

LMCR Community Board 1 Update

October 2019



Agenda

1. Introductions & Quick Recap
2. Project Updates
 - A. Interim Flood Protection Measures (IFPM)
 - Installation Status
 - Art Competition
 - B. Battery Park City Resiliency Plan
 - Design Progress
 - C. The Battery Coastal Resilience
 - Project Extents, Current Status, and Project Goals
 - Existing Conditions
 - Schematic Promenade Reconstruction
 - Project Milestones
 - D. FiDi-Seaport Climate Resilience Master Plan
 - Conceptual Timeline
 - Climate Coalition Approach
3. End of Year Lookahead & Next Steps

Lower Manhattan Coastal Resiliency (LMCR) is a comprehensive strategy to adapt Lower Manhattan to the impacts of climate change.

LM Climate Resilience Study

Developed **comprehensive climate risk assessment**, examining the full range of climate hazards and incorporating latest science

Tested/analyzed **engineering of coastal resiliency tools**, from flood walls to deployable barriers to raising streets and hardening buildings



Capital Projects

Implementing **\$500M of on-land capital projects** to be under construction before the end of administration



Master Plan

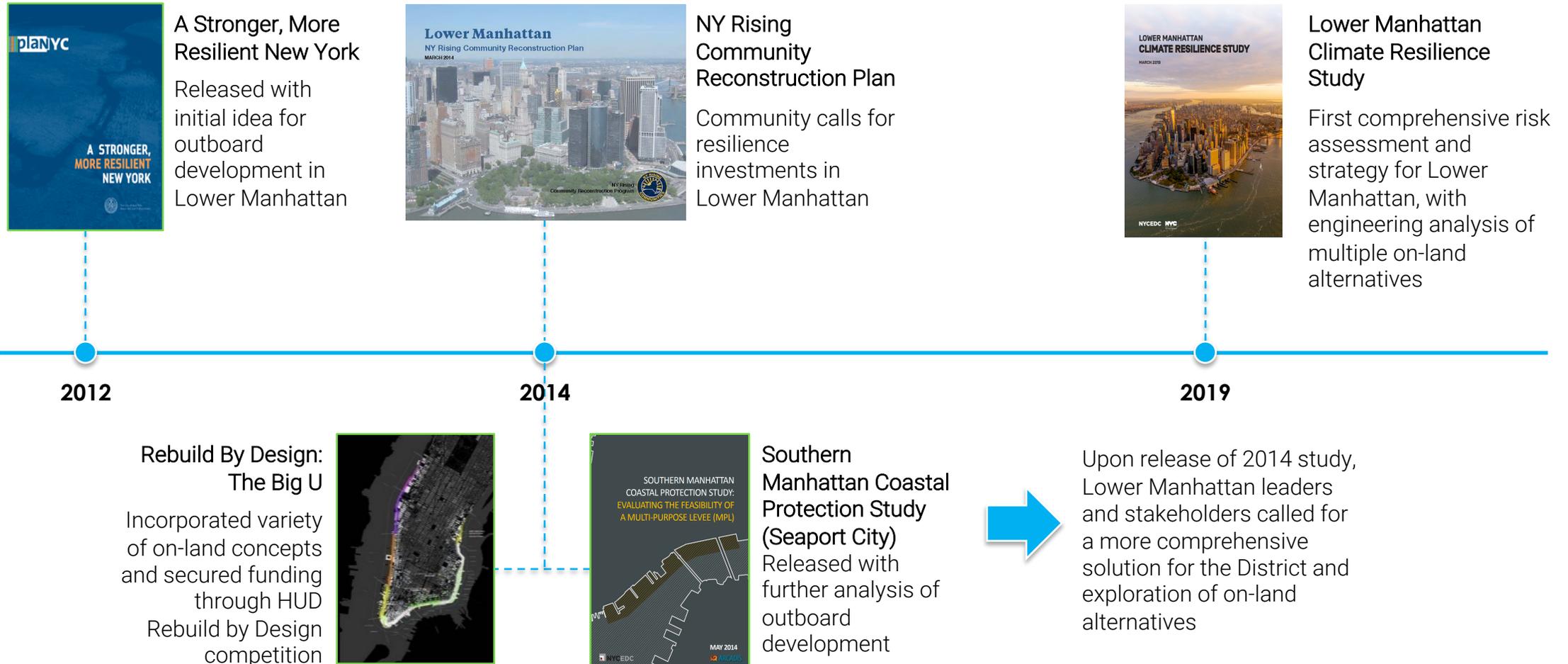
Advancing **Climate Resilience Master Plan for Financial District and Seaport**, where on-land adaptation measures were not deemed viable

Core Project Goals: Reduced climate risks, viable implementation strategy, and integration of waterfront uses and urban co-benefits where possible



Study Areas

Since Hurricane Sandy, the City has been working to find a solution for climate resilience for Lower Manhattan.



Coordinated interagency team is implementing \$500M in on-land capital projects and advancing a Master Plan for FiDi-Seaport.

- 2019 Study has led to:
 - On-land capital projects for 70% of the district (including 45% of original Seaport City geography), advancing with \$500M of funding; and
 - Master Plan for Financial District and Seaport, where on-land solutions or technologies were not deemed viable.
- Additional and on-going community engagement needed to advance capital projects and Master Plan



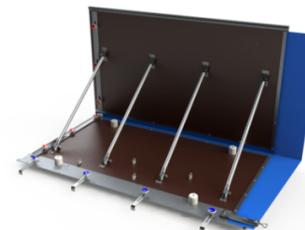
IFPM Update

- South Street Seaport (SSSP)*
 - Status: Operational as of June 2019
 - Beautification unveiled September 26, 2019
 - Analyzing potential re-design of existing alignment (Catherine Slip to Wall Street)
 - Studying potential expansion (Wall Street to Battery Park)**
- Tribeca Analysis***
 - Analyzing potential IFPM installation from North Esplanade to Leroy Street
- Two Bridges
 - Installation completed September 27, 2019

IFPM Alignment Tribeca, South Street Seaport and AquaFence Extension



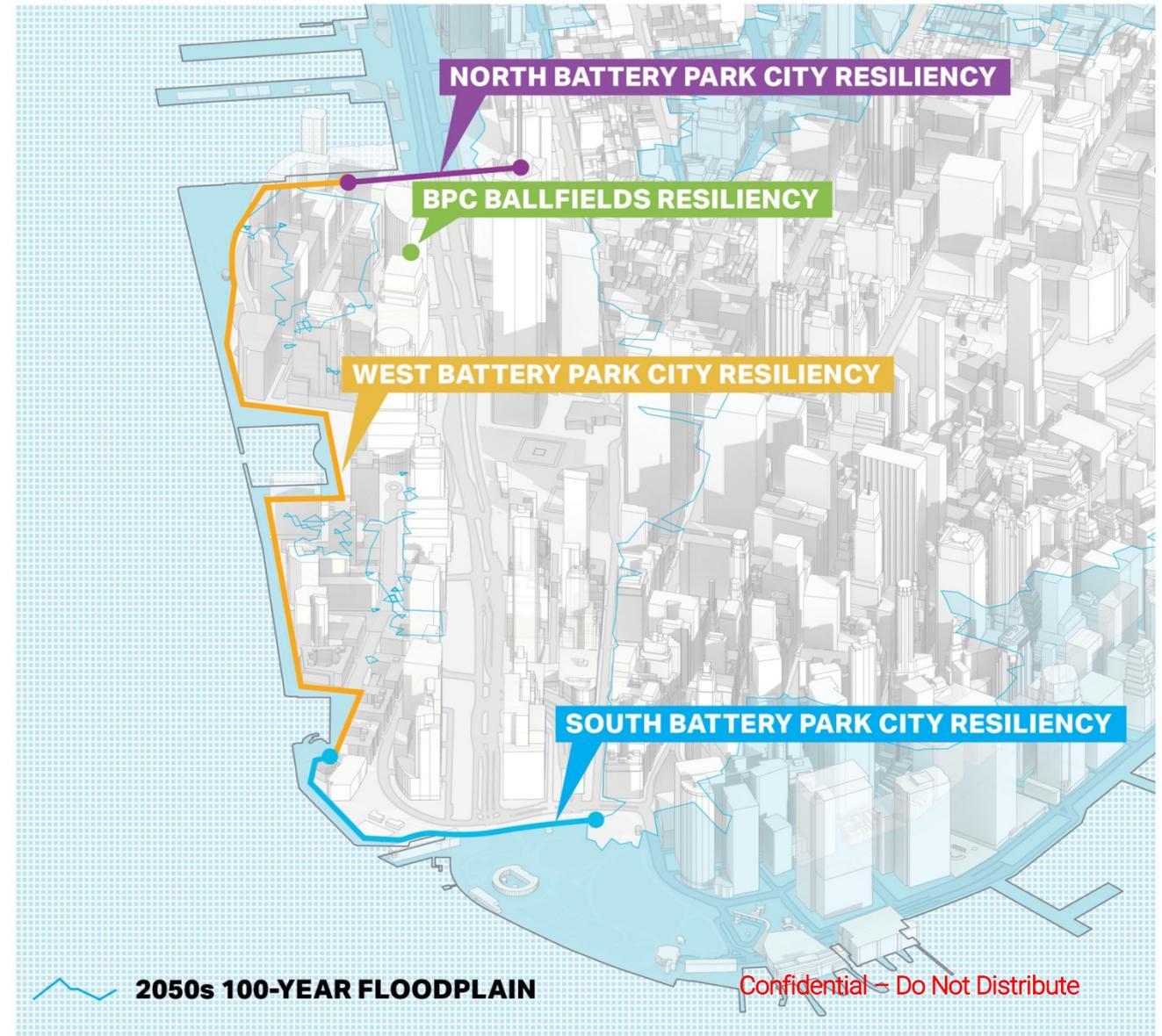
Beautification at South Street Seaport



Redesign evaluating new measure - AquaFence

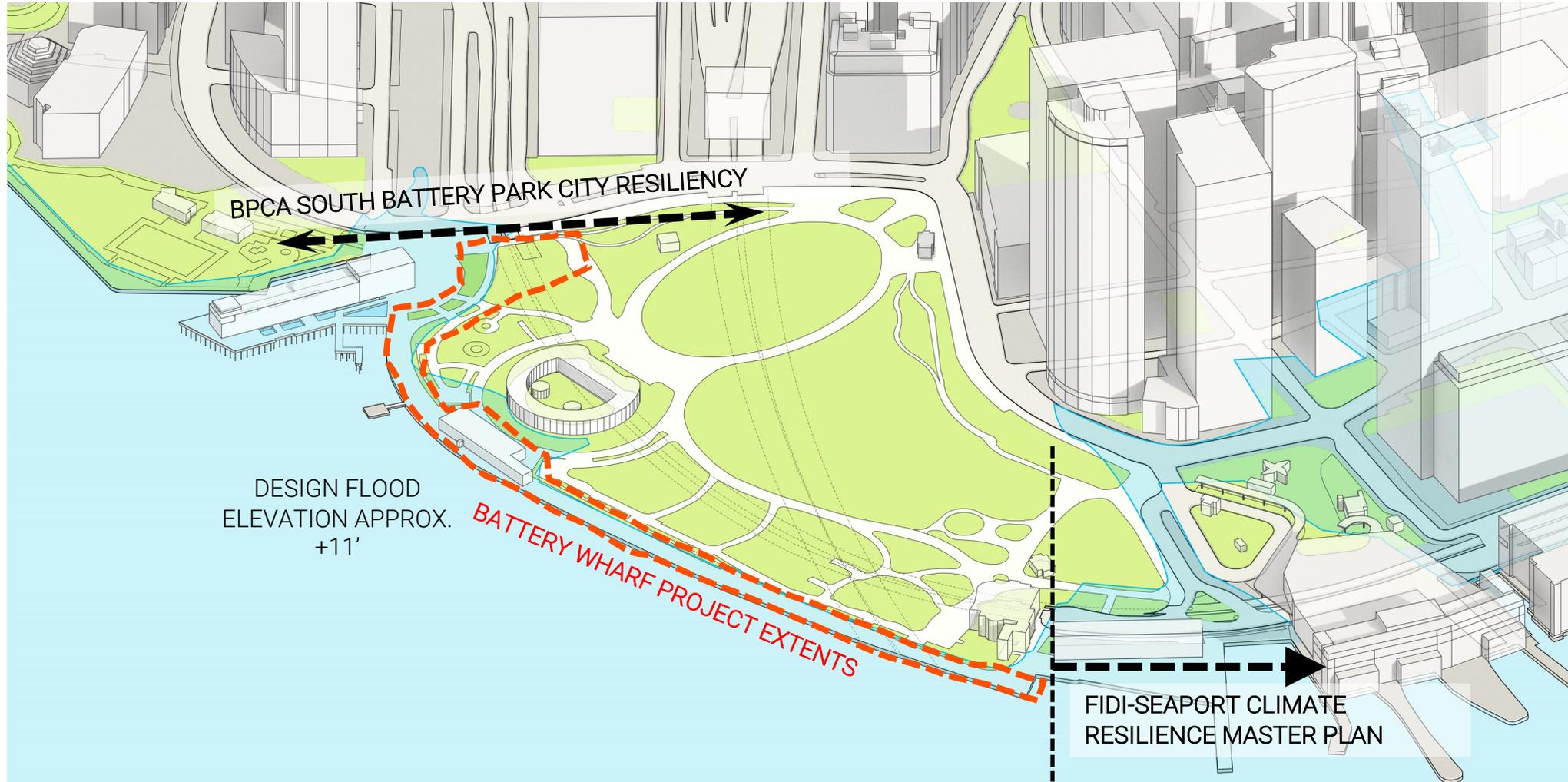
Battery Park City Update

- Bond cap announcement
- South Battery Park City
 - PDC submission
 - Ongoing stakeholder engagement
 - Public meeting #4
- North Battery Park City
 - Design kick-off
 - Public Meeting #1
 - Stakeholder Meeting
- Ballfields Resiliency
 - Public Meeting #4
- West Battery Park City
 - RFP release (Fall)



The Battery Coastal Resilience

The Battery Coastal Resilience Project Extents



The Battery Update

GOALS

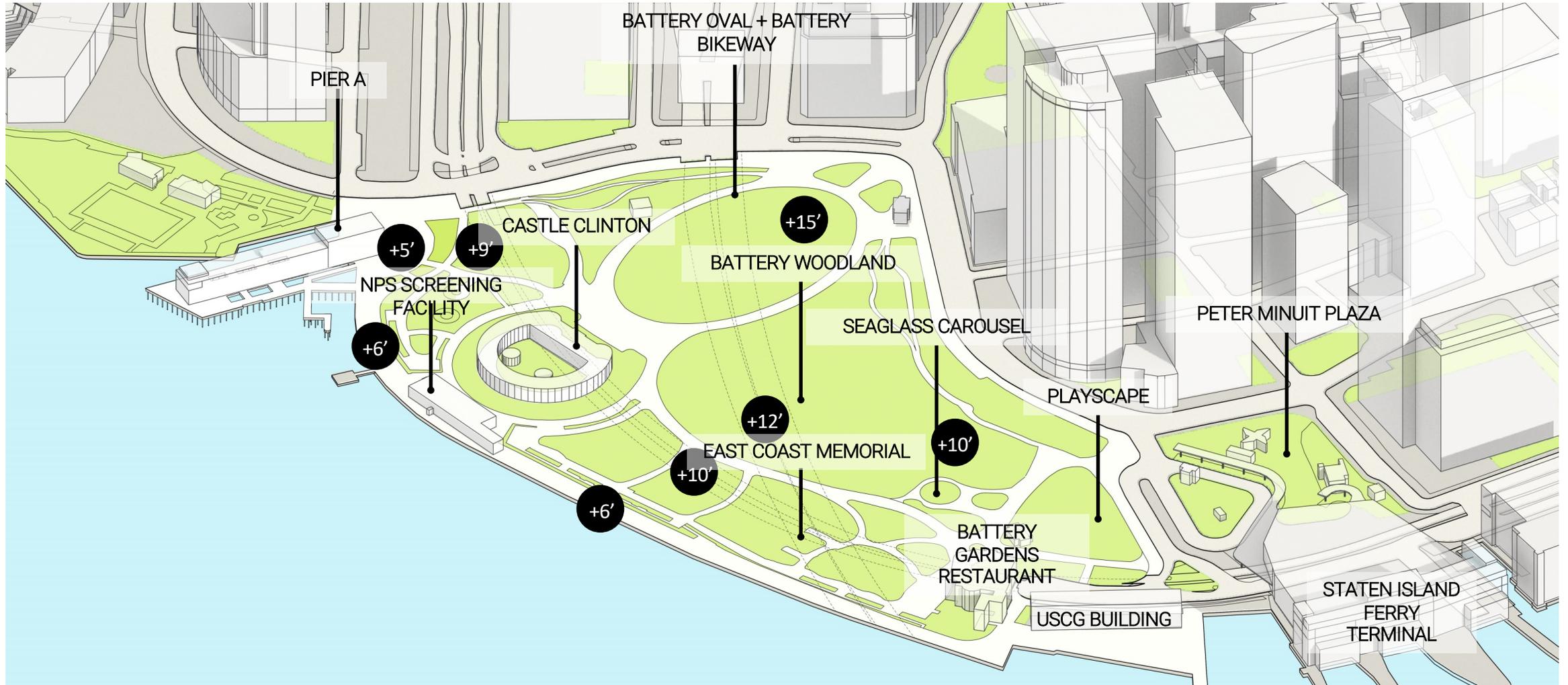
- Full reconstruction of wharf structure
- Elevate wharf to 2100 Sea Level Rise level (approx. elevation 11')
- Tie-in to BPCA South Battery Park City Resiliency project
- Close Coordination with Stakeholders and Public
- Maintain NPS Operations
- Retain existing materials & aesthetic
- Equal access and universal design
- Build a sustainable wharf

CURRENT STATUS

- EDC managing on behalf of NYC Parks
- Ongoing stakeholder engagement:
 - Community Board 1
 - Elected Officials
 - The Battery Conservancy
 - Battery Park City Authority
 - National Parks Service
 - Various City Agencies
- Design Consultant selection: Stantec
- Overall design schedule – ON TRACK:
 - Kick-off Fall 2019
 - Completion anticipated Summer 2021

The Battery Update

Existing Site Features and Elevations



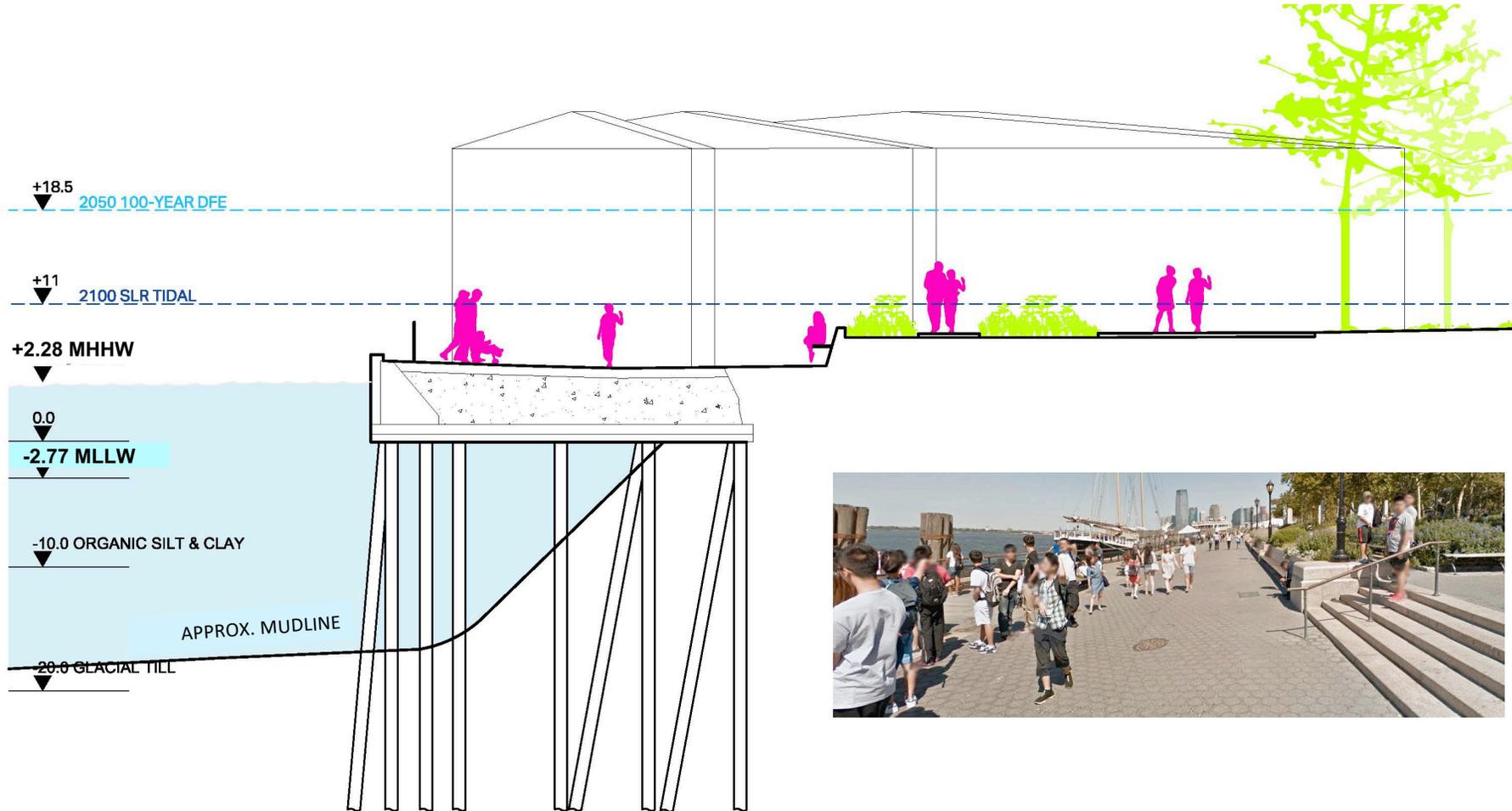
The Battery Update

2100 Sea Level Rise / Present Day 10-Year Storm Design Flood Elevation (Including 1' Freeboard)



The Battery Update

Wharf Existing Conditions

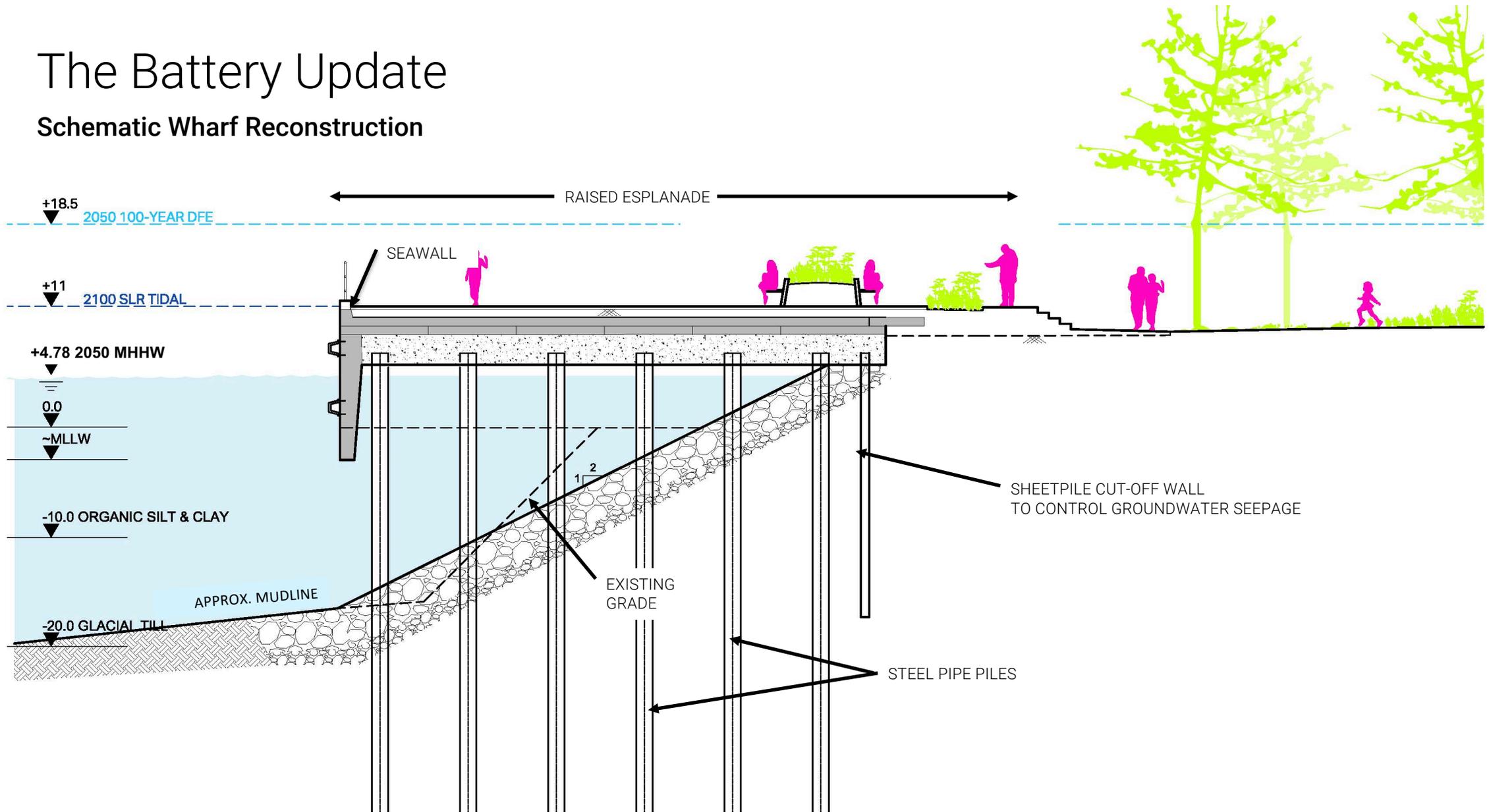


Wharf Conditions

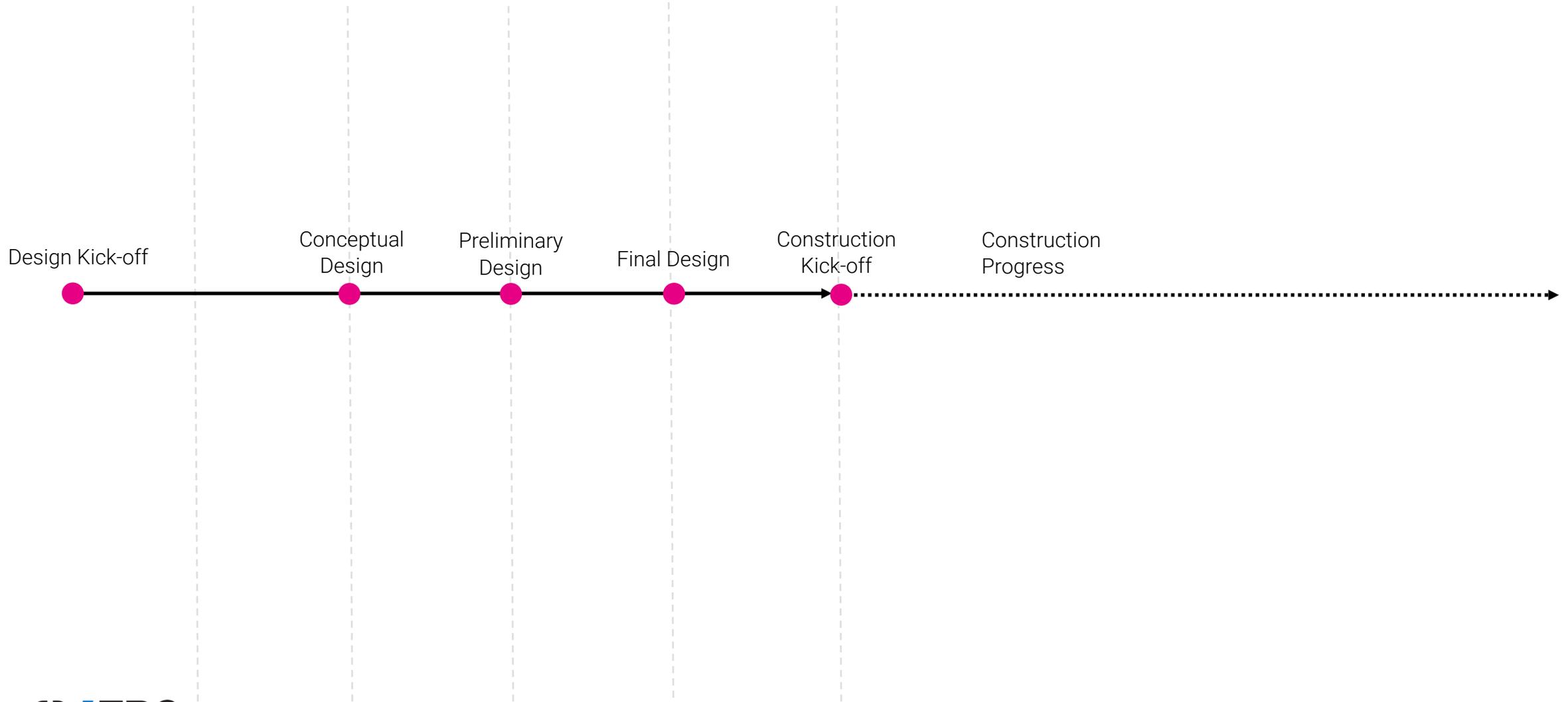
- Deteriorating condition of wharf structure
- Emergency repairs under way
- Periodic overtopping

The Battery Update

Schematic Wharf Reconstruction



The Battery Project Milestones



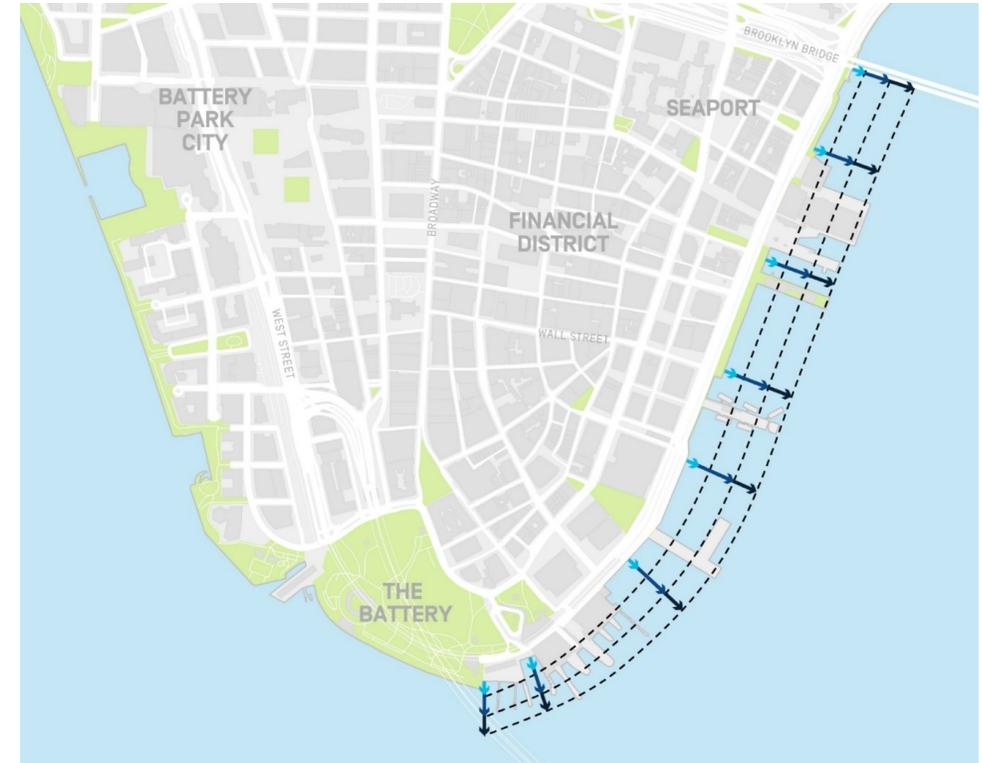
Financial District-Seaport Climate Resilience Master Plan Update

The Financial District-Seaport Climate Resilience Master Plan will develop a shoreline extension solution to increase resilience of Lower Manhattan.

What can we achieve in two years?

- Determine extent of shoreline extension
- Develop a conceptual design of shoreline extension and preliminary design of a first phase project
- Create a detailed implementation plan for financing, construction, and governance
- Advance permits with State and Federal agencies
- Create a drainage plan to upgrade sewer system in response to severe climate risks

Next Step: Kick-off with consultant team and plan for first large-scale community meetings



Location and extent of shoreline extension to be determined through community engagement and permitting

FiDi-Seaport Master Plan Update

Consultant Selection

- Team Lead: Arcadis
- Climate resilience leader with over **100 years of global experience** in the adaptation and flood protection of cities
 - Land reclamation projects across the globe
 - Design & construction for land reclamation projects in Rotterdam and Amsterdam
 - Coastal resilience projects in Boston, San Francisco, and New Orleans
- Core team has **strong local presence** in Lower Manhattan and proven track record on NYC's key resilience initiatives
 - Continuity from LMCR, ESCR, Big U, Southern Manhattan Coastal Protection Study, and NY Rising
 - Other NYC experience includes Living Breakwaters in Staten Island, Coney Island Creek Resiliency, drainage study for DEP in Gowanus, and Climate Adaptation Roadmap for NYC
 - Strong relationships with Army Corps and other permitting agencies



Living Breakwaters



Rotterdam Climate Proof

FiDi-Seaport Master Plan Update

Master Plan Services

- Engineering and design of the shoreline extension, including upland components and tie-ins
- Transportation, maritime and drainage infrastructure analysis
- Strategies for placemaking, urban design and programming
- Drainage modeling under multiple storm scenarios
- Analysis of environmental impacts to inform design and permitting considerations
- Developing a pathway to implementation, including strategies for permitting, financing, and governance
- Public and stakeholder engagement
- Background analysis and site investigations
- Analysis of in-water impacts, including habitats and ecology, water rebound, navigational concerns, and scour

Engineering			
Planning/Design			
Engagement			
Financing/ Governance			
Permitting/ Environmental			
Transportation			

FiDi-Seaport Master Plan Update

Conceptual Timeline



FiDi-Seaport Master Plan Update

Engagement Proposal

Climate Coalition

Goals:

- Provide robust education for LM community on climate change, resilience, and infrastructure
- Build foundation for generational coalition and advocacy for climate adaptation in FiDi-Seaport
- Develop shared City and community vision for the shoreline extension

Structure:

- Group of local stakeholders and climate resilience and environmental groups to start, with opportunities to grow over time

Frequency of Meetings:

- Every quarter

Technical Advisors

Goals:

- Review and provide input on technical analysis
- Act as educational resource for community stakeholders

Structure:

- Body of third party experts on climate science, resilience, infrastructure and engineering

Frequency of Meetings:

- TBD based on consultant schedule

Public Engagement

Goals:

- Foster broad understanding of climate issues and City's strategy
- Build public advocacy for City to take action to protect LM from climate change

Structure:

- Large-format public forums
- Creative public engagement tools, like public art and youth education
- Digital outreach

Frequency of Meetings:

- Every 6 months (for formal meetings)

Public Engagement Milestones

Projects	Timeline			
	September	October	November	December
IFPM	Announce art competition winners (9/26)			
Battery Park City	South BPC Resiliency PDC submission Ballfields Resiliency Public Meeting #4 (9/26)	North BPC Resiliency Public Meeting #1 (10/1) South BPC Resiliency CB1 Update (10/3)	South BPC Resiliency Public Meeting #4	
The Battery		CB1 Update (10/3)		
FiDi-Seaport	Executive Committee (9/26) Climate Coalition Formation	CB1 Update (10/3)	Climate Coalition Kickoff (TBD)	Public Meeting #1 (TBD)
BK Bridge-Montgomery	CB3 Update	Public Meeting #1 (10/2) PDC conceptual review		
Overall LMCR Strategy	Quarterly electeds and CBs update (9/26) Office Hours (Pier 16/17, Go Fish! Festival) Additional briefings	LinkNYC ads Office Hours (Bowling Green, Pier 35, The Battery)	LinkNYC ads	LinkNYC ads