



Gateway National Recreation Area

Sandy Hook • Jamaica Bay • Staten Island

FREQUENTLY ASKED QUESTIONS

DEAD HORSE BAY SITE

What steps are you taking to protect the safety of the visitors?

The southern area of the Dead Horse Bay Site (site) (approximately 84 acres) at Gateway National Recreation Area will be closed to the public due to the presence of radiological contamination at the site. Visitors to the southern area of the Site primarily use this area for passive recreation, like walking on trails. However, visitors also may conduct unauthorized digging using metal detectors to retrieve or remove items of interest or remove items from the beach surface. Because NPS identified and removed for off-Site disposal two man-made radioluminescence articles (i.e., deck markers) buried 2-feet below the surface in the southern portion of the Site, potential exists for a visitor to be exposed to radiological contamination or man-made radiological articles either from unauthorized digging or removal of items. For public safety, NPS has therefore closed this portion of the Site to the public.

How did the contamination get to the Dead Horse Bay Site?

As early as the 1870s, Dead Horse Bay was the main dumping ground for carcasses of dead horses from nearby horse rendering plants. In addition, the New York Sanitary Utilization Company, dumped unprocessed refuse such as glass bottles, into Dead Horse Bay. In addition, prior to the enactment of environmental laws, solid waste often was used as fill material to create new land. Topographic maps indicate that the Site was filled in by the City of New York with solid waste mounded up to an elevation of 25 feet between approximately 1948 and the mid-1950's. Based on investigations conducted by NPS to date, NPS believes that some of the fill material used for land expansion contained radiological and other chemical contamination. Sources of radiological contamination found buried in near surface soils at the Site are man-made radioluminescence articles, or deck markers, that contain radium. Deck markers such as those found at the Site were used historically by the military, including the Navy, to provide low level light sources at night.

Does the NPS plan to fully address the contamination at the Dead Horse Bay Site?

Yes, NPS is taking all the necessary actions to address risks posed by the contamination at the Site, including closure of the southern portion of the Site, while it conducts more detailed investigations. As part of these detailed investigations, NPS will first identify the types of radiological and chemical contaminants present at the Site and the extent of those contaminants. The investigation will then determine whether those



contaminants may pose a risk to human health and the environment. Finally, NPS will evaluate cleanup alternatives to determine how best to address those risks in order to make the Site safe for future use.

How will NPS determine what are safe or unsafe levels of radiological and chemical contamination?

The NPS is proceeding under the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) and the National Oil and Hazardous Substance Pollution Contingency Plan (NCP).

CERCLA and the NCP outline the process that NPS must follow in order to address contaminants at the Site. This process establishes rigorous requirements by which the Site is investigated, identifies cleanup standards, and requires the evaluation of cleanup alternatives in order to ensure the remedy selected to clean up the Site will protect human health and the environment and comply with all legal requirements.

How dangerous is the contamination identified at the Site?

Radium-226 has been identified as the primary radiological contaminant at the Site. Radium-226 gives off gamma rays which is how we can find the contaminants at the Site. However, within a few feet of the source of the radiological contamination (e.g., deck markers found at the Site), the gamma radiation levels found at the Site drop off to normal background. Therefore, exposure to gamma radiation is not considered to be a significant health risk. The greatest potential risk to human health comes from being in direct contact with the source of the contamination for an extended period of time. Polychlorinated biphenyls (PCBs), pesticides, polycyclic aromatic hydrocarbons, and various metals also have been identified in the soil at the Site, but the full nature and extent of chemical contamination is unknown at this time.

How long will this cleanup take?

This cleanup may take many years. The CERCLA process has many steps, and each one must be followed.

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Who can I contact if I have questions, comments, or concerns? How can I stay informed?

- Sign up to receive project updates via email. Email us at Gateway_Feedback@nps.gov to sign up.
- Email us at Gateway_Feedback@nps.gov at any time with questions.
- Call the NPS Public Affairs Office at 917-282-9393.