BURO HAPPOLD BJH ADVISORS

January 24, 2025

To: **Andrew Kimball, President & CEO**
From: **Buro Happold, BJH Advisors, NYCEDC Real Estate Transactions**
Subject: **BMT Financial Feasibility**

This memorandum was provided by Buro Happold and consultant partners at the request of NYCEDC and details the preliminary cost and financial feasibility of five (5) investment scenarios for Brooklyn Marine Terminal. All investment scenarios set forth in this memorandum are established by the approximately 124 acres controlled by NYCEDC resulting from the City and Port Authority port property exchange effectuated in June 2024.

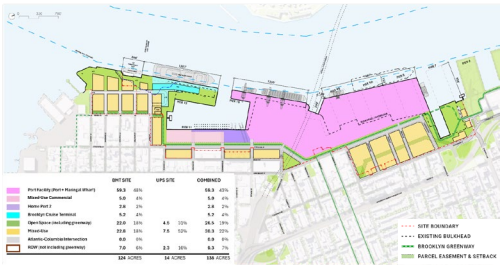
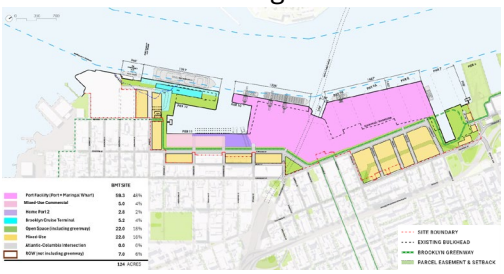
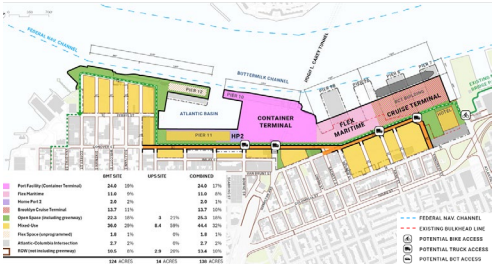
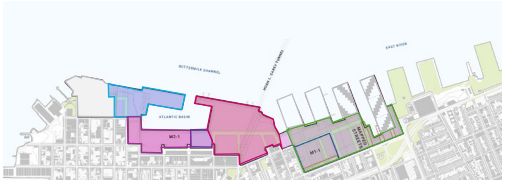
These five scenarios reflect feedback from the community, Task Force members and leadership, and Advisory Groups. We have consistently heard that it is crucial to maintain and modernize the maritime port at Brooklyn Marine Terminal; a port that responds to industry trends and supports the nascent Blue Highway network. Additional uses on the site shown in Scenarios 1, 2, and 3 (described herein) reflect common themes emerging through our community engagement process, including:

- Providing a range of open space throughout the site
- Improving resiliency to prepare the site and adjoining neighborhoods for sea-level rise and climate change
- Ensuring Brooklyn Cruise Terminal and the Atlantic Basin area include uses such as a hotel, retail, and light industrial that support and benefit the Red Hook community
- Ensuring that housing on the site is at a range of affordability levels and densities
- Improving the site's transportation network to help address vehicle congestion and improve bus speeds

Scenarios 1, 2, and 3 assume the pier infrastructure, including existing finger piers, is comprehensively rehabilitated into a new configuration aligned with today's industrial maritime needs (based on consultant research and feedback from port stakeholders and Task Force members). Scenarios 1 and 2 endeavor to deliver and fully-fund an optimal port configuration, maintaining a 60-acre port (a similar acreage to the container port today but with improved layout and greater continuous surface area). Scenario 3 reflects a maximized housing production scenario and includes a smaller 35-acre port. Scenarios 1 and 3 include approximately 14 acres owned by United Parcel Service ("UPS") that abut the approximately 124 acres controlled by NYCEDC and result in a total project area of approximately 138 acres. Scenarios 4A and 4B entail an as-of-right program and do not assume any investment in the pier infrastructure or that the site is entitled to allow for non-industrial and maritime uses.

Cost assumptions and financial implications set forth in this memorandum are highly preliminary and remain subject to further refinement and change.

Investment Scenarios

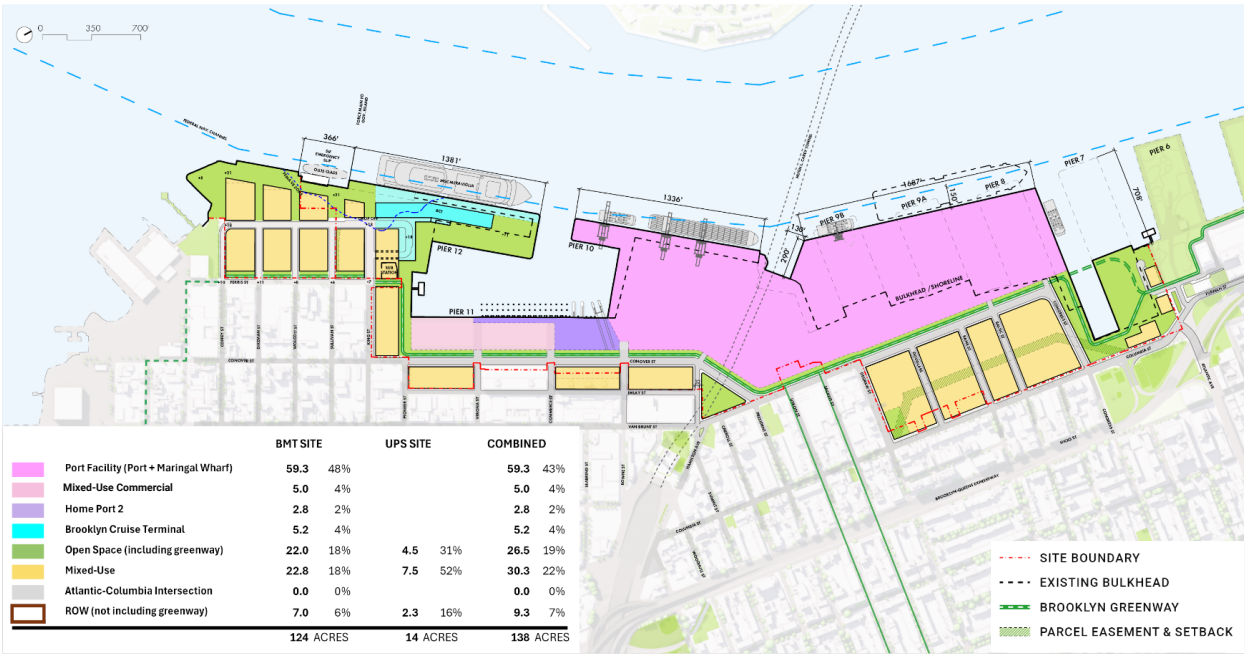
	Project Area	Mixed Use FAR	Housing Units	Cruise Terminal
Scenario 1 | Optimal Port Including UPS 	Total 138 acres Port 60 acres Port + Cruise 65 acres	5.5x	8,659	No change
Scenario 2 | Optimal Port Excluding UPS 	Total 124 acres Port 60 acres Port + Cruise 65 acres	5.5x	6,474	No change
Scenario 3 | Maximized Housing Including UPS 	Total 138 acres Port 35 acres Port + Cruise 50 acres	7.0x	12,924	Moved to BMT North
Scenario 4 | As-of-Right **4A – Municipal & Industrial** **4B – All Industrial** (no Municipal) 	Total 124 acres Industrial/ Municipal 60 acres[1] Cruise 17 acres[1]	n/a	0	No change

[1] Industrial acreage reflects container terminal area today and excludes Piers 9A/9B; cruise includes underutilized area (used as surface lots and for non-maritime purposes today)

Scenario 1 | Optimal Port – Including UPS

As shown in Figure 1, Scenario 1 entails development of approximately 60 acres with modern port and flexible maritime facilities, including the construction of a new marginal pier replacing existing finger Piers 8, 9A and 9B. Together with Brooklyn Cruise Terminal, the new maritime footprint would span approximately 65 acres. The cost of building these port and maritime improvements can be supported by a number of sources, including public grants, leases to port operators and proceeds from the lease or sale of currently underutilized parcels for mixed-use development. Accordingly, Scenario 1 envisions a modern port alongside a vibrant mixed-use community hub, including new housing and commercial development, infrastructure, open space and resiliency measures.

Figure 1: Scenario 1 – Site Plan



	BMT SITE		UPS SITE		COMBINED	
Port Facility (Port + Maringal Wharf)	59.3	48%			59.3	43%
Mixed-Use Commercial	5.0	4%			5.0	4%
Home Port 2	2.8	2%			2.8	2%
Brooklyn Cruise Terminal	5.2	4%			5.2	4%
Open Space (including greenway)	22.0	18%	4.5	31%	26.5	19%
Mixed-Use	22.8	18%	7.5	52%	30.3	22%
Atlantic-Columbia Intersection	0.0	0%			0.0	0%
ROW (not including greenway)	7.0	6%	2.3	16%	9.3	7%
	124	ACRES	14	ACRES	138	ACRES

Infrastructure Costs

A study of infrastructure investments made at precedent U.S. ports indicates landlords (port owners vs. port operators) are responsible for sub-structure improvements, including pier infrastructure. Scenario 1 includes a new marginal pier for an estimated cost of approximately $1.2 billion (including associated dredging). The marginal pier requires approximately $25 million for mitigation. Per requirements of New York State Department of Environmental Conservation, expansion of lands over water necessary to deliver the marginal pier requires partial demolition of existing Pier 7. Scenario 1 assumes the remaining portion of Pier 7 (of 3.4 acres) is rehabilitated for open space use. The partial demolition and rehabilitation cost for Pier 7 is approximately $90 million. Scenario 1 also requires approximately $62 million and approximately $70 million be invested in existing Pier 10 (container/flexible maritime) and Pier 12 (cruise site), respectively, to extend the useful life of those piers for another approximately 25+ years. Scenario 1 also assumes roughly $25 million is invested in the repairs to the water's edge of the UPS site, including bulkhead areas.

NYCEDC also anticipates funding, either upfront or over time with project revenues, approximately $50 million in reserve funding for ongoing pier capital maintenance costs. As shown in Table 1 below, the expenditures described above, inclusive of a pier capital maintenance reserve fund, results in a

total port infrastructure investment of approximately **$1.5 billion**, before the application of any capital grant subsidy (as discussed later).

Table 1: Scenario 1 – Infrastructure Costs

New Mariginal Pier	$ 1,186,740,000
Offsite Mitigation for New Pier	25,000,000
Pier 7 Partial Demo/Rehab	90,270,000
Pier 10 Rehab	61,840,000
Pier 12 Rehab	69,580,000
Bulkhead Improvements (UPS Site)	25,000,000
Pier Capital Maintenance Reserve Fund	50,000,000
Total Infrastructure	**$ 1,508,430,000**

Note: Costs include estimated i) contigencies and ii) soft costs at 40% of total hard costs.

Port Topside Improvements

In addition to port infrastructure, investment should be anticipated to support topside improvements like new buildings and systems, new electrified cranes, tractors and other equipment, and new cruise facilities (collectively, "port topside improvements"). In exchange for a minimum thirty-year lease, the future port operator is expected to i) operate the port with no upfront or ongoing operating subsidy, and ii) make substantial capital investments towards the port topside improvements. Based on initial analysis of the port's business and cash flow model for Scenario 1, we believe the future port operator's rent could finance approximately $198 million towards port topside improvements.

Table 2: Scenario 1 – Port Topside Improvements

Container	New Systems (Electrical, Drainage, Water, etc.)	$	34,880,000
	New Buildings (Admin, M&R, Crane Maintenance)		29,890,000
	Reefer Container Access Platforms		39,200,000
	Shore Power		5,600,000
	Other		19,800,000
	Total Container Topside	**$**	**129,370,000**
Flex	New Systems (Electrical, Drainage, Water, etc.)	$	9,900,000
	Security Building/Truck Processing Gate		6,370,000
	Site Pavement Rehab		5,290,000
	Other		2,270,000
	Total Flexible Maritime Topside	**$**	**23,830,000**
Cruise	New Parking Garage	$	85,260,000
	Other		3,300,000
	Total Cruise Topside	**$**	**88,560,000**
Total Port Topside Investment		**$**	**241,760,000**

As shown in Table 2 above, based on a survey of precedent landlord and tenant investment shares at U.S. ports, it is anticipated that the NYCEDC will need to match the port operator's privately-funded topside investment with approximately **$242 million** of publicly-funded port topside improvements, including investments in i) shore power, ii) drainage, water, lighting, electrical, and communication

systems, iii) site boundary fencing and security gates, iv) a new cruise parking garage, and v) new administrative and maintenance buildings, among other costs. This cost share results in approximately 55% of the total port topside improvements estimated to be borne by NYCEDC.

Capital Grants Funding

Table 3: Illustrative Capital Grants Schedule

Source	Use	Status	$-Amount
City	Planning & Entitlements	Committed	$ 10,000,000
	Pier 7/8/10 Repairs	Committed	55,000,000
	New Electric Crane	Committed	15,000,000
City	Local Match (USDOT MEGA Grant)	Uncommitted	109,200,000
State	Cold Storage	Committed	15,000,000
Federal	USDOT MEGA Grant	Awarded / Not Obligated	163,800,000
Total Capital Grants – Total			**$ 368,000,000**
Total Capital Grants – Piers Only (1)			**$ 328,000,000**

(1) Excludes $10M for planning/entitlements and $15M allocated each towards a new crane and cold storage

NYCEDC has secured approximately $95 million in capital grants from the City and State, including: i) $80 million from the City for site planning and entitlement costs ($10 million), stabilizing repairs to existing Piers 7, 8 and 10 ($55 million), and new port equipment ($15 million); and ii) $15 million from the State for cold storage capabilities. In September 2024, the BMT project was awarded approximately $164 million from the U.S. Department of Transportation's MEGA Grant program for piers rehabilitation. This federal grant award, however, has not been fully secured or obligated. As set forth in Table 3 above, the total capital grant subsidy referenced in this memorandum is approximately $368 million, of which approximately **$328 million** is available for pier repairs. The total capital grant amount includes an additional, uncommitted City capital contribution of approximately $109 million required as the local match for the USDOT MEGA Grant award.

Mixed Use Development

Redevelopment of underutilized portions of Brooklyn Marine Terminal with mixed uses, including for housing and hotels, supports City policy goals like increased housing production and public open space creation, and provides cross subsidy funding to pay for the cost of the port, including approximately $1.4 billion of i) pier infrastructure not covered with existing capital grant funding ($1.2 billion), and ii) unfunded public port topside improvements ($242 million) costs, as described earlier. This memorandum assumes net land value generated from the lease or sale of the mixed-use development parcels is retained by the BMT project. In most other instances, in which NYCEDC receives land rent and/or land sale proceeds, these revenues flow to the City's general-purpose fund and would not be available for local project-specific uses.

Potential new housing creation is estimated to range from 6,000 to 9,000 depending on plan boundary (e.g., inclusion of UPS site) and the configuration of port and public infrastructure, like roadways, among other things. Scenario 1 generates approximately 23 mixed use development sites, of which i) 21 sites are assumed for mixed-income housing, including approximately 280,000 square feet of commercial and light industrial uses on lower floors, and ii) two (2) sites for hotels with 991 total keys and 644 parking spaces. As summarized in Table 4 below, the housing sites generate an estimated 8,659 total residential units, assuming an average floor area ratio of approximately 5.5,

and includes 2,165 units of 485x-compliant affordable rental housing (or 25% of total housing units). The affordable rental housing program assumes rents for all affordable units are based on 60% of area median income ("AMI"). The balance of housing units is split between market-rate rental (37% of total units) and condominiums (38% of total units). Estimated gross land value generated from mixed use development is approximately **$3.2 billion**, as shown in Table 6 below.

Table 4: Mixed Use Development Program

		Total Units	Affordable Rental	Market Rental	Market Condo
Housing Units	BMT	6,474			
	UPS	2,185			
	Total	8,659	2,165	3,204	3,290
	% Total	100%	25%	37%	38%
Hotel Keys		991			
Parking Spaces		644			

It is important to acknowledge that any mixed-use development requires complementary investments in areawide site preparation and infrastructure, the public realm, new schools, and other community benefits. Scenario 1 entails raising the site grade and requires demolition and other site preparation work, including the installation of approximately 33,000 linear feet of new utility lines (electric, gas, telecommunications, sanitary and storm sewers, and water mains). In addition, Scenario 1 creates approximately 22 acres of new public open space, 5,500 linear feet of new roadways, and a new raised approximately 6,200-linear-feet mixed road and greenway and flood wall (the "spine") that runs the length of Brooklyn Marine Terminal.

Table 5: Scenario 1 – Mixed Use Public Investments

Infrastructure	Demolition & Grading	$	15,743,986
	Utilities		169,895,985
	Roadways: Neighborhood/Perimeter Streets		117,040,426
	Roadways: Spine		83,501,600
	Total	**$**	**386,181,997**
Resiliency	Site Elevation		136,823,610
	Flood Wall (Spine)		56,689,925
	Total	**$**	**193,513,535**
Public Realm	Destination Parks (1)		328,633,032
	Neighborhood Open Space		45,027,836
	Greenway		87,607,800
	Open Space Maintenance NPV (2)		50,000,000
	Total	**$**	**511,268,668**
Community Benefits	Civic Space (New Schools)		225,000,000
	Workforce Training & Other		$-TBD
	Total	**$**	**225,000,000**
Total Mixed Use Public Investments		**$**	**1,315,964,200**

(1) Waterfront parks at Pier 7, Pier 12 and waterside of the UPS site; (2) 15% of Destination Parks cost

The public investments required to support mixed use development total approximately **$1.3 billion** and are set forth in Table 5 above. Estimated land value generated from mixed use development, accounting for the public investments described above and the cost to acquire privately owned sites is approximately $1.4 billion.

Table 6 below summarizes the port costs and mixed-use land value associated with Scenario 1. In summary, the unfunded cost of port infrastructure and topside improvements, in excess of assumed capital grants described earlier, could be predominantly funded by net land value generated from the mixed-use development (based on housing density and programmatic assumptions set forth above).

Net Financial Impact

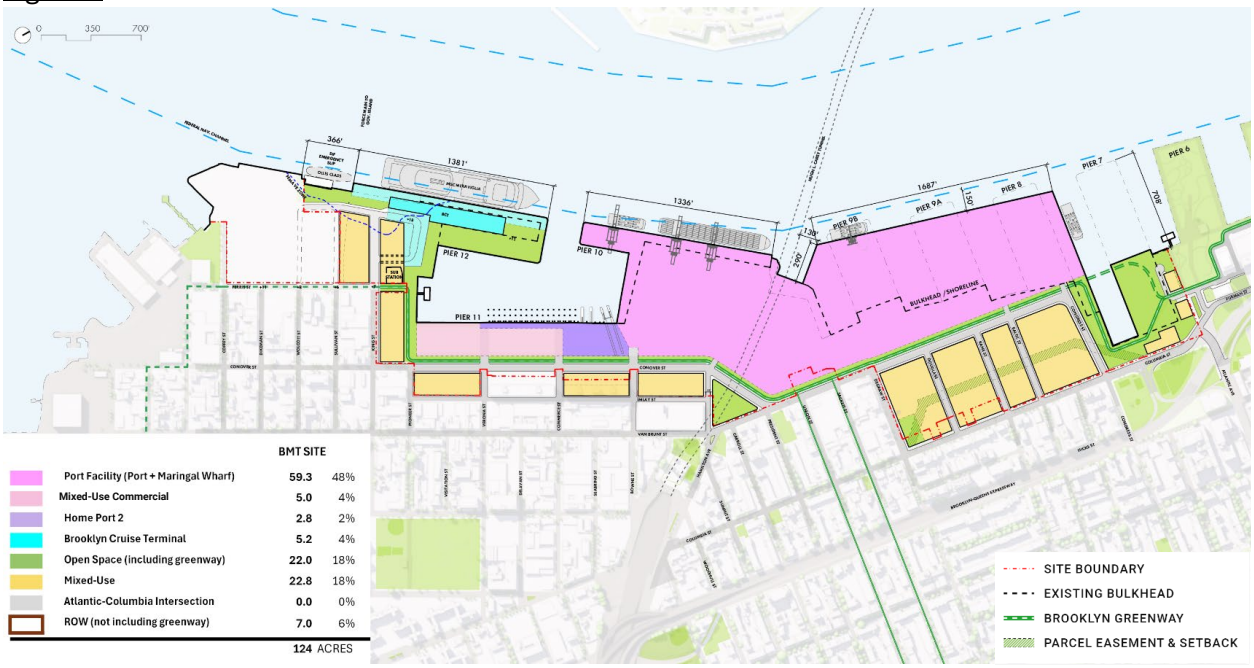
Table 6: Net Value of Scenario 1

Total Pier Infrastructure	Table 1		$ (1,508,430,000)
Total Port Topside Investment	Table 2		(241,760,000)
Total Port Cost			$ (1,750,190,000)
(+) Capital Grant Allocation	Table 3		328,000,000
Net Port Cost		**[A]**	**$ (1,422,190,000)**
Mixed Use Gross Land Value	Table 4		3,185,017,350
(–) Private Sites			(500,000,000)
(–) Mixed Use Public Investments	Table 5		(1,315,964,200)
Mixed Use Net Land Value		**[B]**	**$ 1,369,053,150**
Net Value Creation/(Shortfall)		**[A] + [B]**	**$ (53,136,850)**

Scenario 2 | Optimal Port – Excluding UPS

As shown in Figure 2 below, use of space for Scenario 2 mirrors Scenario 1, including preservation of approximately 60 acres for non-cruise port and flexible maritime facilities (or approximately 65 acres including the cruise terminal site). Scenario 2, however, excludes the approximately 14-acre UPS site from the site plan, limiting the project area to approximately 124 acres controlled by NYCEDC.

Figure 2: Scenario 2 – Site Plan



Infrastructure Costs

Scenario 2 maintains the same port configuration as Scenario 1, including the approximately $1.2 billion marginal pier configuration shown in Figures 1 and 2. The only infrastructure cost difference between Scenario 2 and Scenario 1 is the removal of approximately $25 million of improvements to the water's edge of the UPS site in Scenario 2 as this scenario does not include the UPS site. As shown in Table 7 below, the pier infrastructure costs for Scenario 2 are approximately **$1.48 billion**.

Table 7: Scenario 2 – Infrastructure Costs

New Mariginal Pier	$ 1,186,740,000
Offsite Mitigation for New Pier	25,000,000
Pier 7 Partial Demo/Rehab	90,270,000
Pier 10 Rehab	61,840,000
Pier 12 Rehab	69,580,000
Pier Capital Maintenance Reserve Fund	50,000,000
Total Infrastructure	**$ 1,483,430,000**

Note: Costs include estimated i) contigencies and ii) soft costs at 40% of total hard costs.

Port Topside Improvements

Given the same port configuration and operating footprint, Scenario 2 assumes the same port topside improvements costs as Scenario 1, of approximately $198 million and approximately **$242 million** borne by the port operator and NYCEDC, respectively. Please refer to Table 2 above for a breakdown of NYCEDC's assumed share of the port topside improvements.

Capital Grants Funding

As detailed in Table 3, similar to Scenario 1, Scenario 2 assumes total capital grant subsidy of approximately $368 million, of which approximately **$328 million** is available for pier repairs.

Mixed Use Development

Similar to Scenario 1, Scenario 2 assumes underutilized portions of Brooklyn Marine Terminal are redeveloped with mixed uses, including for housing and hotels, to generate cross subsidy to pay for the unfunded cost of the port's pier infrastructure and topside improvements of approximately $1.4 billion. Removing the UPS site reduces the total developable mixed-use parcels from 23 sites for Scenario 1 to 17 sites for Scenario 2, of which i) 15 sites are assumed for mixed-income housing, including approximately 230,000 square feet of commercial and light industrial uses on lower floors (18% less than Scenario 1), and ii) two (2) sites for hotels with 991 total keys and 644 parking spaces. The total hotel keys and parking spaces for Scenario 2 are the same as Scenario 1 given both hotel sites reside outside of the UPS site and within the boundary of the approximately 124 acres controlled by NYCEDC.

As summarized in Table 8, housing sites generate an estimated 6,474 total residential units, assuming an average floor area ratio of approximately 5.5, including 1,619 units of 485x-compliant affordable rental housing (or 25% of total housing units). The affordable rental housing program assumes rents for all affordable units are based on 60% of AMI. The assumed housing program for the balance of housing units for Scenario 2 mirrors Scenario 1, or 37% of total units as market-rate rental units and 38% of total units as condominiums. Estimated gross land value generated from mixed use development for Scenario 2 is approximately **$2.6 billion**, as shown in Table 10.

Table 8: Mixed Use Development Program

		Total Units	Affordable Rental	Market Rental	Market Condo
Housing Units	BMT	6,474			
	UPS	n/a			
	Total	6,474	1,619	2,395	2,460
	% Total	100%	25%	37%	38%
Hotel Keys		991			
Parking Spaces		644			

The mixed-use public investments required for Scenario 2 is approximately **$1.1 billion**, as set forth in Table 9 below, or approximately $182 million less than Scenario 1 given exclusion of the UPS site in this scenario. Estimated land value generated from mixed use development for Scenario 2 after the public investments and private site acquisition costs is approximately $1.5 billion.

Table 9: Scenario 2 – Mixed Use Public Investments

Infrastructure	Demolition & Grading	$ 13,301,555
	Utilities	148,231,073
	Roadways: Neighborhood/Perimeter Streets	107,790,736
	Roadways: Spine	83,501,600
	Total	**$ 352,824,964**
Resiliency	Site Elevation	136,823,610
	Flood Wall (Spine)	56,689,925
	Total	**$ 193,513,535**
Public Realm	Destination Parks (1)	269,840,592
	Neighborhood Open Space	45,027,836
	Greenway	82,593,000
	Open Space Maintenance NPV (2)	40,000,000
	Total	**$ 437,461,428**
Community Benefits	Civic Space (New Schools)	150,000,000
	Workforce Training & Other	$-TBD
	Total	**$ 150,000,000**
Total Mixed Use Public Investments		**$ 1,133,799,927**

(1) Waterfront parks at Pier 7 and Pier 12; (2) 15% of Destination Parks cost

Net Financial Impact

Table 10 below summarizes the port costs and mixed-use land value associated with Scenario 2. In summary, the unfunded cost of port infrastructure and topside improvements, in excess of assumed capital grants, could be funded by net land value generated from the mixed-use development (based on housing density and programmatic assumptions set forth above).

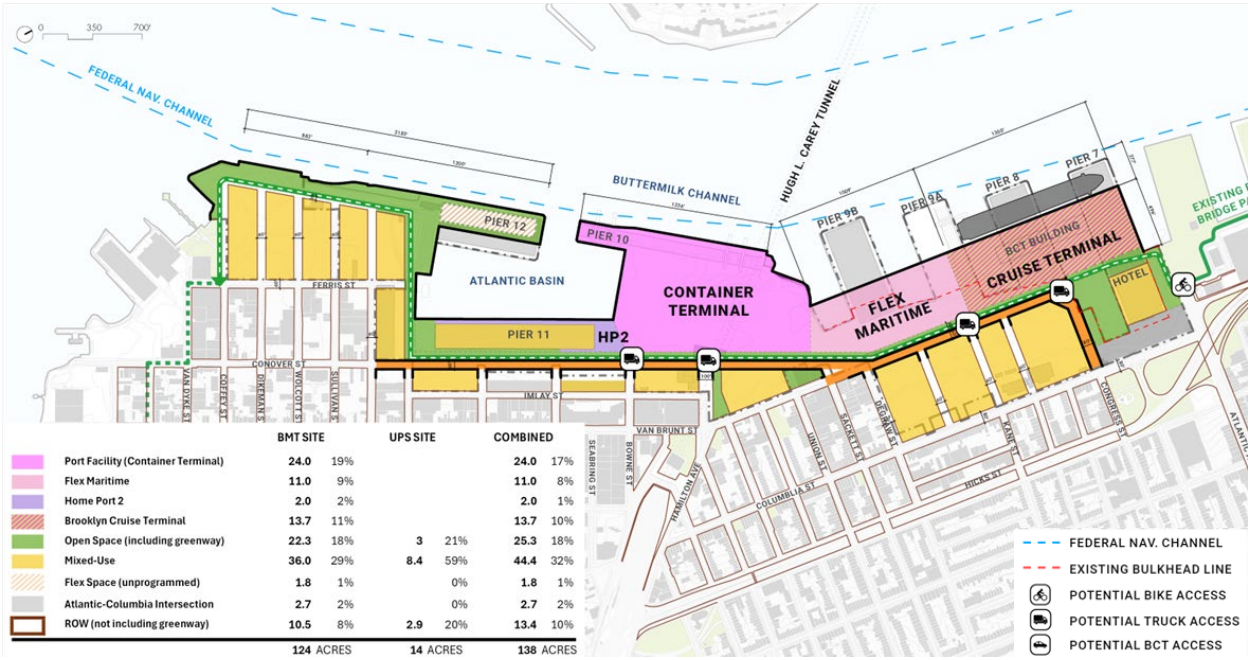
Table 10: Net Value of Scenario 2

Total Pier Infrastructure	Table 7		$ (1,483,430,000)
Total Port Topside Investment	Table 2		(241,760,000)
Total Port Cost			$ (1,725,190,000)
(+) Capital Grant Allocation	Table 3		328,000,000
Net Port Cost		**[A]**	**$ (1,397,190,000)**
Mixed Use Gross Land Value	Table 8		2,644,667,646
(–) Private Sites			(20,000,000)
(–) Mixed Use Public Investments	Table 9		(1,133,799,927)
Mixed Use Net Land Value		**[B]**	**$ 1,490,867,719**
Net Value Creation/(Shortfall)		**[A] + [B]**	**$ 93,677,719**

Scenario 3 | Maximized Housing

Like Scenario 1, Scenario 3 includes the UPS site and assumes a new marginal pier replacing the fingers piers. To maximize new housing creation, however, Scenario 3 reduces the area available for port and other flexible maritime uses to approximately 35 acres from approximately 60 acres for Scenarios 1 and 2. In response to Task Force interest in the potential benefits of relocating Brooklyn Cruise Terminal elsewhere within BMT, Scenario 3 assumes the cruise terminal (currently operating on Pier 12) moves north and is reaccommodated on the new marginal pier. It should be noted that based on port stakeholder and labor feedback, a 35-acre port co-mingled with the cruise terminal will likely reduce marketability and functionality for future port operators. The new maritime footprint, inclusive of the area occupied by the relocated cruise terminal, is approximately 50 acres.

Figure 3: Scenario 3 – Site Plan



	BMT SITE		UPS SITE		COMBINED	
Port Facility (Container Terminal)	24.0	19%			24.0	17%
Flex Maritime	11.0	9%			11.0	8%
Home Port 2	2.0	2%			2.0	1%
Brooklyn Cruise Terminal	13.7	11%			13.7	10%
Open Space (including greenway)	22.3	18%	3	21%	25.3	18%
Mixed-Use	36.0	29%	8.4	59%	44.4	32%
Flex Space (unprogrammed)	1.8	1%		0%	1.8	1%
Atlantic-Columbia Intersection	2.7	2%		0%	2.7	2%
ROW (not including greenway)	10.5	8%	2.9	20%	13.4	10%
	124	ACRES	14	ACRES	138	ACRES

Infrastructure Costs

Relative to Scenarios 1 and 2, the new marginal pier for Scenario 3 is smaller despite spanning the length of existing Piers 7, 8, 9A, and 9B (relative to spanning the length of Piers 8, 9A, and 9B for Scenarios 1 and 2). The estimated cost of the new marginal pier is approximately $795 million (including associated dredging). Platforms required to deck the inlet between existing Piers 7 and 8, as shown in Figure 3, are estimated to cost approximately $90 million. Like Scenarios 1 and 2, Scenario 3 requires approximately $62 million and approximately $70 million be invested in existing Pier 10 (container/flexible maritime) and Pier 12 (mixed-use flex and open space), respectively, to extend the useful life of those piers for another approximately 25+ years.

Consistent with Scenario 1, Scenario 3 assumes approximately $25 million is invested in the repairs to the water's edge of the UPS site. And like Scenarios 1 and 2, NYCEDC anticipates funding, either upfront or over time with project revenues, approximately $50 million in reserve funding for ongoing pier capital maintenance costs. As shown in Table 11 below, the expenditures described above, inclusive of a pier maintenance reserve fund, results in a total port infrastructure investment of approximately **$1.1 billion**, before the application of any capital grant subsidy.

Table 11: Scenario 3 – Infrastructure Costs

New Mariginal Pier	$ 795,010,000
Pier 7/8 Inlet Decking	90,000,000
Pier 10 Rehab	61,840,000
Pier 12 Rehab	69,580,000
Bulkhead Improvements (UPS Site)	25,000,000
Pier Capital Maintenance Reserve Fund	50,000,000
Total Infrastructure	**$ 1,091,430,000**

Note: Costs include estimated i) contigencies and ii) soft costs at 40% of total hard costs.

Port Topside Improvements

Due to a nearly 50% reduction in the port area for Scenario 3 relative to Scenarios 1 and 2, the container volume capacity and thus profitability of the future port in Scenario 3 will likely be decreased, potentially reducing the future port operator's ability to share in the cost of port topside improvements. Scenarios 3 assumes approximately $186 million of port topside improvements costs are funded by the port operator (or approximately 42% of total costs), however this assumption could prove unrealistic due to the marketability and profitability of the smaller port in this scenario.

As shown in Table 12 below, it is anticipated that the NYCEDC will need to match the port operator's privately-funded topside investment with approximately **$254 million** of publicly-funded port topside improvements, including investments in i) shore power, ii) drainage, water, lighting, electrical, and communication systems, iii) site boundary fencing and security gates, iv) a new cruise parking garage, and v) new administrative and maintenance buildings, among other costs. This cost share results in 58% of the total port topside improvements estimated to be borne by NYCEDC.

Table 12: Scenario 3 – Port Topside Improvements

Container	New Systems (Electrical, Drainage, Water, etc.)	$	34,880,000
	New Buildings (Admin, M&R, Crane Maintenance)		29,890,000
	Reefer Container Access Platforms		39,200,000
	Shore Power		5,600,000
	Other		19,800,000
	Total Container Topside	**$**	**129,370,000**
Flex	New Systems (Electrical, Drainage, Water, etc.)	$	9,900,000
	Security Building/Truck Processing Gate		6,370,000
	Site Pavement Rehab		3,080,000
	Other		2,270,000
	Total Flexible Maritime Topside	**$**	**21,620,000**
Cruise	New Parking Garage	$	85,260,000
	Other		17,300,000
	Total Cruise Topside	**$**	**102,560,000**
Total Port Topside Investment		**$**	**253,550,000**

Note: Costs include soft costs estimated at 40% of total hard costs.

Capital Grants Funding

As detailed in Table 3, like to Scenarios 1 and 2, Scenario 3 assumes total capital grant subsidy of approximately $368 million, of which approximately **$328 million** is available for pier repairs.

Mixed Use Development

Scenario 3 generates an estimated 12,924 residential units, assuming an average floor area ratio of approximately 7.0, including 3,231 units of 485x-compliant affordable rental housing (or 25% of total housing units). Like Scenarios 1 and 2, the affordable rental program assumes rents for all affordable units are based on 60% of AMI. The balance of housing units is split between market-rate rental (50% of total units) and condominiums (25% of total units). Estimated gross land value generated from mixed use development is approximately **$3.2 billion** as shown in Table 15.

Table 13: Mixed Use Development Program

		Total Units	Affordable Rental	Market Rental	Market Condo
Housing Units	BMT	10,090			
	UPS	2,834			
	Total	12,924	3,231	6,462	3,231
	% Total	100%	25%	50%	25%
Hotel Keys		1,068			
Parking Spaces		500			

Table 14: Scenario 3 – Mixed Use Public Investments

Infrastructure	Demolition & Grading	$	15,743,986
	Utilities		169,895,985
	Roadways: Neighborhood/Perimeter Streets		117,040,426
	Roadways: Spine		83,501,600
	Total	**$**	**386,181,997**
Resiliency	Site Elevation		136,823,610
	Flood Wall (Spine)		56,689,925
	Total	**$**	**158,787,391**
Public Realm	Destination Parks (1)		219,954,000
	Neighborhood Open Space		154,781,200
	Greenway		56,338,380
	Open Space Maintenance NPV (2)		35,000,000
	Total	**$**	**466,073,580**
Community Benefits	Civic Space (New Schools)		225,000,000
	Workforce Training & Other		$-TBD
	Total	**$**	**225,000,000**
Total Mixed Use Public Investments		**$**	**1,236,042,968**

(1) Waterfront parks at Pier 7, Pier 12 and waterside of the UPS site; (2) 15% of Destination Parks cost

The mixed-use public investments assumed for Scenario 3 is approximately **$1.2 billion**, as set forth in Table 14 above. Estimated land value generated from mixed use development for Scenario 3 after the public investments and private site acquisition costs is approximately $1.4 billion.

Net Financial Impact

Table 15 below summarizes the port costs and mixed-use land value associated with Scenario 3. In summary, the net land value generated from the mixed-use development (based on housing density and programmatic assumptions set forth above) supports the cost of port infrastructure and topside improvements, while producing excess value to support other project goals and policy objectives.

Table 15: Net Value of Scenario 3

Total Pier Infrastructure	Table 11		$(1,091,430,000)
Total Port Topside Investment	Table 12		(253,550,000)
Total Port Cost			$(1,344,980,000)
(+) Capital Grant Allocation	Table 3		328,000,000
Net Port Cost		**[A]**	**$(1,016,980,000)**
Mixed Use Gross Land Value	Table 13		3,164,677,999
(–) Private Sites			(500,000,000)
(–) Mixed Use Public Investments	Table 14		(1,236,042,968)
Mixed Use Net Land Value		**[B]**	**$ 1,428,635,031**
Net Value Creation/(Shortfall)		**[A] + [B]**	**$ 411,655,031**

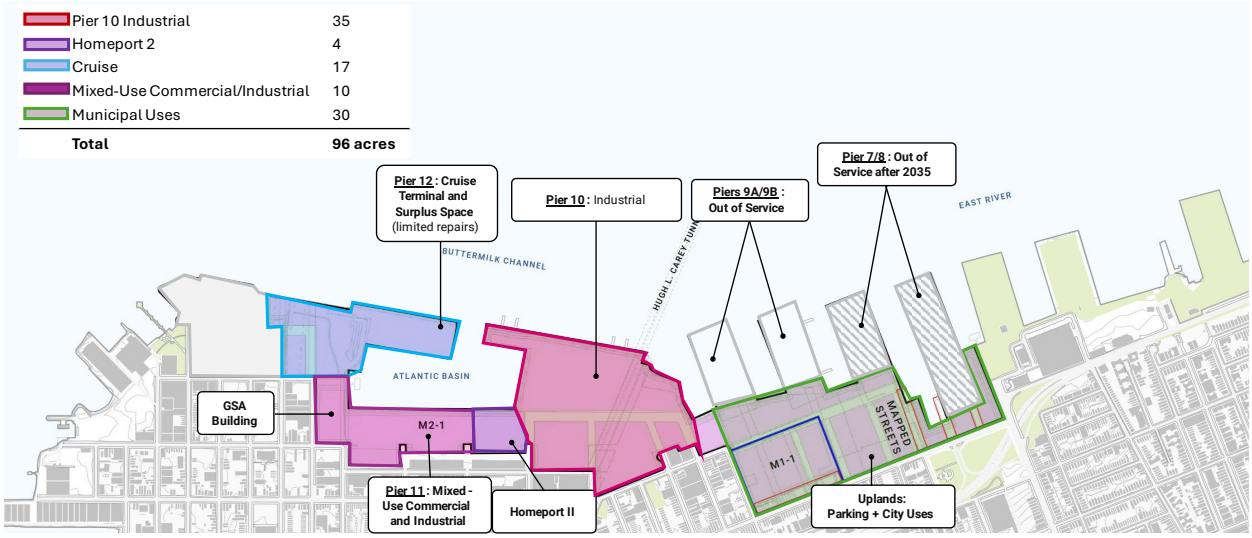
Scenario 4 | As-of-Right Industrial and Maritime

Pursuant to existing zoning and NYCEDC's lease from the Port Authority (requiring compliance with Port Authority's operating mandate, as landlord), NYCEDC's use of BMT is limited to manufacturing, industrial, and maritime uses. Scenario 4 assumes the following:

- NYCEDC commits $55 million to upgrade Pier 10 and $15 million for a new electrified crane
- $164 million federal MEGA Grant will be lost (along with City's required local match)
- Piers 7 and 8 will join Piers 9A and B as unusable by approximately 2035
- Required repairs to Piers 7, 8, 9A, and 9B bulkhead of approximately $35 million are unfunded
- NYCEDC will honor existing port and other industrial users through the term of existing agreements but cannot continue to subsidize container port operators or cross-harbor barging past the agreement date due to existing insufficient project income. After this period, NYCEDC will lease to the highest-paying industrial users (whether they be maritime or not) to generate the funds required to maintain the property. BMT may also continue to be the site of choice for difficult to locate government uses that fit within the industrial zoning code *(see Scenarios 4A and 4B below reflecting different mixes of industrial and municipal uses)*

An important non-financial consideration for Scenarios 4A and 4B is the impact of replacing existing container ship operations and cross-harbor barging with greater industrial and/or municipal uses and density will increase truck traffic volumes in the local vicinity. Absent meaningful improvement and greater activation of the existing port, which is not assumed for Scenarios 4A and 4B, it will be challenging to mitigate existing and future truck and vehicle congestion in and around the area.

Figure 4: Scenario 4 – Site Plan



Infrastructure Costs

With $55 million of City capital committed for pier repairs, NYCEDC could make certain limited stabilizing repairs to Pier 10. Beyond stabilizing repairs to Pier 10, approximately $35 million in repair costs are required along the bulkhead of Piers 7, 8, 9A, and 9B, even in a scenario in which these piers

are no longer maintained and inhabitable. These bulkhead repair costs, as well as more substantive pier repairs, sub-surface upgrades, and other port-related improvements, are unfunded.

Furthermore, the existing finger pier configuration reflects a bygone maritime era and does not meet the needs of a 21st century, multi-use port, primarily piers in a marginal configuration and with greater continuous surface area. Without additional public subsidy and/or cross-subsidy for improved bulkheads and a new marginal pier, the marketability of the container terminal with future port operators is meaningfully diminished. As shown in Table 16 below, required stabilizing repairs to Pier 10 and existing bulkheads are estimated to cost approximately **$90 million**.

Table 16: Scenario 4 – Infrastructure Costs

Pier 7 Rehab	*n/a (out of service by 2035)*	$	-
Pier 8 Rehab	*n/a (out of service by 2035)*		-
Pier 9A / 9B Reconstruction	*n/a (out of service today)*		-
Pier 7/8/9A/9B Bulkhead Repairs			35,300,000
Pier 10 Rehab			55,000,000
Pier Capital Maintenance Reserve Fund			-
Total Infrastructure		**$**	**90,300,000**

Note: Costs include estimated i) contigencies and ii) soft costs at 40% of total hard costs.

Capital Grants Funding

Scenarios 4A and 4B assume capital funding for pier improvements is limited to the **$55 million** already committed by the City for repairs to Pier 10.

Net Financial Impact

Tables 17 and 18 below summarize the stabilizing pier infrastructure repair costs relative to the value estimated from operator revenues associated with Scenarios 4A and 4B.

Scenario 4A – Municipal & Industrial

Scenario 4A assumes approximately 50% of available upland areas of former Piers 7, 8, 9A, and 9B, as well as Pier 10, of approximately 60 acres, is retained for a range of non-value-generating municipal uses with the remaining 50% of usable land leased for highest-and-best industrial uses, including tenanting of vacant space in Building 11 at Pier 11. Container operations and cross-harbor barging will end at the end of existing agreements, due to the lack of available income to continue subsidizing operations. The port will shrink over time, as piers go out of service. No funding is available for resiliency, neighborhood infrastructure, or open space improvements.

In summary, as shown in Table 17 below, the net value generated from mixed municipal and industrial uses does not support the cost of required stabilizing pier repairs.

Table 17: Net Value of Scenario 4A

Total Pier Infrastructure	Table 16	$	(90,300,000)
Total Port Topside Investment			-
Total Cost		$	(90,300,000)
(+) Capital Grant Allocation			55,000,000
Net Cost	**[A]**	**$**	**(35,300,000)**
Port Use Revenues NPV			$20,231,437
(–) Public Realm Investments			-
Mixed Use Net Land Value	**[B]**		**$20,231,437**
Net Value Creation/(Shortfall)	**[A] + [B]**	**$**	**(15,068,563)**

Scenario 4B – All Industrial (no Municipal)

Scenario 4B assumes that all available upland areas of former Piers 7, 8, 9A, and 9B, as well as Pier 10, of approximately 60 acres, are leased for highest-and-best industrial uses, including tenanting of vacant space in Building 11 at Pier 11. Container operations and cross-harbor barging will end at the end of existing agreements, due to the lack of available income to continue subsidizing operations. The port will shrink over time, as piers go out of service. No funding is available for resiliency, neighborhood infrastructure, or open space improvements.

In summary, as shown in Table 18 below, while the net value generated from highest-and-best industrial uses generates value to fund stabilizing infrastructure repairs, Scenario 4B does not align with stakeholder and Task Force feedback, including preservation and modernization of the port, introduction of new community uses, and mitigation of congestion, among other project goals.

Table 18: Net Value of Scenario 4B

Total Pier Infrastructure	Table 16	$	(90,300,000)
Total Port Topside Investment			-
Total Cost		$	(90,300,000)
(+) Capital Grant Allocation			55,000,000
Net Cost	**[A]**	**$**	**(35,300,000)**
Port Use Revenues NPV			$87,540,201
(–) Public Realm Investments			-
Mixed Use Net Land Value	**[B]**		**$87,540,201**
Net Value Creation/(Shortfall)	**[A] + [B]**	**$**	**52,240,201**