Town of Brimfield, Massachusetts

Town Building Assessment Study

and

Capital Master Plan

February 24, 2014

Town Hall
Senior Center
Town Hall Annex and Barn
Brimfield Public Library
Public Safety Headquarters
Highway Department






D·R·A
DRUMMEY ROSANE ANDERSON, INC. ARCHITECTS

BUILDING USE AUDIT
Town of Brimfield, Massachusetts

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Town Building Assessment Study and Capital Master Plan
Town of Brimfield, Massachusetts

Introduction

Buildings or functions included in this audit are as follows:

Town Hall
Town Hall Annex
Library
Senior Center
Public Safety Building (Police, Fire and Ambulance)
Highway Department

In 2013 DRA Architects with its team of engineers performed visits to each of the buildings and evaluated them to determine the types of improvements that will be necessary. Conversations were held with department heads and those in charge of maintenance. These improvements included such topics as:

Life Safety
Health
American's with Disabilities Compliance
Site Issues
Exterior Envelop Issues
Building Interiors
Energy and Water Conservation
Hazardous Materials
New Construction

With any renovation project it is necessary that International Existing Building Code be reviewed in light of the items of renovation work that are selected. In doing so it may be determined that other items of work will be necessary to achieve compliance.

Each of the improvements was then prioritized into the following categories:

Current Critical
Potentially Critical
Necessary – Not yet Critical
Recommended

A detailed description of criteria used for each of the categories is included in the report.

For each of the improvements an independent cost estimate was obtained. The estimates are a projection of the costs and include soft costs associated with each item. (Soft costs are the miscellaneous costs associated with professional fees, contingency, bonding costs, bidding expense, testing etc.). The estimator does not have the advantage of detailed drawings for each of the items so

the intent is to provide an order of magnitude that, should the improvement move ahead, will be refined up to the bid date. For many of the like items it will be possible to group them together and save on the soft costs. Similarly, there may be items that can be bid without professional drawings and specifications and, again, the soft costs can be reduced. The cost should be used as an overall budget for each item. A more detailed explanation of the use of the estimates is included later in this report.

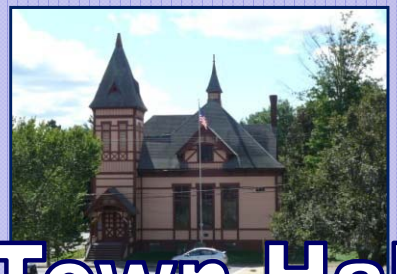
This report is organized with the recommendations presented first followed by the reports for each of the buildings from the various engineers each with the cost estimate for the work.

* * *

Senior Ctr.

Library.

TH Annex.

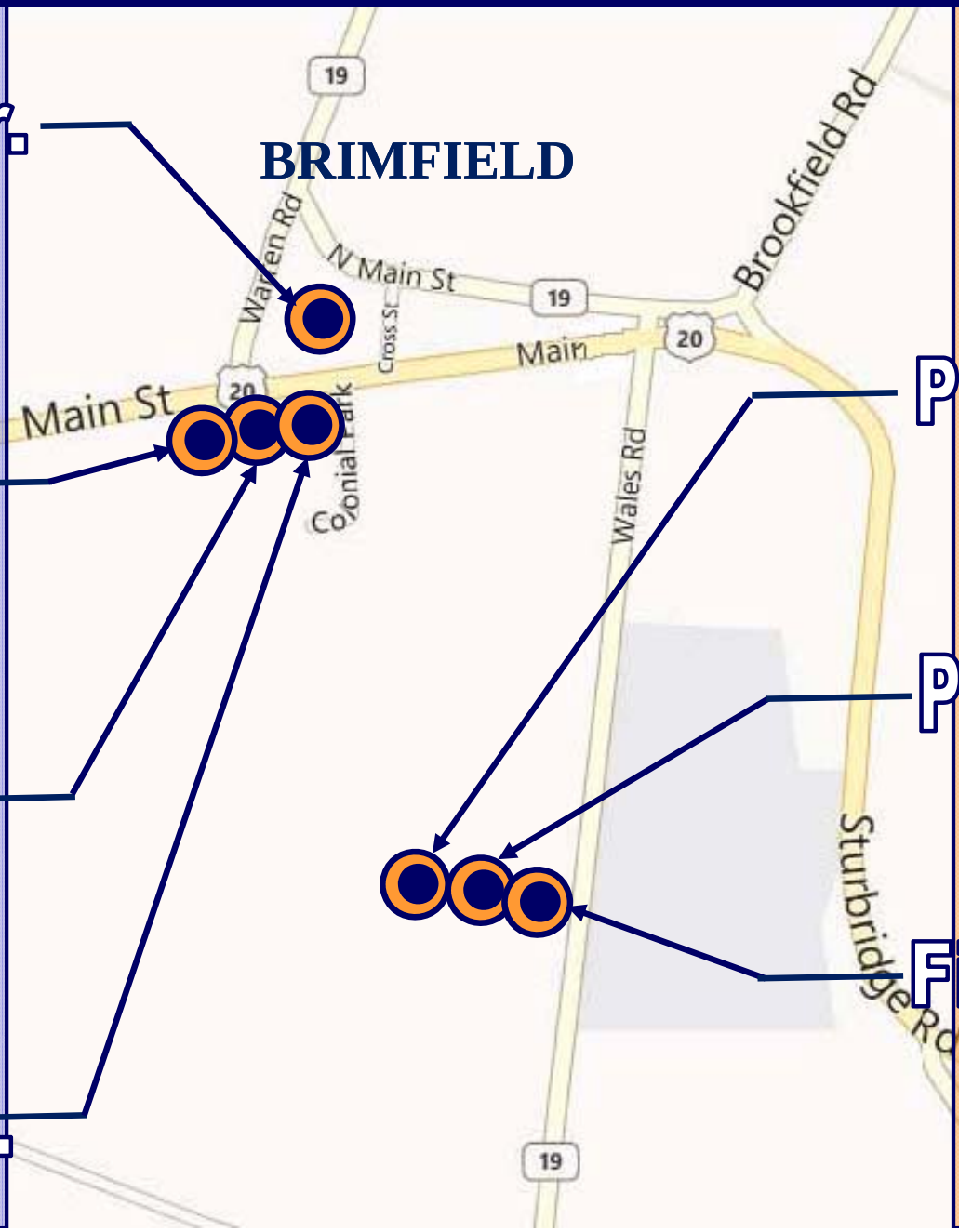


Town Hall.

Public Works

Police Station

Fire Station



TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

Priority Rating System

Priorities are listed to the left of each item:

Priority 1 – Current Critical: Conditions in this category require immediate action to:

- Correct a cited safety hazard
- Stop accelerated deterioration
- Return a facility to operation

Priority 2 – Potentially Critical: Conditions in this category if not corrected soon may result in:

- Intermittent Operations
- Rapid Deterioration
- Potential Safety Hazards

Priority 3 – Necessary, not yet critical.
Conditions in this category require appropriate attention to preclude a predictable deterioration or potential downtime and possible damage and higher costs.

Priority 4 – Recommended.
Conditions in this category include items that represent a sensible improvement to existing conditions. They are not required for the most basic function of the facility, but will improve overall usability and/or reduce long-term maintenance costs.

__ Comment only.

TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

Option Descriptions:

Option #1

This option minimizes new construction to accommodate facility needs. Additions to the existing building will be required as indicated below.

Town Hall

- Senior Center on upper two floors.
- Use of meeting room by boards and commissions.
- Police Department lower level.
- An addition is required for a stair and elevator.
- A storage building required in the parking lot to accommodate large evidence items.

Town Hall Annex

- Single story addition to allow building to be used by all town administrative functions.
- Second floor unused.
- Barn restored and integrated into design.

Library

- Single story addition on east side to expand library space.
- Floor raised up in existing rear wing to allow for library to be on one level.

Public Safety

- Building modified and expanded for Fire and Ambulance use.
- Police relocated to Town Hall.

Highway Garage

- Building expanded for storage and vehicle wash bay.

Salt Sheds

- Wood building modified to contain salt mixture and building repaired.

Option #2

This option includes the most new construction to accommodate facility needs. Additions to the existing building will be required as indicated below.

Town Hall

Senior Center upper two floors.
Use of meeting room by boards and commissions.
Lower level vacant.
An addition is required for a stair and elevator.

Town Hall Annex

Rear of building demolished.
Two story addition to allow building to be used by all town hall functions.

Library

Single story addition on east side to expand library space.
Floor raised up in existing rear wing to allow for library to be on one level.

Public Safety

Building modified and expanded for Fire and Ambulance use.
Police relocated to New Building.

Highway Garage

Building expanded for storage and vehicle wash bay.

Salt Sheds

Wood building modified to contain salt mixture and building repaired.

Option #3

In this option the buildings remain as-is and improvements are made to the buildings to resolve items listed in the building assessments. This is often referred to as the "Do Nothing" option as it does not resolve program deficiencies.

* * *

Existing Buildings:	Priority 1	Priority 2	Priority 3	Priority 4	TOTALS
Town Hall	$ 7,216	$ 1,886,104	$ 2,073,862	$ 517,531	$ 4,484,713
Cumulative Total		$ 1,893,320	$ 3,967,182	$ 4,484,713	
Town Hall Annex	$ 243,087	$ 24,846	$ 1,114,387	$ 6,465	$ 1,388,785
Cumulative Total		$ 267,933	$ 1,382,320	$ 1,388,785	
Library		$ 180,795	$ 835,723	$ 33,994	$ 1,050,512
Cumulative Total		$ 180,795	$ 1,016,518	$ 1,050,512	
Highway Garage		$ 302,298	$ 52,979	$ 278,182	$ 633,459
Cumulative Total		$ 302,298	$ 355,277	$ 633,459	
Salt Shed		$ 128,537	$ 31,208		$ 159,745
Cumulative Total		$ 128,537	$ 159,745	$ 159,745	
Public Safety		$ 185,002	$ 712,221	$ 451,142	$ 1,348,365
Cumulative Total		$ 185,002	$ 897,223	$ 1,348,365	
Overall Cumulative Totals	$ 243,087	$ 879,563	$ 2,913,860	$ 3,232,501	$ 9,065,579

BUILDING USE AUDIT
Town of Brimfield, Massachusetts

COST SUMMARY

The following is a summary of the costs associated with each building, both repairs and additions, and, where applicable, for new construction.

The Building Repairs are a total of all items listed in the building assessments. A separate chart is provided to show the costs associated to each of the priorities for each building. It is important to note that the Building Repairs have been priced as though each item was a separate project and as such the costs are inflated over what they would be if part of a large project. Please refer to "Use of Cost Estimate Information" included in Section 10 for more detail.

Town Hall

Building Repairs:	$ 4,484,713
New Entrance, Elevator and Stair:	$ 1,101,993
Renovations for Police and Council on Aging:	$ 4,950,392
Renovations for Council on Aging only:	$ 3,367,584

Town Hall Annex

Building Repairs:	$ 1,388,785
New Single Story Addition:	$ 4,097,709
OR	
New Two Story Addition:	$ 5,883,732

Library

Building Repairs:	$ 1,050,512
New Addition:	$ 2,147,612

Highway Department

Building Repairs:	$ 633,459
New Addition:	$ 1,648,187
Salt Shed Repairs:	$ 159,745

Public Safety Building

Building Repairs:	$ 1,348,365
New Addition:	$ 3,594,340
New Police Building (in lieu of Town Hall Location):	$ 3,196,769

New Building on New Site (to be selected)

Combined Town Hall, Senior Center and Police Station $ 8,346,166
(Does not include cost of land or sale of current buildings)

For comparison note the following:

Town Hall Annex Renovations and Expansion:	$ 4,097,709
Stair & Elevator addition to Town Hall:	$ 1,101,993
Senior Center and Police in Town Hall:	$ 4,950,392
Total:	$10,150,094

Town Hall Annex Renovations and Expansion:	$ 4,097,709
Stair & Elevator addition to Town Hall:	$ 1,101,993
Senior Center Town Hall:	$ 3,367,584
New Police Building:	$ 3,196,769
Total:	$11,764,055

Code Implications for Repairs and Renovations to the Existing Buildings

The International Existing Building (IEBC) applied to the town's buildings and architectural recommendations addresses the requirements for the repair, alteration, change of occupancy, and additions to the studied buildings. The following is intended as a very basic guide only and before any work is undertaken the specific codes should be examined.

The studied town buildings have been previously, or are occupied and are therefore required to comply with the IEBC.

There are three compliance methods for these buildings:

1. **Prescriptive Compliance Method:**
   Previously known as Chapter 34 of the International Building Code (IBC) these provisions prescribe specific minimum requirements for the construction work. Routine maintenance and repairs (that would not require permits) do not fit under these requirements.

2. **Work Area Compliance Method:**
   These provisions are based on a proportional approach to compliance where upgrades are triggered by the type and extent of the work. There are three levels of alterations defined as follows:

   Alteration-Level 1:
   Includes the removal, replacement or covering of existing materials, elements, equipment or fixtures using items to serve the same purpose.

   Alteration-Level 2:
   Includes the reconfiguration of space, the elimination or addition of any door or window, the reconfiguration or extension of any system, or the installation of any additional equipment.

   Alteration-Level 3:
   This applies when the work area exceeds 50 percent of the aggregate area of the building.

3. **Performance Compliance Method:**
   This method provides for evaluating the building based on fire safety, means of egress and general safety. Using values for various building components a summary sheet is completed to show whether or not the work complies with this

section. There are mandatory scores required for fire safety, means of egress and general safety in order for the work to be acceptable.

Although part of the compliance methods, there are factors that need to be considered. Pertinent sections are described below.

Seismic Improvements:
In any of the above cases it will need to be determined if seismic improvements are necessary to the structure of the facility. This evaluation would be performed by a licensed structural engineer.

Unsafe Buildings:
Buildings that are unsafe are required to be taken down, removed or made safe. The Building Official needs to make this determination.

Historic Buildings:
Buildings may be exempted from items of compliance due to accreditation as a historic structure, but only when the lack of compliance will not constitute a distinct life safety hazard.

Fire Sprinkler Requirements (Alteration Level-2):
The addition of a sprinkler system to a building is often desired, particularly for historic structures. We include this paragraph as a guide to the requirements.
For the town occupancies with exits or corridors serving an occupant load greater than 30, fire sprinklers are required where the following occur:

- The work area exceeds 50 percent of the floor area.
- The building has sufficient municipal water supply for the fire sprinkler system without the installation of a new fire pump.

* * *

BUILDING USE AUDIT
Town of Brimfield, Massachusetts

THE NEED FOR SWING SPACE

The sequence of the renovations or additions to the Town's building must consider how continuous operations of the Town functions can be maintained during the work. The Town Hall is the only building that is not occupied, except for the offices of the Town Clerk, and therefore would be the best candidate as swing space for office functions.

Town functions could be located temporarily in Town Hall during construction work at the Town Hall Annex, but would require that either the Police Department or Senior Center renovations at Town Hall be delayed until the Annex is complete.

The addition to the Highway Garage would provide temporary vehicle bays for the Fire Department or Ambulance to allow a phased renovation of the Public Safety Building. Similarly, the new addition to the Highway Department would provide some swing space for the Highway Department renovations. A detailed phasing plan is necessary and consideration should be given to a temporary office space to reduce the time of the renovations.

In the renovated Town Hall option, the Police Department relocation is only dependant on vacated space in the Town Hall. This is the same for the Senior Center.

For the Library, the addition and renovations to the existing rear addition should be completed first to provide swing space during renovations to the original building. The wall between the original building and the additions should be made dust tight. A temporary storage trailer should be provided to house some of the collection during the renovations.

PRIORITIES & KEY	
1 or 1A	Current Critical
2	Potentially Critical
3	Necessary-Not yet Critical
4	Recommended
G	Grandfathered
Grouping: Items that can be bid as a package.	
Sub-Priority: Importance within the Priority Category	
Cost: Cost of the work	

CAPITAL IMPROVEMENTS TOWN BRIMFIELD MA JULY 24, 2013

		HIGHWAY DEPARTMENT				LIBRARY				PUBLIC SAFETY HEADQUARTERS				TOWN HALL				TOWN HALL ANNEX			
		Cost	Proposed Year of Work	Sub-Priority	Grouping	Cost	Proposed Year of Work	Sub-Priority	Grouping	Cost	Proposed Year of Work	Sub-Priority	Grouping	Cost	Proposed Year of Work	Sub-Priority	Grouping	Cost	Proposed Year of Work	Sub-Priority	Grouping
LIFE SAFETY	Add Exhaust Collection System	$75,460								$57,097											
	Replace Exit Signs with LED	$10,616								$10,707				$14,963							
	Upgrade Fire Alarm System					$20,788															
	Add Fire Alarm System									$45,032											
	Add Handrails/ Guardrails													$67,344							
	Replace Handrails/ Guardrails	$34,450				$6,144								$115,888				$998			
	Add Sprinkler System													$238,211							
	Install Warning Signs																	$3,172			
	Reinforce Framing																	$92,177			
	Reinforce Floor Structure																	$49,556			
	Construct New Foundation																	$90,674			
	Reconstruct Walls																	$92,517			
	Reinforce Roof Structure																	$10,340			
	Install Energizing Ventilation Equipment	$113,043																			
	Construct New Landing													$34,640							
	Resecure Railing					$1,335															
	Replace Stair/ Steps	$52,187												$11,579							
	Add Exit Doors	$15,854																			
	Install Toxic Gas Alarm System	$11,304																			
	Add Emergency Lighting																	$21,095			
HEALTH	Replace Well Pump and Add Filtration									$71,512											
	Add Under-floor Drainage System													$935,133							
ADA	Correct Door Hardware	$28,803								$38,916				$84,519							
	Correct Door Size	$5,073				$758								$74,595							
	Correct Door Side Clearance	$5,073				$10,595				$28,418				$10,595							
	Replace Counter	$4,857																			
	Replace Guardrail/ Handrail																				
	Kitchen Modifications					$2,812				$6,625											
	Correct Toilet Room					$71,390				$7,105											
	Replace Circ. Desk					$28,083															
	Correct Partitions													$22,368							
	Add Toilet													$31,898							
	Reorganize Furniture					$9,871															
	Replace Signage					$2,006															
SITE	Add Sidewalk					$6,193															
	Regrade Lawn													$13,333							
	Replace Ramp																	$101,032			
	Reconstruct Entrance																	$10,117			
	Rework Site Drainage, Repair and Clean Walls									$17,674								$68,790			
	Add Drains													$266,461							
EXTERIOR	Replace Lighting Fixtures (with high efficiency LED)	$20,621								$21,095											
	Replace Siding/ Trim	31,208								$107,229								$11,678			
	Replace Wall Brace	1,947																			
	New Roofing	$120,813																			
	Replace Aprons									$19,863											
	Repointing Masonry					$14,014				$35,580											
	Replace Shingles					$25,026															
	Replace Gutter					$8,078															
	Repair Stucco					$39,793															
	Replace/Repair Door					$3,132								$2,421							
	Repair Roof/ Roof Modifications					$85,193								$15,301				$29,473			
	Repair/ Create Joint									$5,052											
	Repointing of Brick/ CMU																				
	Repaint Walls									$4,941				$11,835				$52,263			
	Replace Brick									$15,977				$12,227							
	Replace Pipe													$3,286							
	Repointing Foundation													$34,412				$1,576			
	Repair Stairs													$3,316							
	Add Drains																				
	Add Storm Panels													$8,494							
	Repair Gutter									$7,003				$1,635							
	Correct Siding													$7,674							
	Repoint Chimneys													$15,214				$5,743			
	Repair Finials													$3,663							
	Replace PVC Rainleaders													$7,181							
	Reset Stone																	$8,080			
	Repair Window Shutters																	$34,432			
	Remove Steps																	$8,562			
	Address Rotting Material					$19,455												$1,503			
	Remove Fire Escape																	$8,895			
	Replace Hose Dryer									$66,538											
INTERIORS	Replace VCT Flooring	$13,971				$1,299															
	Replace Ceiling Tiles	$104,361								$324,281											
	Repair/ Repaint Ceiling					$51,259								$67,798				$1,069			
	Replace Sash Cords at Window					$1,308															
	Replace Door									$4,274											
	Replace Damaged Floors									$27,977											
	Install New Closers on Doors									$38,730											
	Replace Windows									$15,540											
	Add Exhaust Fan									$5,443											
	Repaint Spaces													$15,117							
	Repoint Walls													$16,890							
	Repair Walls													$20,458							
	Add Moisture Resistant Sheetrock													$9,811							
	Relocate Oil Tank													$3,143							
	Add Storm Panels													$13,182							
	Replace Door Thresholds													$590							
	Install Handrails													$4,674							
	Refinish Floors and Stairs													$5,987							
	Fire Stopping													$12,223							
	Seal Walls to Floor	$5,777												$2,310							
	Remove Vestibule																	$2,753			
	Address Uneven Floor													$56,854				$140,555			
	Reinforce Framing/ Struc. Review. Req.																				
	Add Air Intake and Exhaust																				
	Replace Threshold																	$642			
ENERGY & WATER CONSERVATION	Replace Drain/ Piping	$35,175								$45,891											
	Update Equipment from Oil to Gas	$61,374								$58,325				$58,325				$58,325			
	Update Thermostat	$8,215								$12,263				$16,310				$12,263			
	Upgrade Electrical Service					$45,357															
	Install Air Conditioning					$67,414															
	Install Central Air System	$27,951																			
	Replace/ Install Transfer Switch	$73,160								$11,053				$73,160							
	Upgrade Fixtures to Low Flow	$6,514				$6,465												$6,465			
	Add Water Piping					$8,481															
	Reconfigure Duct Work									$72,544				$5,052							
	Replace Oil Fired Boiler					$88,498															
	Replace Furnace					$217,822															
	Replace Electric Heaters with Warm Air Furnace									$151,969											
	Add Jacketing to Furnaces													$8,596							
	Add Ventilation					$173,300								$8,115							
	Upgrade Lighting					$27,529								$409,028				$222,453			
	Replace Well Pump and Expansion Tank													$21,018							
	Install Mixing Valve	$9,216																			
	Replace Electric Water Heater									$14,980				$5,763							
	Replace Laundry Tub	$9,173												$9,173							
	Point of Use Water Heaters					$6,969															
	Replace Water Closets	$6,514												$25,711							
	New Boiler/ Radiation													$1,507,839							
	Add Attic Insulation and Ventilation													$9,845							
	Replace Sink Faucet									$654											
	Add Air Intake & Exhaust									$14,054											
	Add Insulation													$21,377							
HAZARDOUS	Replace Vinyl Asbestos Tile													$8,554							
	Remove Bat/Bird Droppings													$7,216							

PRIORITIES & KEY	
1 or 1A	Current Critical
2	Potentially Critical
3	Necessary-Not yet Critical
4	Recommended
G	Grandfathered
Grouping: Items that can be bid as a package.	
Sub-Priority: Importance within the Priority Category	
Cost: Cost of the work	
TOTALS:	

	Add Exhaust Collection System	LIFE SAFETY
	Replace Exit Signs with LED	
	Upgrade Fire Alarm System	
	Add Fire Alarm System	
	Add Handrails/ Guardrails	
	Replace Handrails/ Guardrails	
	Add Sprinkler System	
	Install Warning Signs	
	Reinforce Framing	
	Reinforce Floor Structure	
	Construct New Foundation	
	Reconstruct Walls	
	Reinforce Roof Structure	
	Install Energizing Ventilation Equipment	
	Construct New Landing	
	Resecure Railing	
	Replace Stair/ Steps	
	Add Exit Doors	
	Install Toxic Gas Alarm System	
	Add Emergency Lighting	
	Replace Well Pump and Add Filtration	HEALTH
	Add Under-floor Drainage System	
	0	
	Correct Door Hardware	ADA
	Correct Door Size	
	Correct Door Side Clearance	
	Replace Counter	
	Replace Guardrail/ Handrail	
	Kitchen Modifications	
	Correct Toilet Room	
	Replace Circ. Desk	
	Correct Partitions	
	Add Toilet	
	Reorganize Furniture	
	Replace Signage	
	Add Sidewalk	SITE
	Regrade Lawn	
	Replace Ramp	
	Reconstruct Entrance	
	Rework Site Drainage, Repair and Clean Walls	
	Add Drains	
	0	
	Replace Lighting Fixtures (with high efficiency LED)	EXTERIOR
	Replace Siding/ Trim	
	Replace Wall Brace	
	New Roofing	
	Replace Aprons	
	Repointing Masonry	
	Replace Shingles	
	Replace Gutter	
	Repair Stucco	
	Replace/Repair Door	
	Repair Roof/ Roof Modifications	
	Repair/ Create Joint	
	Repointing of Brick/ CMU	
	Repaint Walls	
	Replace Brick	
	Replace Pipe	
	Repointing Foundation	
	Repair Stairs	
	Add Drains	
	Add Storm Panels	
	Repair Gutter	
	Correct Siding	
	Repoint Chimneys	
	Repair Finials	
	Replace PVC Rainleaders	
	Reset Stone	
	Repair Window Shutters	
	Remove Steps	
	Address Rotting Material	
	Remove Fire Escape	
	Replace Hose Dryer	
	Replace VCT Flooring	INTERIORS
	Replace Ceiling Tiles	
	Repair/ Repaint Ceiling	
	Replace Sash Cords at Window	
	Replace Door	
	Replace Door	
	Install New Closers on Doors	
	Replace Windows	
	Add Exhaust Fan	
	Repaint Spaces	
	Repoint Walls	
	Repair Walls	
	Add Moisture Resistant Sheetrock	
	Relocate Oil Tank	
	Add Storm Panels	
	Replace Door Thresholds	
	Install Handrails	
	Refinish Floors and Stairs	
	Fire Stopping	
	Refinish Floors and Stairs	
	Remove Vestibule	
	Address Uneven Floor	
	Reinforce Framing/ Struc. Review. Req.	
	Add Air Intake and Exhaust	
	Replace Threshold	
	Replace Drain/ Piping	ENERGY & WATER CONSERVATION
	Update Equipment from Oil to Gas	
	Update Thermostat	
	Upgrade Electrical Service	
	Install Air Conditioning	
	Install Central Air System	
	Replace/ Install Transfer Switch	
	Upgrade Fixtures to Low Flow	
	Add Water Piping	
	Reconfigure Duct Work	
	Replace Oil Fired Boiler	
	Replace Furnace	
	Replace Electric Heaters with Warm Air Furnace	
	Add Jacketing to Furnaces	
	Add Ventilation	
	Upgrade Lighting	
	Replace Well Pump and Expansion Tank	
	Install Mixing Valve	
	Replace Electric Water Heater	
	Replace Laundry Tub	
	Point of Use Water Heaters	
	Replace Water Closets	
	New Boiler/ Radiation	
	Point of Use Water Heaters	
	Replace Water Closets	
	Point of Use Water Heaters	
	Add Insulation	
	Replace Vinyl Asbestos Tile	HAZARDOUS
	Remove Bat/Bird Droppings	

BUILDING USE AUDIT - CONDITION ASSESSMENT
Town of Brimfield, Massachusetts

Brimfield Town Hall

21 Main Street

Year Constructed:	1878
Construction Type:	IV
Fire Sprinklers:	No
Building Area per Floor:	
Ground:	3172 SF
First Floor:	3570 SF
Second Floor:	576 SF
Total Area:	7318 SF

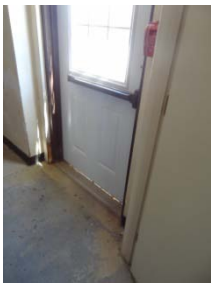
Documents Used in Study:
- Assessor's Field Card
- Aerial Photograph

General:

There are a number of main challenges that need to be overcome to fully utilize the building. First is handicapped accessibility to the second floor. The current lift only provides access to the first floor. The fire escape at the rear of the building is also not a safe method of exiting the building. It is recommended that a new entrance with a stair and elevator be added to the rear of the building to serve all floors.

The basement area is damp and also faced with wood paneling creating an unhealthy and dangerous (respectively) environment. It is recommended that the wood faced partitions and wood floor be removed, and a new floor constructed with under drains and new sheetrock faced partitions be constructed.

Ground Floor



3 Accessible entrance door is located on the south-east corner of the structure. Interior approach clearance on push side of door does not meet code. Add a push button operator to the door. (exterior & interior). (Not required if new entrance constructed).

2 Town Hall Annex parking lot drains towards Town Hall. Re-grade lawn area to provide a low spot at least 8 feet from Town Hall for the length of the west wall, with a gravel filled trench with a perforated drain running to the catch basin.

2 On the exterior of the building there are two copper rain-leaders that are broken, that connect to plastic pipes at grade. Replace plastic pipe and clean-outs and provide a sleeve that will allow expansion of copper.

2 Brick and stone foundation needs re-pointing at grade. (allow 20% of perimeter).

3 Repair steps and isolate from foundation wall of building to prevent future cracking.

2 Foundation walls allow moisture into the building. Excavate adjacent to building down to bottom of foundation walls. Provide a continuous perforated drain around building. Drain will probably need to be connected to a pumping station with the discharge at the higher catch basins. If foundations are irregular apply gunite to smooth out surface. Apply damproofing over gunite with a drainage stone extending from grade to drain wrapped in filter fabric. Back-fill area. Patch paving where disturbed.

2 It appears that the foundation walls are the primary source of moisture but if this proves not to be the case then the following action will be necessary:

Remove wood flooring and concrete slab. Provide an under-floor drainage system connected to the pumping station described for the foundation drains.

Provide a minimum 6 inch thick stone base and place new concrete slab at a single level throughout basement. Slab needs to include insulation below and a vapor barrier.

2 Wood faced partitions are not code compliant and need to be removed. Demolish interior wood faced partitions in basement and construct new partitions that are faced with moisture resistant sheetrock.

3 Foundation wall needs to be insulated. After drainage system is installed and wall has dried out apply sheetrock faced metal studs and insulation over perimeter walls. this will cover all exterior wall plaster failures.

3 Remove loose paint from exposed pipes below ceiling in the lift and ramp area and repaint.

3 Add storm panels to (14) existing single pane wood windows (double hung / fixed) including some with metal bars (interior). This approach will be considerably less than replacement of the windows with historically accurate windows.

2 In Mechanical #1 patch openings and repair damaged areas to gypsum board ceiling and seal all duct penetrations in ceiling.

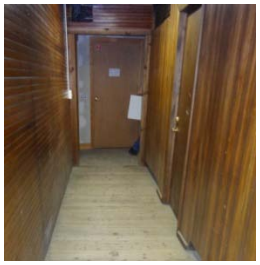
2 In Mechanical #1 the exterior stone foundation wall and the first 2 course of brick are deteriorating due to water infiltration. These walls show numerous repairs made over the years. This area of the room has a sump pump in the floor slab and at the time of the inspection there was water on the floor. Replace damaged brick and re-point existing brick chimney for the first 4' above the slab.

2 In Mechanical #2 patch openings and repair damaged areas to gypsum board ceiling and seal all wall penetrations with fire caulk.

2 In Mechanical #2 the exterior stone foundation wall and the first 2 course of brick are deteriorating due to water infiltration. Re-point upper part of interior face of wall.

3 Exterior wall next to lift is damaged. Repair wall and paint to match existing.

3 Seal all pipe and duct wall penetrations throughout Ground Floor. This includes fire caulking at rated partitions. (Corridors, Boiler Room, etc.)



3 More than half of the 17 interior doors do not meet the minimum width required by ADA. Enlarge door openings as require and install new door and hardware.

3 All interior doors are not equipped with lever hardware except for Elevator Lift door. Replace hardware to meet code on existing doors to remain.

2 Walls and ceilings in Toilet Rooms #1 & #2 have water damage and stains. Following successful repairs to exterior walls remove deteriorated plaster, add furrings to wall and new moisture resistant sheetrock over a vapor barrier. Paint walls and re-install toilet room accessories and fixture.

2 Unprotected step down from elevated wood floor in Corridor #2 to area in front of Unassigned #7 Room. Also, the wood ramp from Corridor #2 to Corridor #3 appears to have a slope greater than 1in12 and has no handrails. Door to Mechanical #1 from Corridor #3 is blocked by the ramp. Add new wood floor construction to resolve transitions between areas and to replace ramp.

2 Chase wall exposed by opening in wall by ramp. Infill opening from floor to ceiling.

2 Brick / concrete steps and metal pipe handrail to exterior door in Corridor #3 are not to code. Remove and replace with larger platform and steps that will also provide space around column at bottom of stairs. (See next item).

2 Clearance between bottom of stairs, column and steps to exterior is too narrow. Create new landing flush with sill of exterior door and aligned with tread of stair. Landing to have steps down to floor with handrails.

2 There is a existing oil tank located in under the main egress stairs. This needs to be relocated out of the stair tower.

2 In both stairs up to the First Floor the existing riser/tread ratio and handrails do not meet code. the stairs also have projecting nosings. Retain existing stairs. Add new handrails. Infill area under nosings to meet ADA.

First Floor


3 All interior doors are not equipped with lever hardware . Replace hardware to meet code.

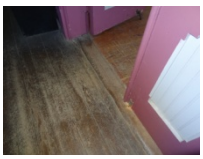
3 All exterior door hardware is old and out dated. Replace hardware to meet ADA and add closers to doors.

4 Several locations in the Meeting Room have water stains on the wall or at the intersection of the wall & ceiling. it is assumed that these are from previous water leaks and that repairs have been made. Repaint stained areas with stain blocker and topcoats to match existing.

4 The existing curtain for the stage appears to be in poor condition. The majority of the curtain is in the attic where the pully system, for raising and lowering the curtain, is located. At this time restoration has not been included, but it is recommended that the curtain be removed and the remaining ceiling opening be covered with sheetrock as it is open to the attic.

3 Add interior storm panels to (15) existing single pane wood windows (double hung / fixed) and replace broken panes of glass.

3 There are minor splits in the panels and slightly open joints in the rails of the exterior doors in the Meeting Room. Fill splits and open joints and repaint doors.

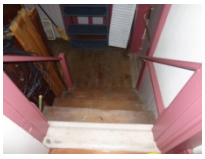


3 Thresholds are too high. Remove and replace existing wood thresholds at both interior double doors from the Meeting Room.

3 Install new handrails at both stairs up to the Stage in the Meeting Room.

3 Repair wall and ceiling damage (cracks) in Storage #3 .

2 Replace existing wood handrail in both Storage #2 and #3 with new to meet code.



3 Repair wall (water stains) and ceiling damage (cracks) in Town Clerk #1 .

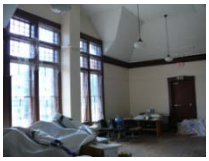

3 Repair wall (water stains) and ceiling damage (cracks) in Lobby.

2 The handrails and guardrails on the egress stair located in the Lobby do not meet code and require replacement. Also the tread/riser ratio is not to code but is grandfathered.

3 Sand and refinish wood floors and stairs. Remove and replace non-slip adhesive strips on stairs.

3 This floor is handicapped accessible, but has no accessible toilet. Install a new handicapped accessible toilet.

Second Floor



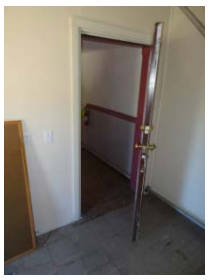
3 Add interior storm panels to (5) existing single pane wood windows (double hung / fixed) and replace broken panes of glass.

4 Ceilings in the Meeting Room, Stair and Attic access all have water stains and damage/patches. Repair as required and re-paint.

3 Sand and refinish wood floors and stairs. Remove and replace non-slip adhesive strips on stairs.

3 The stair handrails and the projecting nosings do not meet ADA. Add new handrails and add tapered wood under nosings.

2 Replace vinyl asbestos tile in attic access space.



The following are items noted in the review of the building that will be addressed if the new layout for the second floor is implemented:

4 This floor is not handicapped accessible. Add an elevator to serve all levels and remove lift. In addition add a new egress stair.

Attic

3 Insulate attic floor with blown-in insulation. Add attic ventilation.

1 Remove bird/bat droppings from belfry. Seal up openings to prevent future bird/bat access.

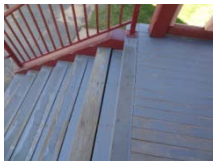
Exterior

2 Re-attach gutter on the east side of building.

3 PVC rainleaders are broken. Replace damage sections. Replace damaged Brick.

2 At front stairs, retain existing 24" high railing and add a new 42" high guardrail on the landing side of the railing.

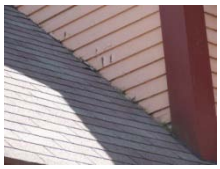
2 Secure lose metal handrails (3) at front entrance stairs.



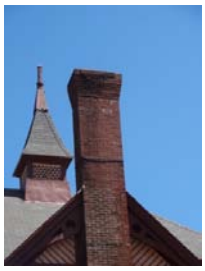
3 Sand and refinish wood front entrance stair. Remove non-slip strips, re-paint and apply new strips.

3 Paint is peeling around entire structure. (siding, trim, window/door trim, fascia boards & porch) Scrape and repaint areas where peeling paint occurs(approximately 5%)

3 At front porch roof to wall intersection, cut wood siding back 1" from roof shingles. paint cut edges of siding. Verify existence of metal flashing. If none, install new.



3 Re-point (3) brick chimneys completely. Re-set stone chimney caps.



2 Replace missing boards from two finials and re-paint.

3 Replace flat roof area at second floor.

3 Insulate exterior walls with blown-in insulation on First and Second Floors.

Mechanical

3 Replace the steam boiler plant with a hot water circulating plant and provide new hot water radiation equipment in place of the steam radiators for better control and comfort.

4 Replace all oil fired equipment with gas fired equipment for decreased energy usage due to better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

3 Replace existing thermostats with programmable type.

3 Provide new oil supply lines with code approved jacketing/membrane to each of the furnaces since currently neither of these lines includes this.

3 Provide mechanical ventilation using an automatic louver/damper system to serve both of the furnaces serving the ground floor and the main meeting chamber.

2 Reconfigure the ductwork of the inline dehumidification unit to draw from and supply back to the supply main from the furnace this unit is serving. As currently configured, there is a good chance that the unit could be short-circuiting air across the furnace then back through the dehumidifier which may explain why the unit was overflowing and not operating at all. Additionally provide interlock wiring such that the unit only operates when the furnace fan is on and also to shut down the unit upon detection of moisture in the overflow drain pan.

Electrical

4 Upgrade the lighting throughout the building to more energy efficient types with better light distribution and quality.

2 Review the coverage of the exit and emergency lighting and provide additional fixtures where required. Replace the existing fixtures with new energy efficient LED types.

2 Provide a new emergency generator with an automatic transfer switch.

Plumbing

3 The well pump and the expansion tank for the pump should be replaced.

3 The electric water heater should be replaced.

4 The laundry tub should be replaced.

4 The water closets should be replaced with low flow fixtures.

Fire Protection.

2 The building does not have a sprinkler system. A system should be added to the building incorporating a storage tank and a generator or diesel powered fire pump. If the proposed plan incorporating the Police Department is implemented the generator for the Police can be designed to include the sprinkler system.

PROGRAM INFORMATION

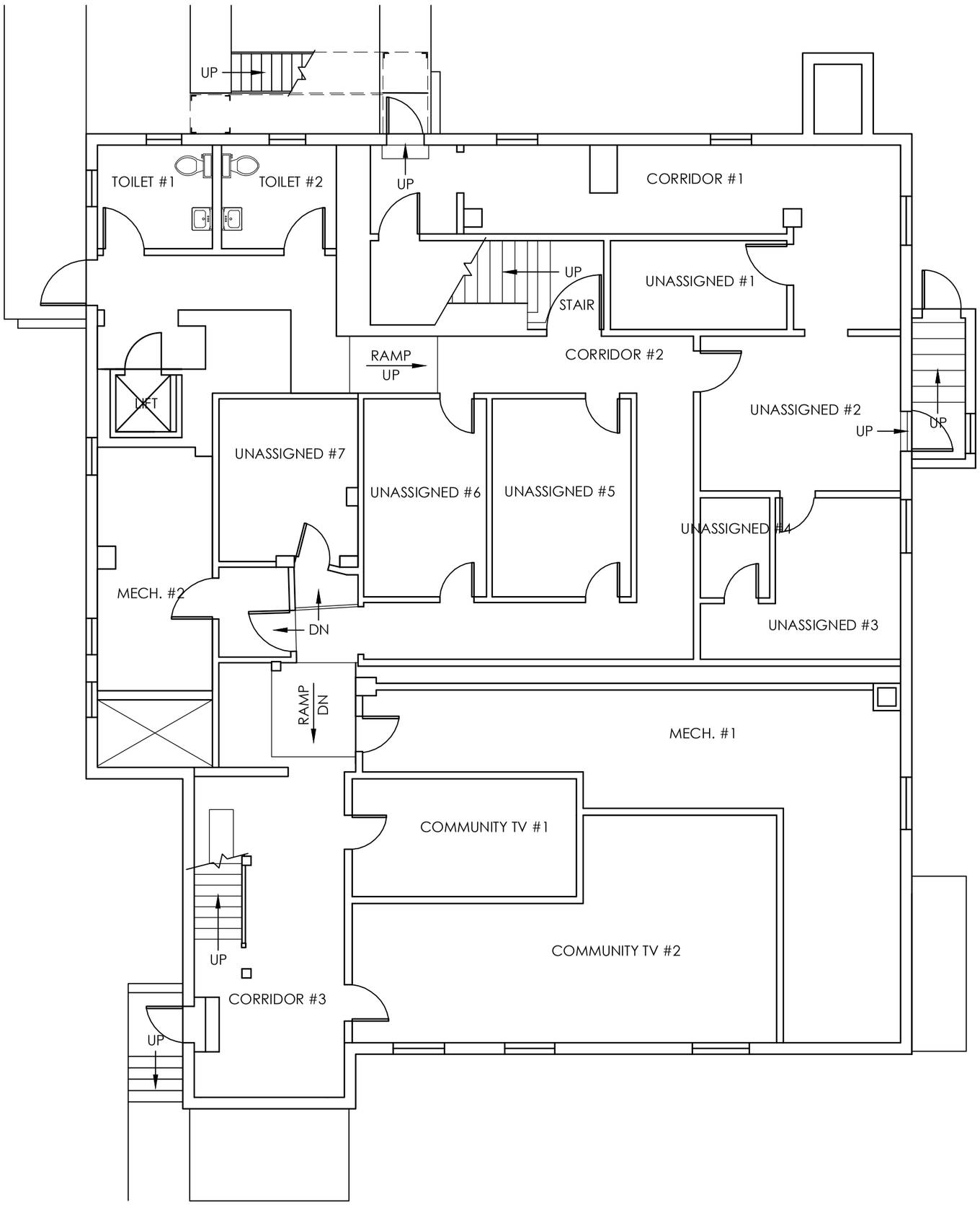
With the exception of the Town Clerks offices the building has no occupants. Some spaces in the basement are used by the Police Department for storage.

If all floors were made suitable for occupancy and accessibility the building could be efficiently utilized. Also have a fully used building will made energy use more efficient by not having to heat an unoccupied building.

Reviewing the needs of the Town the Senior Center appeared to be the best fit for the first and second floors, but also would maintain the historic character of the interior spaces. An elevator and egress stair would be added to serve all levels.

The previous occupant of the lower level was the Police Department but dampness is a problem for continued use of this space. With the moisture removed the space could be returned to serve the Police Department again. This use would need to be supplemented by a metal building for large evidence storage.

The test fit plan includes both the Senior Center and Police Department within the Town Hall building. A new entrance at the rear of the building will provide elevator and stair access to all levels from the parking lot.



GROUND FLOOR PLAN

5’ 0’ 10’ 20’

Page 11

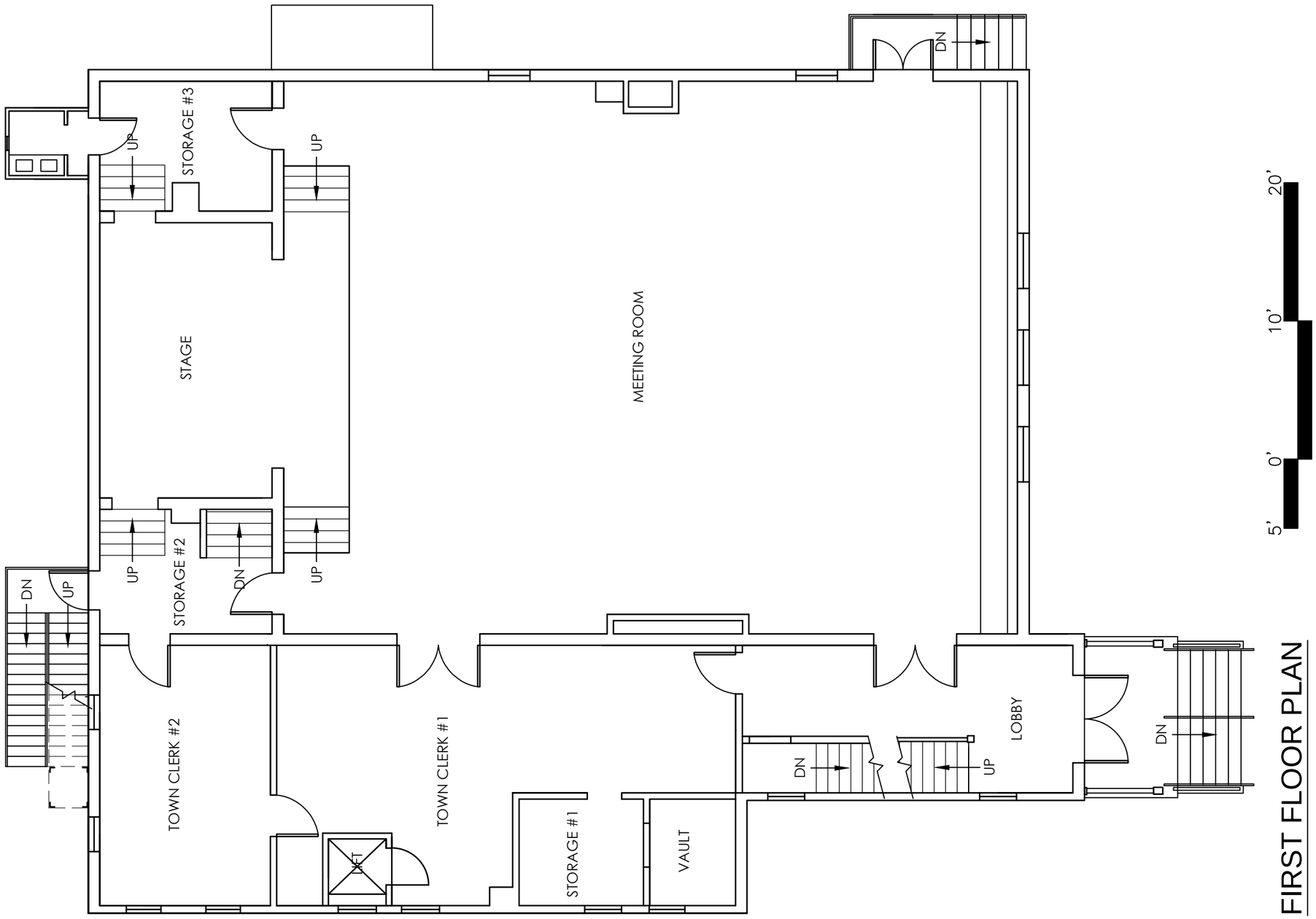
EX-TH1

Scale: 1/8"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 4/17/13

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING TOWN HALL FLOOR PLANS

D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451
Planning
Architecture
Interior Design
617-964-1700
617-964-1701 fax
info@draws.com



FIRST FLOOR PLAN

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

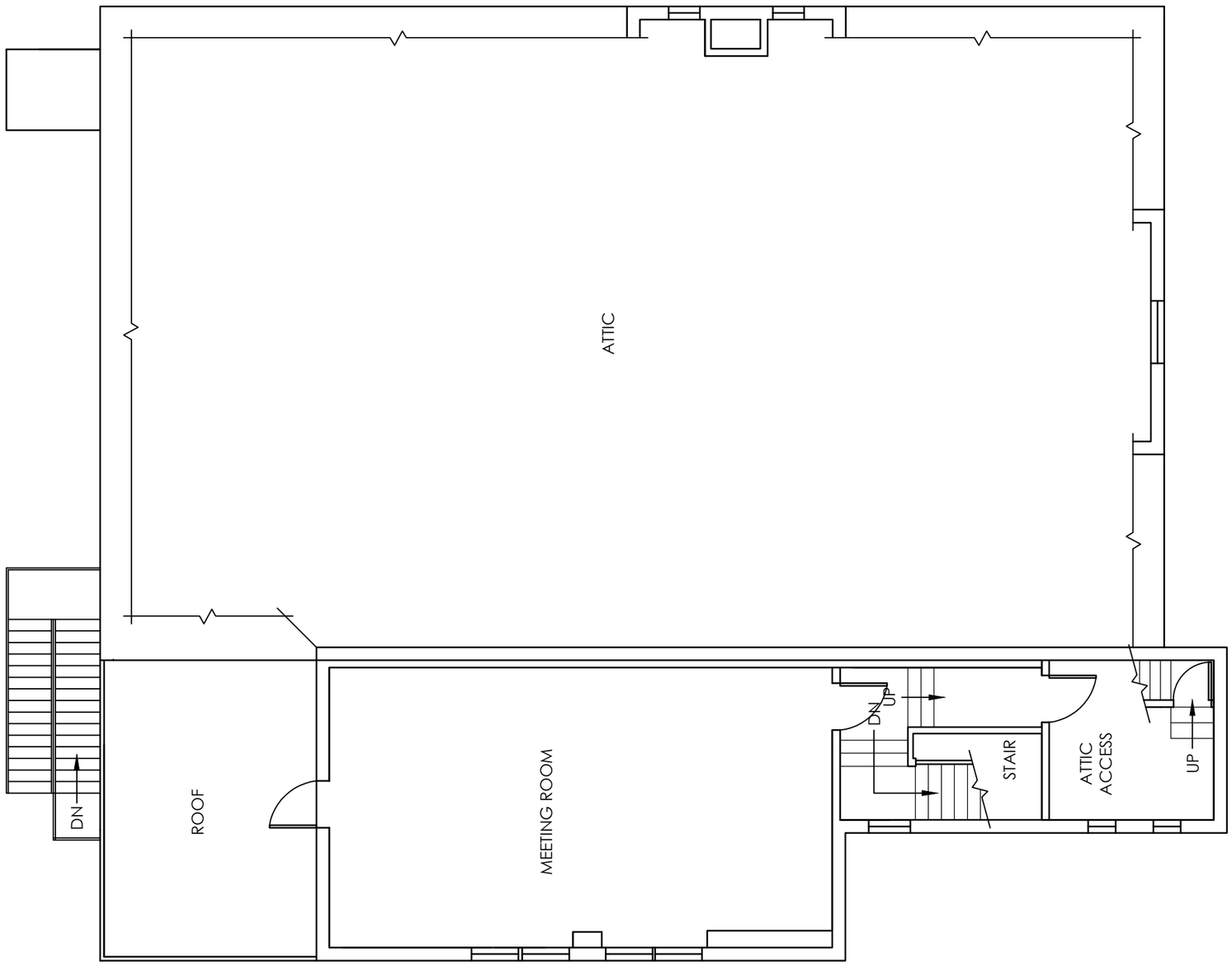
Planning	617-964-1700
Architecture	617-964-1701 fax
Interior Design	info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING TOWN HALL FLOOR PLANS

Scale:	1/8"=1'-0"
Drawn by:	AJ/CGH
Job No.	13002.00
Date:	4/17/13

EX-TH2



20’
10’
5’
0’

SECOND FLOOR PLAN

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

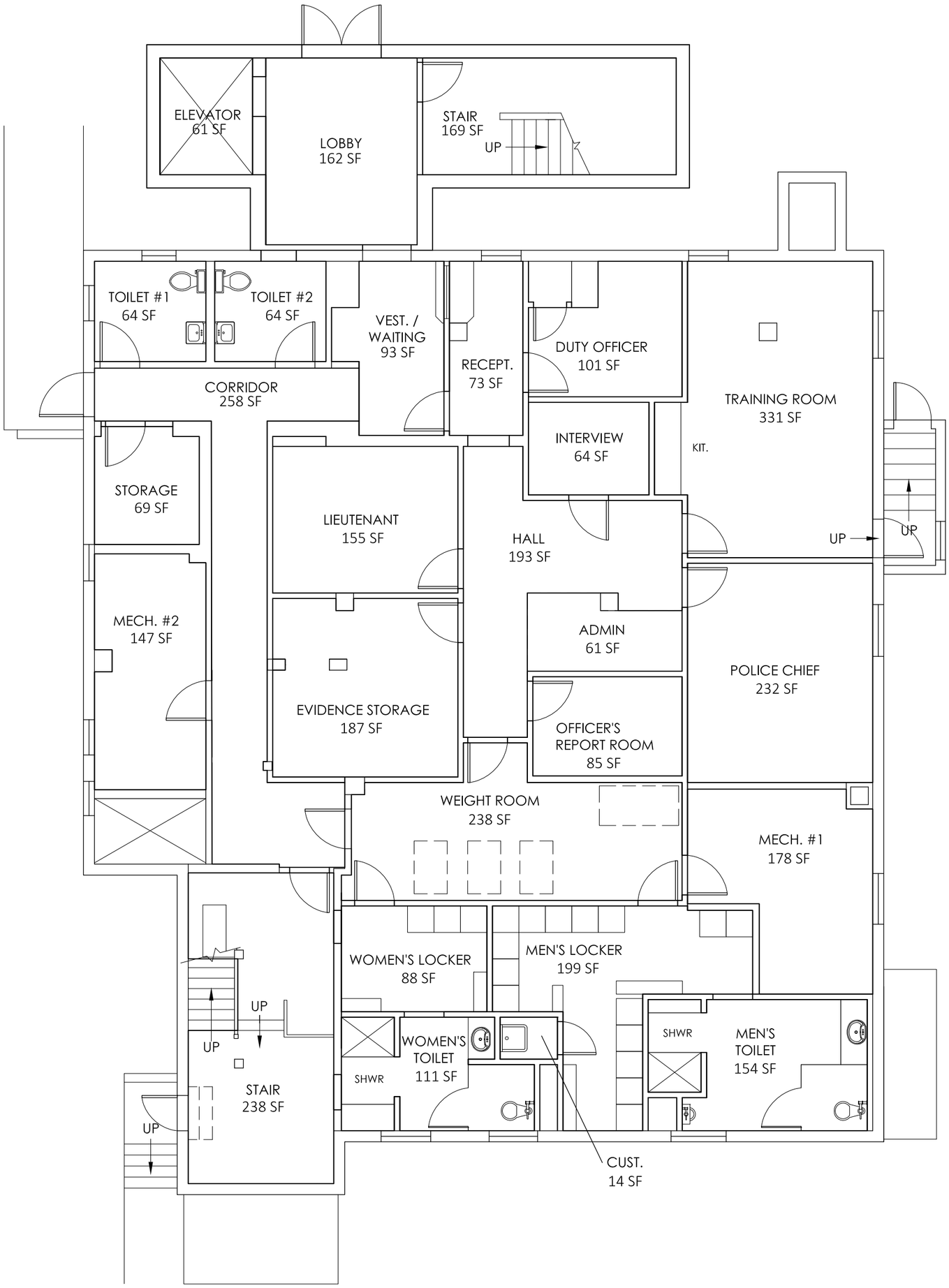
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING TOWN HALL FLOOR PLANS

Scale: 1/8"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 4/17/13

EX-TH3



GROUND FLOOR PLAN

5' 0' 10' 20'

PR-TH1

Scale: 1/8"=1'-0"
Drawn by: KCB
Job No. 13002.00
Date: 7-9-13

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN HALL GROUND FLOOR PLAN

D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
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Architecture
Interior Design
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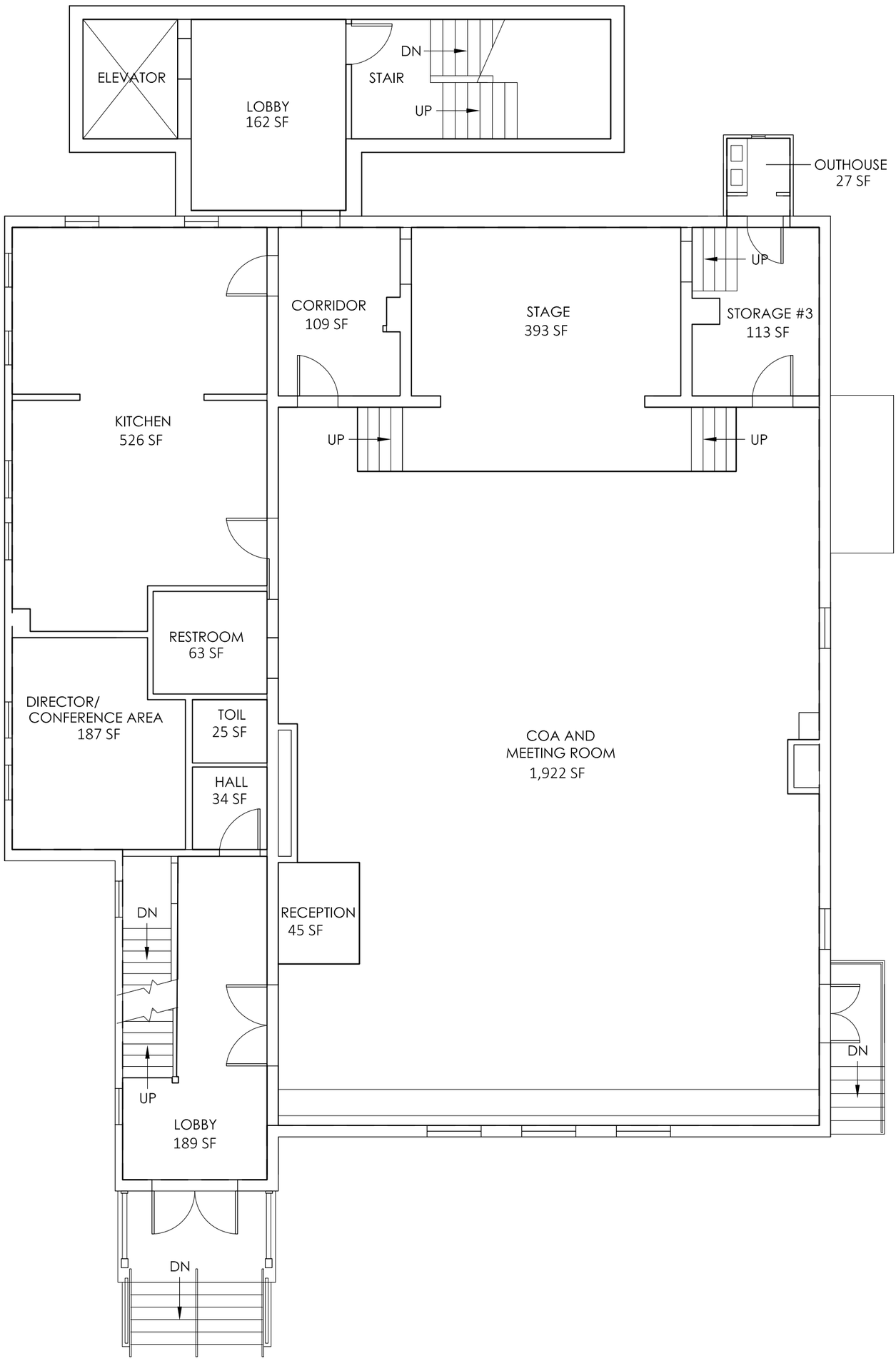
617-964-1701 fax
info@draws.com



FIRST FLOOR PLAN

PR-TH2

Scale: 1/8"=1'-0"
Drawn by: KCB
Job No. 13002.00
Date: 7-9-13

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN HALL FIRST FLOOR PLAN

D·R·A
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235 Bear Hill Road, 4th Floor
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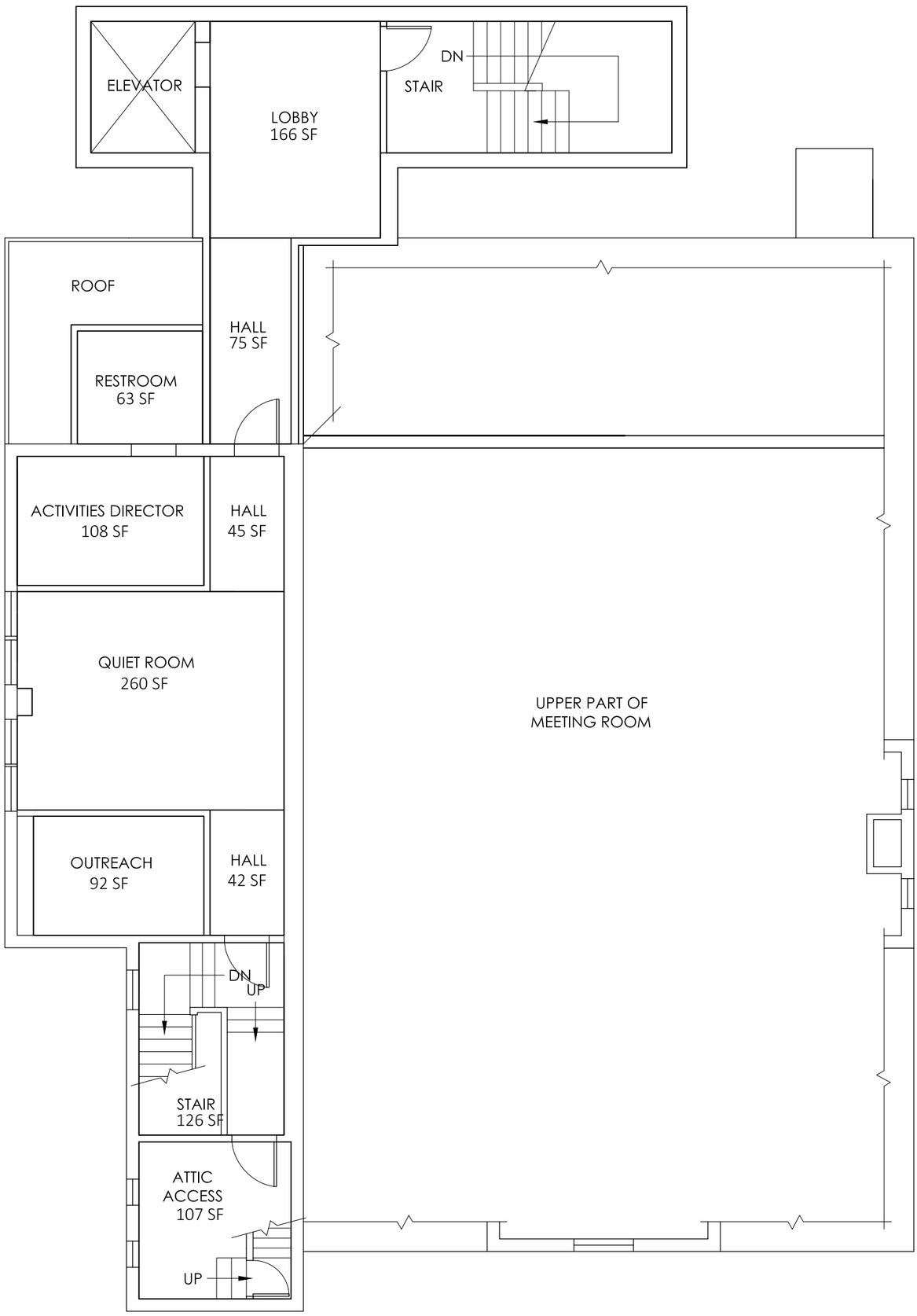

SECOND FLOOR PLAN

5' 0' 10' 20'

PR-TH3

Scale: 1/8"=1'-0"
Drawn by: KCB
Job No. 13002.00
Date: 7-9-13

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN HALL SECOND FLOOR PLAN

D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451
Planning
Architecture
Interior Design
617-964-1700
617-964-1701 fax
info@draws.com

Town Hall

Structural

Structural Description:

The Brimfield Town Hall is a two-story, wood framed structure (plus a walkout Ground Floor level), located at 23 Main Street in Brimfield. The building was constructed in 1878 and is listed on the National Register of Historic Places.

The Town Hall is rectangular (nearly square) in plan. Program elements at the Ground Floor include Town Offices, Police Offices, the Public Access Television Station, Bathrooms and Storage. The Ground Floor level is serviced by stairways at the back (south) side and at the northeast corner (at the front entry), and by a LULA elevator at the southeast corner of the building. The Selectman's Office and Town Clerk are located at the First Floor. The two-story Hall/Meeting Room and (elevated) Stage occupy the western two-thirds of this level. A partial Second Floor was constructed along the eastern one-third building, adjacent to the upper Hall. The Planning Center and the Cable Board Office are located at this level, between a flat roof section in the back of the building and the front entry stairway (this level currently get little or no use). Roof forms consist of hips and gables; an entry tower accents the front, northeast corner of the building.

Typical foundation walls are rubble stone with brick masonry upper sections. Ground Floor construction is a concrete slab on grade (thickness unknown); a wood floor (with shallow ramps) was constructed over the southern half of the Ground Floor, reportedly to address water issues. Floor and roof construction was mostly obscured by finishes; no exploratory demolition was conducted to determine floor and roof construction framing sizes/details. First and Second Floor construction is wood framed (2x10 joists observed in several locations) supported by timber beams (6x10 and 10x10 beams observed) and interior brick masonry bearing walls (8" thick) at the Ground Floor. Roof construction consists of

wood rafters spanning (up the slope) to timber purlins. The timber purlins span across the roof slope and are supported by timber trusses, which clear span the Hall below. Exterior cladding is wood siding on wood framing. The present roof is asphalt shingles.

No original construction drawings for the building or previous structural reports were available.

Structural Conditions/Issues – Comments and Recommendations:

Structural conditions at the Brimfield Town Hall were observed (to the extent possible) during a brief tour of the facility on May 13, 2013. Generally speaking, floor and roof construction appears to be performing satisfactorily; there is no evidence of structural distress that would indicate significantly overstressed, deteriorated or failed structural members. Foundations appear to be performing adequately; there are no signs of significant, total or differential settlements.

Structural/structurally related conditions observed during site visit are noted below:

- The condition of the exterior wood siding appears to be generally satisfactory. Exterior, brick masonry joints appear to be in satisfactory condition as well. The spire at the top of the tower has deteriorated and is open to weather (as is another, centrally located spire).

- The capacity of the First and Second Floor framing was not determined; however, floor construction appears to be relatively stiff and is functioning as originally intended.

- The capacity of the roof framing was not determined; however, roof framing appears to be functioning as originally intended. Repair/reinforcing of roof trusses has been conducted in the past.

- As noted above, there have been water issues at the Ground Floor. Rubble stone and brick masonry foundation walls show evidence of water infiltration as well. Roof and perimeter drainage issues should be evaluated, in conjunction with future renovations to the facility.

- Wood framing may typically be protected (to a degree) by the ceiling construction; however, elsewhere it is unprotected. There are no sprinklers. Fire rating requirements should be reviewed in conjunction with future renovations to the facility.

Building Code Requirements and Additional Comments:

Massachusetts State Building Code Requirements – General Comments:

Proposed renovations, alterations, repairs and additions to the Brimfield Town Hall would be governed by the provisions of the Massachusetts State Building Code (MSBC – 780 CMR 8th Edition) and the Massachusetts Existing Building Code (MEBC). These documents are based on amended versions of the 2009 International Building Code (IBC) and the 2009 International Existing Building Code (IEBC), respectively.

The MEBC allows the Design Team to choose one of three (3) compliance methods. Structurally, the Prescriptive Compliance Method is preferred. Section 101.5.4.0 of the Massachusetts Amendments (Chapter 34) would require that the existing building be investigated in sufficient detail to ascertain the effects of any proposed work (or change in use) in the area under consideration, and the entire building or structure and its foundations, if impacted by the proposed work or change in use.

Additions – General Comments:

The design and construction of any proposed additions would be conducted in accordance with the Code for new construction. Significant additions should be structurally separated from the existing building by an expansion (seismic) joint to avoid an increase in gravity loads and/or lateral loads to existing structural elements. Smaller additions can be structurally attached to the existing building, provided they do not increase the demand - capacity ratio of the existing lateral force resisting elements in the building by more than 10%.

Renovations/Alterations – General Comments:

Where proposed alterations to existing structural elements carrying gravity loads results in a stress increase of over 5%, the affected element would need to be reinforced or replaced to comply with the Code for new construction. Proposed alterations to existing structural elements carrying lateral load

(perimeter wood walls and Ground Floor masonry walls) which result in an increase in the demand - capacity ratio of over 10% should be avoided, if possible. Essentially, this means that removal of, or major alterations to these walls should be minimized. If this is not avoidable, more significant seismic upgrades/reinforcing will be required; potentially including the addition of lateral force resisting elements (wood shear walls, etc.).

End of Structural Report

TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

Town Hall

21 Main Street

MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEMS

Prepared By:
Consulting Engineering Services
510 Chapman Street, Suite 201
Canton, MA 02021

July 3, 2013

GENERAL

The mechanical, electrical, plumbing, and fire protection systems were reviewed in conformance with the requirements of the following State and National codes and regulations, as applicable:

- Massachusetts State Building Code 8th Edition
- Massachusetts State Fire Prevention Regulations
- NFPA Latest Editions
- Massachusetts Plumbing Code
- Massachusetts Mechanical Code
- Massachusetts Electrical code (NEC 2011 Edition)
- Illuminating Engineering Society of North America (IESNA) Lighting Handbook
- ASHRAE 90.1 Latest Edition

The scope of this study does not include operational assessment of the fixtures and equipment reviewed; it includes only a brief visual review of the fixtures and equipment. Therefore notes regarding the condition of the fixtures and equipment may or may not be indicative of the actual condition of the systems and equipment and/or the expected life of the fixtures and equipment. Therefore it is recommended that services of a qualified technician be retained to evaluate the actual condition of fixtures and equipment prior to replacement.

MECHANICAL

HEATING

The main meeting chamber on the first floor is served by an oil fired, gravity vent, hot air furnace in the mechanical space on the ground floor with supply registers ducted to floor mount supply registers along the perimeter and underneath a built in bench seat along the front of building and return ducted from floor grilles in the middle of the chamber. Miscellaneous rooms on the ground floor including the public access television room are served by a smaller oil fired, gravity vent, hot air furnace with over head supply distribution ductwork.

Both units appear to be 20+ years old and are in poor condition. Each is piped independently to a single 275 gallon oil tank within the same room with fill and vent piping connections through the adjacent exterior wall on the side of the building. Each unit is controlled by a dedicated wall mounted dial thermostat.

The remainder of the building is heated with two-pipe steam radiators fed from an oil fired steam boiler in another mechanical room on the ground floor. The boiler is supplied from its own 275 gallon oil tank in an adjacent room with fill and vent connection piped through the exterior wall locally. The radiators are controlled by local manual valves at each. The boiler and steam distribution is old and in poor condition, specifically within the mechanical room itself.

There are small lengths of electric baseboard in the two restrooms at the rear of the ground floor.

AIR CONDITIONING

There is no central air conditioning system in the building. There is a new inline dehumidification unit ducted in parallel with the supply and return lines to/from the smaller furnace serving the ground floor spaces. This unit has a small condensate pump adjacent to it with the discharge tube piped to the exterior of the building through an old window opening.

VENTILATION

There is no mechanical ventilation system in the building but there are operable windows throughout that appear to be of adequate free area to meet the natural ventilation code requirements, except in the main meeting chamber where the required rates are much higher and in on the ground floor where the windows are very small and in some cases not operable.

There are ceiling cabinet fan/light combination units in each of the ground floor bathrooms.

RECOMMENDATIONS

Replace the steam boiler plant with a hot water circulating plant and provide new hot water radiation equipment in place of the steam radiators for better control and comfort.

Replace all oil fired equipment with gas fired equipment for decreased energy usage due to better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

Replace existing thermostats with programmable type.

Provide new oil supply lines with code approved jacketing/membrane to each of the furnaces since currently neither of these lines includes this.

Provide mechanical ventilation using an automatic louver/damper system to serve both of the furnaces serving the ground floor and the main meeting chamber.

Reconfigure the ductwork of the inline dehumidification unit to draw from and supply back to the supply main from the furnace this unit is serving. As currently configured, there is a good chance that the unit could be short-circuiting air across the furnace then back through the dehumidifier which may explain why the unit was overflowing and not operating at all. Additionally provide interlock wiring such that the unit only operates when the furnace fan is on and also to shut down the unit upon detection of moisture in the overflow drain pan.

ELECTRICAL

EXISTING SYSTEMS

The existing building is served by a single 100amp, 120/240volt electric service. The service is overhead from a local utility company pole.

The service equipment consists of a 100amp, 240v-3p disconnect switch. From that switch there are (2) normal power panels and (2) emergency power panels. The emergency power panels are fed thru a manual transfer switch.

The equipment is approximately 20 years old and in fair condition.

The building has a gasoline powered generator located in the boiler room. This is a very old piece of equipment rated 3950watts at 120volts, single phase. It appears that if this is used, extension cords a plugged into it from electrical loads desired to be on emergency power. With the configuration of the emergency power panels and the fact that the police department once occupied the building, it is more likely that a portable generator was brought to the building and connected rather than use the unit in the boiler room.

The lighting in the building consists of surface mounted wraparound fluorescent fixtures, pendant mounted fluorescent strip fixtures, and original fixtures with incandescent lamps. Some of the small local light fixtures have had compact fluorescent screw-in lamps installed. The lighting in the building is in fair to poor condition and the lighting levels appear to be low.

The emergency lighting consists of individual self-contained battery units or similar fixtures attached to exit signs. This equipment is in fair condition and the coverage should be reviewed and additional fixtures added where necessary.

The exit signs are a mixture of older incandescent and newer fluorescent fixtures. This equipment is in fair condition. The coverage should be reviewed and additional exit signs added where necessary.

The building does have a fire alarm system manufactured by General Electric. This system consists of manual pull stations, smoke and heat detectors, horn/strobe units and a dialer which is manufactured by Silent Knight. This equipment is in fair condition.

There is evidence of the original knob-and-tube wiring in the attic space. This wiring is disconnected and no longer in service.

RECOMMENDATIONS

Upgrade the lighting throughout the building to more energy efficient types with better light distribution and quality.

Review the coverage of the exit and emergency lighting and provide additional fixtures where required. Replace the existing fixtures with new energy efficient LED types.

Provide a new emergency generator with an automatic transfer switch.

PLUMBING

EXISTING SYSTEMS

Cold water is from a well. The pump for the system is in the boiler room, and it appears to be in poor to fair condition. The compression tank for the system is adjacent to the pump, and it appears to be in fair condition.

The exposed water piping in the basement is copper, and it appears to be in fair to good condition.

A tank type electric water heater provides hot water for the building. It appears to be in fair condition, however a hand marked date on the housing indicates that the heater is over 30

years, which is well beyond the life of a typical electric water heater, therefore the water heater should be replaced.

The laundry tub in the water heater room appears to be in fair to poor condition.

The water closets in the two restrooms are the floor mount vitreous china tank type units, they are accessible, and they appear to be in good condition. The water closets are not low flow.

The lavatories in the two restrooms are the wall mounted vitreous china type, they are accessible, and they appear to be in fair condition.

There are three grade mounted propane tanks. The appliances served by those propane tanks were in spaces that were locked during the walk-thru, so this study does not include such information.

There is a sump pump in the furnace/oil tank room.

RECOMMENDATIONS

The well pump and the expansion tank for the pump should be replaced.

The electric water heater should be replaced.

The laundry tub should be replaced.

The water closets should be replaced with low flow fixtures.

FIRE PROTECTION

The building does not have a sprinkler system.

Description	Note	Quantity	Unit	Price	Total
Basic Quantities		GFA		Girth	
basement		5,040 sf		442 lf	
level 1		5,040 sf		442 lf	
level 2		969 sf		157 lf	
General					
New Entrance With Stair And Elevator At Rear Of Building					$
Town Hall new entrance (see costplan)		1,403	sf	352.53	494,601
Sub Total - Direct Cost					494,601
General Conditions		16.00%			79,136
Overhead & Profit		16.00%			91,798
Design & Price Reserve		15.00%			99,830
Escalation	May-15	8.16%			62,454
Bond		2.40%			19,868
Soft Costs/Design Fees		30.00%			254,306
Total Project Cost					1,101,993
Town Hall Renovation And Addition					$
Town Hall renovation and addition (see costplan)		12,452	sf	196.42	2,445,836
Sub Total - Direct Cost					2,445,836
General Conditions		10.00%			244,584
Overhead & Profit		12.00%			322,850
Design & Price Reserve		15.00%			451,991
Escalation	May-15	8.16%			282,765
Bond		1.60%			59,968
Soft Costs/Design Fees		30.00%			1,142,398
Total Project Cost					4,950,392
Accessible Entrance Door					$
add push button operator to door		1	ea	3,341.00	3,341
wire and conduit		100	lf	7.11	711
cut and patch		1	ls	257.79	258
Sub Total - Direct Cost					4,310
General Conditions		20.00%			862
Overhead & Profit		23.00%			1,190
Design & Price Reserve		15.00%			954
Escalation	May-15	8.16%			597
Bond		3.00%			237
Soft Costs/Design Fees		30.00%			2,445
Total Project Cost					10,595
Town Hall Annex Lot					$
regrade lawn area		3,784	sf	0.12	454
seed lawn		3,784	sf	0.48	1,816
excavate trench		13	cy	11.65	151

Description	Note	Quantity	Unit	Price	Total
gravel filled trench at west wall		13	cy	43.56	566
perforated drain		85	lf	10.45	888
filter fabric		765	sf	1.60	1,224
disposal off site - 10 mile round trip		13	cy	24.89	324
Sub Total - Direct Cost					5,423
General Conditions		20.00%			1,085
Overhead & Profit		23.00%			1,497
Design & Price Reserve		15.00%			1,201
Escalation	May-15	8.16%			751
Bond		3.00%			299
Soft Costs/Design Fees		30.00%			3,077
Total Project Cost					13,333
Copper Rain Leaders					$
demo plastic pipe rain leader		2	loc	72.60	145
replace cleanout		2	loc	231.08	462
provide sleeve for expansion of copper downpspout		2	loc	280.75	562
disposal		1	ea	168.45	168
Sub Total - Direct Cost					1,337

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			267
Overhead & Profit		23.00%			369
Design & Price Reserve		15.00%			296
Escalation	May-15	8.16%			185
Bond		3.00%			74
Soft Costs/Design Fees		30.00%			758
Total Project Cost					$3,286
Brick and Stone Foudations					$
repoint brick and stone foundation 5' tall	20%	442	sf	31.67	13,998
Sub Total - Direct Cost					13,998
General Conditions		20.00%			2,800
Overhead & Profit		23.00%			3,864
Design & Price Reserve		15.00%			3,099
Escalation	May-15	8.16%			1,939
Bond		3.00%			771
Soft Costs/Design Fees		30.00%			7,941
Total Project Cost					34,412
Foundation Wall Moisture					$
excavate adjacent to building		786	cy	18.82	14,793
perforated drain at perimeter of building		442	lf	10.45	4,619
pipe to pumping station	allowance	100	lf	47.96	4,796
connect to existing pumping station		1	ea	1,452.00	1,452
pipe to catch basin	allowance	100	lf	47.96	4,796
connect to existing catch basin		1	ea	1,452.00	1,452
gunite		5,304	sf	4.22	22,383
foundation damproofing		5,304	sf	1.29	6,842
drainage stone from grade	2' wide	393	cy	43.56	17,119
filter fabric		11,492	sf	1.60	18,387
backfill & compaction		393	cy	27.80	10,925
dispoal off site		1	ea	11.96	12
patch paving where disturbed	allowance	200	sf	7.26	1,452
Sub Total - Direct Cost					109,028
General Conditions		20.00%			21,806
Overhead & Profit		23.00%			30,092
Design & Price Reserve		15.00%			24,139
Escalation	May-15	8.16%			15,101
Bond		2.40%			4,804
Soft Costs/Design Fees		30.00%			61,491
Total Project Cost					$266,461

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Under-floor drainage system					$
demo wood flooring		11,049	sf	1.67	18,452
demo concrete slab		11,049	sf	6.60	72,923
demo wood partitions		5,443	sf	2.57	13,989
dumpster rental		4	weeks	734.71	2,939
load & truck	10 mile round trip	80	cy	55.27	4,422
dump charges		32	ton	87.12	2,788
under-floor drainage system - perimeter		442	lf	10.45	4,619
pipe to pump station	allowance	100	lf	47.96	4,796
pit excavation inside building		274	cy	23.55	6,453
disposal off site		274	cy	11.96	3,277
6" stone base		205	cy	41.41	8,489
vapor barrier		11,049	sf	0.27	2,983
2" rigid insulation	allowance	100	lf	2.02	202
5" concrete slab		171	cy	160.71	27,481
cure and finish slab		11,049	sf	0.96	10,607
premium for working inside existing building	100%	1	ea	68,907.00	68,907
new partitions - moisture resistant	basement	5,443	sf	13.73	74,732
partitions around exterior wall w/insulation	basement	5,304	sf	13.73	72,824
paint partitions	basement	10,747	sf	1.09	11,714
Sub Total - Direct Cost					412,597
General Conditions		16.00%			66,016
Overhead & Profit		18.00%			86,150
Design & Price Reserve		15.00%			84,714
Escalation	May-15	8.16%			52,997
Bond		2.40%			16,859
Soft Costs/Design Fees		30.00%			215,800
Total Project Cost					$935,133
Remove Paint From Exposed Pipes					$
remove paint from exposed pipes in lift and ramp a	allowance	100	lf	12.10	1,210
paint exposed pipes		100	lf	6.13	613
Sub Total - Direct Cost					1,823
General Conditions		20.00%			365
Overhead & Profit		23.00%			503
Design & Price Reserve		15.00%			404
Escalation	May-15	8.16%			253
Bond		3.00%			100
Soft Costs/Design Fees		30.00%			1,034
Total Project Cost					$4,482
Add storm panels					$
add storm panels to existing single pane wood windows		252	sf	13.71	3,455
Sub Total - Direct Cost					3,455

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			691
Overhead & Profit		23.00%			954
Design & Price Reserve		15.00%			765
Escalation	May-15	8.16%			479
Bond		3.00%			190
Soft Costs/Design Fees		30.00%			1,960
Total Project Cost					$8,494
Patch Openings In Mechanical #1					$
demo damaged ceiling	allowance	442	sf	1.74	769
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
new drywall ceiling	allowance	442	sf	5.23	2,312
paint drywall ceiling	allowance	442	sf	1.19	526
seal duct penetrations	allowance	50	lf	4.53	227
Sub Total - Direct Cost					6,371
General Conditions		20.00%			1,274
Overhead & Profit		23.00%			1,758
Design & Price Reserve		15.00%			1,410
Escalation	May-15	8.16%			882
Bond		3.00%			351
Soft Costs/Design Fees		30.00%			3,614
Total Project Cost					$15,660
Mechanical #1 Foundation					$
remove 2 layers of brick	small area	33	lf	11.87	392
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
replace 2 layers of brick on top of foundation wall	small area	33	lf	38.91	1,284
repoint brick chimney 4' above slab		24	sf	31.67	760
Sub Total - Direct Cost					4,973
General Conditions		20.00%			995
Overhead & Profit		23.00%			1,373
Design & Price Reserve		15.00%			1,101
Escalation	May-15	8.16%			689
Bond		3.00%			274
Soft Costs/Design Fees		30.00%			2,822
Total Project Cost					12,227

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Patch Openings In Mechanical #2					$
demo damaged ceiling	allowance	150	sf	1.74	261
new drywall ceiling	allowance	150	sf	5.11	767
paint drywall ceiling	allowance	150	sf	1.36	204
seal duct penetrations	allowance	50	lf	4.53	227
Sub Total - Direct Cost					1,459
General Conditions		20.00%			292
Overhead & Profit		23.00%			403
Design & Price Reserve		15.00%			323
Escalation	May-15	8.16%			202
Bond		3.00%			80
Soft Costs/Design Fees		30.00%			828
Total Project Cost					$3,587
Mechanical #2 Foundation					$
remove 2 layers of brick		18	lf	11.87	214
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
replace 2 layers of brick on top of foundation wall		18	lf	38.91	700
repoint upper part of brick wall		108	sf	31.67	3,420
Sub Total - Direct Cost					6,871
General Conditions		20.00%			1,374
Overhead & Profit		23.00%			1,896
Design & Price Reserve		15.00%			1,521
Escalation	May-15	8.16%			952
Bond		3.00%			378
Soft Costs/Design Fees		30.00%			3,898
Total Project Cost					$16,890
Repair Exterior Wall Next To Lift					$
repair interior of exterior wall next to lift - plaster	small area	36	sf	9.33	336
paint wall to match existing	small area	36	sf	9.19	331
Sub Total - Direct Cost					667
General Conditions		20.00%			133
Overhead & Profit		23.00%			184
Design & Price Reserve		15.00%			148
Escalation	May-15	8.16%			92
Bond		3.00%			37
Soft Costs/Design Fees		30.00%			378
Total Project Cost					$1,639

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

Description	Note	Quantity	Unit	Price	Total
Fire Stopping At Ground Floor					$
fire stopping at ground floor		11,049	sf	0.45	4,972
	776.18				
Sub Total - Direct Cost					4,972
General Conditions		20.00%			994
Overhead & Profit		23.00%			1,372
Design & Price Reserve		15.00%			1,101
Escalation	May-15	8.16%			689
Bond		3.00%			274
Soft Costs/Design Fees		30.00%			2,821
Total Project Cost					$12,223
Interior Door Widening					$
modify partition for door clearance		10	loc	2,890.00	28,900
cut and patch		1	ls	1,445.00	1,445
Sub Total - Direct Cost					30,345
General Conditions		20.00%			6,069
Overhead & Profit		23.00%			8,375
Design & Price Reserve		15.00%			6,718
Escalation	May-15	8.16%			4,203
Bond		3.00%			1,671
Soft Costs/Design Fees		30.00%			17,214
Total Project Cost					$74,595
Interior Door Hardware Replacement					$
replace knob set with levers		18	ea	1,003.76	18,068
disposal		1	ea	435.60	436
Sub Total - Direct Cost					18,504
General Conditions		20.00%			3,701
Overhead & Profit		23.00%			5,107
Design & Price Reserve		15.00%			4,097
Escalation	May-15	8.16%			2,563
Bond		3.00%			1,019
Soft Costs/Design Fees		30.00%			10,497
Total Project Cost					45,488
Wall & Ceilings in Toilet Rooms #1 & #2					$
remove and salvage grab bars		4	ea	72.60	290
repair walls as neccesary		512	sf	4.94	2,529
repair ceilings as neccesary		128	sf	6.98	893
reinstall grab bars		4	ea	69.68	279
Sub Total - Direct Cost					3,991

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			798
Overhead & Profit		23.00%			1,101
Design & Price Reserve		15.00%			884
Escalation	May-15	8.16%			553
Bond		3.00%			220
Soft Costs/Design Fees		30.00%			2,264
Total Project Cost					9,811
Wood Ramp					$
demo wood ramp		27	sf	14.52	392
disposal		1	ea	56.92	57
new ramp	allowance	35	sf	47.97	1,679
hand rails		16	lf	154.20	2,467
paint hand rails		16	lf	4.29	69
Sub Total - Direct Cost					4,664
General Conditions		20.00%			933
Overhead & Profit		23.00%			1,287
Design & Price Reserve		15.00%			1,033
Escalation	May-15	8.16%			646
Bond		3.00%			257
Soft Costs/Design Fees		30.00%			2,646
Total Project Cost					11,466
Step Down To Unassigned Room #7					$
install handrails	allowance	6	lf	157.35	944
paint hand rails	small area	6	lf	9.19	55
signage		1	ea	295.50	296
Sub Total - Direct Cost					1,295
General Conditions		20.00%			259
Overhead & Profit		23.00%			357
Design & Price Reserve		15.00%			287
Escalation	May-15	8.16%			179
Bond		3.00%			71
Soft Costs/Design Fees		30.00%			734
Total Project Cost					3,182
Wood Ramp Corridor #2 to #3					$
demo wood ramp		43	sf	14.52	624
disposal		1	ea	90.60	91
new ramp		50	sf	47.97	2,399
hand rails		16	lf	179.90	2,878
paint hand rails		16	lf	4.29	69
Sub Total - Direct Cost					6,061

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			1,212
Overhead & Profit		23.00%			1,673
Design & Price Reserve		15.00%			1,342
Escalation	May-15	8.16%			840
Bond		3.00%			334
Soft Costs/Design Fees		30.00%			3,439
Total Project Cost					14,901
Chase Wall					$
infill opening floor to ceiling		36	sf	26.10	940
Sub Total - Direct Cost					940
General Conditions		20.00%			188
Overhead & Profit		23.00%			259
Design & Price Reserve		15.00%			208
Escalation	May-15	8.16%			130
Bond		3.00%			52
Soft Costs/Design Fees		30.00%			533
Total Project Cost					2,310
Door To Mechanical #1					$
reconfigure door/ramp as required - 1 door, 50 sf ramp	allowance	1	ea	10,506.25	10,506
Sub Total - Direct Cost					10,506
General Conditions		20.00%			2,101
Overhead & Profit		23.00%			2,900
Design & Price Reserve		15.00%			2,326
Escalation	May-15	8.16%			1,455
Bond		3.00%			579
Soft Costs/Design Fees		30.00%			5,960
Total Project Cost					25,827
Plaster And Paint Corridor #3					$
repair plaster		144	sf	3.09	445
paint wall		144	sf	1.09	157
Sub Total - Direct Cost					602
General Conditions		20.00%			120
Overhead & Profit		23.00%			166
Design & Price Reserve		15.00%			133
Escalation	May-15	8.16%			83
Bond		3.00%			33
Soft Costs/Design Fees		30.00%			341
Total Project Cost					1,478

Description	Note	Quantity	Unit	Price	Total
Brick/Concrete Steps					$
remove brick and concrete steps		6	lfr	14.71	88
remove pipe handrail		6	lfr	3.08	18
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
new metal pan steps		6	lfr	130.69	784
radial rubber stair tread/riser		6	lfr	19.56	117
guard rail		6	lf	179.90	1,079
paint guard rail	small area	6	lf	14.70	88
Sub Total - Direct Cost					4,711
General Conditions		20.00%			942
Overhead & Profit		23.00%			1,300
Design & Price Reserve		15.00%			1,043
Escalation	May-15	8.16%			652
Bond		3.00%			259
Soft Costs/Design Fees		30.00%			2,672
Total Project Cost					11,579
Relocate Oil Tank					$
relocate oil tank		1	ea	1,279.31	1,279
Sub Total - Direct Cost					1,279
General Conditions		20.00%			256
Overhead & Profit		23.00%			353
Design & Price Reserve		15.00%			283
Escalation	May-15	8.16%			177
Bond		3.00%			70
Soft Costs/Design Fees		30.00%			725
Total Project Cost					3,143
Stairs					$
handrails		85	lf	154.20	13,107
paint hand rails		85	lf	4.29	365
infill area under nosings	wood	245	lfr	22.04	5,400
Sub Total - Direct Cost					18,872
General Conditions		20.00%			3,774
Overhead & Profit		23.00%			5,209
Design & Price Reserve		15.00%			4,178
Escalation	May-15	8.16%			2,614
Bond		3.00%			1,039
Soft Costs/Design Fees		30.00%			10,706
Total Project Cost					46,392

Description	Note	Quantity	Unit	Price	Total
New Landing					$
new concrete landing		50	sf	102.77	5,139
concrete steps on grade	allowance	8	lfr	107.50	860
rubber on landing		50	sf	122.67	6,134
rubber on steps		8	lfr	122.67	981
guardrails		8	lf	107.32	859
paint guardrails		8	lf	14.70	118
Sub Total - Direct Cost					14,091
General Conditions		20.00%			2,818
Overhead & Profit		23.00%			3,889
Design & Price Reserve		15.00%			3,120
Escalation	May-15	8.16%			1,952
Bond		3.00%			776
Soft Costs/Design Fees		30.00%			7,994
Total Project Cost					34,640

First Floor

Replace Door Hardware					$
replace knob set with levers		9	ea	1,003.76	9,034
disposal		1	ea	217.80	218
Sub Total - Direct Cost					9,252
General Conditions		20.00%			1,850
Overhead & Profit		23.00%			2,553
Design & Price Reserve		15.00%			2,048
Escalation	May-15	8.16%			1,281
Bond		3.00%			510
Soft Costs/Design Fees		30.00%			5,248
Total Project Cost					22,742
Exterior Door Hardware					$
remove exterior door hardware		4	ea	68.97	276
disposal		1	ea	96.80	97
exterior door hardware		4	ea	1,563.23	6,253
Sub Total - Direct Cost					6,626
General Conditions		20.00%			1,325
Overhead & Profit		23.00%			1,829
Design & Price Reserve		15.00%			1,467
Escalation	May-15	8.16%			918
Bond		3.00%			365
Soft Costs/Design Fees		30.00%			3,759
Total Project Cost					16,289

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Meeting Room Paint					$
paint with stain blocker - water damaged areas		930	sf	1.53	1,423
paint - match existing		1,500	sf	1.09	1,635
Sub Total - Direct Cost					4,327
General Conditions		20.00%			865
Overhead & Profit		23.00%			1,194
Design & Price Reserve		15.00%			958
Escalation	May-15	8.16%			599
Bond		3.00%			238
Soft Costs/Design Fees		30.00%			2,454
Total Project Cost					10,635
Stage Curtain					$
remove stage curtain		15	lf	14.52	218
disposal		1	ea	72.60	73
drywall ceiling		248	sf	5.11	1,267
paint ceiling		248	sf	1.36	337
Sub Total - Direct Cost					1,895
General Conditions		20.00%			379
Overhead & Profit		23.00%			523
Design & Price Reserve		15.00%			420
Escalation	May-15	8.16%			263
Bond		3.00%			104
Soft Costs/Design Fees		30.00%			1,075
Total Project Cost					4,659
Add storm panels					$
add storm panels to existing single pane wood windows		270	sf	13.71	3,702
Sub Total - Direct Cost					3,702
General Conditions		20.00%			740
Overhead & Profit		23.00%			1,022
Design & Price Reserve		15.00%			820
Escalation	May-15	8.16%			513
Bond		3.00%			204
Soft Costs/Design Fees		30.00%			2,100
Total Project Cost					$9,101
Repair Meeting Room Exterior Door					$
fill splits and joints in exterior doors		2	leaf	360.93	722
paint exterior doors		2	leaf	131.39	263
Sub Total - Direct Cost					985

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			197
Overhead & Profit		23.00%			272
Design & Price Reserve		15.00%			218
Escalation	May-15	8.16%			136
Bond		3.00%			54
Soft Costs/Design Fees		30.00%			559
Total Project Cost					2,421
Meeting Room Threshold					$
remove threshhold		6	lf	7.26	44
disposal		1	ea	24.20	24
new wood threshold		6	lf	28.78	173
Sub Total - Direct Cost					241
General Conditions		20.00%			48
Overhead & Profit		23.00%			66
Design & Price Reserve		15.00%			53
Escalation	May-15	8.16%			33
Bond		3.00%			13
Soft Costs/Design Fees		30.00%			136
Total Project Cost					590
Stage Railings					$
add handrails up stairs at stage		12	lf	154.20	1,850
paint handrails		12	lf	4.29	51
Sub Total - Direct Cost					1,901
General Conditions		20.00%			380
Overhead & Profit		23.00%			525
Design & Price Reserve		15.00%			421
Escalation	May-15	8.16%			263
Bond		3.00%			105
Soft Costs/Design Fees		30.00%			1,079
Total Project Cost					4,674
Wall and Ceiling Repairs In Storage #3					$
repair walls	allowance	576	sf	3.44	1,981
repair ceilings	allowance	113	sf	4.47	505
paint walls		576	sf	1.09	628
paint ceilings		113	sf	1.36	154
Sub Total - Direct Cost					3,268

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			654
Overhead & Profit		23.00%			902
Design & Price Reserve		15.00%			724
Escalation		8.16%			453
Bond		3.00%			180
Soft Costs/Design Fees		30.00%			1,854
Total Project Cost					8,035
Replace Handrail In Storage #2 #3					$
remove existing wood handrail		16	lf	3.63	58
disposal		1	ea	48.40	48
new wood handrail		16	lf	154.57	2,473
paint handrail		16	lf	14.70	235
Sub Total - Direct Cost					2,814
General Conditions		20.00%			563
Overhead & Profit		23.00%			777
Design & Price Reserve		15.00%			623
Escalation		8.16%			390
Bond		3.00%			155
Soft Costs/Design Fees		30.00%			1,597
Total Project Cost					6,919
Repair Town Clerk #1					$
repair water stains	allowance	684	sf	3.44	2,353
repair ceiling damage (cracks)	allowance	188	sf	4.47	840
paint wall		684	lf	1.09	746
paint ceiling		188	sf	1.36	256
Sub Total - Direct Cost					4,195
General Conditions		20.00%			839
Overhead & Profit		23.00%			1,158
Design & Price Reserve		15.00%			929
Escalation		8.16%			581
Bond		3.00%			231
Soft Costs/Design Fees		30.00%			2,380
Total Project Cost					10,313
Repair Lobby					$
repair water stains		828	sf	3.44	2,848
repair ceiling damage (cracks)		255	sf	4.47	1,140
paint wall		828	lf	1.09	903
paint ceiling		255	sf	1.36	347
Sub Total - Direct Cost					5,238

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			1,048
Overhead & Profit		23.00%			1,446
Design & Price Reserve		15.00%			1,160
Escalation		8.16%			726
Bond		3.00%			289
Soft Costs/Design Fees		30.00%			2,972
Total Project Cost					12,879
Lobby Stair					$
demo lobby stair		70	lfr	33.88	2,372
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trij	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
steel pan stair		70	lfr	130.69	9,148
radial rubber stair tread/riser		70	lfr	19.56	1,369
new guard rail		24	lf	178.50	4,284
new hand rail		24	lf	154.20	3,701
paint guard rail		24	lf	14.70	353
paint hand rail		24	lf	4.29	103
cut and patch as required		1	ea	1,193.35	1,193
Sub Total - Direct Cost					25,060
General Conditions		20.00%			5,012
Overhead & Profit		23.00%			6,917
Design & Price Reserve		15.00%			5,548
Escalation		8.16%			3,471
Bond		3.00%			1,380
Soft Costs/Design Fees		30.00%			14,216
Total Project Cost					61,604
Sand and Refinish Wood Stairs					$
remove non slip adhesive strips on stairs		70	lf	8.84	619
sand and refinish steps - level 1		70	lfr	9.89	692
Sub Total - Direct Cost					1,311
General Conditions		20.00%			262
Overhead & Profit		23.00%			362
Design & Price Reserve		15.00%			290
Escalation		8.16%			182
Bond		3.00%			72
Soft Costs/Design Fees		30.00%			744
Total Project Cost					3,223

Description	Note	Quantity	Unit	Price	Total
Work Around Lift					$
remove existing wall around lift		348	sf	2.56	891
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
partitions		348	sf	13.73	4,778
paint partitions		348	sf	1.09	379
relocate lift control as required	allowance	1	ea	514.00	514
Sub Total - Direct Cost					9,099
General Conditions		20.00%			1,820
Overhead & Profit		23.00%			2,511
Design & Price Reserve		15.00%			2,015
Escalation		8.16%			1,260
Bond		3.00%			501
Soft Costs/Design Fees		30.00%			5,162
Total Project Cost					22,368
Install ADA Restroom					$
install ADA restroom		1	ea	12,975.91	12,976
Sub Total - Direct Cost					12,976
General Conditions		20.00%			2,595
Overhead & Profit		23.00%			3,581
Design & Price Reserve		15.00%			2,873
Escalation		8.16%			1,797
Bond		3.00%			715
Soft Costs/Design Fees		30.00%			7,361
Total Project Cost					31,898

Second Floor

Add storm panels					$
add storm panels to existing single pane wood windows		5	ea	203.93	1,020
repair broken pains of glass	allowance	5	ea	118.48	592
disposal		1	ea	48.40	48
Sub Total - Direct Cost					1,660
General Conditions		20.00%			332
Overhead & Profit		23.00%			458
Design & Price Reserve		15.00%			368
Escalation	May-15	8.16%			230
Bond		3.00%			91
Soft Costs/Design Fees		30.00%			942
Total Project Cost					$4,081

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Repair Ceilings In Meeting Room, Stair and Attic					$
repair water damaged ceilings as required		3,325	sf	4.01	13,333
paint ceiling to match existing		3,325	sf	1.36	4,522
Sub Total - Direct Cost					17,855
General Conditions		20.00%			3,571
Overhead & Profit		23.00%			4,928
Design & Price Reserve		15.00%			3,953
Escalation		8.16%			2,473
Bond		3.00%			983
Soft Costs/Design Fees		30.00%			10,129
Total Project Cost					43,892
Sand and Refinish Wood Stairs					$
remove non slip adhesive strips on stairs		60	lf	8.84	530
sand and refinish steps - attic		60	lfr	9.90	594
Sub Total - Direct Cost					1,124
General Conditions		20.00%			225
Overhead & Profit		23.00%			310
Design & Price Reserve		15.00%			249
Escalation		8.16%			156
Bond		3.00%			62
Soft Costs/Design Fees		30.00%			638
Total Project Cost					2,764
Stair					$
demo stair		70	lfr	33.88	2,372
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trij	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
new steel pan stair		70	lfr	130.69	9,148
radial rubber stair tread/riser		70	lfr	19.56	1,369
new guard rail		24	lf	179.90	4,318
new hand rail		24	lf	154.20	3,701
paint guard rail		24	lf	14.70	353
paint hand rail		24	lf	4.29	103
cut and patch as required		1	ea	1,195.05	1,195
Sub Total - Direct Cost					25,096
General Conditions		20.00%			5,019
Overhead & Profit		23.00%			6,926
Design & Price Reserve		15.00%			5,556
Escalation		8.16%			3,476
Bond		3.00%			1,382
Soft Costs/Design Fees		30.00%			14,237
Total Project Cost					61,692
Vinyl Asbestos In Attic Access Space					$

Description	Note	Quantity	Unit	Price	Total
remove asbestos in attic access space		108	sf	4.84	523
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trij	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
vct floor		108	sf	2.94	318
vinyl base		41	lf	2.48	102
Sub Total - Direct Cost					3,480
General Conditions		20.00%			696
Overhead & Profit		23.00%			960
Design & Price Reserve		15.00%			770
Escalation		8.16%			482
Bond		3.00%			192
Soft Costs/Design Fees		30.00%			1,974
Total Project Cost					8,554
Attic Floor					$
blown in insulation		2,623	sf	1.21	3,174
add attic ventilation - add exhasut fan	allowance	1	ea	829.77	830
Sub Total - Direct Cost					4,004
General Conditions		20.00%			801
Overhead & Profit		23.00%			1,105
Design & Price Reserve		15.00%			887
Escalation		8.16%			555
Bond		3.00%			221
Soft Costs/Design Fees		30.00%			2,272
Total Project Cost					9,845
Remove Bird/Bat Droppings					$
remove bird/bat droppings	labor allowance	2	day	401.55	803
seal openings to prevent bird/bat access	allowance	1	ea	2,132.00	2,132
Sub Total - Direct Cost					2,935
General Conditions		20.00%			587
Overhead & Profit		23.00%			810
Design & Price Reserve		15.00%			650
Escalation		8.16%			407
Bond		3.00%			162
Soft Costs/Design Fees		30.00%			1,665
Total Project Cost					7,216

Description	Note	Quantity	Unit	Price	Total
EXTERIOR					
Re-attach gutter on east side of building					$
re-attach gutter		79	lf	8.42	665
Sub Total - Direct Cost					665
General Conditions		20.00%			133
Overhead & Profit		23.00%			184
Design & Price Reserve		15.00%			147
Escalation	May-15	8.16%			92
Bond		3.00%			37
Soft Costs/Design Fees		30.00%			377
Total Project Cost					1,635
Copper Rain Leaders					$
demo plastic pipe rain leader		2	loc	72.60	145
replace cleanout		2	loc	231.08	462
provide sleeve for expansion of copper downpspout		2	loc	280.75	562
replace/repoint damaged bricks	allowance	50	sf	31.67	1,584
disposal		1	ea	168.45	168
Sub Total - Direct Cost					2,921
General Conditions		20.00%			584
Overhead & Profit		23.00%			806
Design & Price Reserve		15.00%			647
Escalation	May-15	8.16%			405
Bond		3.00%			161
Soft Costs/Design Fees		30.00%			1,657
Total Project Cost					$7,181
Front Stairs					$
guardrail on landing side of railing	allowance	12	lf	179.90	2,159
paint guard rail		12	lf	14.70	176
Sub Total - Direct Cost					2,335
General Conditions		20.00%			467
Overhead & Profit		23.00%			644
Design & Price Reserve		15.00%			517
Escalation	May-15	8.16%			323
Bond		3.00%			129
Soft Costs/Design Fees		30.00%			1,325
Total Project Cost					5,740
Front Stairs					$
secure lose metal handrails		21	lf'	17.13	360
Sub Total - Direct Cost					360

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
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COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			72
Overhead & Profit		23.00%			99
Design & Price Reserve		15.00%			80
Escalation	May-15	8.16%			50
Bond		3.00%			20
Soft Costs/Design Fees		30.00%			204
Total Project Cost					885
Front Stair					$
sand and prep stairs		58	lfr	2.92	169
remove non-slip strips		58	lf	8.84	513
disposal		1	ea	48.40	48
paint front stairs		58	lfr	6.88	399
new non-slip strips		58	lf	3.80	220
Sub Total - Direct Cost					1,349
General Conditions		20.00%			270
Overhead & Profit		23.00%			372
Design & Price Reserve		15.00%			299
Escalation		8.16%			187
Bond		3.00%			74
Soft Costs/Design Fees		30.00%			765
Total Project Cost					3,316
Peeling Paint					$
scrape, prime and paint envleope of building - siding/trim/window/door trim/fascia/porch	5% allowance	393	sf	12.25	4,814
Sub Total - Direct Cost					4,814
General Conditions		20.00%			963
Overhead & Profit		23.00%			1,329
Design & Price Reserve		15.00%			1,066
Escalation	May-15	8.16%			667
Bond		3.00%			265
Soft Costs/Design Fees		30.00%			2,731
Total Project Cost					11,835
Front Porch Wall Intersection					$
cut wood siding back 1" from shingles		30	lf	8.15	245
disposal		1	ea	72.60	73
install metal flashing to roof		30	lf	16.85	506
patch siding as required		30	lf	37.31	1,119
patch roof as required		30	lf	39.31	1,179
Sub Total - Direct Cost					3,122

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			624
Overhead & Profit		23.00%			862
Design & Price Reserve		15.00%			691
Escalation	May-15	8.16%			432
Bond		3.00%			172
Soft Costs/Design Fees		30.00%			1,771
Total Project Cost					7,674
Repoint 3 Brick Chimneys					$
repoint 2 chimneys		160	sf	31.67	5,067
re-set chimney caps		3	ea	201.26	604
staging		160	sf	3.24	518
Sub Total - Direct Cost					6,189
General Conditions		20.00%			1,238
Overhead & Profit		23.00%			1,708
Design & Price Reserve		15.00%			1,370
Escalation	May-15	8.16%			857
Bond		3.00%			341
Soft Costs/Design Fees		30.00%			3,511
Total Project Cost					15,214
Finials					
replace missing boards at finials	2 locations	2	loc	388.02	776
paint finials		2	ea	357.27	715
Sub Total - Direct Cost					1,491
General Conditions		20.00%			298
Overhead & Profit		23.00%			411
Design & Price Reserve		15.00%			330
Escalation	May-15	8.16%			206
Bond		3.00%			82
Soft Costs/Design Fees		30.00%			845
Total Project Cost					3,663
Flat Roof Replacement					
demo roof		266	sf	1.78	473
new membrane roof		266	sf	21.62	5,751
Sub Total - Direct Cost					6,224
General Conditions		20.00%			1,245
Overhead & Profit		23.00%			1,718
Design & Price Reserve		15.00%			1,378
Escalation	May-15	8.16%			862
Bond		3.00%			343
Soft Costs/Design Fees		30.00%			3,531
Total Project Cost					15,301

Description	Note	Quantity	Unit	Price	Total
Insulate walls					
blown in insulation at first and second floors		7,188	sf	1.21	8,697
Sub Total - Direct Cost					8,697
General Conditions		20.00%			1,739
Overhead & Profit		23.00%			2,400
Design & Price Reserve		15.00%			1,925
Escalation	May-15	8.16%			1,204
Bond		3.00%			479
Soft Costs/Design Fees		30.00%			4,933
Total Project Cost					21,377

Mechanical

Replace Steam Boiler Plant					
remove steam boiler and radiator heating system	allowance	11,049	sf	2.80	30,937
dumpster rental		2	weeks	734.71	1,469
load & truck	10 mile round trip	40	cy	55.27	2,211
dump charges		16	ton	87.12	1,394
new hot water heating system	allowance	11,049	sf	59.31	655,316
Sub Total - Direct Cost					691,327
General Conditions		14.00%			96,786
Overhead & Profit		16.00%			126,098
Design & Price Reserve		15.00%			137,132
Escalation	May-15	8.16%			85,790
Bond		2.00%			22,743
Soft Costs/Design Fees		30.00%			347,963
Total Project Cost					1,507,839
Replace Oil Fired Equipment					
remove oil fired equipment		1	ea	753.06	753
disposal		1	ea	242.00	242
new gas service - trench only - service by gas company		200	lf	26.18	5,236
misc. exterior repairs from trench		1	ea	1,936.00	1,936
cast iron gas boiler	300mbh	1	ea	8,606.06	8,606
hot water pumps	40gpm	2	ea	2,629.12	5,258
gas piping allowance	1 1/4"	100	lf	16.95	1,695
Sub Total - Direct Cost					23,726
General Conditions		20.00%			4,745
Overhead & Profit		23.00%			6,548
Design & Price Reserve		15.00%			5,253
Escalation	May-15	8.16%			3,286
Bond		3.00%			1,307
Soft Costs/Design Fees		30.00%			13,460
Total Project Cost					58,325
Replace Existing Thermostats					

Description	Note	Quantity	Unit	Price	Total
demo existing thermostats	allowance	20	ea	72.60	1,452
dispoal		1	ea	48.40	48
new thermostats	allowance	20	ea	256.75	5,135
Sub Total - Direct Cost					6,635
General Conditions		20.00%			1,327
Overhead & Profit		23.00%			1,831
Design & Price Reserve		15.00%			1,469
Escalation	May-15	8.16%			919
Bond		3.00%			365
Soft Costs/Design Fees		30.00%			3,764
Total Project Cost					16,310
New Oil Supply Lines					
demo old oil supply lines	allowance	100	lf	4.84	484
disposal		1	ea	72.60	73
new oil supply lines with jacketing/membrane	allowance	100	lf	29.40	2,940
Sub Total - Direct Cost					3,497
General Conditions		20.00%			699
Overhead & Profit		23.00%			965
Design & Price Reserve		15.00%			774
Escalation	May-15	8.16%			484
Bond		3.00%			193
Soft Costs/Design Fees		30.00%			1,984
Total Project Cost					8,596
Provide Mechanical Ventialtion					
automatic louver/damper system to serve furnaces and main meeting chamber		1	ea	2,673.32	2,673
electrican		1	day	628.33	628
Sub Total - Direct Cost					3,301
General Conditions		20.00%			660
Overhead & Profit		23.00%			911
Design & Price Reserve		15.00%			731
Escalation	May-15	8.16%			457
Bond		3.00%			182
Soft Costs/Design Fees		30.00%			1,873
Total Project Cost					8,115
Reconfigure Ductwork					
reconfigure ductwork at dehumidification unit	allowance	1	ea	1,540.50	1,541
provide interlock wiring/contols for unit		1	ea	513.50	514
Sub Total - Direct Cost					2,055
General Conditions		20.00%			411
Overhead & Profit		23.00%			567

Description	Note	Quantity	Unit	Price	Total
Design & Price Reserve		15.00%			455
Escalation	May-15	8.16%			285
Bond		3.00%			113
Soft Costs/Design Fees		30.00%			1,166
Total Project Cost					5,052
Plumbing					
Replace Well Pump					
demo well pump		1	ea	208.12	208
demo expansion tank		1	ea	174.24	174
disposal		1	ea	55.47	55
new well pump		1	ea	4,416.10	4,416
new expansion tank		1	ea	3,697.20	3,697
Sub Total - Direct Cost					8,550
General Conditions		20.00%			1,710
Overhead & Profit		23.00%			2,360
Design & Price Reserve		15.00%			1,893
Escalation	May-15	8.16%			1,184
Bond		3.00%			471
Soft Costs/Design Fees		30.00%			4,850
Total Project Cost					21,018
Replace Electric Water Heater					
remove electric water heater		1	ea	62.48	62
disposal		1	ea	48.40	48
new electric water heater		1	ea	2,233.73	2,234
Sub Total - Direct Cost					2,344
General Conditions		20.00%			469
Overhead & Profit		23.00%			647
Design & Price Reserve		15.00%			519
Escalation	May-15	8.16%			325
Bond		3.00%			129
Soft Costs/Design Fees		30.00%			1,330
Total Project Cost					5,763
Replace Laundry Tub					
remove laundry tub		1	ea	165.77	166
disposal		1	ea	48.40	48
new laundry tub		1	ea	3,517.48	3,517
Sub Total - Direct Cost					3,731

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			746
Overhead & Profit		23.00%			1,030
Design & Price Reserve		15.00%			826
Escalation	May-15	8.16%			517
Bond		3.00%			206
Soft Costs/Design Fees		30.00%			2,117
Total Project Cost					9,173
Replace Water Closets					
remove water closet		4	ea	117.13	469
disposal		1	ea	48.40	48
low flow water closet		4	ea	2,485.34	9,941
Sub Total - Direct Cost					10,458
General Conditions		20.00%			2,092
Overhead & Profit		23.00%			2,887
Design & Price Reserve		15.00%			2,316
Escalation	May-15	8.16%			1,449
Bond		3.00%			576
Soft Costs/Design Fees		30.00%			5,933
Total Project Cost					25,711
Fire Protection					
Fire Protection					
add sprinkler system to existing		11,049	sf	4.62	51,046
cut and patch		11,049	sf	0.23	2,541
water storage tanks 11'4"x30'x10'4"		1	ea	14,121.25	14,121
generator - gas 50kw		1	ea	29,760.60	29,761
Sub Total - Direct Cost					97,469
General Conditions		20.00%			19,494
Overhead & Profit		23.00%			26,901
Design & Price Reserve		15.00%			21,580
Escalation	May-15	8.16%			13,500
Bond		2.40%			4,295
Soft Costs/Design Fees		30.00%			54,972
Total Project Cost					238,211
Electrical					
Upgrade Lighting					
demo lighting		11,049	sf	0.58	6,408
dumpster rental		2	weeks	734.71	1,469
load & truck	10 mile round trip	40	cy	55.27	2,211
dump charges		16	ton	87.12	1,394
upgrade lighting throughout		11,049	sf	14.75	162,973
Sub Total - Direct Cost					174,455

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 11,049

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			34,891
Overhead & Profit		18.00%			37,682
Design & Price Reserve		15.00%			37,054
Escalation	May-15	8.16%			23,181
Bond		2.40%			7,374
Soft Costs/Design Fees		30.00%			94,391
Total Project Cost					409,028
Exit Signs					
demo exisiting exit signs		10	ea	62.48	625
disposal		1	ea	48.40	48
exit signs throughout		11,049	sf	0.49	5,414
Sub Total - Direct Cost					6,087
General Conditions		20.00%			1,217
Overhead & Profit		23.00%			1,680
Design & Price Reserve		15.00%			1,348
Escalation	May-15	8.16%			843
Bond		3.00%			335
Soft Costs/Design Fees		30.00%			3,453
Total Project Cost					14,963
Generator					
generator - gas 50kw		1	ea	29,760.60	29,761
Sub Total - Direct Cost					29,761
General Conditions		20.00%			5,952
Overhead & Profit		23.00%			8,214
Design & Price Reserve		15.00%			6,589
Escalation	May-15	8.16%			4,122
Bond		3.00%			1,639
Soft Costs/Design Fees		30.00%			16,883
Total Project Cost					73,160

Town Hall - Renovate First Floor And Second Floor Only				
Town Hall - Renovate First Floor And Second Floor Only		7,412 sf	216.60	1,605,439
Sub Total - Direct Cost				1,605,439
General Conditions		12.00%		192,653
Overhead & Profit		14.00%		251,733
Design & Price Reserve		15.00%		307,474
Escalation	Aug-15	8.16%		192,356
Bond		1.60%		40,794
Soft Costs/Design Fees		30.00%		777,135
Total Project Cost				3,367,584

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW POLICE STATION
BRIMFIELD, MA 01010 GFA 4,088

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General					
~~New Police Station~~					~~$~~
~~New Police Station (see cost plan)~~		~~4,088~~	~~sf~~	~~372.80~~	~~1,524,006~~
~~Sub Total - Direct Cost~~					~~1,524,006~~
~~General Conditions~~		~~12.00%~~			~~182,881~~
~~Overhead & Profit~~		~~14.00%~~			~~238,964~~
~~Design & Price Reserve~~		~~15.00%~~			~~291,878~~
~~Escalation~~	~~Aug-15~~	~~8.16%~~			~~182,599~~
~~Bond~~		~~1.60%~~			~~38,725~~
~~Soft Costs/Design Fees~~		~~30.00%~~			~~737,716~~
~~Total Project Cost~~					~~3,196,769~~
Police Station Storage Building					$
Pre-Engineered Steel Building		500	sf	95.57	47,785
Sub Total - Direct Cost					47,785
General Conditions		20.00%			9,557
Overhead & Profit		23.00%			13,189
Design & Price Reserve		15.00%			10,580
Escalation	Aug-15	8.16%			6,619
Bond		3.00%			2,632
Soft Costs/Design Fees		30.00%			27,109
Total Project Cost					117,471

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL NEW ENTRANCE
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Addition Component	GFA(SF):	1,403	Date:	Jul-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		36,113		25.74	7.3%			
A10 Foundations	34,205		24.38			1,403	SF	24.38
A20 Basement Construction	1,908		1.36			1,403	SF	1.36
B SHELL		160,041		114.07	32.4%			
B10 Superstructure	33,756		24.06			1,403	SF	24.06
B20 Exterior Closure	118,650		84.57			3,164	SF	37.50
B30 Roofing	7,635		5.44			509	SF	15.00
C INTERIORS		90,375		64.42	18.3%			
C10 Interior Construction	18,085		12.89			1,403	SF	12.89
C20 Stairs	60,000		42.77			2	FLT	30000.00
C30 Interior Finishes	12,290		8.76			1,403	SF	8.76
D SERVICES		170,821		121.75	34.5%			
D10 Conveying Systems	97,500		69.49			3	stops	32500.00
D20 Plumbing	8,418		6.00			1,403	SF	6.00
D30 HVAC	32,395		23.09			1,403	SF	23.09
D40 Fire Protection	7,717		5.50			1,403	SF	5.50
D50 Electrical Systems	24,791		17.67			1,403	SF	17.67
E EQUIPMENT & FURNISHINGS		4,911		3.50	1.0%			
E10 Equipment	2,806		2.00			1,403	SF	2.00
E20 Furnishings	2,105		1.50			1,403	SF	1.50

COSTPRO INC.

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Addition Component			Date: Jul-13				Sheet No: 2 OF 2	
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		4,139		2.95	0.8%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	4,139		2.95			1,403	SF	2.95
G BUILDING SITEWORK		28,201		20.10	5.7%			
G10 Site Preparation	3,508		2.50			1,403	SF	2.50
G20 Site Improvements	15,573		11.10			1,403	SF	11.10
G30 Site Civil/Mechanical Utilities	7,015		5.00			1,403	SF	5.00
G40 Site Electrical Utilities	2,105		1.50			1,403	SF	1.50
G90 Other Site Construction	0		0.00			1,403	SF	0.00
SUBTOTAL		494,601		352.53	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	494,601	$	352.53				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL RENOVATION AND ADDITION 1ST AND 2ND FLOOR ONLY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Renovation And Addition	GFA(SF):	7,412	Date:	Aug-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		11,506		1.55	0.7%			
A10 Foundations	10,898		1.47			447	SF	24.38
A20 Basement Construction	608		0.08			447	SF	1.36
B SHELL		297,711		40.17	18.5%			
B10 Superstructure	33,756		4.55			1,403	SF	24.06
B20 Exterior Closure	257,250		34.71			6,860	SF	37.50
B30 Roofing	6,705		0.90			447	SF	15.00
C INTERIORS		348,642		47.04	21.7%			
C10 Interior Construction	166,027		22.40			7,412	SF	22.40
C20 Stairs	60,000		8.09			2	FLT	30000.00
C30 Interior Finishes	122,615		16.54			7,412	SF	16.54
D SERVICES		562,308		75.86	35.0%			
D10 Conveying Systems	97,500		13.15			3	STOP	32500.00
D20 Plumbing	59,915		8.08			7,412	SF	8.08
D30 HVAC	211,704		28.56			7,412	SF	28.56
D40 Fire Protection	34,758		4.69			7,412	SF	4.69
D50 Electrical Systems	158,431		21.37			7,412	SF	21.37
E EQUIPMENT & FURNISHINGS		65,001		8.77	4.0%			
E10 Equipment	33,151		4.47			7,412	SF	4.47
E20 Furnishings	31,850		4.30			7,412	SF	4.30

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL RENOVATION AND ADDITION 1ST AND 2ND FLOOR ONLY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Renovation And Addition				Date: Aug-13		Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		90,135		12.16	5.6%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	90,135		12.16			6,009	SF	15.00
G BUILDING SITEWORK		230,164		31.05	14.3%			
G10 Site Preparation	68,646		9.26			7,412	SF	9.26
G20 Site Improvements	81,552		11.00			7,412	SF	11.00
G30 Site Civil/Mechanical Utilities	50,400		6.80			7,412	SF	6.80
G40 Site Electrical Utilities	29,566		3.99			7,412	SF	3.99
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,605,467		216.60	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,605,467	$	216.60				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL RENOVATION AND ADDITION 1ST AND 2ND FLOOR ONLY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Addition Component	GFA(SF):	1,403	Date:	Aug-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		11,506		8.20	1.9%			
A10 Foundations	10,898		7.77			447	SF	24.38
A20 Basement Construction	608		0.43			447	SF	1.36
B SHELL		297,711		212.20	49.3%			
B10 Superstructure	33,756		24.06			1,403	SF	24.06
B20 Exterior Closure	257,250		183.36			6,860	SF	37.50
B30 Roofing	6,705		4.78			447	SF	15.00
C INTERIORS		90,375		64.42	15.0%			
C10 Interior Construction	18,085		12.89			1,403	SF	12.89
C20 Stairs	60,000		42.77			2	FLT	30000.00
C30 Interior Finishes	12,290		8.76			1,403	SF	8.76
D SERVICES		170,821		121.75	28.3%			
D10 Conveying Systems	97,500		69.49			3	STOP	32500.00
D20 Plumbing	8,418		6.00			1,403	SF	6.00
D30 HVAC	32,395		23.09			1,403	SF	23.09
D40 Fire Protection	7,717		5.50			1,403	SF	5.50
D50 Electrical Systems	24,791		17.67			1,403	SF	17.67
E EQUIPMENT & FURNISHINGS		4,911		3.50	0.8%			
E10 Equipment	2,806		2.00			1,403	SF	2.00
E20 Furnishings	2,105		1.50			1,403	SF	1.50

COSTPRO INC.

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Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Addition Component				Date: Aug-13		Sheet No: 2 OF 2			
Uniformat Element (Levels 2&3)		Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F	SPECIAL CONSTRUCTION & DEMOLITION		0		0.00	0.0%			
	F10 Special Construction	0		0.00			0	SF	0.00
	F20 Selective Demolition	0		0.00			0	SF	2.95
G	BUILDING SITEWORK		28,201		20.10	4.7%			
	G10 Site Preparation	3,508		2.50			1,403	SF	2.50
	G20 Site Improvements	15,573		11.10			1,403	SF	11.10
	G30 Site Civil/Mechanical Utilities	7,015		5.00			1,403	SF	5.00
	G40 Site Electrical Utilities	2,105		1.50			1,403	SF	1.50
	G90 Other Site Construction	0		0.00			1,403	SF	0.00
	SUBTOTAL		603,525		430.17	100.0%			
Z10	GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20	CONTINGENCIES	0.0%	0		0.00				
Z30	CM AT RISK PREMIUM	0.0%	0		0.00				
Z90	PROJECT COST ESTIMATE	$	603,525	$	430.17				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL RENOVATION AND ADDITION 1ST AND 2ND FLOOR ONLY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Renovation Component	GFA(SF):	6,009	Date:	Aug-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		0		0.00	0.0%			
A10 Foundations	0		0.00			0	SF	0.00
A20 Basement Construction	0		0.00			0	SF	0.00
B SHELL		0		0.00	0.0%			
B10 Superstructure	0		0.00			0	SF	6.00
B20 Exterior Closure	0		0.00			0	SF	14.82
B30 Roofing	0		0.00			0	SF	12.59
C INTERIORS		258,267		42.98	25.8%			
C10 Interior Construction	147,942		24.62			6,009	SF	24.62
C20 Stairs	0		0.00			0	FLT	65450.00
C30 Interior Finishes	110,325		18.36			6,009	SF	18.36
D SERVICES		391,487		65.15	39.1%			
D10 Conveying Systems	0		0.00			0	STOP	32500.00
D20 Plumbing	51,497		8.57			6,009	SF	8.57
D30 HVAC	179,309		29.84			6,009	SF	29.84
D40 Fire Protection	27,041		4.50			6,009	SF	4.50
D50 Electrical Systems	133,640		22.24			6,009	SF	22.24
E EQUIPMENT & FURNISHINGS		60,090		10.00	6.0%			
E10 Equipment	30,345		5.05			6,009	SF	5.05
E20 Furnishings	29,745		4.95			6,009	SF	4.95

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL RENOVATION AND ADDITION 1ST AND 2ND FLOOR ONLY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Renovation Component			Date: Aug-13			Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		90,135		15.00	9.0%			
F10 Special Construction	0		0.00			0	SF	28.25
F20 Selective Demolition	90,135		15.00			6,009	SF	15.00
G BUILDING SITEWORK		201,963		33.61	20.2%			
G10 Site Preparation	65,138		10.84			6,009	SF	10.84
G20 Site Improvements	65,979		10.98			6,009	SF	10.98
G30 Site Civil/Mechanical Utilities	43,385		7.22			6,009	SF	7.22
G40 Site Electrical Utilities	27,461		4.57			6,009	SF	4.57
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,001,942		166.74	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,001,942	$	166.74				

TOWN OF BRIMFIELD
Massachusetts

EXISTING and PROPOSED TOWN HALL
Program Areas

EXISTING SPACE	EXISTING AREA	NEW USE	PROPOSED AREA GROUND FLOOR ONLY SEE POLICE - TOWN HALL & NEW FOR ROOM NAMES
TOWN HALL - GROUND FLOOR		**Police Department**	
Corridor #1	305	Part of Police	
Corridor #2	543	Corridor#2	423
Corridor #3	238	Stair	238
Toilet #1	64	Toilet #1	64
Toilet #2	64	Toilet #2	64
Unassigned #1	84	Police Department	2271
Unassigned #2	166	Part of Police	
Unassigned #3	131	Part of Police	
Unassigned #4	37	Part of Police	
Unassigned #5	147	Part of Police	
Unassigned #6	131	Part of Police	
Unassigned #7	119	Part of Police	
Mechanical #1	445	Mechanical #1	346
Mechanical #2	147	Mechanical #2	147
Community TV #1	142	Part of Police	
Community #2	409	Part of Police	
		Addition:	
		Elevator	61
		Lobby	162
		Stair	169
BUILDING AREA - GROUND FLOOR	3172		3945

TOWN HALL - FIRST FLOOR		**Council-On-Aging**	
Lobby	190	Lobby	190
Meeting Room	1967	Meeting Room/Reception	1967
Stage	393	Stage	393
Town Clerk #1	467	Part of Kitchen	
Town Clerk #2	232	Part of Kit, Director, Conf & Restrm.	
Storage #1	69	Part of Conference	
Storage #2	92	Corridor	109
Storage #3	113	Storage #3	113
Vault	48	Part of Director	
Outhouse	27	Outhouse	27
		Kitchen	556
		Restroom	63
		Conference Room	102
		Director	80
		Hall	61
		Addition:	
		Elevator	61
		Lobby	162
		Stair	169
BUILDING AREA - FIRST FLOOR	3598		4053

TOWN HALL - SECOND FLOOR			
Meeting Room	576	Meeting Room	576
Stair	126	Stair	126
Attic Access	108	Meeting Room	107
		Addition:	
		Hall	74
		Elevator	61
		Lobby	166
		Stair	169
BUILDING AREA - SECOND FLOOR	810		1279

TOWN HALL - NET ROOM AREA			
Ground Floor	3769		4174
First Floor	3869		4274
Second Floor	819		1305
TOTAL TOWN HALL - TOTAL BUILDING AREA	8457		9753

TOWN HALL - GROSS AREA			
Ground Floor	3987		4496
First Floor	4069		4578
Second Floor	969		1571
TOTAL TOWN HALL - NET GROSS AREA	9025		10645

BUILDING USE AUDIT - CONDITION ASSESSMENT
Town of Brimfield, Massachusetts

Senior Center

20 Main Street

The current Senior Center is located in rented space on the first floor of the First Congregation Church opposite the Town Hall.

General:

Plans were developed to ascertain the useable floor area for the Senior Center.

As this is not a town Owned facility a condition assessment was not performed.

Program:

The Senior Center is located in one large room that has use of the kitchen. This space houses all the functions. There are no private offices but a small room is available should a private conversation be required.

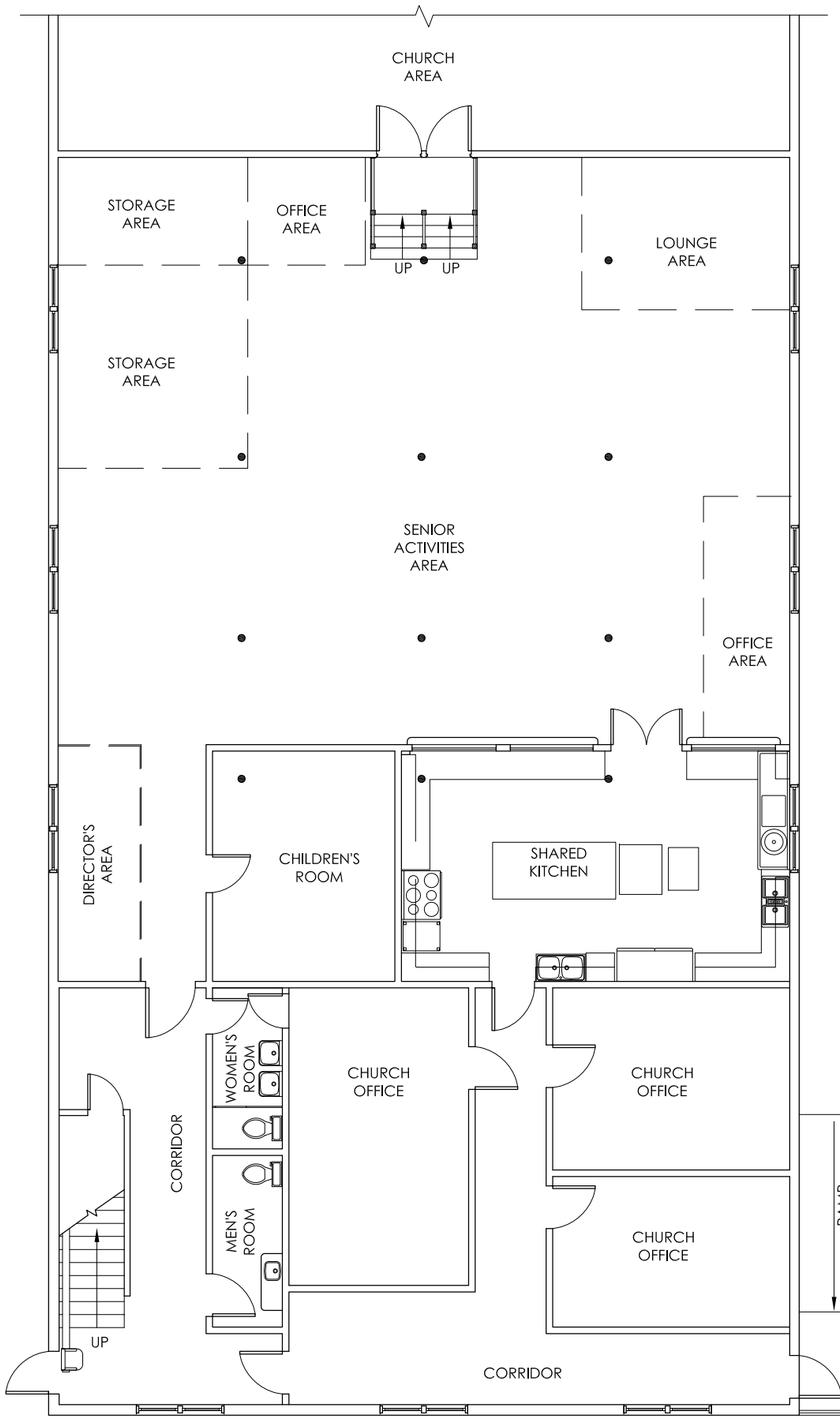
A design for a new Senior Center was previously developed and located to the rear of the Town Hall Annex. The building would have incorporated the Annex Barn, and the link from the Barn to the house would have been demolished. This approach was not pursued due to issues with the well. We chose not to include this as an option as it will preclude the use of the Town Hall Annex.

The Town Hall building has most of the features required for a Senior Center including a large meeting space and smaller office areas on the first and second floor that can accommodate the requirements for this function. A proposed layout for this option was developed.
Senior activities typically occur during the mornings. The meeting space could be used by other Town functions requiring a large space in the evening. These could include Historical Commission meetings, training or public informational meetings that are currently accommodated at the HItchcock Academy. Concerns with this include the ability to secure

Senior Center items. This could be overcome with moveable lockable pods (closets) for the Senior Center items.

In conversations with Conservation there is minimal space available in the Town Center for new construction. If buildable Town land is available elsewhere an option for a new building could be pursued.

REFER TO THE TOWN HALL DOCUMENTS FOR PROPOSED PLANS.



GROUND FLOOR PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING SENIOR CENTER FLOOR PLAN

Scale: 3/32"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 6/21/13

EX-SC1

TOWN OF BRIMFIELD
Massachusetts

COUNCIL ON AGING
Existing Space in Church

EXISTING SPACE	EXISTING AREA
CHURCH	
Senior Activities Area	2302
Shared Kitchen	443
Women's Room	56
Men's Room	59
TOTAL AREA	2860

See Town Hall for Proposed

BUILDING USE AUDIT - CONDITION ASSESSMENT
Town of Brimfield, Massachusetts

Brimfield Town Hall Annex

23 Main Street

Year Constructed:

- Benjamin Salisbury House 1819
- Salisbury Carriage House 1819
- Additions (Most recent) 1990
- New Roof 1996

Construction Type: VB
Fire Sprinklers: No
Building Area per Floor:

Basement:	644 SF
First Floor:	3022 SF
Second Fl:	1330 SF
Total Area:	5042 SF

Documents Used in Study:
Assessor's Field Card
Aerial Photograph

General:

The building is not handicapped accessible:

G Entrance door is located on the east side of the structure and approach is very narrow (4'-3"). Approach clearance on pull side of door does not meet code.
It appears that the ramp in the approach area is more than a 1/12 slope. Changes will be cost prohibitive.

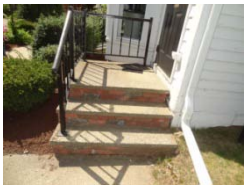
3 Concrete Ramp from parking to the main entrance is badly deteriorated and in need of replacement. Steel structure and exposed rebar rusted. Hand rails are rusted and to low (30" high) without extensions. There is no toe kick on the railings. Ramp should be demolished and a replacement ramp constructed.

3 Re-point brick chimney and provide a stainless steel cap.

3 Paint is peeling around entire structure. Scrape and repaint areas where peeling paint occurs.


3 Roof damage above main entry at skylight. Blue tarp visible in this area. Repair flashing and roofing at skylight.

3 Side entrance concrete steps and landing that are pulling away from the building. They have a rise of 8" and a 4" step in to the building. Metal handrails and railings are low (30") without extensions. It is recommended that steps be removed and door secured shut. Behind the steps is a window into the basement. this should be cleaned and painted.



3 Main Street (North) entrance has a 8" step into building and the concrete stoop is not deep enough for the approach. (2'-4" x 7'-0"). Board from facade missing from below door. Replace stoop with new brick stoop aligned with floor at least 6'-0" deep with steps and railings down to side walk.

3 Wood rot apparent at grade on extension to barn both sides.

3 Replace missing fascia boards and trim from areas around entire structure.


☐ Unused concrete stairs on west side of structure. No action recommended.

3 Foundation wall cracked around west side of building. Re-point wall areas.

3 Brownstone facing to east side of foundation has shifted under bay windows. Re-set stone.

3 Fire escape made of a wood structure on the west side of the building is unusable. Remove platform and patch siding.

3 Window shutters need repair and replacement of missing louvers.

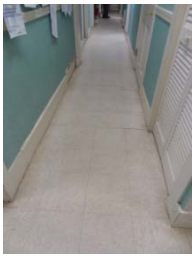
3 Due to status of second floor construction (see structural items below) all doors locked and warning signs installed to prevent use of second floor spaces.

2 In the Meeting room, exterior door from vestibule does not meet required push side area. Remove vestibule and secure door shut.

☐ Rest room is not ADA compliant (area, door knobs and plumbing). One ADA restroom is provided so no action required.

3 Ceiling cracks and damage throughout entire second floor. Paint peeling and water damage throughout. Make repairs to roof.

3 Floors throughout first floor are uneven, either sloping or bowing. (See structural report) Floor areas need to be reinforced structurally or fully replaced.



2 Stair handrail to second floor is loose and needs to be repaired and re-secured.

3 Threshold into Tax Collectors office is raised and not ADA compliant. Replace threshold.

3 Cemetery Commission office has an opening in the ceiling covered and taped with plastic. Replace damaged section of ceiling.

STRUCTURAL

3 First Floor framing over the Basement be thoroughly evaluated and reinforced/permanently re-supported in conjunction with future renovations to the building.

3 First Floor framing over the crawl space be thoroughly evaluated and reinforced as required to increase capacity for the intended use, in conjunction with future renovations to the building. In the meantime, caution should be exercised in placing heavy loads (file cabinets, equipment, etc.) in these areas.

3 Roof and surface drainage needs to be evaluated in conjunction with future renovations to the building. Roof and surface water should be directed away from foundation walls and wall joints should be raked and re-pointed as required.

3 Second Floor framing be thoroughly evaluated and reinforced as required to increase capacity for the intended use, in conjunction with future renovations to the building. In the meantime, caution should be exercised in placing heavy loads (file cabinets, equipment, etc.) at this level.

☐ Hip roof framing over the northern section of the original house is performing satisfactorily; however, it is somewhat undersized with respect to current code requirements.

☐ Review and reinforcing of these areas is recommended, in conjunction with future renovations to the building. In the interim, maintenance personnel should clear drifted snow, should it accumulate during the winter months.

☐ Further review of exterior walls is recommended, in conjunction with future renovations to the building.


3 The handicap ramp on the east side of the original house needs to be replaced.

1 The supporting post for the central, north- south Loft Floor beam in the Barn has been removed. In the absence of the column, this beam has little or no live load capacity. FBRA recommends that the beam be temporarily shored, without delay. Loft Floor joists in the western bay (right hand side in photo at right - 3"x4½" @ 2'-6" o.c., spanning 10½ +/- feet) have minimal live load capacity and have deflected considerably. Joists in this bay be temporarily shored and/or that (storage) loading be removed.

1 The capacity of the wood framed First Floor in the Barn was not determined; however, the floor is considerably uneven throughout, suggesting that there may be damage and/or deficiencies present. These need to be investigated and corrected.

1 A new foundation needs to be constructed if the Barn is retained/rebuilt.

1 The wood framed exterior walls of the Barn are in poor condition and have failed in several locations. Walls need to be reconstructed.

MECHANICAL

3 Upgrade the boiler plant from oil to a gas-fired condensing unit to save energy with better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

3 Replace existing thermostats with programmable type.

ELECTRICAL

3 Provide new lighting, including emergency lighting in the basement.

2 Provide exterior emergency lighting.

PLUMBING

4 The water closets should be replaced by low flow fixtures.

PROGRAM INFORMATION

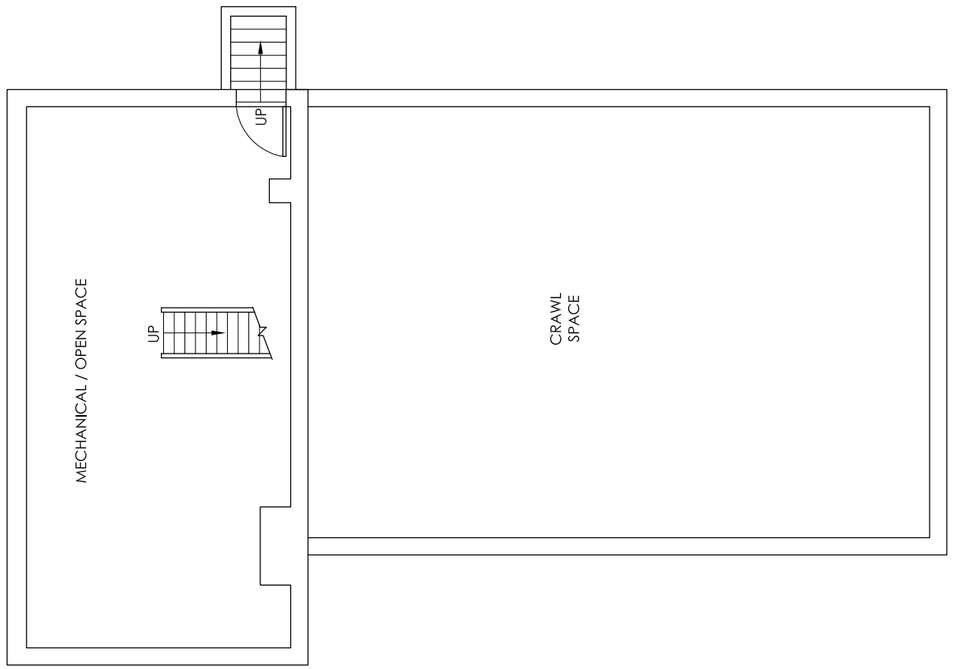
The current building follows the traditional arrangement of New England historic farmhouses often referred to as "Big House, Little House, Back House, Barn". Over the years this has been expanded to create a second floor and to expand the width of the "Little House" portion.

Structurally, the second floor has little carrying capacity and has not been used for occupancy. The first floor will need to be reinforced/replaced to carry the loading for office space use.

The Barn is structurally unsound and needs major repairs to halt further deterioration and possible collapse. The smaller "Back House" is also in poor condition. Low headroom suggests that this portion be removed.

The first option expands the town hall functions around a restored barn and around the existing well. A new accessible entrance will be created, and with a new interior ramp will provide access throughout the first floor of the existing building and addition.

A second option calls for the demolition of the "little house back house and barn" portions and the construction of a two story new wing to the rear of the house. The new wing will provide space for all town offices and the original house would be the museum for historic artifacts and books from the library.



BASEMENT PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

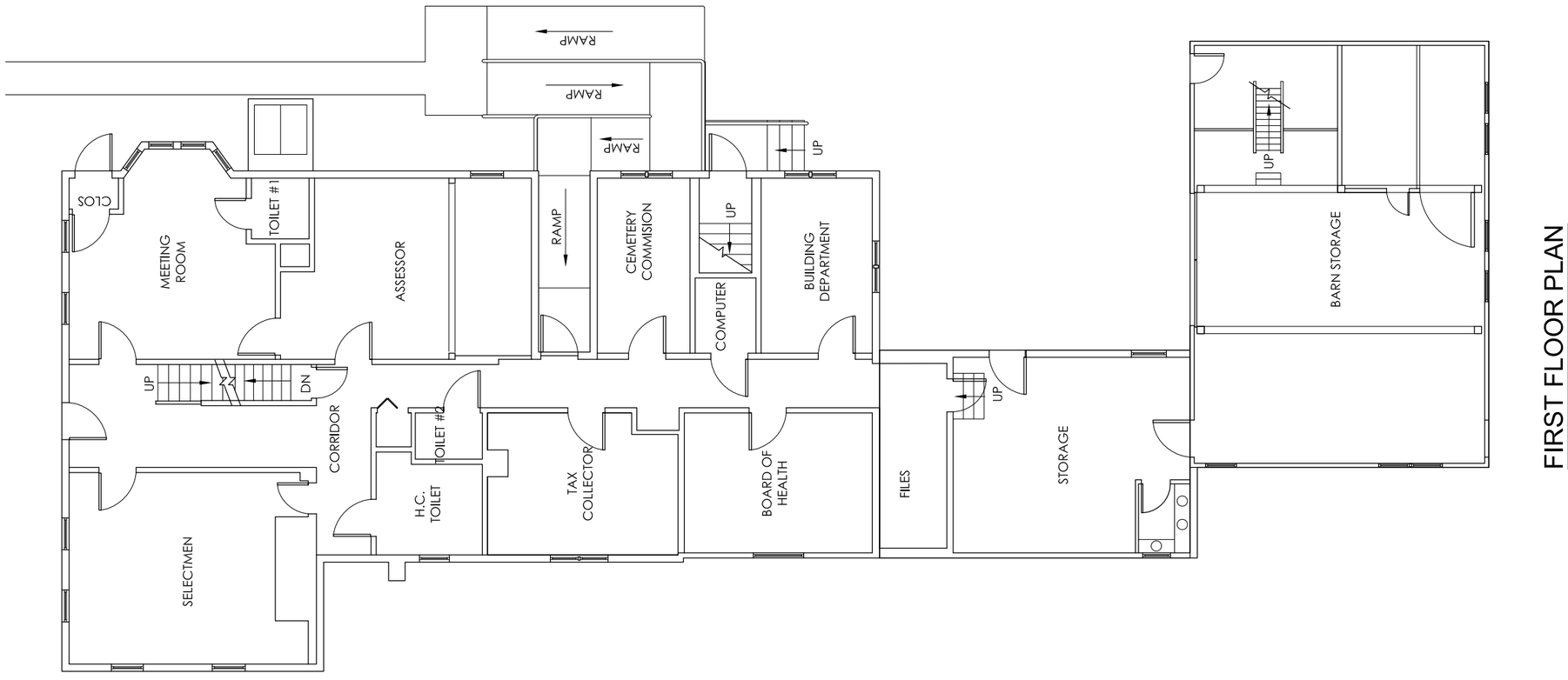
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING TOWN HALL ANNEX BASEMENT PLAN

Scale: 3/32"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 4/17/13

EX-THA1



FIRST FLOOR PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

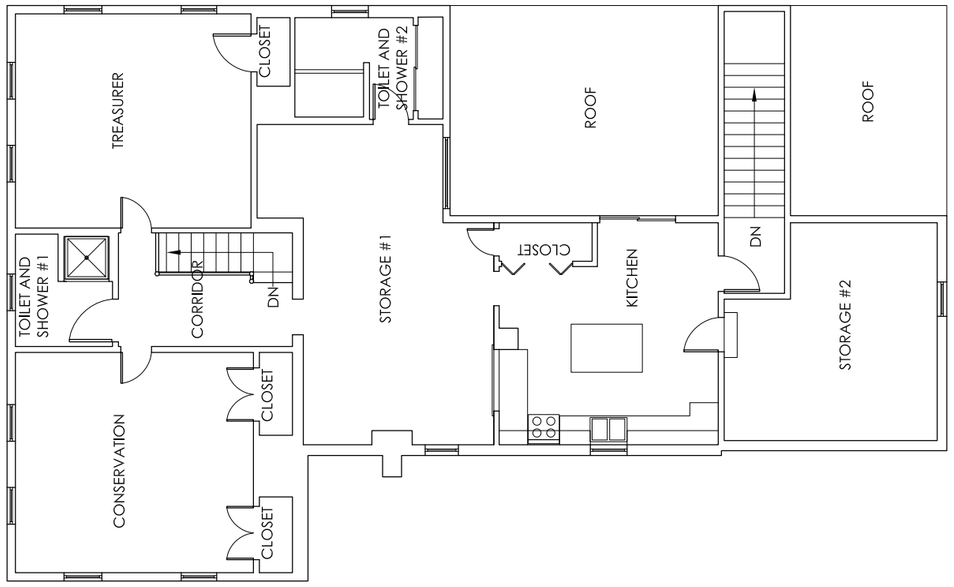
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING TOWN HALL ANNEX FLOOR PLANS

Scale: 3/32"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 4/17/13

EX-THA2



SECOND FLOOR PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

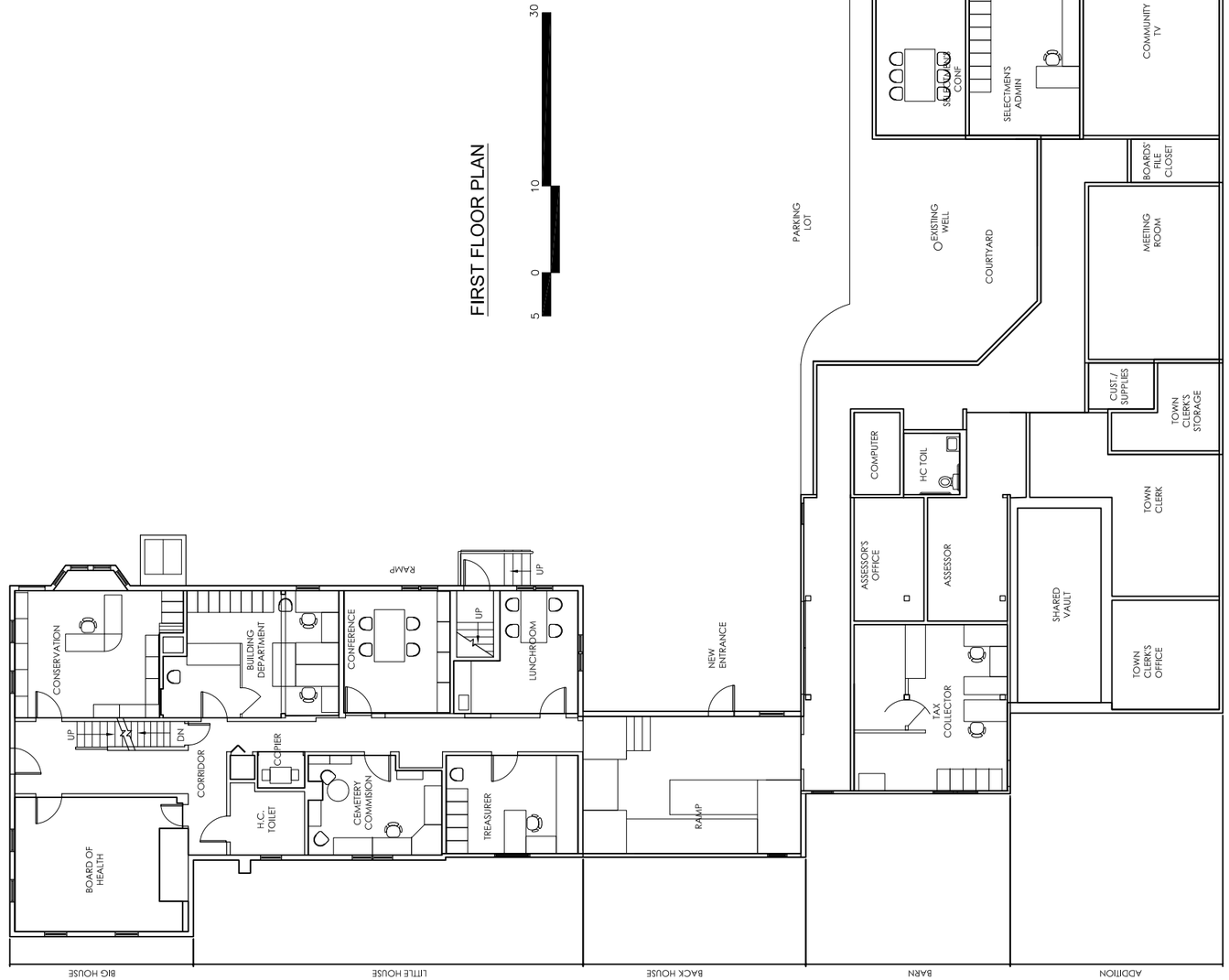
Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING TOWN HALL ANNEX SECOND FLOOR PLAN

Scale: 3/32"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 4/17/13

EX-THA3

FIRST FLOOR PLAN



D·R·A

Drummey Rosane Anderson, Inc.
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Waltham, MA 02451

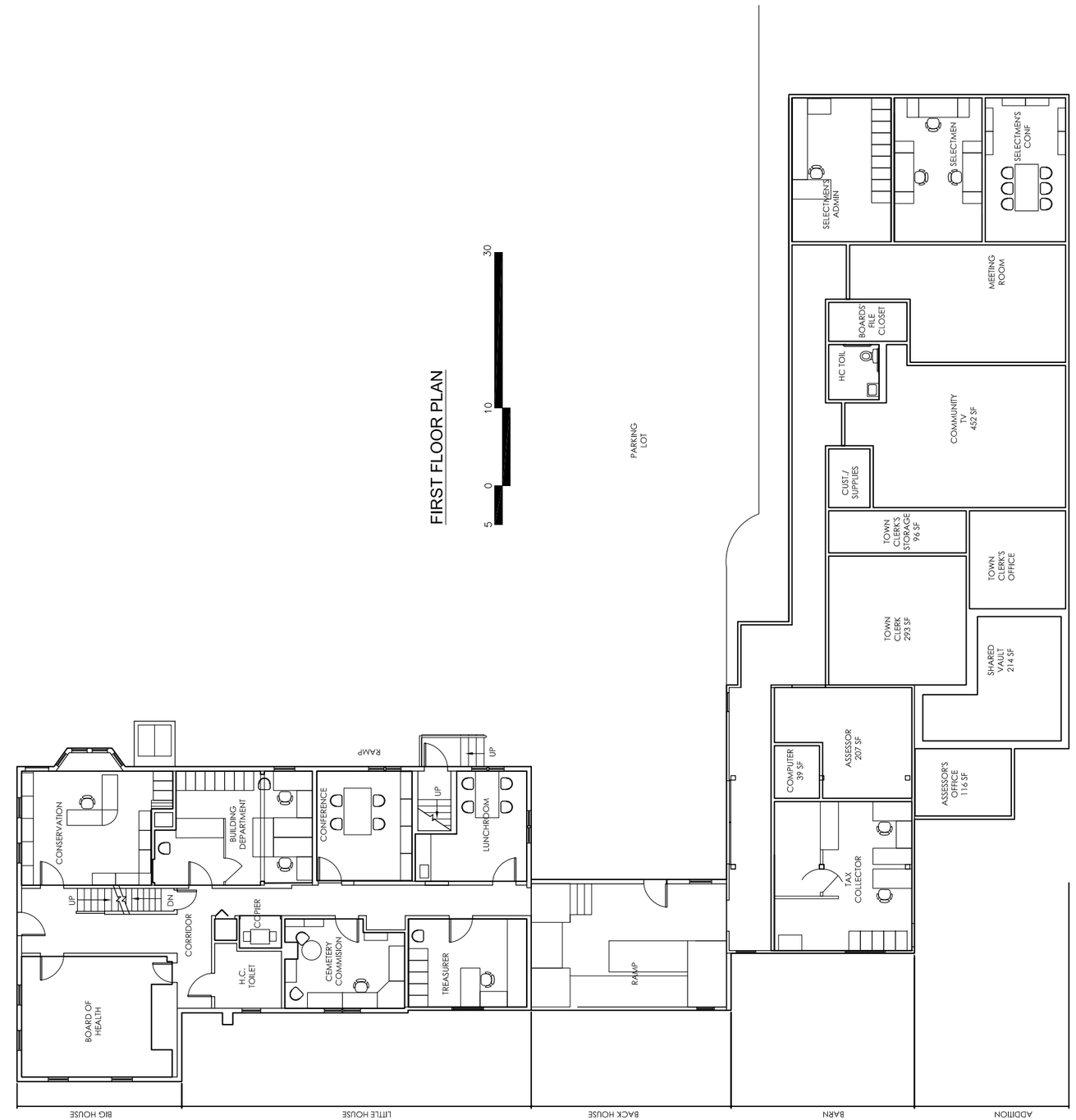
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN HALL ANNEX FLOOR PLANS
SINGLE STORY SCHEME

Scale:	1/16" = 1'-0"
Drawn by:	
Job No.	13002.00
Date:	4/17/13

PR-THA1



D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN HALL ANNEX FLOOR PLANS
REVISED SINGLE STORY SCHEME

Scale: 1/16" = 1'-0"
Drawn by:
Job No. 13002.00
Date: 9-12-13

PR-THA1r

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN HALL ANNEX FLOOR PLANS
TWO STORY SCHEME

Scale: 1/16" = 1'-0"
Drawn by:
Job No. 13002.00
Date: 7-9-13

PR-THA2

FIRST FLOOR PLAN

PR-TB-1

Scale: 1/16" = 1'-0"
Drawn by:
Job No. 13002.00
Date: 9-16-13

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED TOWN BUILDING FLOOR PLANS
TOWN HALL - SENIOR CENTER - POLICE

D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road 4th Floor
Waltham, MA 02451
Planning
Architecture
Interior Design
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617-964-1701 fax
info@draws.com

Town Office Annex and Barn

Structural

Structural Description:

The Brimfield Town Office Annex is a two-story, wood framed structure (plus a partial Basement), located at 23 Main Street, adjacent to the Town Hall. The former Benjamin Salisbury House, constructed in 1819, is listed on the National Register of Historic Places. The facility consists of the original house with a Barn in the back, connected to the house by a one-story link structure.

The Town Office Annex is rectangular in plan, with a sloping roof (intersecting hips). There is a partial (unoccupied) Basement, located under the front (north) section of the original house. A crawl space was constructed to the south of the Basement. Program elements at the First Floor include Town Offices (Selectmen and various Town Departments), a Meeting Room and Bathrooms. Two additional offices, a Kitchen and storage spaces are located at the Second Floor. The First Floor is accessed by a handicap ramp on the east side of the building. The Second Floor is accessed by front and back stairways; there is no elevator. The Barn and the connecting link are used for storage purposes.

Typical foundation walls are rubble stone. Basement Floor construction in the original house consists of a concrete slab on grade (thickness unknown) in limited areas (dirt floor elsewhere). First Floor construction is wood framed; the arrangement of the framing is somewhat disorganized. Over the east and west sides of the Basement, First Floor joists (8" hand-hewn, spaced at 26"+/- o.c.) span approximately 14 feet in the north-south direction to 8"x7" timber beams. The timber beams span 14+/- feet to similar, north-south timber beams on either side of the central, stair bay. Wood joists in this bay span in the east-west direction, approximately 10 feet. A number of adjustable steel pipe columns have been installed (12+/- total) to shore up the First Floor construction in this area. To the south of the Basement, First Floor construction consists of 1¾" x 6¾" wood joists spaced at 21"+/- o.c., spanning in the north-south direction. Attic Floor construction in the south section consists of 2"x 6½" joists spaced at 22½"+/- o.c., spanning 8+/- feet in the north-south direction and mortised into an 8"x 7¼" beam that clear spans the space (approximately 16 feet). Second Floor framing details could not be determined; however, the construction appears to be similar to that at the Attic level.

The southern section of the Second Floor is approximately 8 inches higher (one riser) than the front/northern section. Hip roof construction at the front (north) section of the building consists of 5"x 4½" rafters spaced at 32"+/- o.c. spanning to a central, east-west ridge beam and hip members on the east and west sides. Roof framing for the intersecting hip to the south could not be observed, but is expected to be similar. The present roof is asphalt shingles.

The gable roof of the link structure is framed with 4x4 rafters spaced at 2'-0"+/- o.c., spanning in the east-west direction to a ridge nailer. Rafters are tied across the space (approximately 16 feet) by 2x8 ceiling joists. The floor of the link building is a concrete slab on grade (thickness unknown). The roof is asphalt shingles.

The Barn is a timber framed structure with a Loft and a structured First Floor. Roof framing members were exposed to view; however, sizes could not be determined. Loft Floor construction consists of 3"x7" or 3"x4½" joists, spaced at 2'-6"+/- o.c. spanning 10½+/- feet in the east-west direction to 7½"x7½" timber beams. It appears that an original support post may have been removed in the past; the north-south span for this timber beam is approximately 24 feet. First Floor construction is wood framed; sizes/spans and the arrangement of framing were not determined during the site visit. The First Floor of the Barn is approximately 8" (one riser) above the floor of the link structure.

No original construction drawings or previous structural reports for the Annex or the Barn were available.

Structural Conditions/Issues – Comments and Recommendations:

Structural conditions at the Brimfield Town Office Annex and Barn were observed (to the extent possible) during a brief tour of the facility on May 13, 2013. A number of foundation and framing deficiencies were observed, as noted below.

- The front (northern) section of the First Floor in the original house appears to be relatively stiff under foot, as the framing has been shored up with adjustable steel pipe columns in numerous locations (photo right). In the absence of the additional supports, the capacity of this framing would be marginal; the supporting timber beams are particularly undersized. FBRA recommends that First Floor framing over the Basement be thoroughly evaluated and reinforced/permanently re-supported in conjunction with future renovations to the building.

- To the south of the Basement, First Floor joists over the crawl space (1¾”x6 ¾” @ 21” o.c. – photo right) in the original house are inadequate for office use. The floor is flexible under foot. The balance of the First Floor structure (further to the south) is flexible and uneven, suggesting that similar conditions are present throughout. FBRA recommends that First Floor framing over the crawl space be thoroughly evaluated and reinforced as required to increase capacity for the intended use, in conjunction with future renovations to the building. In the meantime, caution should be exercised in placing heavy loads (file cabinets, equipment, etc.) in these areas.

- Rubble stone foundation walls in the original house have taken on moisture over the years and show signs of deteriation. Mortar has desintegrated and turned into powder in some areas; elswhere, mortar appears to be relatively intact. FBRA recommends that roof and surface drainage be evaluated in conjunction with future renovations to the building. Roof and surface water should be directed away from foundation walls and wall joints should be raked and repointed as required.

- Second Floor framing in the original house is flexible under foot. The floor construction sags considerably; particularly at the back/southern section. Member sizes/spans could not be determined; however framing may be similar to that observed at the Attic space above. The 8”x 7½” beam which spans in the east-west direction (approximately 16 feet) has limited capacity to support live load. FBRA recommends that Second Floor framing be thoroughly evaluated and reinforced as required to increase capacity for the intended use, in conjunction with future renovations to the building. In the meantime, caution should be exercised in placing heavy loads (file cabinets, equipment, etc.) at this level.

- Hip roof framing over the northern section of the original house is performing satisfactorily; however, it is somewhat undersized with respect to current code requirements.

- Gable roof framing over the link structure is performing satisfactorily and nearly meets current snow load requirements for Brimfield. However, there are potential snow drift areas adjacent to the Barn and the original house (photo right). Review and reinforcing of these areas is recommended, in conjunction with future renovations to the building. In the interim, maintenance personnel should clear drifted snow, should it accumulate during the winter months.

- The condition of the exterior walls in the original house could not be determined; however, the northeast corner of the structure is not plumb. The corner walls tilt inwards to the south and to the west. Further review is recommended, in conjunction with future renovations to the building.

- The handicap ramp on the east side of the original house (photos right) has deteriorated significantly; likely due to moisture and de-icing salts. Repair or replacement is required.

- Wood framing in the original house may typically be protected (to a degree) by the ceiling construction; however, elsewhere it is unprotected. There are no sprinklers. Fire rating requirements should be reviewed in conjunction with future renovations to the facility.

- As noted above, it appears that a supporting post for the central, north- south Loft Floor beam in the Barn has been removed. In the absence of the column, this beam has little or no live load capacity. FBRA recommends that the beam be temporarily shored, without delay. Loft Floor joists in the western bay (right hand side in photo at right - 3”x4½” @ 2’-6” o.c., spanning 10½ +/- feet) have minimal live load capacity and have deflected considerably. FBRA recommends that joists in this bay be temporarily shored and/or that (storage) loading be removed.

- The capacity of the wood framed First Floor in the Barn was not determined; however, the floor is considerably uneven throughout, suggesting that there may be damage and/or deficiencies present.

- Barn roof construction was observed (from a distance) and generally appears to be performing satisfactorily; however, walls and foundations supporting this construction are in poor condition, as noted below.

- The rubble stone foundations of the Barn are in poor condition (photo right) and have failed in some locations (e.g. the southwest corner). It appears that the foundation is beyond repair, FBRA recommends that a new foundation be constructed if the Barn is retained/rebuilt.

- The wood framed exterior walls of the Barn are in poor condition and have failed in several locations. Walls are bowing out at the First Floor and Loft Floor levels on the back (south) and west sides of the structure. Wall construction at the southeast corner has failed. There are a number of areas where wood trim/cornices are rotted and/or missing, allowing water to enter the building.

<u>Building Code Requirements and Additional Comments</u>:

<u>Massachusetts State Building Code Requirements – General Comments</u>:

Proposed renovations, alterations, repairs and additions to the Brimfield Town Office Annex and Barn would be governed by the provisions of the Massachusetts State Building Code (MSBC – 780 CMR 8th Edition) and the Massachusetts Existing Building Code (MEBC). These documents are based on amended versions of the 2009 International Building Code (IBC) and the 2009 International Existing Building Code (IEBC), respectively.

The MEBC allows the Design Team to choose one of three (3) compliance methods. Structurally, the Prescriptive Compliance Method is preferred. Section 101.5.4.0 of the Massachusetts Amendments (Chapter 34) would require that the existing building be investigated in sufficient detail to ascertain the effects of any proposed work (or change in use) in the area under consideration, and the entire building or structure and its foundations, if impacted by the proposed work or change in use.

<u>Additions – General Comments</u>:

The design and construction of any proposed additions would be conducted in accordance with the Code for new construction. Significant additions should be structurally separated from the existing building by an expansion (seismic) joint to avoid an increase in gravity loads and/or lateral loads to existing structural elements. Smaller additions can be structurally attached to

the existing building, provided they do not increase the demand - capacity ratio of the existing lateral force resisting elements in the building by more than 10%.

Renovations/Alterations – General Comments:

Where proposed alterations to existing structural elements carrying gravity loads results in a stress increase of over 5%, the affected element would need to be reinforced or replaced to comply with the Code for new construction. Proposed alterations to existing structural elements carrying lateral load (perimeter wood walls and Ground Floor masonry walls) which result in an increase in the demand - capacity ratio of over 10% should be avoided, if possible. Essentially, this means that removal of, or major alterations to these walls should be minimized. If this is not avoidable, more significant seismic upgrades/reinforcing will be required; potentially including the addition of lateral force resisting elements (wood shear walls, etc.).

Renovations/Alterations – Anticipated Scope of Structural Work:

Original House and Link Structure

As noted above, First and Second Floor construction appears to be inadequate for office use (as well as other potential uses). The preliminary cost estimate should carry allowances for the following structural work.

- Repair/repointing of original rubble stone foundation walls.
- Address roof drainage and surface drainage around the building perimeter.
- Repair/reinforcing/reconstruction of the First and Second Floor framing, including permanent supports/foundations in the Basement.
- Construction of a new slab on grade in the Basement on compacted granular fill and a vapor barrier.
- Reinforcing of the roof structure; particularly for snow drift conditions at the link structure.
- Repair/reconstruction of the handicap ramp on the east side of the facility.
- Installation of a new elevator, if required by code.
- Installation of a sprinkler system, if required by code or desired by the Town.

Barn

- Based on field observations, it appears that it would be more cost effective to dismantle the Barn and salvage floor and roof framing to be used in a reconstruction effort. Framing deficiencies are pervasive and would be difficult to repair/reinforce in place.

- Once the Barn framing has been dismantled, the existing rubble stone foundation walls should be removed and a new, reinforced concrete foundation should be constructed.

End of Structural Report

TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

Town Hall Annex

23 Main Street

MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEMS

Prepared By:
Consulting Engineering Services
510 Chapman Street, Suite 201
Canton, MA 02021

July 3, 2013

GENERAL

The mechanical, electrical, plumbing, and fire protection systems were reviewed in conformance with the requirements of the following State and National codes and regulations, as applicable:

- Massachusetts State Building Code 8th Edition
- Massachusetts State Fire Prevention Regulations
- NFPA Latest Editions
- Massachusetts Plumbing Code
- Massachusetts Mechanical Code
- Massachusetts Electrical code (NEC 2011 Edition)
- Illuminating Engineering Society of North America (IESNA) Lighting Handbook
- ASHRAE 90.1 Latest Edition

The scope of this study does not include operational assessment of the fixtures and equipment reviewed; it includes only a brief visual review of the fixtures and equipment. Therefore notes regarding the condition of the fixtures and equipment may or may not be indicative of the actual condition of the systems and equipment and/or the expected life of the fixtures and equipment. Therefore it is recommended that services of a qualified technician be retained to evaluate the actual condition of fixtures and equipment prior to replacement.

MECHANICAL

HEATING

The building is served by an oil fired gravity vent hot water boiler located in the basement that is in fair condition. There is a single 275 gallon oil tank in the basement with exterior fill and vent connections piped from the front of the building. The plant consists of (4) zones, each with a dedicated circulator pump, all of which are in good condition. Controls are very basic, wall mounted dial thermostats wired in parallel to a common boiler relay module. The boiler also serves the domestic water heating needs (see Plumbing Section below).

The four heating zones include 3 on the first floor (2 in front, 1 in rear) and the fourth incorporating the entire second floor. Radiation equipment is a combination of steel and cast iron baseboards generally along the perimeter of each room except for a couple of short lengths in the central corridor of the first floor. There is also a small hot water unit heat in the basement that appears to be supplied from one of the first floor zone supply lines.

There are several small lengths of electric baseboard heat in the main corridor on the first floor and at the bottom of the rear stairwell plus a small recessed wall mounted electric cabinet heater in the kitchen on the second floor.

AIR CONDITIONING

There is no central air conditioning system in the building. Several window/wall mount units were noted in the storage area and it is assumed they are used in the warmer months for local room conditioning as needed.

VENTILATION

There is no mechanical ventilation system in the building but there are operable windows throughout that appear to be of adequate free area to meet the natural ventilation code requirements.

There are ceiling cabinet fan/light combination units in each of the first floor bathrooms and in one of the second floor bathrooms but no exhaust at all in the front bathroom on the second floor. There is also a cabinet style exhaust fan mounted in the wall of the stairs leading to the basement that pulls air from the first floor and blows it into the basement. It is unclear what the purpose of this unit is. The electric range/oven in on the second floor has a local recirculation hood over it as well.

RECOMMENDATIONS

Upgrade the boiler plant from oil to a gas-fired condensing unit to save energy with better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

Replace existing thermostats with programmable type.

Provide an exhaust fan to serve the bathroom on the second floor.

ELECTRICAL

EXISTING SYSTEMS

This building appears to be served by (3) electrical services evident by the (3) revenue meters located on the outside of the building.

One electric service is located in the basement. This is a 200amp, single phase electric service. There is a meter socket and panelboard that make up the service equipment. This equipment is in fair to poor condition.

There are newer electrical panels located throughout the building. We believe these are part of the other (2) electrical services, although this could not be verified. These panelboards are in good condition.

The exposed wiring in the basement consists of many different types of wiring. Some of this wiring is very old and in poor condition.

The lighting throughout the building consists or recessed or surface mounted fluorescent fixtures. These fixtures are in good condition.

The lighting in the basement is in poor condition and additional fixtures are required for proper lighting for service, etc.

Emergency lighting consists of two-head self-contained battery units. These units are in good condition.

Exit signs are fluorescent units. These signs are in good condition.

RECOMMENDATIONS

Provide new lighting, including emergency lighting in the basement.

Provide exterior emergency lighting.

PLUMBING

EXISTING SYSTEMS

Cold water is from a well. The pump for the system is in the well, therefore the condition of the pump is not included in this study The compression tank for the system is adjacent to the boiler in the basement, and it appears to be in fair to good condition.

Hot water is provided via a coil in the heating boiler. The hot water discharge from coil is routed through a manually adjustable mixing valve, thereby tempering the water so that it is not too hot at the fixtures.

The exposed water piping in the basement is copper, and it appears to be in fair to good condition. The exposed drain piping in the basement is cast iron, plastic, and copper, and it appears to be in fair to good condition.

The water closet in the main floor restroom is a floor mount vitreous china tank type unit, and it appears to be in good condition. The water closets in the two restrooms upstairs are the floor mount vitreous china tank type units, they are not accessible, and they appear to be in fair to good condition. None of the water closets are low flow.

The lavatory in the main floor restroom is the wall mounted vitreous china type, it is accessible, and it appears to be in good condition. The lavatories in the two restrooms upstairs are the molded into the countertop vitreous china type and they are not accessible. One of the lavatories upstairs appears to be in fair to good condition, whereas the other appears to be in poor to fair condition.

One of the restrooms upstairs has a tub, either vitreous china or enameled steel/cast iron, and it appears to be in fair condition. The shower valve for this tub is not pressure balanced.

The other restroom upstairs has a multiple piece shower surround that appears to be in poor condition. The valve for this shower is not pressure balanced.

The kitchen upstairs has a double bowl stainless steel sink. Both the sink and the faucet appear to be in fair to good condition.

RECOMMENDATIONS

The water closets should be replaced by low flow fixtures.

The lavatory upstairs in fair to poor condition should be replaced.

The multiple piece shower surround should be replaced, and both of the shower valves should be replaced by pressure balanced valves.

FIRE PROTECTION

The building does not have a sprinkler system.

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
	Basic Quantities	GFA		Girth		
	level 1	3,494 sf		397 lf		
	level 2	2,278 sf		216 lf		
	General					
3	Handicapped Ramps					$
	demo half existing handicapped ramp		277	sf	11.48	3,180
	demo existing railings		55	lf	4.97	273
	new handicapped ramp - triple switch back into confined space		1	ea	35,042.79	35,043
	dumpster rental		1	weeks	753.69	754
	load & truck	10 mile round trip	20	cy	56.70	1,134
	dump charges		8	ton	89.37	715
	Sub Total - Direct Cost					41,099
	General Conditions		20.00%			8,220
	Overhead & Profit		23.00%			11,343
	Design & Price Reserve		15.00%			9,099
	Escalation	Aug-15	8.16%			5,692
	Bond		3.00%			2,264
	Soft Costs/Design Fees		30.00%			23,315
	Total Project Cost					101,032
3	Repoint Chimney					$
	cut and repoint chimney		60	sf	31.67	1,900
	install stainless steel chimney cap		1	ea	242.00	242
	staging		60	sf	3.24	194
	Sub Total - Direct Cost					2,336
	General Conditions		20.00%			467
	Overhead & Profit		23.00%			645
	Design & Price Reserve		15.00%			517
	Escalation	Aug-15	8.16%			324
	Bond		3.00%			129
	Soft Costs/Design Fees		30.00%			1,325
	Total Project Cost					$5,743
3	Exterior Painting					$
	scape, sand, prime, paint structure		7,356	sf	2.89	21,259
	Sub Total - Direct Cost					21,259

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			4,252
	Overhead & Profit		23.00%			5,868
	Design & Price Reserve		15.00%			4,707
	Escalation	Aug-15	8.16%			2,945
	Bond		3.00%			1,171
	Soft Costs/Design Fees		30.00%			12,061
	Total Project Cost					$52,263
3	Roof Damage At Main Entry Skylight					$
	demo roof shingles as required	allowance small ar	100	sf	2.42	242
	disposal		1	ea	96.80	97
	flashing at skylight	allowance	16	lf	14.52	232
	new shingles around skylight	allowance	100	sf	3.93	393
	Sub Total - Direct Cost					964
	General Conditions		20.00%			193
	Overhead & Profit		23.00%			266
	Design & Price Reserve		15.00%			213
	Escalation	Aug-15	8.16%			133
	Bond		3.00%		288.95	53
	Soft Costs/Design Fees		30.00%			547
	Total Project Cost					$2,369
3	Side Entrance Steps					$
	demo concrete steps		16	lfr	11.19	179
	demo landing		20	sf	11.19	224
	demo railing		12	lf	3.39	41
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	secure door shut		1	ea	164.55	165
	clean and paint window		1	ea	336.88	337
	Sub Total - Direct Cost					3,483
	General Conditions		20.00%			697
	Overhead & Profit		23.00%			961
	Design & Price Reserve		15.00%			771
	Escalation	Aug-15	8.16%			482
	Bond		3.00%			192
	Soft Costs/Design Fees		30.00%			1,976
	Total Project Cost					$8,562

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
3	Main Street Stoop					$
	demo brick stoop		16	sf	9.68	155
	disposal		1	ea	72.60	73
	new brick stoop		42	sf	51.88	2,179
	guardrails		14	lf	107.32	1,502
	paint guardrails		14	lf	14.70	206
						4,115
	Sub Total - Direct Cost					
			20.00%			823
	General Conditions		23.00%			1,136
	Overhead & Profit		15.00%			911
	Design & Price Reserve		8.16%			570
	Escalation	Aug-15	3.00%			227
	Bond		30.00%			2,335
	Soft Costs/Design Fees					
	Total Project Cost					$10,117
3	Wood Rot At Grade					$
	demo trim at grade		50	lf	1.83	92
	disposal		1	ea	48.40	48
	new trim at grade 1x6		50	lf	5.02	251
	paint trim		72	lf	3.06	220
	Sub Total - Direct Cost					611
	General Conditions		20.00%			122
	Overhead & Profit		23.00%			169
	Design & Price Reserve		15.00%			135
	Escalation	Aug-15	8.16%			85
	Bond		3.00%			34
	Soft Costs/Design Fees		30.00%			347
	Total Project Cost					$1,503
3	Replace Missing Fascia					$
	replace missing fascia around entire stucture and paint		8	days	370.64	2,965
	materials		1	ea	1,785.36	1,785
	Sub Total - Direct Cost					4,750
	General Conditions		20.00%			950
	Overhead & Profit		23.00%			1,311
	Design & Price Reserve		15.00%			1,052
	Escalation	Aug-15	8.16%			658
	Bond		3.00%			262
	Soft Costs/Design Fees		30.00%			2,695
	Total Project Cost					$11,678

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

COSTPRO, INC.

	Description	Note		Quantity	Unit	Price	Total
3	Cracked Foundation Wall						$
	repair cracked foundation			1	ea	324.25	324
	repoint wall area	small area		10	sf	31.67	317
	Sub Total - Direct Cost						641
	General Conditions			20.00%			128
	Overhead & Profit			23.00%			177
	Design & Price Reserve			15.00%			142
	Escalation		Aug-15	8.16%			89
	Bond			3.00%			35
	Soft Costs/Design Fees			30.00%			364
	Total Project Cost						$1,576
3	Reset Stone Under Bay Window						$
	reset stone under bay window	allowance		2	days	883.74	1,767
	repoint stone	allowance		48	sf	31.67	1,520
	Sub Total - Direct Cost						3,287
	General Conditions			20.00%			657
	Overhead & Profit			23.00%			907
	Design & Price Reserve			15.00%			728
	Escalation		Aug-15	8.16%			455
	Bond			3.00%			181
	Soft Costs/Design Fees			30.00%			1,865
	Total Project Cost						$8,080
3	Fire Escape						$
	remove fire escape	laborer		1	day	422.30	422
	dumpster rental			1	weeks	734.71	735
	load & truck	10 mile round trip		20	cy	55.27	1,105
	dump charges			8	ton	87.12	697
	patch siding as required	carpenter		1	day	542.64	543
	materials	allowance		1	ea	115.60	116
	Sub Total - Direct Cost						3,618
	General Conditions			20.00%			724
	Overhead & Profit			23.00%			999
	Design & Price Reserve			15.00%			801
	Escalation		Aug-15	8.16%			501
	Bond			3.00%			199
	Soft Costs/Design Fees			30.00%			2,053
	Total Project Cost						8,895

	Description	Note		Quantity	Unit	Price	Total
3	Window Shutters						$
	repair/replace missing louvers			33	ea	271.32	8,954
	paint shutters			33	ea	153.13	5,053
	Sub Total - Direct Cost						14,007
	General Conditions			20.00%			2,801
	Overhead & Profit			23.00%			3,866
	Design & Price Reserve			15.00%			3,101
	Escalation		Aug-15	8.16%			1,940
	Bond			3.00%			771
	Soft Costs/Design Fees			30.00%			7,946
	Total Project Cost						$34,432
3	Second Floor Doors Locked And Signage						$
	lock all second floor doors	allowance		7	loc	92.27	646
	signage	allowance		7	ea	91.96	644
	Sub Total - Direct Cost						1,290
	General Conditions			20.00%			258
	Overhead & Profit			23.00%			356
	Design & Price Reserve			15.00%			286
	Escalation		Aug-15	8.16%			179
	Bond			3.00%			71
	Soft Costs/Design Fees			30.00%			732
	Total Project Cost						$3,172
3	Remove Vestibule						$
	demo wall	small area		96	sf	2.42	232
	demo door/frame/hardware			1	ea	47.96	48
	disposal			1	ea	96.80	97
	secure door shut			1	ea	164.55	165
	patch finishes as required			1	ea	578.00	578
	Sub Total - Direct Cost						1,120
	General Conditions			20.00%			224
	Overhead & Profit			23.00%			309
	Design & Price Reserve			15.00%			248
	Escalation		Aug-15	8.16%			155
	Bond			3.00%			62
	Soft Costs/Design Fees			30.00%			635
	Total Project Cost						$2,753

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

	Description	Note		Quantity	Unit	Price	Total
3	Ceiling Cracks And Roof						$
	misc. roof repairs and flashings			2,278	sf	4.84	11,026
	Sub Total - Direct Cost						11,026
	General Conditions			20.00%			2,205
	Overhead & Profit			23.00%			3,043
	Design & Price Reserve			15.00%			2,441
	Escalation		Aug-15	8.16%			1,527
	Bond			3.00%			607
	Soft Costs/Design Fees			30.00%			6,255
	Total Project Cost						$27,104
3	First Floor Floors						$
	reinforce floors as required from basement	allowance		3,494	sf	14.52	50,733
	repair floor finishes as required	allowance		3,494	sf	1.94	6,778
	Sub Total - Direct Cost						57,511
	General Conditions			20.00%			11,502
	Overhead & Profit			23.00%			15,873
	Design & Price Reserve			15.00%			12,733
	Escalation		Aug-15	8.16%			7,966
	Bond			2.40%			2,534
	Soft Costs/Design Fees			30.00%			32,436
	Total Project Cost						$140,555
2	Handrail To Second Floor						$
	repair handrail and resecure			12	lf	33.88	407
	Sub Total - Direct Cost						407
	General Conditions			20.00%			81
	Overhead & Profit			23.00%			112
	Design & Price Reserve			15.00%			90
	Escalation		Aug-15	8.16%			56
	Bond			3.00%			22
	Soft Costs/Design Fees			30.00%			230
	Total Project Cost						$998
3	Threshold						$
	demo threshold			3	lf	48.40	145
	disposal			1	ea	24.20	24
	new thereshold			3	lf	30.86	93
	Sub Total - Direct Cost						262

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			52
	Overhead & Profit		23.00%			72
	Design & Price Reserve		15.00%			58
	Escalation	Aug-15	8.16%			36
	Bond		3.00%			14
	Soft Costs/Design Fees		30.00%			148
	Total Project Cost					$642
3	Cemetery Office Ceiling					$
	repair ceiling	small area	8	sf	18.38	147
	paint ceiling	small area	106	sf	2.72	288
	Sub Total - Direct Cost					435
	General Conditions		20.00%			87
	Overhead & Profit		23.00%			120
	Design & Price Reserve		15.00%			96
	Escalation	Aug-15	8.16%			60
	Bond		3.00%			24
	Soft Costs/Design Fees		30.00%			247
	Total Project Cost					$1,069
	Structural					
3	First Floor Framing					$
	reinforce floors as required from basement	allowance	3,494	sf	14.52	50,733
	repair floor finishes as required	allowance	3,494	sf	1.94	6,778
	Sub Total - Direct Cost					57,511
	General Conditions		20.00%			11,502
	Overhead & Profit		23.00%			15,873
	Design & Price Reserve		15.00%			12,733
	Escalation	Aug-15	8.16%			7,966
	Bond		2.40%			2,534
	Soft Costs/Design Fees		30.00%			32,436
	Total Project Cost					$140,555
2	Roof And Surface Water					$
	gutters	allowance	405	lf	22.26	9,015
	downspouts	allowance	288	lf	30.98	8,922
	piping away from foundation	allowance	128	lf	30.98	3,965
	repoint wall joints as required	allowance	192	lf	31.67	6,081
	Sub Total - Direct Cost					27,983

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

COSTPRO, INC.

	Description	Note		Quantity	Unit	Price	Total
	General Conditions			20.00%			5,597
	Overhead & Profit			23.00%			7,723
	Design & Price Reserve			15.00%			6,195
	Escalation		Aug-15	8.16%			3,876
	Bond			3.00%			1,541
	Soft Costs/Design Fees			30.00%			15,875
	Total Project Cost						$68,790
3	Second Floor Framing						$
	reinforce floors as required	allowance		2,278	sf	14.52	33,077
	repair floor finishes as required	allowance		2,278	sf	1.94	4,419
	Sub Total - Direct Cost						37,496
	General Conditions			20.00%			7,499
	Overhead & Profit			23.00%			10,349
	Design & Price Reserve			15.00%			8,302
	Escalation		Aug-15	8.16%			5,194
	Bond			3.00%			2,065
	Soft Costs/Design Fees			30.00%			21,272
	Total Project Cost						$92,177
3	Handicapped Ramps						$
	demo half existing handicapped ramp			277	sf	11.48	3,180
	demo existing railings			55	lf	4.97	273
	new handicapped ramp - triple switch back into confined space			1	ea	35,042.79	35,043
	dumpster rental			1	weeks	753.69	754
	load & truck	10 mile round trip		20	cy	56.70	1,134
	dump charges			8	ton	89.37	715
	Sub Total - Direct Cost						41,099
	General Conditions			20.00%			8,220
	Overhead & Profit			23.00%			11,343
	Design & Price Reserve			15.00%			9,099
	Escalation		Aug-15	8.16%			5,692
	Bond			3.00%			2,264
	Soft Costs/Design Fees			30.00%			23,315
	Total Project Cost						101,032
1	Supporting Post For Loft						$
	shoring			44	lf	95.60	4,206
	Sub Total - Direct Cost						4,206

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			841
	Overhead & Profit		23.00%			1,161
	Design & Price Reserve		15.00%			931
	Escalation	Aug-15	8.16%			583
	Bond		3.00%			232
	Soft Costs/Design Fees		30.00%			2,386
	Total Project Cost					$10,340
3	Barn First Floor Framing					$
	reinforce floors as required	allowance	833	sf	24.20	20,159
	Sub Total - Direct Cost					20,159
	General Conditions		20.00%			4,032
	Overhead & Profit		23.00%			5,564
	Design & Price Reserve		15.00%			4,463
	Escalation	Aug-15	8.16%			2,792
	Bond		3.00%			1,110
	Soft Costs/Design Fees		30.00%			11,436
	Total Project Cost					$49,556
3	Barn Foundation					$
	jack and reset barn	allowance	833	sf	14.52	12,095
	demo existing foundation	allowance	833	sf	4.84	4,032
	new foundation including slab	allowance	833	sf	24.92	20,758
	Sub Total - Direct Cost					36,885
	General Conditions		20.00%			7,377
	Overhead & Profit		23.00%			10,180
	Design & Price Reserve		15.00%			8,166
	Escalation	Aug-15	8.16%			5,109
	Bond		3.00%			2,032
	Soft Costs/Design Fees		30.00%			20,925
	Total Project Cost					$90,674
3	Barn Walls					$
	demo barn exterior walls	allowance	1,284	sf	14.52	18,644
	temporary shoring	allowance	107	lf	96.80	10,358
	new barn board studded walls	allowance	1,284	sf	4.11	5,277
	dumpster rental		2	weeks	753.69	1,507
	load & truck	10 mile round trip	20	cy	56.70	1,134
	dump charges		8	ton	89.37	715
	Sub Total - Direct Cost					37,635

	Description	Note		Quantity	Unit	Price	Total
	General Conditions			20.00%			7,527
	Overhead & Profit			23.00%			10,387
	Design & Price Reserve			15.00%			8,332
	Escalation		Aug-15	8.16%			5,213
	Bond			3.00%			2,073
	Soft Costs/Design Fees			30.00%			21,350
	Total Project Cost						$92,517
	Mechanical						
4	Replace Oil Fired Equipment						
	remove oil fired equipment			1	ea	753.06	753
	disposal			1	ea	242.00	242
	new gas service - trench only - service by gas company			200	lf	26.18	5,236
	misc. exterior repairs from trench			1	ea	1,936.00	1,936
	cast iron gas boiler	300mbh		1	ea	8,606.06	8,606
	hot water pumps	40gpm		2	ea	2,629.12	5,258
	gas piping allowance	1 1/4"		100	lf	16.95	1,695
	Sub Total - Direct Cost						23,726
	General Conditions			20.00%			4,745
	Overhead & Profit			23.00%			6,548
	Design & Price Reserve			15.00%			5,253
	Escalation		Aug-15	8.16%			3,286
	Bond			3.00%			1,307
	Soft Costs/Design Fees			30.00%			13,460
	Total Project Cost						58,325
3	Replace Existing Thermostats						
	demo existing thermostats	allowance		15	ea	72.60	1,089
	disposal			1	ea	48.40	48
	new thermostats	allowance		15	ea	256.75	3,851
	Sub Total - Direct Cost						4,988
	General Conditions			20.00%			998
	Overhead & Profit			23.00%			1,377
	Design & Price Reserve			15.00%			1,104
	Escalation		Aug-15	8.16%			691
	Bond			3.00%			275
	Soft Costs/Design Fees			30.00%			2,830
	Total Project Cost						12,263

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
	Electrical					
	Upgrade Lighting					
	demo lighting		5,772	sf	0.58	3,348
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	upgrade lighting throughout		5,772	sf	14.75	85,137
	Sub Total - Direct Cost					91,022
	General Conditions		20.00%			18,204
	Overhead & Profit		23.00%			25,122
	Design & Price Reserve		15.00%			20,152
	Escalation	Aug-15	8.16%			12,607
	Bond		2.40%			4,011
	Soft Costs/Design Fees		30.00%			51,335
	Total Project Cost					222,453
2	Upgrade Exterior Lighting					$
	demo exterior lighting fixture	allowance	10	ea	72.60	726
	disposal		1	ea	145.20	145
	upgrade existing exterior lighting to LED	allowance	10	ea	771.00	7,710
	Sub Total - Direct Cost					8,581
	General Conditions		20.00%			1,716
	Overhead & Profit		23.00%			2,368
	Design & Price Reserve		15.00%			1,900
	Escalation	Aug-15	8.16%			1,189
	Bond		3.00%			473
	Soft Costs/Design Fees		30.00%			4,868
	Total Project Cost					$21,095
	Plumbing					
	Upgrade Fixtures To Low Flow					$
	demo fixtures		1	ea	145.20	145
	toilet		1	ea	2,485.34	2,485
	Sub Total - Direct Cost					2,630
	General Conditions		20.00%			526
	Overhead & Profit		23.00%			726
	Design & Price Reserve		15.00%			582
	Escalation	Aug-15	8.16%			364
	Bond		3.00%			145
	Soft Costs/Design Fees		30.00%			1,492
	Total Project Cost					$6,465

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX
BRIMFIELD, MA 01010 GFA 5,772

Description	Note	Quantity	Unit	Price	Total
Town Hall Annex 2 Story Additon/Renovation					$
Town Hall Annex 2 story addition/renovation		8,290	sf	350.66	2,906,971
Sub Total - Direct Cost					2,906,971
General Conditions		10.00%			290,697
Overhead & Profit		12.00%			383,720
Design & Price Reserve		15.00%			537,208
Escalation	Aug-15	8.16%			336,077
Bond		1.60%			71,275
Soft Costs/Design Fees		30.00%			1,357,784
Total Project Cost					$5,883,732
Town Hall Annex 1 Story Additon/Renovation					$
Town Hall Annex 1 story addition/renovation		6,681	sf	297.62	1,988,399
Sub Total - Direct Cost					1,988,399
General Conditions		12.00%			238,608
Overhead & Profit		12.00%			267,241
Design & Price Reserve		15.00%			374,137
Escalation	Aug-15	8.16%			234,060
Bond		1.60%			49,639
Soft Costs/Design Fees		30.00%			945,625
Total Project Cost					$4,097,709

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX RENOVATION AND ADDITION 1 STORY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Annex Renovation And Addit		GFA(SF):	6,681	Date:	Jul-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)		Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A	SUBSTRUCTURE		114,466		17.13	5.8%			
	A10 Foundations	108,418		16.23			4,447	SF	24.38
	A20 Basement Construction	6,048		0.91			4,447	SF	1.36
B	SHELL		703,114		105.24	35.4%			
	B10 Superstructure	227,132		34.00			6,681	SF	34.00
	B20 Exterior Closure	390,377		58.43			5,684	SF	68.68
	B30 Roofing	85,605		12.81			4,447	SF	19.25
C	INTERIORS		279,900		41.89	14.1%			
	C10 Interior Construction	164,486		24.62			6,681	SF	24.62
	C20 Stairs	0		0.00			0	FLT	0.00
	C30 Interior Finishes	115,414		17.27			6,681	SF	17.27
D	SERVICES		484,585		72.53	24.4%			
	D10 Conveying Systems	0		0.00			0	STOP	0.00
	D20 Plumbing	61,392		9.19			6,681	SF	9.19
	D30 HVAC	244,543		36.60			6,681	SF	36.60
	D40 Fire Protection	30,065		4.50			6,681	SF	4.50
	D50 Electrical Systems	148,585		22.24			6,681	SF	22.24
E	EQUIPMENT & FURNISHINGS		89,267		13.36	4.5%			
	E10 Equipment	33,739		5.05			6,681	SF	5.05
	E20 Furnishings	55,528		8.31			6,681	SF	8.31

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX RENOVATION AND ADDITION 1 STORY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Annex Renovation And Addit				Date: Jul-13		Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		42,960		6.43	2.2%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	42,960		6.43			3,494	SF	12.30
G BUILDING SITEWORK		274,088		41.02	13.8%			
G10 Site Preparation	48,676		7.29			6,681	SF	7.29
G20 Site Improvements	89,011		13.32			6,681	SF	13.32
G30 Site Civil/Mechanical Utilities	96,175		14.40			6,681	SF	14.40
G40 Site Electrical Utilities	40,226		6.02			6,681	SF	6.02
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,988,380		297.62	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,988,380	$	297.62				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX RENOVATION AND ADDITION 2 STORY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Annex Renovation And Addit	GFA(SF):	8,290	Date:	Jul-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		106,692		12.87	3.7%			
A10 Foundations	101,055		12.19			4,145	SF	24.38
A20 Basement Construction	5,637		0.68			4,145	SF	1.36
B SHELL		899,252		108.47	30.9%			
B10 Superstructure	386,777		46.66			10,012	SF	38.63
B20 Exterior Closure	432,684		52.19			6,300	SF	68.68
B30 Roofing	79,791		9.62			4,145	SF	19.25
C INTERIORS		613,154		73.96	21.1%			
C10 Interior Construction	246,496		29.73			10,012	SF	24.62
C20 Stairs	196,350		23.69			3	FLT	65450.00
C30 Interior Finishes	170,308		20.54			10,012	SF	17.01
D SERVICES		809,218		97.61	27.8%			
D10 Conveying Systems	65,000		7.84			2	STOP	32500.00
D20 Plumbing	93,513		11.28			10,012	SF	9.34
D30 HVAC	382,984		46.20			10,012	SF	38.25
D40 Fire Protection	45,054		5.43			10,012	SF	4.50
D50 Electrical Systems	222,667		26.86			10,012	SF	22.24
E EQUIPMENT & FURNISHINGS		141,985		17.13	4.9%			
E10 Equipment	50,561		6.10			10,012	SF	5.05
E20 Furnishings	91,424		11.03			10,012	SF	9.13

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL ANNEX RENOVATION AND ADDITION 2 STORY
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Annex Renovation And Addit				Date: Jul-13		Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		56,205		6.78	1.9%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	56,205		6.78			5,772	SF	9.74
G BUILDING SITEWORK		280,465		33.83	9.6%			
G10 Site Preparation	45,609		5.50			10,012	SF	4.56
G20 Site Improvements	102,637		12.38			10,012	SF	10.25
G30 Site Civil/Mechanical Utilities	93,261		11.25			10,012	SF	9.31
G40 Site Electrical Utilities	38,958		4.70			10,012	SF	3.89
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		2,906,971		350.66	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	2,906,971	$	350.66				

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
TOWN HALL
BRIMFIELD, MA 01010 GFA 14,859

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
New Town Complex - Town Hall Component					
New Town Complex - Town Hall Component		6,770	sf	301.10	2,038,474
Sub Total - Direct Cost					2,038,474
General Conditions		6.00%			122,308
Overhead & Profit		6.00%			129,647
Design & Price Reserve		15.00%			343,564
Escalation	Aug-15	8.16%			214,934
Bond		1.34%			38,176
Soft Costs/Design Fees		30.00%			866,131
Total Project Cost					3,753,234
New Town Complex - Police Station Component					
New Town Complex - Police Station Component		4,119	sf	307.40	1,266,190
Sub Total - Direct Cost					1,266,190
General Conditions		6.00%			75,971
Overhead & Profit		6.00%			80,530
Design & Price Reserve		15.00%			213,404
Escalation	Aug-15	8.16%			133,505
Bond		1.34%			23,713
Soft Costs/Design Fees		30.00%			537,994
Total Project Cost					2,331,307
New Town Complex - Senior Center Component					
New Town Complex - Senior Center Component		3,970	sf	309.45	1,228,520
Sub Total - Direct Cost					1,228,520
General Conditions		6.00%			73,711
Overhead & Profit		6.00%			78,134
Design & Price Reserve		15.00%			207,055
Escalation	Aug-15	8.16%			129,533
Bond		1.34%			23,007
Soft Costs/Design Fees		30.00%			521,988
Total Project Cost					2,261,948

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW TOWN HALL - SENIOR CENTER - POLICE STATION
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Town Hall-Senior Center-Police	GFA(SF):	14,859	Date:	Oct-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		382,471		25.74	8.4%			
A10 Foundations	362,263		24.38			14,859	SF	24.38
A20 Basement Construction	20,208		1.36			14,859	SF	1.36
B SHELL		1,392,568		93.72	30.7%			
B10 Superstructure	357,507		24.06			14,859	SF	24.06
B20 Exterior Closure	749,024		50.41			10,906	SF	68.68
B30 Roofing	286,037		19.25			14,859	SF	19.25
C INTERIORS		638,639		42.98	14.1%			
C10 Interior Construction	365,828		24.62			14,859	SF	24.62
C20 Stairs	0		0.00			0	FLT	0.00
C30 Interior Finishes	272,811		18.36			14,859	SF	18.36
D SERVICES		1,162,719		78.25	25.6%			
D10 Conveying Systems	0		0.00			0	STOP	0.00
D20 Plumbing	144,876		9.75			14,859	SF	9.75
D30 HVAC	572,072		38.50			14,859	SF	38.50
D40 Fire Protection	66,866		4.50			14,859	SF	4.50
D50 Electrical Systems	378,905		25.50			14,859	SF	25.50
E EQUIPMENT & FURNISHINGS		262,128		17.64	5.8%			
E10 Equipment	188,575		12.69			14,859	SF	12.69
E20 Furnishings	73,553		4.95			14,859	SF	4.95

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW TOWN HALL - SENIOR CENTER - POLICE STATION
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Town Hall-Senior Center-Police			Date: Oct-13			Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		0		0.00	0.0%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	0		0.00			0	SF	0.00
G BUILDING SITEWORK		694,659		46.75	15.3%			
G10 Site Preparation	74,295		5.00			14,859	SF	5.00
G20 Site Improvements	297,180		20.00			14,859	SF	20.00
G30 Site Civil/Mechanical Utilities	222,885		15.00			14,859	SF	15.00
G40 Site Electrical Utilities	100,299		6.75			14,859	SF	6.75
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		4,533,184		305.08	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	4,533,184	$	305.08				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW TOWN HALL COMBINED
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Component	GFA(SF): 6,770	Date: Oct-13			Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area	%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		174,260	25.74	8.5%			
A10 Foundations	165,053		24.38		6,770	SF	24.38
A20 Basement Construction	9,207		1.36		6,770	SF	1.36
B SHELL		646,087	95.43	31.7%			
B10 Superstructure	162,886		24.06		6,770	SF	24.06
B20 Exterior Closure	352,878		52.12		5,138	SF	68.68
B30 Roofing	130,323		19.25		6,770	SF	19.25
C INTERIORS		290,974	42.98	14.3%			
C10 Interior Construction	166,677		24.62		6,770	SF	24.62
C20 Stairs	0		0.00		0	FLT	65450.00
C30 Interior Finishes	124,297		18.36		6,770	SF	18.36
D SERVICES		529,753	78.25	26.0%			
D10 Conveying Systems	0		0.00		0	STOP	32500.00
D20 Plumbing	66,008		9.75		6,770	SF	9.75
D30 HVAC	260,645		38.50		6,770	SF	38.50
D40 Fire Protection	30,465		4.50		6,770	SF	4.50
D50 Electrical Systems	172,635		25.50		6,770	SF	25.50
E EQUIPMENT & FURNISHINGS		80,902	11.95	4.0%			
E10 Equipment	47,390		7.00		6,770	SF	7.00
E20 Furnishings	33,512		4.95		6,770	SF	4.95

COSTPRO INC.

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Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Town Hall Component				Date: Oct-13		Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		0		0.00	0.0%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	0		0.00			0	SF	2.95
G BUILDING SITEWORK		316,498		46.75	15.5%			
G10 Site Preparation	33,850		5.00			6,770	SF	5.00
G20 Site Improvements	135,400		20.00			6,770	SF	20.00
G30 Site Civil/Mechanical Utilities	101,550		15.00			6,770	SF	15.00
G40 Site Electrical Utilities	45,698		6.75			6,770	SF	6.75
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		2,038,474		301.10	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	2,038,474	$	301.10				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW POLICE STATION COMBINED
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Renovation Component		GFA(SF):	4,119	Date:	Oct-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)		Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A	SUBSTRUCTURE		106,023		25.74	8.4%			
	A10 Foundations	100,421		24.38			4,119	SF	24.38
	A20 Basement Construction	5,602		1.36			4,119	SF	1.36
B	SHELL		386,082		93.73	30.5%			
	B10 Superstructure	99,103		24.06			4,119	SF	24.06
	B20 Exterior Closure	207,688		50.42			3,024	SF	68.68
	B30 Roofing	79,291		19.25			4,119	SF	19.25
C	INTERIORS		177,035		42.98	14.0%			
	C10 Interior Construction	101,410		24.62			4,119	SF	24.62
	C20 Stairs	0		0.00			0	FLT	65450.00
	C30 Interior Finishes	75,625		18.36			4,119	SF	18.36
D	SERVICES		322,313		78.25	25.5%			
	D10 Conveying Systems	0		0.00			0	STOP	32500.00
	D20 Plumbing	40,160		9.75			4,119	SF	9.75
	D30 HVAC	158,582		38.50			4,119	SF	38.50
	D40 Fire Protection	18,536		4.50			4,119	SF	4.50
	D50 Electrical Systems	105,035		25.50			4,119	SF	25.50
E	EQUIPMENT & FURNISHINGS		82,174		19.95	6.5%			
	E10 Equipment	61,785		15.00			4,119	SF	15.00
	E20 Furnishings	20,389		4.95			4,119	SF	4.95

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW POLICE STATION COMBINED
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Renovation Component			Date: Oct-13		Sheet No: 2 OF 2			
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		0		0.00	0.0%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	0		0.00			0	SF	2.95
G BUILDING SITEWORK		192,563		46.75	15.2%			
G10 Site Preparation	20,595		5.00			4,119	SF	5.00
G20 Site Improvements	82,380		20.00			4,119	SF	20.00
G30 Site Civil/Mechanical Utilities	61,785		15.00			4,119	SF	15.00
G40 Site Electrical Utilities	27,803		6.75			4,119	SF	6.75
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,266,190		307.40	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,266,190	$	307.40				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW SENIOR CENTER COMBINED
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Renovation Component		GFA(SF):	3,970	Date:	Oct-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)		Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A	SUBSTRUCTURE		102,188		25.74	8.3%			
	A10 Foundations	96,789		24.38			3,970	SF	24.38
	A20 Basement Construction	5,399		1.36			3,970	SF	1.36
B	SHELL		360,399		90.78	29.3%			
	B10 Superstructure	95,518		24.06			3,970	SF	24.06
	B20 Exterior Closure	188,458		47.47			2,744	SF	68.68
	B30 Roofing	76,423		19.25			3,970	SF	19.25
C	INTERIORS		170,630		42.98	13.9%			
	C10 Interior Construction	97,741		24.62			3,970	SF	24.62
	C20 Stairs	0		0.00			0	FLT	65450.00
	C30 Interior Finishes	72,889		18.36			3,970	SF	18.36
D	SERVICES		310,653		78.25	25.3%			
	D10 Conveying Systems	0		0.00			0	STOP	32500.00
	D20 Plumbing	38,708		9.75			3,970	SF	9.75
	D30 HVAC	152,845		38.50			3,970	SF	38.50
	D40 Fire Protection	17,865		4.50			3,970	SF	4.50
	D50 Electrical Systems	101,235		25.50			3,970	SF	25.50
E	EQUIPMENT & FURNISHINGS		99,052		24.95	8.1%			
	E10 Equipment	79,400		20.00			3,970	SF	20.00
	E20 Furnishings	19,652		4.95			3,970	SF	4.95

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW SENIOR CENTER COMBINED
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Renovation Component			Date: Oct-13			Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		0		0.00	0.0%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	0		0.00			0	SF	2.95
G BUILDING SITEWORK		185,598		46.75	15.1%			
G10 Site Preparation	19,850		5.00			3,970	SF	5.00
G20 Site Improvements	79,400		20.00			3,970	SF	20.00
G30 Site Civil/Mechanical Utilities	59,550		15.00			3,970	SF	15.00
G40 Site Electrical Utilities	26,798		6.75			3,970	SF	6.75
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,228,520		309.45	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,228,520	$	309.45				

TOWN OF BRIMFILED
Massachusetts

TOWN HALL ANNEX
Program Areas

	Currently Shared SpaceS	EXISTING SPACE	EXISTING SPACE ELSEWHERE	EXISTING SPACE NOTES	PROPOSED AREA	SINGLE STORY SCHEME	SINGLE STORY NOTES	TWO STORY SCHEME (SECOND FLOOR SPACES IN BLUE)	TWO STORY NOTES
TOWN HALL ANNEX - BASEMENT									
Mechanical / Open Space		694							
TOTAL TOWN HALL ANNEX - BASEMENT		694			694	694		694	
TOWN HALL ANNEX - FIRST FLOOR & PROPOSED									
Selectmen	1	277			235	235		199	
Selectmen's Administration	1				200	235		202	
Selectmen's Conference Room (6 people)					150	191		154	
Community TV			549	Currently in Town Hall	450	453		504	2nd Floor
Boards' File Closet					50	51		51	
Meeting Room	2	215			300	302		361	
Custodian/Supplies					40	40		72	
Treasurer			250	Currently on 2nd Floor	150	172		153	2nd Floor
Copier	2	25			50	23		290	Incl Mail & Supplies
Town Clerk			468	Currently in Town Hall	300	293		311	
Town Clerk's Office			232	Currently in Town Hall	100	156		100	
Town Clerk's Vault			47	Currently in Town Hall	100	116		107	
Town Clerk's Storage			69	Currently in Town Hall	100	96		100	
Closet		8			8	8			
Assessor	3	274			200	198		198	
Assessor's Office	3				100	114		103	
Assessor's Vault					100	100		107	
Conference Room					150	172		153	2nd Floor
H.C. Toilet		66				112	2 Rooms	157	3 Rooms
Toilet #2		20					Not Required	53	
Tax Collector		167			300	338		317	
Cemetery Commision	4	106			150	164		153	2nd Floor
Harding Fund Municipal Charity	4						In Cemetery Comm.		In Cemetery Comm.
Conservation			260	Currently on 2nd Floor	260	258		317	2nd Floor
Board Of Health		172			250	277		250	2nd Floor
Computer		30			50	50		59	2nd Floor
Building Department		128			275	275		310	
Files		60					In Offices		In Offices
Lunch Room		0			200	159		201	
Office Supply Closet					150		In Offices		See Copier
Storage		277					In Offices	97	2nd Floor
Outhouse		23					Part of Demolition		
Barn Storage		795					See Assessor & Tax Collector		
History Museum			638	Currently in Library				535	
Total Net Area of Rooms		2643			4418	4588		5614	
Unassigned Spaces		624			1325	1775		3825	
TOTAL TOWN HALL ANNEX		3267			5743	6363		9439	

TOWN HALL ANNEX - SECOND FLOOR

Conservation		260
Closet		12
Closet		14
Toilet And Shower #1		51
Treasurer		250
Corridor		98
Closet		11
Storage #1		296
Toilet And Shower #2		72
Kitchen		218
Closet		18
Storage #2		30

TOTAL ANNEX -EXISTING SECOND FLOOR	1330

TOWN HALL ANNEX - NET ROOM AREA		
Basement		694
First Floor		3018
Second Floor		1330

TOTAL TOWN HALL ANNEX - NET ROOM AREA	5042

BUILDING USE AUDIT - CONDITION ASSESSMENT
Town of Brimfield, Massachusetts

Brimfield Public Safety Headquarters

34 Wales Road

Year Constructed:	Unknown
Addition Constructed:	1993
Construction Type:	IIB
Fire Sprinklers:	No
Building Area:	5,647 SF

Documents Used in Study:
Assessor Field Card

General:

The building is not handicapped accessible:

3 One (1) exterior and all interior doors are not equipped with lever hardware. Replace all hardware to meet code.

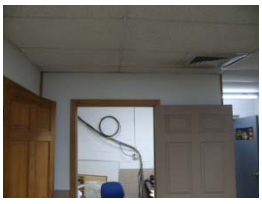
4 One toilet room is in general, but not full compliance with ADA and the other does not comply. Make minor modifications to door and clearances so at least one room fully complies.

3 Doors from Fire Equipment Bays into Day Room and Ambulance Office have door clearance issues. Reconfigure doors and partitions to provide the correct clearance.

3 Day Room kitchen base cabinet has no knee space and is not ADA compliant. Change base cabinets.

☐ The sink in this base cabinet is not connected to any cold/hot water or to a waste line. The water supply is currently contaminated and bottles water is supplied to the facility. See Plumbing.

4 Suspended ceiling panels are aged (dull/dirty & sagging) and need to be replaced.



4 Replace (3) existing single pane steel windows in the Fire Equipment Bays with new insulated metal windows.

2 Install new Vehicle Exhaust Removal System in both the Fire Equipment Bays and Ambulance bays. (8 bays total)

3 Replace damaged existing single door between Day Room & Ambulance Bays with new insulated door.

4 Install new trench drain and associated piping in existing concrete slab in Fire Equipment Bays and Ambulance Bays. (8 bays total)

3 Install new closers on all doors (2 single & 1 double) from the Day Room into Fire / Ambulance Bays.

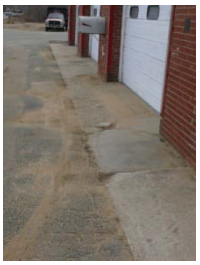
Exterior

3 All existing gutters to be cleaned, reattached to fascia with slope to downspout and all joints and end caps sealed to stop water stains and damage to exterior walls.

3 Water from downspouts be piped away from the building, to minimize damage to cmu wall, foundation and finish grade. Clean all water stains from walls. Fill in all low spots to create a positive slope away from building.

3 Joint between original building and addition at west end is cracked. Saw cut joint and create expansion joint in wall.(Fire Equipment Bay #8)

3 Minor re-pointing of cmu and brick around entire existing building. (5%)



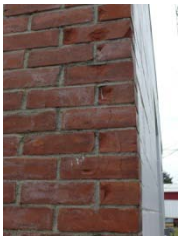
3 Replace aprons at overhead doors at front of building with concrete aprons with frost walls. Aprons to extend at least 4 feet from building.

3 Miscellaneous wood rot / damage and paint peeling at existing Texture 1-11 siding, door / window trim and fascia boards. Patch, prime and re-paint trim. Replace Texture 1-11 with painted cement siding. Replace trim at new siding.

3 Portions of trim at overhead doors are deteriorated or missing. Remove damaged sections and patch remainder. Replace missing trim at overhead door jambs. Repaint.

3 Repaint west wall of east Equipment Bays.

2 Bricks at corner of east wall are spalling. Replace damaged brick. Saw cut a joint between brick and CMU to create an expansion joint. Add filler, backer rod and sealant to joint.



3 Floor at overhead doors in east equipment bays is crack. Cut out damaged portions and replace doweling work into adjacent slabs. (It is suggested that this work be coordinated with the new trench drains and new concrete aprons)

☐ Exterior walls are uninsulated at Equipment Bays.

3 Hose Dryer is in need of replacement.

MECHANICAL

4 Update heating equipment from oil to gas to save energy due to better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

3 Update to programmable type thermostats for control of the furnaces and/or the electric unit heaters.

3 Replace the common area furnace with two units and reconfigure the ductwork to provide better zoning and control. Separate the distribution to the police offices from that of the common area and provide dedicated thermostats for each unit.

3 Provide an exhaust fan in the bathroom adjacent to the EMT office.

3 Provide direct ducted outdoor air for the furnace serving the fire truck garage with a roof cap intake and damper assembly linked to the furnace operation. Also add a general exhaust fan in this garage to operate during occupied periods in conjunction with the furnace.

3 Replace the other garage's electric unit heaters with a warm air furnace and supply air distribution similar to the fire truck garage and provide a direct ducted outdoor air/intake and damper assembly as noted above. Also include a general exhaust fan in this garage to operate in conjunction with the new furnace.

ELECTRICAL

3 The manual transfer switch should be replaced with an automatic transfer switch and controls.

2 New LED exit signs with integral batteries should be provided to replace the existing.

2 The exterior lighting should be replaced with a high-efficiency LED type fixture to improve the lighting levels and reduce energy costs.

2 A fire alarm system should also be added to the facility.

PLUMBING

2 If it is determined that filtration and/or treatment could make the well water potable, a filtration and/or treatment system should be provided such that the well water is potable. As it is likely that the filtration/treatment system will reduce the water pressure to an unacceptable level, the well pump should be replaced by a higher head well pump.

2 Once the well water is made potable, a new faucet should be provided at the sink and it should be (re)connected to the water system.

3 The electric water heater should be replaced in the near future. The new water heater should be provided with a mixing valve, such that 140°F can be maintained in the tank without the possibility of scalding at the fixtures.

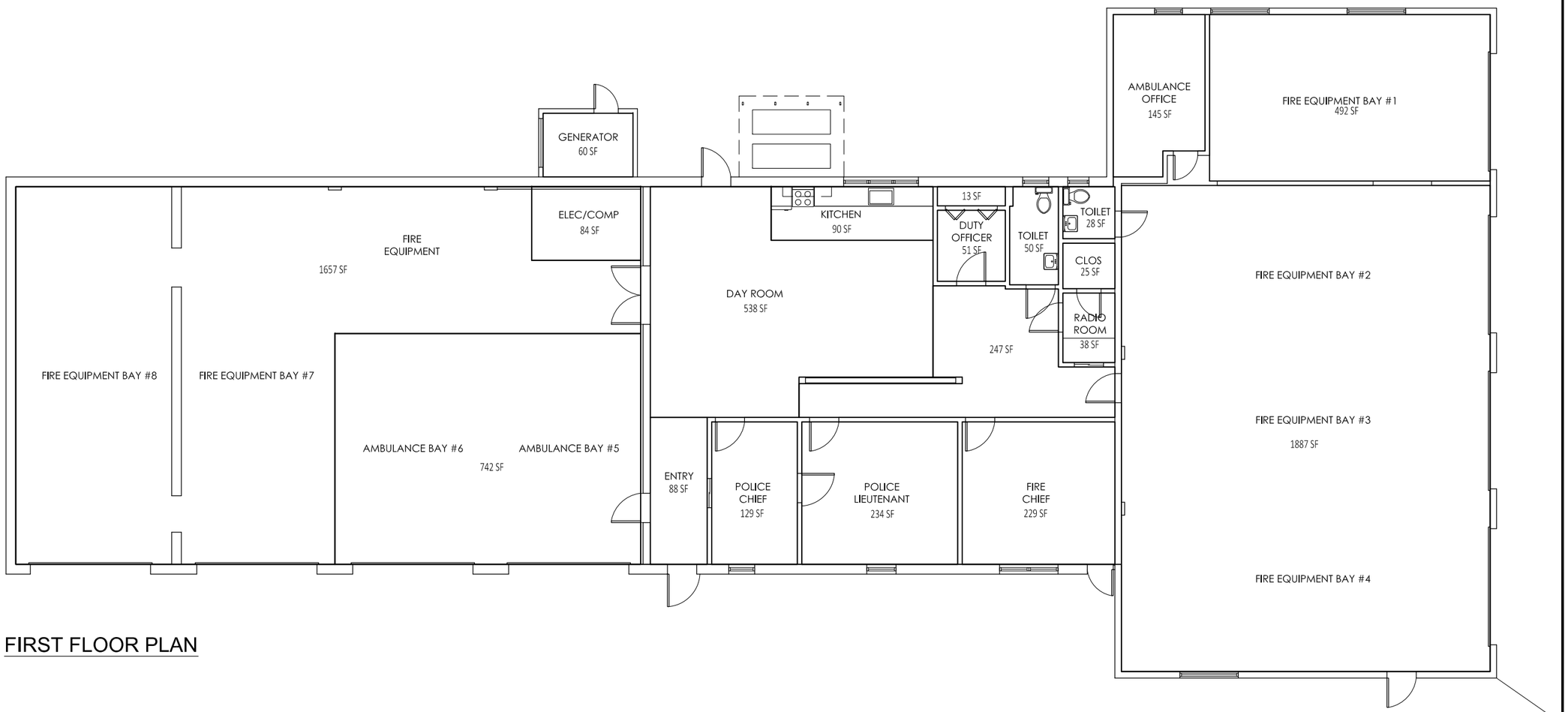
4 Both of the water closets should be replaced with low flow fixtures.

PROGRAM INFORMATION

The building currently serves the Fire and Police departments, and Ambulance service. Workspaces are inadequate and do not meet the needs of the departments. The police were formally housed in Town Hall up until they were moved out due to structural issues with that building. If the police were moved out of this building, either to a new building or back to a renovated Town Hall the current Public Safety Building, with an addition, will be able to meet the needs of the Fire Department and Ambulance service. An addition is necessary to provide bunk rooms and the associated shower and locker rooms for the FD.

Equipment bays are very tight in area and height due to the configuration of the building. It is recommended that the roof of the two west bays be reconstructed to a higher elevation and two new overhead doors be provided on the north and south sides of these bays. With a new driveway along the north side of the building the larger pieces of FD equipment would have drive through bays. Smaller equipment would then be housed in the east end. Ambulance bays will remain in their current locations.

Refer to Public Safety Space Needs and associated Test Fit plans.



FIRST FLOOR PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

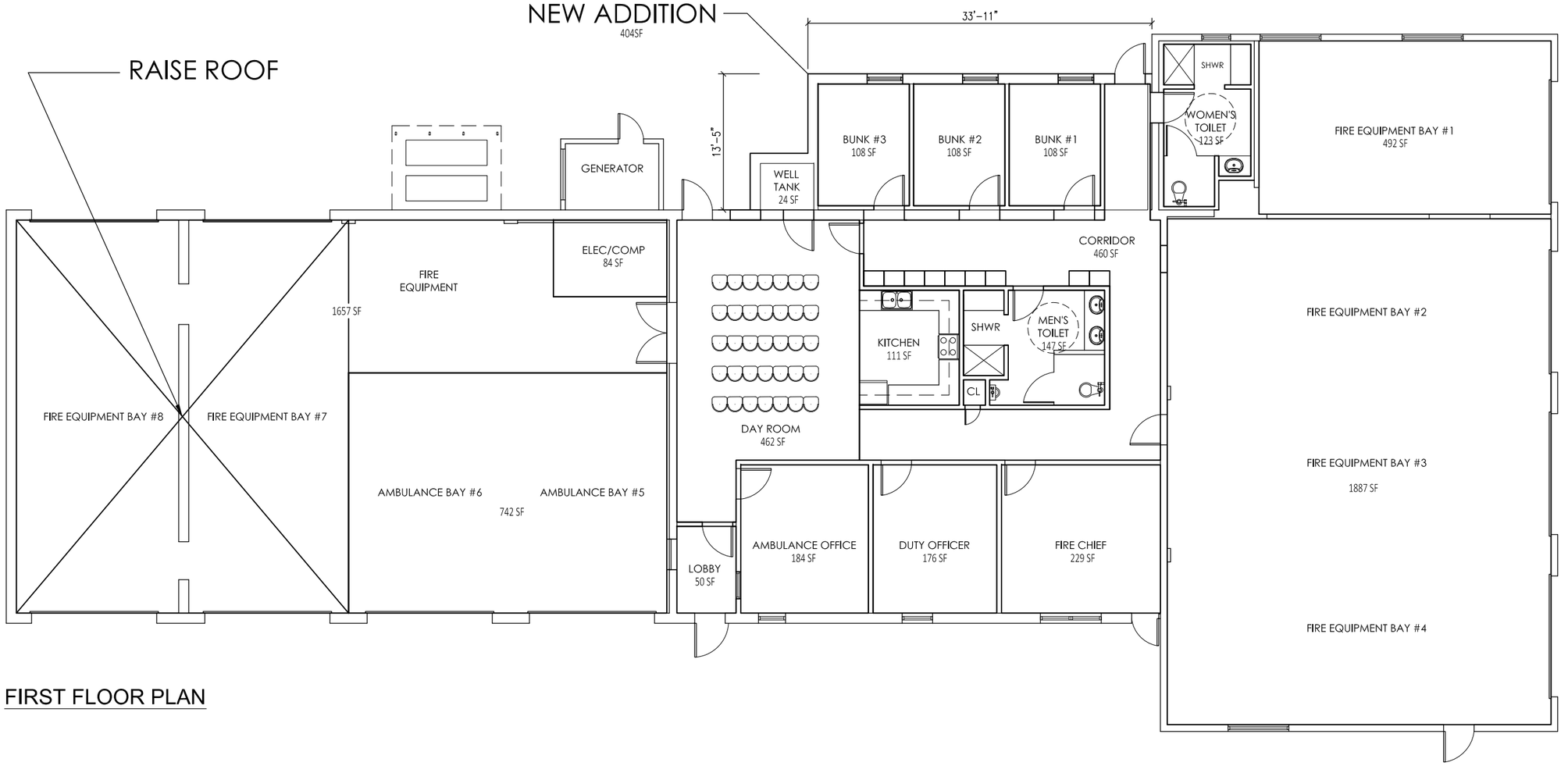
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING PUBLIC SAFETY HEADQUARTERS FLOOR PLAN

Scale: N.T.S.
Drawn by: AJ/CGH
Job No. 13002.00
Date: 4/17/13

EX-PF1



FIRST FLOOR PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

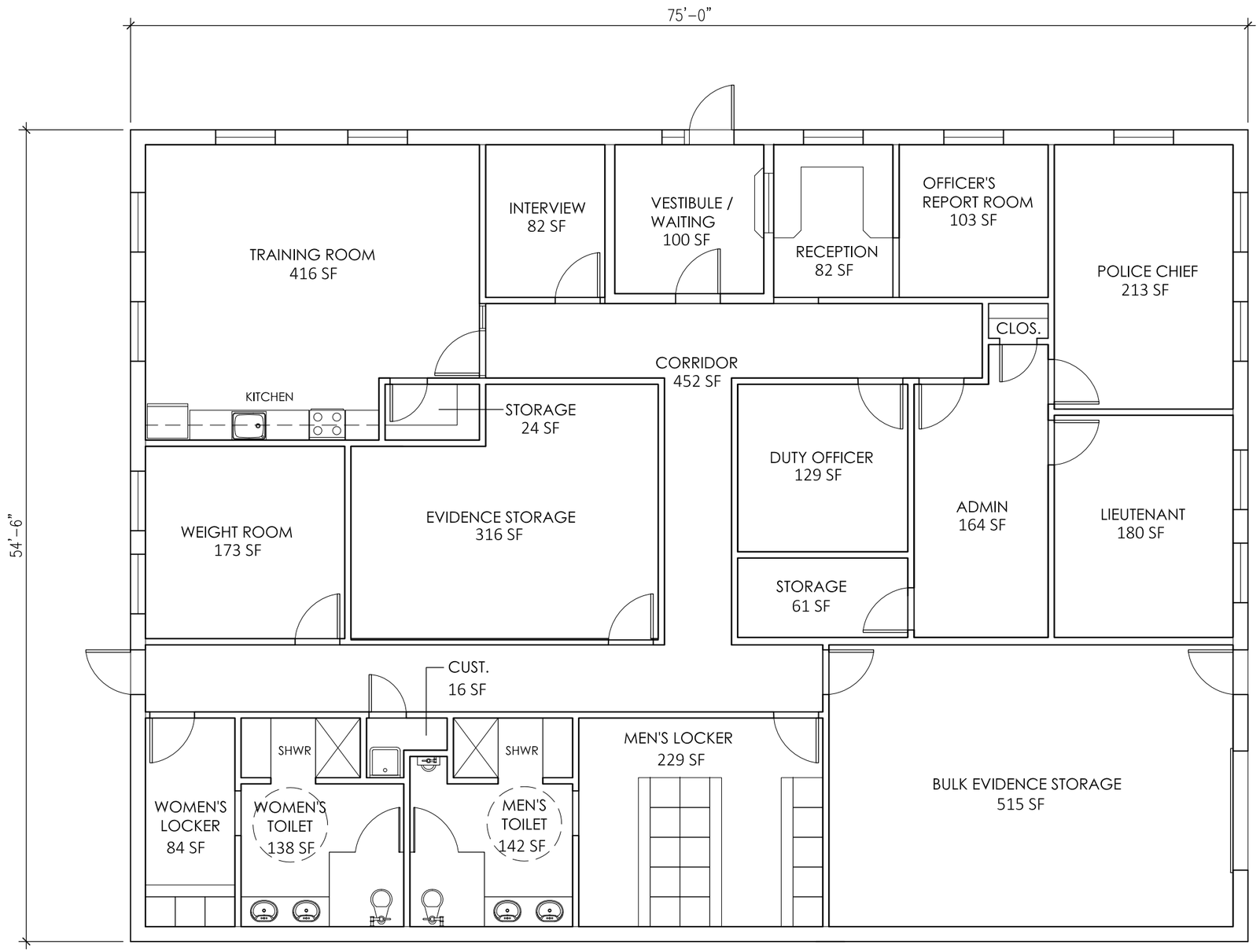
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED PUBLIC SAFETY HEADQUARTERS FLOOR PLAN

Scale: N.T.S.
Drawn by: AJ/KCB
Job No. 13002.00
Date: 7-9-13

PR-PF1



FIRST FLOOR PLAN

GRAPHIC SCALE

5 0 5 10 20

(IN FEET)

D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED POLICE STYATION FLOOR PLAN

Scale:	1/8"=1'-0"
Drawn by:	AJ/KCB
Job No.	13002.00
Date:	7-9-13

PR-POL

Public Safety Headquarters

Structural

Structural Description:

The Public Safety Headquarters is a one-story, steel framed structure, located at 34A Wales Road in Brimfield. The construction date of the building is unknown; however, it appears to be 1970's vintage. The facility is "T" shaped in plan, approximately 150 feet long (east-west) and 70 feet/40 feet wide (front and back sections, respectively). A single Fire Truck bay was added to the north side of the front section sometime after the original construction, increasing the number of Fire Truck bays from three (3) to four (4) in this section.

Offices, a Break Room, Storage spaces and Bathrooms are located behind the front, Fire Truck bays. There are four (4) additional vehicular bays at the western end of the facility, including two Ambulance bays. Roof construction is flat (pitched to drain); the roof of the front section (Fire Truck bays) is several feet higher than that of the western section.

Typical foundation construction is assumed to be conventional spread footings, with a concrete slab on grade First (Ground) Floor. Roof construction over the (higher) front section consists of 1½" deep, narrow rib steel roof deck spanning to 12" deep, open web steel joists. The joists are spaced at 6+/- feet on centers and span approximately 17 feet in the north-south direction to steel beams. Steel beams (W16+W10 composite sections) clear span the bay in the east-west direction, approximately 38 feet. Roof construction over the added bay in this section consists of 1½" deep, wide rib, galvanized steel roof deck spanning to W12 steel beams. The steel beams are spaced at 6+/- feet on centers and span approximately 18 feet in the north-south direction to masonry bearing walls at each end. The roof of the western (Office and Ambulance bay) section is also steel framed, consisting of 1½" deep, narrow rib steel roof deck spanning to 12" deep, open web steel joists. The joists are spaced at 6+/- feet on centers and span approximately 16 feet in the east-west direction to steel beams. Steel beams (W12's, spanning 20+/- feet) are continuous over a an interior W6 column and are supported at the north and south ends by masonry exterior wall construction. Exterior walls are typically solid brick and block construction; 12" thick (8" CMU plus 4" brick veneer). Lateral stability (wind and seismic loads) is provided by interior and perimeter masonry walls (presumably unreinforced) in each direction.

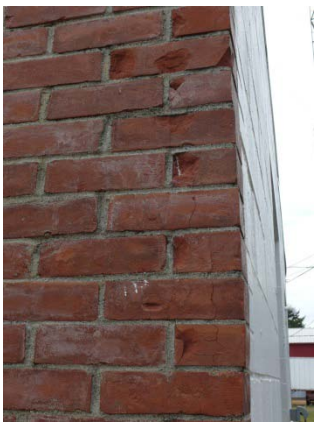
No original construction drawings or previous structural reports were available.

Structural Conditions/Issues – Comments and Recommendations:

Structural conditions at the Public Safety Headquarters were observed during a brief tour of the facility on May 13, 2013. A significant portion of the roof and wall construction was exposed to view, except in the Office area. Ceiling tiles in the Office area were removed, to allow an examination of the roof structure above. Generally speaking, roof construction appears to be performing satisfactorily; there is no evidence of structural distress that would indicate significantly overstressed, deteriorated or failed structural members. Foundations appear to be performing adequately; there are no signs of significant, total or differential settlements. The concrete slab on grade appears to be in satisfactory condition; however, exterior approach slabs at vehicular bays have suffered damage from freeze/thaw action and/or de-icing salts.

Structural/structurally related conditions observed during site visit are noted below:

- The condition of the exterior brick veneer is generally satisfactory; however some cracking was observed and repair/repointing is required in certain locations.



- The capacity of the roof framing was not determined (steel joists are a proprietary design) ; however, roof framing appears to be functioning as originally intended. One area of potential concern is at the junction of the high and low roofs; it does not appear that snow drift loading was accounted for in the original design.

- Steel roof framing is unprotected and has no fire resistance rating. There are no sprinklers. Fire rating requirements should be reviewed in conjunction with future renovations to the facility.

Building Code Requirements and Additional Comments:

Proposed renovations, alterations, repairs and additions to the Brimfield Public Safety Headquarters would be governed by the provisions of the Massachusetts State Building Code (MSBC – 780 CMR 8th Edition) and the Massachusetts Existing Building Code (MEBC). These documents are based on amended versions of the 2009 International Building Code (IBC) and the 2009 International Existing Building Code (IEBC), respectively.

The MEBC allows the Design Team to choose one of three (3) compliance methods. Structurally, the Prescriptive Compliance Method is preferred. Regardless of the compliance method chosen, the MEBC may require that the (presumably unreinforced) masonry walls of the building be evaluated with respect to the provisions of Appendix A1 of the IEBC (depending on the extent of the renovation/alteration work and/or proposed change(s) in use). In addition, Section 101.5.4.0 of the Massachusetts Amendments (Chapter 34) requires that the existing

building be investigated in sufficient detail to ascertain the effects of the proposed work (or change in use) on the area under consideration, and the entire building or structure and its foundations, if impacted by the proposed work or change in use.

Additions – General Comments:

The design and construction of proposed additions would be conducted in accordance with the Code for new construction. Significant additions should be structurally separated from the existing building by an expansion (seismic) joint to avoid an increase in gravity loads and/or lateral loads to existing structural elements. Smaller additions can be structurally attached to the existing building, provided they do not increase the demand - capacity ratio of the existing lateral force resisting elements in the building by more than 10%. Presently, no additions to this building are proposed.

Renovations/Alterations – General Comments:

Where proposed alterations to existing structural elements carrying gravity loads results in a stress increase of over 5%, the affected element will need to be reinforced or replaced to comply with the Code for new construction. Proposed alterations to existing structural elements carrying lateral load (masonry walls in this case) which result in an increase in the demand - capacity ratio of over 10% should be avoided, if possible. Essentially, this means that removal of, or major alterations to the existing, (presumably unreinforced) masonry walls in the building should be minimized. If this is not avoidable, more significant seismic upgrades or reinforcing will be required; potentially including the addition of lateral force resisting elements (braces, shear walls, etc.).

Proposed Alterations and Renovations - Anticipated Scope of Structural Work:

Proposed alterations to the building include raising the height of the roof over the westernmost, two (2) vehicular bays in the building and creating two, higher drive-through Fire Truck bays with roll up doors at the north and south ends. The anticipated scope of structural work would include the following:

- Construct a temporary, wood framed wall at the eastern edge of the work area to protect the remaining portion of the building from weather and construction activities.

- Demolish and remove the existing roof structure in the subject bays, taking necessary precautions not to damage the existing, remaining structure to the east. An option may include salvaging the existing, open web steel roof joists to be used in the construction of the new (higher) roof.

- Provide temporary bracing to keep the structure safe and aligned at all times.

- Demolish and remove the existing masonry walls in the subject bays; including the north, south west and interior (north-south) walls. The existing masonry walls are presumably unreinforced and do not meet current building code requirements. Accordingly, the vertical extension of these walls to support the new, higher roof construction would not be permissible by code.

- Construct new, reinforced masonry bearing walls (8" CMU with a 4" brick veneer) to support the higher roof. The new walls will rest on the existing foundation (with drilled-in dowels) and be reinforced/grouted. Openings for overhead doors will be provided on the north and south sides. On the east side of the new, higher roof, provide a steel column extension above the existing, interior column. The vertical wall defining the step in the roof elevation should be lightweight construction; steel studs and panels.

- Construct a new, steel framed roof at the higher level, with 1½" deep, 20 gauge, Type WR galvanized steel roof deck, open web steel joists (new or salvaged), supported on new, reinforced masonry bearing walls (or new steel beams in the alternate approach). The estimated total weight of structural steel (steel beams, columns and joists) is approximately *9.0 psf*.

End of Structural Report

TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

Police & Fire Building

34 Wales Street

MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEMS

Prepared By:
Consulting Engineering Services
510 Chapman Street, Suite 201
Canton, MA 02021

June 26, 2013

GENERAL

The mechanical, electrical, plumbing, and fire protection systems were reviewed in conformance with the requirements of the following State and National codes and regulations, as applicable:

- Massachusetts State Building Code 8th Edition
- Massachusetts State Fire Prevention Regulations
- NFPA Latest Editions
- Massachusetts Plumbing Code
- Massachusetts Mechanical Code
- Massachusetts Electrical code (NEC 2011 Edition)
- Illuminating Engineering Society of North America (IESNA) Lighting Handbook
- ASHRAE 90.1 Latest Edition

The scope of this study does not include operational assessment of the fixtures and equipment reviewed; it includes only a brief visual review of the fixtures and equipment. Therefore notes regarding the condition of the fixtures and equipment may or may not be indicative of the actual condition of the systems and equipment and/or the expected life of the fixtures and equipment. Therefore it is recommended that services of a qualified technician be retained to evaluate the actual condition of fixtures and equipment prior to replacement.

MECHANICAL

HEATING

An oil fired, gravity vent, hot air furnace hung horizontally near the ceiling within the main fire truck garage serves this area. Supply air distribution is routed to registers generally located to blow towards each overhead door. This unit is controlled from a local dial type thermostat in the garage. This unit has no direct ducted outdoor air and is vented directly through the roof above the unit. The unit was recently replaced and is in excellent condition.

Another oil fired, gravity vent, hot air furnace hung horizontally above the accessible ceiling in the station common room serves this area and adjacent offices, including the police offices. There is a dial type thermostat controlling this unit in the common area. This unit has no direct ducted outdoor air and is vented directly through the roof above the unit. The unit is in fair condition. Both furnaces are fueled from a pair of 330 gallon oil tanks mounted exterior to the rear of the building under an awning.

The garage area on the opposite end of the building from the fire truck garage includes (3) horizontal style electric unit heaters hung from the ceiling near each of the overhead doors blowing into the garage. Each is controlled by a unit mounted dial thermostat.

The EMT's office adjacent to the fire truck garage includes a length of electric baseboard heat with an integral dial thermostat.

AIR CONDITIONING

There are two separate ductless split systems in the building. A 2-ton wall mounted unit serves the common room between the offices with the outdoor unit on grade just outside the rear door. A 1.5-ton wall mounted unit serves the police office with this outdoor unit mounted on a wall stand projecting from the front of the building. Both units have remote controller operating devices and are in good condition.

VENTILATION

There is a ceiling cabinet exhaust fan in the bathroom adjacent to the common space.

The fire truck garage includes (3) ceiling paddle fans for general air circulation that are locally switched on or off.

There is no form of fume or general exhaust in either of the garages.

RECOMMENDATIONS

Update heating equipment from oil to gas to save energy due to better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

Update to programmable type thermostats for control of the furnaces and/or the electric unit heaters.

Replace the common area furnace with two units and reconfigure the ductwork to provide better zoning and control. Separate the distribution to the police offices from that of the common area and provide dedicated thermostats for each unit.

Provide an exhaust fan in the bathroom adjacent to the EMT office.

Provide direct ducted outdoor air for the furnace serving the fire truck garage with a roof cap intake and damper assembly linked to the furnace operation. Also add a general exhaust fan in this garage to operate during occupied periods in conjunction with the furnace.

Replace the other garage's electric unit heaters with a warm air furnace and supply air distribution similar to the fire truck garage and provide a direct ducted outdoor air/intake and damper assembly as noted above. Also include a general exhaust fan in this garage to operate in conjunction with the new furnace.

ELECTRICAL

EXISTING SYSTEMS

The building is served by a single 200 amp electric service and panelboard located in the rear of the apparatus bay. The service equipment is in good condition. There is also a 150amp electrical panel labeled "Emergency" that is fed by the manual transfer switch and generator.

The building also has a 100amp manual transfer switch to which a generator is attached in the event of a power outage. An existing 15kW, 240/120volt diesel fired generator is located in a small addition at the rear of the building. This equipment is in good condition.

The lighting consists of 8' industrial fluorescent fixtures with T8 lamps in the vehicle bays and 2x4 recessed acrylic lensed fixtures in office and other areas. The lighting in the maintenance bays and other areas is adequate.

The exit signs are fluorescent type without batteries. These fixtures are in fair condition.

The exterior lighting consists of wall mounted high pressure sodium fixtures controlled by a time clock. These fixtures are in fair condition.

RECOMMENDATIONS

The manual transfer switch should be replaced with an automatic transfer switch and controls.

New LED exit signs with integral batteries should be provided to replace the existing.

The exterior lighting should be replaced with a high-efficiency LED type fixture to improve the lighting levels and reduce energy costs.

A fire alarm system should also be added to the facility.

PLUMBING

Water is provided by a well pump which serves both the Police and Fire Building and the DPW Building. The expansion tank for the pump and the controls for the pump are in the Police and Fire Building, and they appear to be in fair condition. The pump is in the well, and therefore it's condition is not included in this review.

There is a stainless steel kitchen sink in the meeting/open area, but it does not have a faucet. It appears to be in good condition. Per the staff, the water from the well is not potable, therefore the absence of a faucet.

As the water is not potable, the well water should be tested to check whether or not, with the right filtration/treatment, it would be acceptable for drinking. If so, the appropriate filtration/treatment systems should be provided. Where the filtration/treatment system would create an unacceptable pressure drop on the system, the well pump should be replaced with a larger well pump.

There are no floor drains in any of the apparatus bays.

There is an air compressor in apparatus bay area towards the West. It appears to be in good condition. There is no permanent compressed air piping system in the building; hoses only are connected to the compressor.

A tank type electric water heater in the Police and Fire Building provides hot water for the lavatories. There is no mixing valve provided with the water heater. The water heater appears to be in poor to fair condition, but it also appears to be relatively old, and electric water heaters tend to have relatively short lives, therefore the water heater should be replaced in the near future.

There is an accessible restroom, and both the lavatory and the water closet appear to be in good condition. The water closet is a floor mount vitreous china tank type fixture, and the lavatory is a wall mount vitreous china fixture. The water closet is not a low flow fixture.

There also is a non-accessible restroom, and both the lavatory and the water closet appear to be in fair condition. The water closet is a floor mount vitreous china tank type fixture, and the lavatory is a wall mount vitreous china fixture. The water closet is not a low flow fixture.

FIRE PROTECTION

The building does not have a sprinkler system.

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY
BRIMFIELD, MA 01010 GFA 7,416

Description	Note	Quantity	Unit	Price	Total
Basic Quantities	GFA		Girth		
level 1	7,416 sf		457 lf		
General					
3 Door Hardware					$
replace knob set with levers		14	ea	1,003.76	14,053
remove exterior door hardware		1	ea	68.97	69
disposal		1	ea	145.20	145
exterior door hardware		1	ea	1,563.23	1,563
Sub Total - Direct Cost					15,830
General Conditions		20.00%			3,166
Overhead & Profit		23.00%			4,369
Design & Price Reserve		15.00%			3,505
Escalation	Aug-15	8.16%			2,193
Bond		3.00%			872
Soft Costs/Design Fees		30.00%			8,981
Total Project Cost					$38,916
4 Toilet Rooms					$
minor modifications to door clearance		1	ea	2,890.00	2,890
Sub Total - Direct Cost					2,890
General Conditions		20.00%			578
Overhead & Profit		23.00%			798
Design & Price Reserve		15.00%			640
Escalation	Aug-15	8.16%			400
Bond		3.00%			159
Soft Costs/Design Fees		30.00%			1,640
Total Project Cost					$7,105
3 Doors From Fire Equipment					$
reconfigure doors and partitions to provide correct clearance		4	loc	2,890.00	11,560
Sub Total - Direct Cost					11,560
General Conditions		20.00%			2,312
Overhead & Profit		23.00%			3,191
Design & Price Reserve		15.00%			2,559
Escalation	Aug-15	8.16%			1,601
Bond		3.00%		288.95	637
Soft Costs/Design Fees		30.00%			6,558
Total Project Cost					$28,418

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY
BRIMFIELD, MA 01010 GFA 7,416

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
3	Kitchen Cabinets					$
	remove kitchen base cabinet		12	lf	9.24	111
	disposal		1	ea	78.30	78
	new kitchen base cabinet ADA compliant		12	lf	208.80	2,506
	Sub Total - Direct Cost					2,695
	General Conditions		20.00%			539
	Overhead & Profit		23.00%			744
	Design & Price Reserve		15.00%			597
	Escalation	Aug-15	8.16%			373
	Bond		3.00%			148
	Soft Costs/Design Fees		30.00%			1,529
	Total Project Cost					$6,625
4	Ceilings					$
	demo suspended ceilings (act) and lighting		7,416	sf	1.45	10,753
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	new act ceilings		7,416	sf	3.76	27,884
	new lighting		7,416	sf	12.34	91,513
						132,687
	Sub Total - Direct Cost					
			20.00%			26,537
	General Conditions		23.00%			36,622
	Overhead & Profit		15.00%			29,377
	Design & Price Reserve		8.16%			18,378
	Escalation	Aug-15	2.40%			5,846
	Bond		30.00%			74,834
	Soft Costs/Design Fees					
	Total Project Cost					$324,281
4	Replace Windows					$
	demo windows		108	sf	1.83	198
	disposal		1	ea	59.40	59
	new aluminum windows		108	sf	52.03	5,619
	sealant		72	lf	6.18	445
	Sub Total - Direct Cost					6,321
	General Conditions		20.00%			1,264
	Overhead & Profit		23.00%			1,745
	Design & Price Reserve		15.00%			1,400
	Escalation	Aug-15	8.16%			876
	Bond		3.00%			348
	Soft Costs/Design Fees		30.00%			3,586
	Total Project Cost					$15,540

	Description	Note	Quantity	Unit	Price	Total
2	Vehicle Exhaust Removal System					$
	vehicle exhaust system for 8 bays		4,399	sf	5.28	23,227
	Sub Total - Direct Cost					23,227
	General Conditions		20.00%			4,645
	Overhead & Profit		23.00%			6,411
	Design & Price Reserve		15.00%			5,142
	Escalation	Aug-15	8.16%			3,217
	Bond		3.00%			1,279
	Soft Costs/Design Fees		30.00%			13,176
	Total Project Cost					$57,097
3	Replace Damaged Door					$
	remove existing door and frame		1	leaf	47.96	48
	disposal		1	ea	48.40	48
	new h.m. door, frame and hardware		1	leaf	1,541.08	1,541
	paint door		1	leaf	101.43	101
	Sub Total - Direct Cost					1,738
	General Conditions		20.00%			348
	Overhead & Profit		23.00%			480
	Design & Price Reserve		15.00%			385
	Escalation	Aug-15	8.16%			241
	Bond		3.00%			96
	Soft Costs/Design Fees		30.00%			986
	Total Project Cost					$4,274
4	New Trench Drain					$
	saw cut concrete	allowance	262	lf	1.94	508
	remove concrete slab	allowance	131	sf	9.68	1,268
	disposal	allowance	1	ea	290.40	290
	excavation inside existing building	allowance	10	cy	108.42	1,084
	disposal off site	allowance	10	cy	24.72	247
	trench drain - piping and cover	allowance	131	lf	112.65	14,757
	connect to drainage system	allowance	1	ea	513.50	514
	Sub Total - Direct Cost					18,668
	General Conditions		20.00%			3,734
	Overhead & Profit		23.00%			5,152
	Design & Price Reserve		15.00%			4,133
	Escalation	Aug-15	8.16%			2,586
	Bond		3.00%			1,028
	Soft Costs/Design Fees		30.00%			10,590
	Total Project Cost					$45,891

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY
BRIMFIELD, MA 01010 GFA 7,416

	Description	Note		Quantity	Unit	Price	Total
	Accessible Entrance Door						$
	add push button operator to door			4	ea	3,341.00	13,364
	wire and conduit			300	lf	7.11	2,133
	cut and patch			1	ls	257.79	258
	Sub Total - Direct Cost						15,755
	General Conditions			20.00%			3,151
	Overhead & Profit			23.00%			4,348
	Design & Price Reserve			15.00%			3,488
	Escalation		Aug-15	8.16%			2,182
	Bond			3.00%			868
	Soft Costs/Design Fees			30.00%			8,938
	Total Project Cost						38,730
3	Gutters						$
	clean gutters	laborer		1	day	481.85	482
	disposal			1	ea	121.00	121
	reattach gutters with slope			457	lf	3.93	1,796
	seal all joints and end caps	allowance		16	ea	28.08	449
	Sub Total - Direct Cost						2,848
	General Conditions			20.00%			570
	Overhead & Profit			23.00%			786
	Design & Price Reserve			15.00%			631
	Escalation		Aug-15	8.16%			395
	Bond			3.00%			157
	Soft Costs/Design Fees			30.00%			1,616
	Total Project Cost						$7,003
3	Pipe Away Downspouts						$
	pipe away water at downspouts	allowance		16	loc	287.49	4,600
	clean all water stains at walls	allowance		16	loc	91.96	1,471
	fill and compact low spots around building	allowance		16	loc	69.86	1,118
	Sub Total - Direct Cost						7,189
	General Conditions			20.00%			1,438
	Overhead & Profit			23.00%			1,984
	Design & Price Reserve			15.00%			1,592
	Escalation		Aug-15	8.16%			996
	Bond			3.00%			396
	Soft Costs/Design Fees			30.00%			4,079
	Total Project Cost						$17,674
3	Expansion Joint						$
	sawcut joint			40	lf	28.27	1,131
	expansion joint in wall			40	lf	23.11	924
	Sub Total - Direct Cost						2,055

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			411
	Overhead & Profit		23.00%			567
	Design & Price Reserve		15.00%			455
	Escalation	Aug-15	8.16%			285
	Bond		3.00%			113
	Soft Costs/Design Fees		30.00%			1,166
	Total Project Cost					$5,052
3	Re-Pointing					$
	minor re-pointing of cmu and brick around entire building 5% allowan		457	sf	31.67	14,473
	Sub Total - Direct Cost					14,473
	General Conditions		20.00%			2,895
	Overhead & Profit		23.00%			3,995
	Design & Price Reserve		15.00%			3,204
	Escalation	Aug-15	8.16%			2,005
	Bond		3.00%			797
	Soft Costs/Design Fees		30.00%			8,211
	Total Project Cost					$35,580
3	Replace Aprons					$
	demo concrete aprons at overhead doors		399	sf	1.58	630
	sawcut pavement		133	lf	4.67	621
	demo asphalt pavement		133	sf	0.43	57
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	8" concrete apron		532	sf	7.96	4,235
	Sub Total - Direct Cost					8,080
	General Conditions		20.00%			1,616
	Overhead & Profit		23.00%			2,230
	Design & Price Reserve		15.00%			1,789
	Escalation	Aug-15	8.16%			1,119
	Bond		3.00%			445
	Soft Costs/Design Fees		30.00%			4,584
	Total Project Cost					$19,863
3	Miscellaneous Wood Rot/Damage					$
	demo T 1-11 siding		3,948	sf	2.42	9,554
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	new fiber cement siding		3,948	sf	4.48	17,687
	paint siding		3,948	sf	2.14	8,449
	patch, prime, repaint trim		795	lf	4.59	3,649
	Sub Total - Direct Cost					41,876

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			8,375
	Overhead & Profit		23.00%			11,558
	Design & Price Reserve		15.00%			9,271
	Escalation	Aug-15	8.16%			5,800
	Bond		3.00%			2,306
	Soft Costs/Design Fees		30.00%			23,756
	Total Project Cost					$102,942
3	Overhead Door Jambs					$
	demo damaged sections of trim		144	sf	1.71	246
	replace trim with fiber cement siding		144	sf	7.54	1,086
	paint trim		144	sf	2.86	412
	Sub Total - Direct Cost					1,744
	General Conditions		20.00%			349
	Overhead & Profit		23.00%			481
	Design & Price Reserve		15.00%			386
	Escalation	Aug-15	8.16%			242
	Bond		3.00%			96
	Soft Costs/Design Fees		30.00%			989
	Total Project Cost					$4,287
3	Paint West Wall Of Equipment Bays					$
	prep and paint wall		1,000	sf	2.01	2,010
	Sub Total - Direct Cost					2,010
	General Conditions		20.00%			402
	Overhead & Profit		23.00%			555
	Design & Price Reserve		15.00%			445
	Escalation	Aug-15	8.16%			278
	Bond		3.00%			111
	Soft Costs/Design Fees		30.00%			1,140
	Total Project Cost					$4,941
2	Bricks At Corner Of East Wall					$
	replace damaged bricks	allowance	80	sf	40.91	3,273
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	sawcut joint between brick and CMU		20	lf	28.27	565
	filler, backer rod and sealant		20	lf	6.18	124
	Sub Total - Direct Cost					6,499

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			1,300
	Overhead & Profit		23.00%			1,794
	Design & Price Reserve		15.00%			1,439
	Escalation	Aug-15	8.16%			900
	Bond		3.00%			358
	Soft Costs/Design Fees		30.00%			3,687
	Total Project Cost					$15,977
3	Floor At Overhead Doors					$
	sawcut concrete slab		50	lf	4.61	231
	demo slab		200	sf	1.56	312
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	drill and dowel into existing floor	12" o.c.	50	ea	69.21	3,461
	patch concrete slab		200	sf	24.20	4,840
	Sub Total - Direct Cost					11,381
	General Conditions		20.00%			2,276
	Overhead & Profit		23.00%			3,141
	Design & Price Reserve		15.00%			2,520
	Escalation	Aug-15	8.16%			1,576
	Bond		3.00%			627
	Soft Costs/Design Fees		30.00%			6,456
	Total Project Cost					$27,977
3	Hose Dryer					$
	demo hose dryer	allowance	1	ea	1,210.00	1,210
	disposal		1	ea	181.50	182
	new hose dryer	allowance	1	ea	25,675.00	25,675
	Sub Total - Direct Cost					27,067
	General Conditions		20.00%			5,413
	Overhead & Profit		23.00%			7,470
	Design & Price Reserve		15.00%			5,993
	Escalation	Aug-15	8.16%			3,749
	Bond		3.00%			1,491
	Soft Costs/Design Fees		30.00%			15,355
	Total Project Cost					$66,538

Mechanical

	Description	Note		Quantity	Unit	Price	Total
4	Replace Oil Fired Equipment						
	remove oil fired equipment			1	ea	753.06	753
	disposal			1	ea	242.00	242
	new gas service - trench only - service by gas company			200	lf	26.18	5,236
	misc. exterior repairs from trench			1	ea	1,936.00	1,936
	cast iron gas boiler	300mbh		1	ea	8,606.06	8,606
	hot water pumps	40gpm		2	ea	2,629.12	5,258
	gas piping allowance	1 1/4"		100	lf	16.95	1,695
	Sub Total - Direct Cost						23,726
	General Conditions			20.00%			4,745
	Overhead & Profit			23.00%			6,548
	Design & Price Reserve			15.00%			5,253
	Escalation		Aug-15	8.16%			3,286
	Bond			3.00%			1,307
	Soft Costs/Design Fees			30.00%			13,460
	Total Project Cost						58,325
3	Replace Existing Thermostats						
	demo existing thermostats	allowance		15	ea	72.60	1,089
	disposal			1	ea	48.40	48
	new thermostats	allowance		15	ea	256.75	3,851
	Sub Total - Direct Cost						4,988
	General Conditions			20.00%			998
	Overhead & Profit			23.00%			1,377
	Design & Price Reserve			15.00%			1,104
	Escalation		Aug-15	8.16%			691
	Bond			3.00%			275
	Soft Costs/Design Fees			30.00%			2,830
	Total Project Cost						12,263
3	Common Area Furnace						$
	replace furnace, pumps, air handler, and condensing units			-	sf	20.88	-
	disposal			1	ea	-	-
	electrician			1	day	581.27	581
	reconfigure ductwork	allowance		7,416	sf	1.03	7,638
	separate distribution to police and provide dedicated thermostats			1,975	sf	10.78	21,291
	Sub Total - Direct Cost						29,510
	General Conditions			20.00%			5,902
	Overhead & Profit			23.00%			8,145
	Design & Price Reserve			15.00%			6,534
	Escalation		Aug-15	8.16%			4,087
	Bond			3.00%			1,625
	Soft Costs/Design Fees			30.00%			16,741
	Total Project Cost						$72,544

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY
BRIMFIELD, MA 01010 GFA 7,416

	Description	Note	Quantity	Unit	Price	Total
3	Exhaust Fan In Bathroom					$
	provide exhaust fan in bathroom		1	ea	1,540.50	1,541
	cut and patch		1	ea	91.88	92
	electrician		1	day	581.27	581
	Sub Total - Direct Cost					2,214
	General Conditions		20.00%			443
	Overhead & Profit		23.00%			611
	Design & Price Reserve		15.00%			490
	Escalation	Aug-15	8.16%			307
	Bond		3.00%			122
	Soft Costs/Design Fees		30.00%			1,256
	Total Project Cost					$5,443
3	Direct Ducted Outdoor Air					$
	provide direct ducted outdoor air for furnace w/ roof cap and damper a		1	ea	3,594.50	3,595
	provide general exhaust fan in garage		1	ea	1,540.50	1,541
	electrician		1	day	581.27	581
	Sub Total - Direct Cost					5,717
	General Conditions		20.00%			1,143
	Overhead & Profit		23.00%			1,578
	Design & Price Reserve		15.00%			1,266
	Escalation	Aug-15	8.16%			792
	Bond		3.00%			315
	Soft Costs/Design Fees		30.00%			3,243
	Total Project Cost					$14,054
3	Other Garage's Electric Unit Heaters Replacement					$
	demo electric unit heaters	allowance	4	ea	2,334.10	9,336
	provide warm air furnace and supply air		2,020	sf	23.11	46,682
	provide direct ducted outdoor air for furnace w/ roof cap and damper a		1	ea	3,594.50	3,595
	provide general exhaust fan in garage		1	ea	2,567.50	2,568
	Sub Total - Direct Cost					62,181
	General Conditions		20.00%			12,436
	Overhead & Profit		23.00%			17,162
	Design & Price Reserve		15.00%			13,767
	Escalation	Aug-15	8.16%			8,613
	Bond		2.40%			2,740
	Soft Costs/Design Fees		30.00%			35,070
	Total Project Cost					$151,969

	Description	Note		Quantity	Unit	Price	Total
	Electrical						
3	Manual Transfer Switch						$
	demo manual transfer switch			1	ea	282.75	283
	disposal			1	ea	84.83	85
	automatic transfer switch and controls	60 amp		1	ea	4,128.15	4,128
	Sub Total - Direct Cost						4,496
	General Conditions			20.00%			899
	Overhead & Profit			23.00%			1,241
	Design & Price Reserve			15.00%			995
	Escalation		Aug-15	8.16%			623
	Bond			3.00%			248
	Soft Costs/Design Fees			30.00%			2,551
	Total Project Cost						$11,053
3	LED Exit Signs						$
	demo existing exit signs			10	ea	62.48	625
	disposal			1	ea	96.80	97
	exit signs throughout			7,416	sf	0.49	3,634
	Sub Total - Direct Cost						4,356
	General Conditions			20.00%			871
	Overhead & Profit			23.00%			1,202
	Design & Price Reserve			15.00%			964
	Escalation		Aug-15	8.16%			603
	Bond			3.00%			240
	Soft Costs/Design Fees			30.00%			2,471
	Total Project Cost						$10,707
3	Upgrade Exterior Lighting						$
	demo exterior lighting fixture	allowance		10	ea	72.60	726
	disposal			1	ea	145.20	145
	upgrade existing exterior lighting to LED	allowance		10	ea	771.00	7,710
	Sub Total - Direct Cost						8,581
	General Conditions			20.00%			1,716
	Overhead & Profit			23.00%			2,368
	Design & Price Reserve			15.00%			1,900
	Escalation		Aug-15	8.16%			1,189
	Bond			3.00%			473
	Soft Costs/Design Fees			30.00%			4,868
	Total Project Cost						$21,095

	Description	Note	Quantity	Unit	Price	Total
2	Fire Alarm System					$
	add fire alarm system to facility		7,416	sf	2.47	18,318
	Sub Total - Direct Cost					18,318
	General Conditions		20.00%			3,664
	Overhead & Profit		23.00%			5,056
	Design & Price Reserve		15.00%			4,056
	Escalation	Aug-15	8.16%			2,537
	Bond		3.00%			1,009
	Soft Costs/Design Fees		30.00%			10,392
	Total Project Cost					$45,032

Plumbing

	Replace Well Pump And Add Filtration					
	demo well pump		1	ea	208.12	208
	demo expansion tank		1	ea	174.24	174
	disposal		1	ea	55.47	55
	new well pump		1	ea	4,416.10	4,416
	new expansion tank		1	ea	3,697.20	3,697
	source water filtration system	reverse osmosis	1	ea	20,540.00	20,540
	Sub Total - Direct Cost					29,090
	General Conditions		20.00%			5,818
	Overhead & Profit		23.00%			8,029
	Design & Price Reserve		15.00%			6,441
	Escalation	Aug-15	8.16%			4,029
	Bond		3.00%			1,602
	Soft Costs/Design Fees		30.00%			16,503
	Total Project Cost					71,512
	Sink Faucet					
	sink faucet at existing sink		1	ea	266.20	266
	Sub Total - Direct Cost					266
	General Conditions		20.00%			53
	Overhead & Profit		23.00%			73
	Design & Price Reserve		15.00%			59
	Escalation	Aug-15	8.16%			37
	Bond		3.00%			15
	Soft Costs/Design Fees		30.00%			151
	Total Project Cost					654

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY
BRIMFIELD, MA 01010 GFA 7,416

Description	Note	Quantity	Unit	Price	Total
Replace Electric Water Heater					
remove electric water heater		1	ea	62.48	62
disposal		1	ea	48.40	48
new electric water heater		1	ea	2,233.73	2,234
install mixing valve		1	ea	3,748.55	3,749
Sub Total - Direct Cost					6,093
General Conditions		20.00%			1,219
Overhead & Profit		23.00%			1,682
Design & Price Reserve		15.00%			1,349
Escalation	Aug-15	8.16%			844
Bond		3.00%			336
Soft Costs/Design Fees		30.00%			3,457
Total Project Cost					14,980
Public Saftey Renovation/Addition/Roof Raising					
Public Safety renovation/addition/roof raising		8,084	ea	211.97	1,713,542
Sub Total - Direct Cost					1,713,542
General Conditions		12.00%			205,625
Overhead & Profit		14.00%			268,683
Design & Price Reserve		15.00%			328,178
Escalation	Aug-15	8.16%			205,308
Bond		1.60%			43,541
Soft Costs/Design Fees		30.00%			829,463
Total Project Cost					3,594,340

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW POLICE STATION
BRIMFIELD, MA 01010 GFA 4,088

Description	Note	Quantity	Unit	Price	Total
General					
New Police Station					$
New Police Station (see cost plan)		4,088	sf	372.80	1,524,006
Sub Total - Direct Cost					1,524,006
General Conditions		12.00%			182,881
Overhead & Profit		14.00%			238,964
Design & Price Reserve		15.00%			291,878
Escalation	Aug-15	8.16%			182,599
Bond		1.60%			38,725
Soft Costs/Design Fees		30.00%			737,716
Total Project Cost					3,196,769

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY RENOVATION AND ADDITION
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Public Safety Renovation And Addition	GFA(SF):	8,084	Date:	Jul-13		Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		17,194		2.13	1.0%			
A10 Foundations	16,286		2.01			668	SF	24.38
A20 Basement Construction	908		0.11			668	SF	1.36
B SHELL		219,416		27.14	12.8%			
B10 Superstructure	24,322		3.01			2,043	SF	11.91
B20 Exterior Closure	155,766		19.27			2,268	SF	68.68
B30 Roofing	39,328		4.86			2,043	SF	19.25
C INTERIORS		346,362		42.85	20.2%			
C10 Interior Construction	199,028		24.62			8,084	SF	24.62
C20 Stairs	0		0.00			0	FLT	0.00
C30 Interior Finishes	147,334		18.23			8,084	SF	18.23
D SERVICES		540,433		66.85	31.5%			
D10 Conveying Systems	0		0.00			0	STOP	0.00
D20 Plumbing	70,068		8.67			8,084	SF	8.67
D30 HVAC	252,021		31.18			8,084	SF	31.18
D40 Fire Protection	36,378		4.50			8,084	SF	4.50
D50 Electrical Systems	181,966		22.51			8,084	SF	22.51
E EQUIPMENT & FURNISHINGS		89,524		11.07	5.2%			
E10 Equipment	47,805		5.91			8,084	SF	5.91
E20 Furnishings	41,719		5.16			8,084	SF	5.16

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
PUBLIC SAFETY RENOVATION AND ADDITION
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: Public Safety Renovation And Addition				Date: Jul-13		Sheet No: 2 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		74,160		9.17	4.3%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	74,160		9.17			7,416	SF	10.00
G BUILDING SITEWORK		426,453		52.75	24.9%			
G10 Site Preparation	40,420		5.00			8,084	SF	5.00
G20 Site Improvements	372,673		46.10			8,084	SF	46.10
G30 Site Civil/Mechanical Utilities	10,020		1.24			668	SF	15.00
G40 Site Electrical Utilities	3,340		0.41			668	SF	5.00
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,713,542		211.97	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,713,542	$	211.97				

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW POLICE STATION
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Police Station	GFA(SF): 4,088	Date: Jul-13			Sheet No: 1 OF 2		
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area	%	Element Quantities	Unit	Element Unit Rate
A SUBSTRUCTURE		105,225	25.74	6.9%			
A10 Foundations	99,665		24.38		4,088	SF	24.38
A20 Basement Construction	5,560		1.36		4,088	SF	1.36
B SHELL		426,085	104.23	28.0%			
B10 Superstructure	98,357		24.06		4,088	SF	24.06
B20 Exterior Closure	249,034		60.92		3,626	SF	68.68
B30 Roofing	78,694		19.25		4,088	SF	19.25
C INTERIORS		175,703	42.98	11.5%			
C10 Interior Construction	100,647		24.62		4,088	SF	24.62
C20 Stairs	0		0.00		0	FLT	0.00
C30 Interior Finishes	75,056		18.36		4,088	SF	18.36
D SERVICES		350,546	85.75	23.0%			
D10 Conveying Systems	0		0.00		0	STOP	0.00
D20 Plumbing	39,858		9.75		4,088	SF	9.75
D30 HVAC	188,048		46.00		4,088	SF	46.00
D40 Fire Protection	18,396		4.50		4,088	SF	4.50
D50 Electrical Systems	104,244		25.50		4,088	SF	25.50
E EQUIPMENT & FURNISHINGS		94,024	23.00	6.2%			
E10 Equipment	63,364		15.50		4,088	SF	15.50
E20 Furnishings	30,660		7.50		4,088	SF	7.50

COSTPRO INC.
TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
NEW POLICE STATION
BRIMFIELD, MA 01010

Project Cost Plan (Uniformat II Level 3)

COSTPRO, INC.

Project: New Police Station			Date: Jul-13		Sheet No: 2 OF 2			
Uniformat Element (Levels 2&3)	Amount $	Total Cost $	Rate $/SF Floor Area		%	Element Quantities	Unit	Element Unit Rate
F SPECIAL CONSTRUCTION & DEMOLITION		0		0.00	0.0%			
F10 Special Construction	0		0.00			0	SF	0.00
F20 Selective Demolition	0		0.00			0	SF	0.00
G BUILDING SITEWORK		372,417		91.10	24.4%			
G10 Site Preparation	40,880		10.00			4,088	SF	10.00
G20 Site Improvements	188,457		46.10			4,088	SF	46.10
G30 Site Civil/Mechanical Utilities	102,200		25.00			4,088	SF	25.00
G40 Site Electrical Utilities	40,880		10.00			4,088	SF	10.00
G90 Other Site Construction	0		0.00			0	SF	0.00
SUBTOTAL		1,524,000		372.80	100.0%			
Z10 GENERAL REQUIREMENTS	0.0%	0		0.00				
Z20 CONTINGENCIES	0.0%	0		0.00				
Z30 CM AT RISK PREMIUM	0.0%	0		0.00				
Z90 PROJECT COST ESTIMATE	$	1,524,000	$	372.80				

TOWN OF BRIMFIELD
Massachusetts

PUBLIC SAFETY BUILDING
Program Areas

	EXISTING SPACE		PROPOSED AREA	DEPT AREAS
FIRE				
Entry	88			
Police Chief	129			
Police Lieutenant	234			
Fire Chief	229		229	
Equipment Bays	4036		4036	
Elec/Comp	84		84	
Duty Officer	51		176	
Radio Room	38			
Kitchen	90		111	
Day Room	538		462	
Toilet's	78			
Storage	38			
Lobby			50	
Bunk Rooms			324	
Men's Toilet			147	
Women's Toilet			123	
Unassigned	247		460	

TOTAL FIRE	5880		6202

AMBULANCE				
Ambulance Office	145		184	
Ambulance Bays	742		742	
Unassigned				

TOTAL AMBULANCE	887		926

TOTAL FIRE & AMBULANCE	6767		7128

TOWN OF BRIMFIELD
Massachusetts

POLICE DEPARTMENT
Proposed Program Areas

	IN TOWN HALL		IN NEW BUILDING
POLICE			
Vestibule/Waiting	93		100
Reception	73		82
Interview Room	64		82
Officer's Report Room	85		103
Duty Officer	101		129
Administrator	61		164
Storage			61
Police Chief	232		213
Lieutenants Office	155		180
Lunch/Meetings/Training Room	331		416
Storage			24
Evidence Storage	187		316
Weight Room	238		173
Men's Locker Room	199		229
Women's Locker Room	88		84
Men's Toilet	154		142
Women's Toilet	111		138
Custodian	14		16
Bulk Evidence Storage			515
Unassigned	193		452

TOTAL POLICE - NET ROOM AREA	2379	3619

Bulk Evidence Storage As Separate Building	500

BUILDING USE AUDIT - CONDITION ASSESSMENT
Town of Brimfield, Massachusetts

Brimfield Public Library

25 Main Street

Year Constructed:	1903
Construction Type:	IIIB
Fire Sprinklers:	No
Building Area per Floor:	
Basement:	806 SF
First Floor:	2404 SF
Total Area:	3210 SF

General:

The current building is limited in use due to the rear wing being at a lower floor elevation. The original building is cramped while the rear wing is lightly used as a historic museum space.

The building is not handicapped accessible:

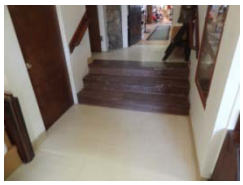
3 Entrance door is located in a thick wall and equipped with a closer. There is insufficient clearance at the side of the door, both interior and exterior. At the exterior of the entrance door, the door is recessed 12 inches and the wall is angled on the required side clearance on the door. Add a push button operator to the door.

3 Original entrance doors have a step on the exterior side and a 1" high threshold on the interior. Exterior risers are not equal heights. Code requires that all public entrances be handicapped accessible. This requirement may have been waived due to the historic nature of the building.

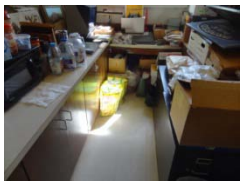
3 Cracks in ceiling in multiple areas. Verify plaster is secure and patch cracks. Repaint ceilings.

3 Although the only building door at grade, the exterior door to the Sherman Memorial Room is not provided with an access sidewalk so that it could be used by persons with disabilities. Provide a sidewalk around building to connect to parking area.*

2 Handrails are too low on stairs from Memorial Room to Main Library. Replace handrails and provide with extensions.



3 Kitchenette is not accessible. Construct new accessible kitchenette.



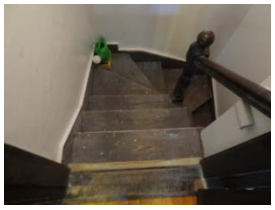
3 Toilet room is not ADA Accessible. Insufficient floor area, no grab bars, and non-compliant plumbing fixtures. Door is only 32" wide, hardware non-compliant and inadequate area on pull side of door. Provide both men's and women's accessible restrooms.

3 Cracks and bubbling in vinyl tile near door from addition to existing build and at rear door. Replace damaged tiles.

3 Door from original building to addition is located in a thick wall and does not meet the required push or pull areas on either side of door. Remove door.

3 Sash cords at window in Children's room replacement.

2 Stairs down to basement are narrow, 8" rise at each tread and no hand rails. Center railing is loose and low. Basement is damp and not used for library storage. Leave stair and re-secure railing.



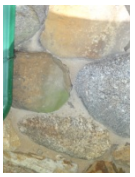
3 Circulation desk is not ADA compliant. Construct new compliant circulation desk.

3 Signage within building is not ADA compliant. Replace signage.

3 Furniture does not provide maneuvering clearance for wheelchairs. Reorganize furniture.

3 Water from downspouts be piped away from the building, to minimize the potential for water infiltration at the Ground Floor level and to reduce hydrostatic pressure on the foundation walls.

2 Wood rot and paint peeling apparent at trim, soffit and fascia boards. Repair or replace rotted items and re-paint.

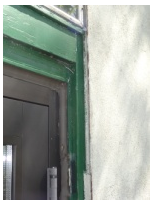


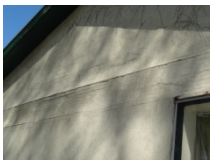
3 Cracks are present in mortar joints. Re-pointing stone facade around entire existing structure. (Allow 5% of wall area)

3 Asphalt shingles on addition appear to be aged and are in need of replacement.

2 Gutter has fallen off and is damaged on the both the existing structure and the addition. Pieces on ground need to be reinstalled and gutters and down spouts repaired.

2 Stucco at rear of addition is pulling away from lath and cracking and bubbling. Around rear door at corner beads stucco is cracking and falling out of Jambs. Stucco at grade on all 3 sides appears to have water damage from down spouts and gutters needing repairs. Remove damaged areas of stucco and replace incorporating expansion joints to reduce future cracking and de-lamination.





3 Frame around Bulkhead doors made of painted Plywood that is peeling and appears to have water damage. Replace bulkhead doors with more secure painted metal unit.

2 Slate tile on roof of existing building needs minor repairs.

Electrical

3 If air conditioning is added to the building, the electrical service should be upgraded at the same time.

2 Review the fire alarm system coverage and upgrade the system to include ADA compliant speaker/strobes.

4 Remove the lighting in the basement and replace with new.

Mechanical

3 The hot air furnace is in poor condition and needs to be replaced.

3 The hot water boiler is in poor condition and needs to be replaced.

3 Provide air conditioning in the Sherman Memorial Room.

3 Ventilation of the building is done using operable windows. There are no mechanical means of ventilation within the building, however, in the original portion of the building there is a grille located at the very peak of the ceiling which might have been used as some form of natural ventilation at one time. Provide mechanical ventilation for the library.

Plumbing

3 Provide localized point-of use electric water heaters to reduce the use of oil for hot water heating.

4 Upgrade the plumbing fixtures to meet ADA requirements and current code requirements for low water consuming fixtures.

PROGRAM INFORMATION

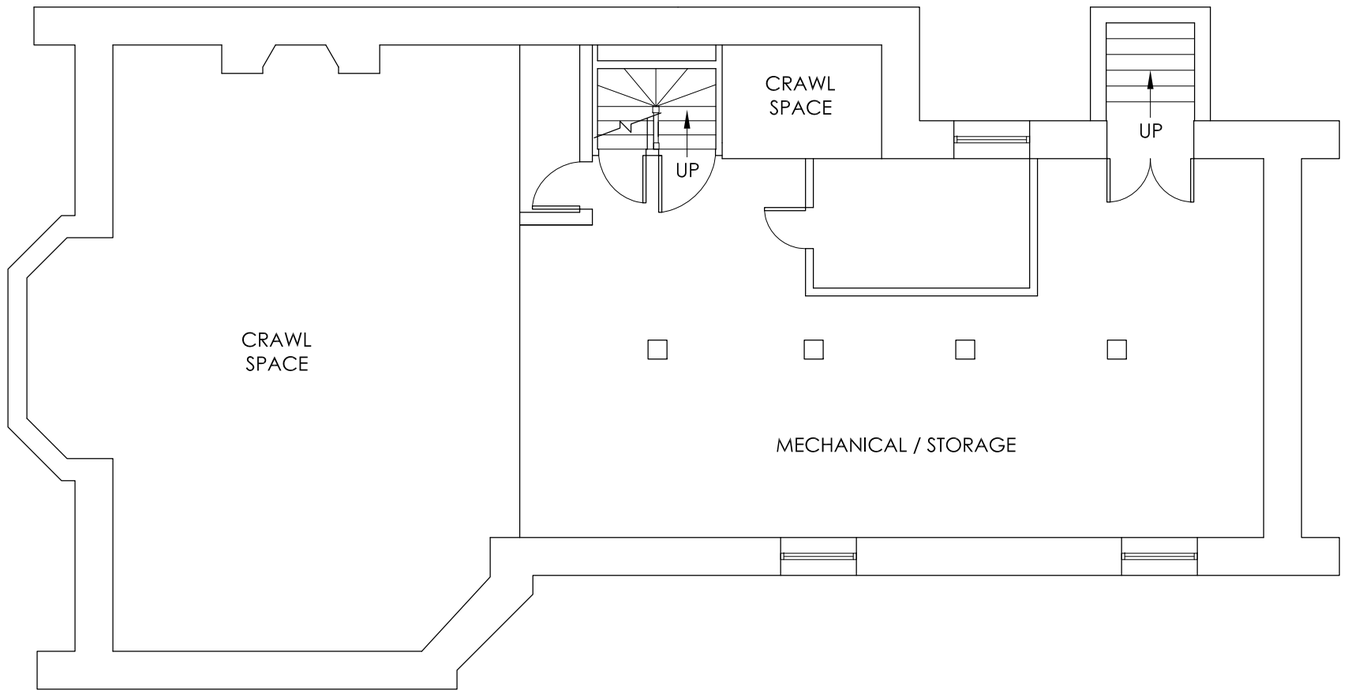
The current library is severely overcrowded with insufficient and undefined space for any of the functions. Cramped adult areas overlap with cramped children's area. There is no children's program space. Staff areas are grossly inadequate and have no workroom or office space. In contrast the addition to the rear of the original building has space and is used almost exclusively for the historic collection. This area is lightly used as it is separated from the main areas of the library by a doorway and stairs.

This is a lovely historic building and in planning any addition it will be necessary to minimize the impact of the new construction. It is also strongly desirable to have the library on one level for handicapped accessibility and easy of movement of materials. There appears to be sufficient headroom to raise the level of the floor in the existing rear addition to accomplish this.

As the building is contiguous with the Town Hall Annex we believe that the set back requirements between the two buildings can be removed as it is effectively one parcel, thus allowing an expansion in that direction.

Existing parking and access to the building are not handicapped accessible. It is recommended that space be provided in the Annex parking lot an a new walk created around the front of the Annex to the new library entrance. A walk should also be provided to the current parking.

A Library Space Needs chart is provided together with a Test Fit floor plan for the suggested expansion.



BASEMENT FLOOR PLAN

GRAPHIC SCALE
5 0 5 10 20
(IN FEET)

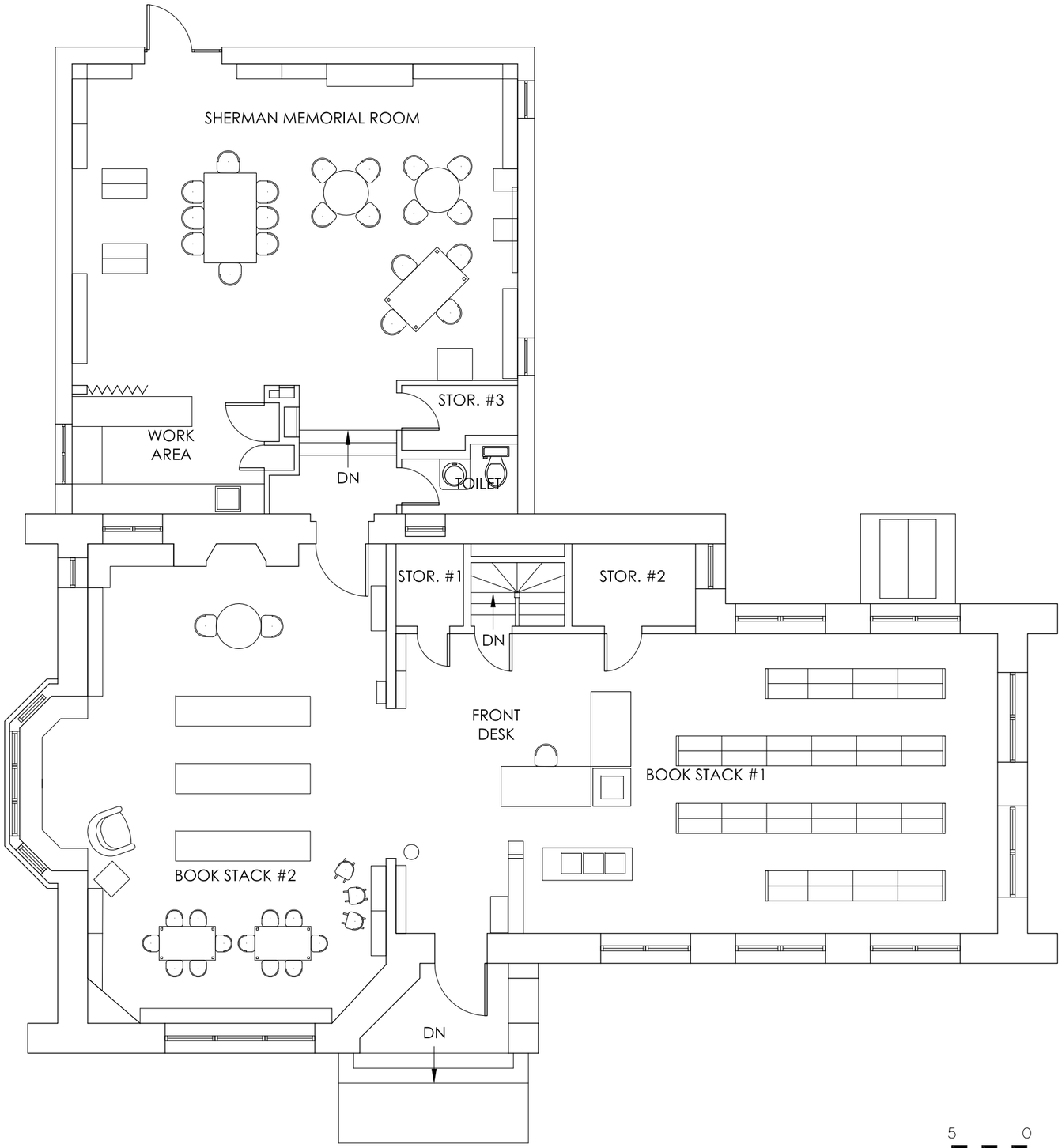
D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING LIBRARY FLOOR PLANS

Scale: 1/8"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 6/21/13

EX-L1



FIRST FLOOR PLAN

GRAPHIC SCALE

5 0 5 10 20

(IN FEET)

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

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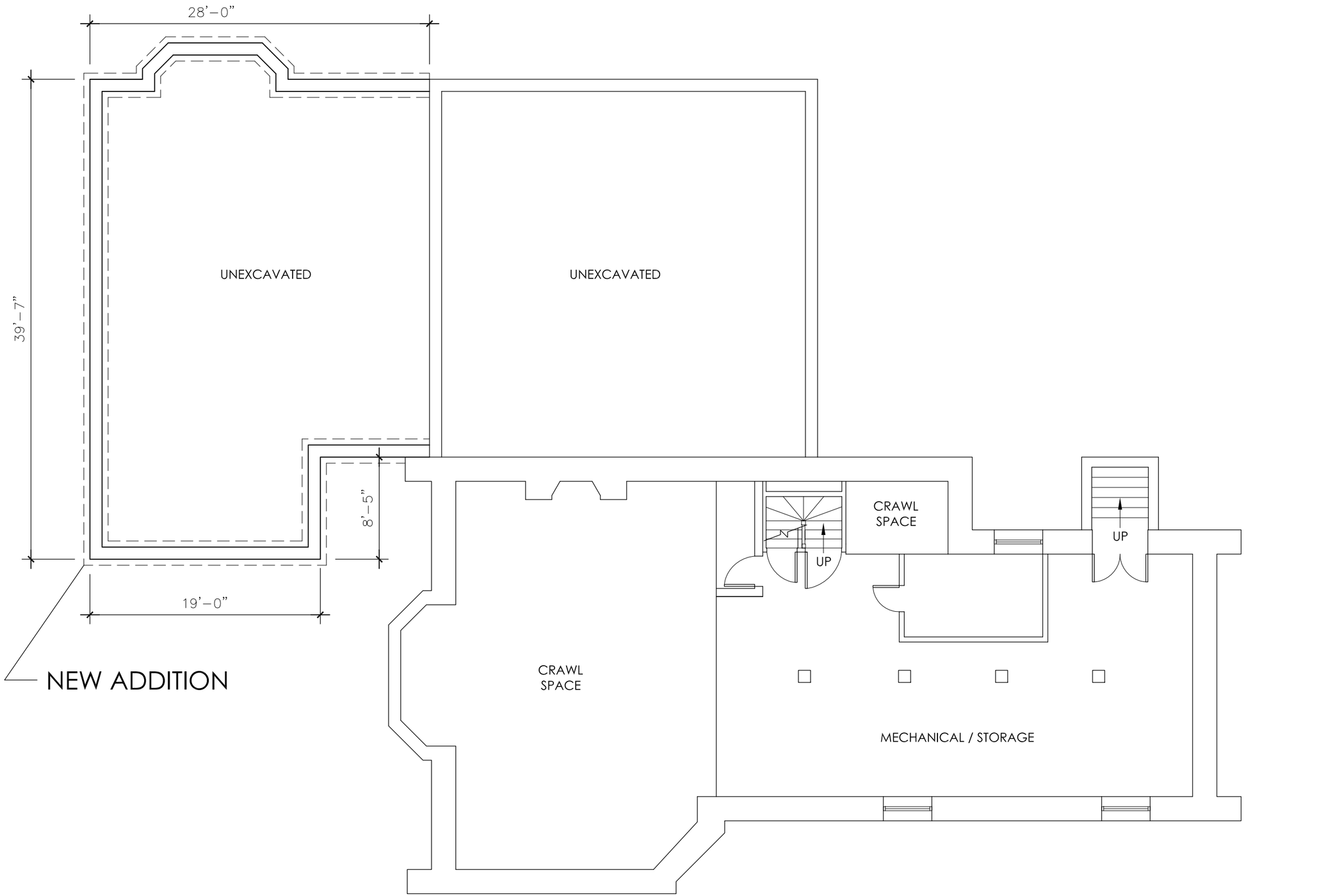
Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

EXISTING LIBRARY FLOOR PLANS

Scale: 1/8"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 6/21/13

EX-L2



BASEMENT FLOOR PLAN

GRAPHIC SCALE
5 0 5 10 20
(IN FEET)

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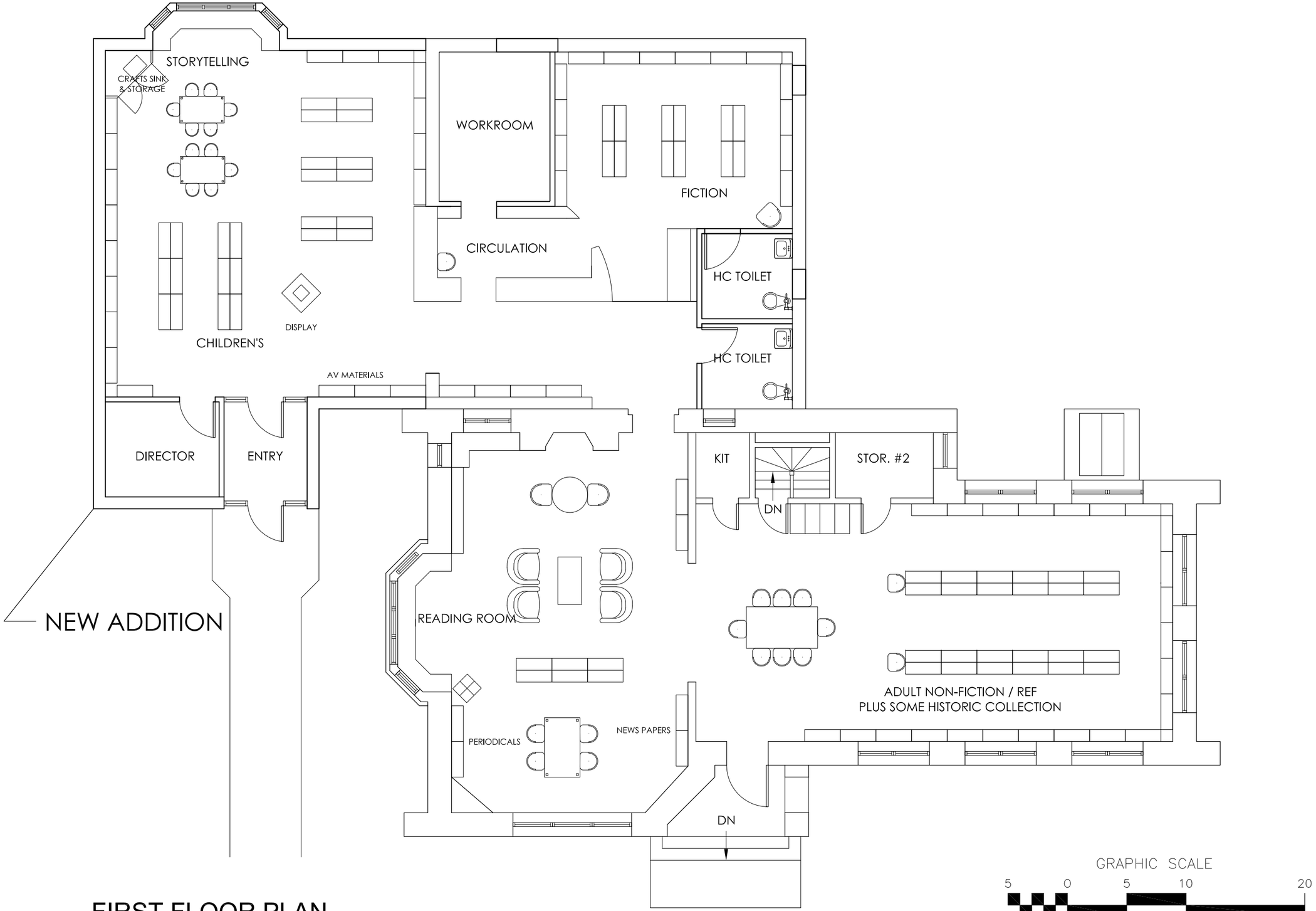
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED LIBRARY FLOOR PLANS

Scale: 1/8"=1'-0"
Drawn by: AJ/CGH
Job No. 13002.00
Date: 7-9-13

PR-L1



FIRST FLOOR PLAN

D·R·A
Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED LIBRARY FLOOR PLANS

Scale: 1/8"=1'-0"
Drawn by: AJ/KCB
Job No. 13002.00
Date: 7-9-13

PR-L2

Public Library

Structural

Structural Description:

The Danielson-Lincoln Memorial Library is a one-story (plus partial Basement), wood framed structure, located at 25 Main Street in Brimfield. The building was constructed in 1903 and is listed on the National Register of Historic Places.

The Library is L-shaped in plan (including the Sherman Memorial Room, that was added to the south/back of the original building). Functions at the First Floor include the Front Desk and Collections in the original building; a Work Room and a Bathroom separate this area from the Sherman Memorial Room. The Basement (western two-thirds of the original building) is not used for Library services. Access to the Basement is gained by an internal stair; there is also a bulkhead on the south side of the western wing. The (slate) roof of the original building consists of two intersecting gables; a low pitch gable roof was also constructed over the Sherman Memorial Room. .

Typical foundation walls are rubble stone. Basement Floor construction is a concrete slab on grade (thickness unknown). First Floor construction in the original building is wood framed, with 2" (nominal) wood joists supported by timber beams. Floor construction in the Sherman Memorial Room is a concrete slab on grade (thickness unknown); this floor is approximately two feet lower than the main floor level. Roof construction is also wood framed; the details of this construction were not determined at the site. Exterior walls are solid stone construction, except the upper gable ends of the main (north-south) gable over the entry are stucco finish.

No original construction drawings for the building or previous structural reports were available.

Structural Conditions/Issues – Comments and Recommendations:

Structural conditions at the Danielson-Lincoln Memorial Library (building exterior) were observed during a brief visit to the site on May 13, 2013. Generally speaking, the wood-framed structure appears to be performing satisfactorily; there is no evidence of structural distress that would indicate significantly overstressed, deteriorated or failed structural members. Foundations appear to be performing adequately; there are no signs of significant, total or differential settlements.

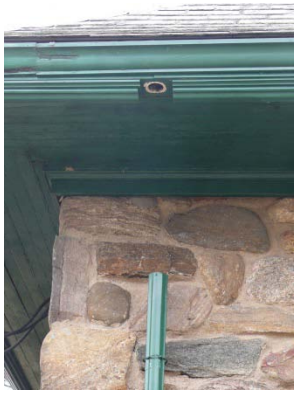
Structural/structurally related conditions observed during site visit are noted below:

- The condition of the exterior stone walls appears to be generally satisfactory. Masonry joints appear to be in satisfactory condition as well.

- The capacity of the First Floor framing was not determined; however, the use of the building has not changed since the original construction, and there are no reports of any structurally related issues.

- The capacity of the roof framing was not determined; however, roof framing appears to be functioning as originally intended.

- There are damaged/missing areas of roof trim at a number of locations around the building. Downspouts are disconnected and some downspouts do not properly direct water away from the foundation walls. If not repaired, these conditions will continue to allow moisture into the building and allow water to build up behind foundation walls.



- The exterior stucco finish at the back, gable end wall of the Sherman Memorial Room is failing and has bowed outwards. This condition should be repaired to prohibit moisture from entering the walls.

- Wood framing may typically be protected (to a degree) by the ceiling construction; however, elsewhere it is unprotected. There are no sprinklers. Fire rating requirements should be reviewed in conjunction with future renovations to the facility.

<u>Building Code Requirements and Additional Comments</u>:

<u>Massachusetts State Building Code Requirements – General Comments</u>:

Proposed renovations, alterations, repairs and additions to the Danielson-Lincoln Memorial Library would be governed by the provisions of the Massachusetts State Building Code (MSBC – 780 CMR 8th Edition) and the Massachusetts Existing Building Code (MEBC). These documents are based on amended versions of the 2009 International Building Code (IBC) and the 2009 International Existing Building Code (IEBC), respectively.

The MEBC allows the Design Team to choose one of three (3) compliance methods. Structurally, the Prescriptive Compliance Method is preferred. Section 101.5.4.0 of the Massachusetts Amendments (Chapter 34) would require that the existing building be investigated in sufficient detail to ascertain the effects of any proposed work (or change in use) in the area under consideration, and the entire building or structure and its foundations, if impacted by the proposed work or change in use.

Additions – General Comments:

The Library is currently in need of additional space. The design and construction of any proposed addition(s) would be conducted in accordance with the Code for new construction. Significant additions should be structurally separated from the existing building by an expansion (seismic) joint to avoid an increase in gravity loads and/or lateral loads to existing structural elements. Smaller additions can be structurally attached to the existing building, provided they do not increase the demand - capacity ratio of the existing lateral force resisting elements in the building by more than 10%.

Renovations/Alterations – General Comments:

Where proposed alterations to existing structural elements carrying gravity loads results in a stress increase of over 5%, the affected element would need to be reinforced or replaced to comply with the Code for new construction. Proposed alterations to existing structural elements carrying lateral load (e.g. the perimeter walls) which result in an increase in the demand - capacity ratio of over 10% should be avoided, if possible. Essentially, this means that removal of, or major alterations to the exterior walls should be minimized. If this is not possible, more significant seismic upgrades/reinforcing will be required; potentially including the addition of lateral force resisting elements (shear walls, etc.).

End of Structural Report

TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

Public Library

25 Main Street

MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEMS

Prepared By:
Consulting Engineering Services
510 Chapman Street, Suite 201
Canton, MA 02021

July 3, 2013

GENERAL

The mechanical, electrical, plumbing, and fire protection systems were reviewed in conformance with the requirements of the following State and National codes and regulations, as applicable:

- Massachusetts State Building Code 8th Edition
- Massachusetts State Fire Prevention Regulations
- NFPA Latest Editions
- Massachusetts Plumbing Code
- Massachusetts Mechanical Code
- Massachusetts Electrical code (NEC 2011 Edition)
- Illuminating Engineering Society of North America (IESNA) Lighting Handbook
- ASHRAE 90.1 Latest Edition

The scope of this study does not include operational assessment of the fixtures and equipment reviewed; it includes only a brief visual review of the fixtures and equipment. Therefore notes regarding the condition of the fixtures and equipment may or may not be indicative of the actual condition of the systems and equipment and/or the expected life of the fixtures and equipment. Therefore it is recommended that services of a qualified technician be retained to evaluate the actual condition of fixtures and equipment prior to replacement.

MECHANICAL

HEATING

There are two (2) heating systems within the facility.

One system consists of an oil fired hot air furnace located in the basement of the Library. This system provides heating air to the original portion of the library via decorative grilles located in the floor.

The second system consists of an oil fired hot water boiler located in a small room in the basement of the library. This system provides heating water to the baseboard radiation in the Sherman Memorial Room.

The air system that serves the original portion of the library does include a humidifier. This piece of equipment is badly deteriorated and needs replacement.

The hot air furnace and hot water boiler are in poor condition.

AIR CONDITIONING

Any air conditioning is provided with window type air conditioners.

VENTILATION

Ventilation of the building is done using operable windows. There are no mechanical means of ventilation within the building, however, in the original portion of the building there is a grille located at the very peak of the ceiling which might have been used as some form of natural ventilation at one time.

CONTROLS

Local wall mounted thermostats are located in the main portion of the library and the Sherman Memorial Room to control the heating systems.

RECOMMENDATIONS

Replace the existing hot air furnace with a new furnace with integral air conditioning.

Replace the oil fired boiler with new.

Provide air conditioning in the Sherman Memorial Room.

Provide mechanical ventilation.

ELECTRICAL

EXISTING SYSTEMS

There is a single 200amp, 120/240volt, single phase electric service that serves the building. This consists of a utility company meter socket and meter on the exterior of the building and a 200amp panelboard in the basement. This equipment is in fair to poor condition.

The lighting throughout the library consists of surface or pendant mounted fluorescent fixtures. There are also some recessed downlights in the Sherman Memorial Room. The basement has limited incandescent lighting. The lighting fixtures in the Library and Sherman Memorial Room are in good condition. The lighting in the basement is in poor condition.

There is a combination fire alarm and security system in the building. This consists of smoke and heat detectors, security contacts, fire alarm horns, and a key pad. This system is in fair to good condition.

RECOMMENDATIONS

If air conditioning is added to the building, the electrical service should be upgraded at the same time.

Review the fire alarm system coverage and upgrade the system to include ADA compliant speaker/strobes.

Remove the lighting in the basement and replace with new

PLUMBING

EXISTING SYSTEMS

Cold water is from a well. The pump for the system is in the well therefore the condition of the pump is not included in this study. There is an existing well pump in the basement that is no longer in use. Domestic water comes from the well on the campus that serves multiple building. There is no compression tank for the system that was visible which means that the water pressure is controlled via another building.

Hot water is provided via a coil in the hot water boiler. The hot water discharge from coil is routed directly to the fixtures using hot water. There is no manually adjustable mixing valve.

The exposed water piping in the basement is copper, and it appears to be in fair condition. The exposed drain piping in the basement is cast iron and it appears to be in fair to condition.

The water closet in the restroom is a floor mount vitreous china tank type unit and it appears to be in good condition. This is not an ADA compliant or low-flow water closet.

The lavatory in the restroom is the wall mounted vitreous china type, NON ADA complaint, and it appears to be in good condition.

The work area in the Sherman Memorial Room has a single bowl stainless steel sink. Both the sink and the faucet are not ADA compliant and appear to be in fair to good condition.

RECOMMENDATIONS

Provide localized point-of use electric water heaters to reduce the use of oil for hot water heating.

Upgrade the plumbing fixtures to meet ADA requirements and current code requirements for low water consuming fixtures.

FIRE PROTECTION

The building does not have a sprinkler system.

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
LIBRARY
BRIMFIELD, MA 01010 GFA 3,424

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
	Basic Quantities	GFA		Girth		
	basement	848 sf		130 lf		
	level 1	2,576 sf		257 lf		
	General					
3	Entrance Door					$
	automatic door opener		1	ea	3,341.00	3,341
	wire and conduit		100	lf	7.11	711
	cut and patch		1	ls	257.79	258
	Sub Total - Direct Cost					4,310
	General Conditions		20.00%			862
	Overhead & Profit		23.00%			1,190
	Design & Price Reserve		15.00%			954
	Escalation	Aug-15	8.16%			597
	Bond		3.00%			237
	Soft Costs/Design Fees		30.00%			2,445
	Total Project Cost					$10,595
3	Plaster Ceilings					$
	verify plaster is secure		3,424	sf	0.26	890
	patch cracks in ceiling as required		3,424	sf	4.47	15,305
	repaint ceilings		3,424	sf	1.36	4,657
	Sub Total - Direct Cost					20,852
	General Conditions		20.00%			4,170
	Overhead & Profit		23.00%			5,755
	Design & Price Reserve		15.00%			4,617
	Escalation	Aug-15	8.16%			2,888
	Bond		3.00%		288.95	1,148
	Soft Costs/Design Fees		30.00%			11,829
	Total Project Cost					$51,259
3	Sidewalk Around Building					$
	concrete sidewalk		380	sf	6.63	2,519
	Sub Total - Direct Cost					2,519
	General Conditions		20.00%			504
	Overhead & Profit		23.00%			695
	Design & Price Reserve		15.00%			558
	Escalation	Aug-15	8.16%			349
	Bond		3.00%			139
	Soft Costs/Design Fees		30.00%			1,429
	Total Project Cost					$6,193

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
LIBRARY
BRIMFIELD, MA 01010 GFA 3,424

	Description	Note	Quantity	Unit	Price	Total
3	Handrails and Extensions					$
	remove handrail		8	lf	3.39	27
	disposal		1	ea	24.20	24
	new handrail		8	lf	179.90	1,439
	handrail extensions		4	ea	252.14	1,009
	Sub Total - Direct Cost					2,499
	General Conditions		20.00%			500
	Overhead & Profit		23.00%			690
	Design & Price Reserve		15.00%			553
	Escalation	Aug-15	8.16%			346
	Bond		3.00%			138
	Soft Costs/Design Fees		30.00%			1,418
	Total Project Cost					$6,144
3	Kitchenette					$
	demo kitchenette		1	ea	338.80	339
	disposal		1	ea	145.20	145
	accessible kitchenette		1	ea	659.87	660
	Sub Total - Direct Cost					1,144
	General Conditions		20.00%			229
	Overhead & Profit		23.00%			316
	Design & Price Reserve		15.00%			253
	Escalation	Aug-15	8.16%			158
	Bond		3.00%			63
	Soft Costs/Design Fees		30.00%			649
	Total Project Cost					$2,812
3	Toilet Room					$
	demo existing toilet room	small area	38	sf	14.52	552
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	new toilet rooms		2	ea	12,975.91	25,952
	Sub Total - Direct Cost					29,041
	General Conditions		20.00%			5,808
	Overhead & Profit		23.00%			8,015
	Design & Price Reserve		15.00%			6,430
	Escalation	Aug-15	8.16%			4,022
	Bond		3.00%			1,599
	Soft Costs/Design Fees		30.00%			16,475
	Total Project Cost					$71,390

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
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	Description	Note		Quantity	Unit	Price	Total
3	Cracks/Bubbling In Vinyl Tile						$
	demo VCT where cracking and bubbling	allowance		100	sf	0.62	62
	disposal			1	ea	72.60	73
	VCT to match existing	allowance		100	sf	2.94	294
	vinyl base			40	lf	2.48	99
	Sub Total - Direct Cost						528
	General Conditions			20.00%			106
	Overhead & Profit			23.00%			146
	Design & Price Reserve			15.00%			117
	Escalation		Aug-15	8.16%			73
	Bond			3.00%			29
	Soft Costs/Design Fees			30.00%			300
	Total Project Cost						$1,299
3	Door From Original Building						$
	remove door and frame			1	leaf	47.96	48
	cut and patch	allowance		1	ea	259.50	260
	Sub Total - Direct Cost						308
	General Conditions			20.00%			62
	Overhead & Profit			23.00%			85
	Design & Price Reserve			15.00%			68
	Escalation		Aug-15	8.16%			43
	Bond			3.00%			17
	Soft Costs/Design Fees			30.00%			175
	Total Project Cost						$758
3	Sash Cords						$
	replace sash cord in children's room windows			2	ea	266.22	532
	Sub Total - Direct Cost						532
	General Conditions			20.00%			106
	Overhead & Profit			23.00%			147
	Design & Price Reserve			15.00%			118
	Escalation		Aug-15	8.16%			74
	Bond			3.00%			29
	Soft Costs/Design Fees			30.00%			302
	Total Project Cost						$1,308
2	Basement Stairs						$
	resecure existing railing- carpenter			1	day	542.80	543
	Sub Total - Direct Cost						543

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
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	Description	Note		Quantity	Unit	Price	Total
	General Conditions			20.00%			109
	Overhead & Profit			23.00%			150
	Design & Price Reserve			15.00%			120
	Escalation		Aug-15	8.16%			75
	Bond			3.00%			30
	Soft Costs/Design Fees			30.00%			308
	Total Project Cost						$1,335
3	Circulation Desk						$
	remove circulation desk			16	lf	11.34	181
	disposal			1	ea	157.35	157
	new ADA circulation desk			16	lf	692.90	11,086
	Sub Total - Direct Cost						11,424
	General Conditions			20.00%			2,285
	Overhead & Profit			23.00%			3,153
	Design & Price Reserve			15.00%			2,529
	Escalation		Aug-15	8.16%			1,582
	Bond			3.00%			629
	Soft Costs/Design Fees			30.00%			6,481
	Total Project Cost						$28,083
3	Signage						$
	demo all signage			3,424	sf	0.05	171
	disposal			1	ea	96.80	97
	new ADA compliant signage			3,424	sf	0.16	548
	Sub Total - Direct Cost						816
	General Conditions			20.00%			163
	Overhead & Profit			23.00%			225
	Design & Price Reserve			15.00%			181
	Escalation		Aug-15	8.16%			113
	Bond			3.00%			45
	Soft Costs/Design Fees			30.00%			463
	Total Project Cost						$2,006
3	Reorganize Furniture For ADA Compliance						$
	reorganize furniture for ADA compliance	labor only		10	days	401.55	4,016
	Sub Total - Direct Cost						4,016
	General Conditions			20.00%			803
	Overhead & Profit			23.00%			1,108
	Design & Price Reserve			15.00%			889
	Escalation		Aug-15	8.16%			556
	Bond			3.00%			221
	Soft Costs/Design Fees			30.00%			2,278
	Total Project Cost						$9,871

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
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	Description	Note	Quantity	Unit	Price	Total
3	Pipe Downspouts Away From Building					$
	extend downspouts horizontally 8' each	allowance	12	loc	287.49	3,450
	Sub Total - Direct Cost					3,450
	General Conditions		20.00%			690
	Overhead & Profit		23.00%			952
	Design & Price Reserve		15.00%			764
	Escalation	Aug-15	8.16%			478
	Bond		3.00%			190
	Soft Costs/Design Fees		30.00%			1,957
	Total Project Cost					$8,481
2	Trim/Soffit/Fascia Repairs					$
	replace rotted items	allowance	257	lf	24.20	6,219
	disposal		1	ea	903.00	903
	paint repairs		257	lf	3.08	792
	Sub Total - Direct Cost					7,914
	General Conditions		20.00%			1,583
	Overhead & Profit		23.00%			2,184
	Design & Price Reserve		15.00%			1,752
	Escalation	Aug-15	8.16%			1,096
	Bond		3.00%			436
	Soft Costs/Design Fees		30.00%			4,490
	Total Project Cost					$19,455
3	Repoint Stone Façade					$
	repoint stone façade - allow 5% of wall area		180	sf	31.67	5,701
	Sub Total - Direct Cost					5,701
	General Conditions		20.00%			1,140
	Overhead & Profit		23.00%			1,573
	Design & Price Reserve		15.00%			1,262
	Escalation	Aug-15	8.16%			790
	Bond		3.00%			314
	Soft Costs/Design Fees		30.00%			3,234
	Total Project Cost					$14,014
3	Asphalt Shingles					$
	demo roof shingles		1,040	sf	1.26	1,310
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	roof shingles		1,040	sf	3.93	4,087
	flashings		1	ls	2,246.00	2,246
	Sub Total - Direct Cost					10,180

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
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	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			2,036
	Overhead & Profit		23.00%			2,810
	Design & Price Reserve		15.00%			2,254
	Escalation	Aug-15	8.16%			1,410
	Bond		3.00%			561
	Soft Costs/Design Fees		30.00%			5,775
	Total Project Cost					$25,026
2	Gutters					$
	reinstall fallen gutters	allowance	200	lf	4.78	956
	repair gutters		257	lf	6.83	1,755
	repair downspouts		168	lf	3.42	575
	Sub Total - Direct Cost					3,286
	General Conditions		20.00%			657
	Overhead & Profit		23.00%			907
	Design & Price Reserve		15.00%			728
	Escalation	Aug-15	8.16%			455
	Bond		3.00%			181
	Soft Costs/Design Fees		30.00%			1,864
	Total Project Cost					$8,078
2	Stucco					$
	remove damaged areas of stucco	allow 50%	658	sf	3.39	2,231
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	new stucco to match existing		658	sf	10.54	6,935
	paint stucco		658	sf	3.06	2,013
	incorporate new expansion joints	15' o.c.	88	lf	28.08	2,471
	Sub Total - Direct Cost					16,187
	General Conditions		20.00%			3,237
	Overhead & Profit		23.00%			4,468
	Design & Price Reserve		15.00%			3,584
	Escalation	Aug-15	8.16%			2,242
	Bond		3.00%			892
	Soft Costs/Design Fees		30.00%			9,183
	Total Project Cost					$39,793
3	Bulkhead					$
	remove wood bulkhead		1	ea	145.20	145
	disposal		1	ea	72.60	73
	new metal bulkhead		1	ea	1,097.00	1,097
	Sub Total - Direct Cost					1,315

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			263
	Overhead & Profit		23.00%			363
	Design & Price Reserve		15.00%			291
	Escalation	Aug-15	8.16%			182
	Bond		3.00%			72
	Soft Costs/Design Fees		30.00%			746
	Total Project Cost					$3,232
2	Slate Roof					$
	minor repair to slate roof on existing building		2,241	sf	13.20	29,581
	dumpster rental		2	weeks	734.71	1,469
	load & truck	10 mile round trip	40	cy	55.27	2,211
	dump charges		16	ton	87.12	1,394
	Sub Total - Direct Cost					34,655
	General Conditions		20.00%			6,931
	Overhead & Profit		23.00%			9,565
	Design & Price Reserve		15.00%			7,673
	Escalation	Aug-15	8.16%			4,800
	Bond		3.00%			1,909
	Soft Costs/Design Fees		30.00%			19,660
	Total Project Cost					$85,193
	Mechanical					
	Furnace Replacement					$
	replace furnace, pumps, air handler, and condensing units		3,424	sf	20.88	71,493
	disposal		1	ea	7,149.30	7,149
	electrician		1	day	581.27	581
	Sub Total - Direct Cost					79,223
	General Conditions		20.00%			15,845
	Overhead & Profit		23.00%			21,866
	Design & Price Reserve		15.00%			17,540
	Escalation	Aug-18	21.68%			29,154
	Bond		2.40%			3,927
	Soft Costs/Design Fees		30.00%			50,267
	Total Project Cost					217,822
	Replace Oil Fired Boiler					$
	demo boiler		3,424	sf	3.39	11,607
	disposal		1	ea	1,161.60	1,162
	oil fired boiler	2000mbh	1	ea	22,650.27	22,650
	electrician		1	day	581.27	581
	Sub Total - Direct Cost					36,000

Description	Note		Quantity	Unit	Price	Total
General Conditions			20.00%			7,200
Overhead & Profit			23.00%			9,936
Design & Price Reserve			15.00%			7,970
Escalation		Aug-15	8.16%			4,986
Bond			3.00%			1,983
Soft Costs/Design Fees			30.00%			20,423
Total Project Cost						$88,498
Air Conditioning Control At Sherman Memorial Room						$
provide air conditioning	allowance		997	sf	25.68	25,603
cutting and patching			1	ea	1,239.19	1,239
electrician			1	day	581.27	581
Sub Total - Direct Cost						27,423
General Conditions			20.00%			5,485
Overhead & Profit			23.00%			7,569
Design & Price Reserve			15.00%			6,072
Escalation		Aug-15	8.16%			3,798
Bond			3.00%			1,510
Soft Costs/Design Fees			30.00%			15,557
Total Project Cost						$67,414
Provide Mechanical Ventilation						$
provide mechanical ventilation for library	allowance		3,424	ea	20.54	70,329
electrician			1	day	581.27	581
Sub Total - Direct Cost						70,910
General Conditions			20.00%			14,182
Overhead & Profit			23.00%			19,571
Design & Price Reserve			15.00%			15,699
Escalation		Aug-15	8.16%			9,822
Bond			2.40%			3,124
Soft Costs/Design Fees			30.00%			39,992
Total Project Cost						$173,300
Electrical						
Upgrade Electrical Service						$
replace power distribution equipment			3,424	sf	5.14	17,599
disposal			1	ea	851.79	852
Sub Total - Direct Cost						18,451

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			3,690
Overhead & Profit		23.00%			5,092
Design & Price Reserve		15.00%			4,085
Escalation	Aug-15	8.16%			2,556
Bond		3.00%			1,016
Soft Costs/Design Fees		30.00%			10,467
Total Project Cost					$45,357
Upgrade Fire Alarm System					$
upgrade fire alarm system		3,424	sf	2.47	8,457
Sub Total - Direct Cost					8,457
General Conditions		20.00%			1,691
Overhead & Profit		23.00%			2,334
Design & Price Reserve		15.00%			1,872
Escalation	Aug-15	8.16%			1,171
Bond		3.00%			466
Soft Costs/Design Fees		30.00%			4,797
Total Project Cost					$20,788
Basement Lighting					$
remove basement lighting		848	sf	0.58	492
disposal		1	ea	242.00	242
lighting in basement		848	sf	12.34	10,464
Sub Total - Direct Cost					11,198
General Conditions		20.00%			2,240
Overhead & Profit		23.00%			3,091
Design & Price Reserve		15.00%			2,479
Escalation	Aug-15	8.16%			1,551
Bond		3.00%			617
Soft Costs/Design Fees		30.00%			6,353
Total Project Cost					$27,529
Plumbing					
Point Of Use Water Heaters					$
point of use water heaters and rough in		2	ea	1,417.26	2,835
Sub Total - Direct Cost					2,835
General Conditions		20.00%			567
Overhead & Profit		23.00%			782
Design & Price Reserve		15.00%			628
Escalation	Aug-15	8.16%			393
Bond		3.00%			156
Soft Costs/Design Fees		30.00%			1,608
Total Project Cost					$6,969

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
LIBRARY
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COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Upgrade Fixtures To Low Flow					$
demo fixtures		1	ea	145.20	145
toilet		1	ea	2,485.34	2,485
Sub Total - Direct Cost					2,630
General Conditions		20.00%			526
Overhead & Profit		23.00%			726
Design & Price Reserve		15.00%			582
Escalation	Aug-15	8.16%			364
Bond		3.00%			145
Soft Costs/Design Fees		30.00%			1,492
Total Project Cost					$6,465
Library Expansion/Renovation					$
Library expansion/renovation (cost plan)		4,488	sf	227.23	1,019,823
Sub Total - Direct Cost					1,019,823
General Conditions		12.00%			122,379
Overhead & Profit		14.00%			159,908
Design & Price Reserve		15.00%			195,317
Escalation	Aug-15	8.16%			122,190
Bond		2.00%			32,392
Soft Costs/Design Fees		30.00%			495,603
Total Project Cost					$2,147,612

TOWN OF BRIMFILED

Massachusetts

LIBRARY

Program Areas

`	EXISTING SPACE	SUGGESTED PROGRAM	TEST FIT AREAS - SEE PLAN
LIBRARY - BASEMENT			
Mechanical / Storage	806	806	806
TOTAL LIBRARY - BASEMENT	806	806	806
LIBRARY - FIRST FLOOR			
Book Stack #1	803		
Book Stack #2	661		
Storage #1	25	25	
Storage #2	45	45	45
Storage #3	31		
Kitchenette			25
Toilet	32		
Sherman Memorial Room	697		
Work Area	110		116
Entry		58	58
Director's Office		77	77
Circulation		360	163
AV/Public Circ Area			313
Children's		822	713
Fiction		435	294
Handicapped Toilets		110	110
Reading Room		661	661
Adult non-fiction / Reference/Historic		803	803
TOTAL LIBRARY - FIRST FLOOR	2404	3396	3378
LIBRARY - NET AREA			
Basement	806	806	806
First Floor	2404	3396	3378
TOTAL LIBRARY - NET AREA	3210	4202	4184
LIBRARY - GROSS AREA			
Basement	1124	1124	1124
First Floor	3010	4075	4071
TOTAL LIBRARY - NET AREA	4134	5199	5195

BUILDING USE AUDIT - CONDITION ASSESSMENT
Town of Brimfield, Massachusetts

Brimfield Highway Department

Wales Road

Year Constructed: Approx. 1995

Construction Type: Although the main building is IIB work to the building has lowered the classification to VB

Fire Sprinklers: No

Building Area per Floor:

First Floor:	6776 SF
Mezzanine:	747 SF
Total Area:	7523 SF

Shed Area per Building:

Shed #1:	2228 SF
Shed #2:	313 SF
Total Area:	2541 SF

Documents Used in Study:

Aerial Photographs.

Main Building:

3 Replace all locksets with lever hardware type exceept at the two toilet rooms. Add closer to exterior doors to Entrance Hall and Break Room.

4 VCT flooring in the Hall is damaged in several places. In other areas (Office, Toilets & Break Rm.) VCT is not performing well. Remove existing VCT flooring and base, replace with sheet vinyl.

3 Door to Toilet #2, both approaches do not meet code. Change door and frame to the opposite swing.

3 Door to Break Room has insufficient side clearances. Change door and frame to the opposite swing.

4 Suspended ceiling panels throughout are aged (dull/dirty & sagging) and need to be replaced.

3 Break Room kitchen base cabinet has no knee space and is not ADA compliant. Change base cabinets.

2 The riser/tread ratio and handrail on the wood stair up to the mezzanine do not meet code. Remove stair and build new metal stair.

2 At Mezzanine level the existing wood guardrail does not meet code. Remove and replace with new metal guardrail.

4 Install new trench drain and associated piping in existing concrete slab in Maintenance Bays and Vehicle / Storage Bays.

2 A storage container was placed adjacent to the west end of the building and a wood enclosure was constructed over it. Exiting from the storage container requires passing through three adjacent areas before reaching an exit access hallway. Code allows passage through only one adjacent space. Similarly, the direct and second exit from the vehicle bays has been enclosed by the wood structure leaving only one exit for the vehicle and maintenance bays. New exit doors should be added; one on the north side of the vehicle bays and one in the storage area adjacent to the container.

The storage container is not a permanent solution to the needs of the facility and should be replaces with a metal building addition. The addition needs to accommodate the storage needs plus space for items of equipment that cannot be currently stored in the building. It should also include a wash bay for vehicles with a water recycling system. See program information below.

Structural

The building is in general good condition. Refer to Structural Report.

Mechanical

4 Update heating equipment from oil to gas, saving energy due to better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

4 Update to programmable type thermostats for control of the furnaces.

4 Central air conditioning could easily be added for the furnace serving the office areas since the majority of the ductwork is accessible for installation of insulation. Add an evaporator coil on the discharge side of the furnace and provide a split system condensing unit outside the mechanical room piped to the coil. Further, provide a

means for outdoor air to this unit by ducting air from a small sidewall intake louver to the return side of the furnace. Provide a motorized damper on this outdoor air intake that opens upon activation of the fan.

2 There is no exhaust collection system. Add system to the maintenance bays (1st priority) and to the vehicle bays (2nd priority) or provide the following:

2 Depending on the usage of the vehicle fume exhaust system when the doors are closed it may be prudent to add a toxic gas detection system for the garage area to alert occupants upon a rise in CO and NO2 emissions which can be life threatening when breathed in by humans at certain concentrations. This type of system can be as simple as

- sounding an alarm or as complex as
- energizing ventilation equipment to deplete levels upon detection.

Plumbing

4 The water closet in the accessible bathroom at the front entrance should be replaced by a low flow fixture.

3 The laundry tub should be replaced.

2 The existing water heater should be provided with a mixing valve, such that 140°F can be maintained in the tank without the possibility of scalding at the fixtures.

Electrical

2 The manual transfer switch should be replaced with an automatic transfer switch and fixed generator. The use of a portable generator presents a safety concern with the dispensing of fuel, etc.

2 New LED exit signs with integral batteries should be provided to replace the existing.

4 The exterior lighting should be replaced with a high-efficiency LED type fixture to improve the lighting levels and reduce energy costs.

Shed #1

2 Salt and sand mixture is not fully contained within the building as a significant gap exists between the walls of the facility and the asphalt paving inside the facility. Overtime this will (or has) caused salt to leach into the ground. For the interior it is recommended that a continuous steel angle be bolted to the horizontal wood boards and columns, and

painted with bituminous paint, and sealed to the paving. The angle should be a minimum 7"x4"x3/8" with the long leg vertical.

3 Exterior siding has deteriorated where it connects to the ground. Bottom of siding should be removed to a consistent height around the entire building (approx. 1'-0"). Metal flashing to be install at bottom of existing siding, and new horizontal pressure treated siding installed to grade.

2 Diagonal wall braces are generally in good condition but two members need to be replaced.

2 Metal roof is in poor condition and needs to be replaced.

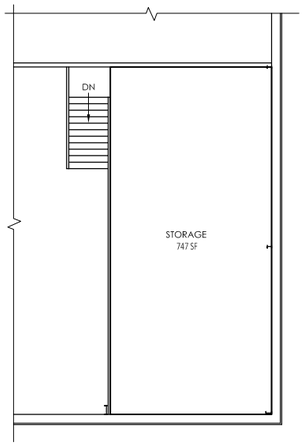
Shed #2

Building appears to be in good condition. No work is suggested at this time.

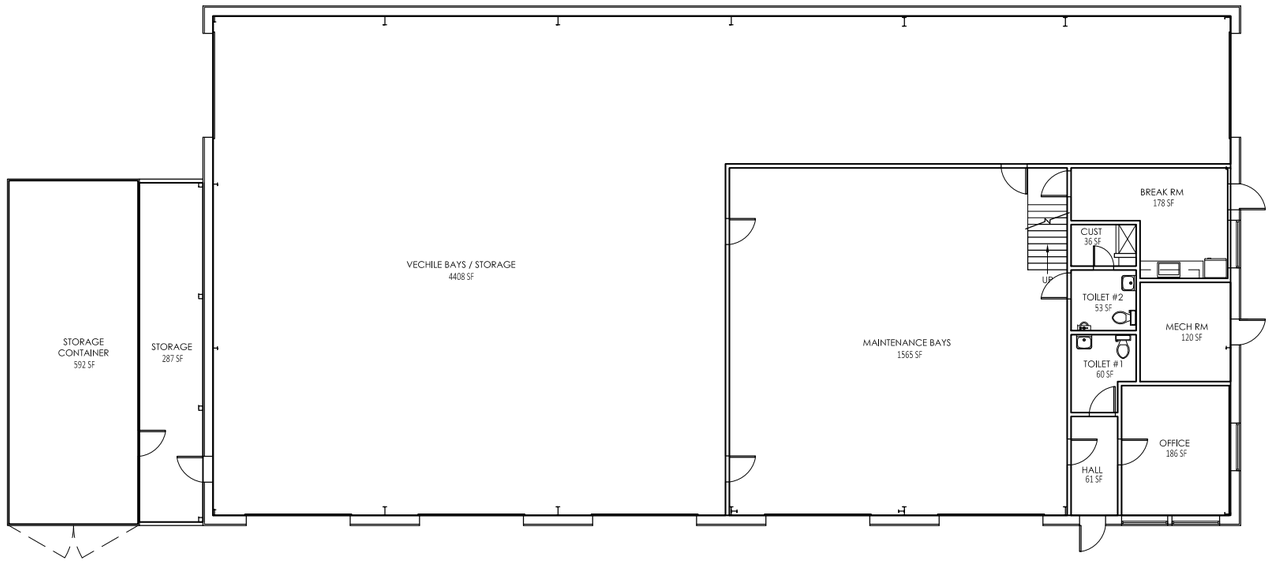
PROGRAM INFORMATION:

Main Building

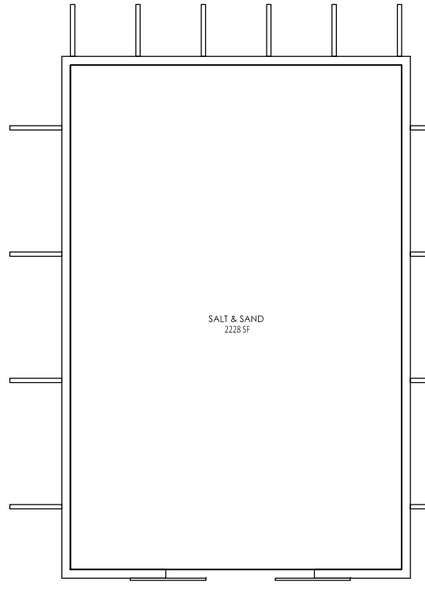
An expansion of the facility is recommended to provide permanent storage (in lieu of the storage container) and to provide a vehicle wash bay with a re-circulating wash system.
The expansion should be constructed to match the existing construction type of the building.



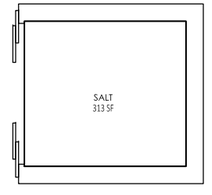
MEZZANINE PLAN



FIRST FLOOR PLAN



SHED #1 PLAN



SHED #2 PLAN

GRAPHIC SCALE

5 0 10 30

(IN FEET)

D·R·A

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

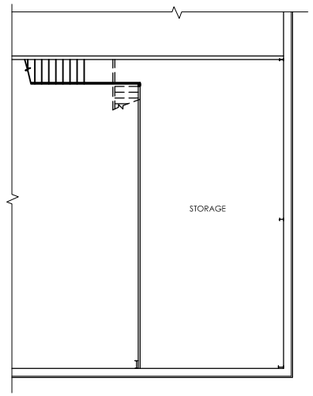
Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

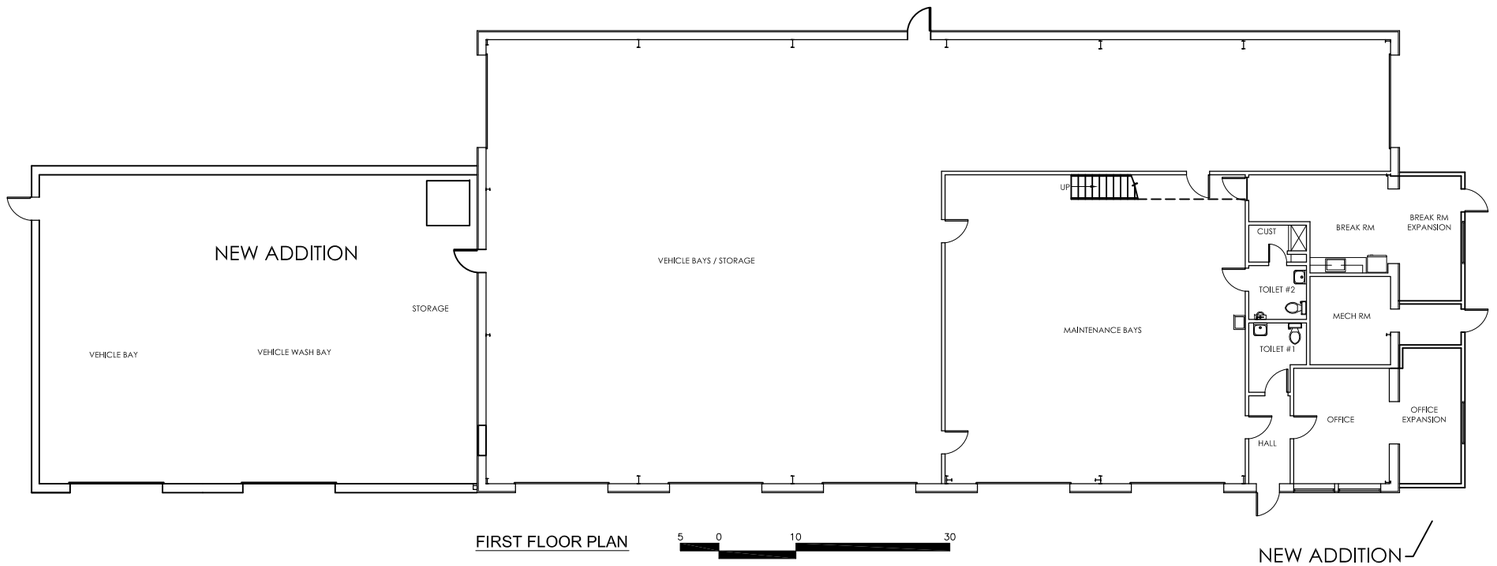
EXISTING HIGHWAY DEPARTMENT & SHEDS FLOOR PLAN

Scale: N.T.S.
Drawn by: ASJ
Job No. 13002.00
Date: 6/21/13

EX-HWAY



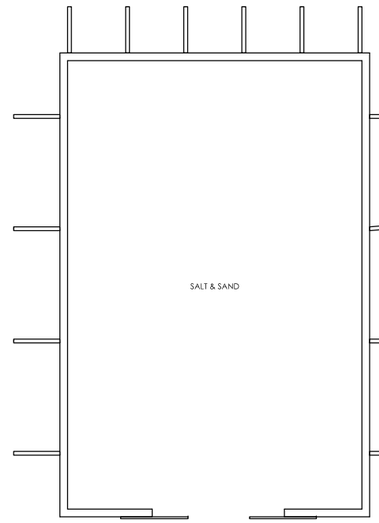
MEZZANINE PLAN



FIRST FLOOR PLAN

NEW ADDITION

PROPOSED HIGHWAY DEPARTMENT



SHED #1 PLAN

SHED #2 PLAN

Drummey Rosane Anderson, Inc.
235 Bear Hill Road, 4th Floor
Waltham, MA 02451

Planning 617-964-1700
Architecture 617-964-1701 fax
Interior Design info@draws.com

Town Of Brimfield
Municipal Facilities Study and Planning
Brimfield, Massachusetts

PROPOSED HIGHWAY DEPARTMENT & SHEDS FLOOR PLAN

Scale: N.T.S.
Drawn by: AJ/CGH
Job No. 13002.00
Date: 6/21/13

PR-HWAY

Highway Garage

Structural

Structural Description:

The Brimfield Highway Garage is a one-story pre-engineered, steel framed structure, located at 34B Wales Road in Brimfield. The construction date of the building is unknown; however, it appears to be 1970's vintage.

The Highway Garage is rectangular in plan, approximately 120 feet long (east-west) and 60 feet wide (north-south). There is a small (attached) shed structure on the west end of the building. In addition, there are two, separate Storage Sheds on the grounds, located to the east of the Garage. The larger Shed (No. 1) is used for sand and salt storage and the smaller (newer) Shed (No. 2) is used for salt storage only.

Offices are located at the east end of the Garage; a wood framed Storage Mezzanine was constructed over the Offices as well. There five (5) overhead doors to the west of the Offices, located along the south side of the building. There is an additional overhead door at the northeast corner of the building, behind the Offices. The roof is relatively flat, pitching downwards to the back/north side of the building for drainage.

Typical foundation construction is assumed to be conventional spread footings, with a concrete slab on grade First (Ground) Floor. Foundation walls (12" thick) extend approximately four feet above the floor on the north, east and west sides of the building. Roof construction consists of 9½" deep, galvanized steel "zee" purlins spaced at 5+/- feet on centers, spanning approximately 20 feet to steel frames. Steel frames clear span the space (approximately 60 feet) and pitch downwards to the back for drainage, as noted above. A metal roof with "bag" insulation spans between the zee purlins. The east and west end walls of the building are framed with a continuous steel edge/rake beam, supported by steel columns (4 equally spaced, approximately 20 feet on centers). Lateral stability (wind and seismic loads) in the north-south direction is provided by the rigid steel frames, spaced every 20+/- feet. In the east-west direction, lateral stability is provided by a single, 20+/- feet long braced frame (steel "X" braces) on the back/north wall and by a single, 20+/- feet long rigid steel frame (located in the same structural bay as the braced frame on the opposite wall) on the front/south wall. These two, east- west lateral force resisting elements are enjoined by "X" bracing in the plane of the roof . Exterior wall construction is insulated metal panels, spanning vertically to 9½" deep, galvanized steel

"zee" girts, which span horizontally (20+/- feet) to the steel frames. There are two lines of girts between the top of the foundation wall and the eave, resulting in three (3), approximately equal wall panel spans. Full height, light gauge jamb studs have been provided at overhead door locations.

Shed No. 1 is a one-story, wood framed storage structure with a gable roof. The building is rectangular in plan; approximately 40 feet wide by 60 feet long. Prefabricated, metal plate connected wood trusses, spaced at 4+/- feet on centers, clear span the roof (approximately 40 feet, in the east-west direction). Two inch (nominal) wood purlins (laid flat) spaced at 2+/- feet on centers span between trusses and support a metal roof, with ribs spanning up and down the slope. The building is uninsulated. Walls are wood framed, with buttressed, double wall construction at the lower regions to withstand the horizontal pressure from piled sand/salt. Foundations are unknown; however, it appears that a pole foundation may have been used (typical for this type of structure).

Shed No. 2 is a newer, one-story, wood framed storage structure, also with a gable roof. The building is rectangular in plan; approximately 22 feet square. The roof is stick-framed, with tied wood rafters spaced at 2+/- feet on centers, clear spanning the width of the building (approximately 22 feet in the north-south direction). Two inch (nominal)purlins (laid flat) spaced at 2+/- feet on centers span between the rafters and support a metal roof, with ribs spanning up and down the slope. The building is uninsulated. Foundations consist of interlocking, stacked, precast concrete blocks (2 feet wide by 2 feet high by 6+/- feet long), extending 4+/- feet above the floor level. Lateral pressure from piled salt are resisted by gravity forces exerted by the weight of the stacked blocks.

No original construction drawings or previous structural reports were available for the Garage or the Storage Sheds.

Structural Conditions/Issues – Comments and Recommendations:

Structural conditions at the Highway Garage were observed during a brief tour of the facility on May 13, 2013. Most of the roof and wall construction was exposed to view, except in the Office area. Generally speaking, floor and roof construction in the Garage appears to be performing satisfactorily; there is no evidence of structural distress that would indicate significantly overstressed, deteriorated or failed structural members. Foundations appear to be performing adequately; there are no signs of significant, total or differential settlements. The concrete slab on grade and the 4 feet high concrete wall on three sides of the building appear to be in satisfactory condition.

Structural/structurally related conditions observed during site visit are noted below:

- The condition of the metal panel exterior wall construction and backup steel girt framing system of the Garage appears to be generally satisfactory.

- The capacity of the wood framed Storage Mezzanine framing in the Garage was not determined; however, storage loading appears to be relatively light. Further review/evaluation is recommended in conjunction with future renovations to the building. .

- The capacity of the Garage roof framing was not determined (pre-engineered steel framing is a proprietary design) ; however, roof framing appears to be functioning as originally intended.

- Steel roof framing of the Garage is unprotected and has no fire resistance rating. There are no sprinklers. Fire rating requirements should be reviewed in conjunction with future renovations to the facility.

- The wood framed roof and wall construction of Shed No. 1 and Shed No. 2 appears to be quite light (not uncommon for unoccupied storage building); further review/evaluation is recommended in conjunction with future plans for the grounds surrounding the Garage. The wood buttresses that laterally brace the lower, double wall construction of Shed No. 1 have been overstressed in the past; one brace has noticeably failed.

<u>Building Code Requirements and Additional Comments</u>:

<u>Massachusetts State Building Code Requirements – General Comments</u>:

Proposed renovations, alterations, repairs and additions to the Brimfield Highway Garage would be governed by the provisions of the Massachusetts State Building Code (MSBC – 780 CMR 8th Edition) and the Massachusetts Existing Building Code (MEBC). These documents are based on amended versions of the 2009 International Building Code (IBC) and the 2009 International Existing Building Code (IEBC), respectively.

The MEBC allows the Design Team to choose one of three (3) compliance methods. Structurally, the Prescriptive Compliance Method is preferred. Section 101.5.4.0 of the Massachusetts Amendments (Chapter 34) would require that the existing building be investigated in sufficient detail to ascertain the effects of any proposed work (or change in use) in the area under consideration, and the entire building or structure and its foundations, if impacted by the proposed work or change in use.

<u>Additions – General Comments</u>:

The design and construction of any proposed additions would be conducted in accordance with the Code for new construction. Significant additions should be structurally separated from the existing building by an expansion (seismic) joint to avoid an increase in gravity loads and/or

lateral loads to existing structural elements. Smaller additions can be structurally attached to the existing building, provided they do not increase the demand - capacity ratio of the existing lateral force resisting elements in the building by more than 10%.

Renovations/Alterations – General Comments:

Where proposed alterations to existing structural elements carrying gravity loads results in a stress increase of over 5%, the affected element would need to be reinforced or replaced to comply with the Code for new construction. Proposed alterations to existing structural elements carrying lateral load (rigid frames or steel "X" bracing) which result in an increase in the demand - capacity ratio of over 10% should be avoided, if possible. Essentially, this means that removal of, or major alterations to these elements should be avoided. If this is not possible, more significant seismic upgrades/reinforcing will be required; potentially including the addition of lateral force resisting elements (additional "X" braces, etc.).

End of Structural Report

TOWN BUILDING ASSESSMENT STUDY AND CAPITAL MASTER PLAN
Town of Brimfield, Massachusetts

DPW Building

34 Wales Street

MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEMS

Prepared By:
Consulting Engineering Services
510 Chapman Street, Suite 201
Canton, MA 02021

July 3, 2013

GENERAL

The mechanical, electrical, plumbing, and fire protection systems were reviewed in conformance with the requirements of the following State and National codes and regulations, as applicable:

- Massachusetts State Building Code 8th Edition
- Massachusetts State Fire Prevention Regulations
- NFPA Latest Editions
- Massachusetts Plumbing Code
- Massachusetts Mechanical Code
- Massachusetts Electrical code (NEC 2011 Edition)
- Illuminating Engineering Society of North America (IESNA) Lighting Handbook
- ASHRAE 90.1 Latest Edition

The scope of this study does not include operational assessment of the fixtures and equipment reviewed; it includes only a brief visual review of the fixtures and equipment. Therefore notes regarding the condition of the fixtures and equipment may or may not be indicative of the actual condition of the systems and equipment and/or the expected life of the fixtures and equipment. Therefore it is recommended that services of a qualified technician be retained to evaluate the actual condition of fixtures and equipment prior to replacement.

MECHANICAL

HEATING

An oil fired, gravity vent, hot air furnace located in the mechanical room below the mezzanine serves the adjacent offices and ancillary spaces with overhead ducted supply and returns. This unit comprises a single zone with a dial type thermostat in the main office area. A single 275 gallon oil tank in the same room has local fill and vent connections at the exterior wall of building and fuels this furnace.

Another oil fired, gravity vent, hot air furnace located on the mezzanine within the main garage serves the heated portion of the garages with a single supply trunk down the middle of the space. The unit is controlled from a single dial thermostat in the garage. This furnace is also fueled from the oil tank in the mechanical room below via a separate oil line. Both furnaces tie into a common double wall venting assembly routed through the floor of the mezzanine then up through the roof. Both furnaces are in fair to good condition.

AIR CONDITIONING

There is no central air conditioning system in the building.

VENTILATION

The men's and women's bathrooms located below the mezzanine are both exhausted through an inline fan mounted on the mezzanine discharging to a louver in the side of the building. Windows in the office areas are operable and appear to meet the required free area for natural ventilation and there is no form of outdoor air to this building provided mechanically.

The unheated portion of the garage bays includes a large sidewall propeller fan in the corner of the building for general exhaust. This fan is locally switched on or off.

The heated garage bays include (4) ceiling paddle fans for general air circulation that are locally switched on or off. This area also has a vehicle fume exhaust system mounted overhead with (2) hose drops (tail pipe connectors) and a PVC discharge pipe from the fan routed through the back of the building to a wall cap. This system is also locally switched.

RECOMMENDATIONS

Update heating equipment from oil to gas, saving energy due to better equipment efficiencies and achieve an overall operating savings (if gas is locally available).

Update to programmable type thermostats for control of the furnaces.

Central air conditioning could easily be added for the furnace serving the office areas since the majority of the ductwork is accessible for installation of insulation. Add an evaporator coil on the discharge side of the furnace and provide a split system condensing unit outside the mechanical room piped to the coil. Further, provide a means for outdoor air to this unit by ducting air from a small sidewall intake louver to the return side of the furnace. Provide a motorized damper on this outdoor air intake that opens upon activation of the fan.

Depending on the usage of the vehicle fume exhaust system when the doors are closed it may be prudent to add a toxic gas detection system for the garage area to alert occupants upon a rise in CO and NO_2 emissions which can be life threatening when breathed in by humans at certain concentrations. This type of system can be as simple as sounding an alarm or as complex as energizing ventilation equipment to deplete levels upon detection.

ELECTRICAL

EXISTING SYSTEMS

The building is served by a single 200 amp electric service located in an equipment room accessed from the exterior of the building. The service equipment was installed in or around 1995 and is in good condition.

The building also has a 60amp manual transfer switch to which a portable generator is attached via portable cord in the event of a power outage. An existing 10,000w portable generator is stored in the maintenance bays. This generator is in good condition.

The lighting consists of 8’ industrial fluorescent fixtures with T8 lamps in the maintenance bays and 2x4 recessed acrylic lensed fixtures in office and other areas. The lighting in the maintenance bays and other areas is adequate.

The exit signs are older fluorescent types without batteries. These fixtures are in poor condition.

The exterior lighting consists of wall mounted high pressure sodium fixtures controlled by a time clock. These fixtures are in fair condition.

RECOMMENDATIONS

The manual transfer switch should be replaced with an automatic transfer switch and fixed generator. The use of a portable generator presents a safety concern with the dispensing of fuel, etc.

New LED exit signs with integral batteries should be provided to replace the existing.

The exterior lighting should be replaced with a high-efficiency LED type fixture to improve the lighting levels and reduce energy costs.

PLUMBING

EXISTING SYSTEMS

Water is provided by a well pump. See the Police and Fire Building study for additional information.

There is a stainless steel kitchen sink with a faucet and hose spray in the break room, which appears to be in good condition. As the water from the tap is not potable (see the Police and Fire Building study) a large bottled water unit is provided for drinking water.

There is an accessible restroom at the front entrance, and both the lavatory and the water closet in this restroom appear to be in good condition. The water closet is a floor mount vitreous china tank type fixture, and the lavatory is a wall mount vitreous china fixture. The water closet is not a low flow fixture.

There also is a second accessible restroom accessed from the service area, and the lavatory, the water closet, and the urinal in this restroom appear to be in good condition. The water closet is a floor mount vitreous china tank type fixture, the lavatory is a wall mount vitreous china fixture, and the urinal is a wall mount flush valve vitreous china type fixture. Both the water closet and the urinal are low flow fixtures.

There is a shower in the restroom accessed from the service area. Both the enclosure and the valve appear to be in fair condition. The valve appears to the pressure balanced type.

There is a laundry tub in the service area which appears to be in fair to poor condition.

There is an air compressor in service area towards the East. It appears to be in good condition. There is no permanent compressed air piping system in the building; hoses only are connected to the compressor.

The water heater is an oil fired tank type water heater that appears to be in fair condition. There is no mixing valve provided with the water heater.

There are no floor drains in any of the service bays.

RECOMMENDATIONS

The water closet in the accessible bathroom at the front entrance should be replaced by a low flow fixture.

The laundry tub should be replaced.

The existing water heater should be provided with a mixing valve, such that 140°F can be maintained in the tank without the possibility of scalding at the fixtures.

FIRE PROTECTION

The building does not have a sprinkler system.

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
	Basic Quantities		GFA		Girth	
	level 1		7,995	sf	421 lf	
	mezzanine		895	sf	133 lf	
	shed		2,425	sf	201 lf	
	salt shed		443	sf	84 lf	
3	Door Hardware					$
	remove door hardware		9	ea	68.97	621
	disposal		1	ea	96.80	97
	new lever hardware		9	ea	874.74	7,873
	exterior door closer		2	ea	1,563.23	3,126
	Sub Total - Direct Cost					11,717
	General Conditions		20.00%			2,343
	Overhead & Profit		23.00%			3,234
	Design & Price Reserve		15.00%			2,594
	Escalation	May-15	8.16%			1,623
	Bond		3.00%			645
	Soft Costs/Design Fees		30.00%			6,647
	Total Project Cost					$28,803
4	VCT Flooring					$
	demo VCT flooring		527	sf	0.62	327
	demo base		215	lf	0.96	206
	disposal		1	ea	96.80	97
	self leveling underlayment		527	sf	1.21	638
	sheet vinyl flooring		527	sf	7.35	3,873
	vinyl base		215	lf	2.52	542
	Sub Total - Direct Cost					5,683
	General Conditions		20.00%			1,137
	Overhead & Profit		23.00%			1,569
	Design & Price Reserve		15.00%			1,258
	Escalation	May-15	8.16%			787
	Bond		3.00%			313
	Soft Costs/Design Fees		30.00%			3,224
	Total Project Cost					$13,971
3	Toilet #2					$
	demo door and frame		1	leaf	47.96	48
	disposal		1	ea	48.40	48
	new h.m. door and frame		1	leaf	1,541.08	1,541
	paint door		1	ea	120.05	120
	patch wall as required		1	ea	306.25	306
	Sub Total - Direct Cost					2,063

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			413
	Overhead & Profit		23.00%			569
	Design & Price Reserve		15.00%			457
	Escalation	May-15	8.16%			286
	Bond		3.00%			114
	Soft Costs/Design Fees		30.00%			1,171
	Total Project Cost					$5,073
3	Break Room					$
	demo door and frame		1	leaf	47.96	48
	disposal		1	ea	48.40	48
	new h.m. door and frame		1	leaf	1,541.08	1,541
	paint door		1	ea	120.05	120
	patch wall as required		1	ea	306.25	306
	Sub Total - Direct Cost					2,063
	General Conditions		20.00%			413
	Overhead & Profit		23.00%			569
	Design & Price Reserve		15.00%			457
	Escalation	May-15	8.16%			286
	Bond		3.00%			114
	Soft Costs/Design Fees		30.00%			1,171
	Total Project Cost					$5,073
4	Ceilings					$
	demo suspended ceilings (act)		8,890	sf	0.73	6,490
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	new act ceilings		8,890	sf	3.76	33,426
	Sub Total - Direct Cost					42,453
	General Conditions		20.00%			8,491
	Overhead & Profit		23.00%			11,717
	Design & Price Reserve		15.00%			9,399
	Escalation	May-15	8.16%			5,880
	Bond		3.00%			2,338
	Soft Costs/Design Fees		30.00%			24,083
	Total Project Cost					$104,361
3	Modify Kitchen Base Cabinet					$
	demo kitchen base cabinets		7	lf	9.24	65
	disposal		1	ea	72.60	73
	base cabinets with ADA required knee space and ctop		7	lf	262.50	1,838
	Sub Total - Direct Cost					1,976

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
	General Conditions		20.00%			395
	Overhead & Profit		23.00%			545
	Design & Price Reserve		15.00%			437
	Escalation	May-15	8.16%			274
	Bond		3.00%			109
	Soft Costs/Design Fees		30.00%			1,121
	Total Project Cost					$4,857
2	Stair To Mezzanine					$
	demo stair		50	lfr	33.88	1,694
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	new steel pan stair		50	lfr	130.69	6,535
	radial rubber stair tread/riser		50	lfr	19.56	978
	new guard rail		24	lf	179.90	4,318
	new hand rail		24	lf	154.20	3,701
	paint guard rail		24	lf	14.70	353
	paint hand rail		24	lf	4.29	103
	cut and patch as required		1	ea	1,010.95	1,011
	Sub Total - Direct Cost					21,230
	General Conditions		20.00%			4,246
	Overhead & Profit		23.00%			5,859
	Design & Price Reserve		15.00%			4,700
	Escalation		8.16%			2,940
	Bond		3.00%			1,169
	Soft Costs/Design Fees		30.00%			12,043
	Total Project Cost					52,187
2	Mezzanine Guardrail					$
	demo wood guardrail		64	lf	4.63	296
	disposal		1	ea	66.20	66
	metal guardrail		64	lf	198.60	12,710
	paint guard rail		64	lf	14.70	941
	Sub Total - Direct Cost					14,013
	General Conditions		20.00%			2,803
	Overhead & Profit		23.00%			3,868
	Design & Price Reserve		15.00%			3,103
	Escalation	May-15	8.16%			1,941
	Bond		3.00%			772
	Soft Costs/Design Fees		30.00%			7,950
	Total Project Cost					$34,450

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

	Description	Note	Quantity	Unit	Price	Total
4	New Trench Drain					$
	saw cut concrete	allowance	200	lf	1.94	388
	remove concrete slab	allowance	100	sf	9.68	968
	disposal	allowance	1	ea	242.00	242
	excavation inside existing building	allowance	7	cy	108.42	759
	disposal off site	allowance	7	cy	24.72	173
	trench drain - piping and cover	allowance	100	lf	112.65	11,265
	connect to drainage system	allowance	1	ea	513.50	514
	Sub Total - Direct Cost					14,309
	General Conditions		20.00%			2,862
	Overhead & Profit		23.00%			3,949
	Design & Price Reserve		15.00%			3,168
	Escalation	May-15	8.16%			1,982
	Bond		3.00%			788
	Soft Costs/Design Fees		30.00%			8,117
	Total Project Cost					$35,175
2	Storage Container - Additional Exits					$
	demo exterior walls for new openings		2	ea	242.00	484
	disposal		1	ea	169.40	169
	exterior h.m. door, frame and hardware		2	leaf	2,740.69	5,481
	paint exterior door		2	leaf	157.73	315
	Sub Total - Direct Cost					6,449
	General Conditions		20.00%			1,290
	Overhead & Profit		23.00%			1,780
	Design & Price Reserve		15.00%			1,428
	Escalation	May-15	8.16%			893
	Bond		3.00%			355
	Soft Costs/Design Fees		30.00%			3,659
	Total Project Cost					$15,854
	Highway Department Addition					$
	demo wood storage enclosure		903	sf	4.84	4,371
	dumpster rental		1	weeks	734.71	735
	load & truck	10 mile round trip	20	cy	55.27	1,105
	dump charges		8	ton	87.12	697
	metal building addition		2,456	sf	250.37	614,909
	addition from other side of building		348	sf	250.37	87,129
	water recycling system in wash bay	arch quote	1	ea	30,000.00	30,000
	catch basin		1	ea	2,420.00	2,420
	saw cut concrete	allowance	200	lf	1.94	388
	remove concrete slab	allowance	100	sf	9.68	968
	disposal	allowance	1	ea	242.00	242
	excavation inside existing building	allowance	7	cy	108.42	759
	disposal off site	allowance	7	cy	24.72	173
	trench drain - piping and cover	allowance	100	lf	112.65	11,265
	connect to drainage system	allowance	1	ea	513.50	514
	Sub Total - Direct Cost					755,675

Description	Note	Quantity	Unit	Price	Total
General Conditions		14.00%			105,795
Overhead & Profit		16.00%			137,835
Design & Price Reserve		15.00%			149,896
Escalation	May-15	8.16%			93,775
Bond		2.00%			24,860
Soft Costs/Design Fees		30.00%			380,351
Total Project Cost					$1,648,187

Mechanical

Heating Equipment					$
demo oil heating equipment		1	ea	704.37	704
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
new gas service - trench only - service by gas company		200	lf	26.18	5,236
misc. exterior repairs from trench		1	ea	1,936.00	1,936
cast iron gas boiler	160mbh	1	ea	4,589.90	4,590
cast iron gas boiler	60mbh	1	ea	1,721.21	1,721
condensing unit	3 ton	1	ea	6,547.13	6,547
gas piping allowance	1 1/4"	100	lf	16.95	1,695
Sub Total - Direct Cost					24,966
General Conditions		20.00%			4,993
Overhead & Profit		23.00%			6,891
Design & Price Reserve		15.00%			5,528
Escalation	May-15	8.16%			3,458
Bond		3.00%			1,375
Soft Costs/Design Fees		30.00%			14,163
Total Project Cost					$61,374

Replace Existing Thermostats					
demo existing thermostats	allowance	10	ea	72.60	726
dispoal		1	ea	48.40	48
new thermostats	allowance	10	ea	256.75	2,568
Sub Total - Direct Cost					3,342
General Conditions		20.00%			668
Overhead & Profit		23.00%			922
Design & Price Reserve		15.00%			740
Escalation	May-15	8.16%			463
Bond		3.00%			184
Soft Costs/Design Fees		30.00%			1,896
Total Project Cost					8,215

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Central Air					$
add evaporator coil on discharge side of furnace		1	ea	1,540.50	1,541
condensing unit	3 ton	1	ea	6,547.13	6,547
split system condensing unit piped to coil	allowance	100	lf	6.90	690
vent unit to exterior		1	ea	1,283.75	1,284
small motorized damper		1	ea	829.77	830
electrician		1	day	478.97	479
Sub Total - Direct Cost					11,371
General Conditions		20.00%			2,274
Overhead & Profit		23.00%			3,138
Design & Price Reserve		15.00%			2,517
Escalation	May-15	8.16%			1,575
Bond		3.00%			626
Soft Costs/Design Fees		30.00%			6,450
Total Project Cost					$27,951
Vehicle Exhaust Collection Sytem					$
exhaust collection system maintenance bays		1,564	sf	5.14	8,039
exhaust collection system vehicle bays		4,408	sf	5.14	22,657
Sub Total - Direct Cost					30,696
General Conditions		20.00%			6,139
Overhead & Profit		23.00%			8,472
Design & Price Reserve		15.00%			6,796
Escalation	May-15	8.16%			4,252
Bond		3.00%			1,691
Soft Costs/Design Fees		30.00%			17,414
Total Project Cost					$75,460
Toxic Gas Detection System					$
garage area - alarm only	C02 and NO2	5,972	sf	0.77	4,598
Sub Total - Direct Cost					4,598
General Conditions		20.00%			920
Overhead & Profit		23.00%			1,269
Design & Price Reserve		15.00%			1,018
Escalation	May-15	8.16%			637
Bond		3.00%			253
Soft Costs/Design Fees		30.00%			2,609
Total Project Cost					$11,304
Toxic Gas Detection System					$
garage area - energizing ventilation equipment	C02 and NO2	5,972	sf	7.70	45,984
Sub Total - Direct Cost					45,984

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			9,197
Overhead & Profit		23.00%			12,692
Design & Price Reserve		15.00%			10,181
Escalation	May-15	8.16%			6,369
Bond		3.00%			2,533
Soft Costs/Design Fees		30.00%			26,087
Total Project Cost					$113,043
Shed #1					$
continuous p.t. 2"x10" bolted to horizontal boards		201	lf	2.79	561
paint - bituminous		201	lf	2.72	547
sealant		201	lf	6.18	1,242
Sub Total - Direct Cost					2,350
General Conditions		20.00%			470
Overhead & Profit		23.00%			649
Design & Price Reserve		15.00%			520
Escalation	May-15	8.16%			326
Bond		3.00%			129
Soft Costs/Design Fees		30.00%			1,333
Total Project Cost					$5,777
Shed #1 Exterior Wall					$
saw cut perimeter of exterior wood wall	1' up from ground	201	lf	28.27	5,682
remove siding	1' up from ground	201	sf	2.42	486
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
metal flashing at perimeter		201	lf	16.85	3,387
pressure treated horizontal wood siding		201	sf	3.00	603
Sub Total - Direct Cost					12,695
General Conditions		20.00%			2,539
Overhead & Profit		23.00%			3,504
Design & Price Reserve		15.00%			2,811
Escalation	May-15	8.16%			1,758
Bond		3.00%			699
Soft Costs/Design Fees		30.00%			7,202
Total Project Cost					$31,208
Shed #1 Wall Braces					$
demo two diaganol wall braces	2 each @ 12'	24	lf	14.04	337
disposal		1	ea	48.35	48
replace diaganal wall braces	small area	24	lf	16.97	407
Sub Total - Direct Cost					792

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			158
Overhead & Profit		23.00%			219
Design & Price Reserve		15.00%			175
Escalation	May-15	8.16%			110
Bond		3.00%			44
Soft Costs/Design Fees		30.00%			449
Total Project Cost					$1,947
Shed #1 Roof					$
demo metal roof		2,425	sf	2.37	5,747
dumpster rental		1	weeks	734.71	735
load & truck	10 mile round trip	20	cy	55.27	1,105
dump charges		8	ton	87.12	697
new metal roof		2,425	sf	16.85	40,861
Sub Total - Direct Cost					49,145
General Conditions		20.00%			9,829
Overhead & Profit		23.00%			13,564
Design & Price Reserve		15.00%			10,881
Escalation	May-15	8.16%			6,807
Bond		3.00%			2,707
Soft Costs/Design Fees		30.00%			27,880
Total Project Cost					$120,813
Electrical					
Generator And Automatic Transfer Switch					$
generator - gas 50kw		1	ea	29,760.60	29,761
Sub Total - Direct Cost					29,761
General Conditions		20.00%			5,952
Overhead & Profit		23.00%			8,214
Design & Price Reserve		15.00%			6,589
Escalation	May-15	8.16%			4,122
Bond		3.00%			1,639
Soft Costs/Design Fees		30.00%			16,883
Total Project Cost					$73,160
Exit Signs					
demo exisiting exit signs		10	ea	62.48	625
disposal		1	ea	48.40	48
exit signs throughout		8,890	sf	0.41	3,645
Sub Total - Direct Cost					4,318

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			864
Overhead & Profit		23.00%			1,192
Design & Price Reserve		15.00%			956
Escalation	May-15	8.16%			598
Bond		3.00%			238
Soft Costs/Design Fees		30.00%			2,450
Total Project Cost					10,616
Exterior LED Lighting					
demo exisiting exterior lighting	allowance	10	ea	43.56	436
disposal		1	ea	242.00	242
new exteior lighting	allowance	10	ea	771.00	7,710
Sub Total - Direct Cost					8,388
General Conditions		20.00%			1,678
Overhead & Profit		23.00%			2,315
Design & Price Reserve		15.00%			1,857
Escalation	May-15	8.16%			1,162
Bond		3.00%			462
Soft Costs/Design Fees		30.00%			4,759
Total Project Cost					20,621
Plumbing					
Replace Water Closets					
remove water closet		1	ea	117.13	117
disposal		1	ea	48.40	48
low flow water closet		1	ea	2,485.34	2,485
Sub Total - Direct Cost					2,650
General Conditions		20.00%			530
Overhead & Profit		23.00%			731
Design & Price Reserve		15.00%			587
Escalation	May-15	8.16%			367
Bond		3.00%			146
Soft Costs/Design Fees		30.00%			1,503
Total Project Cost					6,514
Replace Laundry Tub					
remove laundry tub		1	ea	165.77	166
disposal		1	ea	48.40	48
new laundry tub		1	ea	3,517.48	3,517
Sub Total - Direct Cost					3,731

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
HIGHWAY DEPARTMENT
BRIMFIELD, MA 01010 GFA 8,890

Description	Note	Quantity	Unit	Price	Total
General Conditions		20.00%			746
Overhead & Profit		23.00%			1,030
Design & Price Reserve		15.00%			826
Escalation	May-15	8.16%			517
Bond		3.00%			206
Soft Costs/Design Fees		30.00%			2,117
Total Project Cost					9,173
Install Mixing Valve					
install mixing vlave		1	ea	3,748.55	3,749
Sub Total - Direct Cost					3,749
General Conditions		20.00%			750
Overhead & Profit		23.00%			1,035
Design & Price Reserve		15.00%			830
Escalation	May-15	8.16%			519
Bond		3.00%			206
Soft Costs/Design Fees		30.00%			2,127
Total Project Cost					9,216

TOWN OF BRIMFIELD
Massachusetts

HIGHWAY DEPARTMENT
Program Areas

	EXISTING SPACE	QUANTITY	PROPOSED AREA	NEW ADDITIONS
HIGHWAY DEPT. - FIRST FLOOR				
Hall	61		61	
Office	186		331	145
Toilet Rooms	113		113	
Custodian	36		36	
Mechanical Room	120		166	46
Break Room	178		319	141
Maintenance Bays	1565		1565	
Vehicle Bays	4408		6688	2280
TOTAL HIGHWAY DEPT. - FIRST FLOOR	6667		9279	2612
HIGHWAY DEPT. - MEZZANINE				
Storage	747		747	
TOTAL HIGHWAY DEPT. - MEZZANINE	747		747	
HIGHWAT DEPT. - NET ROOM AREA				
First Floor	6667		9279	2612
Mezzanine	747		747	
TOTAL HIGHWAY DEPT. - NET ROOM AREA	7414		10026	2612
HIGHWAT DEPT. - NET GROSS AREA				
First Floor	7130		9921	2791
Mezzanine	816		816	
TOTAL HIGHWAY DEPT. - NET GROSS AREA	7946		10737	2791

USE GROUP S-1
Type VB Construction
Single Story 9,000 SF

HIGHWAY DEPT. - SHED #1 - NET AREA	2228
HIGHWAT DEPT. - SHED #2 - NET AREA	313

Town of Brimfield

Use of Cost Estimate Information

At study phase we do not know how the Town might package contracts or combine items. Accordingly we price each item in the study as work performed by a General Contractor, requiring professionally designed bid documents and construction oversight & contract administration by a professional design team. These and other factors affect the study direct cost estimates as follows;

An item is added for General Conditions. This is a General Contractor item to cover the cost of all of the items stipulated in a typical construction contract and bid specification including such items as insurance, temporary utilities, site offices, OSHA requirements, and other non-direct costs of performing work that are required of a General Contractor. The percentage used is based on the size of the contract. The smaller the contract, the higher the percentages because fixed costs are spread over a smaller base figure.

An item is added for Overhead and Profit. Again, this is a General Contractor item. It covers the cost of the GC home office, estimating staff, admin staff, and other standard overhead items. It also includes a fair and reasonable profit margin in normal market conditions. Again, the smaller the contract, the higher the percentage is to meet the necessary expenses of doing business.

An item is added for Design & Price Reserve. It is important to note that actual designs put out to bid often vary from design solutions envisaged in studies. A study is conceptual in nature whereas bids are based on fully developed design documents. The full amount of money required will not be known until the contract is complete along with the cost of any extras. It is not uncommon for additional unforeseen work to be uncovered during further design investigation or during construction. Rotted roof deck, rock excavation, code changes requiring a different design solution are all examples of possible additional costs that may be incurred on the design side. On the price side this contingency guards against changing economic conditions and inflationary pressures beyond the norm as the economy improves.

Escalation at a rate of 4% per annum is added from the date the estimate is prepared to update the estimate to its anticipated earliest bid date. This item covers the normal annual increases in union wages and normal annual material price increases. All prices indicated will need to be increased by 4% per annum to their projected bid date over the years covered in this report.

The cost of bonding the General Contractor and his subcontractors is added. The rate of this insurance varies with the size of the contract and the annual construction volume of the winning bidder.

Owner soft costs typically run 30% on public work projects. Soft costs include architectural, engineering, financing, and legal fees, and any other Town-paid pre- and post-construction expenses. Costs are included in each item for a professional design team to fully explore and develop a complete design solution through bid documents, manage the bid process and supervise & administer the construction contract.

The cumulative effect of all of these compounded percentages uplift the total Direct Cost estimates significantly to the total Project Cost estimate.

Whether items are bid to a GC or to a sub-contractor, whether an architectural team is involved, whether wage rates are applicable are examples of how these estimates may vary. It is very important to understand that the procurement method and contract packaging do have a considerable impact on budgeting for the construction, and that the soft cost portion of the estimates should not be allocated to the hard construction budget. Also that the construction bid price is not normally the final construction cost or the total cost of the project when all expenditures are tallied.

TOWN OF BRIMFIELD BUILDING USE AUDIT - CONDITIONS ASSESSMENT
MARKUP LIST
BRIMFIELD, MA 01010

COSTPRO, INC.

Description	Note	Quantity	Unit	Price	Total
Markups - To Be Calculated Cumulatively					
General Conditions					
Project Value Less That 200k			20.00%		
Project Value 200k - 500k			16.00%		
Project Value 500k - 1mil			14.00%		
Project Value 1mil - 2mil			12.00%		
Project Value 2mil - 5mil			10.00%		
Overhead & Profit					
Project Value Less That 200k			23.00%		
Project Value 200k - 500k			18.00%		
Project Value 500k - 1mil			16.00%		
Project Value 1mil - 2mil			14.00%		
Project Value 2mil - 5mil			12.00%		
Design & Price Reserve			15.00%		
Escalation					
1 Years From Now	Aug-14		4.00%		
2 Years From Now	Aug-15		8.16%		
3 Years From Now	Aug-16		12.50%		
4 Years From Now	Aug-17		17.00%		
5 Years From Now	Aug-18		21.68%		
Bond					
Project Value Less That 100k			3.00%		
Project Value 100k - 1mil			2.40%		
Project Value 1mil - 2mil			2.00%		
Project Value 2mil - 5mil			1.60%		
Project Value 5mil - 10mil			1.34%		
Soft Costs/Design Fees			30.00%		