteria and action levels of public health hazard categories are included in the draft health consultation in Appendix D.

Since the release of the draft health consultation, additional on-site ambient air was sampled from 1997 through 1999 for hydrogen sulfide, VOCs, and methane. The results and their public health implications are examined in the final health consultation and the Brookhaven landfill is now classified as no apparent public health hazard.

Comment # 44: What is the connection between this health consultation and the "Small Area Analysis of Breast Cancer Incidence Rates in Nassau and Suffolk Counties, New York, 1978 - 1987", which is discussed in the Health Outcome Data subsection of the draft health consultation (NYS DOH, 1990).

Response #44: In general, the Health Outcome Data subsection of a health assessment or consultation includes reports of health outcome data that pertain to the geographic area under discussion. A discussion of the "Small Area Analysis of Breast Cancer Incidence Rates in Nassau and Suffolk Counties, New York, 1978 - 1987" was included in the prior draft because the Brookhaven area was included in the breast cancer study. The current document contains information about a cancer incidence study conducted specifically for the Brookhaven Landfill area and discussion of the "Small Area Analysis of Breast Cancer Incidence Rates" is no longer included.