

Concept Cost Estimate

Northbridge Department of Public Works

Old Colony Site

Northbridge, Ma

Prepared by:



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Prepared for:

HKT

October 2, 2012

Northbridge Department of Public Works

Old Colony Site
Northbridge, Ma



Construction Cost
Project Management

Concept Cost Estimate

October 2, 2012

MAIN PROJECT COST SUMMARY

CONSTRUCTION

OLD COLONY BUILDING RENOVATION AND SITEWORK		\$1,558,714
Owner Allowance - Salt and Sand shed repair at Fletcher street (siding and painting)		\$12,500
Allowance for wood structure building demolition at Fletcher		\$20,000
Owner Allowance - Repave and Curbing at Fletcher street		\$50,000
Allowance for OH door replacement at Fletcher street (scope TBD)		\$50,000

SOFT COSTS

5% Construction Contingency		\$84,561
Architectural + Engineering Fees		\$180,910
OPM		NIC
Clerk of the Works 6 months		\$60,000
Transition Costs (Relocation during Construction)		N/A
Printing Cost + Advertisement	Estimate by Owner	\$10,000
Legal Costs	Estimate by Owner	\$2,000
Financing Costs		\$0
Builder's Risk Insurance		\$0
Communications Low Voltage	Estimate by Owner	\$5,000
Marketing	Directed by Owner	NIC
Commissioning	Directed by Owner	NIC
Testing		\$10,000
Equipment allowance	Estimate by Owner	\$50,000
Equipment Design Fees	Directed by Owner	NIC
Furniture		N/A
FFE Design Fees		NIC
Permitting	Directed by Owner	NIC
Site Abatement/Hazardous		N/A
Additional services (Sound, geotech, structural peer review, energy model, sustainable)		NIC

TOTAL PROJECT COST **\$2,093,685**

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This cost estimate was produced from site visit and owner supplied plans. Design and engineering changes occurring subsequent to the issue of these documents have not been incorporated in this estimate.

This estimate includes all direct construction costs, general contractor's overhead and profit and design contingency. Cost escalation assumes one year out.

Bidding conditions are expected to be public bidding utilizing chapter 149 filed sub bidding and DCAM qualified general contractors.

The estimate is based on prevailing wage rates for construction in this market and represents a reasonable opinion of cost. It is not a prediction of the successful bid from a contractor as bids will vary due to fluctuating market conditions, errors and omissions, proprietary specifications, lack or surplus of bidders, perception of risk, etc. Consequently the estimate is expected to fall within the range of bids from a number of competitive contractors or subcontractors, however we do not warrant that bids or negotiated prices will not vary from the final construction cost estimate.

ITEMS NOT CONSIDERED IN THIS ESTIMATE

Items not included in this estimate are:

Land acquisition, feasibility, and financing costs

Items identified in the design as Not In Contract (NIC)

Items identified in the design as by others

Rock excavation; special foundations (unless indicated by design engineers)

Utility company back charges, including work required off-site

Work to City streets and sidewalks, (except as noted in this estimate)

Construction or occupancy phasing or off hours' work, (except as noted in this estimate)

Contaminated or unsuitable soils removal or replacement

Dewatering

Hazardous Material abatement

Deep foundations

Building envelope insulation upgrades

Recommendations For Cost Control

TCI recommends that the Owner and Architect carefully review this document, including line item descriptions, unit prices, clarifications, exclusions, inclusions and assumptions, contingencies, escalation and mark-ups.

Request for modifications of any apparent errors or omissions to this document must be made to TCI with in ten (10) days of receipt of this estimate. Otherwise, it will be understood that the contents have been concurred with and accepted.

It is recommended that TCI using bid documents produce a final update estimate, to determine overall costs changes which have occurred since the preparation of the estimate. The final update estimate will address changes and additions to the document, as well as addenda issued during bidding process. TCI cannot reconcile bid results to an estimate not produced from bid documents.

Statement Of Probable Cost

TCI has no control over the cost of labor and materials, the general contractor's or any subcontractor's method of determining prices, or competitive bidding and market conditions. The opinion of construction is made on the basis of the experience, qualifications, and best judgment of the professional estimator familiar with the industry.

TCI does not guarantee that bids will not vary from this estimate.

TCI staff of professional cost estimators has prepared this estimate in accordance with generally accepted principles and practices.

Acceptance of Report

With acceptance of this report, the holder shall indemnify and hold harmless Tortora Consulting from and against all claims, damages, losses and expenses, including but not limited to attorney fees and court costs arising out of or as a result of the performance of this work, including third party claims.

October 2, 2012

Concept Cost Estimate

CONSTRUCTION COST SUMMARY		
BUILDING SYSTEM	20,000	sf
	RENOVATIONS AND SITEWORK	
A10 FOUNDATIONS AND SLABS	\$115,990	\$5.80
B10 SUPERSTRUCTURE	\$32,000	\$1.60
B20 EXTERIOR CLOSURE	\$113,694	\$5.68
B30 ROOFING	\$2,400	\$0.12
C10 INTERIOR CONSTRUCTION	\$283,435	\$14.17
C20 STAIRCASES		
C30 INTERIOR FINISHES	\$61,882	\$3.09
D20 PLUMBING	\$82,000	\$4.10
D30 HVAC	\$62,900	\$3.15
D40 FIRE PROTECTION	\$17,500	\$0.88
D50 ELECTRICAL	\$188,900	\$9.45
E10 EQUIPMENT		
E20 FURNISHINGS		
F10 SPECIAL CONSTRUCTION		
F20 HAZMAT REMOVALS		
G10 SITEWORK	\$193,193	\$9.66
TOTAL DIRECT COST (Trade Costs)	\$1,153,894	\$57.69
GC general conditions and requirements (5 months)	\$126,928	\$6.35
Bonds	\$23,078	\$1.15
GC overhead and profit	\$65,195	\$3.26
Permit	waived	
1 Year escalation	\$47,918	\$2.40
10% Design and Estimating contingency	\$141,701	\$7.09
TOTAL CONSTRUCTION COST	\$1,558,714	\$77.94

Concept Cost Estimate

GFA 20,000

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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OLD COLONY BUILDING RENOVATION AND SITEWORK

GROSS FLOOR AREA CALCULATION

RENOVATION 20,000

TOTAL GROSS FLOOR AREA (GFA)					20,000	sf
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A10 FOUNDATIONS AND SLABS

A1010 STANDARD FOUNDATIONS

Patch existing foundation walls after removal by demo

03300 End wall patching and infills as needed 1 ls 10,000.00 10,000

New curb at washbay walls

03300 8" curb 74 lf 50.00 3,700

SUBTOTAL

13,700

A1030 LOWEST FLOOR CONSTRUCTION

New 8" Slab on grade at Bays

07210 Vapor barrier 8,950 sf 0.50 4,475

03300 Rebat reinforcing 10,293 sf 1.40 14,410

03300 Concrete - 8" thick; 4,000 psi 237 cy 155.00 36,735

03300 Placing concrete 237 cy 45.00 10,665

03300 Finishing and curing concrete 8,950 sf 1.30 11,635

03300 Control joints - saw cut 8,950 sf 0.10 895

Miscellaneous

03300 Add thickening and footings at lift locations 1 ls 10,000.00 10,000

03300 Patch slabs at new OH locations 6 ea 1,500.00 9,000

03300 Depressed and sloped slab premium 8,950 sf 0.50 4,475

SUBTOTAL

102,290

TOTAL - FOUNDATIONS					\$115,990
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B10 SUPERSTRUCTURE

B1020 ROOF CONSTRUCTION

Modify exterior walls at new OH door openings

05120 Remove existing C channels, bracing and misc metals 6 ea 1,000.00 6,000

05120 New C channels frames and misc metals 6 ea 3,500.00 21,000

05120 Misc metals 1 ls 5,000.00 5,000

SUBTOTAL

32,000

TOTAL - SUPERSTRUCTURE					\$32,000
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Concept Cost Estimate

GFA 20,000

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
B20 EXTERIOR CLOSURE							
B2010 EXTERIOR WALLS							
	<u>Modify siding at new OH doors only</u>						
07461	Metal panel and trim to match existing	800	sf	18.00	14,400		
09250	bag insulation					inc	
	SUBTOTAL						14,400
B2020 WINDOWS							
	<u>Curtainwall and Aluminum windows</u>						
08520	N/A						
	SUBTOTAL						
B2030 EXTERIOR DOORS							
08100	Exterior Galv 3x7 HM door, frame and HW (Replaced at washbay area)	1	ea	1,450.00	1,450		
08300	Type OH1 - 20' x 14'	4	ea	16,800.00	67,200		
08300	Type OH2 - 16' x 14'	2	ea	13,440.00	26,880		
08300	Galv and SS hardware premium at washbay	1	ls	2,000.00	2,000		
07900	Backer rod & double sealant	280	lf	3.80	1,064		
06100	Wood blocking at openings	280	lf	2.50	700		
	SUBTOTAL						99,294
TOTAL - EXTERIOR CLOSURE							\$113,694
B30 ROOFING							
B3010 ROOF COVERINGS							
	<u>Relocate downspouts</u>						
07500	Remove and relocate downspouts	3	ea	800.00	2,400		
	SUBTOTAL						2,400
B3020 ROOF OPENINGS							
08600	N/A						
	SUBTOTAL						
TOTAL - ROOFING							\$2,400
C10 INTERIOR CONSTRUCTION							
C1010 PARTITIONS							
04200	New cmu shear wall	1,440	sf	20.00	28,800		
04200	New cmu walls to 8' and gwb/stud above to deck	8,946	sf	16.47	147,341		
04200	New cmu walls at wash bay to 8' and FRP/stud above to deck	1,314	sf	21.18	27,831		
04200	Fur-out wash bay exterior walls FRP/studs	1,350	sf	18.00	24,300		
09900	New gwb partitions	1,854	sf	9.00	16,686		
07900	Sealants & caulking at partitions	1	ls	1,500.00	1,500		
	SUBTOTAL						246,458
C1020 INTERIOR DOORS							
08140	New interior doors at office area	5	lvs	750.00	3,750		
08140	New interior doors at shops	22	lvs	800.00	17,600		
09900	Paint doors and frames	27	ea	100.00	2,700		
07900	Sealants & caulking	27	ea	51.00	1,377		
08140	<i>*Installation of doors and hardware by owner</i>						
	SUBTOTAL						25,427

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GFA 20,000

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
C1030 SPECIALTIES / MILLWORK							
06400	Work counters	39	lf	100.00	3,900		
06400	Waiting counter	11	lf	150.00	1,650		
10475	Lockers, shower, bath accessories	1	ls	2,500.00	2,500		
05500	Interior bollards/pipe rails	1	ls	3,500.00	3,500		
06400	<i>*Installation of counters by owner</i>						
	SUBTOTAL					11,550	
TOTAL - INTERIOR CONSTRUCTION							\$283,435
C30 INTERIOR FINISHES							
C3010 WALL FINISHES							
09900	Paint to new walls	24,480	sf	1.15	28,152		
09900	Paint to existing walls affected by construction	1	ls	2,500.00	2,500		
09900	Wall finishes ar expanded toilets/showers	1	ls	5,000.00	5,000		
	SUBTOTAL					35,652	
C3020 FLOOR FINISHES							
09700	Patch carpet at affected areas	1	ls	5,000.00	5,000		
09700	New locker room and expanded shower area	1	ls	5,000.00	5,000		
09650	Sealed concrete	8,950	sf	1.00	8,950		
	SUBTOTAL					18,950	
C3030 CEILING FINISHES							
09900	Rated ceilings at Haz / oil stor	252	sf	15.00	3,780		
09900	Patch existing ACT at affected areas	1	ls	3,500.00	3,500		
	SUBTOTAL					7,280	
TOTAL - INTERIOR FINISHES							\$61,882
D20 PLUMBING							
D20 PLUMBING, GENERALLY							
15100	Add toilet fixtures & showers	8	ea	4,000.00	32,000		
15100	Plumbing Oil and Gas Seps				w/ site		
15100	Floor trench drain system at bays	5	ea	4,000.00	20,000		
15100	Allow for washing equipment and piping	1	ls	15,000.00	15,000		
15300	Allow for compressed air systems and misc connections	1	ls	15,000.00	15,000		
	SUBTOTAL					82,000	
TOTAL - PLUMBING							\$82,000
D30 HVAC							
D30 HVAC, GENERALLY							
15200	Modify HVAC system distribution at converted areas	3,800	sf	8.00	30,400		
15200	Relocate condenser at new OH door to side	1	ea	2,500.00	2,500		
15300	Allow for CO2 system	1	ls	15,000.00	15,000		
15300	Allow for additional ventilation system for lockers/showers	1	ls	10,000.00	10,000		
15300	New radiant heating at wash bay	1	ea	3,000.00	3,000		
15300	Relocated radiant heating systems	2	ea	1,000.00	2,000		
	SUBTOTAL					62,900	
TOTAL - HVAC							\$62,900

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GFA 20,000

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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D40 FIRE PROTECTION

D40 FIRE PROTECTION, GENERALLY

15200	Modify Sprinkler heads at converted areas	40	ea	300.00	12,000		
15200	Modify Sprinkler heads at wash bay	10	ea	300.00	3,000		
15200	Hydraulic calculations	1	ls	1,500.00	1,500		
15200	Fees & permits	1	ls	1,000.00	1,000		
	SUBTOTAL					17,500	

TOTAL - FIRE PROTECTION \$17,500

D50 ELECTRICAL

Power Equipment

16100	Building service upgrade allowance	1	ls	30,000.00	30,000		
16100	Generator allowance	1	ls	80,000.00	80,000		
	SUBTOTAL					110,000	

D5020 LIGHTING & POWER

Lighting & Branch Power

16100	New lighting /power for converted areas	3,800	sf	8.00	30,400		
16100	Lighting and power modifications in bays	9,850	sf	2.00	19,700		
16100	OH doors connections and controllers	6	ea	800.00	4,800		
	SUBTOTAL					54,900	

D5030 COMMUNICATION & SECURITY SYSTEMS

Telecommunications System

16100	Tele/data modifications	20,000	sf	0.15	3,000		
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Fire Alarm

16100	Modify fire alarm system	20,000	sf	0.50	10,000		
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Security System

16100	N/A						
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PA/Sound System

16100	PA system - modify existing	20,000	sf	0.10	2,000		
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Misc

16100	Responder Radio Allowance					NIC	
	SUBTOTAL					15,000	

D5040 OTHER ELECTRICAL SYSTEMS

Lightning protection

16100	UL Master label lightning protection					NIC	
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Miscellaneous

16100	Demo/Make safe/Temp services	20,000	sf	0.25	5,000		
16100	Fault current & coordination study	1	ls	2,000.00	2,000		
16100	Fees & Permits	1	ls	2,000.00	2,000		9,000

TOTAL - ELECTRICAL \$188,900

E10 EQUIPMENT

E10 EQUIPMENT

15200	Equipment allowance				w/ FF&E		
	SUBTOTAL						

TOTAL - EQUIPMENT

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CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
G SITEWORK							
<u>Demolition</u>							
	Remove interior walls	2,898	sf	2.00	5,796		
	Remove ceilings and flooring	3,759	sf	1.50	5,639		
	Sawcut and remove slab	8,950	sf	5.00	44,750		
	Remove OH doors	4	ea	300.00	1,200		
	Sawcut and remove foundation walls at new OH door openings	283	sf	20.00	5,660		
	Remove 3x7 doors	1	ea	100.00	100		
	Remove misc dock equipment	1	ea	250.00	250		
	Remove siding	1,621	sf	3.00	4,863	68,258	
<u>Sitework</u>							
<u>Earthwork</u>							
	Haybales/Silt Fence	1	ls	2,500.00	2,500		
	Remove asphalt at loading dock infill area	1	dy	3,000.00	3,000		
	Remove asphalt at new OH doors for new roof drain relocations	0.5	dy	3,000.00	1,500		
	Remove bollards and save for reuse	10	ea	100.00	1,000		
	Fill area and grade for end bay entry	1	ls	10,000.00	10,000		
	E&B Trench for underslab piping in bays	2	dy	3,000.00	6,000		
	E&B Trench for Oil/water sep/storm drain connection	3	dy	3,000.00	9,000		
	Slab Prep 12" Gravel	331	cy	30.00	9,930		
	Fine Grade & Compact	8,950	sf	0.30	2,685		
<u>Utilities</u>							
	Oil and Gas Sep	1	ea	7,500.00	7,500		
	Connect drainage to storm drainage system	200	lf	65.00	13,000		
	Relocate roof drainage at OH locations	3	ea	1,000.00	3,000		
<u>Paving</u>							
	Patch bituminous paving at raised loading	222	sy	30.00	6,660		
	Patch bituminous paving at new drainage piping and structures	167	sy	30.00	5,010		
	Patch bituminous paving at OH fronts for bollard and drainage relocations	44	sy	30.00	1,320		
<u>Site Improvements</u>							
	Paint and reinstall ballards	10	ea	200.00	2,000		
	Paint and install new ballards	2	ea	400.00	800		
	Retaining wall at end bay	30	lf	141.67	4,250		
	Fencing allowance	300	lf	40.00	12,000		
	Sign	1	ls	5,000.00	5,000	106,155	
<u>Landscaping</u>							
	Planting and lawns					NIC	
<u>Site Electrical</u>							
<u>Ductbanks and pole bases</u>							
	Generator Pad (within 20' of elec room)	1	ea	4,000.00	4,000		
	E&B duct bank	20	lf	25.00	500		
	Encase duct banks in concrete	6	cy	180.00	1,080		
	L.Pole Base	4	ea	350.00	1,400		
<u>Power</u>							
	Generator wiring	20	lf	150.00	3,000		
<u>Site Lighting</u>							
	Light poles, conduit and wiring	4	ea	2,200.00	8,800		
	SUBTOTAL					18,780	
TOTAL - SITE DEVELOPMENT							193,193