

INTRODUCTION TO NEEDS ASSESSMENT / PLANNING / PROGRAMMING

The scope of this study includes the evaluation of programmatic requirements for the following Town departments:

- Department of Public Works
- Fire and Police Departments
- Community Building
- Memorial Park Building

The scope also included programming information completed during the programming portion of an independent study by others:

- Hillside, Mitchell and Pollard Schools
- Needham High School
- School Administration
- Rosemary Pool
- Cricket Field

The approach was to analyze and document current and future building and site space needs, including access by the public, and relationships or synergies with other departments on or near the site. This section includes the following:

- Overview of programs requiring assessment
- Program Summary
- Overview of programs by Others
- Program Summary

METHODOLOGY

Programmatic requirements were developed based on data from several sources:

- **Previous Studies:** Programmatic requirements developed in the 2006 Town wide Comprehensive Facilities Study were reviewed (See Inventory of Previous Studies, Volume 3 - Appendix).
- **Existing Drawings:** Available drawings of existing facilities for town departments were reviewed to

document existing space use. Department personnel provided additional information on areas of storage located off site from their primary location. Existing floor plans, if available, are included in Volume 2.

- **Direct Observation:** Existing spaces were observed during site visits for both the adequacy of space available and how that space was configured to meet operational needs. Site visits for several buildings focused on code and structural issues related to potential reuse.
- **User Interviews:** Interviews with appropriate town staff were undertaken during the spring of 2014. These meetings included a walk-through of sites and meeting sessions where program needs were discussed and options reviewed. Programming Questionnaires are included in Volume 3.
- **Equipment Inventory:** Storage requirements for Fire, Police and DPW vehicles and large equipment are based upon Vehicles and Equipment Inventory provided by departments. (See Volume 2).
- **Summary of Functional Requirements:** Functional requirements for each department have been documented in department overviews.
- **Organizational Charts:** Department Organization charts have been prepared by Town staff showing existing staff and potential future staff.
- **Program Net Square Footage (NSF):** The NSF for each department has been tabulated based upon current needs with consideration of future expansion. NSF is defined as space assigned to do an activity.
- **Building Gross Square Footage (GSF):** The GSF requirements includes the NSF plus factors for circulation and interior and exterior wall construction. GSF numbers are generally conservative by design, and more so during a master plan phase. It should be a goal, during the study leading to the design phase, to review programming and attempt to reduce the GSF in the range of 5-10%. Also note that final GSF for a building is dependent on the scheme selected and actual site conditions.

ELEMENTARY, MIDDLE AND HIGH SCHOOLS

Needham has five elementary schools, two middle

schools and one high school with enrollment totaling 5,465 students for the 2014 - 2015 school year. Planning for appropriate school space for Needham's students is a priority for Town of Needham and the construction initiatives being considered continue to seek equitable facilities across the school system. The Needham community has supported renovations and new school construction projects at Newman, Broadmeadow and John Eliot Elementary Schools, the 6th grade center at High Rock Elementary School, Pollard Middle School and Needham High School. Significant renovation and / or replacement of the Hillside and Mitchell elementary schools and expansion at the Pollard Middle School and the Needham High School are now in the planning stages.

The Permanent Public Building Committee (PPBC) and the School Committee hired the architectural firm Dore and Whittier to study and analyze the options for renovating and / or replacing Hillside and Mitchell including the submission to the Massachusetts School Building Authority (MSBA) for further study and possible state funding of a renovation project for both schools. The Pollard Middle School was studied separately.

The School Committee established several conditions to consider in their planning. Among them:

- Elementary schools sized between 400 and 500 as optimum
- Neighborhood based schools which reduce transportation costs and build a sense of community and ownership
- Full day Kindergarten option as an educational goal
- Minimize redistricting
- Avoidance of costly and un-reimbursable features like temporary classrooms to house students while construction is underway

Elementary Schools

Two major construction initiatives underway involve the oldest and most crowded elementary schools: Hillside and Mitchell Schools. In order to meet both building, energy and accessibility codes and the educational goals of the School Department substantial construction work will need to be undertaken at these schools.



Photo 24: Mitchell School



Photo 25: Pollard Middle School - Interior



Photo 26: Pollard Middle School - Modular Classrooms

The Comprehensive Facilities Assessment provided an independent architectural, engineering and code evaluation that identified and prioritized a capital maintenance plan as well as documented the extent of renovations and improvements needed to determine the future viability of the existing buildings / site. The assessment documents provide the following for each school:

- Documentation of existing conditions and a physical assessment of each building and site with recommendations to address deficiencies
- A Capital Improvements Plan that summarizes the recommendations and prioritizes them into near term and long term categories
- Recommendations for energy efficient measures gained by upgrading or replacement of equipment, systems, or building components that can reduce energy related operating costs or even reduce carbon footprint
- A review of potential future uses in relationship to building systems and equipment, safety of occupants, changes in educational programs, space use and technology in education

Both of the schools are well maintained but neither has had a significant renovation or permanent addition in over 40 years, other than the addition of modular classrooms. Each building has equipment and building components that have reached the end of their useful life and are due for replacement. Codes have changed significantly and have increased requirements to provide safe, healthy and accessible school environments. Energy codes, developed and enhanced in the past decade, require increased insulation in building envelopes, higher efficiency mechanical and electrical equipment, plumbing fixtures and building systems components.

The Hillside School, nestled into a hillside and with significant wetlands, has limited expansion capabilities. Additional issues facing construction at this site include the high water table, limited vehicular access and the designation of this site per the DEP for environmental monitoring and remediation from a 1980's off-site chemical spill. All of these mitigating factors are under consideration when determining the future viability and / or constraints of the Hillside site.

The Mitchell School, located on a relatively flat site, has

greater potential for possible future construction. Due to increased enrollment needs, four pre-fab classrooms were constructed and opened for the September 2014 school year. These new classrooms meet the expectations for appropriate classroom space and temporarily help mitigate the overcrowding issue.

On November 20, 2013 the Massachusetts School Building Authority (MSBA) voted to invite the Hillside Elementary School into the MSBA Eligibility Period. On July 30, 2014 the MSBA voted to collaborate with Needham in conducting a Feasibility Study. The MSBA partners with communities to support the design and construction of educationally appropriate flexible, sustainable and cost effective facilities. Any state aid that the Town receives will come through the MSBA reimbursement.

Pollard Middle School

The Comprehensive Facilities Assessment for this school was completed separately due to the focus of the study. This 7th and 8th grade middle school will remain in its current use through the next decade and repairs or improvements are viewed as long term investments. The assessment provided an independent architectural, engineering and code evaluation that identified and prioritized a capital improvements as well as providing space use recommendations regarding science classrooms, the auditorium and the administrative offices. The assessment documents provide the following for this school:

- Documentation of existing conditions and a physical assessment of this building and site with recommendations to address deficiencies
- A Capital Improvements Plan that summarizes the recommendations and prioritizes them into near term and long term categories
- Recommendations for energy efficient measures gained by upgrading or replacement of equipment, systems, or building components that can reduce energy related operating costs or even reduce carbon footprint
- A review of space deficiencies of the science and administrative areas and possible concepts for improvements

- A review of potential future uses in relationship to building systems and equipment, safety of occupants, changes in educational programs, space use and technology in education. Long term building renovations recommendations support the integration of sustainable design components.

Pollard Middle School was built in 1956, with major additions in 1962 and 1992. The school was further expanded in 2002 with the addition of ten portable classrooms. The building is well maintained and the Town Facilities Department has an on-going list of improvements that are in progress. The results of the study documented a number of health, life safety and welfare improvements that are recommended to meet current codes and continued use of this facility. Short term repairs are important and the study recommended looking out 40-50 years as renovations and improvements are considered. Notable issues include:

- Science classrooms to meet current standards including prep rooms and storage
- Location of administrative offices to improve visibility and to provide appropriate workspace
- Auditorium upgrades to enhance this community space
- General improvements to gymnasiums
- Replacement of modular classrooms with permanent facilities
- Consideration of "21st Century Learning" as it relates to middle school learning-teaching methods
- Code related upgrades

Needham High School

Needham High School was designed to accommodate 1,450 students with the ability to accommodate 1,600 students for short peak durations. With the student body now expecting to exceed 1,750 students, the school is running out of classroom space. Planning is underway to construct permanent pre-fabricated / modular classrooms with an expanded cafeteria.



Photo 27: Hillside School

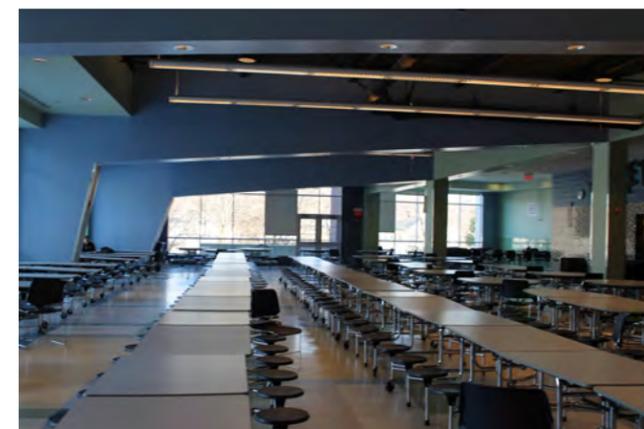


Photo 28: Needham High School - Cafeteria



Photo 29: Emery Grover Building

SCHOOL ADMINISTRATION

School Administration departments are primarily located in the historic Emery Grover Building with some additional spaces dispersed in other locations due to lack of space. This building is not accessible for staff or visitors, does not have enough office and meeting rooms, is in poor overall condition and includes unusable space such as the attic. A study completed in 2010 by Bargmann Hendrie + Archetype Inc., when the building was being considered for use as a senior center, includes an extensive conditions assessment with recommendations for repair and restoration. Code requirements would dictate a new elevator and a rebuild of egress stairs. The impact of this work, along with new building systems and reconfiguration to address school department needs, suggest a gut renovation of this building should the decision be made to remain at this site.

A study completed in 2013 by designLAB Architects detailed the programmatic needs for the School Department and provided scenarios for renovation of Emery Grover and test fits of the program at Ridge Hill or on another Town owned parcel.

School Administration Department spaces include:

- Shared Building Service
- Superintendent of Schools
- Student Development
 - Student Development
 - Community Education
- Innovation Technology
- Finance Operations
 - Human Resources
 - Business / Finance Operations
 - Transportation / Food Service
- Program Development

Space	Size proposed SF	Total GSF Subtotals
School Administration		
SHARED BUILDING SERVICES		
Entry Vestibule - Lobby	240	
Help Desk/Reception	100	
Conference Rooms	1800	
Offices	400	
Support Spaces	1690	
Storage	1000	
SUBTOTAL		5,230
Gross area adjustment 13%		680
Circulation adjustment at 15%		886
SUBTOTAL GSF		6,796
SUPERINTENDENT SUITE		
Superintendent of Schools	905	
SUBTOTAL		905
Gross area adjustment 13%		118
Circulation adjustment at 15%		153
SUBTOTAL GSF		1,176
STUDENT DEVELOPMENT DEPARTMENT		
Student Development	975	
Community Education	1015	
SUBTOTAL		1,990
Gross area adjustment 13%		259
Circulation adjustment at 15%		337
SUBTOTAL GSF		2,586
FINANCE OPERATIONS DEPARTMENT		
Human Resources	1075	
Business / Finance Operations	1240	
Transportation / Food Services	1135	
SUBTOTAL		3,450
Gross area adjustment 13%		449
Circulation adjustment at 15%		585
SUBTOTAL GSF		4,483
PROGRAM DEVELOPMENT DEPT.		
Program Development	1020	
SUBTOTAL		1,020
Gross area adjustment 13%		133
Circulation adjustment at 15%		173
SUBTOTAL GSF		1,325
INNOVATIVE TECHNOLOGY		
Tech Staff and Server Room	440	
SUBTOTAL		440
Gross area adjustment 13%		57
Circulation adjustment at 15%		75
SUBTOTAL GSF		572
GRAND TOTAL BUILDING W/O BUILDING SUPPORT		16,939
BUILDING SUPPORT: Mechanical, Electrical, Plumbing, Fire Protection, Elevator, Stairs (Assume 11% of GSF)		
SUBTOTAL GSF		1,863
GRAND TOTAL BUILDING		18,802

FIGURE 4: SCHOOL ADMINISTRATION PROGRAMMING



Photo 30: Emery Grover Building



Photo 31: Emery Grover Building - Interior



Photo 32: Emery Grover Building - Interior

DEPARTMENT OF PUBLIC WORKS (DPW)

The Public Works Department plans, designs, constructs, operates, maintains, and manages all physical public infrastructure necessary for Needham community life. The Department of Public Works provides the following services:

- Highway maintenance and construction
- Traffic control
- Snow removal
- Safe & secure water supply and distribution
- Protection against flooding / storm sewer construction and maintenance
- Solid waste disposal
- Park and forestry maintenance
- Sanitary sewer construction and maintenance
- Maintenance of accessible athletic and recreational facilities

The DPW includes the following departments:

- Administrative Services
- Engineering Division
- Garage and Equipment Division
- Highway Division
- Parks & Forestry Division
- Recycling & Transfer Station (RTS)
- Water, Sewer and Drain Division

Most of the DPW staff are located at the DPW complex on Dedham Avenue with the exception of the following: Sewer Pump Station operators (located at the West Street pumping station), Water Treatment Facility Manager and Operators (located at the Charles River Treatment Facility) and the RTS (located at the RTS facility on Central Avenue).

The main site, at Dedham Avenue, consist of four major buildings: the Hollis Building, the Public Services Administration Building (PSAB), the old Water Pumping Station and a new pre-engineered vehicle storage building. In addition the site includes a fuel depot, cold

storage for equipment and parts, and bins for storage of materials used on roads and parks. At ten other sites, located throughout Town, the DPW also stores seasonal vehicles and other equipment and materials used to construct and maintain the infrastructure for the Town.

The RTS site continues to be used as a recycling and solid waste transfer station and in 2014 a new sand / salt structure was constructed.

At Dedham Avenue, the PSAB building houses the administrative, engineering and operations offices for the department in modern and appropriate space. This building satisfies the programmatic need of the department and provides exceptional synergies with interrelated Town departments. However, at the Hollis and old Water Pumping Station operations buildings, employee facilities are lacking, the buildings are not accessible, stairs and egress pathways do not meet code, buildings systems are neither current nor efficient, and there is no fire suppression system or seismic restraints in the structures.

From an operations viewpoint, the Hollis Building lacks maintenance bays and shop space that would improve workflow and vehicle storage space to house valuable trucks and towed equipment. Additionally, the site does not support all of the related areas that are part of a public works facility including a materials handling zone, cold storage for sander bodies and spreaders, pipes and manhole covers, a modern fuel depot and a working yard. Currently these functions are spread throughout Town. Finally, the Dedham Avenue site is complicated by DEP regulations which require attention.

Programming for this department included the following indoor spaces:

- Administration: Shared spaces including lunchroom and training
- Administration offices and meeting rooms
- Operations offices and work areas
- Engineering offices and vault

- Employee support spaces including locker rooms, toilets and lunchroom
- Garage / Maintenance
- Shops
- Wash Bay
- Vehicle Storage and Prep
- Building support

Site elements included:

- Parking for both staff and visitors
- Fuel depot
- Cold storage
- Covered parking for equipment
- Bin storage
- Sander and spreader storage
- Dumpster and Recycling

The preferred programming approach consolidated all of the activities currently at Dedham Avenue as well as other space located throughout Town. This approach would provide better oversight of employees and activities, and vehicles, equipment and materials would be easily accessed and under cover. The RTS site and several small garage spaces that house equipment dedicated to a park or playfield would remain as currently located but in a reduced capacity. One consideration is the possible relocation, if required, of the other interrelated departments currently co-located at the PSAB building. A second option was detailed that included those departments.



Photo 33: DPW at Dedham Avenue - Gantry



Photo 34: DPW at Dedham Avenue - Fuel Island



Photo 35: Old Water Pumping Station at Dedham Ave.

Space	Size proposed SF	Total GSF Subtotals	Total GSF per division
Department of Public Works			
Entry Vestibule - Lobby	240		
Lunchroom	425		
Office suport/supplies and staff toilets	1150		
Training/DPW Storm Command: Dispatch, Office,Conference Room and Storage	1490		
SUBTOTAL		3,305	
Gross area adjustment 15%		496	
Circulation adjustment at 25%		950	
SUBTOTAL GSF		4,751	
SHARED SUBTOTAL GSF			4,751
Administration			
Offices	1452		
Conference	216		
SUBTOTAL		1,668	
Gross area adjustment 15%		250	
Circulation adjustment at 25%		480	
SUBTOTAL GSF		2,398	
Administration - Operations			
Offices for Superintendents	732		
Work Areas for 11	560		
Active Records Storage	150		
SUBTOTAL		1,442	
Gross area adjustment 15%		216	
Circulation adjustment at 25%		415	
SUBTOTAL GSF		2,073	
Administration - Engineering			
Engineering offices	1890		
Service desk; copy equipment; files	440		
Vault Storage	850		
SUBTOTAL		3,180	
Gross area adjustment 15%		477	
Circulation adjustment at 25%		914	
SUBTOTAL GSF		4,571	
ADMINISTRATION SUBTOTAL			9,042
Operations - Employee Support			
Locker/Shower/Toilet Room	1896		
Lunchroom with Kitchen	756		
SUBTOTAL		2,652	
Gross area adjustment 15%		398	
Circulation adjustment at 25%		762	
SUBTOTAL GSF		3,812	
Operations - Garage/Maintenance			
Garage Maintenance Bays	8888		
Maintenance Workshop	1850		
SUBTOTAL		10,738	
Gross area adjustment 15%		1,611	
Circulation adjustment at 20%		2,470	
SUBTOTAL GSF		14,818	

FIGURE 5: DEPARTMENT OF PUBLIC WORKS (CONSOLIDATED) PROGRAMMING

Space	Size proposed SF	Total GSF Subtotals	Total GSF per division
Operations - Shops			
Shared Vehicle Bay, storage cages and meter shop	4345		
SUBTOTAL		4,345	
Gross area adjustment 15%		652	
Circulation adjustment at 15%		750	
SUBTOTAL GSF		5,746	
Operations - Wash Bay/Vehicle Storage and Prep			
Wash Bay & Equipment Room	1538		
Vehicle Staging & Prep	38500		
SUBTOTAL		40,038	
Gross area adjustment 10%		4,004	
Circulation adjustment at 5%		2,202	
SUBTOTAL GSF		46,244	
OPERATIONS SUBTOTAL GSF			70,621
Building Support			
MEPFP Rooms, IT, Elevators and Stairs, Janitors	1660		
SUBTOTAL		1,660	
Gross area adjustment 15%		249	
Circulation adjustment at 20%		382	
SUBTOTAL GSF		2,291	
BUILDING SUPPORT SUBTOTAL GSF			2,291
GRAND TOTAL DPW			86,704
Building Inspector Suite			
SUBTOTAL GSF		2,954	
Public Facilities Department Suite			
SUBTOTAL GSF		1,689	
Planning, Community Development, Conservation Commission, ZBA Suite			
SUBTOTAL GSF		2,537	
Park and Recreation Suite			
SUBTOTAL GSF		1,725	
Other Departments SUBTOTAL GSF			8,905
CONSOLIDATED GSF			95,609
Covered Parking for 36 Vehicles + Equipment			
Parking for 72 employees and 10 visitors			
Fuel Island			
6 Bin Storage:patch 2 gravel, rock , sand, mulch			
Sanders			
Exterior Cold Storage			
Spreaders: gantry			
Dumpster			
Recycling dumpster			



Photo 36: DPW at Dedham Avenue - Bin Storage



Photo 37: DPW Cold Storage at Daley Building



Photo 38: Cold Storage for DPW

POLICE AND FIRE DEPARTMENTS

The Police and Fire Departments are currently housed in two facilities: the Police and Fire Headquarters at School and Chestnut Streets and Fire Station Two on Highland Avenue. Both buildings are well located to serve the community and programming was completed with no consideration of moving the departments off these sites.

The main building on Chestnut and School Streets includes shared space for the two departments as well as space dedicated for use by each department. The current building program includes most of the elements proposed during programming but right sizes those spaces to accommodate modern vehicles and equipment, reorganizes the use of common spaces, and includes spaces that are required to meet modern police and fire operational needs.

Included in the shared spaces are:

- Joint Dispatch
- Waiting areas
- Conference rooms
- Training and Emergency Operations Center
- Fitness and Wellness

Police programmed spaces:

- Operations and support space include: roll call / squad room, report writing, sergeants, evidence, armory vehicle storage, maintenance and wash bay, bulk evidence, crime lab, shooting range simulator and lunch and locker rooms
- Detention area includes: sallyport, booking and detention cells
- Administrative offices for command staff and administrators, records storage and office equipment

Fire Programmed spaces are:

- Operation areas includes: Apparatus bays, hose, gear, haz mat, medical and bulk storage, gear laundry, maintenance workshop, medical cleaning, SCBA fill room and oxygen storage, radio room
- Administrative offices for command staff and administrators, records storage and office equipment
- Staff support includes: Dorm rooms, toilets, showers, recreation room and kitchen

Site elements included:

- Parking for both staffs and visitors
- Dumpster and Recycling



Photo 39: Fire Station



Photo 40: Fire Station - Apparatus Bay

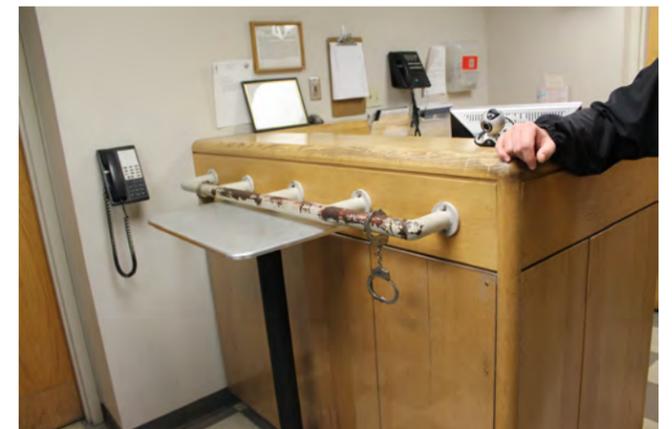


Photo 41: Police Station - Booking

Space	Size proposed SF	Total GSF Subtotals	Total GSF per division
Police and Fire Department			
SHARED			
Joint Dispatch	450		
Waiting Areas	458		
Conference Rooms	216		
Training and Emergency Operations Center (EOC)	869		
Fitness/Wellness Area	600		
SUBTOTAL		2,593	
Gross area adjustment 15%		389	
Circulation adjustment at 25%		745	
SUBTOTAL GSF		3,727	
GRAND SHARED SUBTOTAL GSF			3,727
Police			
OPERATIONS + SUPPORT			
Roll Call / Squad Room	526		
Sergeants	320		
Evidence	500		
Armory	100		
Vehicle Storage	4444		
Crime Lab	256		
Lunch and Locker Rooms	1930		
Shooting Range Simulator	360		
SUBTOTAL		8,436	
Gross area adjustment 15%		1,265	
Circulation adjustment at 25%		2,425	
SUBTOTAL GSF		12,127	
OPERATIONS - DETENTION			
Sallyport	560		
Booking	450		
Detention Cells	532		
SUBTOTAL		1,542	
Gross area adjustment 15%		231	
Circulation adjustment at 25%		443	
SUBTOTAL GSF		2,217	
ADMINISTRATION			
Offices: Command Staff and Administrators	2478		
Records Storage	400		
Office Equipment / Copy	593		
SUBTOTAL		3,471	
Gross area adjustment 15%		521	
Circulation adjustment at 25%		998	
SUBTOTAL GSF		4,990	
GRAND POLICE SUBTOTAL GSF			19,333
Fire			
OPERATIONS			
Apparatus Bays	6,116		
Gear Storage	650		
Laundry	120		
Maintenance Workshop	120		
Medical Cleaning, SCBA and Oxygen Fill and Storage	564		
Radio Room	120		
Haz Mat Supply Storage	80		
SUBTOTAL		7,770	
Gross area adjustment 15%		1,166	
Circulation adjustment at 15%		1,340	

Space	Size proposed SF	Total GSF Subtotals	Total GSF per division
Haz Mat Supply Storage	80		
SUBTOTAL		7,770	
Gross area adjustment 15%		1,166	
Circulation adjustment at 15%		1,340	
SUBTOTAL GSF		10,276	
ADMINISTRATION			
Offices: Command Staff and Administrators	1,612		
Records Storage	368		
Office Equipment / Copy	247		
SUBTOTAL		2,227	
Gross area adjustment 15%		334	
Circulation adjustment at 25%		640	
SUBTOTAL GSF		3,201	
STAFF SUPPORT			
Dorm Rooms for 7 Firefighters per shift	1000		
Toilet / Shower Rooms	415		
Rec Room	360		
Kitchen	250		
SUBTOTAL		2,025	
Gross area adjustment 15%		304	
Circulation adjustment at 25%		582	
SUBTOTAL GSF		2,911	
GRAND SUBTOTAL GSF			16,388
BUILDING SUPPORT			
MEPFP Rooms, IT, Elevators and Stairs, Janitors	1894		
SUBTOTAL		1,894	
Gross area adjustment 15%		284	
Circulation adjustment at 15%		327	
SUBTOTAL GSF		2,505	
GRAND FIRE SUBTOTAL GSF			2,505
GRAND TOTAL BUILDING			41,953
Site Elements			
Exterior Storage	200		
Parking			
Daily Staff Spaces	60		
Other Municipal Official Parking	10		
Public	5		
Total Parking	75		

FIGURE 6: POLICE AND FIRE STATION #1 PROGRAMMING

RECREATION

The Parks and Recreation and Conservation departments include buildings and grounds throughout Town dedicated for community use. The Memorial Park Trustees have jurisdiction over Memorial Park and Building. Most of the buildings are primarily used during the summer months and many of the buildings currently include space used to store DPW vehicles, equipment and materials. Community program needs have been met in other Town buildings but some program needs remain.

The Rosemary Pool and Building Study, by Weston & Sampson, includes a new pool within the existing footprint, improvements to the existing bathhouse, expansion of the lower parking lot, ADA compliant pedestrian connection from Rosemary Street, subsurface stormwater mitigation, and major beach and terrace area improvements.

Cricket Field, documented by Bargmann Hendrie + Archetype Inc., improvements include accessibility, building envelope, interior repairs to floors and walls, systems upgrades and site work to improve access.

The Memorial Park Building considerations included two options: 1) a stair and elevator addition and general repairs to make the building fully accessible and 2) a new building programmed to include concession and public toilets, garage space for equipment, team rooms, meeting and office space and a teen center.

A potential Community Center was also programmed. This building was looked at as a Public / Private opportunity and included the following spaces:

- Entry /help desk, reception and Child Watch
- Administrative Offices
- Natatorium with swimming pool and therapy pool
- Locker rooms
- Workout Facilities
- Gymnasium
- Community Rooms including a teen center and kitchen

Site elements included:

- Parking for both staff and visitors for approximately 300 vehicles
- Two playing Fields
- Dumpster and Recycling

An Ice Rink, including a single rink sized for use by a high school team, locker rooms for two teams, concession and office space are included in this program.



Photo 42: Rosemary Pool



Photo 43: Cricket Field Building

Space	Size proposed SF	Total GSF Subtotals
Community Building		
SHARED BUILDING SERVICES		
Entry/Help Desk, reception and Child Watch	3872	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		3,872
OFFICE SUITE		
Offices	1125	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		1,125
NATATORIUM		
Swimming Pool and Sauna	9600	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		9,600
LOCKER ROOMS		
Locker Rooms	5,000	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		5,000
WORKOUT FACILITIES		
Studios, Cardio, Wellness	12100	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		12,100
BASKETBALL GYMNASIUM		
Gymnasium and Track	18353	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		18,353
COMMUNITY ROOMS		
Multi Use: Education/Community (2)	1200	
Teen Center	800	
Kitchen	150	
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		2,150
GRAND TOTAL BUILDING W/O BUILDING SUPPORT		52,200
BUILDING SUPPORT: Mechanical, Electrical, Plumbing, Fire Protection, Elevator, Stairs (Assume 15% of GSF)		
SUBTOTAL INCLUDING GROSS AREA AND CIRCULATION ADJUSTMENTS		7,830
GRAND TOTAL BUILDING		60,030

FIGURE 7: COMMUNITY BUILDING PROGRAMMING

Space	Size proposed SF	Total GSF Subtotals
FIELD LEVEL		
Lobby	296	
Concession Stand	220	
Team Room	1126	
Garage Bay	1500	
Public Restrooms	380	
Building Storage	1280	
SUBTOTAL		4,802
Gross area adjustment 13%		624
Circulation adjustment at 15%		814
SUBTOTAL GSF		6,240
UPPER LEVEL		
Teen Center	2144	
Meeting Room	1380	
Offices	444	
Restrooms	603	
SUBTOTAL		4,571
Gross area adjustment 13%		594
Circulation adjustment at 15%		775
SUBTOTAL GSF		5,940
TOTAL BLDG W/O BLDG SUPPORT		12,180
BUILDING SUPPORT		
Mechanical, Electrical, Data, Plumbing, Fire Protection, Elevator, Stairs: Assume 25% of GSF		
SUBTOTAL GSF		3,045
GRAND TOTAL BUILDING		15,225

FIGURE 7.1: MEMORIAL PARK BUILDING PROGRAMMING