



# FACT SHEET

# Manufactured Gas Plant Program

Receive Site Fact Sheets by *Email*. See "For More Information" to Learn How.

**Site Name:** K - Dangman Park MGP  
**DEC Site #:** 224047  
**Address:** 486 Neptune Ave  
Brooklyn, NY 11224

Have questions?  
See  
"Who to Contact"  
Below

## Interim Remedial Measure Proposed; Public Meeting and Public Comment Period Announced

**Public Meeting**  
**Thursday, October 06, 2016 at 6:30 PM**

**Temple Beth Abraham**  
301 Sea Breeze Avenue  
Brooklyn, NY 11224

NYSDEC invites you to a public meeting to discuss the remedy proposed for the site. You are encouraged to provide comments at the meeting, and during the 30-day comment period described in this fact sheet.

National Grid, under the oversight of the New York State Department of Environmental Conservation (NYSDEC) is proposing an expedited cleanup for the K - Dangman Park MGP site ("site") located at 486 Neptune Ave, Brooklyn, NY. Please see the map for the site location (Figure 1). Documents related to the cleanup of this site can be found at the location(s) identified below under "Where to Find Information." NYSDEC is conducting a public meeting and public comment period because this Interim Remedial Measure (IRM) is likely to represent a significant part of the cleanup for this site. MGP is an abbreviation for Manufactured Gas Plant. A manufactured gas plant was an industrial facility at which gas was produced from coal, oil and other feedstocks. The gas was stored, and then piped to the surrounding area, where it was used for lighting, cooking, and heating homes and businesses.

For additional information, visit: <http://www.dangmanparkmgpsite.com/>

### How to Comment

NYSDEC is accepting written comments about the proposed IRM work plan for 30 days, from **September 29, 2016** through **October 31, 2016**. The proposed plan is available for review at the location(s) identified below under "Where to Find Information." Please submit comments to the NYSDEC project manager listed under Project-Related Questions in the "Who to Contact" area below.

## **Draft Interim Remedial Measure Work Plan**

An Interim Remedial Measure (IRM) is a cleanup activity that may be performed when a source of contamination or exposure pathway (the way in which a person may contact contamination) can be effectively addressed without extensive investigation and evaluation.

The draft IRM work plan describes the proposed cleanup activities which include:

Soil excavation- The proposed IRM includes three excavation areas, as described below and as shown on Figure 2. Soils excavated from these areas will be trucked off-site for proper treatment and disposal. Two of these areas are from beneath existing buildings that will be demolished as part of the site redevelopment.

These excavations will be performed under a temporary fabric structure, which will be equipped with an air capture and treatment system to prevent vapors and odors from escaping into the surrounding neighborhood. These structures have proven highly effective at controlling odors on other Manufactured Gas Plant (MGP) sites statewide.

*Northwest Holder and Cistern Excavation Area (Area 1):* This area, which includes the foundation of a former gas storage holder and surrounding contaminated soils, is approximately 6,600 square feet (sf) in area. It will be excavated to the depth of the holder bottom, approximately 21 feet below ground surface (ft bgs) with the removal of approximately 5,130 cubic yards (CY) of material.

*Back Alley Excavation Area (Area 2):* This rectangular area, which is approximately 2,100 sf, part of which encompasses the location of a former tar tank, will be excavated to a depth of 15 ft bgs for removal of approximately 1,170 CY of material. An adjoining utility corridor will remain in place. Measures (e.g., placing an appropriate liner within the excavation) will be implemented to prevent recontamination of the backfill material by potentially mobile coal tar in the remaining soils beneath the utility corridor.

*SRI-10 and SRI-11 Petroleum Coated Soil Excavation Area (Area 3):* This is an additional area where visible petroleum-contaminated soils were observed. This area, which is approximately 1,195 sf, will be excavated to a depth of 15 ft bgs for removal of approximately 660 CY of material.

In-situ treatment- In addition to the excavation of contaminated soils as described above, a longer-term system will be employed to treat the less contaminated soil in place (see Figure 2). Calcium sulfate (better known as gypsum) is a slowly dissolving material which provides necessary nutrients that encourage naturally occurring soil bacteria to consume the remaining petroleum and tar contamination without the need to excavate and transport the contaminated soil.

Gypsum will be emplaced within the backfill of Excavation Areas 2 and 3 to provide a long-term source of sulfate to the area downgradient of the excavations. Gypsum slurry will also be injected at locations within the area of observed petroleum contamination that would not be directly addressed by Excavation Area 3, totaling approximately 15,000 sf.

The gypsum that will be emplaced and injected at this site will provide years of long term treatment, because gypsum dissolves slowly in water.

### *Summary of the Investigation*

Sampling of soil and groundwater was conducted during the Supplemental Remedial Investigation (SRI), which complemented the previously completed Remedial Investigation (RI). The SRI characterized the subsurface conditions underneath the shopping center building where it was occupied and inaccessible during the RI work. The SRI, along with the RI, has sufficiently defined the nature and extent of contamination at this site.

Based upon investigations conducted to date, the primary contaminants of concern at the site are coal tar and petroleum.

Soil- Soils beneath the site are contaminated with coal tar and petroleum over an area that generally corresponds to the footprint of the former MGP. Some lateral migration of tar has occurred away from the source areas to the north and south, but this has taken place at depths far below the water table which are considered very unlikely to cause human or ecological exposures in the future.

The heaviest contamination was found in three source areas, which have been targeted for removal as part of this IRM:

- 1) The Northwest Gas Holder: This gas holder foundation was found to contain visible tar contamination, both within the holder foundation itself and in the surrounding soils.
- 2) The Back Alley: The tar tank in the back alley is likely to be the source of coal tar contamination that was observed in the area.
- 3) Petroleum Contamination beneath the slab: Petroleum contamination was found at the approximate depth of the water table in several locations beneath the slab of the shopping center. It was particularly visible in the area near locations where petroleum feedstocks were apparently stored when the MGP was in operation.

Groundwater- Groundwater contamination was found in wells located in close proximity to the tar-contaminated and petroleum-contaminated soils. Contaminant concentrations fall off sharply with distance from the contaminant source areas beneath the strip mall, indicating that natural bacterial decay is taking place. This groundwater contamination remains underground and is not affecting human or ecological receptors. The surrounding area is served by public water supply, obtained from sources far removed from the site and not affected by site contamination.

Soil Vapor & Indoor Air- Soil vapor intrusion is the process by which Volatile Organic Compounds (VOCs) can migrate from the subsurface into the indoor air of overlying buildings.

MGP-related contaminants were detected in vapor samples beneath the floor slab of the shopping center; however, these contaminants are not migrating into the overlying buildings at levels that require action to address exposure. MGP-related contaminants detected in indoor air were consistently below typical background indoor air concentrations.

Chlorinated hydrocarbon vapors were also detected in sub-slab and indoor air at levels that require actions to address the potential for exposure. Levels detected in the indoor air are above typical indoor air concentrations but below NYSDOH guidelines. Chlorinated hydrocarbons are not related to the MGP and are likely the result of other post-MGP land uses such as dry cleaning.

## Next Steps

NYSDEC will consider public comments, revise the plan as necessary, and approve the IRM work plan in consultation with New York State Department of Health (NYSDOH). The approved work plan will be made available to the public (see “Where to Find Information” below). After the work plan is approved, the activities detailed in the work plan will be implemented. Upon completion of the work, a Construction Completion Report will be prepared that documents the activities that were performed.

NYSDEC will keep the public informed throughout the investigation and cleanup of the site.

## Background

Location: The Dangman Park MGP site is located in an urban area, in Coney Island, Brooklyn. The site totals approximately 1 acre of land bounded by Neptune Ave to the north, W. 5th St. to the east, a residential parcel to the south, and a commercial parcel to the west. The site is contained within Lots 1R and 25 of Block 7273.

Site Features: Currently, the site is developed with a shopping center and a parking lot for a high-rise apartment building. The site is approximately 1,300 feet southeast of Coney Island Creek and approximately 2,400 feet north of New York Bay.

Current Zoning and Land Use: The site is currently active and is zoned for residential and commercial uses. The surrounding parcels are currently used for a combination of commercial and residential. The site is located within a special purpose zoning district designated as the “Special Ocean Parkway District.”

Past Use of the Site: An MGP operated on-site from approximately 1895 until sometime between 1906 and 1930. As a result of the MGP operations, coal tar has impacted the subsurface soil and groundwater on parts of the site. The above-grade MGP structures were removed sometime between 1906 and 1930. The below grade portions of the former gas holders, tar tank, and cistern are all likely sources of the tar releases from the former MGP. By 1930, the site was occupied by a club house. By 1966, the Trump Village Shopping Center occupied the northern and central portions of the site.

Site Geology and Hydrogeology: The subsurface soils under the site consist of approximately 5 to 15 feet of fill material overlying glacial sand deposits. The groundwater table is approximately 6.5 to 7.5 feet below ground surface and ground water flows northwest, toward Coney Island Creek.

Additional site details, including environmental and health assessment summaries, are available on NYSDEC’s website at:

<http://www.dec.ny.gov/cfm/xtapps/derexternal/haz/details.cfm?pageid=3&progno=224047>

**About the Manufactured Gas Plant Program:** NYSDEC has one of the most aggressive Manufactured Gas Plant (MGP) site investigation and remediation programs in the country. Since the problems associated with the former MGP sites were identified, NYSDEC has been working with all the utilities on a state-wide basis to identify and address the issue of MGP sites for which they may have responsibility. This effort has resulted in approximately 220 sites identified for action by the eight utilities operating in New York State. Currently we have individual site or multi-site orders or agreements with all eight utilities, including National Grid, and several other individual site volunteers, to address 216 of these MGP sites.

In addition, there are 28 MGP sites that NYS is addressing or evaluating for action under the State Superfund. NYSDEC continues to seek to identify any other possible MGP sites throughout the State.

For more information about the NYSDEC’s MGP Program, visit:  
[www.dec.ny.gov/chemical/8430.html](http://www.dec.ny.gov/chemical/8430.html)

## FOR MORE INFORMATION

### Where to Find Information

Project documents are available at the following location(s) to help the public stay informed.

NYSDEC Central Office  
Attn: William Wu  
625 Broadway Floor 11  
Albany, NY 12233-7014  
phone: 518-402-9662  
([william.wu@dec.ny.gov](mailto:william.wu@dec.ny.gov))

Brooklyn Community Board 13  
1201 Surf Ave Floor 3  
Brooklyn, NY 11224  
phone: 718-266-3001

National Grid maintains a website for the former Dangman Park MGP Site. The website has background material on the Site, information on the investigation, and a Key Documents section with the major reports.

<http://www.dangmanparkmgpsite.com>

### Who to Contact

Comments and questions are always welcome and should be directed as follows:

#### Project Related Questions

William Wu  
NYS Department of Environmental Conservation  
Division of Environmental Remediation  
625 Broadway Floor 11  
Albany, NY 12233-7014  
Tel: 518-402-9662  
Email: [william.wu@dec.ny.gov](mailto:william.wu@dec.ny.gov)

#### Site-Related Health Questions

Dawn Hettrick  
New York State Department of Health  
Empire State Plaza Corning Tower, Room 1787  
Albany, NY 12237  
Tel: (518) 402-7860  
Email: [BEEI@health.ny.gov](mailto:BEEI@health.ny.gov)

#### Telephone Hotline

National Grid has a Hotline for neighbors of the Site. The Hotline provides an opportunity to ask questions or leave comments.

**(718) 403-3014**

<http://www.dangmanparkmgpsite.com>

**We encourage you to share this fact sheet with neighbors and tenants, and/or post this fact sheet in a prominent area of your building for others to see.**

### Receive Site Fact Sheets by Email

Have site information such as this fact sheet sent right to your email inbox.

NYSDEC invites you to sign up with one or more contaminated sites county email listservs available at the following web page:

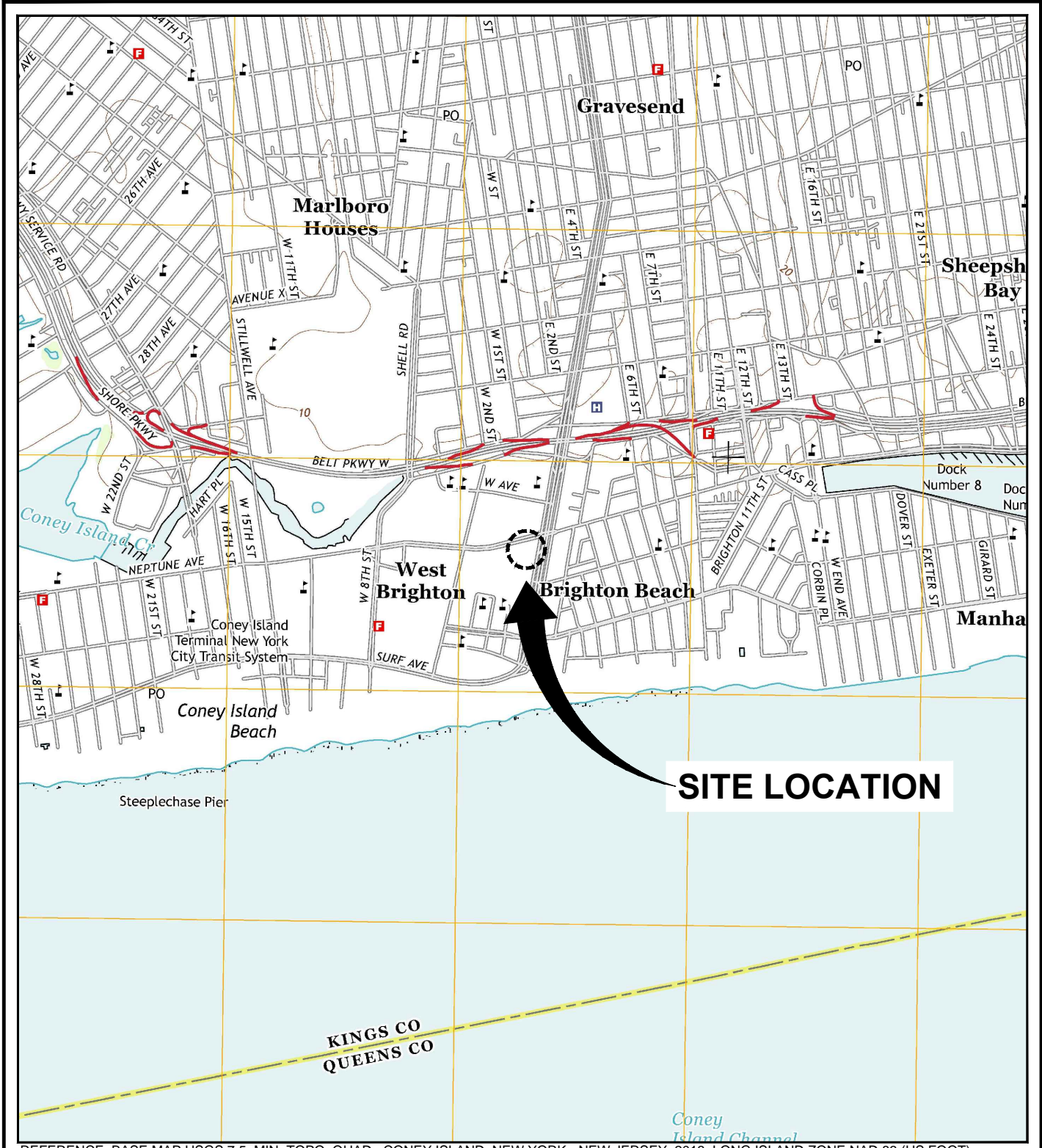
<http://www.dec.ny.gov/chemical/61092.html>. It's quick, it's free, and it will help keep you *better informed*.



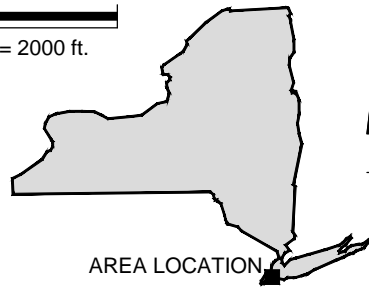
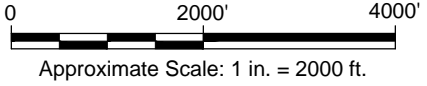
As a listserv member, you will periodically receive site-related information/announcements for all contaminated sites in the county(ies) you select.

Note: Please disregard if you already have signed up and received this fact sheet electronically.

CITY:SYRACUSE-NY DIV/GROUP/ENR DBA.SANCHEZ LDALS\_PIC(OP) PM:R(Regd) TM:OP) L:YR(OP)ON-OFF=REF Z:NEW/CAD/STRACUSE/AC/180067000/0/13/10912/6P/arcgisheet/38704FS01.dwg LAYOUT: 1 \$AVED: 9/12/2016 4:43 PM \$ACADVER: 19.1S (LMS TECH) PAGES: 19.1S (LMS TECH) PAGESETUP: PLOTSTYLETABLE: PLTFULL.CTB PLOTTED: 9/13/2016 10:56 AM BY: SANCHEZ, ADRIAN



REFERENCE: BASE MAP USGS 7.5. MIN. TOPO. QUAD., CONEY ISLAND, NEW YORK - NEW JERSEY, 2013, LONG ISLAND ZONE NAD 83 (US FOOT).



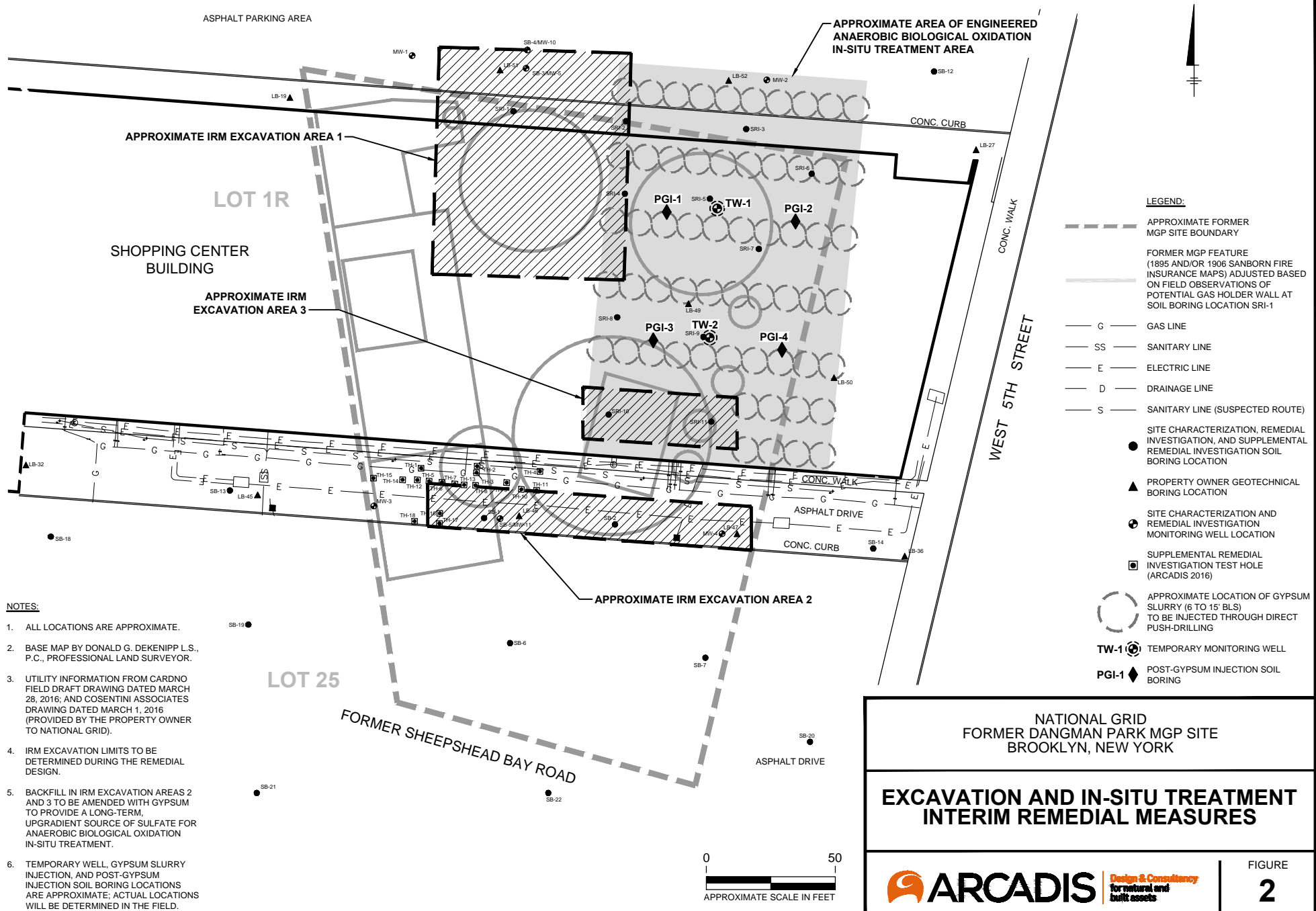
NATIONAL GRID  
FORMER DANGMAN PARK MGP SITE  
BROOKLYN, NEW YORK

SITE LOCATION



FIGURE  
**1**

IMAGES: PROJECTNAME: ---




**NOTES:**

1. ALL LOCATIONS ARE APPROXIMATE.
2. BASE MAP BY DONALD G. DEKENIPP L.S., P.C., PROFESSIONAL LAND SURVEYOR.
3. UTILITY INFORMATION FROM CARDNO FIELD DRAFT DRAWING DATED MARCH 28, 2016; AND COSENTINI ASSOCIATES DRAWING DATED MARCH 1, 2016 (PROVIDED BY THE PROPERTY OWNER TO NATIONAL GRID).
4. IRM EXCAVATION LIMITS TO BE DETERMINED DURING THE REMEDIAL DESIGN.
5. BACKFILL IN IRM EXCAVATION AREAS 2 AND 3 TO BE AMENDED WITH GYPSUM TO PROVIDE A LONG-TERM, UPGRADIENT SOURCE OF SULFATE FOR ANAEROBIC BIOLOGICAL OXIDATION IN-SITU TREATMENT.
6. TEMPORARY WELL, GYPSUM SLURRY INJECTION, AND POST-GYPSUM INJECTION SOIL BORING LOCATIONS ARE APPROXIMATE; ACTUAL LOCATIONS WILL BE DETERMINED IN THE FIELD.

NATIONAL GRID  
 FORMER DANGMAN PARK MGP SITE  
 BROOKLYN, NEW YORK

**EXCAVATION AND IN-SITU TREATMENT  
 INTERIM REMEDIAL MEASURES**



Design & Consultancy  
for natural and built assets

FIGURE  
**2**