New York City Housing Authority's

Recovery & Resilience

In October 2012, Superstorm Sandy hit New York City, inundating large parts of the city with saltwater and leaving lasting damage to buildings and infrastructure. Thirty five New York City Housing Authority (NYCHA) developments, home to over 60,000 New Yorkers, suffered major storm-related damage. In response, NYCHA invested \$3.2 billion to build back safer, stronger and smarter by improving structural resiliency and infrastructure protection across the 35 sites, including over \$600 million in the Lower East Side alone.

Lower East Side Progress as of Q1-2023

15	Buildings protected from storm surge for the 2023 hurricane season
8	New operating boilers, serving 304 apartments and 764 residents
381	CCTV cameras operational
18	Generators started up
32	Hot water heaters completed
48	Entrances with layered access control installed
24	New utility buildings/additions to existing buildings
40	Roofs replaced

NYCHA Recovery & Resilience Department website: tinyurl.com/SANDYRECOVERY email: disaster.recovery@nycha.nyc.gov phone: (212) 306-8532

Scope of Work





FLOODPROOFING

PROVIDES RELIABLE HEAT AND HOT WATER



IMPROVES SITE RESILIENCY



CCTV CAMERAS IMPROVES SITE SECURITY









NEW YORK CITY HOUSING AUTHORITY (NYCHA) LOWER EAST SIDE

CAMPUSES

Campos Plaza II

633 East 13th Street (Multiple Addresses)

- Site Flood Zone: AE | Base Flood Elevation: +11 feet
 Rooftop standby generators located at both residential buildings. The four 300 - 350 kilowatt natural gas-powered generators are in sound-attenuating enclosures resting on steel platforms anchored to the existing building columns.
- Flood-resistant electrical annex located on the roof of 641 East 13th Street at the south end of the site adjacent to Avenue C. The new addition will include automatic transfer switch equipment that will detect any loss of normal utility service and signal the rooftop generators to start within 60 seconds to power the residential building.

Additional site resiliency measures:

- 573 flood protection elements including passive flood barriers requiring minimal labor prior to deployment
- New LED, energy-efficient Philips Lumec MetroScape site lighting
- New cold liquid-applied roofing system

Riis I and II Houses

454 East 10th Street (Multiple Addresses)

Site Flood Zone: AE | Base Flood Elevation: +11 feet

- Flood protection throughout the site including structural reinforcement of building perimeters and over 1300 deployable floodproofing elements across approximately 177 locations including windows and doors below the flood elevation. The flood protection plan includes equipment from three different manufacturers: PS Industries, AquaFence, and Flood Risk America. Concrete flood walls (approximately 4') adjacent to many building entrances will be paired with the flood panels to keep flood water out of the buildings during a storm.
- Flood-resistant electrical annexes to house switchgears, electrical panels, and automatic transfer switch equipment that will detect any loss of normal utility service and signal the rooftop generators to start within 60 seconds to power the residential building.
- Additional annex details:
 - Façade: Precast panels with brick veneer
- Additional site resiliency measures:
 - New cold liquid-applied roofing system at most buildings
 - Rooftop standby generators located at most residential buildings
 - New LED, energy-efficient Holophane site lighting

Baruch Houses

100 Columbia Street (Multiple Addresses) | Site Flood Zone: AE | Base Flood Elevation: +11 feet

- Flood protection throughout the site including 101 passive and deployable floodproofing elements and a 4,300-foot-long concrete wall along Baruch Drive with planters, benches, and ADA-compliant access throughout.
- Flood-resistant annexes located mostly on the east side of the site along FDR Drive connected to the adjacent residential buildings via conduit discretely installed in new awning displaying building addresses. The annexes house 350 500 kilowatt natural gas-powered Generac generators to service nine buildings and over 1000 apartments.
- **Flood-resistant Steam Pressure Reduction Valve Station (PRV)** to replace the existing central heating plant. Located near 72 Baruch Drive, the PRV will receive high-pressure steam from Con Edison via Baruch Drive to service 18 residential buildings on the 28-acre site. The PRV station will also house two natural gas-powered Generac generators to service the adjacent residential building.
- Additional PRV details:
 - Façade: Pre-glazed curtain wall, metal siding
- Additional site resiliency measures:
 - Bioswale by 110 Columbia Street to manage stormwater runoff



La Guardia Houses

250 Madison Street (Multiple Addresses) | Site Flood Zone: AE | Base Flood Elevation: +12 feet

- Flood protection at three locations utilizing 15 flood panels manufactured by PS Industries.
- **Flood-resistant electrical annex** near Clinton Street to hold three 500 kilowatt natural gas-powered generators to provide full backup power to buildings 2 (55 Rutgers), 3 (65 Jefferson), and 4 (300 Cherry). All generators are in custom, sound-attenuating enclosures within the annex.
- Additional annex details:
 - Façade: Equitone fiber cement panel, BarnettBates Orsogril metal rainscreen panel and fence
- Additional site resiliency measures:
 - New LED, energy-efficient Philips site lighting

