

Conceptual Cost Estimate

Boxborough Public Safety Facility

502 + 520 Massachusetts Avenue

Boxborough, Ma

Prepared by:



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Prepared for:

HKT

June 2, 2016

Boxborough Public Safety Facility**502 + 520 Massachusetts Avenue**

Conceptual Cost Estimate

June 2, 2016

MAIN COST SUMMARY AND QUALIFICATIONS	Building area	\$/sf	Projected Costs
SITEWORK			\$2,312,595
BUILDING CONSTRUCTION	30,982	\$415.28	\$12,866,237
TOTAL CONSTRUCTION COST	30,982	\$489.92	\$15,178,832

This cost estimate was produced from May 20, 2016 concept documents provided by HKT. 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 assumed to mid point of construction schedule. Construction start is assumed spring 2017.

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

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

Building Permit

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 within 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.

June 2, 2016

Conceptual Cost Estimate
CONSTRUCTION COST SUMMARY

BUILDING SYSTEM	Sitework	30,982 sf		30,982 sf	
		New Construction	Total	New Construction	Total
A10 FOUNDATIONS AND SLABS		\$753,091	\$24.31	\$753,091	\$24.31
B10 SUPERSTRUCTURE		\$993,123	\$32.05	\$993,123	\$32.05
B20 EXTERIOR CLOSURE		\$1,444,303	\$46.62	\$1,444,303	\$46.62
B30 ROOFING		\$371,793	\$12.00	\$371,793	\$12.00
C10 INTERIOR CONSTRUCTION		\$1,129,983	\$36.47	\$1,129,983	\$36.47
C20 STAIRCASES		\$99,000	\$3.20	\$99,000	\$3.20
C30 INTERIOR FINISHES		\$445,637	\$14.38	\$445,637	\$14.38
D10 CONVEYING SYSTEMS		\$116,800	\$3.77	\$116,800	\$3.77
D20 PLUMBING		\$388,010	\$12.52	\$388,010	\$12.52
D30 HVAC		\$1,180,362	\$38.10	\$1,180,362	\$38.10
D40 FIRE PROTECTION		\$169,526	\$5.47	\$169,526	\$5.47
D50 ELECTRICAL		\$1,326,376	\$42.81	\$1,326,376	\$42.81
E10 EQUIPMENT		\$19,300	\$0.62	\$19,300	\$0.62
E20 FURNISHINGS		\$133,366	\$4.30	\$133,366	\$4.30
E30 SPECIAL CONSTRUCTION		\$140,150	\$4.52	\$140,150	\$4.52
F20 BUILDING DEMOLITION					
G10 SITWORK & DEMOLITION		\$1,464,964	\$47.28		\$1,464,964
TOTAL DIRECT COST (Trade Costs)		\$1,464,964	\$47.28	\$8,710,820	\$281.16
GC general conditions and requirements (2 phases - 18 months)		\$280,000		\$980,000	\$1,260,000
GC GL Insurance (1.1%)		\$16,115		\$95,819	\$111,934
Bonds (2%)		\$29,299		\$174,216	\$203,515
GC overhead and profit (4%)		\$71,615		\$398,434	\$470,049
Design and Estimating contingency (15%)		\$279,299		\$1,553,893	\$1,833,192
(8%) Escalation to midpoint of construction - spring 2017 start		\$171,303		\$953,055	\$1,124,358
TOTAL CONSTRUCTION COST		\$2,312,595	\$74.64	\$12,866,237	\$415.28
					\$15,178,832
					\$489.92

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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GROSS FLOOR AREA CALCULATION

1st floor	11,429
2nd floor	18,232
Mezzanine	1,321

TOTAL GROSS FLOOR AREA (GFA) 30,982 sf

A10 BUILDING FOUNDATIONS

A1010 STANDARD FOUNDATIONS

Building Strip footings

03300	Formwork	1,344	sf	15.00	20,160
03300	Re-bar	1,411	lbs	3.00	4,233
03300	Concrete material	78	cy	155.00	12,090
03300	Placing concrete	78	cy	40.00	3,120

Building Foundation walls (frost)

03300	Formwork	4,884	sf	15.00	73,260
03300	Re-bar	4,477	lbs	3.00	13,431
03300	Concrete material	95	cy	155.00	14,725
03300	Placing concrete	95	cy	40.00	3,800
07130	Dampproofing	2,442	sf	5.00	12,210
07210	Insulation to foundation walls; 2" thick	2,442	sf	3.00	7,326
03300	Form shelf	407	lf	8.00	3,256

Building Foundation walls (16" Retaining)

03300	Formwork	5,300	sf	15.00	79,500
03300	Re-bar	2,915	lbs	3.00	8,745
03300	Concrete material	155	cy	155.00	24,025
03300	Placing concrete	155	cy	40.00	6,200
07130	Dampproofing	1,590	sf	5.00	7,950
07210	Insulation to foundation walls; 2" thick	1,590	sf	3.00	4,770
03300	Form shelf	265	lf	8.00	2,120

Building Interior column footings

03300	Formwork	480	sf	15.00	7,200
03300	Re-bar	321	lbs	3.00	963
03300	Concrete material	19	cy	155.00	2,945
03300	Placing concrete	19	cy	40.00	760
03300	Set anchor bolts grout plates	15	ea	135.00	2,025

Building Exterior wall column footings

03300	Formwork	720	sf	15.00	10,800
03300	Re-bar	1,126	lbs	3.00	3,378
03300	Concrete material	21	cy	155.00	3,255
03300	Placing concrete	21	cy	40.00	840
03300	Set anchor bolts grout plates	30	ea	135.00	4,050

Miscellaneous

03300	Form key in footing	524	lf	5.00	2,620
<u>Piers/Pilasters</u>					
03300	Formwork	1,440	sf	15.00	21,600
03300	Re-bar	5,400	lbs	3.00	16,200
03300	Concrete material	19	cy	155.00	2,945
03300	Placing concrete	19	cy	40.00	760

Holding Tank Foundation walls (5' height)

03300	Formwork	2,200	sf	15.00	33,000
03300	Re-bar	2,420	lbs	4.00	9,680
03300	Concrete material	64	cy	155.00	9,920
03300	Placing concrete	64	cy	45.00	2,880
07130	Sheet membrane waterproofing to wall and footing	1,320	sf	10.00	13,200
07210	Insulation to foundation walls; 2" thick	1,320	sf	3.00	3,960
	SUBTOTAL				453,902

Conceptual Cost Estimate

GFA

30,982

TOTAL - FOUNDATIONS

\$753,091

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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B10 SUPERSTRUCTURE

B1010 FLOOR CONSTRUCTION

Admin 1st and 2nd Floor Structure - Steel:

05120	W beams, tube, columns, bracing and misc framing members	110	tns	4,500.00	495,000
53100	Floor deck - 1 1/2" deck	19,949	sf	3.85	76,804
03300	WWF reinforcement	22,941	sf	1.50	34,412
03300	Concrete Fill to metal deck; 4-1/2" thick; Normal Weight	404	cy	155.00	62,620
03300	Place and finish concrete	19,949	sf	1.10	21,944
	<u>Mezzanine Floor Structure - Steel:</u>				
05120	W beams, tube, columns, bracing and misc framing members	5	tns	4,500.00	22,500
53100	Floor deck - 1 1/2" deck	1,321	sf	3.85	5,086
03300	WWF reinforcement	1,519	sf	1.50	2,279
03300	Concrete Fill to metal deck; 4-1/2" thick; Normal Weight	27	cy	155.00	4,185
03300	Place and finish concrete	1,321	sf	1.10	1,453
	<u>Miscellaneous</u>				
07841	Fire stopping floors	1	ls	3,500.00	3,500
	SUBTOTAL				729,783

B1020 ROOF CONSTRUCTION

Detention Roof Structure - Steel:

05120	W beams, joist, columns, bracing and misc framing members bearing on perimeter CMU exterior walls	12	tns	4,500.00	54,000
53100	Roof deck - 1 1/2" 20 ga deck	3,000	sf	3.50	10,500
	<u>Apparatus Roof Structure</u>				
05120	W beams, joist, columns, bracing and misc framing members bearing on perimeter CMU exterior walls	38	tns	4,500.00	171,000
53100	Roof deck - 1 1/2" 20 ga deck	9,600	sf	2.90	27,840
	SUBTOTAL				263,340

TOTAL - SUPERSTRUCTURE

\$993,123

B20 EXTERIOR CLOSURE

B2010 EXTERIOR WALLS

Interior skin at Admin

07210	5/4" x 4' FT vertical furring	6,489	sf	3.50	22,712
07270	3" Rigid insulation & Z clips	6,489	sf	4.00	25,956
07270	Air/Vapor barrier	6,489	sf	6.00	38,934
09211	6" Lightgage metal framing	6,489	sf	12.00	77,868
09211	5/8" ext gwb Sheathing	6,489	sf	2.25	14,600
09211	5/8" int gwb	6,489	sf	2.20	14,276
09900	Paint	5,840	sf	1.50	8,760

Interior skin at Detention

04200	8" CMU	2,224	sf	30.00	66,720
07210	5/4" x 4' FT vertical furring	2,224	sf	3.50	7,784
07210	3" Rigid insulation & Z clips	2,224	sf	4.00	8,896
07270	Air/Vapor barrier	2,224	sf	6.00	13,344
09900	Paint interior CMU	2,002	sf	2.00	4,004

Interior skin at Apparatus

09211	8" CMU	9,630	sf	30.00	288,900
07210	5/4" x 4' FT vertical furring	9,630	sf	3.50	33,705
07270	3" Rigid insulation & Z clips	9,630	sf	4.00	38,520
09211	Air/Vapor barrier	9,630	sf	6.00	57,780
09900	Paint interior CMU	9,630	sf	2.00	19,260

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CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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Exterior skin

04200	Brick veneer	1,944	sf	40.00	77,760
04200	Fiber cement panel siding	440	sf	28.00	12,320
07460	Fiber cement trim - roof edge	856	lf	15.00	12,840
07460	Fiber cement trim - window, door and bands	1,834	lf	10.00	18,340
07460	Fiber cement lap/shingle siding	13,269	sf	18.00	238,842
	<u>Miscellaneous</u>				
05500	Canopy ceiling supports, framing and blocking	312	sf	25.00	7,800
05500	Canopy ceiling and fascia finish	312	sf	48.00	14,976
05500	Lintels in masonry openings - labor and material	18,343	sf	1.00	18,343
	SUBTOTAL				1,143,240

B2020 WINDOWS

Window systems

84110	Alum clad windows	2,817	sf	70.00	197,190
07920	Backer rod & double sealant	1,650	lf	5.00	8,250
06100	Wood blocking at openings	1,650	lf	6.00	9,900
	SUBTOTAL				215,340

B2030 EXTERIOR DOORS

08111	GHM door - type FG - full glazed	1	ea	650.00	650
08111	GHM door - type F - flush	1	ea	450.00	450
08111	GHM door - type G - half glazed	1	ea	550.00	550
08111	Door frame A - GHM single	1	ea	375.00	375
08111	Door frame B - GHM single	1	ea	400.00	400
08111	Door frame D - GHM single	1	ea	950.00	950
08111	Hardware	3	ea	500.00	1,500
08111	Install	3	lvs	255.00	765
84110	FG - Alum entry - double	2	pr	6,500.00	13,000
08311	12'x10' OH1	2	ea	6,000.00	12,000
08331	14'x14' OH2	5	ea	9,800.00	49,000
08900	Louvers	1	ls	5,000.00	5,000
07920	Backer rod & double sealant	80	lf	4.00	320
06100	Wood blocking at openings	80	lf	5.00	400
09900	Paint HM door and frame	3	ea	121.00	363
	SUBTOTAL				85,723

TOTAL - EXTERIOR CLOSURE

\$1,444,303

B30 ROOFING

B3010 ROOF COVERINGS

Flat roofing (main roof and canopies)

07540	TPO Membrane roof	21,431	sf	7.00	150,017
07540	6" Insulation	21,431	sf	5.00	107,155
07540	Insulation tapered	4,286	sf	5.00	21,430
07540	1/2" dens-deck protection board	21,431	sf	1.50	32,147
07540	Reinforced vapor barrier	21,431	sf	0.45	9,644
07540	Walking pads	1	ls	5,000.00	5,000
	<u>Flashing & Trim</u>				
07620	Parapet cap and wall membrane/flashings	750	lf	42.00	31,500
07620	Misc wall and roof to roof flashings	350	lf	22.00	7,700
	<u>Accessories</u>				
07720	Roof hatch	1	ea	5,000.00	5,000
05500	Roof to roof ladder	2	ea	1,100.00	2,200
	SUBTOTAL				371,793

TOTAL - ROOFING

\$371,793

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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C10 INTERIOR CONSTRUCTION

C1010 PARTITIONS

04200	Interior 8" CMU walls	5,552	sf	25.00	138,800	
04200	Interior 8" CMU walls under mezzanine	2,532	sf	25.00	63,300	
09211	Interior walls - rated at stairs/mech	5,936	sf	15.00	89,040	
09211	8" CMU walls at elevator shaft	1,056	sf	25.00	26,400	
09211	Interior walls - plumbing walls	2,368	sf	20.00	47,360	
09211	Interior walls	26,385	sf	12.00	316,620	
11000	Chain link partition 16'	30	lf	75.00	2,250	
11000	Chainlink door	1	ea	800.00	800	
07920	Sealants & caulking at partitions	1	ls	7,500.00	7,500	
06100	Rough blocking	4,488	lf	6.00	26,928	
	SUBTOTAL					718,998

C1020 INTERIOR DOORS

08111	Door frame A - HM single	67	ea	285.00	19,095	
08111	Door frame A - HM double	1	ea	325.00	325	
08111	Door frame B - HM single	17	ea	310.00	5,270	
08111	Door frame C	4	ea	475.00	1,900	
08111	HM door - type F	17	lvs	450.00	7,650	
08111	HM door - type G	1	lvs	545.00	545	
08111	HM door - type N	4	lvs	525.00	2,100	
08111	Wood door - type N	5	lvs	535.00	2,675	
08111	Wood door - type F	43	lvs	475.00	20,425	
08111	Wood door - type G	7	lvs	550.00	3,850	
08111	Wood door - type FG	12	lvs	650.00	7,800	
08111	90 min	2	lvs	400.00	800	
08111	60 min	8	lvs	300.00	2,400	
08111	45 min	1	lvs	200.00	200	
08111	Hardware	89	lvs	400.00	35,600	
08111	Install	89	lvs	255.00	22,695	
09900	Paint HM doors and frames	22	ea	121.00	2,662	
09900	Paint HM frames	67	ea	95.00	6,365	
08800	Glazing	33	ea	150.00	4,950	
07920	Sealants & caulking	89	ea	68.00	6,052	
08311	Allowance for access doors	16	ea	165.00	2,640	
	SUBTOTAL					155,999

C1030 SPECIALTIES / MILLWORK

06402	Kitchen cabinets and counters at 138	13	lf	350.00	4,550	
06402	Kitchen cabinets and counters at 203	24	lf	350.00	8,400	
06402	Kitchen cabinets and counters at 119	13	lf	350.00	4,550	
06402	Closet pole and shelves	37	lf	45.00	1,665	
06402	Plam work surface and base cabinets and wall shelving	20	lf	575.00	11,500	
10000	Lobby built in bench	8	lf	375.00	3,000	
06402	AV Surv Plam work counters	12	lf	250.00	3,000	
06402	Mops hooks and shelving	14	lf	200.00	2,800	
06402	Wall shelving at storage, supply, amory, evidence rooms	184	lf	185.00	34,040	
06402	Plam work surface and base cabinets	43	lf	450.00	19,350	
10000	Lobby display cabs	3	ea	1,500.00	4,500	
10000	White board and projection at training	1	ea	800.00	800	
06402	Plam base cabinets w/ solid surface top at conf	12	lf	400.00	4,800	
10000	Plam base cabinets w/ solid surface top and wall shelving at bulk stor	8	lf	500.00	4,000	
06402	Plam base cabinets w/ solid surface top and wall shelving at SCBA	5	lf	500.00	2,500	
06402	Plam base cabinets w/ solid surface top and wall shelving at laundry	7	lf	500.00	3,500	
10000	White boards	2	ea	450.00	900	
06402	8' mirrors at fitness walls	488	sf	20.00	9,760	
08800	Surveillance one way glass and frame	1	ea	1,600.00	1,600	

Conceptual Cost Estimate

GFA

30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
<i>Restrooms and Lockers</i>							
10440	Toilet partitions - HC	2	ea	1,322.00	2,644		
10650	Toilet partitions - regular stall	3	ea	1,100.00	3,300		
10650	Toilet partitions screen	5	ea	450.00	2,250		
06402	Solid surface vanities	24	lf	325.00	7,800		
10280	Soap disp	11	ea	18.00	198		
10280	Mirror	11	ea	233.00	2,563		
10280	Robe hook	15	ea	23.00	345		
10280	Grab bar	16	ea	85.00	1,360		
10280	Towel dispenser/disposal	8	ea	56.00	448		
10280	Napkin dispenser/disposal	8	ea	56.00	448		
10280	TP holder	12	ea	45.00	540		
10280	Shower curtain rod	6	ea	268.00	1,608		
10850	20x24 gear lockers	30	ea	300.00	9,000		
10850	24x36 Lockers/integral bench	27	ea	400.00	10,800		
10850	18x24 Lockers/integral bench	23	ea	385.00	8,855		
10850	Wood benches at gear stor	4	ea	650.00	2,600		
10850	Wood benches at showers	6	ea	350.00	2,100		
<i>Misc</i>							
06100	Backer panels in electrical closets	1	ls	2,500.00	2,500		
06200	Window sill/aprons	375	lf	45.00	16,875		
10140	Interior and Exterior Signage	1	ls	15,000.00	15,000		
10440	Fire extinguisher cabinets	12	ea	275.00	3,300		
08800	Misc glass and glazing	1	ls	5,000.00	5,000		
05500	Int bollards	14	ea	500.00	7,000		
05500	Miscellaneous metals throughout building	30,982	sf	0.50	15,491		
07920	Miscellaneous sealants throughout building	30,982	sf	0.25	7,746		
SUBTOTAL							254,986

TOTAL - INTERIOR CONSTRUCTION **\$1,129,983**

C20 STAIRCASES

C2010 STAIR CONSTRUCTION					
05500	Stair 1	2	ft	12,500.00	25,000
05500	Stair 2	2	ft	12,500.00	25,000
05500	Half Stair at 212	1	ft	7,500.00	7,500
05500	Mezzanine Stair	1	ft	8,500.00	8,500
05500	Mezzanine rail	60	lf	125.00	7,500
03300	Concrete material in pan infill	6	ft	500.00	3,000
SUBTOTAL					
76,500					

C2020 STAIR FINISHES

09651	Rubber treads/risers	6	ft	2,250.00	13,500
09900	Paint to staircases	6	ft	1,500.00	9,000
SUBTOTAL					
22,500					

TOTAL - STAIRCASES **\$99,000**

C30 INTERIOR FINISHES

C3010 WALL FINISHES					
09900	Paint to GWB	46,260	sf	1.50	69,390
09300	Tile to walls	3,000	sf	18.00	54,000
SUBTOTAL					
123,390					

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GFA 30,982

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C3020 FLOOR FINISHES

09651	Linoleum	5,300	sf	9.00	47,700	
09651	Athletic flooring	550	sf	12.00	6,600	
11000	Walk-off mat/frame	60	sf	20.00	1,200	
09665	Carpet	5,525	sf	4.44	24,531	
09300	Porcelain and base	475	sf	20.00	9,500	
09300	Ceramic Tile and base	2,260	sf	18.00	40,680	
09900	Sealed concrete	12,685	sf	1.50	19,028	
09730	Reninous floor and base	820	sf	15.00	12,300	
09651	Rubber base	5,210	lf	2.95	15,370	
	SUBTOTAL					176,909

C3030 CEILING FINISHES

09510	ACT ceilings	16,575	sf	4.50	74,588	
09211	Rated gwb	2,925	sf	8.00	23,400	
09211	Interior gwb ceiling	2,500	sf	6.00	15,000	
09900	Exposed structure	8,982	sf	1.00	8,982	
09211	Soffits	400	lf	38.00	15,200	
09900	Paint to GWB ceilings and soffits	7,425	sf	1.10	8,168	
	SUBTOTAL					145,338

TOTAL - INTERIOR FINISHES

445,637

D10 CONVEYING SYSTEMS

D1010 ELEVATOR

14210	Passenger elevator, 2 stop	1	ea	110,000.00	110,000	
05500	Pit ladders	1	ea	1,200.00	1,200	
05500	Rail supports and hoist beam	1	ls	5,000.00	5,000	
05500	Sill angles	24	lf	25.00	600	
	SUBTOTAL					116,800

TOTAL - CONVEYING SYSTEMS

\$116,800

D20 PLUMBING

D20 PLUMBING, GENERALLY

Equipment

220000	Gas, Oil, & Sand Interceptor	1	ea	\$12,000.00	\$12,000	
220000	Water Meter	1	ea	\$1,760.00	\$1,760	
220000	Domestic Water Heater	1	ea	\$8,500.00	\$8,500	
220000	Main Backflow Preventor	1	ea	\$3,200.00	\$3,200	
220000	Zone Backflow Preventor	1	ea	\$750.00	\$750	
220000	Thermostatic Mixing Valve	1	ea	\$1,800.00	\$1,800	
220000	Air Compressor	1	ea	\$5,000.00	\$5,000	
220000	Circulation Pump	1	ea	\$1,600.00	\$1,600	
220000	Fixture and Equipment Hook Ups	8	ea	\$500.00	\$4,000	

Plumbing Fixtures including all supply, drain and venting

220000	Water Closets	11	ea	4,250.00	\$46,750	
220000	Cell Water Closets/sink combo	3	ea	8,500.00	\$25,500	
220000	Urinal	3	ea	4,000.00	\$12,000	
220000	Lavatories - drop in	6	ea	2,950.00	\$17,700	
220000	Lavatories - wall hung	5	ea	3,850.00	\$19,250	
220000	Janitors Sinks	4	ea	2,800.00	\$11,200	
220000	Kitchen Sinks	3	ea	2,500.00	\$7,500	
220000	SS Scullery sink, pedal and hose spray	1	ea	5,500.00	\$5,500	
220000	Shower	8	ea	5,000.00	\$40,000	
220000	Emergency Eye Wash/Shower	2	ea	4,500.00	\$9,000	
220000	Drinking Fountains	1	ea	5,000.00	\$5,000	
220000	Roof Drains	10	ea	\$2,850.00	\$28,500	
220000	Floor Drains	12	ea	\$2,000.00	\$24,000	
220000	Hose Bibbs	10	ea	\$800.00	\$8,000	

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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Misc

220000	Laundry room connections	1	ls	3,500.00	3,500		
220000	Decon room connections	1	ls	3,500.00	3,500		
220000	SCBA room connections	1	ls	3,500.00	3,500		
220000	Compressed Air and misc apparatus utilities	1	ls	30,000.00	30,000		
220000	Gas	500	lf	68.00	34,000		
220000	Coordination	1	ls	10,000.00	10,000		
220000	Permits	1	ls	5,000.00	5,000		
	SUBTOTAL						388,010

TOTAL - PLUMBING

\$388,010

D30 HVAC

D30 HVAC, GENERALLY

Equipment and distribution

230000	Admin/Dentention building heating	21,382	sf	\$10.00	213,820
230000	Apparatus in slab radiant and gas fired infrared heaters	9,600	sf	\$7.00	67,200
230000	Admin/Dentention building Cooling	21,382	sf	\$26.00	555,932
230000	Ventilation and CO Exhaust	30,982	sf	\$3.00	92,946
	<u>Controls</u>				
230000	ATC	30,982	sf	\$5.00	154,910
230000	Alarming, Scheduling, Trending & Logging	30,982	sf	\$1.00	30,982
	<u>Commissioning</u>				
230000	Start up	30,982	sf	\$0.50	15,491
230000	Balancing	30,982	sf	\$0.75	23,237
230000	3rd Party Assist	30,982	sf	\$0.35	10,844
	<u>Miscellaneous</u>				
230000	Coordination	1	ls	\$5,000.00	5,000
230000	Crane and Rigging	1	ls	\$10,000.00	10,000
	SUBTOTAL				1,180,362

TOTAL - HVAC

\$1,180,362

D40 FIRE PROTECTION

D40 FIRE PROTECTION, GENERALLY

210000	Sprinkler system piping and heads	30,982	sf	4.10	127,026
210000	Service Equipment	1	ls	12,500.00	12,500
210000	Fire pump	1	ls	30,000.00	30,000
	SUBTOTAL				169,526

TOTAL - FIRE PROTECTION

\$169,526

D50 ELECTRICAL

D5010 SERVICE & DISTRIBUTION

Power Circuitry & Equipment

260000	Service, main switchboard and panels	30,982	sf	8.00	247,856
260000	200KVA Emergency generator	1	ls	225,000.00	225,000
260000	Power circuitry	30,982	sf	6.00	185,892
	SUBTOTAL				658,748

D5020 LIGHTING & POWER

260000	LED lighting, power and branch circuitry	30,982	sf	10.00	309,820
	SUBTOTAL				309,820

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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D5030 COMMUNICATION & SECURITY SYSTEMS

Telecommunications System

260000	Rough-in system	30,982	sf	1.25	38,728	
260000	<u>Fire Alarm</u>	30,982	sf	3.85	119,281	
260000	Fire Alarm system					
260000	<u>Special Systems</u>					softcosts
260000	Radio transponder system					
260000	Security roughin	30,982	sf	1.25	38,728	
260000	PA system	1	ls	15,000.00	15,000	
	SUBTOTAL					211,737

D5040 OTHER ELECTRICAL SYSTEMS

Lightning protection

260000	UL Master label lightning protection	30,982	sf	1.00	30,982	
	<u>Site</u>					
260000	Site power and Lighting	1	ls	65,000.00	65,000	
	<u>Miscellaneous</u>					
260000	Temp services	30,982	sf	0.60	18,589	
260000	Seismic restraints	1	ls	10,000.00	10,000	
260000	Coring & patching	1	ls	6,500.00	6,500	
260000	Fire stopping	1	ls	5,000.00	5,000	
260000	Fault current & coordination study	1	ls	5,000.00	5,000	
260000	Fees & Permits	1	ls	5,000.00	5,000	
	SUBTOTAL					146,071

TOTAL - ELECTRICAL

\$1,326,376

E10 EQUIPMENT

E10 EQUIPMENT, GENERALLY

Appliances

11310	Under-counter refrigerator	1	ea	500.00	500	
11310	Full-size residential refrigerator	2	ea	900.00	1,800	
11310	Microwave	2	ea	400.00	800	
11310	Cook top	2	ea	850.00	1,700	
11310	Toaster-oven	2	ea	200.00	400	
11310	Disposers	2	ea	250.00	500	
11310	Commercial Stove and hood	1	ea	7,500.00	7,500	
11310	Commercial refrigerator	1	ea	3,500.00	3,500	
11310	Commercial dishwasher	1	ea	1,600.00	1,600	
11310	Commercial microwave	1	ea	750.00	750	
11310	Commercial Toaster-oven	1	ea	250.00	250	
	SUBTOTAL					19,300

TOTAL - EQUIPMENT

\$19,300

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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E20 FURNISHINGS

E2010 FIXED FURNISHINGS

Blinds

12211	Window treatments	2,817	sf	8.00	22,536
12211	Training - room darkening shades	225	sf	6.00	1,350
12211	Dorm - room darkening shades	80	sf	6.00	480

Casework

12000	Metal base cabinets w/ solid surface top and wall shelving at Decon	10	lf	550.00	5,500
12000	Metal storage cabinets at medical supply	5	ea	1,250.00	6,250
12000	Metal wall shelving at medical supply	11	ls	200.00	2,200
12000	Metal storage cabinets at bulk storage	3	ea	1,250.00	3,750
12000	Metal storage cabinets at maintenance	2	ea	1,250.00	2,500
12000	Booking island base cab / counter	21	lf	800.00	16,800
12000	Storage shelving at Hazmat storage	24	lf	250.00	6,000
12000	Tire and part shelving	14	lf	200.00	2,800
12000	Wood bench at Decon	3	lf	400.00	1,200
12000	Wood work bench, peg board and wall shelving at Maintenance	15	lf	400.00	6,000
11000	Safe room metal cabinet, eppxy counter and shelving	10	lf	600.00	6,000
12000	<i>Shelving</i>				
12000	High density file storage	1	ls	50,000.00	50,000
	SUBTOTAL				133,366

E2020 MOVABLE FURNISHINGS

All movable furnishings to be provided and installed by owner

NIC

SUBTOTAL

TOTAL - FURNISHINGS

\$133,366

E30 SPECIAL CONSTRUCTION

E30 SPECIAL CONSTRUCTION

Security and Detention allowance

13000	G2 sliding steel cell doors; 3' x 7' x 2" thick door, insulated and E frame	3	ea	12,000.00	36,000
13000	Steel built-in bench/bunk	3	ea	5,500.00	16,500
13000	Evidence and holding steel built-in bench w/ bulk bars	2	ea	6,000.00	12,000
13000	Steel plate ceiling system; 3/16" steel panels with interlock	3	rms	6,500.00	19,500
13000	Suicide proof HVAC register/return	6	ea	500.00	3,000
13000	Suicide proof light fixture	3	ea	850.00	2,550
13000	Cell monitor/audio system	1	ls	5,000.00	5,000
13000	Pistol locker, wall mounted	1	ea	1,600.00	1,600
13000	Evidence drop off pass through lockers	4	ea	2,250.00	9,000
	<i>Transaction window</i>				
13000	Transaction counter, tray & Bullet proof window unit	1	ls	25,000.00	25,000
13000	Bullet proof shielding at lobby walls	1	ls	10,000.00	10,000
	SUBTOTAL				140,150

TOTAL - EQUIPMENT

\$140,150

Conceptual Cost Estimate

GFA 30,982

CSI CODE	DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
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F20 BUILDING DEMOLITION

F2010 BUILDING ELEMENTS DEMOLITION

Phase 1 building take down

02050 Demo makesafe w/ sitework budget below

02050 Fire station building demo including foundations w/ sitework budget below

01000 Temp, structural and facade at police see summary

Phase 2 building take down

02050 Demo makesafe w/ sitework budget below

02050 Police station building demo including foundations w/ sitework budget below

SUBTOTAL

\$0

F2020 HAZARDOUS COMPONENTS ABATEMENT

Haz-mat

SUBTOTAL

w/ sitework budget below

\$0

TOTAL - BUILDING DEMOLITION

\$0

G10 SITEWORK

Sitework

Site Estimate provided by PARE Corp

1 ls 1,297,500.00 1,297,500

Site prep, erosion control and earthwork

Site improvements including pavement, curbing, retaining walls, guardrails, concrete paving, loading dock and equipment pads

Drainage systems

Utilities including water, sewer and gas line e&b

Demo and haz-mat

Additional site improvements not included above

02100 Building excavation, backfill and slab prep 30,982 sf 2.00 61,964

21000 Bollards at garage doors 14 ea 500.00 7,000

21000 Bollards at generator and transformer 8 ea 500.00 4,000

21000 Flagpole 1 ea 4,500.00 4,500

21000 Encase electrical ductbanks in concrete, excavate and backfill 100 cy 250.00 25,000

21000 Misc signage and improvements 1 ls 15,000.00 15,000

Landscaping

21000 Planting and lawns allowance 1 ls 50,000.00 50,000 1,464,964

Site Electrical

21000 Generator w/ bldg estimate

21000 Primary and secondary conduit w/ bldg estimate

21000 Secondary wiring w/ bldg estimate

21000 Light poles, conduit and wiring w/ bldg estimate -

TOTAL - SITEWORK

1,464,964