









PUBLIC SAFETY BUILDING FEASIBILITY STUDY

WAKEFIELD, MASSACHUSETTS JUNE 26, 2017



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EXECUTIVE SUMMARY

In September 2016, HKT Architects was selected by the Town of Wakefield, Massachusetts to conduct a feasibility study for the Public Safety Building located at 1 Union Street. This work included a review of the existing facility, an evaluation of safety and operational aspects of the building, and an evaluation of current and future space needs for the Police Department and Fire Department.

The overall goal of this study was to evaluate the existing building and site, highlight potential operational hardships, develop a plan to meet needs of the departments occupying the public safety building, make recommendations that take into account both need and cost, and to offer improved services to the public. It is worth noting that the initial study for the Public Safety Building was completed in 1998, meaning that the programming review process for the current building is already almost 20 years old. Although there have been technology and equipment changes for the fields of both Fire and Policing, there have been vast changes in the services and operational needs of modern law enforcement agencies in the past two decades. As society changes, the services which law enforcement agencies are called upon to perform are always evolving and local community Police departments regularly are at the forefront of these changes and are required to adapt.

Study Methodology

The Permanent Building Committee (PBC) held its first meeting in late October 2016 to kick-off the process and discuss the goals and objectives of the study. The discussion included the steps that the design team would be taking to review existing conditions and to gain an understanding of the needs of the departments. At the kick-off meeting HKT Architects also explained critical committee involvement, so that the study results would reflect and respond to their ideas and concerns.

At the kick-off meeting a visioning session was held with the PBC and members of the Police, Fire and Public Works Departments. This session provides an opportunity for interested parties to articulate their







expectations and vision for the study. Issues, questions, and concerns are brought forth during a process that includes written responses to questions and open discussion. As part of the discussion the following questions were asked of the committee:

- What do you see as the best outcome for this study?
- What do you see as the biggest challenge for the study?
- How does the current layout of the building and site impact the two departments located here?
 If programming needs suggest radical changes to some aspect of the existing facility or land use what would you consider "sacred"? What in your opinion could change?
- What are some critical details that you believe we need to know about in order to complete this study to the satisfaction of the End User, Community, Town Officials and Committees?
- How to better serve the public?

Responses to these questions focused on making sure that the outcome of the study appropriately analyzed the existing building and site, outlined what would need to be done to create a safe, secure, and well organized Public Safety Building, and provide enough detail so that the Committee could present the information in a concise and easily understood manner to the citizens and public officials of Wakefield. Some of the biggest challenges discussed included effectively communicating the need for changes to a relatively new Town Building, explaining costs of the projected work, and creating a more safe and efficient police station. During the open discussion that followed, Committee members also noted general comments related to the Town and other potential upcoming public projects.

The Town's PBC formed a Working Group sub-committee to advise the design team during the study's progress. The Working Group included members from the Permanent Building Committee as well as the Police and Fire Departments, all of whom actively participated in the study's process. The Working Group provided the design team with valuable guidance and insight throughout the course of the study.

Though the focus of this study is preliminarily on the Police Department, the Fire Department needs, as well as the shared needs of the building were also analyzed. Although each department has their own defined spaces, the two do influence the operations of the other and share the Lobby area, the Community / Training Room, the Fitness Room, vertical circulation, mechanical and electrical rooms and equipment.

Following the kick-off meeting, HKT met with Chief of Police Richard E. Smith, Fire Chief Michael Sullivan, and personnel from both departments, to review department operations and existing conditions at the Public Safety Building. Following department interviews, HKT developed a draft building program



which was then shared with the Departments and Working Group for review. The document focused on specific Police Department program areas, spaces shared by both departments, areas used by the public, and existing Fire Department areas. End users commented on the individual spaces and the document was finalized.

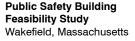
This analysis defined the functional needs of the Police Department for the foreseeable future, defined the shared public lobby needs, and confirmed that the Fire Department space met all of their current and future projected needs. Police programming was conducted with a 'site-blind' methodology, allowing the final reviewed and approved program to be independent from the existing police station's facilities. This document could then provide a clear side-by-side comparison between the existing and an ideally programmed facility, allowing areas that were too large, too small, or correctly sized to be easily identified and analyzed.

Following this data collection and analysis, HKT then developed conceptual plans to see if the proposed program could fit within the existing building and site at 1 Union Street. Given the parameters of the existing building's floor plans and volume, the purpose of these options was to demonstrate differing approaches to how the ideal space program might be organized. Various options demonstrating possibilities for renovation, additions, circulation and site access were tested and studied. At following meetings the Working Group sub-committee reviewed several floor plan options and discussed the pros and cons of all. The options ranged from small scale independent 'a la cart' approaches, to a full inclusion of the proposed programmatic needs of the Police department. Working Group representatives from the police department, were asked to give feedback on the operational pros and cons of the presented schemes and how they would influence operations. After several generations of options, Option 1 was selected unanimously by the Working Group for further review and cost estimating. Option 1 includes reconfiguring and renovating the first floor entry and lobby sequence, adding a three-story addition in front of the 1950s Police Administration Building's East facade, renovations within the existing Police Administration Building, and a new addition onto the Sally Port.











Cost Analysis

Finally, HKT developed an estimate of probable cost for the scheme selected by the Working Group. Using documentation provided by the design team, an independent cost estimator developed the construction (hard costs) and included projected escalation cost increases which is a forecast of the coming building climate. All project costs apparent at this time were included in the estimated total project costs, including the cost of construction (hard costs) and various administrative costs (soft costs) such as architectural and engineering fees, project management fees and potential moving costs, among others. The intent of this estimate was to gain a better understanding of what modifications and additions to the existing public safety building, based upon the ideal program, might cost the Town of Wakefield as a future project.

Conclusion

The Working Group elected to present their progress and findings to the entire Permanent Building Committee in May 2017, so that the PBC could ask questions and deliberate next steps. The presentation given by HKT Architects sought to inform the PBC of the study's findings and associated costs of the potential project which would fix the operational deficiencies of the existing station. HKT Architects presentation included an overview of the process of the study to date, the study's final proposed design selected by the Working Group, and the estimated probable cost analysis for the selected renovation and addition construction project. At the meeting, the PBC voted to accept the scope of the study and gave HKT the approval to proceed with this final report as a record for the Town. A copy of the final plans and rendering that were presented to the PBC in May 2017 can be found in Appendix D of this document.

The study's findings were viewed as a positive step forward, providing critical information on operational conditions at the existing building and providing analysis of a potential project to the PBC and residents. The Working Group Sub-Committee was thanked for their work and performing steps that needed to be taken to ensure proper due diligence on the scope was done. With the feasibility study providing a thorough review of the existing Police Station at the Public Safety Building, and a design approach which could be taken to address critical operational and public safety deficiencies, a project direction and next phase could be deliberated on by the PBC.



EXISTING CONDITIONS ASSESSMENT

HKT Architects and consultant engineers from Lim Consultants, Inc. and Garcia, Galuska, Desousa Consulting Engineers, Inc. toured the Public Safety Building in November 2016 to assess the existing facility's conditions. As the building systems are combined, both Police and Fire department conditions were reviewed and end user occupant interviews were conducted with both staffs. Particular attention was paid to reuse and adaptability of existing building systems and existing physical conditions.

Architectural Assessment

The current building completed construction in 2003 and included a new structure which would integrate the existing 1950s police station administration building and the historic fire station hose tower. The 2003 Public Safety Building is a brick and veneer CMU clad exterior with precast concrete trim and a predominately steel framed structure. The existing 1950's portion of the building includes an exterior brick facade, an interior load bearing wall in the first floor/basement, and a steel framed interior structure on upper floors. The historic fire station hose tower, not reviewed under the scope of this study, includes a brick facade. The exterior conditions of the building are in very good shape. While an exhaustive review of roof conditions was not possible, no evidence of deterioration of flashings or trim was indicated, except in the area directly below the flat roof located between the original building and the east side addition housing the detention block. This flat roof holds major mechanical equipment, a roof hatch and roof drain. Water has made its way into the building at this location, which now contains major IT equipment.

Windows, doors and louvers are generally in good shape. Overhead doors, which operate on a daily basis, need regular maintenance and eventually will need to be replaced. The overhead door leading to the lower level parking includes a poor condition at the sill which does allow water to enter the building and has had numerous issues over the years. A bottom sloping infill panel or a different gasket at the











underside of the door should be installed to create a proper weather seal. Leaks at windows have been addressed in the past. Reports of cracking and alignment of doors was reviewed by the structural engineer and no settlement issues were noted. It appears these could be related to the construction process.

The interior of the building is well maintained and shows normal aging of finishes. The way the floor in the detention block was constructed has led to some issues with repairs necessitated in the past. The same is true of the Fire Department's apparatus bay floor which does show some signs of wear and evidence of water causing minor rusting on the beams and decking below or making its way into storage areas. One other area of water infiltration is at the second floor north door / hallway adjacent to the mechanical rooms. During large weather events water does make its way into this area and should be addressed during any renovation.

Some fire protection sprayed-on material has fallen off beams in the first floor garage area and should be reviewed and repaired if necessary. Other interior surfaces will need to be patched and repainted as new infrastructure elements are added to spaces or as finishes show normal signs of wear.

Exterior issues include the apparatus apron which needs to be repaired or replaced especially noting the joint between the sill of the overhead doors and the apron itself. The transition between the two should be seamless and currently the small "drop" to the outside has caused some issues with fire apparatus. Masonry walls that separate that edge of exterior parking spaces have, and continue to, suffer some damage as snow has been piled up against them.

The building is accessible by way of the centrally located elevator which opens on both sides to address the various floor levels. Male and female accessible toilets are located in the main lobby and throughout the building.

Structural Assessment – See engineer reports in appendix A

The structural engineer was asked to report on the existing conditions of the structure of Wakefield Public Safety Building and to respond to potential options for renovations and / or additions. The report notes structural implications as a result of the proposed improvements in accordance with the provisions of the Massachusetts State Building Code (MSBC). These included horizontal and vertical additions and a review of the columns in the first floor parking area.

The remaining 1950's police building has a rectangular footprint of approximately 75 feet in the north-



south direction and 40 feet in the east-west direction. It stands two stories above ground and has a full basement. The L shaped 2003 addition is encompassing the 1950's police building from the south and east. The 2003 portion to the east of the 1950's building is two-story, housing parking on the lower level and police detention cells on the upper level. The three-story addition to the south is occupied by the fire department; it includes an approximately two-story tall apparatus room on the center. The addition complies with the 6th Edition of Massachusetts State Building Code.

The structural assessment noted that the 1950s Police Administration Building predates the first adoption of the Massachusetts State Building Code and therefore seismic loading of that portion of the existing structure is unlikely to have been accounted for. There are some areas where structural elements required minor repairs, such as patching a damaged first floor garage wall and addressing some rust areas including metal decking.

For the flexibility of the existing structure, the analysis of the existing documents and field conditions found that the most efficient and cost effective way to add useable space at the site would be through structurally independent horizontal additions adjacent to the existing building. Though vertical additions on top of the existing structures are possible, the cost of making modifications to the existing building, including such things as underpinning and reinforcing foundations, would be very cumbersome and excessively expensive to construct. Items are discussed in more detail within the attached structural engineer's report.

Mechanical/Electrical/Plumbing/Fire Protection Assessments – See engineer reports in appendix A The engineers were asked to review and report on all existing mechanical, electrical, plumbing and fire protections systems.

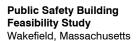
HVAC - Heating, Ventilation and Air Conditioning

In general, the majority of the Heating, Air Conditioning, Ventilation and Exhaust systems, equipment and











associated ductwork distribution systems are in fair condition. All of the equipment appears to be original to the building from approximately 2002-2003. The building is primarily heated from the Central Boiler Plant and cooled from a Central Chilled Water Plant. Ventilation and air conditioning is provided to the building with a mixture of roof top units and indoor air handling units, with supplemental air conditioning provided in certain areas of the building.

In general, the equipment is approaching the end of its expected service life, but based on observations, the equipment can remain in service. The following systems recommendations were made:

- It was noted that the heating system appears to underperform and do not meet the desired space comfort levels. The building cannot maintain desired heating and cooling temperatures throughout the building. We would recommend replacing a majority of the HVAC system, associated components and controls. The majority of the equipment is also nearing its replacement age and therefore the system should be replaced. Building occupants do not have complete control of the existing heating and cooling system, as controls are located within another building on Town.
- The Central Heating Plant equipment should be replaced as it appears that mechanical
 equipment faults cause downtime and allows the building temperatures to drop below
 acceptable levels. The Central Cooling plant equipment is also approaching the end of its
 anticipated serviceable life expectancy and should be replaced.
- Roof top units and air handling units should be replaced.
- Terminal boxes throughout the building should be replaced.
- Split system ductless cooling units should be replaced.
- The Fire Station kitchen hood discharge should be further reviewed to determine how exhaust from the hood is re-entering the building in the police station.
- The Building Management System (BMS) should be upgraded to be able to monitor equipment, adjust temperatures and improve overall building comfort. Monitoring the BMS on site would allow for the system to be adjusted quicker than remote monitoring from an off-site location.
- Existing Rooms Fire Alarm and Maintenance 266, EMT 264 and Equipment Maintenance 263, located off the apparatus bay, should have the return duct back to RTU-2 removed and be directly exhausted.

Electrical

In general, the existing electrical infrastructure is in fair condition. The building was constructed in 2002-2003, making the systems approximately 14 years old, less than half of their expected serviceable life. Other systems, such as technology and security, have either been upgraded, added to, or are in the



process of being upgraded. Upgrades or changes to these systems are not uncommon especially in Police stations as systems become obsolete or outdated in a shorter time period than major electrical systems.

While existing distribution equipment, the generator and distribution, wiring devices, and the fire alarm system, can be reused and added onto under a renovation program, interior and exterior lighting should be upgraded to LED fixtures, technology should be reorganized and dressed in a workmanlike manner, and security systems such as access control and cameras should be upgraded and integrated. As a priority, the parking garage and apparatus bay should be upgraded to LED high bays fixtures. The life of the fixture is extended substantially and the light power density of the building will be decreased while light levels increase, resulting in increased light levels and lower energy cost. The building should also be equipped with a new networked lighting control system (NLC) with occupancy sensors in all spaces and daylight harvesting sensors within 15 feet of exterior windows. This type of system will further reduce energy cost.

Plumbing

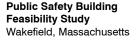
Presently, the Plumbing Systems serving the building are cold water, hot water, sanitary, waste and vent system, storm drain piping, and natural gas. Municipal sewer and municipal water service the Building. The plumbing systems have been fully replaced during a renovation and addition project in 2003. The systems appear to be generally in good condition.

Existing Plumbing systems do have the capacity to be modified and expanded for a proposed renovation project. The existing domestic water heater has reached its life expectancy and is recommend for replacement in the next five years with new gas fired high efficiency water heater. While existing plumbing fixtures do meet current code requirement for water conservation, additional measures can be taken by installing high efficiency, low flow, plumbing fixtures to conserve more water.











Fire Protection

The building is fully protected by an automatic sprinkler systems. The system was installed as part of a building renovation and addition project in 2003. All building areas appear to be protected, sprinklers are provided in electric rooms and generator rooms, and the system is in good working condition. The existing sprinkler system does have the capacity to be modified and expanded for a proposed renovation project. Some minor work should be completed such as replacement of all missing escutcheons and the Owner should continue to inspect and maintain existing sprinkler system per current NFPA 25 recommendations.

Overall

Interviews with Public Safety Building end users from both departments noted difficulties with the heating, ventilation and air conditioning systems. Some items of note include: Cross ventilation and odors between departments, HVAC systems being too loud in police dispatch room for calls to be heard, hot water running in a few cold water plumbing fixtures, leaks from equipment visible on ceiling tiles, and occupancy sensors that are incorrectly located. There are a few existing installed conditions which could be fairly easily addressed to improve the building occupant comfort levels.

Site

Extremely limited parking is available onsite and in the neighboring downtown area, with just a few select exterior parking spots at the building being reserved for use by Public Safety Building staff. There is an interior first floor garage that houses the Police Department cruisers, motorcycles, golf cart, trailer sign, as well as three fire department vehicles. Personal vehicles are not parked within this garage. The typical staff for both Police and Fire departments are required to find street parking.

The 'front' of the property on Union Street includes a limited green area with trees, a monument, decorative light fixtures and flag poles.

The Town zoning map indicates that the East portion of the site is within the "General Residence" zone and the West portion in the "Business" zone. There are no wetlands or other known setback districts associated with the existing site. Future steps will include in-depth geotechnical investigation and soil evaluation in the areas where additions are being proposed to properly develop design for any future structure foundations and drainage improvements.



OPERATIONS ASSESSMENT

The existing site has been used for the Police and Fire Departments for decades. In 1998 the Town commissioned a study of the departments, followed by the construction of a new combined Public Safety Building. This scope included a new structure which would integrate the existing 1950s police station administration building and the historic fire station hose tower. The remainder of the existing structures were demolished and removed at that time. The new combined Wakefield Public Safety Building was occupied in 2003 and has been in continuous use since.

The property is located on a sloped site, which leads the West elevation to exit on grade at the first floor along Union Street, and the East elevation exiting to grade on the second floor at Crescent Street. The existing historic 1950's police station is half of a floor level different from the rest of the 2003 building, with Stair 1 and Stair 2 connecting it to the remainder of the Public Safety Building.

First Floor - Entry Level

In general the two departments are on either side of the Public Safety Building site, separated by a central spine design element that runs East/West through the building and denotes the main entrance on Union Street. The main entrance into the Lobby is well defined by this curved Western façade element and entry alcove. Along with the main entrance and the common vertical circulation area of Stair 2 and the elevator, individual spaces for each department are located on either the North or South side of this central spine.

After entering, the Lobby extends to the south and provides access points to Firearms Licensing, the Police Department, a transaction window to the Police Records office, the Community / Training Room, the Fire Department, two public restrooms and an interview room. The initial reaction of most people when they enter the Lobby for the first time is to double check their orientation and where they should proceed to next. Neither the Police Department's Records window or the Fire Department doorway are visible without turning after entering the Lobby, and neither are visible from the vestibule. Signage has been added within the Lobby in an attempt to help clarify wayfinding, but visitors still regularly hesitate and are unsure of where to go. The Police officer seated at the desk adjacent to the Police Records transaction counter window has regular office duties they perform for the Records department, but additionally also acts as a House Officer would in other police departments. This officer interacts with the public, provides information, calls other personnel in the building to notify staff of visitors, and gives directions to the Fire Department and Community / Training room. The Records staff member is the only public safety staff presence in the Lobby, as the Fire Department is located through a subtle corner



doorway in the Lobby's far corner.

Both the Records office and the Fire Department Administrative staff areas are only open during regular business hours. As such, if anyone enters the Public Safety Building lobby after hours or on the weekend, they are required to find and read signage that directs them to pick up a wall mounted phone and speak with a dispatcher on an upper floor who then notifies a staff member to come to the Lobby to meet with the visitor. The Police and Fire departments each have their own wall phone, each have different types of signage, and are located in different areas of the Lobby. This practice is not clear or intuitive and can be very confusing for the public. Relying on the visitors to navigate using the wall phone system has led to misunderstandings in the past, and having staff remotely located after hours creates a delay in Public Safety personnel response times to the Lobby.

The trend in many municipalities today is that the local Police Department ends up being the only building that is open 24/7, 365 days a year. In the past other public service buildings, such as a fire departments have also had open doors after hours, but time and again this is no long the case. It is important to note that the ability of department personnel to be able to respond to the Lobby is a critical public safety issue. The unhappy truth is that at times people come to the Police department when they are in need and not always under the best of circumstances. Visitors might be a citizen looking for a simple piece of information, or they might require assistance, be under distress, feel victimized, or might even be drunk or on other substances. As part of their job, Police frequently interact with people in very difficult and challenging circumstances. It is because of these constant unknowns that the presences of a staff member, being able to greet the public as they enter the facility, no matter what the reason, is an important service to the community and public health.

Shared Lobby: Police Department use of Shared Lobby

The original 2003 building design included a 'Front Desk", a singular office located directly across from the entry vestibule. This space has since been changed to become the dedicated Firearms Licensing











room, with its transaction counter window to the Lobby has been covered by large tack board. In addition to the covered Lobby window, the ceiling of this room is an interior skylight looking up into Stair 2. When used as a Front Desk, staff noted that the room had a fishbowl feeling as the office was completely visible to Lobby and personnel using the building's central stairwell above them.

Operationally the Police department stated that there was very limited administrative work that an officer at the Front Desk was able to perform due to its size, relative isolation, visibility, and rotating personnel at the position. Without adding an additional staff position to primarily greet, the space was repurposed as Firearms Licensing. Having a dedicated space for Licensing directly off the Lobby is ideal and allowed easy access without officers having to escort civilians to a different floor within the department to process licensing. As a firearms licensing room, it is ideal for its location to be right off of the Lobby, but as it was designed as a desk station, it is undersized to meet work surface, storage and IT needs that a firearms licensing room typically requires.

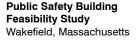
The staff informed HKT that the entry vestibule originally included a Safe Haven operation. Though HKT does not know the specifics of the former system, the Staff noted that it was deemed too cumbersome to be used as intended, and had been disconnected. HKT does not know the timeline of when the Front Desk was changed to Firearms Licensing and when the Safe Haven function was put out of use, but it is noted that having an office with a clear line of site of the vestibule is extremely helpful while assisting the public in the event that the safe haven is being utilized. Giving someone the ability to enter the vestibule and lock its exterior door behind them in a situation where they are being pursued is a public safety service. In the existing building, not only is the Safe Haven no longer in use, but Public Safety staff are remotely located and after being called on the Lobby wall phone would have to travel through the building to reach the Lobby, adding to critical response times in emergencies.

The lobby area includes access to a room originally designed as an interview space. At multiple site visits, HKT observed officers having conversations with the citizens in the public lobby and not using the Interview room. Although the existing interview room is indeed located off of the Lobby, it is isolated from











the rest of the Police Department and is underutilized as such. The room remains locked as it is not adjacent to the rest of the department and staff would have to leave the access controlled area of the station to monitor the room.

Fire Department – Entry Level use of Shared Lobby

Although a full review of the Fire Station was not included within the scope of this study, the Fire Chief was able to be a member of the Working Group which met to discuss the study's progress. HKT also met and reviewed the Fire Department's facility with Fire Chief Sullivan to better understand their operations and station.

A reoccurring element which leads to confusion is the Fire Department's entry location off of the shared Lobby. The Fire Department is located through a side door of the Lobby, at the far end away from the entry vestibule. This layout leads most visitors to stop by the Police Records window first to check where they should go, disrupting the Records office twice as frequently as needed. Although it is a welcoming Lobby space, it lacks obvious wayfinding and the Fire Department's entry is not a highlighted focal point within the space. Without having a prominent presence at the public area, the Fire Department gets lost among all the other doors and activities in the Lobby, and thus incorrectly comes across as a secondary function within the Public Safety Building.

Community Room

Another area that needs to be addressed is the access control system in the Community / Training Room. The room currently has three doors; a main door into the public Lobby which is typically left open, a side door into the Fire Department Administration area which the Fire Department can lock, and a door at the back of the room into a Fire Department corridor near the Garage. It is believed that door at the back of the room is currently left open to allow a secondary egress point out of the room, but in reality it leaves the Fire Department vulnerable to undetected public access 24/7. The room is posted as having a maximum capacity of 49 persons, and as such would only require one means of egress per the







current building code. It is recommended that this back door be lock and under the control of the fire department. If a second means of egress is still deemed to be required by the Town Building Official, adding a notification alarm in the Fire Department dispatch room on the second floor is recommended.

First Floor - Police Garage Area

The Garage area is an ongoing point of concern for the Police Department. As previously noted parking has been, and will continue to be, a problem at this site and specifically within the existing Garage on the first floor. There are only 20 parking spaces within the garage, with three of them being dedicated to the Fire Department. No personal vehicles use this space, the garage is strictly for Town vehicles only. There are areas which are limited by extremely low headroom clearance due to overhead HVAC systems, and the exterior street is at a slightly higher grade elevation leading to the floor sloping slightly down into the garage from the street. The bottom astragal seal of the overhead door also appears to not fully rest on the floor slab, leaving a gap opening. Within the garage there are interior columns which are typically located between every other parking space, and whose placement has caused numerous accidents and minor damage to the Police cruises and equipment. Car insurance deductibles have become a regular overhead fee for the department's budget over the years.

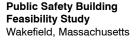
Recovered Property Storage adjacent to the garage is another area that is remote from the rest of the department. Items stored in the room are either on the floor or on the minimal amount of shelving available. Lost bicycles are the predominant item being recovered and without a bike rack to organize them, they take up a lot of space within the room. This is another room with extremely low headroom clearance in some areas due to large HVAC ductwork.

The chain link storage area that was originally identified as Bike storage, has been converted into miscellaneous storage. Officers noted that anything stored at this location gets extremely dirty, so they are limited as to what items can be placed here.











First Floor - Administration Building Lower Level

The first floor (lower level) of the Police Administration Building houses the locker rooms and department operational spaces. The Report Writing room is in good condition and sized to meet the department's needs. The Men's Locker room includes some interior columns which are a result of the 1950's building structural grid. The result is that there are a couple potential locker locations which are blocked with no access. The room currently has no separation for senior staff and does not have enough lockers to meet the department's ideal projected staffing growth into future years.

Along the West side of the main corridor, all the rooms are limited by an existing interior loadbearing wall that runs North/South through the 1950's lower level. This loadbearing wall has created less than ideal proportions for the Women's locker, Lunch and Roll Call rooms. The kitchen counter work area is tight and awkward to use. The Roll Call room is a particularly undersized room. When occupied by a full day shift during roll call staff will often elect to stand at the back of the room, the lectern area is too small for the Officer-In-Charge and the Patrolmen are overcrowded in their seats wearing their uniforms which include gun belts. The department's staff mailboxes are located in this room, meaning that people come into the space while other meetings are be conducted.

Two other spaces in the lower level were originally planned as storage areas have since been repurposed into staff offices. The Clinician is currently located in the original Arms Storage Closet. The Family Services Officer is located in an area planned as the Armorer Storage closet. Both spaces are approximately 5' wide which is vastly undersized for use as offices, are not planned to have building systems such as heating, ventilation and air conditioning, that meet the needs of an occupied office space. Neither space has access to natural light. The K9 Officer does not currently have a designated space for their team use within the building.

There are limited dedicated storage areas that lack programming adjacencies within the building, and as such, the Police Department has had to make accommodations where they can. Some examples of this









include:

- Floor space at the lowest level of Stair 2 is being used as the Patrol Bicycle storage area
- The Water Service room off of the garage on the first floor is also being used as storage
- Evidence submission packaging and labeling material are stored in the Report Writing Room,
 two floors away from the evidence room and submission lockers
- There is no dedicated Patrol Storage near the Roll Call room

Second Floor - Administration Building

The second floor of the Police Administration Building currently holds the Dispatch spaces and the staff Administrative offices. Generally, the Administrative office spaces of the Chief of Police, Deputy Chief, Lieutenants and Office Administrator work well although the location directly across from the Officer-In-Charge (OIC) Office and Dispatch are less than ideal.

The Office Administrator's space is the location of the former centrally located historic main entrance into the 1950s station. The exterior façade has maintained the historic entry alcove and signage, and the Administrator's office includes an interior corridor glass wall and small corridor alcove. The staff noted that they believed this alcove had been intended to be used as a waiting area in the original design, but in practice it is very small and feels like part of the corridor.

The Conference Room that is located between offices of the Chief of Police and the Office Administrator is undersized to meet the current needs of the department. As the only dedicated conference room for the department, it is used frequently and is too small to host a typical senior staff meeting. The Police department has to book the use of the Community / Training room or inquire if the Fire Department's Conference Room is available. There are times where personnel and security matters are discussed and having meetings in areas outside of the Police Department controlled space, is less than ideal. Other than a conference table and chairs, the room also includes file cabinets, wall shelving and a desk work surface, all of which cannot be accessed if there is a meeting taking place.

The North side vestibule is a side exit of the building which serves as the level of exit discharge for Stair 1. Having the vestibule location near the Chief of Police's office directly adjacent to an exit door and associated stairwell is disruptive, noisy and does not give the Chief the added sound privacy that is required. This Vestibule is also the location where the department currently stores their recycling and trash barrels. Other than the aesthetic and odor concerns, objects should not to be stored within egress paths.



The Dispatch area currently meets most of the operational needs of the department, but programmatically has several issues. The most apparent is its location in the interior of the building, located away from the Lobby. As previously discussed, having a 24/7 presence off of the Lobby for community interaction is a public safety issue that should be addressed. Other issues with the existing dispatch space involves the directly overhead HVAC system in the room. When running, it is so loud that the dispatchers have a hard time communicating on their calls. Common practice has lead the HVAC systems to be shut off in order to provide the appropriate noise conditions and the room's occupants are left to sit in an overheating space with no adequate air circulation.

There are two dispatchers on duty at all times to ensure coverage, but one of these dispatchers is also the OIC for the current shift. This causes one of the two dispatchers to have a second list of responsibilities including staff management, shift assignments, equipment inventory and distribution, and detention block cell checks, among others. Operationally, this department has staffed dispatch with Officers and not civilians. This practice ties officers to that location.

As the OIC is a dispatcher, the existing OIC office is connected to the Dispatch room and has visibility into dispatch and into the corridor of the department. Due to the department's staffing structure this existing staffing adjacency is a critical relationship, but it is noted that the OIC office is not currently truly functioning as an office. This office is currently being used predominantly as Patrol Storage and inventory control. With so much glazing surrounding the room, if the OIC needs to have a confidential conversation they either need to close all the window blinds in the office or find another available space, such as the shared Conference Room. The space is also used for signing out equipment, key storage and management, patrol storage and occasionally a supervised waiting area in the case of a juvenile detainee. As a juvenile holding area this is not an ideal setting, they are in the middle of the department and can hear and see department operations and conversations and are sitting in a room with access to a number of items that they should not be allowed access to.









Second Floor - 2003 Building

The detention block generally meets the department's needs. There are an adequate number of cells, holding and processing areas. The two major issues with the detention block are the Sally Port and Storage. The existing Sally Port is not adequately sized to safely and efficiently moved a detainee or impound a vehicle. Currently when a vehicle pulls into the Sally Port and closes the overhead door the clearance around the cruiser is extremely limited. The passenger van that the department currently stores within the Northern bay of the Sally Port is parked so tightly it practically touches the back wall and a tire is used as a bumper, thus allowing about 12 inches of space for the driver to squeeze between the overhead door and the front of the vehicle. This minimal clearance means that in reality the department is not able use the Northern bay for anything other than a parking space. Any type of processing of an impounded vehicle or a detainee would not be possible with such limited clearance around the car. The Southern bay cannot be used for any type of impounding, but must be left open at all times to allow for a cruiser to access for detainee processing. There are also interior columns within the space, an additional object that a detainee could potentially negatively interact with.

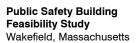
The space currently used as the Armory was designed in the 2003 structure as a Patrol Bicycle storage room. Based on the drawing set from when the structure was built, it is assumed that the room is not designed to meet the building code requirements of an armory, including fire rating and ventilation parameters which are dependent on the amount of explosive material (ammunition) that is being stored. The existing room also has two sets of double doors. Other than a fire rating issue, this is a space that should have strict access control, and having one set of doors leading into the Sally Port is a safety issue.

Other than the Detention Block, the remainder of the 2003 structure located on the 'Police side' of the Public Safety Building is dedicated to building system rooms that serve both departments. Refer to appendix A for the engineer reports on specific building systems. In general the utility rooms are in fair condition. The E911 room appears to be undersized for the amount of services and equipment located in











that room. A change from the design of the 2003 drawings is that the wall located between "Building and Grounds" room and the "Telephone" room does not exist. This combined room serves multiple building systems as well as the access roof hatch location for roof top units. While onsite HKT observed water damage from the roof/ceiling of the room and IT equipment had evidence of recently being wet. This is highlighted as a serious issue and should be address immediately.

Third Floor - Administration Building

The third floor of the Police Administration Building is the Detective and Evidence storage areas. The entire floor is taken up by these two departments and as such has limited staff traffic. Physically the offices are in good condition. The Evidence Lab, Interview Room, and Detective Sergeants office are all adequately sized and function well. The Detective Bureau's shared office has had some modifications to meet the needs of the department. Miscellaneous pieces of furniture that have been added to create additional storage for radios and equipment, but also functions as a back-up desk work station when additional workforce staff is needed. A kitchenette was later added by staff, reducing valuable square footage in the room.

The detective's office has an interior window into their Interview Room. This interior window is one-way mirrored glass, which is intending to prevent those in the Interview Room from seeing into the Detective's office. The reality of this condition is hard to control, because the Detectives office includes exterior windows, and as such the one-way mirrored glass is not completely opaque. Without subjecting the entire Detective office to blackout window treatments and limited lighting levels even at work surfaces, the existing visibility issue will remain.

Detective storage is currently located in a long, narrow room. The overall area of this room is enough to meet the detective's requirements, but the proportions of the room are so severe that any bulky or larger items need to be placed on the floor and block access to the rest of the space.









Evidence Storage is an area that is under tight control as appropriate for its security requirements. Evidence submission lockers are accessed off of the corridor and the two evidence officers are the only personnel permitted to gain access to this space. Currently general evidence is stored on shelving organized by the officer who submitted the evidence. The room appears to be adequately sized to meet the department's needs, but lacks an adjacent submission processing area in the corridor near the evidence lockers. Ideally when an officer returns to the station they immediately submit evidence for processing. This would place evidence submission near an entry point and provide a visual reminder for an operational routine to require officers to enforce proper chain of custody practices. In the current station, evidence labelling and packaging supplies are located within the first floor's Report Writing room, two levels away from the Evidence Storage area. Ideally there would be an evidence processing station in the corridor adjacent to the evidence submission lockers.

Archival Storage is located within the central spine of the building and is remote from all other spaces associated with the Police Department. A common comment from Police departments involving station design is that archival storage is program element that is routinely undersized. There are legal requirements to how long departments are obligated to keep types of record files onsite. As a result, it is the practice of most Police Departments in Massachusetts to keep records for many years. Some types of records are even kept in perpetuity. The existing Archive Storage room is full, yet clean and organized. It is the fear of the department that as the existing space becomes overrun with files, that the critical issue of finding records in an efficient manner will become more and more of a challenge in future years and is seen as an unavoidable outcome of the currently available space.

Public Safety Building Overview

In all, the Police Department occupies space on six different floor levels. During initial tours of the existing building, Police staff had to pause several times to double check which level they were on, as there are some nomenclature variations and orientation confusion.

The majority of issues in the Police Station stem from operational and layout deficiencies due to the staff size, infrastructure to support services they provide to the community, and changes to the field of Policing over the past several years. The current operational needs of the Fire Department are being met within the existing facility and though not fully reviewed or analyzed under the scope of this study, appear to meet the future needs of that department.





SPACE NEEDS ASSESSMENT

The Wakefield Public Safety Building currently houses the Police and Fire Departments in approximately 49,300 square feet (SF). Constructed was completed in 2003 and included the renovation of a major portion of the existing 1950's police department building, the construction of a large addition that house detention and building system rooms, and an entirely new fire department.

The Wakefield Police Department provides law enforcement and dispatch services twenty-four hours a day, seven days a week. The department is managed by the Chief of Police. In addition there is currently: (1) Deputy Chief of Police, (2) Lieutenants, (10) Sergeants, (4) Detectives, (28) Patrol Officers, (1) civilian Administrative Assistant, and (1) civilian Clinician. The department operates on three shifts. Officers also work as Dispatchers. The dispatch center handles business calls, 911 calls and provides emergency medical dispatch services with (2) police officer staff members twenty-four hours a day, seven days a week. The Wakefield Fire Department operates as a completely independent entity out of the same Public Safety Building. The Police and Fire Departments share access to a common first floor Lobby and Community/Training Room, a central stair and elevator vertical circulation, and building utility services. The shared Community / Training room is also the Town's Emergency Operations Center (EOC), managing Town wide operations during major weather events, town-wide emergencies, and training exercises. During emergencies, the EOC is staffed by the town's department heads and others.

The following pages represent the space program for the Police and Fire Departments housed at The Wakefield Public Safety Building. It is important to note that the focus of this study was on Police Department operations and facilities. With this in mind, it was also important for HKT to have a general understanding of the Fire Department, as the two departments share much of the same building services and utilities. This interconnection makes any modifications to one department's system, have an impact on the other, and any future potential construction project would need to take both departments' operations into account.

The programming process began with the distribution of program worksheets that were to be filled out by Police Department staff. These completed worksheets included information on existing operational processes, equipment and building spaces, as well as future staffing and equipment inventory projections for years to come. Following that process, HKT met with the police department for an existing facility tour and informational interview which outlined general information about the department. The goal of this meeting was to focus on how staff of the department perform various functions, rather than asking for a compilation of spaces that staff thought would be needed. Discussions also focused on



the realities of their existing facility in contrast to the current and projected future needs of the department, shared spaces, and community needs.

HKT also met with Fire Chief Sullivan to review that department's facility and operations. The department spaces were reviewed so that the design team was fully aware of Fire Department needs and uses of space.

Following the initial programming meeting, HKT analyzed the data collected and compared projected space needs with those of similar municipalities and with industry best practices. The space needs were illustrated graphically with room data sketches showing idealized layouts of each individual room or space, and verbally shown with room data sheets which describe the quantitative and qualitative aspects of each room. Tabulations of required program spaces were developed by adding the net square footage (NSF), defined as the area required to do an activity, of each functional space and then applying grossing factors to determine the building program gross square footage (GSF) including areas for circulation and wall construction.

Drafts of these documents were shared with the Police department to obtain their feedback, and revisions were made. A revised draft program was then shared with the Working Group Sub-Committee for review and comment.

It should be emphasized that the development of this ideal space program is a 'Site Blind' exercise, which purposefully does not take into consideration any of the existing conditions of the Police Station within the Public Safety Building. It was important to review the needs of the department separately, and then for the purpose of the study, compare those space needs against the available area located at 1 Union Street. By using this approach, the study is able to provide the Town with information which can be used as an independent record of the Police Department's needs. Whether the Town decides to pursue the proposed project within the findings of this study or a different course of action, the site blind program will be able to be utilized as document that is not influenced by the existing facility.

For this study to compare apples-to-apples during the programming of the Police Department, the existing Fire Department's spaces where also included within the Final Programming Space Summary document. The existing Fire Department spaces were measured off of bid set drawings provided by the Town. As existing spaces, it is noted that the Fire Department is not a site blind program and was added to the summary to provide information and a total building square foot of existing areas.



The space program summary demonstrates a difference of approximately 4,200 net square feet between ideal program and the existing facility.

Summary Chart - Also see master program tabulation sheets on the following pages.

	Existing Building	Ideal Program (Site Blind)	Delta (Undersized existing)
Police Department (including parking garage and shared Public Areas)	20,529 nsf	24,723 nsf	-4,194 nsf
Fire Department	10,416 nsf	N/A	
Building Support	4,852 nsf (Serves PD & FD)	2,690 nsf (Serves PD only)	
TOTAL NSF	35,797 nsf	27,413 nsf	
TOTAL GSF	49,290 gsf	39,406 gsf (a standalone PD with the ideal program)	

Parking needs were not analyzed as part of the space needs assessment. Located one block East of Main Street and Wakefield Town center, parking has been a constant issue at the existing site for years. When discussed with the Working Group, it was noted that the Town has historically not supported large scale measures to change parking conditions downtown. It is noted that the Wakefield Public Safety Building does not provide parking for their Public Safety staff. It is assumed that the parking, as it exists, will remain in its current state for the foreseeable future. HKT noted that a reoccurring industry wide theme in police station design are comments from departments that after occupancy, parking counts are again and again found to be lacking operational needs. Given the nature of public safety facilities, the need for parking spaces are not always efficiently communicated to municipalities, or possible, given site constraints. As public safety agencies, every shift reporting for duty must overlap with the previous shift in order to not have a gap in the services provided to the community. As a result, to provide adequate parking spaces at these types of facilities there needs to be parking for two separate shifts at once, for both personal and Police department cruiser vehicles. If stations include larger meeting spaces available for public use, such as Wakefield, the spaces required for public parking would be in addition to these departmental needs. The existing first floor Police garage is currently full with equipment including police cruisers, motorcycles, golf cart, a signage trailer and three Fire Department vehicles. Additional vehicles owned by the Police Department do not fit within the existing garage, and are parked in exterior spaces which could have been available for public use, but have now been designated to the Police department.



In addition to parking spaces, other identified site needs include an emergency generator, a transformer, communications tower, dumpsters and storage for equipment not otherwise included in the building program.

The program tabulation sheets on the following pages illustrate the department's proposed ideal building program as part of the site blind exercise. Minor updates have been made to the programming documents in assembling this report, and those sheets are dated May 31, 2017. Full room data sheets and sketches with details of each room's space needs can be found in Appendix C.



	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
POL	ICE DEPARTMENT									
. 01	IOE DEI ARTIMERT									
	PUBLIC AREAS									
	Entry Vestibule	SKA-S1			63		144		-81	
	Lobby	SKA-S1			580		472		108	
	Public Toilets at Lobby	SKA-S2			88		121		-33	
	T :: : : : : : : : : : : : : : : : : :	01/4 00	40		000		05.4		0.5	Room count to be
	Training/Community Room	SKA-S3	49		989		954 80		35	determined
	Training Room Storage Projection - Not included	SKA-S4	1		0 55		0		-80 55	
	PD Storage		-		22		0		22	Labeled PD Storage on existing plans, but is in FD corridor of Community Room
	CURTOTAL					4707		4774		
	SUBTOTAL Gross area adjustment 15%					1797		1771 266		
	Gloss area adjustifient 15%							200		
	Circulation adjustment at 25%							509		
	TOTAL							2546		
-	101/12							2040		
	PUBLIC INTERACTION SPACE									
	Officer-in-Charge Office	SKA-P1	1	1	143		192		-49	Currently includes copy and storage of equipment and paperwork
	Dispatch Communications	SKA-P2	3		454		418		36	
	Kitchen at Communications	SKA-P3			50		60		-10	
	Toilet at Communications	SKA-P4			50		53		-3	
	Interview Room	SKA-P5		5	139		144		-5	
	Firearms Licensing	SKA-P5A	1	1	56		85		-29	
	SUBTOTAL					892		952		
	Gross area adjustment 15%							143		
	Circulation adjustment at 25%							274		
	TOTAL							1369		
<u> </u>	ADMINISTRATION									
1	Police Chief Office with Toilet	CKV De	4	9	244		264		20	
-	and Closet Conference	SKA-P6 SKA-P7	1 15	3	241 161		261 270		-20 -109	
-				2						
-	Civilian Assistant for 2	SKA-P8	2	2	110		208		-98	
	Deputy Chief	SKA-P9	1	2	138		156		-18	
	Day Shift Commander - Lieutenant	SKA-P10	1	2	136		156		-20	
	Evening Shift Commander -	•								
	Lieutenant	SKA-P11	1	2	135		156		-21	
	Office Lieutenant - Future	SKA-P12	1	2	0		156		-156	

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
	Sergeants Office	SKA-P12A	2	2		<u> </u>	192			
	Clinician's Office - Crisis	010/11/12/1					102			
	Intervention	SKA-P13	1	2	87		116		-29	
	Family Services Office	SKA-P14	2	4	67		232		-165	Two separate offices
	Speciality Services Office	SKA-P15	3	3	0		269		-269	i wo separate onices
	Prosecutor Office	SKA-P16	1	1	117		120		-3	
			-	3						
	Records Office Office with access to attic	SKA-P17	3	3	287 138		269 0		18 138	
	PD Storage	SKA-P18			22		100		-78	
	Office Supplies	SKA-P19			60		48		12	
	Office Equipment / Copy	SKA-P20			0		64		-64	
	Archival Document Storage	SKA-P21			198		225		-27	
	Staff Toilet 2 set of 2	SKA-P22	1		200		242		-42	
	Kitchenette	SKA-P23	<u>'</u>		0		60		-60	
	Detective Commander Office -	0.01120					- 00		- 00	
	Sergeant	SKA-P24	1	2	132		144		-12	
	Detectives	SKA-P25	5	5	435		574		-139	
	Detective Interview	SKA-P26	Ť	4	137		110		27	
	Detective Storage	SKA-P27			83		100		-17	
	Evidence Lab	SKA-P28	1		124		144		-20	Currently has windows
	Evidence	SKA-P29	1		361		420		-59	Currently rias windows
	Seized Weapons Storage	SKA-P29	1		105		84		21	
	Drug Evidence Storage	SKA-P31			89		100		-11	
	Drug Evidence Storage	CIUTTOI			- 00		100		• •	
	SUBTOTAL					3563		4976		
	Gross area adjustment 15%							746		
	,									
	Circulation adjustment at 25%							1431		
	TOTAL							7153		
	DETENTION									
	Sally Port / Impound Bay	SKA-P32			620		1152		-532	
	Recovered Property	SKA-P33			263		160		103	
	Bulk Evidence Storage	SKA-P34		<u> </u>	21		160		-139	
	Booking Holding	SKA-P35		2	0		72		-72	
	Booking Booking Desk COMBINE	SKA-P36		3	518		325		193	
	WITH BOOKING				127		0		127	
-	Interview Room	SKA-P37		4	137 101		0 120	-	137 -19	
	Detention AV Surveillance	SKA-P37 SKA-P38	2	4	0		80		-80	
	Detainee Shower	SKA-P39	1		31		43		-12	
	Detention Cell - Juvenile	SKA-P40	1		219		72	1	147	
	Detention Cell - Female	SKA-P41	2		228		144		84	
	Detention Cell - Male	SKA-P42	4		645		288		357	
	Booking Storage	SKA-P43			29		36		-7	
	SUBTOTAL					2812		2652		
	Gross area adjustment 15%							398		
	Circulation adjustment at 25%							762		
	TOTAL							3812		ĺ

Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
OPERATIONS									
Roll Call	SKA-P44	13		217		352		-135	
Report Writing	SKA-P45	4		132		100		32	
K9 Operations and Office	SKA-P46	1		0		100		-100	
Police Patrol Storage	SKA-P47	<u> </u>		0		100		-100	
Armorer	SKA-P48	1		152		250		-98	
,	0.0							- 00	
SUBTOTA	L				501		902		
Gross area adjustment 15°							135		
Circulation adjustment at 25	%						259		
ТОТА	L						1297		
				ļ					
STAFF SUPPORT	01/4 040	_		400		00.4		0.5	
Lunch Room	SKA-P49 SKA-P50	6 10		139 206		234 525		-95 240	Eviation C. Ideal 40
Women's Locker Men's Locker	SKA-P50 SKA-P51	70		1032					Existing 8, Ideal 10 Existing 59, Ideal 70
Fitness Room (Currently	SNA-F31	70		1032		2161		-1129	Currently Shared with
Shared with FD)	SKA-P52			589		500		89	FD Currently Shared with
Garage (FD has 3 spaces)	SKA-P53			8730		8450		280	FD
Bicycle Storage	SKA-P54			268		160		108	
Indoor Shooting Range	SKA-P55		2	0		1440		-1440	
mass. emssg : tamge	0.400								
SUBTOTA	L				10964		13470		
Gross area adjustment 15°	%						2021		
Circulation adjustment at 25°	%						3873		
TOTA	L						19363		
BUILDING SUPPORT									
Leaving Change	0144 01104			05		00		40	Provide one near
Janitors Closet	SKA-SUP1			25		38		-13	Detention
Mechanical Room	SKA-SUP2			1080		400		680	
Water Service - Plumbing / Fire Protection Room	SKA-SUP3			90		144		-54	
Main Electrical Room	SKA-SUP4			98		250		-152	
Emergency Electrical Room	SKA-SUP5	-		221		80		141	
Emergency Electrical Recini	0101 001 0			221		- 00		171	
Electrical Closet	SKA-SUP6			0		48		-48	Proposed area assumes 2 story building
Emanual State () () ()	CKA CLID					40		40	Proposed area assumes
Emergency Electrical Closet	SKA-SUP7 SKA-SUP8	-		0		48		-48 100	2 story building
Server / E911 Room Building Services - IT Room	SKA-SUP8 SKA-SUP9	-	-	83 207		192 250		-109	
Radio Room	SKA-SUP9	 	-	125		60		-43 65	
Naulo Noolii	SINA-SUF IU			125		00		00	
Elevator	SKA-SUP11			225		200		25	Proposed area assumes 2 story building

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
	Elevator Machine Room	SKA-SUP12			86		100		-14	
	Stairs	SKA-SUP13			2612		880		1732	Proposed area assumes 2 stairs connecting 2 floors. Existing area is shared with FD
	SUBTOTAL					4852		2690		
	Gross area adjustment 15%					4032		404		
-	Gross area adjustifient 1576							404		
	Circulation adjustment at 25%							773 3867		
	IOTAL							3007		
	GRAND TOTAL PROPOSED POLICE DEPT. INCLUDING BUILDING SUPPORT AND GROSS + CIRCULATION ADJUSTMENTS; GARAGE INCLUDED							39406		
FIR	E DEPARTMENT EXISTING CO	NDITIONS								
	ADMINISTRATION									
	Fire Chief Office with Closet				192					Check SF count
	Fire Prevention Office and									
	Plan Storage				181					
										Lacking file/storage
	Administrative Assistant				134					space
	Fire Alarm Superintendent									
	Office				137					Current use by Captain
	Archived Items				118					
	Conference Room				211					
	Office Supplies Storage				40					Check size
	Toilet				38					Check size
	FD Storage				202					Located on third floor
-	CURTOTAL					4050				
-	SUBTOTAL					1253				
-	STAFE SUPPORT									
-	STAFF SUPPORT				252					
-	Day Room Dining Room				253 371					Includes kitchen
-	Kitchen COMBINED WITH				3/1					Includes kilchen
	DINING				0					
-	Janitors Closet (2)				70					
-	Women's Toilet				44					
	Men's Toilet				124					
-	Watch Room				239					
-	Valor Room				200					
	Dorm 1, 2, 3, 4, 5, 6, 7, 8, 9, 10				1435					
-	Women's Toilet / Shower				62					
	Men's Toilet / Shower				242					

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
										Currently used for extra sleep space during
	Lieutenant Dorm Room				117					events
	Captain / Lieutenant Toilet				84					0.0.00
	Captain Dorm Room				209					
	SUBTOTAL					3250				
	OPERATIONS									
	Apparatus Bays				4464					
	Equipment Maintenance				163					Ventilation issues
	EMT - Medical Supply Storage EMT Washroom				97 55					
	Fire Alarm and Maintenance				248					Contains major power panels/risers
	The Mann and Mannenance				2.10					Primarily refrigerator
	Storage				134					storage for 4 shifts
	Air Supply				120					
	W/D - Laundry				129 503					
	Turnout Gear				503					
	SUBTOTAL					5913				
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Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
SUMMARY TOTALS:									
EXISTING Grand NSF total PD (with 9,000SF parking garage included, but no building support)					20529				
EXISTING Grand NSF total Building Support					4852				
EXISTING Grand NSF total FD with no building suppo included					10416				
									*This number is the sum
EXISTING GRAND NSF TOTAL POLICE, FIRE + SUPPORT SPACES					35797				of the existing grand NSF totals of the three (PD, Building Support and FD) amounts listed above.
EXISTING BUILDING'S GRAND GSF					49290				*This number is from measured take-offs of the 2001 bid set drawings. FIRST = 17,825; SECOND = 17,945; THIRD = 13,520
PROPOSED NSF (Site Blin Program of Police Department (with parking garage)	d)						24723		*This number is the sum of the Proposed PD SubTotal amounts per category from pages 1-3 above.
PROPOSED GSF (Site Blin Program of Police Department and Building Support	d)						39406		*This number is from page 4 above.
DELTA The difference between Existing PD NSF and Proposed PD NSF								-4194	*It is noted that the area of the study's proposed floor plan additions are ~4,000SF

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CONCEPTUAL DESIGN PROCESS

Conceptual building and site plans were developed in response to the space needs identified during programming sessions with the Police department and in conversation with the Fire department. The purpose of these plan options were to test fit the program in the existing building and site to determine if the structure could be modified to provide a facility that would be adequate in size to meet the programming needs. These plans were also used to propose holistic changes in the operations, by organizing the program in different ways to demonstrate a variety of options.

Given that not all areas of the existing facility caused operational issues for the Police Department, it was important to understand the existing operations as well as the ideal program being proposed, and what modifications if any would have an influence on the Fire Department as well. In developing the plans, HKT grouped similar programmatic areas together into larger blocks of space which could be arranged within the building according to ideal adjacency relationships. Areas of note included:

- Public entry and service areas for Police and Fire
- Training / Community Room
- Police Administration areas
- Sally Port / Impound / Vehicle Storage bays
- Police day-to-day operational support spaces

A significant feature affecting these areas is the half level changes between the 1950's historic Police station and the 2003 Public Safety Building. It became apparent that when the 2003 project was being planned, implications of keeping the 1950s historic structure created some unique design features for that design team. With different floor levels, egress points and grade changes, and trying to maximize an existing downtown site, the Public Safety Building has multiple layers of infrastructure and design parameters not obvious to the casual observer.

In addition to the individual departmental programming comments that were reviewed, a reoccurring comment throughout the study was to better define public safety personnel's public presence in the public Lobby area. As previously discussed both the Police and Fire Departments Lobby presence is only staffed during regular business hours and rely heavily on signage and wayfinding. Currently, afterhours each department has a wall mounted phone that the public must use in order to speak to someone onsite, this leads to confusion and a delay in public safety personnel being able to interact with the community they serve.



Two other programming areas that were discussed included an interior firing range and changes to the existing structure of the parking garage. Both of these items were explored, but deemed impossible to accommodate within the existing facility. Though the structure could be modified, the cost implications were extraordinary and the Working Group sub-committee and the Police Department agreed not to pursue these program elements at the existing site at this time.

It is also noted that wherever the OIC is located, they will be required to continue to move vertically within the building to perform all of their duties. This is a comment that has been noted at this existing facility and specifically with the OIC providing coverage for the detention block.

Several plans were developed that demonstrated solutions to areas of concern. Most of these schemes were further refined over the course of the study.

Meeting minutes can be found in Appendix B. A summary of Meetings where design options were discussed is included below:

Meeting 3: January 2017

The initial meeting to review design options focused on specific areas of the building as individual programmatic entities: First Floor Lobby/Entry, First, Second and Third Floors of the Police 'Administration Building' (the 1950s historic structure), the Second Floor Detention Block, and the Third Floor Fire Department. These areas were focused on one at a time, and although there are elements that relate between areas, this approach allowed the Committee to focus in on the pros and cons of each, which provided discussion and information on the designs that would progress. At this initial session there were five first floor Lobby options, three first floor Administration options, six second floor Administration options, two third floor Administration options, four Detention Block options, and one proposed third floor Fire Department option. These options reviewed approaches to reaching the ideal program through a variety of interior renovations and different scales of new construction and/or additions.

Meeting 4: March 2017

In March the plans were refined and combined to create Options 1 and 2.

Option 1 included:

 A reorganized first floor entry vestibule and Lobby was created by shifting the entry to the South and allowing for more program area on the first floor. This area was allocated to the Police



Department and created enough space for both Dispatch and Records to be located off the Lobby and have proper interaction with the public. This also created a primary Lobby transaction counter for the Fire Department, thus resolving their out of view entry issue.

- A new three story addition to the West of the existing Police Administration building (1950s structure) was proposed. This provided needed area for the Police Department and included:
 - First floor dedicated to Evidence and Staff Locker Rooms.
 - Second floor reorganized to house the Detectives Bureau and Operations spaces such as Roll Call and Report Writing.
 - Third floor repurposed as senior staff office space, storage and additional administrative spaces.
- The second floor Detention Block included a small addition for the Sally Port and Impound Bay,
 leaving enough space to have an exterior parking spot on the apron.
- The third floor Fire Department storage near the elevator was relocated to a different third floor room in the Fire Department.
- Fire Department changes include a relocated transaction counter, and enlarged administration area and relocated Fire Prevention Office.

Option 2 included:

- In a different configuration but similar to Option 1, Option 2 created a reorganized first floor entry vestibule and Lobby by shifting the entry to the South and allowing more area on the first floor. This area was allocated to the Police Department and created enough space for both Dispatch and Records to be located off the Lobby and have proper interaction with the public. This also created a primary Lobby transaction counter for the Fire Department, thus resolving their out of view entry issue. This option formally places the Police and Fire Department transaction counters on opposite sides of the Lobby, and locates the bathroom and public restrooms at the end of the Lobby space.
- A new three story addition to the West of the existing Police Administration building (1950s shell) provided needed area to the Police Department. The Police Administration Building followed a layout more similar to the existing station than option 1:
 - First floor dedicated to Staff Locker Rooms and station Operations spaces such as Roll Call and Report Writing.
 - Second floor housed the Detectives Bureau, and additional administrative areas.
 - o Third floor repurposed for senior staff office space, while Evidence remains at its current location.



- The Detention Block has a larger addition for the Sally Port and Impound Bay, creating four interior parking spaces. The size of this addition would occupy the majority of the current exterior apron to the street. Preventing the department the flexibility to use the exterior apron if needed.
- The third floor Fire Department storage near the elevator was relocated to a different third floor room in the Fire Department (similar to option 1).
- Fire Department changes include a relocated transaction counter, and enlarged administration area and relocated Fire Prevention Office (similar to option 1).

After a group discussion, it was decided that Option 1 was the preferred scheme to be advanced to the next meeting.

Meeting 5: April 2017

In the April Working Group meeting a revised Option 1 was presented. This included modifications to the Lobby area, Officer-In-Charge, Interview spaces, and three potential additional Community / Training Room reconfigurations of the first floor. It had been suggested during the previous Working Group session that the Community / Training Room could be relocated to the area where the current covered entry area is located. The additional Lobby plans were reviewed and discussed. The existing column locations, the size of the room, and the inability to have tiered seating at this location were all considered, and the Committee agreed that the Community / Training Room should remain in its current location. The Working Group approved the current revised Option 1, to be estimated.

The process demonstrated that while the existing site is tight, the proposed interior program could be accommodated with additions and that other interior modifications could create a more logical Lobby for public interaction for both departments.



PROPOSED CONSTRUCTION PHASING

As part of the scope of this study, HKT, the independent cost estimator, and the Working Group discussed sequencing and phasing options that would be required of any future construction project. The committee was very aware that both Police and Fire departments provide unique public services and as such have specialized building types which cannot be modified or updated without extensive planning and oversight.

Multiple phasing approaches were discussed and initially reviewed with the cost estimator. In the end the Working Group selected what they thought was the most conservative approach to be priced out for the feasibility study's estimate. Throughout the discussion, the Working Group emphasized that no matter which approach was followed within this study, any future project at the Public Safety Building would require full review of the public's access to services and Police and Fire department operations during any construction process.





COST ANALYSIS

The goals for Wakefield Public Safety Building Feasibility Study included development of an estimated Total Project Cost budget which could be evaluated by the PBC and used by the Town to discuss what next steps should be taken. Total Project Cost is a combination of the cost for construction (hard costs) and administrative costs borne directly by the Owner (soft costs). Following the Working Group's selection of a plan and phasing approach, the proposed project was estimated by an independent third-party cost estimator. A detailed outline of the estimated probable costs for this scheme are located on the following pages. Below is an explanation of how these costs were arrived at.

Hard Costs

The estimated "hard construction costs" include construction of the building, containing demolition, renovation and new construction. Contingencies for design and construction are factored in and these costs will typically be based on the anticipated mid-point in construction. Currently at the study phase, the design and estimating contingency is carried at 15% of the construction cost. Typically this contingency is reduced as a project progresses. A 10% contingency is typical at the completion of schematic design and drops to 5% at the completion of design development. Additionally, escalation costs will be noted. For instance, if the Town anticipates a delay of construction of the project for any reason, that delay will be factored in based on anticipated normal escalation costs. At this time, our estimator is seeing a typical year's amount as 4% for this area of the state, and 6-8% in Boston and Cambridge areas. One potential variable to a budget is if there should be a significant change in the economy (such as a major rise in fuel costs) then it could affect the base cost and the escalation contingency.

Soft Costs

The estimated "soft costs" include a list of administrative costs typical for a project such as this. Other costs are based on figures from past similar projects. Working with the Committee and Town officials, these costs would be better defended as a project would proceed. Architectural, engineering and owner's project management fees are typically estimated as a percentage of the construction cost. Other costs are based on figures for similar projects. These may include permitting, legal fees, temporary relocation costs, commissioning, fixture furniture & equipment, communications, bid documents, cost of printing, advertisement and marketing of the project, testing during construction, a clerk of the works, etc. An Owner's Contingency is also carried to cover changes that are initiated at the Owner's option or latent conditions such as unforeseen circumstances. Examples of unforeseen circumstances might be additional hazardous waste or boulder removal. This contingency can also cover changes that the



Owner chooses to initiate scope modifications. These could include upgrading to a better grade of equipment or deciding to change a spatial arrangement during construction.

Estimated Total Project Costs – See Appendix F for full Estimated Probable Costs Summary sheet and cost estimate. This chart has been rounded to not include decimal values.

	Spring 2018 Construction Bid	Spring 2019 Construction Bid	Spring 2020 Construction Bid
Estimated Total Hard Construction Costs	\$ 4,897,267	\$ 5,093,158	\$5,296,884
Estimated Total Soft Costs	\$ 1,673,768	\$ 1,740,319	\$1,809,516
Owners Contingency	\$ 197,131	\$ 205,004	\$213,192
ESTIMATED TOTAL PROBABLE PROJECT COSTS	\$ 6,768,166	\$ 7,038,481	\$ 7,319,592



CONCLUSION

This report has been prepared under the direction of the Wakefield Permanent Building Committee. The Working Group Sub-Committee consisted of Permanent Building Committee Members, Police and Fire Department Staff members who represent the community and Public Safety Departments. The Committee has provided valuable guidance and thoughtful comments throughout the study's process.

The Public Safety Building is a relatively new structure in the world of municipal facilities. It has been occupied for 14 years, although planning began nearly 20 years ago. When communicating the operational needs and deficiencies of the Police Department within the existing Public Safety Building facility to the public, the relative age of the building will be an issue that will need to be explained in order to gain support for any future building project. Operational deficiencies are not as easily identified and their obvious need will require detailed explanation. The public perception of the Police Department is that they efficiently provide services, respond to emergencies, and protect the public's safety. The department's excellent service is the narrative that needs to be highlighted, but in conjunction with this an awareness campaign needs to focus on the ways the existing facility is inefficient and at times causes serious public safety concerns. These issues already exist within the building and will continue into the future.

Rightfully so, the Community may ask why these issues were not raise and resolved within the scope of the 2003 project. The answer to this question is complicated but may include the following: changes to the profession of Law Enforcement including more emphasis on social interaction, the reality of design decisions once they become occupied spaces, changes to administrative and operational practices, and the ability to communicate future operational needs through space programming and the design process.

As an independent consultant hired to perform this feasibility study for the Town, HKT is not in the position to make conclusions about all of the past outcomes of intricate and multilayered elements that go into designing a complex facility such as the Public Safety Building. What is known is that though this building might be viewed as new, the 1998 study phase which preceded the 2003 building is already almost 20 years old. Within recent years, there have been very visible changes to our local Police Departments and the duties they are asked to perform. Society is very different today than it was in 1998. The construction documents for the 2003 project even went out to bid the month before the terror attacks on September 11th. With cell phone use becoming the norm, the level of law enforcement involving the internet and other evolving technologies, the national conversation about police body



cameras as some examples, it would have been nearly impossible to predict all the events that would take place and the resulting security measures which are now a part of our daily lives.

It is also impossible to know what changes society and the field of law enforcement will evolve into in the future, but police officials have considered those items as they have reviewed the needs as presented. What we do know is that the existing Police Station does not give the department the flexibility to meet either their current needs, let alone any future needs, and this will continue to be a public safety issue.

Through performing the site-blind programming process and an assessment of the existing facility, the findings of this study confirm that the operational needs of the Police Department cannot be met within the confines of the existing station. With renovation and modifications to the existing building and approximately 4,000 square feet of additional area added to the structure, it is possible for the existing facility to expand and create a station sized to meet their current and projected future needs. This proposed plan includes a few small but flexible spaces on the third floor of the administration building which can be used to address ever changing needs of the department and community years into the future.

Deciding on a course of action which best benefits the citizens of Wakefield and the Public Safety Police Department will be the work of the Town and officials as a project moves forward. We look forward to working with you on your next steps.

Thank you.







APPENDICES



APPENDIX A - CONSULTANT REPORTS

- EXISTING CONDITIONS
- PROPOSED NARRATIVES

Structural Conditions Report

Introduction

This report describes the existing condition of the structure of Wakefield Public Safety Building. It notes structural implications as a result of the proposed improvements in accordance with the provisions of the Massachusetts State Building Code (MSBC).

Discussions and findings in this report are based on:

- A walk-through site visit performed by staff of Lim Consultants, Inc. on November 22, 2016 to
 observe the general condition of the building and a few selective structural components of the
 building.
- Architectural and structural drawings of the old police station dated October 26, 1949 by Edward and Melville Architect
- Architectural and structural drawings of the addition dated August 1, 2001 by Donham & Sweeney, Inc. Architects and Tsang Engineering Inc.

EXISTING CONDITION

The original public safety building was constructed as a police station in the 1950s. In the early 2000s, part of the original building was demolished and replaced by a three-story addition. Currently Wakefield Police Department occupies the remainder of the original building and part of the addition; Fire Department occupies majority of the addition.

1) Old Police Building

The remaining old police building has a rectangular footprint of approximately 75 feet in the north-south direction and 40 feet in the east-west direction. It stands two stories above ground and has a full basement.

The building's roof structure consists of steel open web joists supporting 2" precast plank of what appears to be gypsum or light weight cementitious materials; second floor is 2" precast concrete plank over steel open web joists; first floor is 4" cast-in-place concrete slab supported by wide flange steel beams. The steel beams and open web joists span in the north-south direction between a line of wide flange steel girders down the length of the building on the interior and brick masonry bearing walls on the perimeter. The steel girders are supported by a row of steel pipe columns which intern supported by interior concrete strip footings. The ground floor consists of 5" and 6" one-way framed concrete slabs spanning among interior strip footings and perimeter strip footings.

List of design live loads and wind load is not included in the available structural drawings. The design predates adoption of the first edition of Massachusetts State Building Code in 1975 therefore earthquake loading was unlikely to have been accounted for.

2) 2000s Addition

Designed in the 2001, the addition is L shaped in plan encompassing the old police building from the south and east. The portion to the east of the original building is two-story, housing parking on the lower

level and police detention cells on the upper level. The three-story addition to the south is occupied by the fire department; it includes a two-story tall apparatus room on the center.

The addition is structurally separated from the original building. Roof framing consists of wide flange steel beams and girders, wood rafters and TJI joists supporting plywood sheathing. Floor framing includes wide flange steel beams and steel open web joists supported by wide flange steel girders. The second floor consists of 3" concrete over 1.5" metal deck; floor for the third floor is 3" concrete slab on 9/16" corrugated metal deck. The steel beams and girders are supported by circular or square steel tube columns.

At the parking area, which occupies two-thirds of the addition's first level, the floor is 5" thick concrete slab on grade, and foundation is concrete spread footing below columns and strip footing below the perimeter frost walls. At main entry, offices, and community room, the floor slab is 8" framed concrete slab supported by concrete grade beams. The grade beams are in turn supported on 5' to 6' diameter caissons centered below steel columns.

The addition complies with the 6th Edition of Massachusetts State Building Code.

As part of the addition but separated from the new building, a gabled roof consisting of plywood, TJI joists, and steel girders and columns was constructed over the roof of the original building.

3) Observed Conditions and Repairs Needed

We performed a general walk-through observation of the existing exposed-to-view structures and looked into issues noted by the owner. The following are the observations:

3a) There is a dent in the northern concrete wall of the old police building on the first floor (Photo 1). This is a bearing wall the damaged should be repaired.



Photo 1, Damaged Concrete Wall

3b) Steel beam and metal deck corrosion were observed at a few areas of the second floor framing above the parking area, likely due to water infiltration through the floor of sally port above (Photos 2 and 3). Further inspection of the deck and steel condition will be required to evaluate the condition of deck and beam. For surface rust, the steel will need to be cleaned with wire brushed and painted. If section loss has occurred, steel reinforcement may be required.



Photo 2, Rebar Corrosion in Concrete Deck



Photo 3, Rusted Metal Deck

3c) At the apparatus room entrance, the exterior grade outside the threshold has settled (Photo 4). To provide a smooth grade transition a concrete approach slab will need to be constructed.



Photo 4, Grade Difference at Threshold

3d) Grade of the basement floor is not level. Floor settled between interior strip footing along the corridor wall and exterior wall. Floor finish is intact and there is no indication of recent deflection or movement. "Settlement" is likely deflection of the framed 5" one-way concrete slab that occurred shortly after the building construction and had stabilized since then. Repair work is not required at this point. It is recommended that the owner monitor the condition periodically for new developments such as cracking or displacement of floor finish.

BUILDING CODE REQUIREMENTS ON RENOVATION AND ADDTION

Chapter 34 of Massachusetts State Building Code, which is a Massachusetts-amended version of the International Existing Building Code (IEBC), governs the proposed renovation and addition. The requirements below are based on the draft version of 9th Edition MSBC, which amends IEBC 2015, in anticipation of its release in early 2017. Since the old police building and the addition are structurally separated, they will be evaluated as two independent buildings for code compliance.

1) Renovation

The Work Area Compliance method will be used. The proposed renovation will likely be classified as either Level 2 or Level 3 Alteration, depending on whether the reconfigured spaces will exceed 50% of the total floor area in each building.

1a) Gravity Load Supporting System

According to IEBC, all existing structural members – deck slabs, beams and girders, bearing walls, and foundation must be assessed for capacity under the proposed design gravity loads. Any stress increase in the existing members, including cumulative effects of renovation since original construction, must be limited to 5 percent; all new structural members must comply with the requirements of the current International Building Code (IBC). When the 5 percent limit is exceeded, the existing structural members must be evaluated and reinforced if necessary to support the increased loading.

1b) Lateral Load Supporting System

IEBC requires an engineering evaluation and analysis that establishes the structural adequacy of the altered structure be performed. If the proposed structural work involves more than 30% of the areas tributary to the vertical load carrying components, the renovation will be a Substantial Structural Alteration; otherwise the renovation will be a Limited Structural Alteration.

For a Substantial Structural Alteration, the altered structure is required to conform to the current International Building Code (IBC) for wind loading and for reduced IBC level seismic loading. This would result in a major upgrade of the existing structural system.

For a Limited Structural Alteration, any existing lateral load-resisting structural element whose demand-capacity ratio with the alteration considered is more than 10% greater than its demand-capacity ratio with the alteration ignored shall comply with the reduced IBC level seismic forces. If the demand-capacity ratio increase do not exceed 10%, the proposed upgrades on lateral load carrying

members will not be required. Similar to the gravity load increase calculation, the demand-capacity ratio evaluation will include cumulative effect since the original construction of the buildings.

2) Addition

2a) Vertical Addition

Adding an intermediate floor or a floor over the existing roof will be considered as a vertical addition. The building's entire structural system is to be evaluated for the proposed gravity and lateral load impact. Besides the increased gravity loading, the existing structure is required to support IBC level wind and seismic loads brought by the addition.

2b) Horizontal Addition

Requirements on a horizontal addition that is structurally connected to an existing building are similar to those on a vertical addition. To avoid evaluation and reinforcement upgrade of existing building, a horizontal addition is often structurally independent from the existing building and complies with code requirements for new buildings.

STRUCTURAL IMPLICATIONS OF PROPOSED IMPROVEMENTS

Improvements are being considered to provide relief to the tight parking spaces and to gain additional working area for the police department. The implications based on the code requirements discussed above are as follows:

1) Removing Column(s) in First Floor Parking Area

Considerations are given to the removal of certain interior column(s) in the first floor parking area. To avoid weakening the building's lateral load resistance system, columns below the second floor braced frames are not recommended to be removed. Removing a gravity load supporting column will involve the following:

- Providing temporary shoring of the second floor.
- Introducing a steel transfer girder to support the column above and the beams framing to it. The
 transfer girder will span between the remaining adjacent columns, and can be installed against
 the underside of existing steel beams on that line if headroom permits. Construction logistics will
 need to be considered. The transfer girder may need to be field spliced due to its length (about
 40 feet).
- Reinforcing the adjacent steel pipe columns for additional gravity loading, likely by welding
 channels or other shapes along their lengths. Alternatively, introducing new columns immediately
 next to existing columns.
- Opening 5" concrete slab around the base of the columns to be reinforced to gain access to column base plates and concrete footings.
- Enlarging existing concrete footings by drilling epoxy grouted rebar and pouring new concrete
- For column reinforcement alternative, extending and connecting welded steel shapes down to the base plate, enlarging steel baseplate if required; for new column alternative, constructing new base plates and anchor bolts over enlarged footings.
- Repair and restore subgrade, vapor barrier/waterproofing, and concrete slab on grade.

2) Moving the West CMU Wall of Sally Port

To increase the length of sally port on the second floor, its west wall will need to be moved further west. The 8" CMU wall is not part of the structural system. It imposes concentrated load on the second floor slab therefore there is a line of steel beams directly below the wall. Constructing the new CMU wall will involve the following:

- Install a new line of steel beams below the relocated CMU wall.
- Drill vertical dowels into existing concrete slab. Size and space of the dowels will match vertical rebar of the CMU wall.
- After construction of the reinforced CMU wall including ties to the intersecting walls, install lateral bracings from top of wall to the underside of the third floor.

3) Moving the East CMU Walls of Prosecutor/Office Supply/ Community Room

To create space for the relocated Communication hub, we looked into the option of moving the East CMU Walls of Prosecutor/Office Supply/ Community Room on the first floor between grids 8 to 10 on grid G. There is a steel braced frame in the wall between 9 and 10 and relocating the brace frame is not recommended. However it is feasible to relocate the wall in the adjacent bay between 8 and 9. The following work will be required assuming the relocated wall is a CMU wall:

- Locally excavate the existing slab-on-grade and pour thickened concrete slab/strip footing below the proposed CMU wall.
- Drill vertical dowels into existing concrete slab. Size and space of the dowels will match vertical rebar of the CMU wall.
- Construct the reinforced CMU wall including ties to the intersecting walls and repair and restore subgrade, vapor barrier/waterproofing, and concrete slab on grade

3) Utilizing the Space above Roof of Old Police Building

Roof of the old police building was enclosed by a gable roof during the 2000s construction. Consideration is given to convert the enclosed roof into a floor space. The conversion would be a "vertical addition" with the following implications:

- Roof structure of the old police building was designed to support snow load of approximately 30 pounds per square foot (psf). The design live load required by the current code is 50 psf. To support the extra load roof structure will need to be reinforced.
- Additional gravity loads also include dead load of the gabled roof and snow load above. As a
 result, masonry perimeter bearing walls, interior columns, and concrete foundation will need to be
 evaluated and reinforced if found inadequate.
- Due to higher wind exposure and building mass, structural system of the whole building is required to be evaluated for IBC level wind and seismic loading and be reinforced if found inadequate. Given the age of building a full seismic upgrade will likely be required.

4) Vertical Additions in the 2000s Construction

Although the 2000s construction was designed to resist earthquake load and complies with a more current building code compared with the original building, it is unlikely to have reserved capacities for the additional gravity and earthquake loads brought by a vertical addition. As a result, lateral load resisting members such as braced frames will be introduced and reinforcement for existing columns, beams and foundations will be required. Two vertical addition alternatives were considered:

- 4a) Addition over the sally port: This will not be a viable option if the open parking space below does not permit installation of new steel braced frames.
- 4b) A mezzanine level over back of the apparatus floor: The following work will likely be required in construction of a new mezzanine level above the apparatus floor:
 - Construct steel columns as extensions of existing steel columns
 - Construct steel beams and girders
 - Construct metal deck and concrete slab
 - Construct steel braced frames or moment frames from the apparatus floor to the mezzanine floor
 - Construct steel braced frames in two orthogonal directions from the first floor to the apparatus floor
 - Reinforce existing steel columns supporting the mezzanine level
 - Excavate and expose base of steel columns
 - Install steel gusset plates and base plates at the base of columns to make connections with diagonal bracings
 - Expand existing concrete footings below existing columns

5) Horizontal Addition

When compared with a vertical addition, we believe a structurally independent addition next to the existing building will be a more efficient way of obtaining additional spaces. The addition structure will comply with Code requirements for new buildings.

PROPOSED SOLUTIONS

The proposed renovation and addition scope includes gut renovation of the original 1950s building, a three-story addition to the west of the same building, reconfiguration of front Lobby and entry vestibule, a small addition to extend the sally port on second floor, and enclosure of the bike storage space in the first floor garage. The proposed solution will also include the scope of repairing the defects discussed in the "Existing Condition" section of this report.

1) Gut Renovation of the Original 1950s Building

Existing structure will be preserved during this renovation. The proposed space reconfiguration will not remove or alter interior steel framing. To minimize impact on the west masonry bearing wall fronting the new addition, access to the addition will be achieved through doors converted from existing windows.

2) Addition to the West of Police Station

The structurally independent three-story addition will be constructed against the west brick wall of the original 1950s building, matching all three floors of the original building and including a flat roof at the same level of the original flat roof.

According to the record drawings the soil bearing strata slops downward from east to west. The original building's first floor slab is supported by grade beams spanning among piers over spread footings and perimeter concrete walls. Bottom of the spread footings along the west concrete wall is 8'-8" below the first floor slab elevation of 98'-6". The adjacent 2001 addition is supported on bell caissons with an average bearing depth of 13'-6" below elevation 98'-6". As a result, the proposed foundation will likely be either constructed of low-bearing spread footings at 8 to 13 feet below the first floor, or supported on deep a foundation such as piles or caissons. A geotechnical engineer's evaluation will be required to determine the type of foundation for the addition and whether the west wall of the original building needs to be underpinned. As the present stage we recommend a conservative approach for cost estimation by assuming deep foundation and carrying the cost of underpinning the west wall.

The first floor construction will likely be 8" thick framed concrete slabs over grade beams spanning among either concrete piers or pile caps.

The superstructure construction will include steel columns and beams, 3" composite metal deck with concrete topping at second and third floors, and a 3" metal roof deck at roof level. Steel moment and braced frames will be installed to resist wind and seismic loading.

3) Front Entry and Lobby Reconfiguration

The curved exterior wall above front entry will be extended down to the first floor to create a new space for Records. Entrance to the building will be shifted southward through a new vestibule addition against the face of the 2001 building.

The new curved wall for Records will rest on a new concrete frost wall with either a strip footing or on grade beams over deep foundation; 8" concrete slab on grade will frame the additional interior floor area; a concrete knee wall will be constructed along perimeter of the wall to support windows and brick veneer.

The single story vestibule will be constructed of metal roof deck and steel beams supported on four tube steel posts at corners. The posts will rest on perimeter frost walls over spread footings, or on grade beams over deep foundation. First floor slab will be 8" thick framed concrete slab on grade. A concrete curb will be constructed as part of the slab to support the base of the curtain walls. There will be moment connections between perimeter roof beams and steel posts to resist wind and seismic loading.

4) Sally Port Extension

A small addition to extend the sally port bay eastward on second floor will be constructed. The addition will be structurally independent and include the following:

- conventional concrete spread footings at the same level as the adjacent existing footings;
- concrete perimeter frost walls on three sides and concrete pilasters at four corners;
- four steel posts supported by concrete pilasters;
- steel beams at second floor and roof;
- 3" composite metal deck with concrete topping at second floor, and 3" metal roof deck;
- moment connections between steel beams and columns at floor and roof for wind and seismic loading resistance.

5) Enclosure of Bike Storage Space

The first floor bike storage area behind in the garage will be enclosed as an extension of the proposed Dispatch space. The existing floor in this triangular area is 6" higher than the surrounding floor. The following work will be required:

- Removing the raised 5" thick concrete slab on grade, including the thickening concrete haunch at its perimeter;
- Lowering and properly compacting the existing subgrade;
- Installing waterproofing and insulation;
- Constructing a new 5" thick concrete slab with wielded wire fabric, thickening edge of slab and including a 2" high and 8" wide raised shelf with dowels for 8" thick CMU wall;
- Installing 8" reinforced CMU wall along perimeter of the area to enclose the space.

Wakefield Public Safety Building Wakefield, MA Fire Protection Existing Conditions Systems Report J#787 002 00.00 L#54618/Page 1/December 12, 2016

FIRE PROTECTION

Executive Summary

The building is fully protected by an automatic sprinkler systems. The system was installed as part of a building renovation and addition project in 2003. All building areas appear to be protected, sprinklers are provided in electric rooms and generator rooms, and the system is in good working condition.

Existing Conditions:

Fire service enters a closet in the lower parking garage. The ductile iron fire water service is 6-inch in size and includes a double check valve assembly, 6-inch wet type alarm valve and main system flow switch.

Fire Department connection is a 4-inch Storz type. Connection is in good condition and readily accessible.

The building has a total of eleven sprinkler zones. Sprinkler control valve assemblies include a supervised shutoff valve, check valve, flow switch, and test station.

System piping is black steel with coupling or threaded joints depending on pipe size. Piping appears to be in good condition.

Sprinkler heads are quick response type. In ceiling areas, sprinklers are typically semi-recessed pendent type. In exposed areas, sprinklers are brass upright type. In cell areas, sprinklers are institutional type. Some pendent sprinklers are missing escutcheons, missing escutcheons should be replaced.



Building fire service entrance



Main Building flow switch

Wakefield Public Safety Building Wakefield, MA Fire Protection Existing Conditions Systems Report J#787 002 00.00 L#54618/Page 2/December 12, 2016



Typical sprinkler zone control valve assembly



Fire Department connection



Typical semi-recessed pendent sprinkler



Typical institutional type sprinkler (in cell)





Pendent sprinklers missing escutcheons

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Wakefield Public Safety Building Wakefield, MA Fire Protection Existing Conditions Systems Report J#787 002 00.00 L#54618/Page 3/December 12, 2016

Recommendations:

Replace all missing escutcheons.

Owner to continue to inspect and maintain existing sprinkler system per current NFPA 25 recommendations.

Existing sprinkler system does have the capacity to be modified and expanded for a proposed renovation project.

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Wakefield Public Safety Building Wakefield, MA Plumbing Existing Conditions Systems Report J#787 002 00.00 L#54619/Page 1/December 12, 2016

PLUMBING

Executive Summary:

Presently, the Plumbing Systems serving the building are cold water, hot water, sanitary, waste and vent system, storm drain piping, and natural gas. Municipal sewer and municipal water service the Building.

The plumbing systems have been fully replaced during a renovation and addition project in 2003. The systems appear to be generally in good condition.

Fixtures:

The water closets are wall hung vitreous china with manually operated flush valves.

Urinals are wall hung vitreous china with manually operated flush valves. Staff did note that hot water is sometimes evident at the urinals.

Lavatories are wall hung vitreous china with hot and cold water handle faucets.

Electric water coolers are wall hung, with recessed chiller and hi-lo stainless steel bowls.

Janitor's sinks are floor mounted stone basins. Faucets are equipped with vacuum breakers.

EMT Washroom has a two bowl, deep, scullery sink with backsplash mounted faucet and an exposed emergency shower and eyewash fixture. Emergency fixture is supplied with tempered water.

Booking area has a wall mounted stainless steel hand sink with deck mounted gooseneck faucet and a wall mounted eyewash station.

Cell fixtures are floor mounted stainless steel type penal fixtures. Accessible unit is provided. All penal fixtures have anti-suicide skirts.

All fixtures appear to meet current code in terms of water conservation.

Wakefield Public Safety Building Wakefield, MA Plumbing Existing Conditions Systems Report J#787 002 00.00 L#54619/Page 2/December 12, 2016





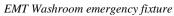


Wall hung water closet

Wall hung urinal

Typical wall hung lavatories







Janitor's Closet sink



Electric water cooler



Booking Room fixtures



 $Cell\ penal\ fixture$

Wakefield Public Safety Building Wakefield, MA Plumbing Existing Conditions Systems Report J#787 002 00.00 L#54619/Page 3/December 12, 2016

Water Systems:

The main domestic water service is located in a closet adjacent to the lower level parking garage. The service is 4-inch in size and includes a 3-inch compound water meter and main reduced pressure backflow preventer.

The main domestic cold-water distribution is 3-inch in size. Domestic water piping is copper with sweat joints. The majority of the piping is insulated with fiberglass pipe insulation. All shutoff valves appear to be in good condition.

A dedicated wall fill system, with ceiling mounted fill valves, is provided in the Fire Department Apparatus Bay to fill trucks. The system is protected with a reduced pressure backflow preventer.

Domestic hot water for the Building is generated through a natural gas fired water heater with two 119 gallon water storage tanks. The water heater is standard efficiency. The hot water system is recirculated. There is a thermostatic mixing valve and expansion tank on the system. Staff indicated there are no issues with hot water delivery.

The water heater is reaching its expected life expectancy and should be considered for replacement in the next 5 years.



Domestic water service



Apparatus Bay typical fill valve



Domestic water heater



Reduced pressure backflow preventer – App Bay

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Drainage Systems:

Cast iron is used for sanitary and storm drainage. Where visible, the cast iron pipe appears to be in good condition. Smaller pipe sizes at fixtures are copper. There was no reported issue regarding system backups. In general, the cast iron drainage piping can be reused even in a major renovation where adequately sized for the intended new use.

Roof drains are provided at all flat roof areas. Roof drains appear to be in good condition. All horizontal rain leaders were insulated with fiberglass pipe insulation.



Cast iron vent piping in attic



Typical roof drain

Natural Gas:

Natural gas is provided to the building. Natural gas supplies the heating boilers, domestic water heater, Kitchen stove, and generator.

Gas meters are located on the exterior of the building, adjacent to the main Mechanical Room. There appears to be one gas service and meter for the building and a separate service and gas meter dedicated for the generator. Piping on the exterior of the building is showing some rust and corrosion, and piping should be repainted.

Natural gas piping is black steel with welded or threaded joints, depending on pipe size. Gas piping is in good condition.



Gas services and meters



Gas supply to generator

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Wakefield Public Safety Building Wakefield, MA Plumbing Existing Conditions Systems Report J#787 002 00.00 L#54619/Page 5/December 12, 2016

Compressed Air System:

The Apparatus Bay and adjacent work shop rooms are provided with compressed air.

The compressed air is provided by a single 5 H.P. motor located on a vertical receiver of approximately 80 gallons with automatic drain. The air compressor is in good condition.

Compressed air piping is copper tubing with sweat joints. Piping is in good condition. Compressed air is supplied to ceiling mounted air hose reels, Apparatus Bay exhaust capture system, and to several wall

mounted air outlet stations with pressure regulators.



Air compressor



Air outlet

Recommendations:

Existing Plumbing systems do have the capacity to be modified and expanded for a proposed a renovation project.

Cast iron drainage piping can be reused in a major renovation where adequately sized for the intended new use. Recommend video inspection to confirm integrity prior to any new connections.

Existing domestic water heater is reach its life expectancy and is standard efficiency, recommend replacement in the next five years with new gas fired high efficiency water heater.

While existing plumbing fixtures do meet current code requirement for water conservation, additional measures can be taken by installing high efficiency, low flow, plumbing fixtures to conserve more water.

Wakefield Public Safety Building Wakefield, MA HVAC Existing Conditions Systems Report J#787 002 00.00 L#54623/Page 1/December 12, 2016

HVAC - HEATING, VENTILATION AND AIR CONDITIONING:

Executive Summary

In general, the majority of the Heating, Air Conditioning, Ventilation and Exhaust systems, equipment and associated ductwork distribution systems are in fair condition. All of the equipment appears to be original to the building from approximately 2002-2003. The building is primarily heated from the Central Boiler Plant and cooled from a Central Chilled Water Plant. Ventilation and air conditioning is provided to the building with a mixture of roof top units and indoor air handling units, with supplemental air conditioning provided in certain areas of the building.

Existing Conditions

Central Boiler Plant:

The Central Boiler Plant is composed of (3) three gas fired condensing boilers. Each of the boilers were manufactured by Lochinvar model PBN1500. Each boiler is rated for a gas input of 1,500 CFH and a heating output of 1,290 MBH. Breaching for each boiler combines into one single common header prior to exiting the boiler room and terminating at the roof level. The breaching was manufactured by Metalbestost/Selkirk. There are (2) two base mounted pumps serving the boiler hot water loop. There are (2) two base mounted pumps serving the hot water system loops for the fire and police station. All (4) four of the base mounted pumps in the boiler room are sized at 360 GPM. The two boilers' pumps are sized at 25' of head pressure and the system pumps are sized at 40' of head pressure. Combustion air enters the boiler room from a wall mounted louver intake system. The boilers and associated pumps are approaching the end of their anticipated serviceable life expectancy and would be recommended to be replaced within the next 5 years. The boilers were being serviced during our field visit.



Typical Boiler



Base Mounted Pumps



Expansion tank & Air Combustion

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Wakefield Public Safety Building Wakefield, MA HVAC Existing Conditions Systems Report J#787 002 00.00 L#54623/Page 2/December 12, 2016

Central Boiler Plant:

Cooling for the air handling unit and roof top units is provided from the roof mounted Air Cooled Chiller. This unit is approximately 90 tons. The chilled water system operates with 30% glycol to prevent freezing. There are (2) two base mounted pumps, expansion tank, chilled water equipment and AHU-1 located in the Fan Room 318. The pumps were manufactured by Taco industries.







Chilled Water Pumps

Ventilation and Air Conditioning:

Ventilation and air conditioning are provided throughout the building from (3) roof top units and (2) indoor air handling units. One air handling unit is for heating and ventilation only and is located in Parking Garage 157. This unit is approximately 15,500 CFM and has a hot water coil. The other indoor air handling unit is located in Fan Room 318. The unit was manufactured by McQuay.

This unit has both heating hot water and chilled water coils and is approximately 8,000 CFM. The three (3) roof top units have heating hot water and chilled water coils. These units range from 10,000 CFM to 7,000 CFM. The Roof top units were manufactured by Scott Springfield Mfg. Inc. The RTUs and air handling units are approaching the end of their serviceable life expectancy and should be replaced within the next 5 years.

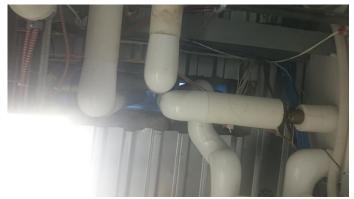
The majority of the spaces have VAV terminal boxes. These terminals have hot water re-heat coils to raise the discharge air temperatures at the box if the rest of the system is in cooling mode. It is our understanding based on discussions with the building occupants that this system does not work properly.

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One of the roof top units is located over the Telephone Room 208 in the police station. Hot water and chilled water mains rise up to the RTU over the server rack. Water leakage in Telephone Room 208 was noted as an issue and is a serious concern.





Pipe Mains to RTU-2

Air Handling Unit





Typical RTU H+V Unit

Terminal Heating Equipment:

Terminal heating equipment is provided throughout the building in areas such as vestibules and lobbies. Although all appeared to be functioning properly, this equipment is approaching the end of its anticipated serviceable life and should be considered to be replaced within the next 5 years.

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Supplemental Cooling:

Supplemental cooling is provided in areas such as IT rooms. This equipment consists of an indoor evaporator and an outdoor air cooled condensing unit with refrigerant piping between the two.



Ductless Cooling units

Building Exhaust:

There are approximately 13 exhaust fans that serve the building. Exhaust fans range from roof mounted to inline. At the time of our site visit, the units appeared operational and no deficiencies were observed.

It is our understanding that Equipment Maintenance Room 263 has an inadequate exhaust system for its usage. When this room is in use or storage space use, fumes or odors can circulate into other portions of the building. This is due to the Equipment Maintenance Room 263 return grille connected to RTU-2. The Fire Alarm Maintenance Room 266, EMT Room 264 and Equipment Maintenance Room 265, that are located in the apparatus bay, should be directly exhausted from the building rather than have return air to RTU-2.



Typical Exhaust Fan

Wakefield Public Safety Building Wakefield, MA HVAC Existing Conditions Systems Report J#787 002 00.00 L#54623/Page 5/December 12, 2016

Fire Station Cooking Hood:

It is our understanding that when the fire station cooking hood is in use, the odors from cooking circulate into the police station, corridors, stairways and the elevator.



Fire Station Kitchen Hood

Source Capture Systems:

The Fire Station Apparatus bay has a source capture system with hoses to run to the trucks that is located in the bays. The source capture system was manufactured by Plymovent Industries. In the parking garage located below the police station, the source capture system has a ducted exhaust system controlled by CO & nitrogen dioxide sensors that activate the fan when levels rise in the space.



Apparatus Bay Plymovent



Garage 137

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Wakefield Public Safety Building Wakefield, MA HVAC Existing Conditions Systems Report J#787 002 00.00 L#54623/Page 6/December 12, 2016

Building Controls:

The HVAC equipment is connected to a Building Management System (BMS). The BMS system is by Automated Logic. It is our understanding that the Public Safety Building BMS is monitored somewhere else in Town.



Controls

Recommendations:

In summary, much of the existing equipment is in fair condition. The equipment is approaching the end of its expected service life, but based on our observations, the equipment can remain in service.

Based upon our review and observations of the building HVAC systems, we offer the following systems recommendations.

- During our site visit and discussions with the building occupants, it was noted that the heating system appears to underperform and does not meet the desired space comfort levels. We would recommend replacing a majority of the HVAC system, associated components and controls due to the occupants not having a comfortable work environment and the overall age of the equipment observed. The building cannot maintain desired heating and cooling temperatures throughout the building. The majority of the equipment is nearing its replacement age and the HVAC does not satisfy the space comfort levels, therefore, the system should be replaced.
- The Central Heating Plant equipment should be replaced as it appears that mechanical equipment faults cause downtime and it allows the building temperatures to drop below acceptable levels.
- The Central Cooling plant equipment is also approaching the end of its anticipated serviceable life expectancy and should be replaced.

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Wakefield Public Safety Building Wakefield, MA HVAC Existing Conditions Systems Report J#787 002 00.00 L#54623/Page 7/December 12, 2016

- Roof top units and air handling units should be replaced.
- Terminal boxes throughout the building should be replaced.
- Split system ductless cooling units should be replaced.
- Water leakage entering IT room from one of the RTUs located above the IT room should be further reviewed to determine how to make the IT room a dry space without leaks that could cause potential damage.
- The Fire Station kitchen hood discharge should be further reviewed to determine how exhaust from the hood is re-entering the building in the police station.
- The Building Management System should be upgraded to be able to monitor equipment, adjust temperatures and improve overall building comfort. Monitoring the BMS on site would allow for the system to be adjusted quicker than remote monitoring from an off-site location.
- Rooms Fire Alarm and Maintenance 264, EMT 265 and Equipment Maintenance 266, located off the apparatus bay, should have the return duct back to RTU-2 removed and be directly exhausted.

Inc

Wakefield Public Safety Building Wakefield, MA Electrical Existing Conditions Systems Report J#787 002 00.00 L#54617/Page 1/December 12, 2016

ELECTRICAL

Executive Summary:

In general, the existing electrical infrastructure is in fair condition. The building was constructed in 2002-2003, making the systems approximately 14 years old, less than half of their expected serviceable life. Other systems, such as technology and security, have either been upgraded, added to, or are in the process of being upgraded. Upgrades or changes to these systems are not uncommon as they become obsolete or outdated in a shorter time period than major electrical systems.

Electrical Distribution System:

Three phase primary power runs underground from a utility pole on Crescent Street to a utility company owned pad mounted transformer. The utility company is Wakefield Municipal Gas & Light Department. The metering is done indoors at the main switchboard C.T. cabinet. The service is rated at 800 amperes at 277/480 volt, 3 phase, 4 wire. The service is terminated in a dedicated 800 ampere main circuit breaker located in the main electric room. The main circuit breaker feeds the main distribution panel "MDP". The "MDP" serves the normal side of two transfer switches, ATS #1 and ATS #2, the elevator, chiller and panel "HP2", which are loads not backed-up by the emergency generator. All other loads are backed-up by the emergency generator.



Pad Mounted Transformer



Meter

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Main Breaker



Main Breaker

Emergency Power System:

There is an interior stand-by, natural gas-fired 240 KW/300 kVA at .8 PF generator set. The generator is manufactured by Caterpillar, engine mode 3406. A 300 amp breaker services ATS #1 the optional stand-by loads and a 60 amp breaker services ATS #2 the life safety lighting loads. The system meets the current electrical code Article 700 Separation of Optional Stand-by and Life Safety Loads. The building is equipped with a centralized UPS (Un-Interruptible Power Supply) that serves panel EL1F and several other loads in the MDF room. The UPS is manufactured by APC and was at 26% capacity at the time of the site visit. The E911 system is served by its own dedicated UPS.



Generator Nameplate



ATS #2 – Life Safety

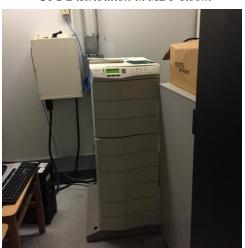
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EHLS



UPS Distribution in MDF Room



UPS for E911





UPS in MDF Room

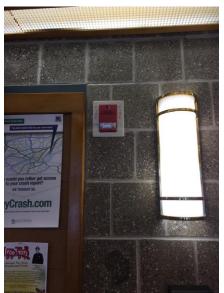
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Fire Alarm System:

The building is equipped with an addressable fire alarm system. The system manufactured by Edwards. The building contains early warning detection. The coverage of the detection and notification appliances seem to be in compliance with code. The method of transmission is via local energy masterbox, Masterbox #343 and manufactured by Gamewell.



Masterbox



Horn Strobe Notification Appliance



Smoke Detector



Annunciator

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Exterior Lighting System:

Exterior lighting consists of building mounted wall packs for egress lighting, recessed downlights in the main entrance canopy, pedestrian height decorative pole lighting near main entry with globe style fixtures and parking area pole lighting with decorative poles and fixtures. The high pole lights are gooseneck renaissance style fixtures. Exterior lighting seems to be in good condition.



High Pole



Pedestrian Height Poles



Building Wall Packs



Main Entry Canopy Lights

Wakefield Public Safety Building Wakefield, MA Electrical Existing Conditions Systems Report J#787 002 00.00 L#54617/Page 6/December 12, 2016

Interior Lighting System:

In general, the building lighting is in fair condition and consists of fluorescent fixtures with electronic ballasts. Many fixtures have been replaced since the original construction and some areas have low light levels such as the parking garage and the apparatus bay. There are also some fixtures that are in poor condition.

The parking garage lighting is 100W metal halide high bays, they are in fair condition, however, cannot be controlled by occupancy sensors due to start-up time and do not work well during power outages, also they are not energy efficient. Light levels are poor in the parking garage.

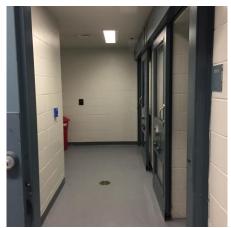
Where there are acoustical ceiling tile suspended ceilings 2x2 acrylic lensed troffers with T8 fluorescent lamps are utilized. Where the round acrylic troffers were installed, they have gradually been replaced with 1x4 utility wraparound fixtures due to the high failure rate and difficulty getting the correct lamps and ballasts.

The main lobby consists of fluorescent fixtures installed in beams providing up and down lighting, as well as, decorative wall sconces. The lighting in the lobby is in good condition.

The apparatus bay consists of fluorescent acrylic highbay fixtures. They are in poor condition and some are not working. The light levels are poor.

The booking area and cells are equipped with sealed vandal resistant fixtures appropriate for the environment in which they are installed.

Generally, lighting controls are via local line voltage switches. There is a lighting control system that serves common areas and apparatus bays, and other fixtures that automatically turn on during an alarm event. The lighting control system is manufactured by Touch Plate Lighting Controls. The sallyport lighting control has been retrofitted with wall type sensors that were incorrectly installed at the ceiling adjacent to each fixture, because wall type sensors are used, the coverage from the ceiling is poor resulting in poor operation of the lights.



Cell Area Light



Wall type Sensor on Ceiling in Sallyport

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Lobby Lighting

Parking Garage Light

General Lighting







Apparatus Bay Lighting

Round Sconces that are Problematic

Lighting Relay Panel

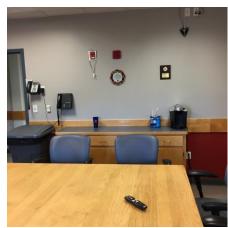
Branch Circuitry:

In general, receptacle coverage is fair with some exceptions which are noted in the report. The following areas do not have adequate receptacles: the fire department dispatch room does not have any more capacity to add equipment, there are no outlets for the fire department portable radios in the locker room and there are no counter height receptacles in the dining room counter.

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Fire Dept. Dispatch Console

Fire Dept. Radios (No Outlets)

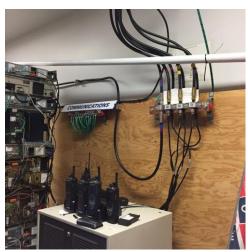
Dining Room Counter

Communications System:

All services enter into the telephone room on the second floor. Data wiring is CAT6. The main data rack does not have vertical cable management making the patching disorganized. The radio equipment is located on the third floor. A sub-panel has been added to serve the equipment and the panel is fed via UPS-2, which is to be dedicated for E911 equipment. The E911 is in a dedicated closet on the second floor. The building contains VOIP Cisco telephones. The building is equipped with a Rauland Telecenter ICS for paging. Wireless coverage inside the facility seems to be adequate.







Radio Equipment

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Room Data Rack in Telephone Room

Paging System in Telephone Room

Much of the equipment that is installed in the MDF room is not installed properly on racks but is set down on shelves un-secured.

Security:

The facility is equipped with an electronic access control system which consists of card readers, door contacts, request to exit devices, door controllers and electronic hardware. The existing Hirsch velocity system is in the process of being replaced with a Lenel Onguard System.

The current design of the building/access control system does not properly partition the building to restrict access to private business related areas from the public, this occurs in the first floor fire department lobby and in the back door on the south wall of the training/community room doors that enter into the fire station. It also occurs at the door that leads into the apparatus room from the elevator/stairwell area on the second floor.

The facility also contains a CCTV system with analog cameras generally located in the interior, perimeter, and the detention area. The system is functional, however, is antiquated as compared to the products currently on the market.

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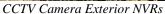


CTV camera interior

CCTV Camera Exterior

CCTV Camera Exterior







Hirsch System Being Replaced

Miscellaneous Systems:

The building is equipped with a lightning protection system.

The building is equipped with a Zetron System for station alerting.

Recommendations:

Power Distribution:

• Existing distribution equipment can be reused under a renovation program.

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Wakefield Public Safety Building Wakefield, MA Electrical Existing Conditions Systems Report J#787 002 00.00 L#54617/Page 11/December 12, 2016

Emergency Power System:

• Existing generator and distribution can be reused under a renovation program.

Interior Lighting:

- Lighting should be upgraded to LED fixtures. As a priority, the parking garage and apparatus bay should be upgraded to LED high bays. By upgrading to LED fixtures, the life of the fixture is extended substantially and the light power density of the building will be decreased while light levels increase, resulting in increased light levels and lower energy cost.
- The building should be equipped with a new networked lighting control system (NLC) with occupancy sensors in all spaces and daylight harvesting sensors within 15 feet of exterior windows. This type of system will further reduce energy cost.

Exterior Lighting:

• Exterior fixtures should be retrofit with LED sources, which will result in reduced maintenance and energy cost.

Wiring Devices:

• Outlets should be added for fire department radios, in the fire department dispatch console and above the day room counter, and in areas where plug strips are being utilized.

Fire Alarm System:

• The existing system can be expanded and reused.

Technology:

• The data rack should have vertical cable management installed. It should be properly grounded and cables re-patched and dressed in a neat and workmanlike manner.

CCTV:

- Cameras should be upgraded to IP Mega Pixel Cameras.
- VMS system should be upgraded to a system that integrates with the new Lenel Onguard access control platform.

Card Access:

• A vestibule in the fire department lobby with access control should be provided to restrict public access to fire department business area. Two additional proximity readers should be added in the back door to the training room and to the door to the apparatus bay from the elevator lobby.

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Wakefield Public Safety Building 1 Union Street Wakefield, MA J#787 002 00.00 L#56158/Page 1/April 28, 2017

FIRE PROTECTION SYSTEMS

NARRATIVE REPORT

The following is the Fire Protection system narrative, which defines the scope of work and capacities of the Fire Protection system as well as the Basis of Design.

CODES

A. All work installed under Section 210000 shall comply with the MA Building Code and all state, county, and federal codes, laws, statutes, and authorities having jurisdiction.

DESIGN INTENT

A. All work is new and consists of furnishing all materials, equipment, labor, transportation, facilities, and all operations and adjustments required for the complete and operating installation of the Fire Protection work and all items incidental thereto, including commissioning and testing.

3. GENERAL

A. The building is protected with an automatic sprinkler system. The system will remain and be extended to protect the renovated areas and new addition.

4. DESCRIPTION

- A. The existing fire service, backflow preventer assembly, alarm valve, and fire department connection will remain.
- B. The existing system will be modified in the renovated areas to protect the new architectural layout. Existing system will be extended to protect the new addition.
- C. All areas of the building, including all finished and unfinished spaces, combustible concealed spaces, and closets will be sprinklered.
- D. All new sprinkler heads will be quick response, pendent in hung ceiling areas and upright in unfinished areas.

BASIS OF DESIGN

- A. Mechanical rooms and storage rooms are considered Ordinary Hazard Group 1; Vehicle storage areas are considered Ordinary Hazard Group 2; all other areas are considered light hazard.
- B. Required Design Densities:

Light Hazard Areas = 0.10 GPM over 1,500 s.f. Ordinary Hazard Group 1 = 0.15 GPM over 1,500 s.f. Ordinary Hazard Group 2 = 0.20 GPM over 1,500 s.f.

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C. Sprinkler spacing (max.):

Light Hazard Areas = 225 s.f. Ordinary Hazard Areas = 130 s.f.

PIPING

A. All new sprinkler piping 1-1/2 in. and smaller shall be ASTM A-53, Schedule 40 black steel pipe. Sprinkler/standpipe piping 2 in. and larger shall be ASTM A-135, Schedule 10 black steel pipe.

7. FITTINGS

A. All new fittings on sprinkler piping, 2 in. and larger, shall be Victaulic Fire Lock Ductile Iron Fittings conforming to ASTM A-536 with integral grooved shoulder and back stop lugs and grooved ends for use with Style 009-EZ or Style 005 couplings. Branch line fittings shall be welded or shall be Victaulic 920/920N Mechanical Tees. Schedule 10 pipe shall be roll grooved. Schedule 40 pipe, where used with mechanical couplings, shall be roll grooved and shall be threaded where used with screwed fittings. Fittings for threaded piping shall be malleable iron screwed sprinkler fittings.

8. JOINTS

A. New threaded pipe joints shall have an approved thread compound applied on male threads only. Teflon tape shall be used for threads on sprinkler heads. Joints on piping, 2 in. and larger, shall be made up with Victaulic, or equal, Fire Lock Style 005, rigid coupling of ductile iron and pressure responsive gasket system for wet sprinkler system as recommended by manufacturer.

9. DOUBLE CHECK VALVE ASSEMBLY

A. Existing backflow preventer assembly will remain.

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PLUMBING SYSTEMS

NARRATIVE REPORT

The following is the Plumbing system narrative, which defines the scope of work and capacities of the Plumbing system as well as the Basis of Design.

CODES

A. All work installed under Section 220000 shall comply with the MA Building Code, MA Plumbing Code and all state, county, and federal codes, laws, statutes, and authorities having jurisdiction.

2. DESIGN INTENT

A. All work is new and consists of furnishing all materials, equipment, labor, transportation, facilities, and all operations and adjustments required for the complete and operating installation of the Plumbing work and all items incidental thereto, including commissioning and testing.

GENERAL

- A. The Plumbing Systems that serve the project are cold water, hot water, tempered water, sanitary waste and vent system, storm drain system, and natural gas.
- B. The Building will be serviced by Municipal water and Municipal sewer system.
- C. All Plumbing in the building will conform to Accessibility Codes and to Water Conserving sections of the Plumbing Code.

DRAINAGE SYSTEM

- A. New Soil, Waste, and Vent piping system will be provided to connect to all new plumbing fixtures and new equipment. New piping will connect to the existing building sanitary system.
- B. Storm Drainage system will be provided to drain all new flat roofs areas. Flat roof areas will be provided with galvanized roof drains piped through the building connecting to the existing storm drainage system.
- C. All new sanitary and storm drainage system piping will be service weight cast iron piping; hub and spigot with gaskets for below grade; no hub with gaskets, bands and clamps for above grade 2 in. and larger. Sanitary waste and vent piping 1-1/2 in. and smaller will be type 'L' copper.

5. WATER SYSTEM

A. The existing domestic water service from the municipal water system and existing meter will remain.

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- B. New domestic water distribution piping will be provided to all new plumbing fixtures and equipment. provided. New piping will connect to the existing building distribution system.
- C. Existing water heater will be demolished and replaced with new water heater. Domestic hot water heating will be provided with a high efficiency, gas fired, condensing water heater, 200,000 BTUH input, with 120 gallons of storage. System is to be equipped with thermostatically controlled mixing devices to control water temperature to the fixtures.
- D. All new domestic water piping will be type 'L' copper with copper press-fit fitting system. All piping will be insulated with 1 in. thick high density fiberglass.

6. GAS SYSTEM

- A. Natural gas service will be existing to remain. The gas piping will be modified to serve the new heating boilers and water heater. Existing gas to the generator will remain.
- B. New gas piping will be Schedule 40 black steel pipe with threaded gas pattern malleable fittings for 2 in. and under and butt welded fittings for 2-1/2 in. and larger.

7. FIXTURES

- A. Furnish and install all fixtures, including supports, connections, fittings, and any incidentals to make a complete installation.
- B. New plumbing fixtures shall be the manufacturer's guaranteed label trademark indicating first quality. All acid resisting enameled ware shall bear the manufacturer's symbol signifying acid resisting material.
- C. Vitreous china and acid resisting enameled fixtures, including stops, supplies and traps shall be of one manufacturer by Kohler, American Standard, or Eljer, or equal. Supports shall be Zurn, Smith, Josam, or equal. All fixtures shall be white. Faucets shall be Speakman, Chicago, or equal.
- D. New fixtures shall be as follows:
 - 1. <u>Water Closet</u>: High efficiency toilet, 1.6 gallon per flush, wall hung, vitreous china, siphon jet. Manually operated 1.6 gallon per flush-flush valve.
 - 2. <u>Urinal</u>: High efficiency 0.5 gallon per flush urinal, wall hung, vitreous china. Manually operated 0.5 gallon per flush-flush valve.
 - 3. <u>Lavatory</u>: Wall hung/countertop ADA lavatory with 0.5 GPM metering mixing faucet programmed for 12 second run-time cycle.
 - 4. <u>Sinks</u>: MAAB/ADA stainless steel, single bowl, countertop sink with gooseneck faucet and 0.5 GPM aerator.
 - 5. <u>Drinking Fountain</u>: Barrier free hi-low wall mounted electric water cooler, stainless steel basin with bottle filling station.

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6. Janitor Sink: 24 x 24 x 10 Terrazo mop receptor Stern-Williams or equal.

8. DRAINS

A. Drains are cast iron, caulked outlets, nickaloy strainers, and in waterproofed areas and roofs shall have galvanized iron clamping rings with 6 lb. lead flashings to bond 9 in. in all directions. Drains shall be Smith, Zurn, Josam, or equal.

9. VALVES

A. Locate all valves so as to isolate all parts of the system. Shutoff valves 3 in. and smaller shall be ball valves, solder end or screwed, Apollo, or equal.

10. INSULATION

A. All water piping shall be insulated with snap-on fiberglass insulation Type ASJ-SSL, equal to Johns Manville Micro-Lok HP.

11. CLEANOUTS

A. Cleanouts shall be full size up to 4 in. threaded bronze plugs located as indicated on the drawings and/or where required in soil and waste pipes.

12. ACCESS DOORS

A. Furnish access doors for access to all concealed parts of the plumbing system that require accessibility. Coordinate types and locations with the Architect.

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HVAC SYSTEMS

NARRATIVE REPORT

The following is the HVAC Systems narrative which defines the scope of work and capacities of the HVAC Systems, as well as, the Basis of Design.

CODES

All work installed under Section 23 00 00 shall comply with the State of Massachusetts Building Code and all local, county, and federal codes, laws, statutes, and authorities having jurisdiction.

DESIGN INTENT

The work of Section 23 00 00 is shown on the drawings and specifications. All work is new and consists of furnishing all materials, equipment, labor, transportation, facilities, and all operations and adjustments required for the complete and operating installation of the Heating, Ventilating, and Air Conditioning work and all items incidental thereto, including commissioning and testing.

3. BASIS OF DESIGN:

Massachusetts Code values are listed herein based on Essex County values as determined from ASHRAE weather data tables

Outside: Winter 7 deg. F, Summer 87 deg. F DB / 74 deg. F WB

Inside: 70 deg. F +/- 2 deg. F for heating and 75 deg. F +/- 2 deg. F for (50% RH +/- 5%RH) for cooling. Unoccupied temperature setback will be provided.

Ventilation: ASHRAE Guide 62.1-2010 and IBC Mechanical Code will be met as a minimum requirement for ventilation air.

4. SYSTEM DESCRIPTION

Central Heating Plant:

Three (3) gas fired condensing boilers with an input of approximately 2,000 MBH each shall provide heating hot water to all heating terminal devices. The supply hot water temperature will be adjusted based on outside temperature to improve overall operating efficiency of the power plant. Primary and standby inline pumps shall move the heating hot water through a two-pipe fiberglass insulated schedule 40 black steel and type L copper piping system. The pumps shall be controlled by the variable frequency drive, adjusting flow to meet the building's needs.

Combustion air for the boiler will be distributed directly to the boiler through a ducted distribution system to the burner. Breeching from the boiler shall be through a venting system that shall be provided by the Division 22 00 00 Contractor.

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Central Chilled Water Plant:

One (1) air cooled chiller with an approximate capacity of 90 tons shall provide chilled water to RTU-1, RTU-2 and AHU-1. The primary and standby inline pumps shall move the heating hot water through a two-pipe fiberglass insulated schedule 40 black steel and type L copper piping system. The pumps shall be controlled by the variable frequency drive, adjusting flow to meet the building's needs.

Reused Existing Systems:

In general, the ductwork, piping and terminal devices throughout the building that are not impacted in the renovation work will be existing to remain and be reused. In the renovation areas of the building and where the new addition is proposed, extensions of the existing systems such as ductwork and piping will be provided to include the new portions of the building. Where room layouts are will be modified, existing systems may be capable of remaining in place with minor reconfigurations such as revising the diffuser layouts. Where room layouts are completely changing usage or sizes, new ductwork, VAV boxes and piping will be required.

Air Handling Units H&V and Roof Top Units:

Heating, cooling, and ventilation shall be performed through three (3) roof top units, one (1) indoor air handling unit and one (1) Heating and Ventilation unit. All units will be variable volume adjusting fan speeds to meet building needs. Fans will adjust based on system static pressure as the variable air volume box adjust their respected dampers to meet the zones load. These units will replace in kind existing equipment and connect to existing ductwork and heating and chilled water piping systems respectively.

Existing equipment sizes for replacement (based on original equipment sizes):

- RTU-1 8,500 CFM
- RTU-2 10,000 CFM
- RTU-3 7,000 CFM
- AHU-1 8,000 CFM
- HV-1 13,500 CFM

VAV Boxes:

Zone level heating, cooling, and ventilation shall be performed through variable volume adjusting fan speeds to meet building needs. Fans will adjust based on system static pressure as the variable air volume box adjust their respected dampers to meet the zones load.

Space Heating and Cooling:

Each occupied zone will be provided with variable air volume boxes (VAV) w/ hot water reheat. The RTU or AHU shall provide a constant discharge air temperature to the VAV boxes. The VAV boxes will modulate the internal dampers to meet zone set point. If the damper position is at its minimum, yet the space temperature continues to fall, the reheat control valve shall modulate open allowing the flow of hot water through the coil.

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The VAV boxes are controlled by a local zone thermostat along with the DDC Control System.

Preconstruction Air and Hydronic Testing Report:

Prior to construction beginning, a preconstruction balancing report should be performed on both the air and hydronic systems throughout the building. The report will indicate any system deficiencies that are currently problematic in the existing building and any areas that will need to be addressed and corrected during construction.

Kitchen Ventilation:

A kitchen exhaust air distribution system consisting of a kitchen exhaust fan, stainless steel ductwork, and associated controls shall be provided for the kitchen exhaust hood (hood to be provided by others).

The existing Fire Station Kitchen exhaust Duct will be renovated to eliminate the odor cross contamination from entering to other parts of the building.

Dispatch:

The new dispatch should be fit out with a dedicated critical room air conditioning Unit (CRAC) system. Ventilation air can be introduced to the space from the CRAC unit, which will also be capable of heating the space.

IT Rooms:

IT Data Rooms shall be air conditioned by dedicated variable refrigerant flow ductless cooling unit systems.

Lobby, Corridor, and Entry Way Heating:

Lobby, corridor, and entry ways shall be heated by a combination of new hot water convectors, cabinet unit heaters, and fin tube radiation heating equipment with new DDC temperature controls.

Testing, Adjusting, Balancing & Commissioning:

All new HVAC systems shall be tested, adjusted, balanced, and commissioned as part of the project scope.

Refer to above for preconstruction balancing report.

<u>Automatic Temperature Controls (ATC-DDC):</u>

Automatic temperature controls will be of the low-voltage design for the operation of all valves and actuators. The ATC system will monitor all space temperatures, system setpoints, and provide overall control for the entire HVAC system. A central front end PC workstation will also be provided for access to the entire Automatic Temperature Control System.

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ELECTRICAL SYSTEMS

NARRATIVE REPORT

The following is the Electrical system narrative, which defines the scope of work and capacities of the Power and Lighting system, as well as, the Basis of Design for the Public Safety Building Renovation.

CODES

All work installed under Section 26 00 00 shall comply with the Massachusetts State Building Code and all state, county, and federal codes, laws, statutes, and authorities having jurisdiction.

2. DESIGN INTENT

All work is new and consists of furnishing all materials, equipment, labor, transportation, facilities, and all operations and adjustments required for the complete and operating installation of the electrical work and all items incidental thereto, including commissioning and testing.

Capacities of systems and equipment are as specified on the drawings and schedules.

A. Power Distribution:

The existing Electrical distribution system will be utilized to serve new loads in the 3 story addition, as well as in the renovated areas. Panel EL1F located on the first floor, will be required to be re-located to the adjacent wall, and all existing branch circuits will be spliced and extended. New circuits will run to EL1F as required. A new 100 Amp, 3 Phase panel board will be provided within the new Dispatch Room 113 on the first floor, and will be fed from the existing centralized ups that is currently at 26% utilization. New mechanical equipment will be fed from existing mechanical panels and new lighting loads will be fed from existing lighting panel boards.

B. Interior Lighting System:

- 1. General offices and training room lighting fixtures will consist of recessed 2'x4' LED luminaries with dimming drivers. The fixtures will be wired for automatic dimming where natural day light is available and also for multi-level switching.
- 2. The Sallyport will be provided with high output LED pendant luminaires with dimming drivers. Fixtures will be located between the vehicles for access. Fixtures will be designed for rough service.
- Corridors and other functional lighting fixtures will consist of acrylic recessed direct fixtures with LEDs and dimmable drivers.
- 4. Lighting in the Dispatch Room will be indirect dimmable LED pendant fixtures for general lighting, and LED recessed spots aimed at each dispatch console with individual dimming controls.
- 5. Storage, mechanical, etc. will be provided with LED industrial wraparound fixtures with acrylic lens.

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- 6. Exit signs will be of the energy efficient, long life LED type.
- 7. All fixtures will be LED type with dimmable drivers.
- 8. Each area will be locally switched and designed for multi-level controls. Each office space and toilet room will have an occupancy sensor to turn lights off when unoccupied. Daylight sensors will be installed in each space with daylight contribution for automatic dimming of light fixtures.

C. Site Lighting System:

- Building perimeter fixtures will be wall mounted LED luminaires over exterior doors.
- 2. All fixtures will be of the dark sky compliant cut-off type.

D. Wiring Devices:

- 1. Offices will generally have one (1) duplex outlet per wall. At each workstation a double duplex receptacle will be provided.
- 2. Corridors will have a cleaning receptacle at approximately 25 foot intervals.
- 3. Exterior weatherproof receptacles will be installed at exterior doors.
- 4. A system of computer grade panelboards with double neutrals and surge protective devices will be provided for receptacle circuits.
- 5. Receptacles in the Sallyport will be GFI type with weatherproof covers mounted at 48 inches above floor.

E. Fire Alarm System:

- The existing FACP will be relocated from the existing Communication Room to the new Dispatch Room 113, all existing wiring will be extended to the new location. Existing devices will be utilized where possible, and new devices will be provided in the renovated areas as required. New devices connected to the existing Edwards EST FACP will be provided in the addition.
- 2. Smoke detectors will be provided in open areas, corridors, stairwells and other egress ways.
- 3. Horn/strobes will be provided in egress ways, assembly spaces, open areas, and other large spaces. Strobe only units will be provided in single toilets and conference rooms.
- 4. Manual pull stations will be provided within 5 feet of all exit doors.

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F. Security System:

1. New IP CCTV cameras will be provided in the renovated areas, and in the addition. Exterior 360° camera will be installed on the corners of the new addition to cover the exterior. A new VMS System will be provided to manage the new cameras. Analog to IP converters will be provided to connect existing Analog cameras, and consolidate them into the new VMS System.

The system consists of Computer Service with image software, Computer Monitors, and IP based CCTV Cameras. The head end will be installed in the existing Server Room, and will be rack mounted. The system can be accessed from any PC within the facility or externally via IP address. Each camera can be viewed independently. The Network Video Recorder will store the video for 30 days at 30 IPS

2. The existing access control system is manufactured by Lenel and will be expanded to serve the renovated area and addition.

The system includes door controllers, and proximity readers/keypads. The electrical hardware for each door will be provided by the Door Hardware Contractor. Proximity readers will be located at various locations as shown on the security drawings. The purpose is to only allow access to authorized personnel at all times. Each proximity reader will have a distinctive code to identify the user and a log will be kept in memory. The log within the panel can be accessed through a computer.

G. Lightning Protection System:

- 1. A system of lightning protection will be provided. The system will be installed in compliance with the provisions of the latest "Code for Protection Against Lightning" for buildings as adopted by the National Fire Protection Association and the Underwriters' Laboratories, Inc. for UL Master Label System.
- 2. The lightning protection equipment will include air terminals, conductors, conduits, fasteners, connectors, ground rods, etc.
- 3. The lightning protection system will be installed for the new addition.

3. TESTING REQUIREMENTS

The Electrical Contractor shall provide testing of the following systems with the Owner and Owner's Representative present:

- Lighting and power panels for correct phase balance.
- Emergency generator system.
- Lighting control system (interior and exterior).
- Fire alarm system.
- Security systems.

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Testing reports shall be submitted to the Engineer for review and approval before providing to the Owner.

4. OPERATION MANUALS AND MAINTENANCE MANUALS:

When the project is completed, the Electrical Contractor shall provide operation and maintenance manuals to the Owner.

5. RECORD DRAWINGS AND CONTROL DOCUMENTS:

When the project is completed, an as-built set of drawings, showing all lighting and power requirements from contract and addendum items will be provided to the Owner.

PHASING:

The Electrical Contractor will selectively demolish the renovated areas, and provide temporary feeds as required to maintain power to the Fire Station section of the Building. The Building will be occupied during construction.

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TECHNOLOGY SYSTEMS

NARRATIVE REPORT

The following is the Technology system narrative which defines scope of work, as well as, basis of design for the Public Safety Building Renovation.

- The Technology system design at the Wakefield Public Safety Building is designed with Category 6 cable and intended for 100/1000mbps to the work station. The voice wiring will be capable of VOIP.
- 2. Technology Components:

Installation and integration of multiple technology components are as follows:

- A. Cabling for Voice, Data, and Video Technologies
- B. Data Electronics for LAN/WAN Data Infrastructure (not included as part of scope)
- C. Data Electronics for Internet Access (not included as part of scope)
- D. Data Network Computer Hardware (not included as part of scope)
- E. Data Network Software (not included as part of scope)
- F. Computer Peripherals (not included as part of scope)
- 3. Data System:

The Data system is designed for a Gigabit Ethernet (Category 6 cable) with 100/1000 Base-T connection to the work station. The high speed data transmission will allow users to retrieve data from the internet and local area network almost instantly. The data system has been designed for users to accomplish:

- A. Internet access through a wireless lan and hard wired data drops.
- B. Applications for word processing, spreadsheet, and alike through a central applications server.
- C. Printing of documents from any user computer connected to network printers.
- D. Wireless access for employees at the facility.
- 4. Telephone System:

The Telephone system will utilize Category 6 cable similar to the data system. The infrastructure will be designed to accommodate Voice-Over-IP.

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5. Cable-TV System:

The Cable-TV system will comprise of a coaxial cable drop at each location. The system will be bi-directional type, which allows for both receiving and transmitting broadband signals.



APPENDIX B - MEETING MINUTES



MEETING MINUTES

Town of Wakefield To:

Permanent Building Committee

Joseph Bertrand, Chair

HKT Architects From:

Janet M. Slemenda

Nancy J. Joyce

Subject: Meeting 01: Visioning Date: October 27, 2016

Project: Wakefield Public Safety

Building Study

Job No: 21608

Attending:

Joseph B. Bertrand (JBB) Chair, Permanent Building Committee (PBC)

James Lapery (JL) Permanent Building Committee Permanent Building Committee Jason Cohen (JC)

Philip Crosscup (PC) Permanent Building Committee

Phil Renzi (PR) Permanent Building Committee

Charles Tarbell (CT) Permanent Building Committee

Chris Callanan (CC) Permanent Building Committee

Jerry Hammersley (JH) × Permanent Building Committee

Richard Stinson (RS) Director of Public Works ×

Christopher Pierce (CP) **Buildings Manager**

Richard Smith (CoP RS) Chief of Police

Craig Calabrese (DCoP CC) Deputy Chief of Police

Scott Reboulet (L SR) Lieutenant, Day Shift Operations

Michael Sullivan (FC MS) Fire Chief

Janet M. Slemenda (JMS) HKT Architects, Inc.

Nancy J. Joyce (NJJ) HKT Architects, Inc.

Item

1.01 Janet M. Slemenda (JMS) described the day long programming session that preceded the evening Visioning Session. JMS then presented the process of a Visioning Session and what we hoped to accomplish through the questions and open response portions.

1.02 Question #1: What do you see as the best outcome for this study?

1.03 Community access to Police (face to face) Responses:

Easier public access – hard to find who to help when you enter

A plan that meets the needs of the Town and is able to be implemented



Have a comprehensive game plan + strategy for moving forward Have a good understanding of the options + costs to the solutions of issues

A facility that answers the needs of the departments & Town for the future

Understand the problems in the building both Police and Fire sides

No new addition needed to existing building Additions to current building New building New police station at different location Building somewhere else 4th story for PD

Fix garage
Move dispatch
Redesign lobby
First floor complete rehab
Problems worked out
Mechanical Systems
Building management system

Functional spaces: meeting rooms, roll call, room to grow Needed office space and storage Make current space more useful Functional spaces that address needs Increase efficiency Expansion space Increase space Increase space Change design Improve efficiency

Safe haven space

Improve security

1.04 Question #2: What do you see as the biggest challenge for the study?

1.05 Responses: Poor location

No new station option locations

Site limitations Physical lot space

Lack of current space to work

Space constraints

Figuring out space needs Finding additional space

Spatial confines

Limited options with current building shell

Giving police what is needed in foot print of building

Consensus on what "path" to take

Coming up with a workable strategy and plan

Expectations

Getting agreement on new design

Dealing with everyone

Getting it right

Fixing everything

Newer building – low public support

Town "buy in"

Selling the public on the need to redo a 13 year old building

Getting Town Meeting approval for changes

Rehabbing an old building

\$\$

Town authorizing money for another new station

Money \$\$

Cash

Cost of renovation

Entrance

Safe Haven

Figuring out mechanical solution

Dispatch and equipment utilities

Conflicting needs of police + fire Competition between departments

- 1.06 Question #3: How does the current layout of the building and site impact the two departments located here? If programming needs suggest radical changes to some aspect of the existing facility or land use what would you consider "sacred"? What in your opinion could change?
- 1.07 Responses: Entrance too confusing and aggravates both departments

Front entrance must change

First floor to stay but upgrade

Change police lobby

Move 911 to lobby area

Bring Communications Center to 1st floor Moving Police Dispatch to first floor a must

Police front exterior is sacred

Tower is very sacred

Nothing is sacred

Nothing is sacred

Nothing sacred

No changes are sacred

To make this work nothing should be sacred The side of the building should probably stay

Parking is "sacred", limited already

Community access sacred Keep the Community Room intact Shared Community Room works well

There should be an ability to look at all

No space for police Police side is too small and ineffective Poor lobby Safe haven needs space Make better use of empty space Infrastructure is all on PD side but shared Move utility to attic

No need for PD + FD to be together

No Parking
Parking garage for police needs more room

Location allows PD + FD to reach all parts of Town quickly

Change height of police

Maintain harmony between departments – currently they don't feel equal

Improve security to fire department side of building Building is not safe and does not service the public safely after 3:30pm (lobby)

The holding area works well

- 1.08 Question #4: What are some critical details that you believe we need to know about in order to complete this study to the satisfaction of the End User, Community and Town Officials and Committees?
- 1.09 Responses: Would it be a better choice to move the police to a different site + use the PSB for different municipal purpose

Plan for parking better – can't keep losing public spaces

Is it cost effective?

\$\$ We just built a new middle school, working on H.S.

Not a lot of appetite in Town for higher taxes

Town's people will cry about cost

Some people will focus on costs considering this project is only 13 years old

\$\$\$

Is any improvement to this building feasible?

Add value to the expense i.e. having dispatch will allow community



access to live person

Building shouldn't be a fortress to public

Building access by public is too great on fire side, needs to be tightened up.

The present deficiencies in the building and why

Need for more space and why

Define true need

Community will focus on why this was designed this way rather than

focusing on problems needing fixing

Embarrassment over this "new" building failing, or admitting it

Communicating understanding of issues

Convincing people of actual needs

Lack of support (likely)

Many in Town care about police out on street rather than building issues

Poor location but public will likely want central location

Overhead doors are not rated for the use they are experiencing

HVAC system is not well designed

Town engineers should be present at meetings

Need a fix for at least 20 years

Department needs to grow, especially patrol

1.10 Open Discussion Topics included the following:

Other constraints; perhaps intangible in nature

Other Town efforts underway that may affect or influence the study

Other information about the Town that we should know

Identify Boards + Committees that might want to be involved

Community outreach opportunities

1.11 Responses: Other Town Efforts underway:

High school process has started. Statement of Interest has been

submitted and MSBA staff completed site visit on October 27, 2016. One

of 89 possible projects. Meeting went well.

Walton School feasibility study

Renovation of elementary school (as well as other older schools)

Hockey Rink

DPW Facility

Road conditions, Infrastructure

Other information about the Town that we should know

Debt Service Fund; several projects are due to come off including library,

2 elementary schools, PSB, park and a senior center

Other constraints; perhaps intangible in nature

Safety of visitors, professional staff and detainees is really important.

Explain why are we doing this

Two different Chiefs – two different styles

Define the needs so they can be explained to the Community



Do we have enough space? Can we add to the building by going up or out?

No need for PD to be centrally located in Town. This will need to be explained.

If an option is made for the PD to move off site, it would be critical that another Town department be identified to move into this space (perhaps the DPW administrators). We would need to know the answer to that question in advance in order to make that argument.

People who use window service drive here now – they rarely walk. What about the purchase of land? Or reuse of the Hurd School building?

Identify Boards + Committees that might want to be involved Board of Selectmen

Community outreach opportunities

Show the reality of using this building.

Provide video tour; show on cable television.

Show how lobby is used; describe lack of a Safe Haven.

Be proactive about photography to document conditions.

Describe both the interior and exterior parking arrangements and issues for PD and FD official vehicles, PD and FD personal vehicles, and visitor vehicles.

Show crowded conditions such as roll call, training or meeting.

Describe what the Town wants.

Understand where this project is going. Is it a fix-up of the lobby, is this wasting time? Are we going to go to Town Meeting every year to address needs?

Document that the PD has already outgrown the space and that the site does not support the needs going forward.

Other

Access by staff in Communications offices to detention block requires moving floor to floor and observation via cameras, and will remain that way if Communications is moved to entry level. This is a huge concern over the possibility of a suicide of a detainee, after booking and once settled into cell.

Can a vehicle lift to provide for double deck parking be installed in existing garage?

What is the value of spending money to remove columns in garage if net gain is very small?

What about building operating costs? Is there an opportunity for sustainable features to be added – such as solar thermal, pv?

1.12 Process moving forward:

JMS reported that programming of the PD had progressed well that day and that HKT would begin assembling that data for review by the PPC and PD.

JMS also reported that they had completed a walk-thru of the FD with Captain Pronco but had yet to speak with the Fire Chief Sullivan. A meeting will be scheduled.

HKT will arrange to meet with Chris Peirce to review other documents related to the



	Next Meeting to be held: TBD
1.09	Once meetings are scheduled a revised work-plan will be forwarded to the PBC for review and comment.
	Structural and MEP/FP consultants will be scheduled for a walk-thru. Issues identified by the departments, observed at the programming meetings, and through Town memowill be the basis for their initial work.
	construction of the PSB. HKT would like to have access to the specifications and asbuilt documents.

Please review these minutes and advise HKT Architects of any edits or additions.



MEETING MINUTES

Town of Wakefield To:

Permanent Building Committee

Joseph Bertrand, Chair

HKT Architects From:

Janet M. Slemenda

Nancy J. Joyce

Project: Wakefield Public Safety

Building Study

December 19, 2016

Job No: 21608

Date:

Subject: Meeting 02: Progress Presentation to Permanent Building Committee

Attending:

Joseph B. Bertrand (JBB) Chair, Permanent Building Committee (PBC)

James Lapery (JL)

Jason Cohen (JC)

Philip Crosscup (PC)

Phil Renzi (PR)

Chip (Charles) Tarbell (CT)

Chris Callanan (CC)

Jerry Hammersley (JH)

Lisa Butler (LB) ×

Stephen Maio

Richard Stinson (RS)

× Christopher Pierce (CP)

Richard Smith (CoP RS)

Craig Calabrese (DCoP CC)

× Scott Reboulet (L SR)

Michael Sullivan (FC MS)

Janet M. Slemenda (JMS)

Nancy J. Joyce (NJJ)

Permanent Building Committee

Town Administrator

Director of Public Works

Buildings Manager

Chief of Police

Deputy Chief of Police

Lieutenant, Day Shift Operations

Fire Chief

HKT Architects, Inc.

HKT Architects, Inc.

Item

- Janet M. Slemenda (JMS) recounted the study's progress to date, noting the visioning session and day long Police Department programming, and Fire Department tour that occurred the day of our last meeting. JMS outlined the progress that has occurred since the visioning session meeting:
 - The Structural, Mechanical, Electrical, Plumbing and Fire Protection engineers received the existing Public Safety Building's bid set drawings and specifications, and visited the site to perform their existing conditions surveys.
 - JMS met with Fire Chief Sullivan, to overview the Fire Department and their

- spaces and systems within the Public Safety Building.
- HKT has been working on the programming documents following their meetings with the Police and Fire Departments and prepared a draft for discussion at tonight's meeting.
- 2.02 JMS proceeded to report on the findings within the engineer's existing condition surveys. A detailed overview of the issues highlighted in the reports was discussed. JMS noted that the volume of information would be important background information while the committee is reviewing proposed design options in the future.

A copy of the existing conditions survey reports and the presentation was made available to attendees following the meeting.

- 2.03 Following the presentation of the structural, mechanical, electrical, plumbing and fire protection engineer reports, a discussion of the building systems included:
 - Building Management System (BMS), including concerns that it is currently operated from a remote location.
 - Balancing the existing HVAC system, as it was noted that several areas that are not being serviced properly.
 - A desire to determine if an HVAC intake is potentially located too close to the Fire Department's kitchen hood exhaust.
- 2.04 JMS presented the draft programming documents.

The programming summary was distributed and reviewed. It was noted that this is an uncommon programming summary, due to the relatively new age of the existing building. Columns were provided for 'Existing' (current areas in the Public Safety Building), 'Proposed' (current areas shown in the draft programming sketches) and a 'Delta' column highlighting the differences between the two.

As part of the 'sight blind' programming exercise HKT has assembled room sketches and data sheets for each of the spaces of an ideal Police Department based on the programming meetings with Department staff. The Police Department will now need to review the draft documents and return comments to HKT before they are officially submitted to the PBC.

A copy of the draft programming documents was made available to attendees following the meeting.

- 2.05 Process moving forward:
 - Police Department to review and provide HKT with comments so they can finalize programming phase.
 - HKT to start design option phase and to focus on renovation and addition options of the existing Public Safety Building.

Next Meeting to be held: Planned for Mid-January. Potentially the 23rd or 30th as the 16th is a holiday.

Please review these minutes and advise HKT Architects of any edits or additions.



MEETING MINUTES

To: Town of Wakefield

Permanent Building Committee

Joseph Bertrand, Chair

From: HKT Architects

Janet M. Slemenda

Nancy J. Joyce

Date: January 30, 2017

Project: Wakefield Public Safety

Building Study

Job No: 21608

Subject: Meeting 03: Progress Presentation to Permanent Building Committee

Attending:	\checkmark	Joseph B. Bertrand ((JBB)	Chair, Permanent Building	Committee (PBC)
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James Lapery (JL) Permanent Building Committee Jason Cohen (JC) Permanent Building Committee Philip Crosscup (PC) Permanent Building Committee Phil Renzi (PR) Permanent Building Committee Chip (Charles) Tarbell (CT) Permanent Building Committee Chris Callanan (CC) Permanent Building Committee Jerry Hammersley (JH) Permanent Building Committee Lisa Butler (LB) Permanent Building Committee ×

× Stephen Maio Town Administrator

x Richard Stinson (RS) Director of Public Works

Christopher Pierce (CP)
 Buildings Manager

✓ Richard Smith (CoP RS) Chief of Police

✓ Craig Calabrese (DCoP CC) Deputy Chief of Police

✓ Scott Reboulet (L SR) Lieutenant, Day Shift Operations

× Michael Sullivan (FC MS) Fire Chief

✓ Janet M. Slemenda (JMS) HKT Architects, Inc.

✓ Nancy J. Joyce (NJJ) HKT Architects, Inc.

Item

- 3.01 Janet M. Slemenda (JMS) discussed the agenda for the meeting including options for renovations and additions:
 - Dispatch + Entry Office
 - Officer Support Space
 - Detention Block
 - Additions: Single and Multi-Level
- 3.02 JMS reviewed the options for additions and renovations based on the structural engineering report. The report noted that the most efficient way of obtaining additional

space was to build structurally independent horizontal addition(s) that would comply with the latest building code for new buildings.

Based on that recommendation and the direction of the PBC, HKT created three levels of renovations and additions.

- Minimal Level: Dispatch would relocate to entry level with reuse of second level space
- Mid-Level: Dispatch would relocate to entry level with a reorder of the entry sequence and reuse of second level space
- Significant Level: Possible horizontal additions with two options including a one level addition and a three level addition
- 3.03 Existing operational conditions were described for the various levels of the building including:
 - Entry sequence and citizen interaction: changes throughout the day, it is not immediately obvious how to get help, front lobby is not always manned, after hours help relies on a telephone connection
 - FD entry point is less obvious to visitor
 - Undersized spaces: Locker Rooms, Roll Call, Lunch Room and offices on first level of existing PD
 - Lack of adequate sized meeting rooms
 - No expansion space for offices
 - Limited evidence room space
 - MEPFP and IT space undersized for current needs
 - Sally port not deep enough for police vehicles, no impound bay and no associated storage
- 3.04 JMS explained each option:

Option L-A: Dispatch Only

PD Dispatch moves to current Records/Prosecutors Room and becomes public face. A portion of the existing garage becomes the OIC Office and Toilet Room. The small space beneath the stair is used for OIC storage.

3.05 Option L-B: Relocated and Fire Department Entry

PD Dispatch moves to current Records/Prosecutors Room and becomes public face. A portion of the existing garage becomes the OIC office, Kitchenette and Toilet Room. The small space beneath the stair is enlarged and becomes the Intake/Interview Room.

The FD has a new entry vestibule accessed from outside in the location of the former Intake/Interview Room. Fire Prevention moves to end of corridor and takes over two small office spaces.

3.05 Option L-C: Dispatch, Enlarged Vestibule, Relocated Fire Department Entry

PD Dispatch moves to current Records/Prosecutors Room and becomes public face. A portion of the existing garage becomes the OIC office and Toilet Room. The small space beneath the stair is enlarged and becomes the Intake/Interview Room.



The FD has a new entry accessed from an enlarged vestibule. Fire Prevention moves to end of corridor and takes over two small office spaces.

3.06 Option L-D: Dispatch, Enlarged Vestibule, Relocated Fire Department Entry

PD Dispatch moves to current Lobby area and becomes public face. The small space beneath the stair is becomes a Toilet Room. The Intake/Interview Room and a Conference Room are relocated to the current Records/Prosecutor area. The OIC Office is not accommodated on this level.

The FD has a new entry accessed from an enlarged vestibule. Fire Prevention moves to end of corridor and takes over two small office spaces.

3.07 Option L-E: Dispatch, Enlarged Vestibule, Revised Entry, Internal Stair

PD Dispatch moves to current Records/Prosecutors Room and becomes public face. A Toilet Room is added in the garage area. The small space beneath the stair is enlarged and becomes the OIC office. Part of the lobby becomes the Intake/Interview Room and a stair is added to access the lower level of the PD.

The FD has a new entry accessed from an enlarged vestibule. Fire Prevention moves to end of corridor and takes over two small office spaces.

3.08 Option 1-A: One Level Addition - Aligned Facade

This has a one level 1,055 SF addition on the west side of the building adjacent to the existing original PD that runs from the edge of the building to the current entry.

The space would be accessed from one location, approximately where the current Lunch Room is located. This space would contain an enlarged Roll Call Room (part of existing room included), Lunch Room and a new Female Locker Room. The existing Female Locker Room, along with the small room just south of this room, would become expansion space for the Male Locker Room. Small storage spaces would be added.

3.09 Option 1-B: One Level Addition – Forward Facade

This has a one level 1,270 SF addition on the west side of the building adjacent to the existing original PD that runs from the edge of the building to the current entry.

The space would be accessed from one location, approximately where the current Lunch Room is located. This space would contain an enlarged Roll Call and Lunch Room, a new Male Locker Room, and offices for the OIC and Clinician. The existing Female Locker Room, and the small office just south of this room, would become expansion space for the Male Locker Room. The current Roll Call Room would become the Lunch Room. The existing office space located north of the stair would become the K-9 Office. Small storage spaces would be added.

3.10 Option 1-C: Three Level Addition - First Floor

This scheme includes a three level, 777 SF per floor, addition on the west side of the building adjacent to the existing original PD. The addition does not extend to the edges of the existing PD to lessen the scale on this facade, it is more or less "centered" on the

existing facade.

The first level space would be accessed from one location, approximately where the current Lunch Room is located. This space would contain an enlarged Roll Call and a new Male Locker Room. The existing Female Locker Room, along with the small office just south of this room, would enlarge this space. The current Roll Call Room would become the Lunch Room. The existing office space located north of the stair would become the K-9 Office.

2-E: Three Level Addition – Second Floor

The second level space would be accessed from one location, approximately where the original entry (now administrator space) is located. This space would contain administrative offices for Deputy Chief and three Lieutenants. A larger conference room, the Prosecutor's Office and Records Office will take over the area currently used for Dispatch and OIC. One toilet and kitchenette would be demolished. Specialty Service and Clinician offices will occupy the space currently used to house administrative staff.

2-F: Three Level Addition – Second Floor

A second scheme for the second level space would be accessed from one location, approximately where the original entry (now administrator space) is located. This space would contain administrative offices for Deputy Chief and three Lieutenants. A larger Conference Room, the Prosecutor's Office and Records office will take over the area currently used for Dispatch and OIC. One toilet and kitchenette would be demolished. Specialty Service will occupy an expanded area where the current Conference Room is located. The administrators and another office, copy and storage will occupy the area where administrator offices are currently located.

3-B: Three Level Addition – Third Floor

The third level space would be accessed from two locations, where windows are located. This space would contain the Detective's Office and Family Service offices. The current Detective's Office will become a small Conference Room for detectives, storage, a small kitchenette and an evidence processing space.

3.11 Option 2-A: Second Floor Renovations

Once Dispatch moves to the entry level, their second floor space would be converted to a Conference Room and Records area. The current OIC office would become the Prosecutors Office. One toilet and kitchenette would be demolished. The Deputy Chief would move to an enlarged office currently occupied by the Administrator, who would move to the current Conference Room. This provides for one additional office for a future Lieutenant.

3.12 Option 2-B: Second Floor Renovations

Once Dispatch moves to the entry level, their second floor space would be converted to the Conference Room, Prosecutor Office, and Records area. One toilet and kitchenette would be demolished. The Deputy Chief would move to an enlarged office currently occupied by the Administrator, who would move to the current Conference Room. This provides for one additional office for a future Lieutenant.

3.13 Option 2-C: Second Floor Renovations

Once Dispatch moves to the entry level, their second floor space would be converted to a Prosecutor Office, Records area, and offices for the Clinician and second Administrator. One toilet and kitchenette would be demolished. The Deputy Chief would move to an enlarged office currently occupied by the Administrator, who would move to the current Conference Room. This provides for one additional office for a future Lieutenant. There is no Conference Room on this level.

3.14 Option 2-D: Second Floor Renovations

Once Dispatch moves to the entry level, their second floor space would be converted to a Conference Room and Records area. The current OIC office would become the Prosecutors or Clinician Office. One toilet and kitchenette would be demolished. The Deputy Chief would move to an enlarged office currently occupied by the Administrator, who would move to the current Conference Room. This provides for one additional office for a future Lieutenant.

3.15 Option D-A: Detention - Deeper Sally Port

This option involves the removal of one cell and associated corridor to provide more space at the rear of the garage. The columns do not allow for better movement in the space but the added space does create a place to move around the vehicles. The Booking area is also made smaller. Spaces directly adjacent to this zone have some changes to allow for a better Armory and Building Systems rooms.

3.16 Option D-B: Detention - More Storage off Sally Port

This option involves the removal of two cells and associated corridor to provide more space on one side of the garage for Bulk Evidence and Recovered Property storage. The Booking area is also made smaller and spaces are reconfigured to allow for better support areas. Spaces directly adjacent to this zone have some changes to allow for a better Armory and Building Systems rooms.

3.17 Option D-C: Detention - More Storage off Sally Port

This option involves the removal of two cells and associated corridor to provide more space on one side and the rear of the garage for Bulk Evidence and found property storage. The Booking area is also made smaller. Spaces directly adjacent to this zone have some changes to allow for a better Armory and Building Systems rooms.

3.18 Option D-D: Detention - Deeper and Wider Sally Port

This option involves the removal of three cells and associated corridor to provide more space on one side of the garage for Bulk Evidence and Found Property storage and at the rear for more vehicle space. The columns do not allow for better movement in the space but the added space does create a place to move around the vehicles. The Booking area is also made smaller. Spaces directly adjacent to this zone have some changes to allow for a better Armory and Building Systems rooms. A portion of FD support space has been taken for an additional cell or Interview Room.

3.19 Option 3A: Third Floor Renovation

Underutilized rooms to be repurposed for Family Services or Clinician Offices.



3.20 Option FD-A: Third Floor – Additional PD Storage

Additional PD storage to be located in current FD storage. FD storage moved to unoccupied lieutenant room or off of apparatus bay.

3.21 Comments by Committee:

- The idea of separating the entries for the PD and FD was viewed positively. The plans, as presented, show how that separation can be located where the current Intake/interview Room is currently located.
- Members asked what could happen if the toilet rooms were relocated. JMS responded that moving toilets was not considered during this round of options but could be in the next.
- Lobby, as is, is too large and filling it in with appropriate operational spaces is good.
- Sally Port enlargement: Due to the complexity of enlarging this area (columns, adjacent spaces such as electrical room and cell block, and the transformer location) it was suggested that perhaps an addition out the east side of the building would best serve this need.

3.22 Comments by End Users:

- Chief Smith (CoP RS) felt that the Records area should be located on the entry level
- Records might be relocated off of the lobby but would require some sort of a "teller" window arrangement in the area.
- The location of the Prosecutor could remain with Records or relocated perhaps with the Detectives.
- Could Detectives, Prosecutors and Records work together?
- It was noted that the Dispatchers were concerned about becoming the face of the department.
- The location of the OIC, shown either inboard or on the first level of the original PD, was that it should remain with the Dispatch Center.
- The program included 2 Administration support personnel. They do not need separate spaces but can be co-located in a shared space.
- CoP RS felt that the entire senior administrator staff might work better if relocated to the third level.
- Evidence could be relocated down to second floor.
- Booking: Need to keep an interview room within this zone for attorney meetings.

3.23 Next steps:

- Explore maximum addition on west side of building i.e. three story addition from end of building to current entry location.
- A flat roof building that reflects the current architecture of the existing building, would be the appropriate way to start.
- Create new entry point on west side of building.
- Move entry to FD.
- Relocating lobby toilets should be considered if this will help circulation.
- Consider Sally Port addition to street.

Next Meeting: This meeting will be for end users and the Sub-Committee of the PBC.

Please review these minutes and advise HKT Architects of any edits or additions.



MEETING MINUTES

To: Town of Wakefield

Permanent Building Committee

Joseph Bertrand, Chair

From: HKT Architects

Janet M. Slemenda

Nancy J. Joyce

Date: March 15, 2017

Project: Wakefield Public Safety

Building Study

Job No: 21608

Subject: Meeting 04: Progress Presentation to Working Group Sub-Committee of the

Permanent Building Committee

Attending: ✓	Joseph B. Bertrand (JBB)	Chair, Permanent Building Committee (PBC)
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James Lapery (JL) Permanent Building Committee Jason Cohen (JC) Permanent Building Committee × Philip Crosscup (PC) Permanent Building Committee Phil Renzi (PR) Permanent Building Committee Chip (Charles) Tarbell (CT) Permanent Building Committee Chris Callanan (CC) Permanent Building Committee X Jerry Hammersley (JH) Permanent Building Committee × Lisa Butler (LB) Permanent Building Committee ×

x Stephen Maio Town Administrator

x Richard Stinson (RS) Director of Public Works

× Christopher Pierce (CP) Buildings Manager

Richard Smith (CoP RS) Chief of Police

✓ Craig Calabrese (DCoP CC) Deputy Chief of Police

✓ Scott Reboulet (L SR) Lieutenant, Day Shift Operations

✓ Micharel Sullivan (FC MS) Fire Chief

✓ Janet M. Slemenda (JMS)✓ HKT Architects, Inc.✓ Nancy J. Joyce (NJJ)HKT Architects, Inc.

Item

4.01 Janet M. Slemenda (JMS) discussed the agenda for the meeting including:

- 2 Options with Revised Entry, 3 levels of Additions on west side, and Sally Port addition on east side
- 3D Images to explain changes to elevations

4.02 Nancy Joyce (NJJ) reviewed the options for additions and renovations. As previously recorded, the structural engineering report noted the most efficient way of obtaining additional space was to build structurally independent horizontal addition(s) that would

comply with the latest building code for new buildings. At the previous meeting the Committee had directed HKT to work with the largest addition on the west side of the building adjacent to the existing original PD that runs from the edge of the building to the current entry and an addition on the west side at the sally port.

4.03 NJJ explained each option:

Option 1: Floor 1

Main public entry moves south of its existing location and the current entry way is built out. Immediately adjacent to the vestibule, which is located outside the current footprint, is a public corridor with transaction counters for the three major groups that interact with the public. PD Dispatch moves to current Records/Prosecutors Room and becomes the public face of PD. A new transaction window for FD and Records are located on the north and south sides of this entry corridor along with public toilets.

The new FD transaction counter is easily accessed and no longer requires a visitor to walk through the entire lobby and then pass through a door. Fire Prevention is relocated to office space at the end of the FD corridor near Stair 4 and the Administration office is enlarged to accommodate workspace, files, copiers and other office equipment.

The public interview room is located behind a locked door as is the OIC office space. The toilet room for Dispatch is located in the Garage and the Bike Storage Room has been enclosed.

The First Floor of the original PD will continue to house toilet and locker rooms for the PD in expanded space to allow for current and future staff. The addition will contain the Evidence rooms and an Evidence processing area.

4.04 Comments by Sub-Committee on Option1: Floor 1:

- PD: Location of IOC should be with Dispatch. OIC spends more time in Dispatch working and should be able to immediately answer a call, and the distance between these is a concern. Could OIC and Interview be flipped?
- PD: It would be preferable to move the Interview Room outside the lock-down area.
- PD: How is Records Officer called? It appears the transaction window is unmanned. Records should be in a more important location. HKT did mention that there are competing elements in a limited space and there may need to be compromise or a change to operations.
- PD: Dispatch location is good.
- PD: Evidence in the basement is the best location. Moving patrol functions off of that floor is very good.
- FD: Transaction counter is good and the enlarged administrative area is good.
- FD: The removal of the wall between offices in order to relocate Fire Prevention at the end of the corridor is of concern. How will the functions in those rooms be accommodated?
- FD: Voiced concern about losing archive room.
- Committee Member: Shared concern about Records counter.
- Committee Member: Like that the Evidence does not require windows.

4.05 Option 2: Floor 1

Main public entry moves south of its existing location and the current entry way is built out. Immediately adjacent to the vestibule, which is located outside the current footprint, is a public corridor with transaction counters for the three major groups that interact with the public. PD Dispatch moves to the current entry/lobby area and becomes public face of PD. Adjacent to this room, and in the entry/lobby area, is the Records room with a separate transaction counter. A new transaction window for FD is located on the south side of this entry corridor. The OIC, Interview Room and public toilets are located in the former Records/Prosecutor Room.

The new FD transaction counter is easily accessed and no longer requires a visitor to walk through the entire lobby and then pass through a door. Fire Prevention is relocated to office space at the end of the FD corridor near Stair 4 and the Administration office is enlarged to accommodate workspace, files, copiers and other office equipment.

The public interview room is located off the public corridor at the end of the hallway as is the OIC office space. The Bike Storage Room has been enclosed.

The First Floor of the original PD will continue to house toilet and locker rooms for the PD, Report Writing, a larger Lunchroom and the existing Women's Locker Room will be changed to accommodate Men. The addition will contain the Roll Call Room, Storage, and a new Women's Locker Room.

4.06 Comments by Sub-Committee on Option 2: Floor 1:

- PD: Location of IOC should be with Dispatch. OIC spends more time in Dispatch working and should be able to immediately answer a call, and the distance between these is a concern.
- PD: Records and Prosecutor area appears too narrow to work well although program does fit.
- PD: How is Records Officer called? It appears the transaction window is unmanned.
- PD: Dispatch area with exterior windows is of concern. Will people be able to see screens? HKT responded that Dispatch Rooms with windows can be a very positive experience and that the windows can be treated with obscure or frit glazing. Windows can also be bullet resistant.
- FD: Transaction counter is good and the enlarged administrative area is good.
- FD: The removal of the wall between offices in order to relocate Fire Prevention at the end of the corridor is of concern. How will the functions in those rooms be accommodated?
- FD: Voiced concern about losing archive room.
- Committee Member: Overall concerns of Records and Dispatch sharing the infill area
- Committee Member: Public toilets are better located.

4.07 Option 1: Floor 2

In the area currently occupied by Dispatch and the OIC, a larger Roll Call and Lunch Room, and Patrol Storage and Janitors Closet have been located. In the area currently housing the Chief and Conference Room as well as all other administrative offices, the Detective Sergeant, Detective Interview Room, Detective Storage and Lab have been located. Report Writing fills out that area. The addition houses a shared office for the 5 detectives and 2 offices for Family Services.

In the Detention area, the east wall at the sally port was extended by approximately 10 feet to allow for more room in the sally port. Though columns restrict movement and layout, the increased depth does allow more movement around the vehicles. There is a possibility of providing a separation between bays so one can be used as an impound bay. One cell was removed, and along with the corridor outside of it, storage was added to this vehicle area. The Armory door leading into the Impound bay were blocked in so that this area could be more secure and better organized. PD parking outside was rearranged and exits directly onto the street. The apron in front of the doors is reduced.

4.08 Comments by Sub-Committee on Option1: Floor 2:

- PD: Location of Roll Call, Lunch Room and Report Writing, out of the "basement" and into better sized spaces is very good.
- PD: Detectives area appears to meet needs. Lab should stay with detectives.
- PD: Family Services are two offices needed? Program owned two department to reconsider. Location is fine.
- PD: Clinician works with Family Service personnel. Perhaps those two are colocated.
- PD: Sally port extension seems good. Parking may be difficult because of sight lines.
- Committee: Can dumpster be moved?

4.09 Option 2: Floor 2

In the area currently occupied by Dispatch and the OIC, a large Conference Room, Sergeants shared office and Clinician Office have been located. In the area currently housing the Chief and Conference Room as well as all other administrative offices, the Detective Sergeant, Detective Interview Room, and Detective Storage have been located. School Resources and either an IT Room/Radio Room or Lab can be located in the reminder of this space. The addition houses a shared office for the 5 detectives and 2 offices for Family Services.

In the Detention area, the east wall at the sally port was extended by approximately 24 feet to allow for parking more vehicles in the sally port. Columns restrict movement and layout, but the increased depth allows parking for 4 vehicles and more movement around the vehicles. There is a possibility of providing a separation between bays so one can be used as an impound bay. One cell was removed, and along with the corridor outside of it, storage was added to this area. The Armory door leading into the Impound bay were blocked in so that this area could be more secure and better organized. PD and FD parking outside was rearranged and exits directly onto the street. The apron in front of the doors is gone in this option

4.10 Comments by Sub-Committee on Option 2: Floor 2:

- PD: Conference Room seems good but needs to be larger target 15 persons.
- PD: School Resource office reconsidering the need to have this dedicated space. Their needs might be met in some other locations such as report writing or might be much smaller.

- PD: Detectives area appears to meet needs.
- PD: Family Services are two offices needed? Program owned two department to reconsider.
- PD: Sally port extension is too big though the concept is good. Parking may be difficult because of sight lines. Loss of street parking should also be considered.
- Committee: Can parking spaces be rotated to maintain parking on street?

4.11 Option 1: Floor 3

In the area currently occupied by Evidence the Clinician and School Resource offices are located. In the area currently occupied by the detectives and lab the Deputy Chief, Conference Room and an office for the Sergeants are located. The addition will house the Chief, Administrative Assistants and the Lieutenants. The FD storage, located in the part of the building located between the two departments, would be relocated to an unused bedroom on south side of the floor.

- 4.12 Comments by Sub-Committee on Option1: Floor 3:
 - PD: Location of Administrative offices is very good.
 - PD: School Resource office reconsidering the need to have this dedicated space. Their needs might be met in some other locations such as report writing or might be much smaller.
 - PD: Sergeants need to work space and file storage 12 lateral file drawers.
 - FD: Loss of/ relocation of storage space is unacceptable to department.

4.13 Option 2: Floor 3

In this option, Evidence remains in its current location. Area directly adjacent might be added depending on needs. In the area currently occupied by the detectives and lab the Chief's Conference Room and an office for the Administrative Assistants will be located. The addition will house the Chief, the other Administrative Assistant and the Lieutenants. There are several areas currently unassigned which could house the Lab, IT or Storage.

PD also expands storage into FD storage near elevator. The FD storage, located in the part of the building located between the two departments, would be relocated to an unused bedroom on south side of the floor.

- 4.14 Comments by Sub-Committee on Option 2: Floor 3:
 - PD: Location of Administrative offices is very good.
 - PD: Evidence could stay. Lab should be relocated with Detectives.
 - FD: Loss of/ relocation of storage space is unacceptable to department.
- 4.15 NJJ presented the 3D images of the addition which included both the changes to the front entry and the options for the sally port addition. The additions would be structurally independent and would have flat roofs. Masonry opening would match the character and locations of the other openings. Joe Bertran (JB) asked if the existing limestone band which says "Police" and the decorate panels could be incorporated into the elevation.

Images included:

- Simple one story addition for new entry with infill at curved entry. Window pattern and materials to be carried along to match existing. HKT suggested simple "glass vestibule" with small canopy and new building lettering. Parking count remains the same.
- Screening Options: Along with this simple vestibule addition HKT felt that providing some sort of vertical element will help draw the eye to the new entry which does compete with the much larger existing curved element. Options included "fins", flat panels or a more sculptural shape made of perforated metal products that would remain transparent or could be backlit in the nighttime. Various images were shown of similar installations.
- A second option would be a more pronounced support of the canopy tied back to the original masonry.
- Options were shown for the Sally Port area and everyone agreed that the smaller addition was much better.

4.16 Overall Comments by Sub-Committee and End Users:

- One new suggestion was made to move the Community Room to the location of the current entry and locate all of the PD needs in that space. This would move a more public area to the front of the building in a somewhat "special" shape – the curve.
- There were a lot of questions and concerns related to this. What are the cost implications, could the room be as big as it is now (49 persons at tables with presentation area), could the floor be tiered (some like the tiers some think that a flat level is ultimately more useable)? Chief Sullivan (FC MS) is not in favor of moving this room. Phil Renzi (PR) asked what would be the benefit of moving this room.
- HKT will review this as an option.
- The PD, as well as Committee members, preferred the option that moved the Evidence to the first level.
- PD staff preferred moving Roll Call, the Lunchroom and Report Writing onto the second floor and out of the basement.
- The entry option that moved the Dispatch into the Records Room was preferred with modifications.
- 4.17 The PD and FD will continue to review the plans and will notify HKT of comments.
- 4.18 Following the meeting, Chip Tarbell (CT), Chief Sullivan (FC MS) and NJJ and JMS reviewed all the FD changes in the actual spaces. The following observations and comments were made:
 - The location of the transaction counter does appear to work.
 - The Fire Prevention move to the south end of the corridor will work without removing the partition between the two end spaces.
 - The other smaller office can then be used for Fire Training or a future Deputy Chief.
 - Memorabilia will be relocated and be placed on view in display cabinets and along the inside corridor.
 - The administrative area is significantly increased and can be completely reorganized to accommodate all their needs.
 - FC MS was concerned about the disruption to their workspace during construction



4.19 Next steps:

- Explore the option of moving the Community Room.
- Fine tune the preferred option based on comments and any future items noted by the departments. The PD Dispatch located directly ahead (Records Area) seemed best for public access.
- Present final option at the next meeting to the Sub-Committee.
- Following that, gather supporting information from engineers, and complete the estimate complete for presentation to the entire Committee.

Next Meeting: This meeting will be for end users and the Sub-Committee of the PBC. The meeting is scheduled for April 12, 2017 at 4:00pm in the Public Safety Building public meeting room.

Please review these minutes and advise HKT Architects of any edits or additions.



MEETING MINUTES

To: Town of Wakefield

Permanent Building Committee

Joseph Bertrand, Chair

From: HKT Architects

Janet M. Slemenda

Nancy J. Joyce

Project: Wakefield Public Safety

April 12, 2017

Building Study

Job No: 21608

Date:

Subject: Meeting 05: Progress Presentation to Working Group Sub-Committee of the

Permanent Building Committee

Attending: ✓ Joseph B. Bertrand (JBB) Chair, Permanent Building Committee (PBC)

✓ James Lapery (JL)

Permanent Building Committee

x Chris Callanan (CC)x Jerry Hammersley (JH)Permanent Building Committee

× Lisa Butler (LB)× Stephen MaioPermanent Building Committee× Town Administrator

× Richard Stinson (RS) Director of Public Works

× Christopher Pierce (CP) Buildings Manager

✓ Richard Smith (CoP RS) Chief of Police

✓ Craig Calabrese (DCoP CC) Deputy Chief of Police

✓ Scott Reboulet (L SR)
 ✓ Steven Skory (L SS)
 Lieutenant, Day Shift Operations
 ✓ Lieutenant, Night Shift Operations

✓ Michael Sullivan (FC MS) Fire Chief

✓ Janet M. Slemenda (JMS) HKT Architects, Inc. ✓ Nancy J. Joyce (NJJ) HKT Architects, Inc.

Item

5.01 Janet M. Slemenda (JMS) discussed the agenda for the meeting including:

- Review of preferred option based meetings on March 15, 2017 with subcommittee and with end users on April 5, 2017.
- Review of new options for entry sequence
- Next steps

5.02 Nancy Joyce (NJJ) reviewed the preferred option for additions and renovations. This

included the largest addition on the west side of the building adjacent to the existing original PD that runs from the edge of the building to the current entry and the smaller addition on the west side at the sally port.

5.03 NJJ explained the option:

Option 1 Revised: Floor 1

Main public entry moves south of its existing location and the current entry way is built out. Immediately adjacent to the vestibule, which is located outside the current footprint, is a public corridor with transaction counters for the three major groups that interact with the public. PD Dispatch moves to current Records/Prosecutors Room and becomes the public face of PD. A new transaction window for FD and Records are located on the north and south sides of this entry corridor along with public toilets.

The new FD transaction counter is easily accessed and no longer requires a visitor to walk through the entire lobby and then pass through a door. Fire Prevention is relocated to office space at the end of the FD corridor near Stair 4 and the Administration office is enlarged to accommodate workspace, files, copiers and other office equipment. Directly outside the Administration public offices are areas for display of memorabilia.

The Interview and Firearm Licensing Rooms are located off the lobby corridor in the area currently used by the Firearms License Officer and lobby.

The OIC office and toilet room for Dispatch are located in the Garage area with the remaining area, which was the Bike Storage Room, enclosed.

The First Floor of the original PD will continue to house toilet and locker rooms for the PD in expanded space to allow for current and future staff. A janitor's closet has been added. The K-9 office is located in the small office in the northeast corner adjacent to the stair. An Evidence processing area will be located outside door to Evidence.

The addition will contain the Evidence Rooms.

5.04 Comments by Sub-Committee on Option 1 Revised: Floor 1:

- PD: The count of lockers, existing and added were discussed. The issue was what would be the total locker count be if the locker size was enlarged and if lockers located in less desirable area of the existing Men's Locker Room could be converted to closets, with doors located off of the corridor. PD asked if one closet (versus 3 shown dotted in plan) could be included in estimate.
- Committee Member: Asked whether you could get from the Records, Interview of Fire Arms Licensing Rooms without going through a public corridor and into existing stair. Concern was an emergency situation. PD had asked for Firearms and Interview Rooms be located off of lobby but reconsidered based on this concern. It was decided that a wall and door would be located off of lobby to separate these areas from lobby. Door could be kept open if they decided that was the best way to operate.

5.05 Option 1 Revised: Floor 2

In the area currently occupied by Dispatch and the OIC, a larger Roll Call and Lunch

Room, General Storage and Janitors Closet have been located. In the area currently housing the Chief and Conference Room as well as all other administrative offices, the Detective Sergeant, Detective Interview Room, Detective Storage and Lab have been located. Report Writing fills out that area. The toilet room that was located off of the Chief's office has been removed is now the Detective Storage Room. A Patrol Storage Room has been located off of the corridor opposite Roll Call and the Lunch Room.

The addition houses a shared office for the 5 detectives and 3 offices for Family Services and the Clinician.

In the Detention area, the east wall at the sally port was extended by approximately 10 feet to allow for more room in the sally port. Though columns restrict movement and layout, the increased depth does allow more movement around the vehicles. There is a possibility of providing a separation between bays so one can be used as an impound bay. One cell was removed, and along with the corridor outside of it, storage was added to this vehicle area. The Armory door leading into the Impound bay were blocked in so that this area could be more secure and better organized. PD parking outside was rearranged and exits directly onto the street. The apron in front of the doors is reduced.

- 5.06 Comments by Sub-Committee on Option 1 Revised: Floor 2:
 - PD: The area that will now accommodate the slightly smaller Family Services and Clinician offices is good, especially that each office will include a window.
 - PD/Committee: Sally port extension is good. Location of dumpster is still something that will need to be resolved. Perhaps the curb cut will need to be extended to facilitate that process. A telephone pole is located on that corner and should be considered.
- 5.07 Option 1 Revised: Floor 3

In the area currently occupied by Evidence the Sergeants Office, Active Storage and one Office for either School Resource Officers or another administrative function will be located. The Radio Room will remain as is. In the area currently occupied by the detectives and lab the Deputy Chief, Conference Room and a Storage Room will be located. The addition will house the Chief, Administrative Assistants and the Lieutenants. A Kitchenette will be located of off the corridor.

- 5.08 Comments by Sub-Committee on Option 1 Revised: Floor 3:
 - PD: Larger conference table should work.
- 5.09 NJJ explained the three new options for the entry sequence. These all involved relocating a non-tiered Community Room to the area currently occupied by the entry and keeping the new proposed entry in the location shown in Option 1 Revised.

In all cases the proposed FD entry sequence is not affected by the relocation of the Community Room and the triangular storage room for the FD is removed to "square off" the new space. That storage is relocated to the area currently occupied by the Projector Room, Storage Room and egress corridor.

Option 1A:

Community Room is relocated from curved wall extension at former entry to face of lobby wall and provides for 35 persons at tables and chairs. There is one column that will be located within the space, obstructing some viewers. There are two storage rooms adjacent to this space and could be used as a control room and for storage of tables and chairs.

Immediately adjacent to the entry vestibule is the public corridor with transaction counters for the three major groups that interact with the public. PD Dispatch and Records move into the area currently housing the Community Room and a portion of the Records Room. In the area adjacent to the stair/elevator, where the current Records Room is located, will be Firearms Licensing and the Interview Room.

Public toilets are located on the north wall of the entry corridor.

There is no construction shown in the garage area although the triangular room could be enclosed in walls.

5.10 Option 1B:

Community Room is relocated from curved wall extension at former entry to face of lobby wall and provides for 49 persons at tables and chairs. There are two columns that will be located within the space, obstructing views. There is one storage room adjacent to this space and could be used as a control room and for storage of tables and chairs.

Immediately adjacent to the entry vestibule is the public corridor with transaction counters for two major groups that interact with the public. PD Dispatch and Records move into the area currently housing the Community Room and the Records Room. The transaction counter for Records is moved down the corridor from the Dispatch window and is not immediately visible upon entry.

Along that corridor, opposite Records, will be Firearms Licensing, the Interview Room and two public toilets.

Construction in the garage area includes Toilet and OIC Office accessible from Dispatch and a small enclosed storage off of garage.

5.11 Option 1C

Community Room is relocated from curved wall extension at former entry to free standing column location in lobby and provides for 30 persons at tables and chairs. There is one column that will be located within the space in the rear of the room, obstructing some viewers. There is no storage rooms adjacent to this space.

Storage for tables and chairs would be located in the enclosed triangular space in the garage.

Immediately adjacent to the vestibule, which is located outside the current footprint, is the public corridor with transaction counters for the three major groups that interact with the public. PD Dispatch and Records move into the area currently housing the

Community Room and Records Room. In the area adjacent to the stair/elevator and where the current Records Room is located will be the Interview Room. Firearms Licensing will be located in the corridor off the lobby along with the public toilets.

- 5.12 Comments by Sub-Committee on new entry sequences:
 - PD/Committee: the Community Rooms, with reduced counts of tables and chairs, are too small. Only one room matches the existing chair count.
 - PD/Committee: Column obstruction in the spaces are difficult. The only column located in the rear of a room has the smallest chair count at 30 persons.
 - PD/Committee: Most members thought the tier layout is better and that the area located in the front of the space is large enough for training needs. That the proposed new plan is a flat floor with moveable tables and chairs was debated.
 - PD/Committee: Plans for other spaces seem to work well. Questions was asked
 if all square footages for individual spaces are the same. General answer is that
 each space accommodates the program but each configuration is different and
 yields different square foot totals.
 - PD/Committee: The original option appears to most meet the needs and expectations given the limitations of the columns and the physical space available. Members noted that the Dispatch location, directly opposite the entry, is very important and the transaction windows for the FD and Records are also well located.
- 5.13 Phasing: Discussion focused on how this project could be built so as not to restrict use of the space by the departments and the public and how this may affect the estimate.
 - Joe Bertrand (JBB): Initially felt that there would be multiple phases over years. Phase 1 would be entry floor, Phase 2 would be the addition, and Phase 3 would be the addition at Detention. JBB felt that the public might not be willing to fund the entire project all at once.
 - Chip Tarbell (CT) felt that there should be only two phases: Phase 1 is entry and addition, Phase 2 is Detention addition.
 - Discussion focused on the challenges of explaining the options and the need and what would be the implication of spreading costs out given escalation.
 - Cost of housing PD off site in trailers or in rental property were considered. The use of the Community Room in all cases might need to be restricted once public toilets are removed and the entry is restricted. That space also might be used to house Records or other administrative functions.
 - HKT will look at multiple scenarios.
- 5.14 Cost Estimate: Depending on scenarios for construction HKT will instruct estimator to split the Detention area as a separate project and perhaps indicate the cost of completing just the Entry floor area.
- 5.15 Next steps:
 - Prepare option for work by estimator. This will include narratives from structural and MEP/FP Engineers.
 - Present preferred option at the next meeting of the full Building Committee.
 - Present option and cost estimate at another full Committee Meeting.

Next Meeting: The next meeting will be a full Building Committee and is scheduled



for May 9, 2017 at 7:00pm at Town Hall.

Please review these minutes and advise HKT Architects of any edits or additions.



MEETING MINUTES

To: Town of Wakefield

Permanent Building Committee

Joseph Bertrand, Chair

From: HKT Architects

Janet M. Slemenda

Nancy J. Joyce

Project: Wakefield Public Safety Building Study

May 11, 2017

Job No: 21608

Date:

Subject: Meeting 06: Progress Presentation to Full Committee of the

Permanent Building Committee

Attending: ✓	Joseph B. Bertrand (JBB)	Chair, Permanent Building Committee	(PBC)
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James Lapery (JL) Permanent Building Committee Jason Cohen (JC) Permanent Building Committee Philip Crosscup (PC) Permanent Building Committee Phil Renzi (PR) Permanent Building Committee Chip (Charles) Tarbell (CT) Permanent Building Committee Chris Callanan (CC) Permanent Building Committee Jerry Hammersley (JH) Permanent Building Committee Lisa Butler (LB) Permanent Building Committee George Brook (GB) Permanent Building Committee Janine Fabiano (JF) Permanent Building Committee Tim Demers (TD) Permanent Building Committee

x Stephen Maio Town Administrator

x Richard Stinson (RS) Director of Public Works

x Christopher Pierce (CP) Buildings Manager

✓ Richard Smith (CoP RS) Chief of Police

✓ Craig Calabrese (DCoP CC) Deputy Chief of Police

Scott Reboulet (L SR)Lieutenant, Day Shift OperationsSteven Skory (L SS)Lieutenant, Night Shift Operations

× Michael Sullivan (FC MS) Fire Chief

✓ Janet M. Slemenda (JMS) HKT Architects, Inc.

Nancy J. Joyce (NJJ) HKT Architects, Inc.

Item

6.01 Janet M. Slemenda (JMS) discussed the agenda for HKT's presentation including:

Review of preferred option: Renovations and Additions

- Total Project Costs
- Next steps
- 6.02 Nancy Joyce (NJJ) reviewed the preferred option for additions and renovations that was agreed upon by the end users and sub-committee. This included the largest addition on the west side of the building adjacent to the existing original 1950s Police Department (PD) that runs from the edge of the building to the current entry, a very small addition for a new entry vestibule, and a small addition on the west side at the sally port.

This option moves the public entry south of its existing location and creates transaction counters for the three major groups that interact with the public in a reconfigured Lobby. The Fire Department (FD) work involves the entry sequence, which will provide appropriate transaction workspace on the main public corridor/lobby. The PD Dispatch will now be located on the entry level along with PD Records. Dispatch will be positioned to be visible as one enters the lobby.

The addition on the west side will contain reorganized program spaces for the PD on all levels. The first floor will house evidence and support space for PD personnel. The second floor will house detectives, roll call, lunchroom, family services and the clinician. The third floor will house all administrative functions and the sergeants' office.

6.03 Questions from Committee on preferred option:

- Does the proposed plan meet the needs of the PD for the future? Richard Smith (CoP RS) and Craig Calabrese (DCoP CC) both replied that 90% of the needs of the department are accounted for in the proposed plan. There are sufficient offices for personnel, lockers for current and future patrol, meeting spaces that are large enough, and most importantly the dispatch will be located in the right location. The only item that could not be met was the desire to remove columns from the interior PD parking area to create more spaces and to limit the amount of damage to PD vehicles done by the location of the columns. The size of current police vehicles is larger than what was used during the previous design process. Staff exterior site parking will remain an issue at the existing Public Safety Building due to its location in Town and limit parking options.
- (CoP RS) felt that with the relocation of the dispatch to the main entry, they have met the goal of providing a sense of safety for visitors who currently have no person to meet them or help them immediately upon entering the station.
- (CoP RS) also felt that the relocation and expansion of the evidence area is needed to provide appropriate management for this vital function. The room and procedure space will improve issues related to chain of custody concerns.
- (CoP RS) noted that the cell block Sally Port area will benefit from the increased depth and reconfiguration of this area.
- (CoP RS) noted that these three areas are all have potential liability issues and anything that can be done to reduce exposure in courts will benefit the entire community.
- Chris Callanan (CC) asked Chief Smith if there were any other PD trends that might need to be accommodated and if he felt this plan could accommodate them. (CoP RS) felt that they were a bit ahead of that curve and noted the increase in work that is done in the family and social services realm. He said that the positions in family services and the clinician help mesh with schools, youth, opioid/health care and family issues that the PD deals with regularly. He

- noted that they are open 24/7. He felt that the new plan would accommodate those needs.
- Philip Crosscup (PC) asked if there should be a review of the entire concept of keeping the PD and FD at the existing location given the limitations of the site. (PC) mentioned giving the entire building to the PD and moving the FD to another site in Town. Members of the Committee were concerned about the availability of sites and the cost to build a new building. JMS noted that if the Town is considering moving departments, traditionally municipalities locate Fire Departments to provide ideal response times and while Police Department locations are more flexible.
- 6.04 HKT briefly discussed the potential phasing of the project. Four phasing option descriptions had been sent to the sub-group to select from, prior to the estimate being started. The option selected was to build out the new entry, dispatch and records areas and begin the superstructure work on the addition(s).

Once the entry level is complete dispatch would move into their final location as well as records and the FD transaction area. At that time the remainder of the PD, that currently occupies the original PD structure, would move off site. Detention and the FD would remain on site throughout.

6.05 Janet M. Slemenda (JMS) explained the Estimated Probable Costs spreadsheets. The three column organization includes a budget for bidding in 2018 as well as bidding in 2019 and 2020. An escalation of 4% per year was assumed.

The Estimated Hard Construction Costs were provided by the independent professional cost estimator and were based on plans, elevations, sections and narratives of structure and building systems. Also part of the estimate were the possible sequencing/phasing that would be used to complete the project while all FD and some PD functions were still on site. Included in hard costs is a 15% design and estimating contingency and a 10% construction contingency. The total for that is \$4,897,267.

There were two categories of Estimated Costs. The first Estimated Soft Costs were based on standard costs for design fees, printing and advertising, legal, finance and commissioning costs, onsite testing and inspections, FF+E (furniture, fixtures and equipment), communications (dispatch, security and access control), permitting, clerk of the works, additional services such as a survey and geotechnical, and utility backcharges. The total for that is \$1,558,768.

The second category was for Estimated Probable Additional Soft Costs, which HKT broke out separately as they might be required for a project of this type and they would require further review with coordination with the Town and PD. These items included temporary relocation and moving costs of \$115,000. Another category in this area is for Prequalification of GC's and Subs which would be at the discretion of the Town.

The Total Project costs also includes a 3% Owner's Contingency which was \$197,131.

The total for all categories was \$6,768,166 for bidding in 2018.

In year 2019 that total increased to \$7,038,481 and in 2020 the total was \$7,319,592.

6.06 Questions by Committee on the estimate:

- Based in the comments about phasing, the hiring of a CM was discussed. The Town did have a positive end product while working with a CM on a recent school project. Though this project is relatively small, the complexity of the phasing might be simplified or changed based on the input of a CM during the design process. The project would still include bidding of the sub-trades but the CM would work with the designers early on to plan for this work.
- Members asked how good the numbers were. JMS explained that the estimate was not done in house using historical numbers, but was completed by a professional independent cost estimator. In an early study phase, estimators tend to take a conservative approach to project estimates, and include appropriate contingency amounts that reflect the early stage the project development is in. As projects move from study phase to the design process, and the scope of the project becomes more refined and documented the contingency amounts carried within the estimate would be reduced to reflect the design's development. Though the estimator cannot predict the exact ups and downs of the industry, they are responsible for being aware of upcoming trends, and planning as best as possible, how to respond to the possibilities.

6.07 Next steps:

- Draft of Report which will be electronically sent to Committee for review and comment.
- Final Report incorporating Committee Comments.
- Present findings of report at future Town Meeting.

Next Meeting: Future Town Meeting

Please review these minutes and advise HKT Architects of any edits or additions.



APPENDIX C - ROOM DATA SHEETS + SKETCHES

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
POL	ICE DEPARTMENT									
. 01	IOE DEI ARTIMERT									
	PUBLIC AREAS									
	Entry Vestibule	SKA-S1			63		144		-81	
	Lobby	SKA-S1			580		472		108	
	Public Toilets at Lobby	SKA-S2			88		121		-33	
	T :: : : : : : : : : : : : : : : : : :	01/4 00	40		000		05.4		0.5	Room count to be
-	Training/Community Room	SKA-S3	49		989		954 80		35	determined
-	Training Room Storage Projection - Not included	SKA-S4	1		0 55		0		-80 55	
	PD Storage		1		22		0		22	Labeled PD Storage on existing plans, but is in FD corridor of Community Room
-	CURTOTAL					4707		4774		
	SUBTOTAL Gross area adjustment 15%					1797		1771 266		
	Gloss area adjustifient 15%							200		
	Circulation adjustment at 25%							509		
	TOTAL							2546		
-	101/12							2040		
	PUBLIC INTERACTION SPACE									
	Officer-in-Charge Office	SKA-P1	1	1	143		192		-49	Currently includes copy and storage of equipment and paperwork
	Dispatch Communications	SKA-P2	3		454		418		36	
	Kitchen at Communications	SKA-P3			50		60		-10	
	Toilet at Communications	SKA-P4			50		53		-3	
	Interview Room	SKA-P5		5	139		144		-5	
	Firearms Licensing	SKA-P5A	1	1	56		85		-29	
	SUBTOTAL					892		952		
	Gross area adjustment 15%							143		
	Circulation adjustment at 25%							274		
	TOTAL							1369		
<u> </u>	ADMINISTRATION									
	Police Chief Office with Toilet	SKV De	4	ာ	244		264		20	
-	and Closet Conference	SKA-P6 SKA-P7	1 15	3	241 161		261 270		-20 -109	
-				2						
-	Civilian Assistant for 2	SKA-P8	2		110		208		-98	
<u> </u>	Deputy Chief Day Shift Commander -	SKA-P9	1	2	138		156		-18	
	Lieutenant	SKA-P10	1	2	136		156		-20	
	Evening Shift Commander -									
	Lieutenant	SKA-P11	1	2	135		156		-21	
	Office Lieutenant - Future	SKA-P12	1	2	0		156		-156	

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
-	Sergeants Office	SKA-P12A	2	2		<u> </u>	192			
	Clinician's Office - Crisis	010/11/12/1					102			
	Intervention	SKA-P13	1	2	87		116		-29	
	Family Services Office	SKA-P14	2	4	67		232		-165	Two separate offices
	Speciality Services Office	SKA-P15	3	3	0		269		-269	i wo separate onices
	Prosecutor Office	SKA-P16	1	1	117		120		-3	
			-	3						
	Records Office Office with access to attic	SKA-P17	3	3	287 138		269 0		18 138	
	PD Storage	SKA-P18			22		100		-78	
	Office Supplies	SKA-P19			60		48		12	
	Office Equipment / Copy	SKA-P20			0		64		-64	
	Archival Document Storage	SKA-P21			198		225		-27	
	Staff Toilet 2 set of 2	SKA-P22	1		200		242		-42	
	Kitchenette	SKA-P23	<u>'</u>		0		60		-60	
	Detective Commander Office -	0.01120					- 00		- 00	
	Sergeant	SKA-P24	1	2	132		144		-12	
	Detectives	SKA-P25	5	5	435		574		-139	
	Detective Interview	SKA-P26	Ť	4	137		110		27	
	Detective Storage	SKA-P27			83		100		-17	
	Evidence Lab	SKA-P28	1		124		144		-20	Currently has windows
	Evidence	SKA-P29	1		361		420		-59	Currently rias windows
	Seized Weapons Storage	SKA-P30	1		105		84		21	
	Drug Evidence Storage	SKA-P31			89		100		-11	
	Drug Evidence Storage	CIUTTOI			- 00		100		• •	
	SUBTOTAL					3563		4976		
	Gross area adjustment 15%							746		
	,									
	Circulation adjustment at 25%							1431		
	TOTAL							7153		
	DETENTION									
	Sally Port / Impound Bay	SKA-P32			620		1152		-532	
	Recovered Property	SKA-P33			263		160		103	
	Bulk Evidence Storage	SKA-P34		<u> </u>	21		160		-139	
	Booking Holding	SKA-P35		2	0		72		-72	
	Booking Booking Desk COMBINE	SKA-P36		3	518		325		193	
	WITH BOOKING				127		0		127	
-	Interview Room	SKA-P37		4	137 101		0 120	-	137 -19	
	Detention AV Surveillance	SKA-P37 SKA-P38	2	4	0		80		-80	
	Detainee Shower	SKA-P39	1		31		43		-12	
	Detention Cell - Juvenile	SKA-P40	1		219		72	1	147	
	Detention Cell - Female	SKA-P41	2		228		144		84	
	Detention Cell - Male	SKA-P42	4		645		288		357	
	Booking Storage	SKA-P43			29		36		-7	
	SUBTOTAL					2812		2652		
	Gross area adjustment 15%							398		
	Circulation adjustment at 25%							762		
	TOTAL							3812		ĺ

Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
OPERATIONS									
Roll Call	SKA-P44	13		217		352		-135	
Report Writing	SKA-P45	4		132		100		32	
K9 Operations and Office	SKA-P46	1		0		100		-100	
Police Patrol Storage	SKA-P47			0		100		-100	
Armorer	SKA-P48	1		152		250		-98	
SUBTOTAL					501		902		
Gross area adjustment 15%							135		
Circulation adjustment at 25%							259 1297		
STAFF SUPPORT									
Lunch Room	SKA-P49	6		139		234		-95	
Women's Locker	SKA-P50	10		206		525		-319	Existing 8, Ideal 10
Men's Locker	SKA-P51	70		1032		2161		-1129	Existing 59, Ideal 70
Fitness Room (Currently Shared with FD)	SKA-P52			589		500		89	Currently Shared with FD
Garage (FD has 3 spaces)	SKA-P53			8730		8450		280	Currently Shared with FD
Bicycle Storage	SKA-P54			268		160		108	
Indoor Shooting Range	SKA-P55		2	0		1440		-1440	
							10.1=0		
SUBTOTAL					10964		13470		
Gross area adjustment 15%							2021		
Circulation adjustment at 25%							2072		
Circulation adjustment at 25% TOTAL							3873 19363		
TOTAL							19363		
BUILDING SUPPORT									
									Provide one near
Janitors Closet	SKA-SUP1			25		38		-13	Detention
Mechanical Room	SKA-SUP2			1080		400		680	
Water Service - Plumbing /									
Fire Protection Room	SKA-SUP3			90		144		-54	
Main Electrical Room	SKA-SUP4			98		250		-152	
Emergency Electrical Room	SKA-SUP5			221		80		141	
Electrical Closet	SKA-SUP6			0		48		-48	Proposed area assume 2 story building
Emergency Electrical Closet	SKA-SUP7			0		10		40	Proposed area assume
Emergency Electrical Closet Server / E911 Room	SKA-SUP7	-	-	0 83		48 192		-48 -109	2 story building
Building Services - IT Room	SKA-SUP9	-	-	207		250		-43	
Radio Room	SKA-SUP10	-	-	125		60		65	
									Proposed area assume
Elevator	SKA-SUP11			225		200		25	2 story building

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
	Elevator Machine Room	SKA-SUP12			86		100		-14	
	Stairs	SKA-SUP13			2612		880		1732	Proposed area assumes 2 stairs connecting 2 floors. Existing area is shared with FD
	SUBTOTAL					4852		2690		
	Gross area adjustment 15%					7032		404		
-	Oross area adjustment 1576							707		
	Circulation adjustment at 25%							773		
	TOTAL							3867		
	GRAND TOTAL PROPOSED POLICE DEPT. INCLUDING BUILDING SUPPORT AND GROSS + CIRCULATION ADJUSTMENTS; GARAGE INCLUDED							39406		
FIE	F DEDARTMENT EVICTING CO	NDITIONS								
FIK	E DEPARTMENT EXISTING CO	SNOTHONS								
	ADMINISTRATION				400					01 1 05
	Fire Chief Office with Closet				192					Check SF count
	Fire Prevention Office and									
	Plan Storage				181					
										Lacking file/storage
	Administrative Assistant				134					space
	Fire Alarm Superintendent									
	Office				137					Current use by Captain
	Archived Items				118					
	Conference Room				211					
	Office Supplies Storage				40					Check size
	Toilet				38					Check size
	FD Storage				202					Located on third floor
	SUBTOTAL					1253				
<u> </u>	STAFF SUPPORT									
<u> </u>	Day Room				253					
	Dining Room				371					Includes kitchen
	Kitchen COMBINED WITH									
	DINING				0					
<u> </u>	Janitors Closet (2)				70					
<u> </u>	Women's Toilet				44					
<u></u>	Men's Toilet				124					
	Watch Room				239					
	Dorm 1, 2, 3, 4, 5, 6, 7, 8, 9, 10				1435					
	Women's Toilet / Shower				62					
	Men's Toilet / Shower				242					

	Space	Ref. Sketch #	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
										Currently used for extra sleep space during
	Lieutenant Dorm Room				117					events
	Captain / Lieutenant Toilet				84					o romo
	Captain Dorm Room				209					
	SUBTOTAL					3250				
	OPERATIONS									
	Apparatus Bays				4464					
	Equipment Maintenance				163					Ventilation issues
-	EMT - Medical Supply Storage				97					
	EMT Washroom Fire Alarm and Maintenance				55 248					Contains major power panels/risers
	rife Alaim and Maintenance				240					Primarily refrigerator
	Storage				134					storage for 4 shifts
	Air Supply				120					
	W/D - Laundry				129					
	Turnout Gear				503					
	SUBTOTAL					5913				
	SUBTUTAL					3913				
-										
-										
<u> </u>			-							
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-										
	<u> </u>		<u> </u>							<u> </u>

Space	Ref. Sketch	Occupants	Visitors	Existing SF	Total Existing SF	Proposed SF	Total Proposed SF	Delta	Comments
SUMMARY TOTALS:									
EXISTING Grand NSF total PD (with 9,000SF parking garage included, but no building support)					20529				
EXISTING Grand NSF total Building Support					4852				
EXISTING Grand NSF total FD with no building support included					10416				
EXISTING GRAND NSF TOTAL POLICE, FIRE + SUPPORT SPACES					35797				*This number is the sum of the existing grand NSF totals of the three (PD, Building Support and FD) amounts listed above.
EXISTING BUILDING'S GRAND GSF					49290				*This number is from measured take-offs of the 2001 bid set drawings. FIRST = 17,825; SECOND = 17,945; THIRD = 13,520
PROPOSED NSF (Site Blind) Program of Police Department (with parking garage)							24723		*This number is the sum of the Proposed PD SubTotal amounts per category from pages 1-3 above.
PROPOSED GSF (Site Blind) Program of Police Department and Building Support							39406		*This number is from page 4 above.
DELTA The difference between Existing PD NSF and Proposed PD NSF								-4194	*It is noted that the area of the study's proposed floor plan additions are ~4,000SF

Room No: SKA-S1

Description: Entry Vestibule - Included with Lobby

Current Name + Number: Vestibule 115A

Group: Public Area

Quantitative Criteria: 1 144

Square feet

Functional Description: 1 Entry Point

2 Safe Haven

Qualitative Description: 1 Control point

Locational Criteria: 1 Wayfinding obvious to visitor

Technical Criteria:

Walls: GWB with bullet resistant wall panels if adjacent to

Dispatch/Communications

Floors: Porcelain Tile and Walk Off Carpet, durable / low maintenance

Ceiling: Acoustic Tile & GWB

Windows: Desirable Plumbing: NA

HVAC: Standard Entry Environment
Ventilation: Standard Entry Environment

Lighting: Direct/Indirect; spots in display area
Power: As needed for security systems
Tel/Data: As needed for security systems

Security: Standard Entry Lock

Equipment: Safe Haven associated equipment

Furnishings: 1 Built-in seating

Notes: 1 Entry vestibule to act as a Safe Haven.

2 TV monitor will need to be connected to a computer in

Dispatch/Communications

Wakefield Public Safety Wakefield, Massachusetts

Room Data

ROOM OR SPACE

Room No: SKA-S1

Description: Lobby - Included with Vestibule

Current Name + Number: Lobby 115

Group: Public Area

Quantitative Criteria: 1 472

Square feet

Functional Description: 1 Notices and pamphlet information

2 Transaction Counter at Dispatch/Communications

3 Waiting area for meetings and assistance by PD

Qualitative Description: 1 Welcoming, open area, control point

2 Accessible but no direct access to work areas

3 Direct access to Dispatch/Communications

4 Direct access to Intake

5 Access to Training/Community

6 Access to Public Toilets

Locational Criteria: 1 Adjacent to Communications Room, Intake Room, Training/Community

Room, Public Toilets

Technical Criteria:

Walls: GWB with bullet resistant wall panels at Dispactc/Communications; chair rail

Floors: Porcelain Tile, durable / low maintenance; walk-off carpet near door to

vestibule

Ceiling: Acoustic Tile & GWB

Windows: Desirable

Plumbing: Drinking Fountain

HVAC: Standard Lobby Environment
Ventilation: Standard Lobby Environment
Lighting: Direct/Indirect; spots in display area

Power: Standard

Tel/Data: Standard for computer Security: Standard Entry Lock

Equipment: Bullet resistant transaction windows with pass thru and speakers; Video

surveillance

Furnishings: 1 Built-in seating

2 Display for pamphlets and brochures

3 Bulletin Board

4 Transaction counter

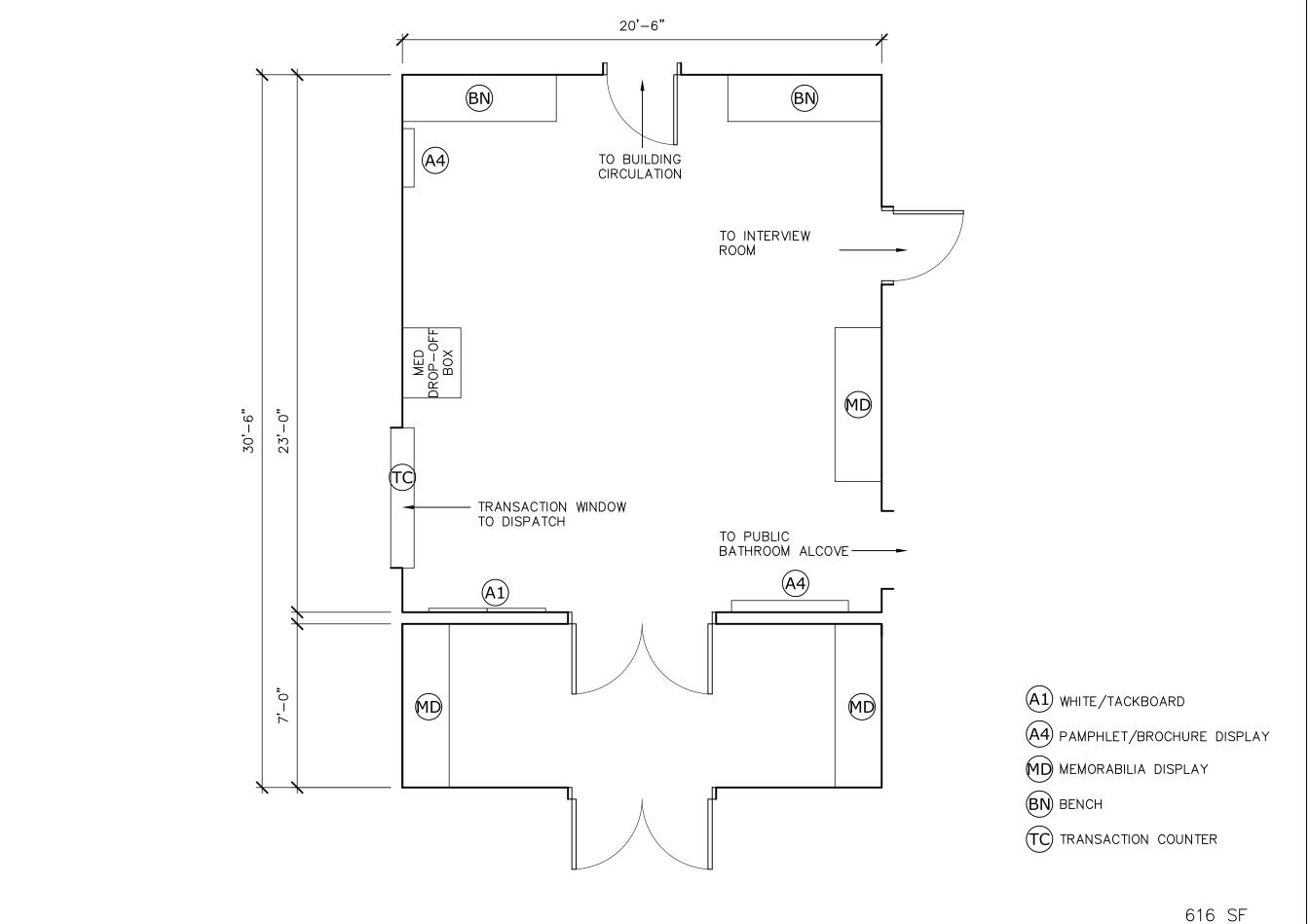
5 Display cabinet

6 Medication drop-box

7 TV Monitor for news, cable TV and informational slide show

Notes:

Current shared lobby for PD/FD with no formal public "greeter" is problematic. Wayfinding to get to FD is via signage only; PD access is by phone on wall; Reocrds personnel is 7:30-3:30 only and may not always be seated at desk. A video feed, miniotred in Dispatch, is the only visual.



Drawn by: NJJ SKA-S01 Date: MAY 2017 Scale: 1/4" = 1'-0" Job num: 21608

WAKEFIELD PUBLIC SAFETY STUDY

ENTRY VESTIBULE - LOBBY

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Room No: SKA-S2

Description: Public Toilets at Lobby

Current Name + Number: Men's Toilet 117, Women's Toilet 118

Group: Public Area

Quantitative Criteria: 1 121

Square feet (per set)

2 1 set of 2 male/female toilets

Functional Description: 1 Men's and Women's Toilet

2 Fully accessible

Qualitative Description: 1 Secure

2 Good ventilation3 Durable Materials

Locational Criteria: 1 Adjacent to lobby

2 Visible from Communications

Technical Criteria:

Walls: GWB/Ceramic Tile Floors: Ceramic Tile

Ceiling: GWB or acoustic tile

Windows: NA

Plumbing: Standard Toilet Environment HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Direct/Indirect

Power: Standard Toilet Environment

Tel/Data: NA

Security: Standard Toilet Room Lock

Equipment: NA

Furnishings: 1 Mirror

2 Soap dispensor

Towel dispensor/trash receptacleFeminine dispensor and receptacle

5 Toilet paper dispenser

6 Coat hook

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

PUBLIC TOILETS (1 SET OF 2)

Date: 19 DECEMBER 2016

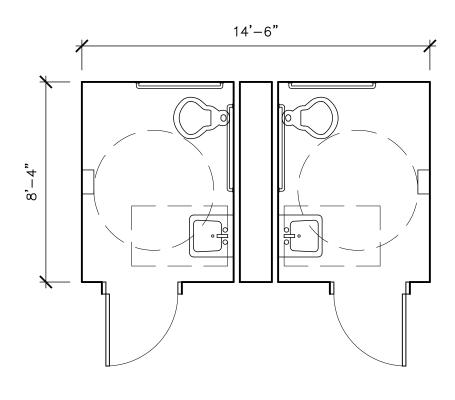
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-S02

121 SF PER SET



Room No: SKA-S3

Description: Training/Community Room
Current Name + Number: Training/Community Room 119

Group: Public Area

Quantitative Criteria: 1 954

Square feet

Functional Description: 1 Used for training or classroom teaching

2 Used for EOC events

Qualitative Description: 1 Confortable environment for lecturing or training

2 Multi-media3 Good acoustics

Locational Criteria: 1 Adjacent to lobby

Technical Criteria:

Walls: GWB
Floors: Carpet
Ceiling: Acoustic Tile

Windows: Preffered not required

Plumbing: NA

HVAC: Standard Meeting Room Environment Ventilation: Standard Meeting Room Environment

Lighting: Direct/Indirect; variable lighting levels; dimming

Power: Standard Meeting Room; Floor boxes
Tel/Data: Standard Meeting Room; Floor Boxes
Security: Standard lock unless exits into PD area

Equipment: Smartboard; speakers; video equipment; phone; data

Furnishings: 1 Folding training tables; 2' x 8'

2 Stackable seating for 84 people

3 Lecturn

4 Whiteboard / Tackboard

5 Blackout shades

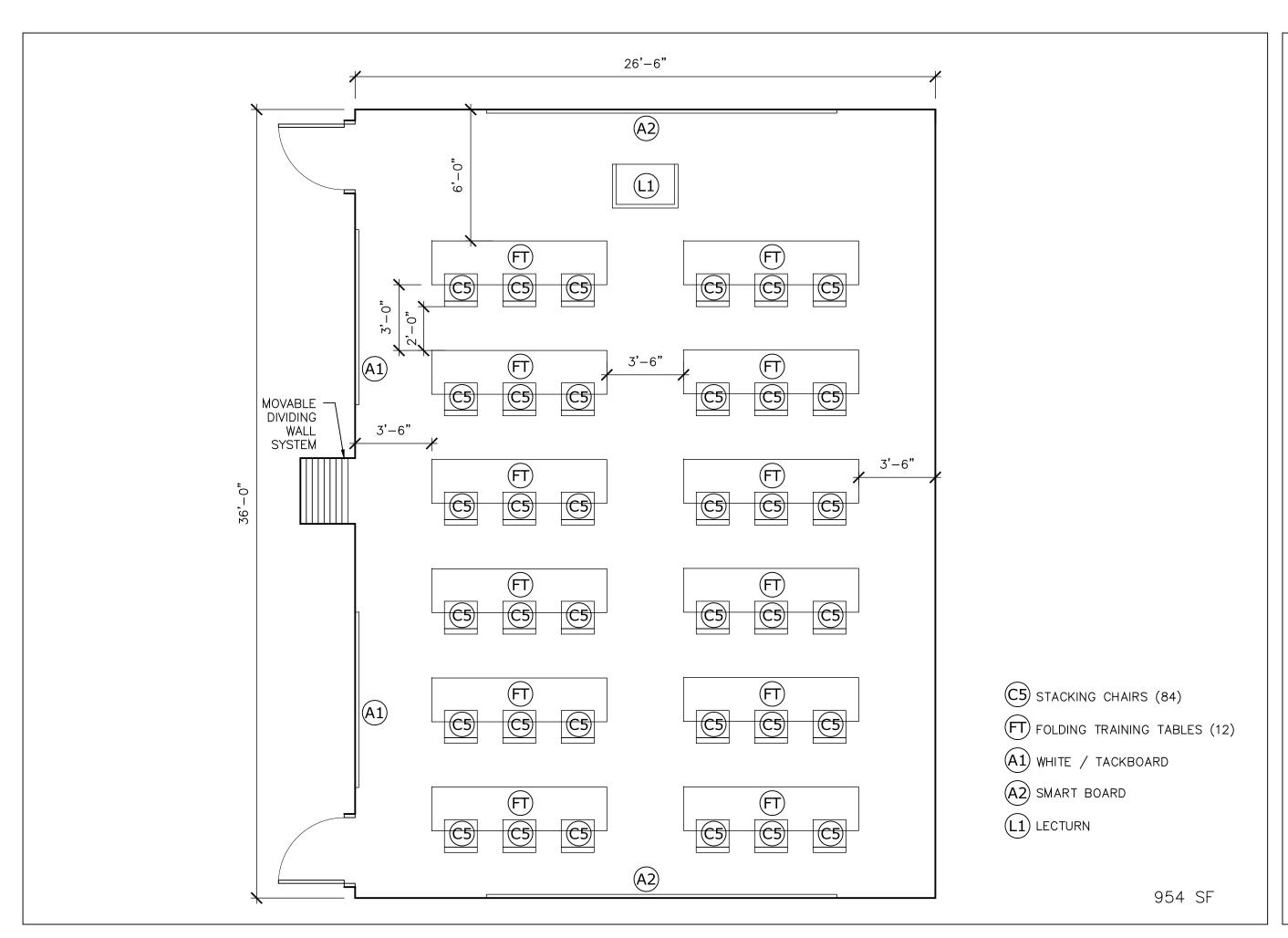
Notes: 1 Currently this room is used by both departments, the Community, and

for EOC events.

Currently the room has a posted limit of 49 persons and therefore requires one form of egress, which is assumed to be through the front lobby. A second door, which is currently controlled, provides accees to the fire department administration area. A third door, at the rear of the room, is currently not secure and provides a way to access the fire department portion of the building, as well as the common core areas, without restriction. Standard lock at main door; secure door requiring fob or key at FD door; third door at rear to have new hardware to

secure this exit

3 Lack of parking is an issue.



WAKEFIELD PUBLIC SAFETY STUDY

TRAINING / COMMUNITY ROOM

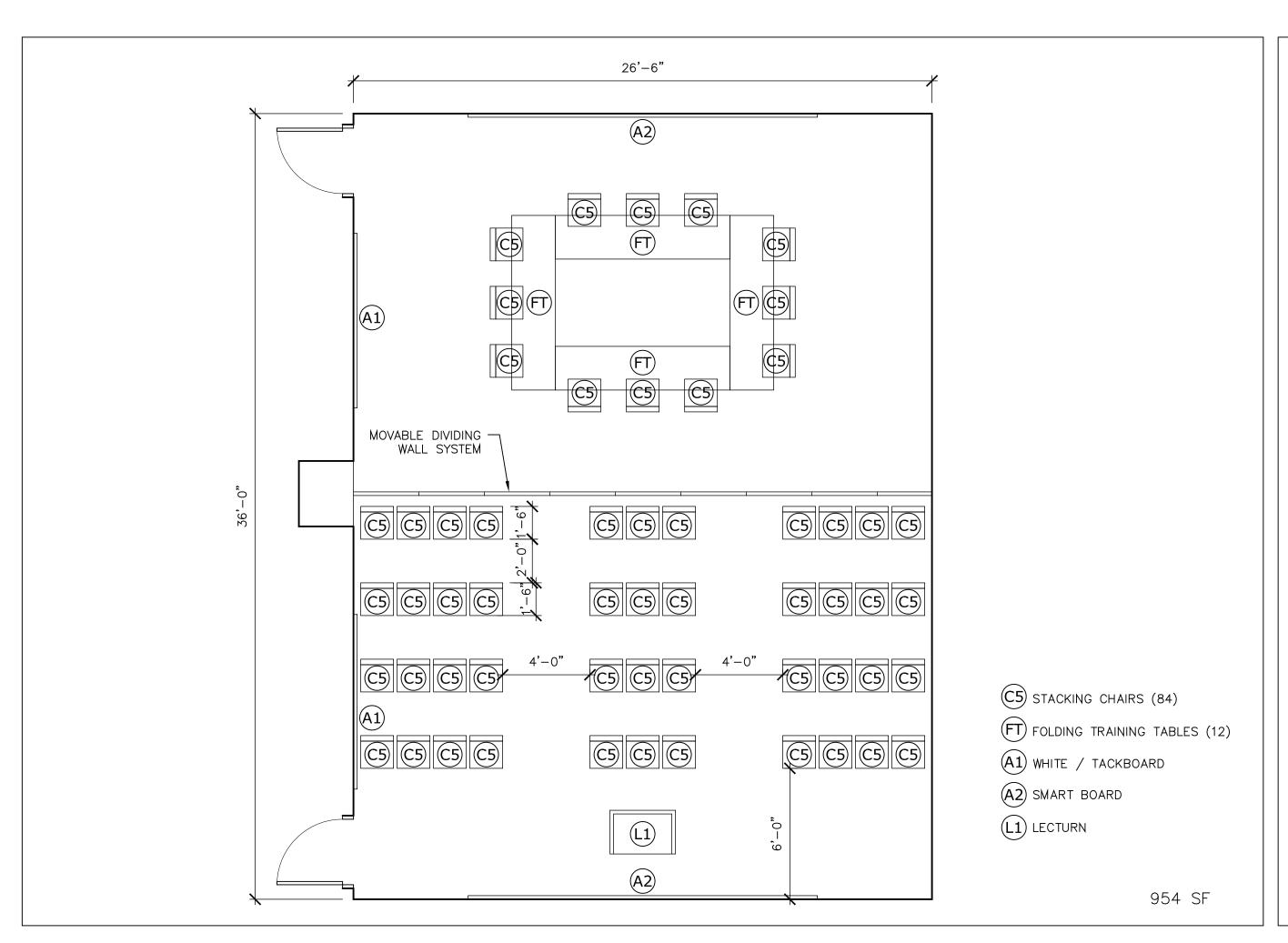
SKA-S03A

Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0" Job num: 21608 Drawn by: NJJ

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19 DECEMBER 2016 Scale: 1/4" = 1'-0" Date:

Job num: 21608

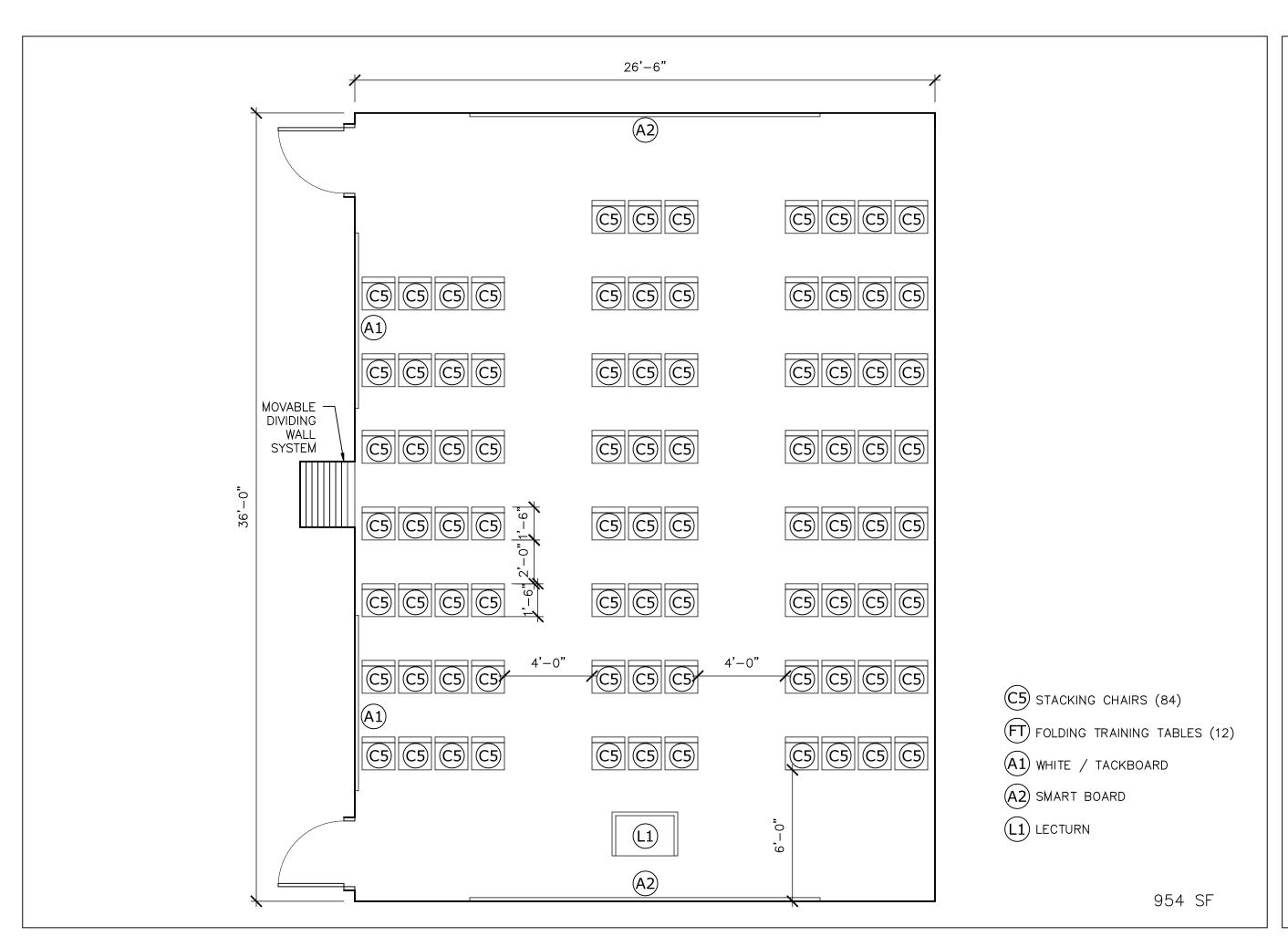
Drawn by: NJJ

SKA-S03B

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WAKEFIELD PUBLIC SAFETY STUDY

TRAINING / COMMUNITY ROOM



19 DECEMBER 2016

SKA-S03C

Scale: 1/4" = 1'-0" Job num: 21608 Drawn by: NJJ Date:

WAKEFIELD PUBLIC SAFETY STUDY

TRAINING / COMMUNITY ROOM

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Room No: SKA-S4

Description: Training Room Storage
Name: Not currently included

Group: Public Area

Quantitative Criteria: 1 80

Square feet

Functional Description: 1 Storage for chairs and tables

Qualitative Description: 1 Secure

Locational Criteria: 1 Adjacent to Training Room

Technical Criteria:

Walls: GWB

Floors: Resilient or carpet in storage

Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Storage Ventilation: Standard Storage

Lighting: Direct

Power: Standard Storage

Tel/Data: NA

Security: Standard Storage Lock

Equipment: NA

Furnishings: 1 Dollies for furniture

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

TRAINING ROOM STORAGE

Date: 19 DECEMBER 2016

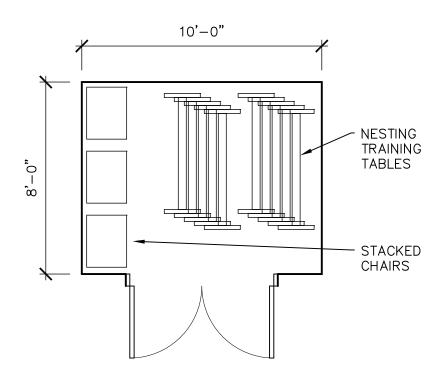
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-S04

80 SF



Room No:

Description: Projection - Not included

Current Name + Number: Projection 120

Group: Public Area

Quantitative Criteria: 1 0

Square feet

Functional Description: 1 Projection room

Qualitative Description: 1 Secure area

Locational Criteria: 1 Adjacent to Training/Community Room

Technical Criteria:

Walls: GWB

Floors: Resilient or carpet
Ceiling: Acoustic Tile
Windows: Into main room

Plumbing NA

HVAC: Standard Environment
Ventilation: Standard Environment
Lighting: Standard Environment
Power: Standard Environment
Tel/Data: Standard Environment
Security: Standard Storage Lock

Equipment: Per Town Needs

Furnishings: 1 Worksurface

2 2 chairs

3 Shelving

Notes:

Room No: SKA-P1

Description: Officer in Charge Office

Current Name + Number: O.I.C 214

Group: Communications - Police

Quantitative Criteria: 1 192

Square feet

Functional Description: 1 Works in Dispatch/Communications

2 In charge of all aspects of shift including roll call, reviewing and clearing reports, assisting and/or counseling subordinates, booking proisoners, prisoner checks, bailing prisoners, filling overtime and details, ensuring

dispatch cards are complete and accurate.

Qualitative Description: 1 Shared Office for 3 persons; 1 per shift

Locational Criteria: 1 Adjacent to Dispatch/Communications

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile

Windows: Prefered not required; dependent on location of Dispatch/Communications

Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock Equipment: Computer, CATV

Furnishings: 1 1 Desk with return

2 Seating - 1 office with 1 guest chairs

3 Storage Cabinets or File Cabinets

4 Whiteboard / Tackboard

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

OFFICER-IN-CHARGE OFFICE

Date: 19 DECEMBER 2016

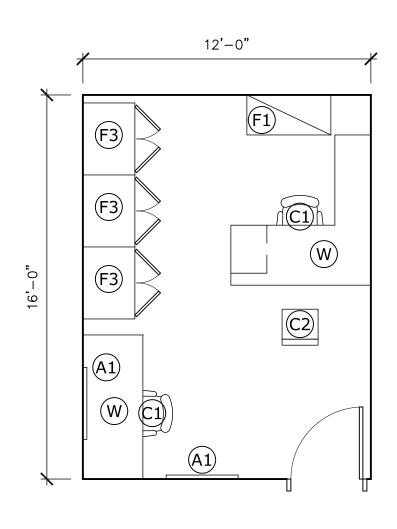
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P01

192 SF



- TC) TRANSACTION COUNTER
- (C1) MANAGEMENT CHAIR
- C2) GUEST
- (W) DESK
- A1) WHITE/TACK BOARD
- (F1) 2 drawer WL
- (F3) CABINETS

Room No: SKA-P2

Description: Dispatch Communications

Current Name + Number: Communications 218

Group: Communications - Police

Quantitative Criteria: 1 418

Square feet

Functional Description: 1 Receive and dispatch all calls 24/7

2 Receive and dispatch all E911 calls

3 Transfers calls to appropriate outside agencies

4 Handles non-emergency lines5 Main "greeter" for the station

6 Monitors Cellblock

Qualitative Description: 1 Secure area

2 Accessible by public

Locational Criteria: 1 Off lobby

2 Adjacent to Officer in Charge

3 Accessible to interview

Technical Criteria:

Walls: GWB; Insulate for noise control; bullet resistant panels at lobby walls

Floors: Carpet or linoleum; raised floor system if possible

Ceiling: Acoustic Tile

Windows: Not required; any windows to be bullet resistant

Plumbing: NA

HVAC: Standard Communications Room Environment Ventilation: Standard Communications Room Environment

Lighting: Direct/Indirect with dimmers

Power: Standard Communications Room Environment Tel/Data: Standard Communications Room Environment

Security: Standard Office Lock

Equipment: Radios; computer; data/phone; fax; printer; shredder; CATV; CCTV

Furnishings: 1 2 Dispatch Workstations with 1 backup; with heavy duty chairs

2 TV mountings at wall

3 Built in base cabinets

4 Tackboard for maps; Whiteboard

5 Files

6 Shelving/Bookshelves for equipment/binders

Notes: 1 Currently is manned by 2 officers, a patrol officer and sergeant who is

also the OIC

If there is an interface wall with lobby it should have bullet resistant window with transaction counter with speaker and pass-thru.

3 Size for three full-time dispatcher

4 Add surveillance monitor for dispatch to monitor the station.



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WAKEFIELD PUBLIC SAFETY STUDY

DISPATCH

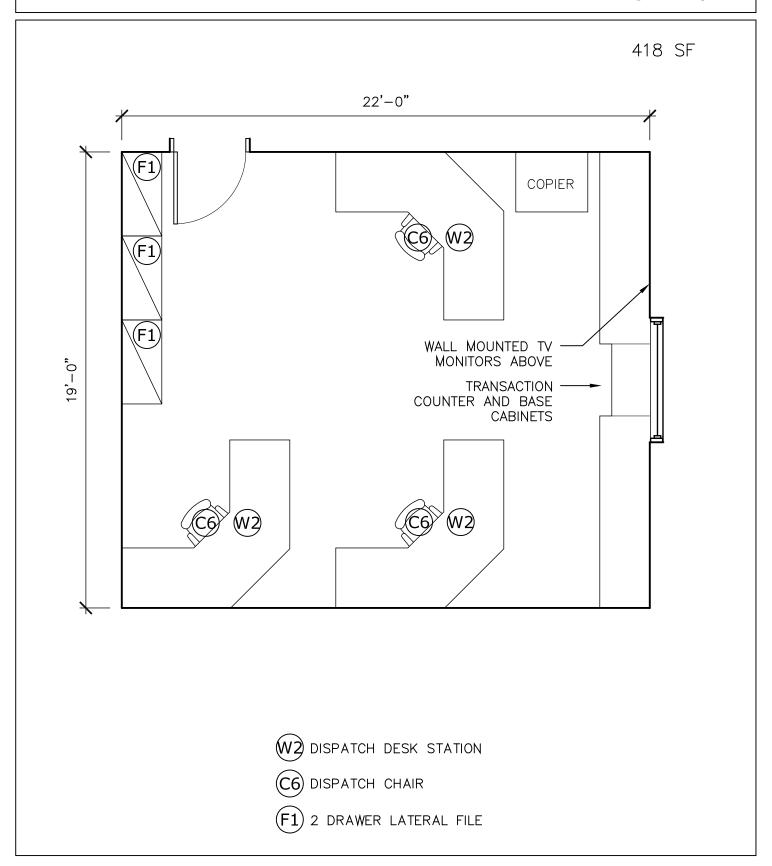
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: אנא

SKA-P02



Room No: SKA-P3

Description: Kitchen at Communications

Current Name + Number: Kitchen 219

Group: Communications - Police

Quantitative Criteria: 1 60

Square feet

Functional Description: 1 For use by Communciations staff without leaving area

Qualitative Description: 1 Heavy duty use

Locational Criteria: 1 Within Communications area

Technical Criteria:

Walls: GWB
Floors: Linoleum
Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Kitchen Environment Ventilation: Standard Kitchen Environment

Lighting: Direct/Indirect

Power: Standard Kitchen Environment Tel/Data: Standard Kitchen Environment

Security: NA

Equipment: Wall and base cabinets with microwave, coffee maker, toaster/oven, sink,

undercounter refrigerator

Furnishings: 1

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

DISPATCH KITCHENETTE

Date: 19 DECEMBER 2016

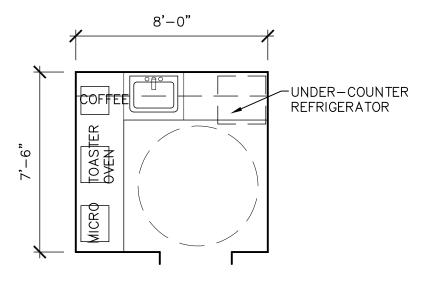
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P03

60 SF



Room No: SKA-P4

Description: Toilet at Communications

Current Name + Number: Toilet 220

Group: Communications - Police

Quantitative Criteria: 1 53

Square feet

Functional Description: 1 Unisex toilet

Qualitative Description: 1 Secure

2 Good ventilation3 Durable Materials

Locational Criteria: 1 Within Communications area

Technical Criteria:

Walls: GWB/Ceramic Tile Floors: Ceramic Tile

Ceiling: GWB or acoustic tile

Windows: NA

Plumbing: Standard Toilet Environment HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Direct/Indirect

Power: Standard Toilet Environment

Tel/Data: NA

Security: Standard Toilet Room Lock

Equipment: NA

Furnishings: 1 Mirror

2 Soap dispensor

Towel dispensor/trash receptacleFeminine dispensor and receptacle

5 Toilet paper dispenser

6 Coat hook

Notes:



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Project

WAKEFIELD PUBLIC SAFETY STUDY

DISPATCH TOILET

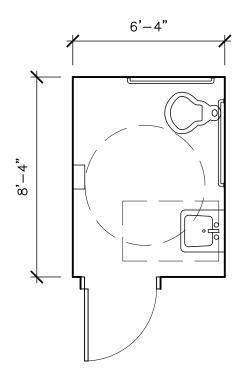
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P04



Room No: SKA-P5

Description: Interview / Intake Room

Current Name + Number: Interview 116

Group: Public Area - Police

Quantitative Criteria: 1 144

Square feet

Functional Description: 1 Interviews

2 Intake to officer from citizen

3 Fingerprinting, weapons licensing

4 Small Meeting Room

Qualitative Description: 1 Secure area

Locational Criteria: 1 Off of lobby

2 Possibly accessed from PD side as well as lobby

3 Located in order to move people into a safe zone immediately

Technical Criteria:

Walls: GWB; Insulate for noise control

Floors: Carpet
Ceiling: Acoustic Tile

Windows: NA Plumbing NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: As required for equipment

Tel/Data: Standard Office Environment; as required for equipment

Security: Standard Office Lock Equipment: Camera; Computer

Furnishings: 1 Small conference table

- 2 Seating for 4 persons
- 3 Whiteboard
- 4 Locakable Built-In Cabinet
- 5 Tackboard

Notes: 1 Space can be secured from lobby; if door to PD this is secured.

- 2 CALEA: If space is to be used for formal interviews section 42.2.10 requires room to include weapons control, added security for potentially serious or combative situations, means of summoning assistance aka panic button, limitations of stored equipment in room and access to restrooms, water or comfort breaks.
- 3 Add computer and camera for firearms permit processing and Audio/Video recording of interviews.



Project

WAKEFIELD PUBLIC SAFETY STUDY

INTERVIEW / INTAKE ROOM

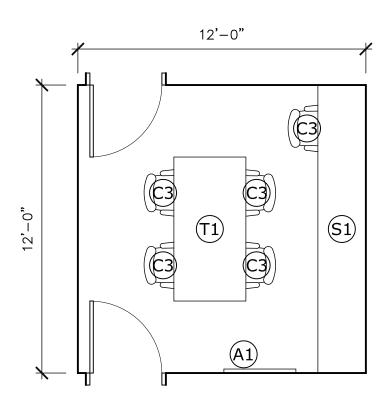
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P05



- (T1) conference table
- (C3) CONFERENCE CHAIR
- S1) BUILT IN STORAGE
- (A1) WHITE/TACK BOARD

Room No: SKA-P5A

Description: Firearms Licensing

Current Name + Number: Front Desk / Firearm Licensing 114

Group: Public Area - Police

Quantitative Criteria: 1 85

Square feet

Functional Description: 1 Fingerprinting, weapons licensing

2

4

Qualitative Description: 1 Secure area

Locational Criteria: 1 Off of lobby

2 Possibly accessed from PD side as well as lobby

3

Technical Criteria:

Walls: GWB; Insulate for noise control

Floors: Linoleum
Ceiling: Acoustic Tile

Windows: NA Plumbing NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: As required for equipment

Tel/Data: Standard Office Environment; as required for equipment

Security: Standard Office Lock Equipment: Camera; Computer

Furnishings: 1 Locakable Built-In Cabinet

2 Worksurface

3 Tackboard

4 5

Notes: 1 Space can be secured from lobby; if door to PD this is secured.

2 Add computer and camera for firearms permit processing and Audio/Video

recording of interviews.

3

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Project

WAKEFIELD PUBLIC SAFETY STUDY

FIREARMS LICENSING / FINGERPRINTING

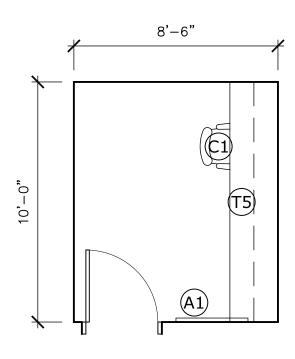
Date: MAY 2017

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P05A



- C1) MANAGEMENT CHAIR
- (T5) WORK SURFACE WITH SHELVING
- (A1) WHITE/TACK BOARD

Room No: SKA-P6

Description: Police Chief Office with Toilet and Closet

Current Name + Number: Police Chief 211 and Toilet 212 and Closet 213

Group: Administration - Police

Quantitative Criteria: 1 261

Square feet

2 Meets with 1-2 people

Functional Description: 1 Coordinates and oversees all administrative functions including all aspects of

PD, working with media, public records, social media, reviewing reports, scheduling, developing policies and procedures, budgeting, researching and procuring equipment, working with outside agencies, all aspects of personnel

issues, hiring and investigating complaints.

2 Deskwork

3 Small Meetings

4 Toilet

5 Closet

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

2 Near Conference Room

3 Near Administrative Assistant

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: Toilet fixtures

HVAC: Standard Office / Toilet Environment Ventilation: Standard Office / Toilet Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: Computer, scanner, printer, CATV, CCTV, wall mounted computer monitor

(for meetings)

Furnishings: 1 Desk with return

2 Seating - 1 office with 4 guest chairs

4 Bookshelves5 File cabinets

6 36" round meeting table

Notes: 1 Small closet within room

2 Acoustically private



Project

WAKEFIELD PUBLIC SAFETY STUDY

POLICE CHIEF OFFICE

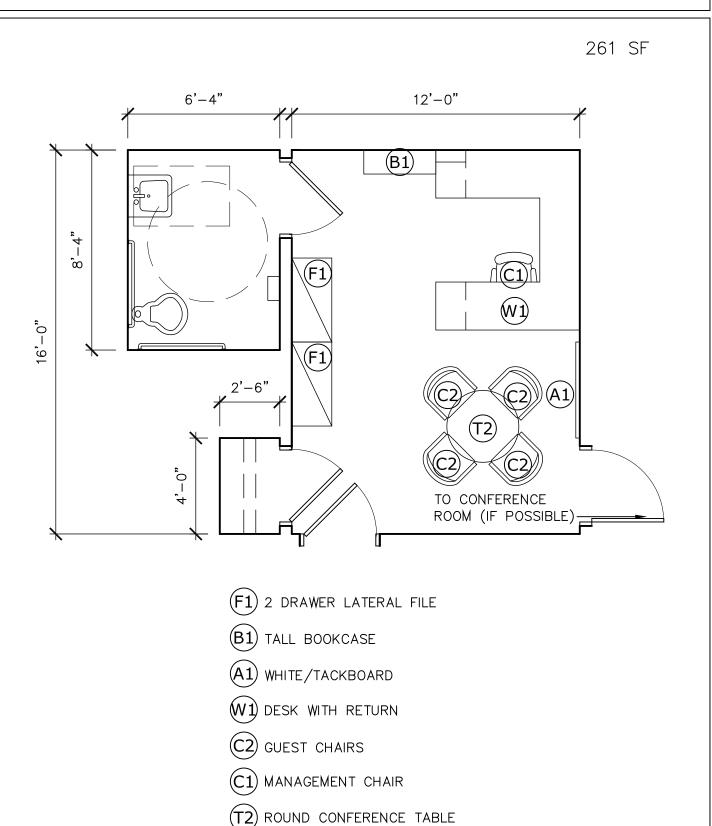
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P06



Room No: SKA-P7
Description: Conference
Current Name + Number: Conference 215

Group: Administration - Police

Quantitative Criteria: 1 270

Square feet

2 15 Person Capacity

Functional Description: 1 Use for in house meetings

Qualitative Description: 1 Private enclosed conference area

Locational Criteria: 1 Centrally located for administrative use

2 Adjacent to Chief's office

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile

Windows: Preferred not Required

Plumbing: NA

HVAC: Standard Conference Environment
Ventilation: Standard Conference Environment
Lighting: Direct/Indirect; Dimming possible

Power: Standard Conference

Tel/Data: Standard Conference including conference call capability

Security: Standard Office Lock

Equipment: Smartboard, Phone, Speaker

Furnishings: 1 Conference table

2 Seating for 15 people

3 Credenza

4 Whiteboard / Tackboard

Notes:

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Project

WAKEFIELD PUBLIC SAFETY STUDY

CONFERENCE ROOM

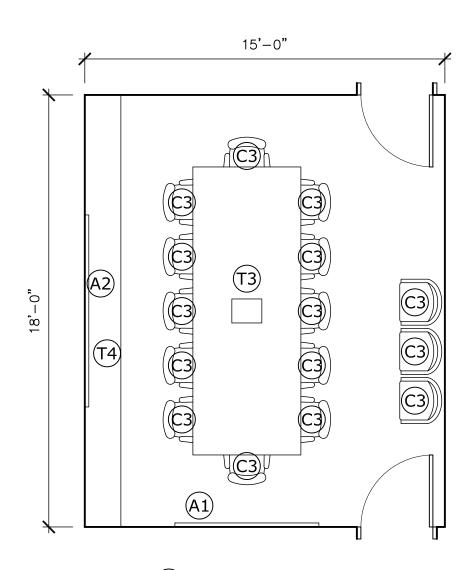
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P07



- A1) WHITEBOARD / TACKBOARD
- A2) SMARTBOARD
- C3) CONFERENCE CHAIR
- T3 LARGE CONFERENCE TABLE
- (T4) CREDENZA

Room No: SKA-P8

Description: Civilian Assistant for 2

Current Name + Number: Administration Reception 216

Group: Administration - Police

Quantitative Criteria: 1 208

Square feet

2 2 workstations

Functional Description: 1 Payroll and detail billing

2 Available to public

3 Gateway to the Chief

Qualitative Description: 1 Shared workspace

Locational Criteria: 1 Adjacent to Lobby

2 Adjacent to Police Chief

3 Adjacent to Deputy Chief + Lieutenants

4 Possibly pass through Admin Assistant to access Police Chief's office

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: Computer, photocopier, CATV, CCTV

Furnishings: 1 2 Desks with return

2 Seating - 2 office, 2 guest

3 Adjustable shelving on standards

4 File cabinets5 Tackboard

Notes: 1 One future person planned



Project

WAKEFIELD PUBLIC SAFETY STUDY

ADMINISTRATIVE ASSISSTANT

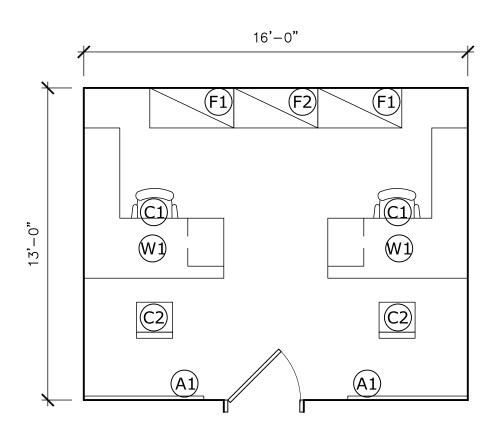
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P08



- (F1) 2 drawer lateral file
- F2) 4 DRAWER LATERAL FILE
- (W1) DESK WITH RETURN
- (C2) GUEST CHAIRS
- (C1) MANAGEMENT CHAIR
- (A1) WHITE / TACKBOARD

Room No: SKA-P9
Description: Deputy Chief

Current Name + Number: Executive Officer 217

Group: Administration - Police

Quantitative Criteria: 1 156

Square feet

2 Meets with 1-2 people

Functional Description: 1 Coordinates and oversees all administrative functions including all aspects of

PD, working with media, public records, social media, reviewing reports, scheduling, developing policies and procedures, budgeting, researching and procuring equipment, working with outside agencies, all aspects of personnel

issues, hiring and investigating complaints.

2 Deskwork

3 Small Meetings

4 Closet

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

2 Near Conference Room

3 Near Administrative Assistant

4 Near Chief's Office

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock
Equipment: Computer, CATV, CCTV

Furnishings: 1 Desks with return

2 Seating - 1 office with 2 guest chairs

3 Bookshelves4 File cabinets

5 Whiteboard / Tackboard

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DEPUTY CHIEF OFFICE

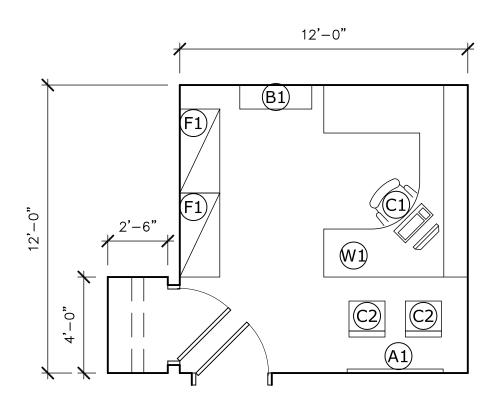
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P09



- W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- (A1) WHITE / TACKBOARD

Room No: SKA-P10

Description: Day Shift Commander - Lieutenant

Current Name + Number: Operation Lieutenant 221

Group: Administration - Police

Quantitative Criteria: 1 156

Square feet

2 Meets with 1-2 people

Functional Description: 1 Coordinates and oversees all administrative functions including all aspects of

PD, working with media, public records, social media, reviewing reports, scheduling, developing policies and procedures, budgeting, researching and procuring equipment, working with outside agencies, all aspects of personnel

issues, hiring and investigating complaints.

2 Deskwork

3 Small Meetings

4 Closet

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

2 Near Conference Room

3 Near Administrative Assistant

4 Near Chief's Office

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required

Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock
Equipment: Computer, CATV, CCTV

Furnishings: 1 Desks with return

2 Seating - 1 office with 2 guest chairs

3 Bookshelves4 File cabinets

5 Whiteboard / Tackboard

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DAY SHIFT COMMANDER OFFICE

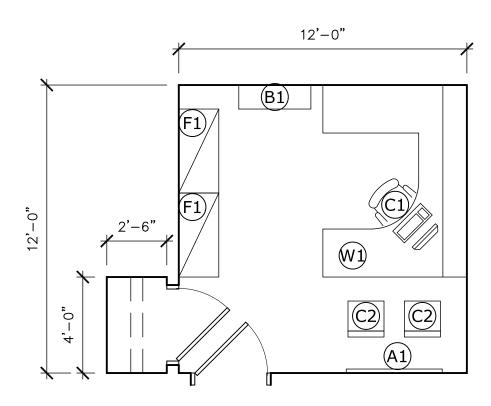
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P10



- W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- A1) WHITE / TACKBOARD

Room No: SKA-P11

Description: Evening Shift Commander - Lieutenant
Current Name + Number: AdministrativeService Lieutenant 223

Group: Administration - Police

Quantitative Criteria: 1 156

Square feet

2 Meets with 1-2 people

Functional Description: 1 Coordinates and oversees all administrative functions including all aspects of

PD, working with media, public records, social media, reviewing reports, scheduling, developing policies and procedures, budgeting, researching and procuring equipment, working with outside agencies, all aspects of personnel

issues, hiring and investigating complaints.

2 Deskwork

3 Small Meetings

4 Closet

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

2 Near Conference Room

3 Near Administrative Assistant

4 Near Chief's Office

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock
Equipment: Computer, CATV, CCTV

Furnishings: 1 Desks with return

2 Seating - 1 office with 2 guest chairs

3 Bookshelves4 File cabinets

5 Whiteboard / Tackboard

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

EVENING SHIFT COMMANDER OFFICE

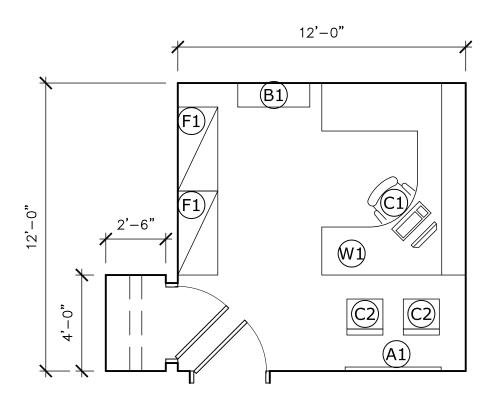
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P11



- W1) DESK WITH RETURN
- (F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- (A1) WHITE / TACKBOARD

Room No: SKA-P12

Description: Office Lieutenant - Future

Current Name + Number:

Group: Administration - Police

Quantitative Criteria: 1 156

Square feet

2 Meets with 1-2 people

Functional Description: 1 Coordinates and oversees all administrative functions including all aspects of

PD, working with media, public records, social media, reviewing reports, scheduling, developing policies and procedures, budgeting, researching and procuring equipment, working with outside agencies, all aspects of personnel

issues, hiring and investigating complaints.

2 Deskwork

3 Small Meetings

4 Closet

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

2 Near Conference Room

3 Near Administrative Assistant

4 Near Chief's Office

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock
Equipment: Computer, CATV, CCTV

Furnishings: 1 Desks with return

2 Seating - 1 office with 2 guest chairs

3 Bookshelves4 File cabinets

5 Whiteboard / Tackboard

Notes:

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Project

WAKEFIELD PUBLIC SAFETY STUDY

FUTURE LIEUTENANT OFFICE

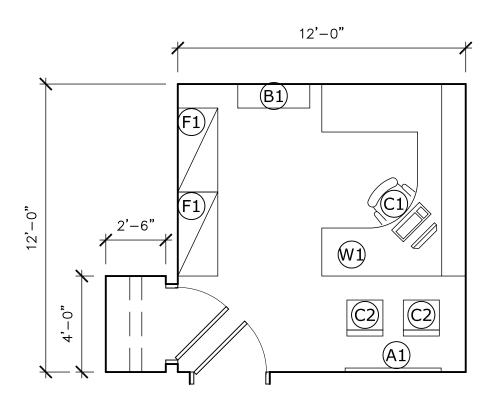
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P12



- W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- (A1) white / tackboard

Room No: SKA-P12A

Description: **Sergeants Office**

Current Name + Number: Not currently included

> Group: Administration - Police

Quantitative Criteria: 192 1

Square feet

2 2 workstations

1 Coordinates and oversees patrolmen and shifts **Functional Description:**

> 2 Deskwork

3

4

Qualitative Description: 1 **Shared Office**

Locational Criteria: 1 Central access to administrative offices

> 2 Near Conference Room

3 Near Administrative Assistant

Near Chief's Office

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet Ceiling: Acoustic Tile Windows: Required Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock Equipment: Computer, CATV, CCTV

2 Desks with return **Furnishings:** 1

> 2 Seating - 2 office, 2 guest

3 Bookshelves 4 File cabinets

Whiteboard / Tackboard

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

SERGEANTS OFFICE

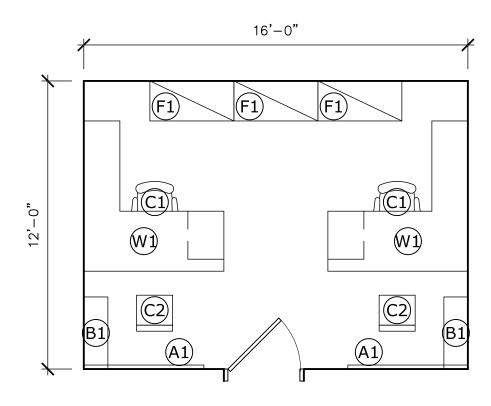
Date: MAY 2017

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P12A



- (W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- (A1) WHITE / TACKBOARD

Room No: SKA-P13

Description: Clinician's Office - Crisis Intervention

Current Name + Number: Arms Storage 102

Group: Operations - Police

Quantitative Criteria: 1 116

Square feet

Functional Description: 1 Deskwork

Qualitative Description: 1 Private office

Locational Criteria: 1 Flexible

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: Computer

Furnishings: 1 Desk with return

2 Seating - 1 office, 2 guest

3 File cabinets4 Tackboard

Notes:

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Project

WAKEFIELD PUBLIC SAFETY STUDY

CLINICIAN'S OFFICE CRISIS INTERVENTION

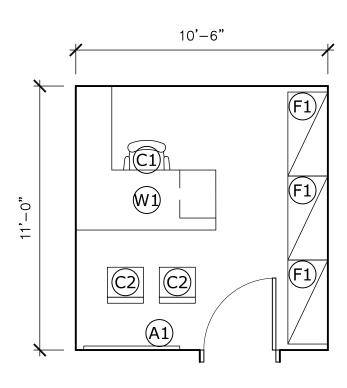
Date: MAY 2017

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P13



- W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- (A1) WHITE / TACKBOARD

Room No: SKA-P14

Description: Family Service Office

Current Name + Number: Armorer 109

Group: Operations - Police

Quantitative Criteria: 1 232

Square feet

2 Provide (2) offices: 1 current, 1 future

Functional Description: 1 Developes relationship with various social service agencies to provide follow-

up with, and assistance for, victims of domestic abuse, people with drug or

alcohol issues, and a multitude of other family crisis issues

Qualitative Description: 1 Private office

Locational Criteria: 1 Flexible

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: Computer

Furnishings: 1 Desk with return

2 Seating - 1 office, 2 guest per office

3 File cabinets4 Tackboard

Notes:

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Project

WAKEFIELD PUBLIC SAFETY STUDY

FAMILY SERVICES OFFICE (1 OF 2)

Date: MAY 2017

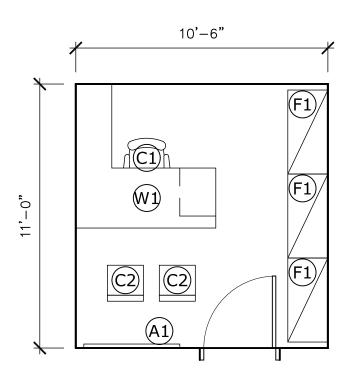
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P14

116 SF 1 OF 2



- W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- A1) WHITE / TACKBOARD

Room No: SKA-P15

Description: Speciality Services Office
Current Name + Number: Not currently included

Group: Operations - Police

Quantitative Criteria: 1 269

Square feet

2 Provide shared workspace for (3)

Functional Description: 1 Space for (3) School Resource Officers who work full-time within schools and

act as a representative at school dealing with issues that arise, work to develop safety plans, teach clases and assist students to get services they

need

Qualitative Description: 1 Private shared office

Locational Criteria: 1 Flexible

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: Computer

Furnishings: 1 (4) Desks with return

2 Seating - 4 office, 4 guest

3 File cabinets4 Tackboard

Notes: 1

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Project

WAKEFIELD PUBLIC SAFETY STUDY

SPECIALTY SERVICES OFFICE

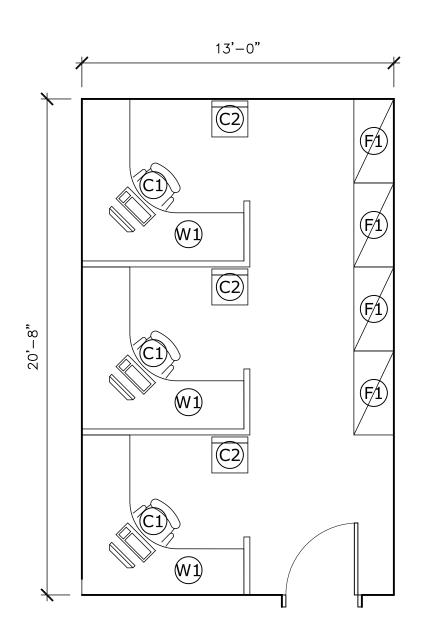
Date: MAY 2017

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ענא

SKA-P15



- W1 DESK WITH RETURN
- $\overline{(\mathsf{F1})}$ 2 drawer lateral file
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR

Room No: SKA-P16

Description: Prosecutor Office
Current Name + Number: Prosecutor 112

Group: Administration Police

Quantitative Criteria: 1 120

Square feet

Functional Description: 1 Works within the Records Department and is the PD representative in court

and is resposnsible for complete and accurate reports and case folders,

schedules officers for court

2 Active case file storage

3 Supported by two officers as back-ups prosecutors

Qualitative Description: 1 Private office

Locational Criteria: 1 Near Records

2 Near Detectives?

3 Near Interview Room?

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock Equipment: Computer, CATV

Furnishings: 1 Desk with return

2 Seating - 1 office with 1 guest

3 File cabinet

4 Whiteboard / Tackboard

Notes:

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Project

WAKEFIELD PUBLIC SAFETY STUDY

PROSECUTOR OFFICE

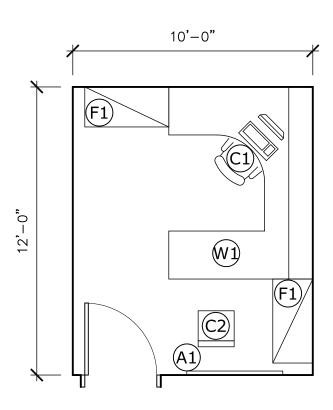
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P16



- W1 DESK WITH RETURN
- $\overline{(\mathsf{F1})}$ 2 drawer lateral file
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (A1) WHITE/TACK BOARD

Room No: SKA-P17

Description: Records Room
Current Name + Number: Records 111

Group: Public Area - Police

Quantitative Criteria: 1 269

Square feet

2 current; Plan for shared office for 3 persons

Functional Description: 1 Manages all police records including licensing

2 Handles requests for public records from various outside agencies, ensures

case folders for court are complete and accurate and filed correctly.

3 Firearms licensing4 Works with Prosecutor5 Vehicle Maintenance

Qualitative Description: 1 Shared office

Locational Criteria: 1 In administrative area

2 Near Prosecutor

Technical Criteria:

Walls: GWB

Floors: Carpet or Resilient Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Office Environment
Ventilation: Standard Office Environment
Lighting: Direct/Indirect with dimmers
Power: As required for equipment

Tel/Data: Standard Office Environment; as required for equipment

Security: Standard Office Lock

Equipment: Computer

Furnishings: 1 Files

2 Worksurfaces

3 4 chairs

Notes: 1 Two back up prosecutors who work with Prosector are located in this area



Project

WAKEFIELD PUBLIC SAFETY STUDY

RECORDS OFFICE

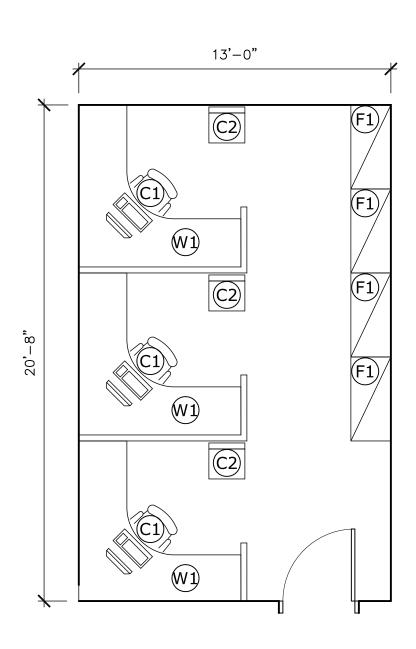
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P17



- (W1) DESK WITH RETURN
- $\overline{(F1)}$ 2 drawer lateral file
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR

Room No:

Description: Office with access to attic

Current Name + Number: Dead Storage 312

Group: Operations - Police

Quantitative Criteria: 1 0

Square feet

Functional Description: 1 Deskwork

2 Active case file storage

Qualitative Description: 1 Private office

Locational Criteria:

Technical Criteria:

1 2 3

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock
Equipment: Computer, CATV, CCTV

Furnishings: 1 Desk with return

Seating - 1 office with 1 guest chairAdjustable shelving on standards

4 Lateral file cabinet

5 Whiteboard / Tackboard

Notes: This room currently not used as an office or as Dead Stroage as noted

on plan.

Room No: SKA-P18
Description: PD Storage
Current Name + Number: PD Storage

Group: Police

Quantitative Criteria: 1 100

Square feet

Functional Description: 1 Storage

Qualitative Description: 1 Secure area

Locational Criteria: 1 Adjacent to Training/Community Room

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile

Windows: NA Plumbing NA

HVAC: Standard Storage Ventilation: Standard Storage

Lighting: Direct

Power: Standard Storage

Tel/Data: As needed

Security: Standard Storage Lock

Equipment: NA

Furnishings: 1 Shelving

Notes: Currently provided in the Training/Community Room. This space will be

relocated to another area.



Project

WAKEFIELD PUBLIC SAFETY STUDY

POLICE DEPARTMENT STORAGE

Date: 19 DECEMBER 2016

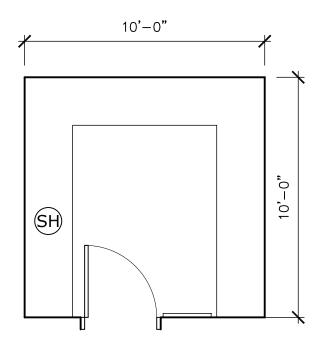
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Job num; 21608

Drawn by: NJJ

SKA-P18

100 SF



(SH) SHELVING ON STANDARDS

Room No: SKA-P19

Description: Office Supplies
Current Name + Number: Office Supplies 113

Group: Administration - Police

Quantitative Criteria: 1 48

Square feet

Functional Description: 1 Storage for office supplies

Qualitative Description: 1 Good lighting

Locational Criteria: 1 Near Administrative Assistant

Technical Criteria:

Walls: GWB

Floors: Resilient or carpet Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Storage Environment Ventilation: Standard Storage Environment

Lighting: Direct / Indirect

Power: Standard Storage Environment

Tel/Data: NA

Security: Standard Storage Lock

Equipment:

Furnishings: 1 Shelving on standards

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

OFFICE SUPPLY

Date: 19 DECEMBER 2016

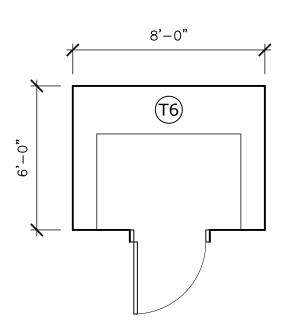
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P19

48 SF



(T6) SHELVING ON STANDARDS

Room Data

ROOM OR SPACE

Room No: SKA-P20

Description: Office Equipment / Copy

Name:

Group: Administration

Quantitative Criteria: 1 64

Square feet

Functional Description: 1 Office Equipment area

Qualitative Description: 1 Good lighting

Locational Criteria: 1 Near Administrative personnel

Technical Criteria:

Walls: GWB, Office Standard
Floors: Resilient or carpet
Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Copy/print Environment Ventilation: Standard Copy/print Environment

Lighting: Direct / Indirect

Power: Standard Copy/print Environment; plug strips
Tel/Data: Dedicated as required for equipment, standard office

Security: Standard Office Environment

Equipment: Computer, copier

Furnishings: 1 Shelving on standards

2 Storage for paper and ink

Notes: 1 Room to contain all office equipment and to be separately ventilated as

required



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WAKEFIELD PUBLIC SAFETY STUDY

COPY

Date: 19 DECEMBER 2016

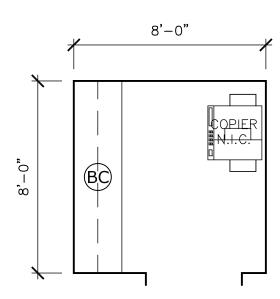
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: אנא

SKA-P20

64 SF



(BC) BASE CABINET WITH UPPER CABINETS

Room No: SKA-P21

Description: Archival Document Storage

Current Name + Number: PD Storage 316

Group: Administration - Police

Quantitative Criteria: 1 225

Square feet

Functional Description: 1 Secure storage for records

Qualitative Description: 1 Dry, well lit and secure

Locational Criteria: 1 Near administrative staff

Technical Criteria:

Walls: GWB or CMU
Floors: Resilient
Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct

Power: Standard Office Environment
Tel/Data: Standard Office Environment
Security: Standard Storage Lock

Equipment: None

Furnishings: 1 High density file storage

2 Countertop or table

3 Seating - 1 office chair

Notes: Typically archive xLF of files per year. Some records must be kept x years or

for life.



Project

WAKEFIELD PUBLIC SAFETY STUDY

ARCHIVE STORAGE

Date: 19 DECEMBER 2016

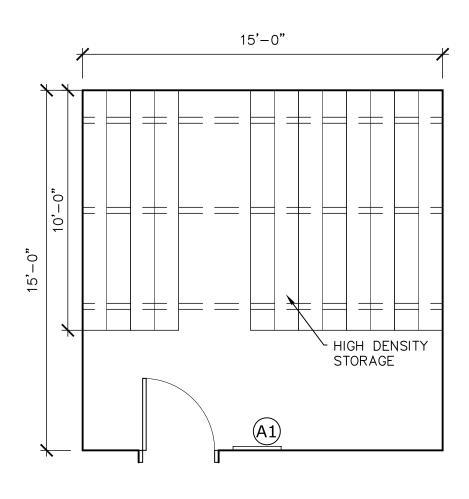
Scale: 1/4" = 1'-0"

Job num; 21608

Drawn by: NJJ

SKA-P21

225 SF



(A1) WHITE/TACK BOARD

Room No: SKA-P22

Description: Staff Toilet 2 set of 2

Current Name + Number: Men's + Women's Toilet 222 + 224 + 306 + 308

Group: Staff Support - Police

Quantitative Criteria: 1 242

Square feet (per set)

2 One per floor

Functional Description: 1 Men's and Women's Toilet

2 Fully accessible

Qualitative Description: 1 Secure

2 Good ventilation

3 Durable Materials

Locational Criteria: 1 General office area

Technical Criteria:

Walls: GWB/Ceramic Tile Floors: Ceramic Tile

Ceiling: GWB or acoustic tile

Windows: None

Plumbing: Standard Toilet Environment HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Direct/Indirect

Power: Standard Toilet Environment

Tel/Data: None

Security: Standard Toilet Room Lock

Equipment: None

Furnishings: 1 Mirror

2 Soap dispenser

Towel dispenser/trash receptacleFeminine dispenser and receptacle

5 Toilet paper dispenser

6 Coat hook

7 Shelving

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

STAFF TOILETS (1 SET OF 2)

Date: 19 DECEMBER 2016

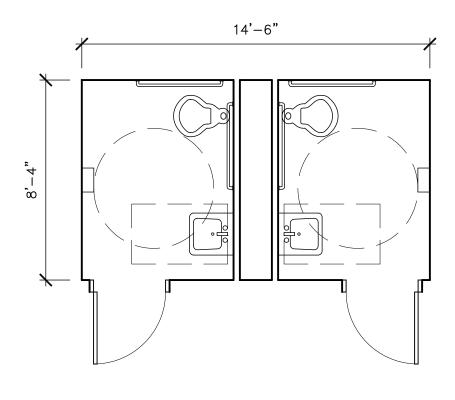
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P22

121 SF PER SET



Room No: SKA-P23
Description: **Kitchenette**

Name:

Group: Administration

Quantitative Criteria: 1 60

Square feet One per floor

Functional Description: 1 Administration / Breaks

2

Qualitative Description: 1 Off corridor in an open area

Locational Criteria: 1 Shared location

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile

Windows: NA

Plumbing: Kitchen sink

HVAC: Standard kitchen environment Ventilation: Standard kitchen environment

Lighting: Direct / Indirect

Power: Standard and as required for equipment Tel/Data: Standard and as required for equipment

Security: NA

Equipment: Undercounter refrigerator, microwave, toaster oven, coffee machine

Furnishings: 1 Wall and base cabinets

Notes:



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Project

WAKEFIELD PUBLIC SAFETY STUDY

KITCHENETTE

Date: 19 DECEMBER 2016

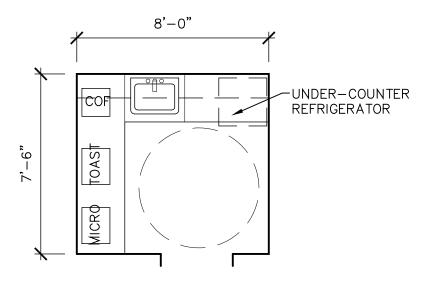
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P23

60 SF



Room No: SKA-P24

Description: Detective Commander Office - Sergeant

Current Name + Number: Sergeant Detective 303

Group: Operations - Police

Quantitative Criteria: 1 144

Square feet

Functional Description: 1 Deskwork

2 Active case file storage

Qualitative Description: 1 Private office

Locational Criteria: 1 Adjacent to Detectives

2 Accessible to interview

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock Equipment: Computer, CATV, CCTV

Furnishings: 1 Desk with return

Seating - 1 office with 2 guest chairsAdjustable shelving on standards

4 Lateral file cabinet

5 Whiteboard / Tackboard

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DETECTIVE COMMANDER - SERGEANT

Date: 19 DECEMBER 2016

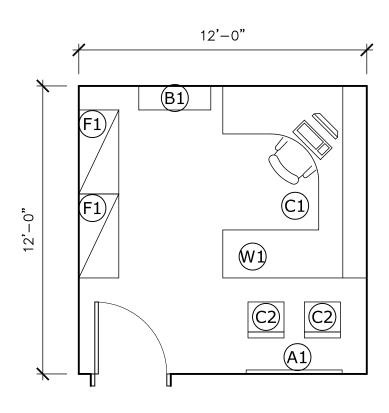
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P24

144 SF



- W1) DESK WITH RETURN
- F1) 2 DRAWER LATERAL FILE
- (C1) MANAGEMENT CHAIR
- (C2) GUEST CHAIR
- (B1) TALL BOOKCASE
- A1) WHITE / TACKBOARD

Room No: SKA-P25
Description: Detectives
Current Name + Number: Detectives 307

2

Group: Operations - Police

Quantitative Criteria: 1 574

Square feet 5 work stations

Functional Description: 1 Assist patrol with crime scene processing, case follow-up and working with

outside agencies during investigations, interviewing witnesses and suspects,

processing evidence and writing reports

2 Active case file storage

Qualitative Description: 1 Private shared office or 5. 3 current 5 in future

Locational Criteria: 1 Adjacent to Sergeant Detective

2 Accessible to interview

Technical Criteria:

Walls: GWB, Office Standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock
Equipment: Computer, CATV, CCTV

Furnishings: 1 x Desks with return

2 Seating - 1 office with 1 guest chair per detective

3 Adjustable shelving on standards

4 Lateral file cabinet

5 Whiteboard / Tackboard

Notes:

28'-0" (W1)W1 W1 (W1)C2 C2 C2 (C2) 20'-6" C3h (T3) (C2) W1 (C3) (T5) F2 (F2)

F2 4 DRAWER LATERAL FILES

T3 LARGE CONFERENCE TABLE

W1 DESK WITH RETURN

(C1) MANAGEMENT CHAIR

C2 GUEST CHAIR

C3 CONFERENCE CHAIR

WORK SURFACE WITH SHELVING ABOVE, CABINET BELOW

574 SF

Project
WAKEFIELD PUBLIC SAFETY STUDY

19 DECEMBER 2016

Date:

SKA-P25

Scale: 1/4" = 1'-0" Job num: 21608 Drawn by: NJJ

DETECTIVES

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Room No: SKA-P26

Description: Detective Interview

Current Name + Number: Interview 305

Group: Operations - Police

Quantitative Criteria: 1 110

Square feet

Functional Description: 1 Use for interviewing witnesses or detainees

2 Use for "soft" juvenile holding

3 Small meeting room

Qualitative Description: 1 Private enclosed conference area

Locational Criteria: 1 Adjacent to AV Surveillance or from detectives offices (current)

Technical Criteria:

Walls: GWB; one way glass mirror to AV Surveillance

Floors: Carpet
Ceiling: Acoustic Tile

Windows: None Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: One way glass mirror to AV Surveillance; CCTV

Furnishings: 1 Conference table

2 Seating for 4 people

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DETECTIVE INTERVIEW

Date: 19 DECEMBER 2016

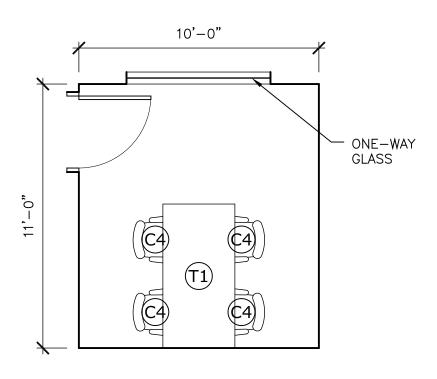
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P26

110 SF



- (71) conference table
- C4) STACKING CHAIR

Room No: SKA-P27

Description: Detective Storage
Current Name + Number: Detective Storage 302

Group: Operations - Police

Quantitative Criteria: 1 100

Square feet

Functional Description: 1 Storage for Detective's supplies

Qualitative Description: 1 Good lighting

Locational Criteria: 1 Near Detectives Offices

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Storage Environment Ventilation: Standard Storage Environment

Lighting: Direct

Power: Standard Storage Environment

Tel/Data: NA

Security: Standard Storage Lock

Equipment:

Furnishings: 1 Shelving on standards

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DETECTIVE STORAGE

Date: 19 DECEMBER 2016

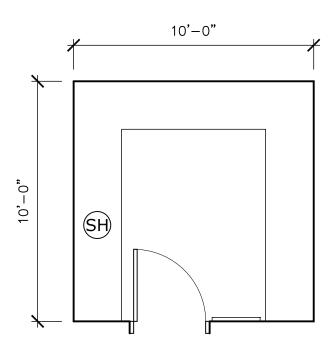
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P27

100 SF



(SH) SHELVING ON STANDARDS

Room No: SKA-P28
Description: Evidence Lab
Current Name + Number: Evidence Lab 311

Group: Operations

Quantitative Criteria: 1 144

Square feet

Functional Description: 1 Lab work

Qualitative Description: 1 Clean and secure

Locational Criteria: 1 Near detectives

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile

Windows: None Plumbing: Sink

HVAC: Standard Lab Environment; AC needs dependent upon equipment

Ventilation: Standard Lab Environment

Lighting: Direct/Indirect

Power: Standard Lab Environment
Tel/Data: Standard Lab Environment
Security: Standard Office Lock

Equipment: Fume hood, undercounter refrigerator

Furnishings: 1 Lab wall and base cabinets

2 Desk height worksurface with lab material surface

3 Seating for (2)

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

EVIDENCE LAB

Date: 19 DECEMBER 2016

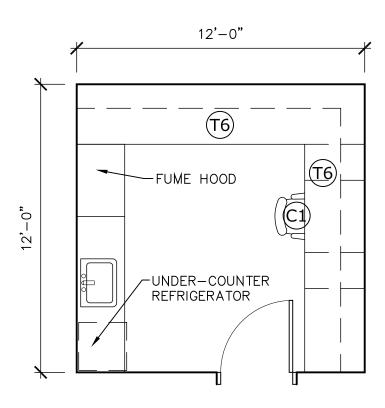
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P28

144 SF



- (C1) MANAGEMENT CHAIR
- T6 LAB BASE AND WALL CABINETS, WITH WORK SURFACE AND UNDER—COUNTER FILE CABINETS ADJACENT TO SEATING HEIGHT DESK

Room No: SKA-P29
Description: **Evidence**

Current Name + Number: General Evidence 309

Group: Operations - Police

Quantitative Criteria: 1 420

Square feet

Functional Description: 1 Deskwork - processing evidence

2 Secure transfer of evidence

3 Storage of evidence

Qualitative Description: 1 Secure storage / workroom

Locational Criteria: 1 Lockers to be easily accessible to Patrol Officers, Detectives and Sergeants

Technical Criteria:

Walls: CMU or GWB
Floors: Resilient
Ceiling: GWB
Windows: None
Plumbing: Sink

HVAC: Standard Office Environment; pressurize room - see notes below

Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment
Security: Restricted access storage lock

Equipment: CATV, computer, pass-thru evidence lockers including refrigerated locker,

refrigerator

Furnishings: 1 Desk or built-in worksurface

2 Chair3 Shelving4 Safe

5 Rifle locker

5 Whiteboard / Tackboard

Notes: Seals on doors and proper ventilation required due to possible evidence

fumes (marijuana, etc).



Project

WAKEFIELD PUBLIC SAFETY STUDY

EVIDENCE - PROCESSING / STORAGE

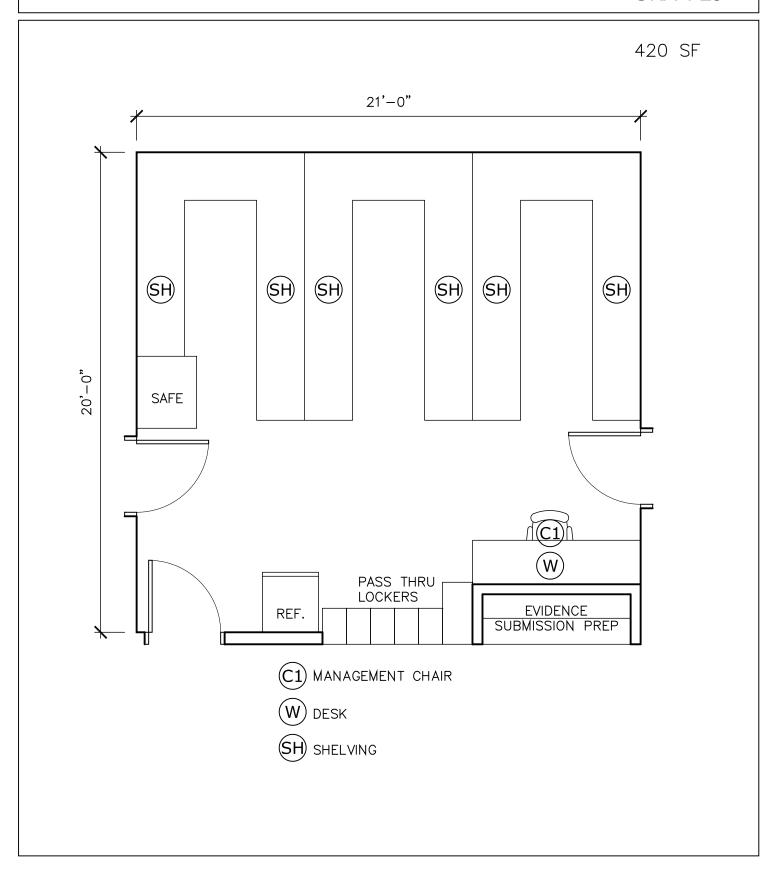
Date: MAY 2017

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P29



Room No: SKA-P30

Description: Seized Weapons Storage
Current Name + Number: Seized Weapons 309

Group: Operations - Police

Quantitative Criteria: 1 84

Square feet

Functional Description: 1 Storage of evidence

Qualitative Description: 1 Secure storage

Locational Criteria: 1 Within General Evidence Area

Technical Criteria:

Walls: CMU or GWB
Floors: Resilient
Ceiling: GWB
Windows: None
Plumbing: Sink

HVAC: Standard Office Environment; pressurize room - see notes below

Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment
Security: Restricted access storage lock

Equipment:

Furnishings: 1 Shelving

2 Rifle locker

3 Whiteboard / Tackboard

Notes: Seals on doors and proper ventilation required due to possible evidence

fumes (marijuana, etc).



Project

WAKEFIELD PUBLIC SAFETY STUDY

SEIZED WEAPONS

Date: 19 DECEMBER 2016

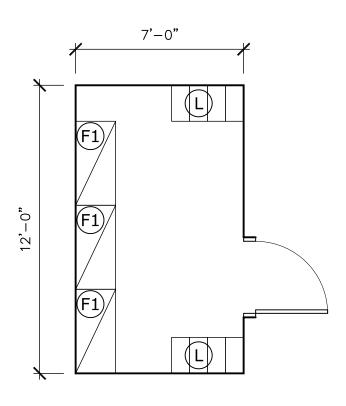
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P30

84 SF



- F1) 2 DRAWER LATERAL FILE
- L) LOCKERS

Room No: SKA-P31

Description: Drug Evidence Storage

Current Name + Number: Drugs 310

Group: Operations - Police

Quantitative Criteria: 1 100

Square feet

Functional Description: 1 Storage of evidence

Qualitative Description: 1 Secure storage

Locational Criteria: 1 Within General Evidence Area

Technical Criteria:

Walls: CMU or GWB
Floors: Resilient
Ceiling: GWB
Windows: None
Plumbing: Sink

HVAC: Standard Office Environment; pressurize room - see notes below

Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment
Security: Restricted access storage lock

Equipment:

Furnishings: 1 Shelving

2 Whiteboard / Tackboard

Notes: Seals on doors and proper ventilation required due to possible evidence

fumes (marijuana, etc).



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WAKEFIELD PUBLIC SAFETY STUDY

DRUG EVIDENCE STORAGE

Date: MAY 2017

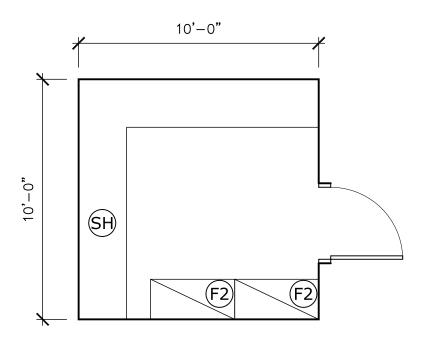
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P31

100 SF



- SH) SHELVING ON STANDARDS
- F2) 4 DRAWER LATERAL FILE CABINET

Room No: SKA-P32

Description: Sally Port / Impound Bay

Current Name + Number: Sally Port 235

Group: Detention - Police

Quantitative Criteria: 1 1152

Square feet

2 (2) bays; 18' x 30'

Functional Description: 1 Secure internal location for transfering detainees to lock-up

2 Secure vehicle impound area

Qualitative Description: 1 Durable materials easy to clean and maintain

2 Good air quality

Locational Criteria: 1 Direct access to Booking

2 Direct access to Bulk Evidence

3 Good access to exterior

Technical Criteria:

Walls: CMU

Floors: Epoxy Resin or Concrete with non slip surface

Ceiling: Exposed to structure

Windows: None

Plumbing: Floor drains; eyewash

HVAC: No air conditioning; Standard environment

Ventilation: Standard garage and emergency CO monitor and vent system

Lighting: Direct

Power: Standard environment Tel/Data: Required: 2 locations

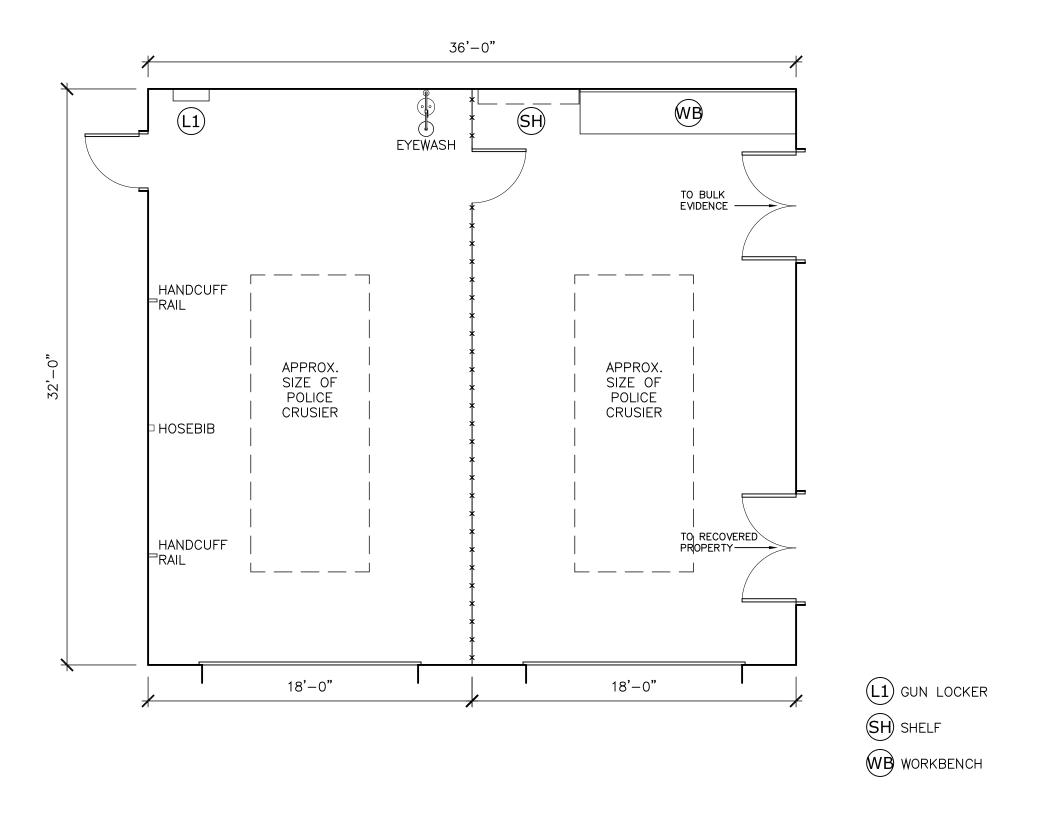
Security: Locked; overhead doors to have multiple systems for closing down doors Equipment: Air and water lines; overhead door controls; wire mesh partition with lockable

gate separating bays

Furnishings: 1 Pistol locker for (4)

2 Hanging rack for brooms, shovels

Notes: Size one bay to fit FD Ambulance for transfer sick/injured detainees



Scale: 3/16" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P32

WAKEFIELD PUBLIC SAFETY STUDY

SALLY PORT / IMPOUND BAY

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Room No: SKA-P33

Description: Recovered Property
Current Name + Number: Recovered Property 135

Group: Detention - Police

Quantitative Criteria: 1 160

Square feet

Functional Description: 1 Storage area for found property

Qualitative Description: 1 Secure area

Locational Criteria: 1 Adjacent to garage

2 Adjacent to Sallyport or Impound bay

Technical Criteria:

Walls: GWB
Floors: Concrete
Ceiling: GWB
Windows: NA
Plumbing: NA

HVAC: Standard Storage Environment
Ventilation: Standard Storage Environment
Lighting: Direct/Indirect with dimmers
Power: Standard Storage Environment
Tel/Data: Standard Storage Environment
Security: Standard Storage Room Lock

Equipment: Computer

Furnishings: 1 Shelving

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

RECOVERED PROPERTY

Date: 19 DECEMBER 2016

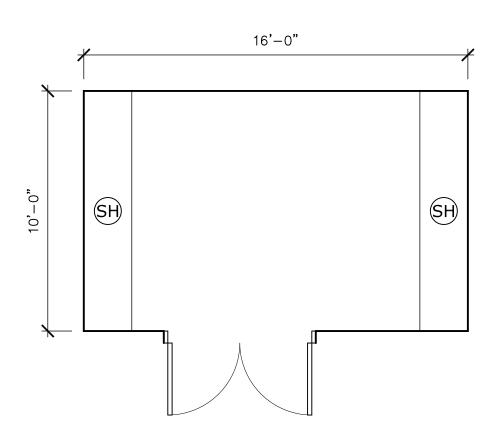
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P33

160 SF



(SH) SHELVING ON STANDARDS

Room No: SKA-P34

Description: Bulk Evidence Storage

Current Name + Number: Storage 237

Group: Detention - Police

Quantitative Criteria: 1 160

Square feet

Functional Description: 1 Secure storage of large evidence

Qualitative Description: 1 Secure storage

Locational Criteria: 1 Accessible off Sally Port

Technical Criteria:

Walls: CMU

Floors: Epoxy resinous or concrete with hardener / sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard Storage Environment Ventilation: Standard Storage Environment

Lighting: Direct

Power: Standard Storage Environment
Tel/Data: Standard Storage Environment
Security: Restricted access storage lock

Equipment: NA

Furnishings: 1 Shelving on standards

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

BULK EVIDENCE

Date: 19 DECEMBER 2016

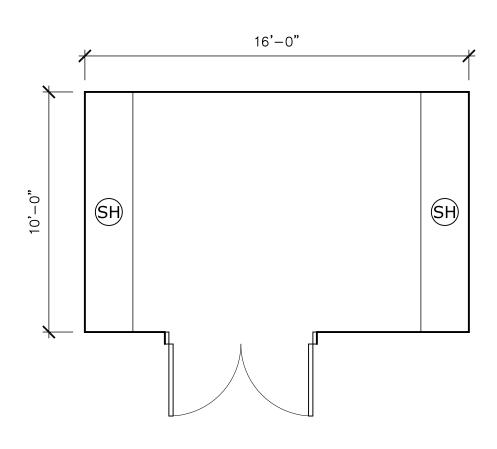
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P34

160 SF



(SH) SHELVING ON STANDARDS

Room No: SKA-P35

Description: Booking Holding

Current Name + Number:

Group: Detention - Police

Quantitative Criteria: 1 72

Square feet

Functional Description: 1 Secure holding for detainees prior to booking

Qualitative Description: 1 Good Lighting

2 Durable, easy to clean materials

3 Secure

Locational Criteria: 1 Adjacent to Sally Port

2 Adjacent to detention cells

3 Adjacent to Booking

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous

Ceiling: GWB

Windows: View window from Booking Area

Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: Standard environment
Tel/Data: Standard environment
Security: Standard detention locks
Equipment: Emergency buttons

Furnishings: 1 Steel bench with handcuff rail

2 Handcuff rails

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

HOLDING BOOKING

Date: 19 DECEMBER 2016

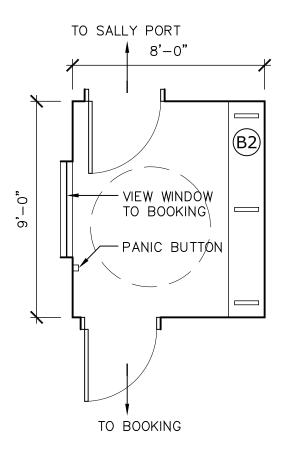
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Job num: 21608

Drawn by: ננא

SKA-P35

72 SF



(B2) BENCH WITH HANDCUFF RAILS

Room No: SKA-P36
Description: Booking
Current Name + Number: Booking 228

Craum: Detection Police

Group: Detention - Police

Quantitative Criteria: 1 325

Square feet

Functional Description: 1 Processing of detainees

2 Fingerprinting

3 Photographing mug shots

4 Breathylizer testing

Qualitative Description: 1 Good Lighting

2 Durable, easy to clean materials

3 Secure

Locational Criteria: 1 Adjacent to Sally Port

2 Adjacent to detention cells

3 Adjacent to Holding

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous

Ceiling: GWB Windows: None

Plumbing: Handwash sink

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct/Indirect

Power: Standard environment
Tel/Data: Standard environment
Security: Standard detention locks

Equipment: Computer, CCTV, breathylizer, digital fingerprint desktop device, camera,

base cabinets with locks and heavy duty hardware including integral pulls,

storage lockers for detainees

Furnishings: 1 Steel bench with handcuff rail

2 Handcuff rails

Notes: One booking station?



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WAKEFIELD PUBLIC **SAFETY STUDY**

BOOKING

Date: 19 DECEMBER 2016

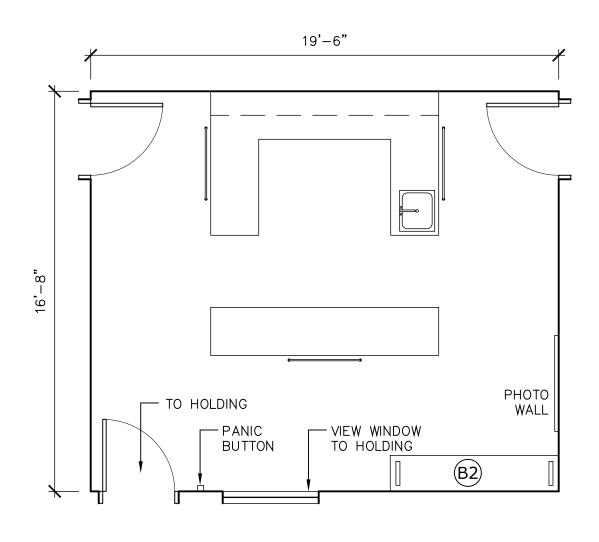
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P36

325 SF



(B2) BENCH WITH HANDCUFF RAILS

Wakefield Public Safety Wakefield, Massachusetts

Room Data

ROOM OR SPACE

Room No:

Description: Booking Desk COMBINE WITH BOOKING

Current Name + Number: Booking Desk 226

Group: Detention - Police

Quantitative Criteria: 1 0

Square feet

Functional Description: 1

Qualitative Description: 1

Locational Criteria: 1

Technical Criteria:

Walls:

Floors:

Ceiling:

Windows:

Plumbing:

HVAC:

Ventilation:

Lighting:

Power:

Tel/Data:

Security:

Equipment:

Furnishings: 1

Notes:

Room No: SKA-P37

Description: Interview Room

Current Name + Number: Attorney Interview 238

Group: Detention - Police

Quantitative Criteria: 1 120

Square feet

Functional Description: 1 Use for interviewing detainees

2 Use for "soft" juvenile holding

Qualitative Description: 1 Private enclosed conference area

Locational Criteria: 1 Adjacent to AV Surveillance

Technical Criteria:

Walls: GWB; one way glass mirror to AV Surveillance

Floors: Resilient
Ceiling: Acoustic Tile

Windows: NA Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: One way glass mirror to AV Surveillance; CCTV

Furnishings: 1 Conference table

2 Seating for 4 people

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DETENTION INTERVIEW ROOM

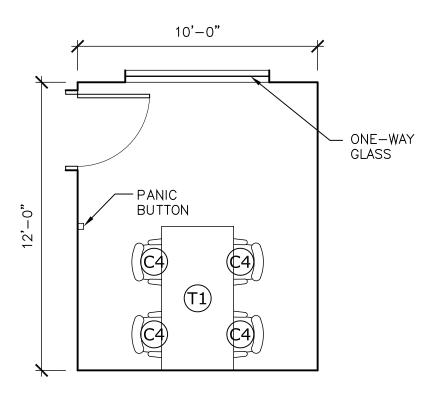
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P37



- T1) CONFERENCE TABLE
- C4) STACKING CHAIR

Room No: SKA-P38

Description: Detention AV Surveillance

Name:

Group: Detention - Police

Quantitative Criteria: 1 80

Square feet

Functional Description: 1 Audio and video surveillance of interview room

2 Direct surveillance of interview room through one-way glass

Qualitative Description: 1 Secure workroom for video equipment

Locational Criteria: 1 Adjacent to Interview Room

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile
Windows: One way mirror

Plumbing: NA

HVAC: Standard Office Environment; AC needs dependent upon equipment

Ventilation: Standard Office Environment

Lighting: Direct/Indirect but keep light levels low for use with one-way glass

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Standard Office Lock

Equipment: One way glass mirror to Interview Room; head end for all surveillance

(building, cells, interview room, etc)

Furnishings: 1 Base and wall cabinets

2 Seating for (2)

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DETENTION AV SURVEILLANCE

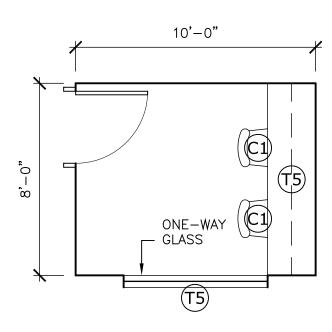
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P38



- T5) WORKSURFACE
- (C1) MANAGEMENT CHAIR

Room No: SKA-P39

Description: Detainee Shower

Current Name + Number: Shower 239

Group: Detention - Police

Quantitative Criteria: 1 43

Square feet

Functional Description: 1 Shower facility for detainees

Qualitative Description: 1 Durable, easy to clean materials

2 Secure

3 Suicide resistant

4 Sight / sound separation between males, females

Locational Criteria: 1 Adjacent to Booking

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous; pitch to floor drain

Ceiling: GWB Windows: None

Plumbing: Standard penal shower fixture
HVAC: Standard detention environment
Ventilation: Standard detention environment

Lighting: Direct
Power: None
Tel/Data: None

Security: Standard detention locks

Equipment:

Furnishings:

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

DETAINEE SHOWER

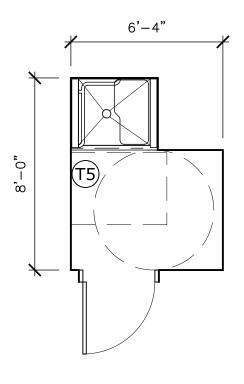
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P39



Room No: SKA-P40

Description: Detention Cell - Juvenile

Current Name + Number: Juvenile Cells 229 - Cells 1 + 2

Group: Detention - Police

Quantitative Criteria: 1 72

Square feet

2 (1) cells at 72 square feet each

Functional Description: 1 Single occupancy lock-up for juvenile detainee

Qualitative Description: 1 Durable, easy to clean materials

2 Secure

3 Suicide resistant

4 Sight / sound separation between males, females

Locational Criteria: 1 Adjacent to Booking

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous; pitch to floor drain outside cell

Ceiling: Steel plate Windows: None

Plumbing: Standard penal fixture (HC accessible); floor drain outside cell HVAC: Standard detention environment; suicide resistant grilles/registers Ventilation: Standard detention environment; suicide resistant grilles/registers

Lighting: Direct; suicide resistant

Power: None Tel/Data: None

Security: Standard cell doors/locks

Equipment: Video / audio monitoring; cell check outside

Furnishings: 1 Steel bench with skirt to floor

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

JUVENILE DETENTION CELL

Date: 19 DECEMBER 2016

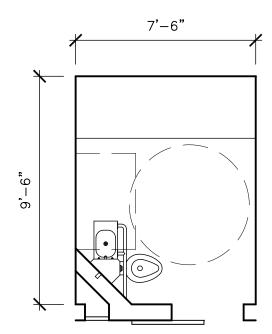
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Job num; 21608

Drawn by: NJJ

SKA-P40

72 SF PER CELL



Room No: SKA-P41

Description: Detention Cell - Female

Current Name + Number: Female Cells 232 - Cell 3 + 4

Group: Detention - Police

Quantitative Criteria: 1 144

Square feet

2 (2) cells at 72 square feet each

Functional Description: 1 (2) Single occupancy lock-up for female detainees

Qualitative Description: 1 Durable, easy to clean materials

2 Secure

3 Suicide resistant

4 Sight / sound separation between males, females

Locational Criteria: 1 Adjacent to Booking

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous; pitch to floor drain outside cell

Ceiling: Steel plate Windows: None

Plumbing: Standard penal fixture (one HC accessible); floor drain outside cell HVAC: Standard detention environment; suicide resistant grilles/registers Ventilation: Standard detention environment; suicide resistant grilles/registers

Lighting: Direct; suicide resistant

Power: None Tel/Data: None

Security: Standard cell doors/locks

Equipment: Video / audio monitoring; cell check outside

Furnishings: 1 Steel bench with skirt to floor

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

FEMALE DETENTION CELLS

Date: 19 DECEMBER 2016

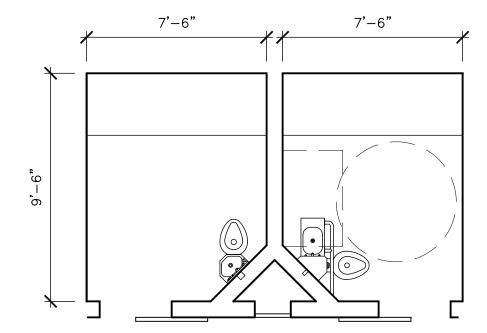
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P41

72 SF PER CELL



Room No: SKA-P42

Description: Detention Cell - Male

Current Name + Number: Male Cells 240 - Cells 5, 6, 7, 8, 9 + 10

Group: Detention - Police

Quantitative Criteria: 1 288

Square feet

2 (4) cells at 72 square feet each

Functional Description: 1 (4) Single occupancy lock-up for male detainee

Qualitative Description: 1 Durable, easy to clean materials

2 Secure

3 Suicide resistant

4 Sight / sound separation between males, females

Locational Criteria: 1 Adjacent to Booking

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous; pitch to floor drain outside cell

Ceiling: Steel plate Windows: None

Plumbing: Standard penal fixture (one HC accessible); floor drain outside cell HVAC: Standard detention environment; suicide resistant grilles/registers Ventilation: Standard detention environment; suicide resistant grilles/registers

Lighting: Direct; suicide resistant

Power: None Tel/Data: None

Security: Standard cell doors/locks

Equipment: Video / audio monitoring; cell check outside

Furnishings: 1 Steel bench with skirt to floor

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

MALE DETENTION CELLS

Date: 19 DECEMBER 2016

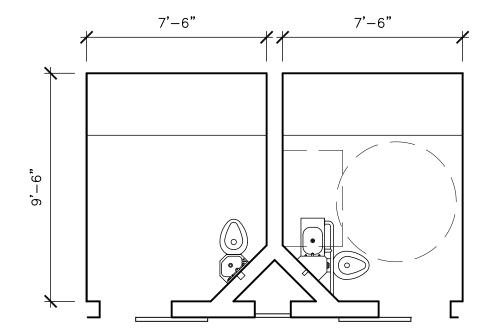
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P42

72 SF PER CELL



Room No: SKA-P43

Description: Booking Storage
Name: Booking Storage 228A

Group: Detention - Police

Quantitative Criteria: 1 36

Square feet

Functional Description: 1 Stores personal belongings of detainees

2 Storage for detention area (bedding, jumpsuits, cuffs, leg irons, toilet paper,

cleaning supplies, etc.)

Qualitative Description: 1 Good Lighting

2 Secure

Locational Criteria: 1 Adjacent to Booking

Technical Criteria:

Walls: CMU

Floors: Epoxy Resinous

Ceiling: GWB Windows: None Plumbing: None

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: Standard environment
Tel/Data: Standard environment
Security: Standard storage locks

Equipment: None

Furnishings: 1 Lockers

2 Shelving

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

DETENTION STORAGE

Date: 19 DECEMBER 2016

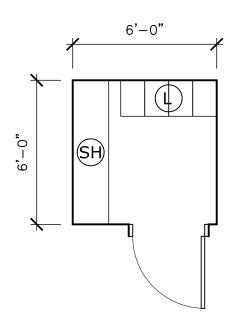
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P43

36 SF



SH) SHELVING

L LOCKERS

Room No: SKA-P44
Description: Roll Call
Current Name + Number: Roll Call 104

Group: Operations - Police

Quantitative Criteria: 1 352

Square feet

Functional Description: 1 Meet for roll call each shift (12 officers and dispatchers)

Qualitative Description: 1 Enclosed meeting space

Locational Criteria: 1 Adjacent to locker area

2 Close proximity to exit and parking

3 Adjacent to Report Writing

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct / Indirect

Power: Standard and as required for equipment Tel/Data: Standard and as required for equipment

Security: NA

Equipment: Large Screen TV/SMART BoardCATV, Video,

Furnishings: 1 (12) chairs without arms

2 Tables

3 Whiteboard / Tackboard

4 Lecturn

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

ROLL CALL ROOM

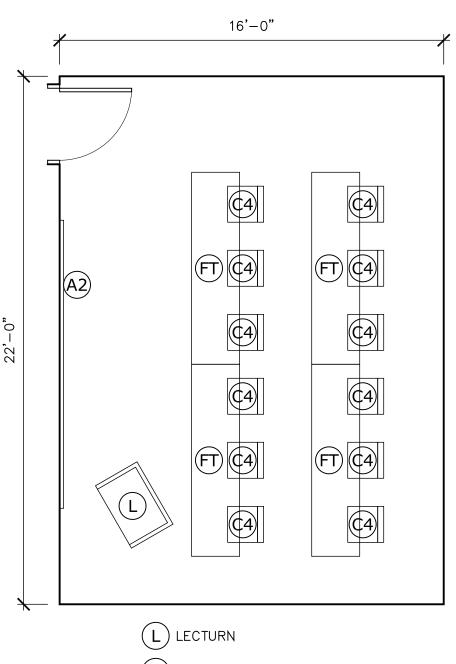
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P44



- A2) SMARTBOARD
- (C4) STACKING CHAIR ROLL / LUNCH (12)
- FT FOLDING TRAINING TABLES (4)

Room No: SKA-P45

Description: Report Writing
Current Name + Number: Report Writing 106

Group: Operations - Police

Quantitative Criteria: 1 100

Square feet

2 Provide space for 4 people and shared work/meeting area

Functional Description: 1 Deskwork

Qualitative Description: 1 Shared space for writing reports

2 File storage for patrol staff

Locational Criteria: 1 Near Roll Call

2 Close proximity to Communications

Technical Criteria:

Walls: GWB
Floors: Carpet
Ceiling: Acoustic Tile
Windows: Preferred

Plumbing: Standard Office Environment HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Direct/Indirect

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: NA Equipment: Computer

Furnishings: 1 4 worksurfaces, overhead bins

2 (4) chairs

3 Whiteboard / Tackboard

4 File cabinets

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

REPORT WRITING

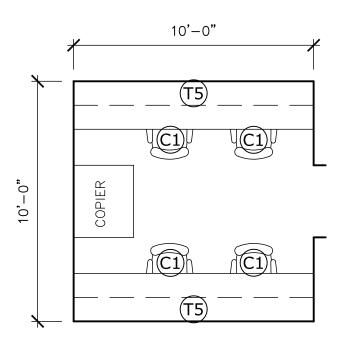
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P45



- C1) MANAGEMENT CHAIR
- (T5) WORKSURFACE WITH SHELVING

Room No: SKA-P46

Description: K9 Operations and Office

Name:

Group: Operations - Police

Quantitative Criteria: 1 100

2 Secure aea for cleaning / maintaining weapons

Qualitative Description: 1 Clean work area

Locational Criteria: 1 Flexible

Technical Criteria:

Walls: GWB to underside of deck

Floors: Resilient

Ceiling: GWB to underside of deck or GWB

Windows: NA Plumbing: NA

HVAC: Standard Environment Ventilation: Standard Environment

Lighting: Direct/Indirect

Power: Standard Environment Tel/Data: Standard Environment

Security: NA

Equipment: Computer

Furnishings: 1 Adjustable shelving for supplies

2 Whiteboard / Tackboard

3 Desk

4 Chair

5 Dog cage

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

K9 OFFICE

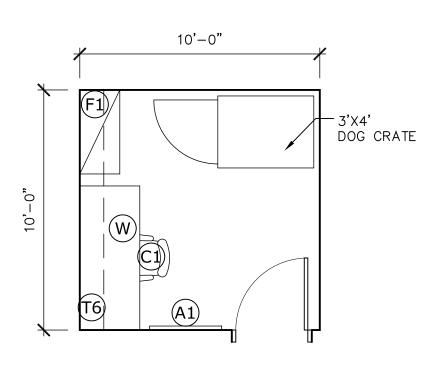
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P46



- W) DESK
- (C1) MANAGEMENT CHAIR
- F1) 2 DRAWER WL
- T6) SHELVING ON STANDARDS
- (A1) WHITE / TACK

Room No: SKA-P47

Description: Police Patrol Storage
Name: Currently do not have
Group: Operations - Police

Quantitative Criteria: 1 100

Square feet

Functional Description: 1 Storage for patrol officer's supplies (medical supplies, gloves, citations, crime

scene tape, etc.)

Qualitative Description: 1 Storage

Locational Criteria: 1 Adjacent to OIC

Technical Criteria:

Walls: GWB, office standard

Floors: Carpet
Ceiling: Acoustic Tile
Windows: Required
Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct/Indirect

Power: Standard environment
Tel/Data: Standard environment
Security: Standard Office Lock
Equipment: Radio Chargers

Furnishings: 1 Adjustable shelving for supplies and chargers

2 Whiteboard / Tackboard

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

PATROL STORAGE

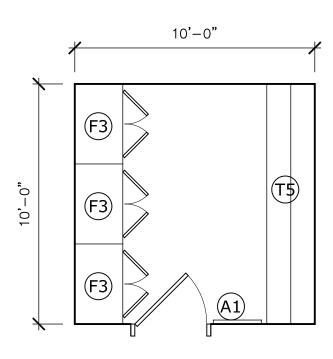
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-P47



- (A1) WHITE/TACKBOARD
- T5 WORKSURFACE WITH SHELVING
- F3) CABINETS

Room No: SKA-P48 Description: **Armorer**

Name: **Patrol Bicylces 236**Group: Operations - Police

Quantitative Criteria: 1 250

Square feet

Functional Description: 1 Secure storage of guns and ammuniction

2 Secure aea for cleaning / maintaining weapons

Qualitative Description: 1 Secure storage / workroom

Locational Criteria: 1 Flexible

Technical Criteria:

Walls: GWB to underside of deck

Floors: Resilient

Ceiling: GWB to underside of deck; GWB

Windows: NA Plumbing: Sink

HVAC: Standard Environment Ventilation: Standard Environment

Lighting: Direct/Indirect

Power: Standard Environment
Tel/Data: Standard Environment

Security: Standard Storage Lock with card access

Equipment: Speaker

Furnishings: 1 Adjustable shelving

2 Whiteboard / Tackboard

3 Built in worksurface - stainless

4 Chair

5 Full size gun safe

6 Lockers

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

ARMORER

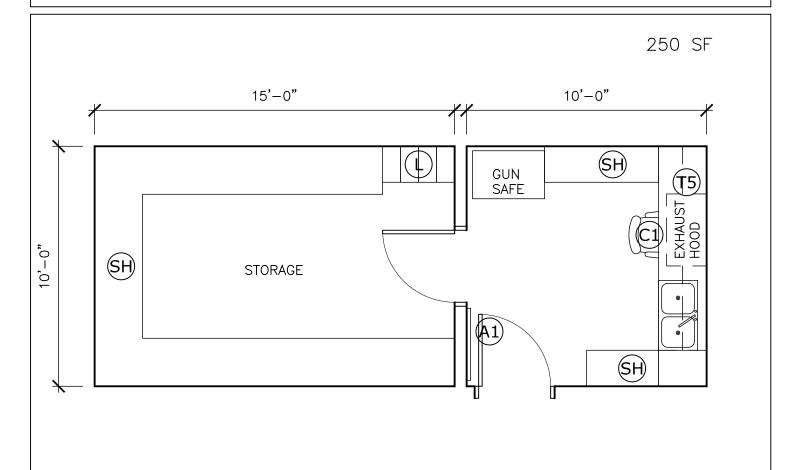
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ענא

SKA-P48



- A1) WHITEBOARD/TACKBOARD
- T5) WORKBENCH WITH SHELVES ABOVE
- (C1) MANAGEMENT CHAIR
- SH) SHELVING ON STANDARDS
- (L) LOCKERS

Room No: SKA-P49
Description: Lunch Room
Current Name + Number: Lunch Room 107

Group: Staff Support

Quantitative Criteria: 1 234

Square feet

Functional Description: 1 Staff lunch / Breaks

Qualitative Description: 1 Comfortable area

Locational Criteria: 1 Flexible location; main level preferred

Technical Criteria:

Walls: GWB
Floors: Resilient
Ceiling: Acoustic Tile

Windows: Preferred not required

Plumbing: Kitchen sink

HVAC: Standard Lunchroom environment Ventilation: Standard Lunchroom environment

Lighting: Direct / Indirect

Power: Standard and as required for equipment Tel/Data: Standard and as required for equipment

Security: NA

Equipment: Refrigerator, microwave, toaster oven, coffee machine, vending machines

Furnishings: 1 (4-6) chairs

2 Table

3 Wall and base cabinets

4 Built in recycling / trash cabinet with doors allowing for roll-out waste

containers

Notes:



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Project

WAKEFIELD PUBLIC **SAFETY STUDY**

LUNCH ROOM

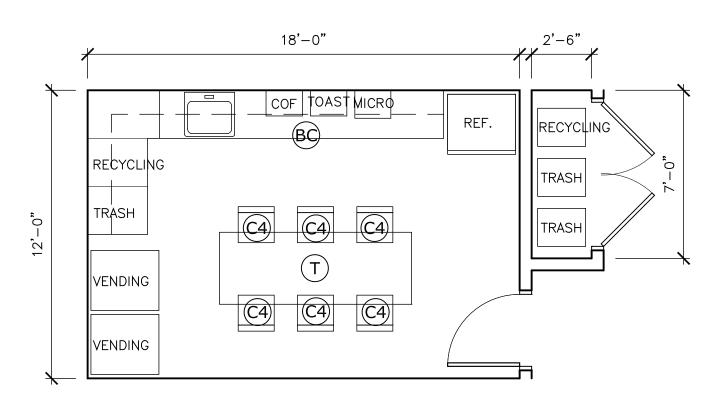
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: און

SKA-P49



- DINING CHAIR
- DINING TABLE
- (BC) BASE CABINET WITH UPPER CABINETS

Room No: SKA-P50

Description: Women's Locker
Current Name + Number: Women's Locker 108

Group: Staff Support - Police

Quantitative Criteria: 1 525

Square feet

Functional Description: 1 Toilet / Shower / Lavatory / Locker

Qualitative Description: 1 Multiple occupant space

2 Secure

3 Good ventilation4 Durable Materials

Locational Criteria: 1 Near Roll Call Room

Technical Criteria:

Walls: GWB with epoxy paint; Ceramic Tile wainscot

Floors: Ceramic Tile or Resinous flooring

Ceiling: Acoustic Tile and GWB

Windows: None

Plumbing: Standard Toilet Environment HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Direct/Indirect

Power: Standard Toilet Environment

Tel/Data: One outlet

Security: Standard Toilet Room Lock
Equipment: Speakers for radio monitoring

Furnishings: 1 Mirrors

2 Soap dispensers

- 3 Towel dispenser/trash receptacle
- 4 Toilet paper dispensers
- 5 Showers with bench seats
- 6 Clothing hooks
- 7 Feminine napkin disposal
- 8 10 Lockers 24"D x 36"W with slope tops, double doors, outlets, boot

storage, drawer below and integral bench

Notes:



Project

WAKEFIELD PUBLIC SAFETY STUDY

TOILET / SHOWER / LOCKER ROOM FEMALE

Date: 19 DECEMBER 2016

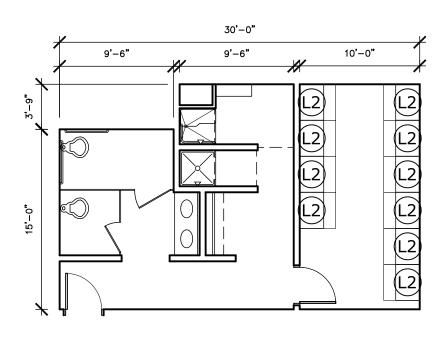
Scale: 1/8" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P50

525 SF



(10) 24"D X 36"W LOCKER WITH INTREGAL 12"X36" BENCH

Room No: SKA-P51
Description: Men's Locker
Current Name + Number: Men's Locker 105

Group: Staff Support - Police

Quantitative Criteria: 1 2161

Square feet

Functional Description: 1 Toilet / Shower / Lavatory / Locker

Qualitative Description: 1 Multiple occupant space

2 Secure

3 Good ventilation4 Durable Materials

Locational Criteria: 1 Adjacent to Squad Room

Technical Criteria:

Walls: GWB with epoxy paint; Ceramic Tile wainscot

Floors: Ceramic Tile or Resinous flooring

Ceiling: Acoustic Tile and GWB

Windows: None

Plumbing: Standard Toilet Environment HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Direct/Indirect

Power: Standard Toilet Environment

Tel/Data: One outlet

Security: Standard Toilet Room Lock
Equipment: Speakers for radio monitoring

Furnishings: 1 Mirrors

2 Soap dispensers

- 3 Towel dispenser/trash receptacle
- 4 Toilet paper dispensers
- 5 Showers with bench seats
- 6 Clothing hooks
- 7 To Lockers 24"D x 36"W with slope tops, double doors, outlets, boot

storage, drawer below and integral bench

Notes:

(70) 24"D X 36"W LOCKER WITH INTREGAL 12"X36" BENCH

(LB) 9" X 42" LOCKER ROOM BENCH

Project
WAKEFIELD PUBLIC SAFETY STUDY

TOILET / SHOWER / LOCKER ROOM MALE

19 DECEMBER 2016

Scale: 1/8" = 1'-0' Job num: 21608

Drawn by: NJJ SKA-P51

Project

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Room No: SKA-P52

Description: Fitness Room (Currently Shared with FD)

Current Name + Number: Fitness 247

Group: Staff Support - Police

Quantitative Criteria: 1 500

Square feet

Functional Description: 1 Exercise room

Qualitative Description: 1 Good ventilation

2 Easy to maintain/clean

3 Comfortable relaxed environment

Locational Criteria: 1 Centrally located

2 Near locker rooms

Technical Criteria:

Walls: GWB and 8' high mirrors on two wall

Floors: Rubber athletic flooring

Ceiling: Acoustic Tile; Consider height for overhead lifts and raised equipment

Windows: Preferred
Plumbing: NA
HVAC: Standard
Ventilation: Standard
Lighting: Direct/Indirect
Power: Standard
Tel/Data: Standard

Security: Standard office lock Equipment: CATV; Panic Button

Furnishings: 1 Treadmill

2 Stairmaster

3 Exercise Bicycle

4 Free Weights

5 Universal

Notes: 1 This space is currently shared with the FD

2 PD will use this space for defensive tactics training?

3 DT State requirement

4 Storage space for mat system for DT training.



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WAKEFIELD PUBLIC **SAFETY STUDY**

FITNESS ROOM

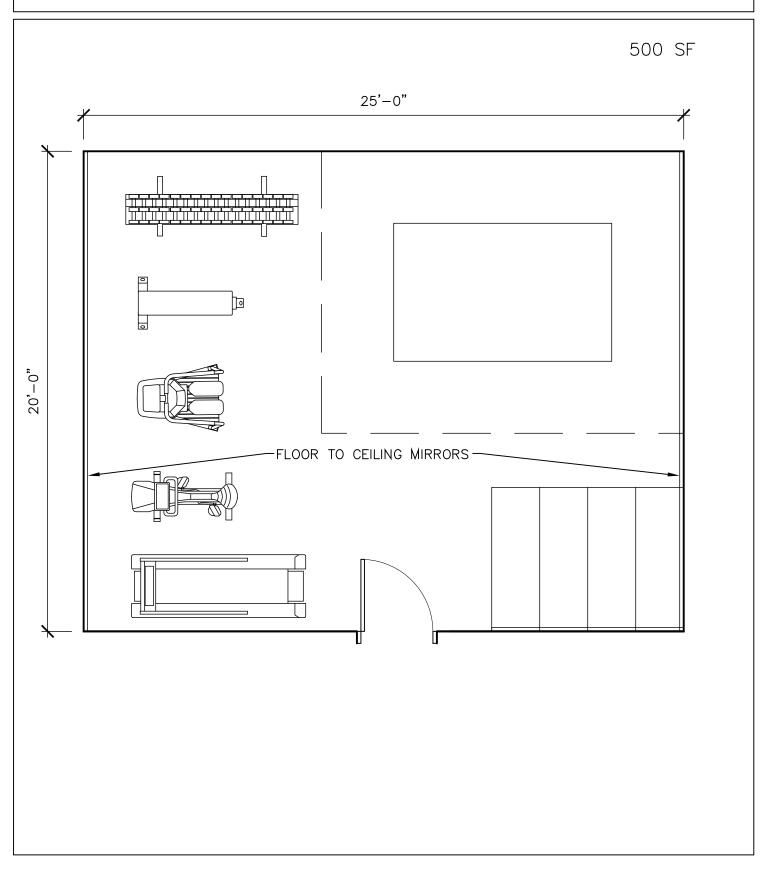
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-P52



Room No: SKA-P53

Description: Garage (FD has 3 spaces)

Current Name + Number: Garage 137

Group: Staff Support - Police

Quantitative Criteria: 1 8450

Square feet

Functional Description: 1 26 Police vehicles

2 Bulk Storage

Qualitative Description: 1 Secure area

Locational Criteria: 1 Adjacent to stair and elevator core

Technical Criteria:

Walls: CMU

Floors: Epoxy Resin or Concrete with non slip surface

Ceiling: Exposed to structure

Windows: None

Plumbing: Floor drains; eyewash

HVAC: No air conditioning; Standard environment

Ventilation: Standard garage and emergency CO monitor and vent system

Lighting: Direct

Power: Standard garage environment

Tel/Data: Required: 2 locations

Security: Locked; overhead doors to have multiple systems for closing down doors to

limit access

Equipment: Air and water lines; overhead door controls; wire mesh partition with lockable

gates

Furnishings: 1 NA

Notes: 1 The Town would like to explore the removal of columns to make more

room for vehicles as the space between columns is tight for the

vehicles currently used by the PD.

2 This space is currently used primarily by the PD with the FD occupying

3 parking spaces.

3 Any new structure would be planned with consideration of patrol

vehicle sizes and the need to move quickly

Date: 19 DECEMBER 2016

Scale: 1/16" = 1'-0"

Job num: 21608

Drawn by: NJ

SKA-P53

WAKEFIELD PUBLIC SAFETY STUDY

GARAGE

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130'-0" 20,-0" 65'-0" 25'-0" 20,-0"

8,450 SF

Room No: SKA-P54

Description: Bicycle Storage
Name: Bike Storage 136
Group: Staff Support - Police

Quantitative Criteria: 1 160

Square feet

Functional Description: 1 Storage of bicycles

Qualitative Description: 1 Secure storage

Locational Criteria: 1 At garage

Technical Criteria:

Walls: CMU or high impact GWB

Floors: Epoxy resinous or concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard garage environment Ventilation: Standard garage environment

Lighting: Direct

Power: Standard garage environment

Tel/Data: None

Security: Standard storage lock

Equipment:

Furnishings: 1

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

PATROL BICYCLE STORAGE

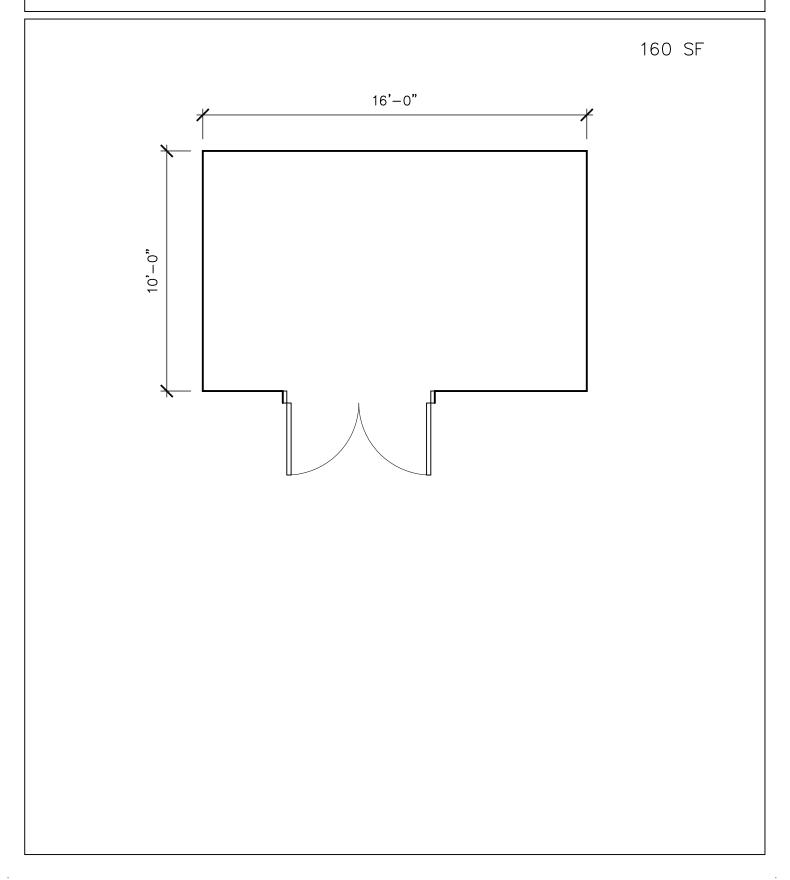
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ענא

SKA-P54



Room No: SKA-P55

Description: Indoor Shooting Range

Name:

Group: Staff Support - Police

Quantitative Criteria: 1 1440

Square feet

Functional Description: 1 Practice skills

Qualitative Description: 1 Safe controlled environment

Sound controlled environmentAir quality critical environment

Locational Criteria: 1 Flexible

Technical Criteria:

Walls: Concrete; Richochet impact product; CMU

Floors: Concrete

Ceiling: Concrete; Richochet impact product

Windows: NA

Plumbing:

HVAC: Special systems to deal with explosive and hazardous components; fumes

and dust released

Ventilation: Lead dust evacuation

Lighting: Ambient and trageted lighting with glare reducing lenses

Power: As needed to handle communications systems and toa drress standard

needs

Tel/Data: Standard
Security: Secure room
Equipment: Speciality Signage

Furnishings: 1 Firing range target system

2 Ballistic Baffles3 Shooting booth

Notes: Approx 120' x 12

Date: 19 DECEMBER 2016

Scale: 1/16" = 1'-0"

Job num: 21608

Drawn by: NJ

SKA-P55

100'-0" 20'-0" 12'-0"

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WAKEFIELD PUBLIC SAFETY STUDY

INDOOR SHOOTING RANGE

1,440 SF

Room No: SKA-SUP1
Description: Janitors Closet
Current Name + Number: Janiotrs Closet 227

Group: Support

Quantitative Criteria: 1 38

Square feet

2 1 required per floor (see notes)

Functional Description: 1 House janitorial supplies

2 Workspace for facilities maintenance staff

Qualitative Description: 1 Durable materials

Locational Criteria: 1 One required per level

Technical Criteria:

Walls: Moisture Resistant GWB Floors: Ceramic Tile, resinous

Ceiling: GWB Windows: None

Plumbing: Standard Janitors Environment
HVAC: Standard Toilet Environment
Ventilation: Standard Toilet Environment

Lighting: Direct

Power: Standard Toilet Environment

Tel/Data: None

Security: Standard Lock

Equipment: None

Furnishings: 1 Janitors sink or mop sink

2 Rack for mops, brooms etc.

3 Shelving

Notes: Per Code, one Janitor's closet required per floor.



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WAKEFIELD PUBLIC SAFETY STUDY

JANITOR'S CLOSET

Date: 19 DECEMBER 2016

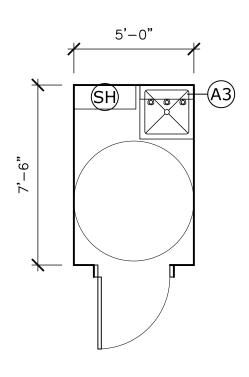
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-SUP01

38 SF



- SH) SHELVING ON STANDARDS
- (A3) MOP/BROOM HOLDER WITH SHELF

Room No: SKA-SUP2

Description: Mechanical Room

Current Name + Number: Boiler 204 + Fan Room 318

Group: Support

Quantitative Criteria: 1 400

Square feet

Functional Description: 1 Room for mechancial equipment

Qualitative Description: 1 Service type room

Locational Criteria: 1 Central in building

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock
Equipment: Mechanical Equipment

Furnishings: 1 None

Notes: 1 Double door



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WAKEFIELD PUBLIC SAFETY STUDY

MECHANICAL ROOM

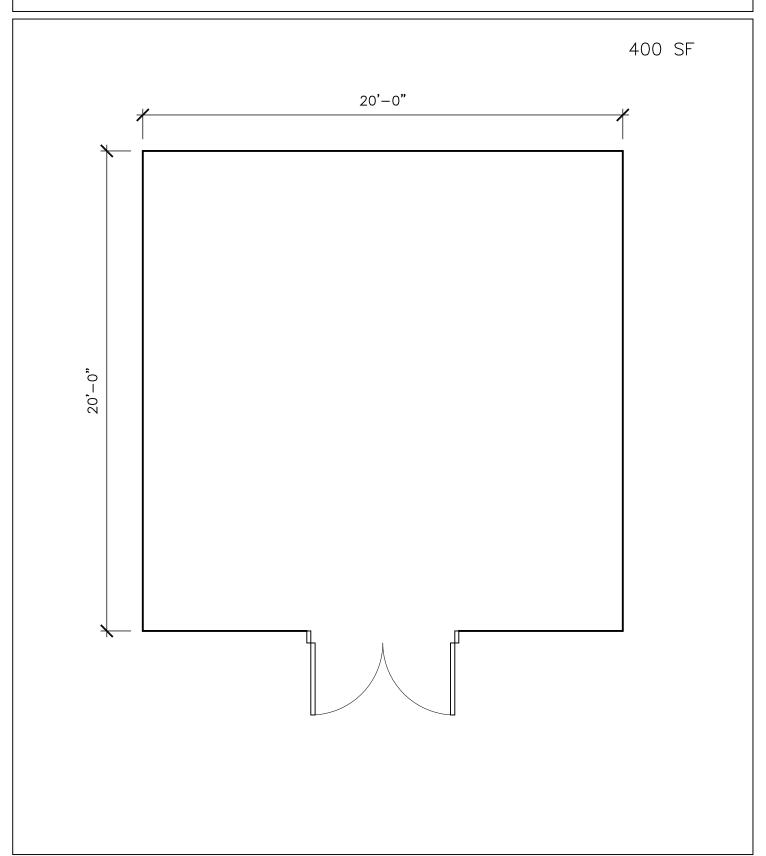
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP02



Room No: SKA-SUP3

Description: Water Service - Plumbing / Fire Protection Room

Current Name + Number: Water Service 138

Group: Support

Quantitative Criteria: 1 144

Square feet

Functional Description: 1 Room for plumbing and fire protection services and panels

Qualitative Description: 1 Service type room

Locational Criteria: 1 Central in building

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock

Equipment: Fire protection sevice (dry and wet) check valve assembly, domestic water

meter and reduced backflow preventer, water heater and expansion tank

protection, tempered water control panel and mixing valves

Furnishings: 1 None

Notes: 1 Double door



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WAKEFIELD PUBLIC SAFETY STUDY

PLUMBING & FIRE PROTECTION ROOM

Date: 19 DECEMBER 2016

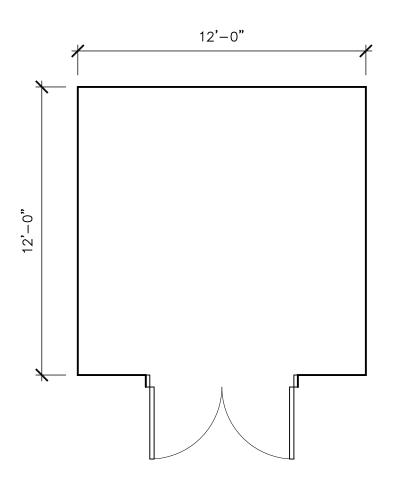
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP03

144 SF



Room No: SKA-SUP4

Description: Main Electrical Room

Current Name + Number: Electric 203

Group: Support

Quantitative Criteria: 1 250

Square feet

Functional Description: 1 Room for electrical service and panels

Qualitative Description: 1 Service type room

Locational Criteria: 1 Central in building

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock
Equipment: Electrical equipment

Furnishings: 1 None

Notes: 1 Double door



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WAKEFIELD PUBLIC SAFETY STUDY

MAIN ELECTRIC ROOM

Date: 19 DECEMBER 2016

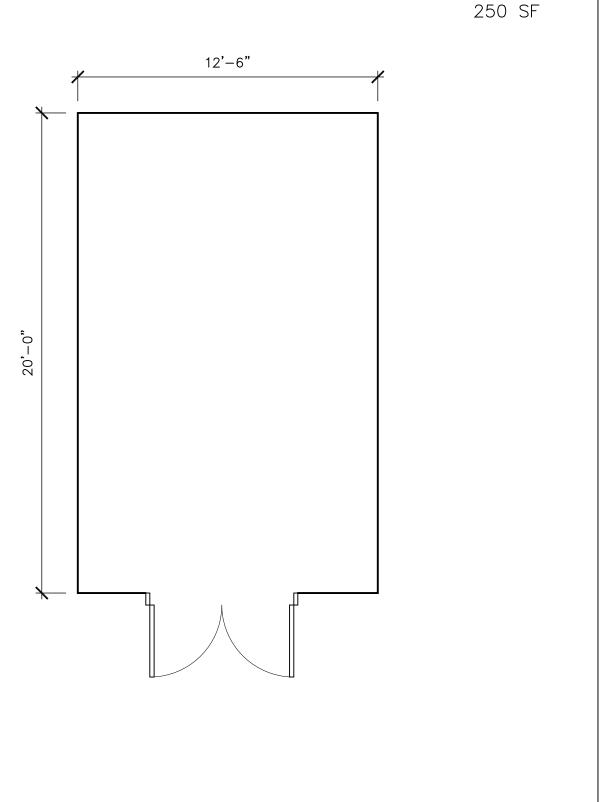
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Job num: 21608

Drawn by: NJJ

SKA-SUP04





Room No: SKA-SUP5

Description: Emergency Electrical Room
Current Name + Number: Emergency Generator 202

Group: Support

Quantitative Criteria: 1 80

Square feet

Functional Description: 1 Emergency electric panels

Qualitative Description: 1 Service type room

Locational Criteria: 1 Central in building

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock
Equipment: Electrical equipment

Furnishings:

Notes: Currently the generator is located inside the building. If space allows

this generator would be located outdoors.



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Project

WAKEFIELD PUBLIC SAFETY STUDY

EMERGENCY ELECTRICAL ROOM

Date: 19 DECEMBER 2016

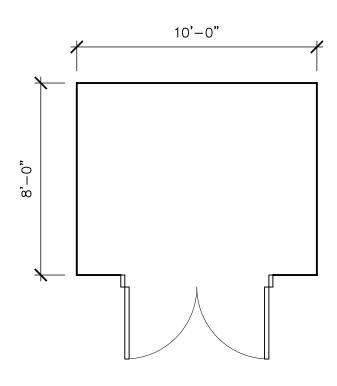
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP05

80 SF



Room No: SKA-SUP6

Description: Electrical Closet Per Floor Assume 1

Current Name + Number:

Group: Support

Quantitative Criteria: 1 48

Square feet

2 48 SF assume 1 on each floor other than the floor which houses the main

electrical room

Functional Description: 1 Emergency electric panels

Qualitative Description: 1 Service type room

Locational Criteria: 1 Central in building

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock
Equipment: Electrical equipment

Furnishings:

Notes:

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Project

WAKEFIELD PUBLIC SAFETY STUDY

ELECTRICAL CLOSET

Date: 19 DECEMBER 2016

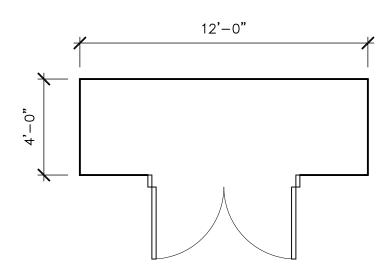
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP06

48 SF PER



Room No: SKA-SUP7

Description: Emergency Electrical Closet

Current Name + Number:

Group: Support

Quantitative Criteria: 1 48

Square feet

2 48 SF assume 1 on each floor other than the floor which houses the main

emergency electrical room

Functional Description: 1 Emergency electric panels

Qualitative Description: 1 Service type room

Locational Criteria: 1 Central in building

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock
Equipment: Electrical equipment

Furnishings:

Notes: Currently the generator is located inside the building. If space allows

this generator would be located outdoors.



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WAKEFIELD PUBLIC SAFETY STUDY

EMERGENCY ELECTRIC CLOSET

Date: 19 DECEMBER 2016

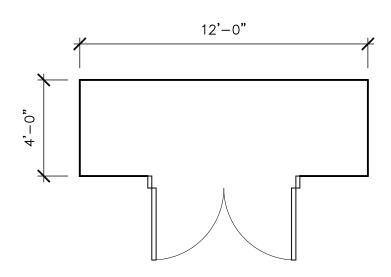
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-SUP07

48 SF PER



Room No: SKA-SUP8

Description: Server / E911 Room

Name: E911 207

Group: Administration - Police

Quantitative Criteria: 1 192

Square feet

Functional Description: 1 Room for all Police and Fire servers

2 Card access and cell check head end location

3 E911 head end location

Qualitative Description: 1 Secure, dry, well lit

Locational Criteria: 1 Central location or as required

2 Adjacent to IT Support

3 Close proximity to Dispatch preferred

Technical Criteria:

Walls: High impact GWB

Floors: Concrete with hardener or sealer

Ceiling: Exposed to structure

Windows: NA Plumbing: NA

HVAC: Standard environment Ventilation: Standard environment

Lighting: Direct

Power: As required for equipment
Tel/Data: As required for equipment
Security: Standard storage lock

Equipment: CCTV, Telephone, security, E911, card access

(x) full size server racks(x) full size switchesE911 UPS power

Police & Fire Dept UPS power

Telephone head end

Furnishings: Racks

Notes: 1 Contractor will provide conduit and pull strings for Town's vendor to install all

wiring.

2 Provide backboards for all wall mounted equipment.



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WAKEFIELD PUBLIC SAFETY STUDY

SERVER / E911 ROOM

Date: 19 DECEMBER 2016

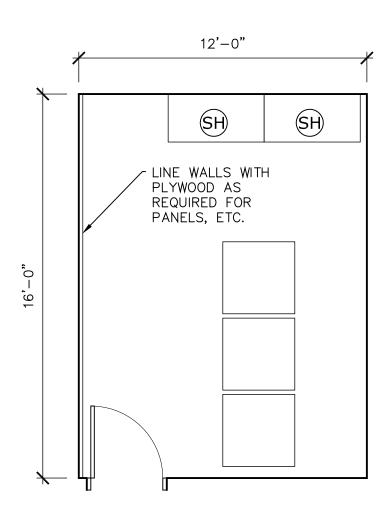
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP08

192 SF



SH) SHELVING

Room No: SKA-SUP9

Description: Building Services - IT Room

Name: Buildings + Grounds 205 and Telephone 206 and E911 207

Group: Support

Quantitative Criteria: 1 250

Square feet

Functional Description: 1 Room for all equipment and servers

2 Card access and cell check head end location

Qualitative Description: 1 Secure, dry, well lit

Locational Criteria: 1 Central location or as required

Technical Criteria:

Walls: High impact GWB

Floors: Resilient

Ceiling: Exposed to structure

Windows: NA

Plumbing: Foam fire suppression system?

HVAC: Standard environment; independent AC

Ventilation: Standard environment

Lighting: Direct / indirect

Power: Standard environment; as required for equipment; emergency power

Tel/Data: Required

Security: Standard office lock with limited access

Equipment: CCTV, Telephone, security, card access, microwave link

(x) full size server racks(x) full size switches

E911 UPS power (possible)
Police Dept UPS power

Furnishings:

Notes: 1 Contractor will provide conduit and pull strings for Town's vendor to install all

wiring.

2 Provide backboards for all wall mounted equipment.

3 E911 head end location near dispatch, but could be added to this area



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WAKEFIELD PUBLIC SAFETY STUDY

BUILDING SERVICES - IT ROOM

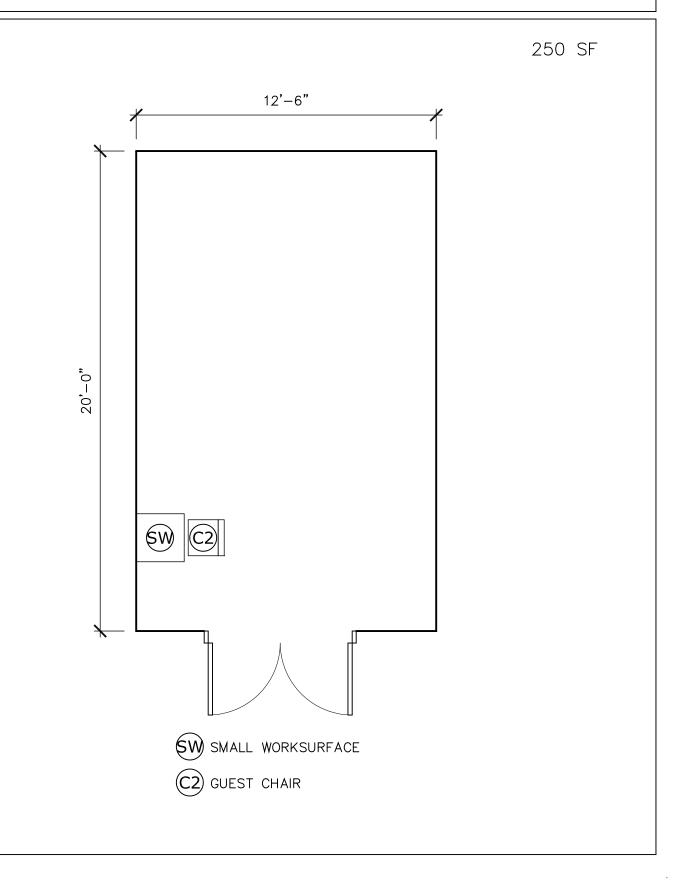
Date: 19 DECEMBER 2016

Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-SUP09



Room No: SKA-SUP10
Description: Radio Room
Name: Radio Room 340

Group: Support

Quantitative Criteria: 1 60

Square feet

Functional Description: 1 Room for radio equipment

Qualitative Description: 1 Secure, dry, well lit

Locational Criteria: 1 Central location or as required

2 Near IT Room if possible

Technical Criteria:

Walls: High impact GWB

Floors: Resilient

Ceiling: Exposed to structure

Windows: Not required

Plumbing: Foam fire suppression system?

HVAC: Standard environment; independent AC

Ventilation: Standard environment

Lighting: Direct / indirect

Power: Standard environment; as required for equipment; emergency power

Tel/Data: Required

Security: Standard office lock with limited access

Equipment:

Furnishings:

Notes: 1 Contractor will provide conduit and pull strings for Town's vendor to install all

wiring.

2 Provide backboards for all wall mounted equipment.



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WAKEFIELD PUBLIC SAFETY STUDY

RADIO ROOM

Date: 19 DECEMBER 2016

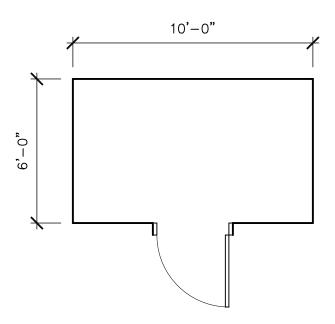
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP10

60 SF



Room No: SKA-SUP11
Description: Elevator

Current Name + Number:

Group: Support

Quantitative Criteria: 1 200

Square feet 100 sf per floor

Functional Description: 1 Vertical circulation

Qualitative Description: 1

Locational Criteria: 1 Accessible to the lobby

Technical Criteria:

Walls: Standard

Floors: Porcelain Tile in elevator; resilient in machine room

Ceiling: Standard Windows: NA Plumbing: NA HVAC: NA Ventilation: NA Lighting: Standard Power: Standard Tel/Data: Standard

Security: Dependant on final plan layout

Equipment: Hydraulic elevator

Furnishings:

Notes:



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WAKEFIELD PUBLIC SAFETY STUDY

ELEVATOR

Date: 19 DECEMBER 2016

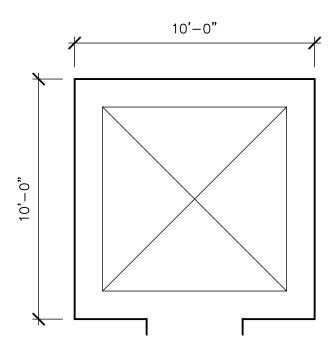
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP11

100 SF



Room No: SKA-SUP12

Description: Elevator Machine Room

Current Name + Number:

Group: Support

Quantitative Criteria: 1 100

Square feet

Functional Description: 1 Vertical circulation

Qualitative Description: 1

Locational Criteria: 1 Accessible to the lobby

Technical Criteria:

Walls: Standard

Floors: Resilient in machine room

Ceiling: Standard
Windows: NA
Plumbing: NA
HVAC: NA
Ventilation: NA

Lighting: Standard
Power: Standard
Tel/Data: Standard

Security: Dependant on final plan layout

Equipment: Hydraulic elevator

Furnishings:

Notes:

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WAKEFIELD PUBLIC SAFETY STUDY

ELEVATOR MACHINE ROOM

Date: 19 DECEMBER 2016

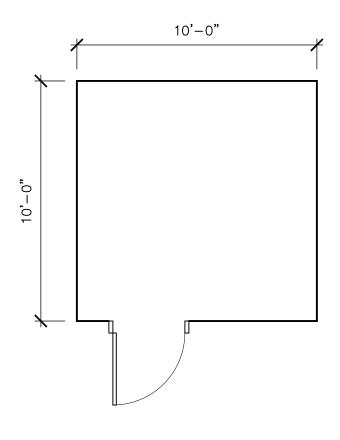
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: ננא

SKA-SUP12

100 SF



Room No: SKA-SUP13
Description: Stairs

Current Name + Number:

Group: Support

Quantitative Criteria: 1 880

Square feet

2 220 sf per floor; Assumes two stairs connecting two floors

Functional Description: 1 Vertical circulation

Qualitative Description: 1 Well lit

Locational Criteria: 1 Ideally centrally located to be shared by departments

Technical Criteria:

Walls: GWB

Floors: Raised rubber tile

Ceiling: GWB

Windows: Not required

Plumbing: NA HVAC: Standard Ventilation: Standard

entilation: Standard
Lighting: Direct
Power: Standard
Tel/Data: NA

Tel/Data.

Security: Dependant on final plan layout

Equipment:

Furnishings:



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WAKEFIELD PUBLIC SAFETY STUDY

STAIRS

Date: 19 DECEMBER 2016

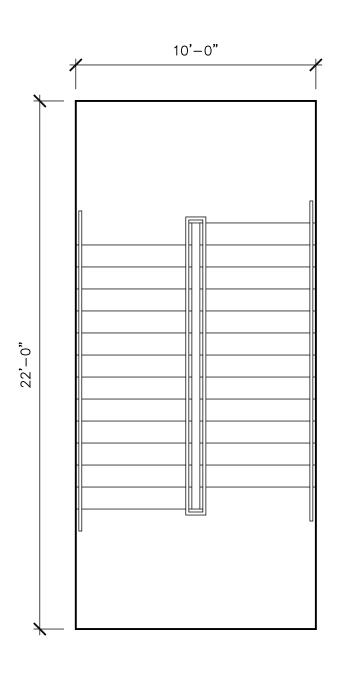
Scale: 1/4" = 1'-0"

Job num: 21608

Drawn by: NJJ

SKA-SUP13

220 SF PER FLOOR



Room No: SKA-F1

Description: Fire Chief Office with Closet
Current Name + Number: Fire Chief 126 and Closet 127

Group: Administration - Fire

Quantitative Criteria: 1 192

Square feet

2 Meets with 1-4 people

Functional Description: 1 Deskwork

2 Small Meetings

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative staff

2 Near adminstrative assistant

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F2

Description: Fire Prevention Office and Plan Storage

Current Name + Number: Fire Prevention 124

Group: Administration - Fire

Quantitative Criteria: 1 181

Square feet

2 Meets with 1-2 people

Functional Description: 1 Deskwork

2 Small Meetings

3 Plan Review

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

2 Near transaction desk

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes:

Room No: SKA-F3

Description: Administrative Assistant
Current Name + Number: Administrative Assistant 125

Group: Administration - Fire

Quantitative Criteria: 1 134

Square feet

Functional Description: 1 Deskwork

2 Available to public3 Active File Storage

Qualitative Description: 1 Open office area

Locational Criteria: 1 Adjacent to Lobby

2 Adjacent to Fire Chief & Other Administrators

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions

Equipment: Existing Conditions; roll-up window

Furnishings: 1 Existing Conditions

Notes:

Room No: SKA-F4

Description: Fire Alarm Superintendent Office

Current Name + Number: Fire Prevention Training 129 - Currently used by Fire Alarm

Superintendent (Captain)

Group: Administration - Fire

Quantitative Criteria: 1 137

Square feet

2 Meets with 1-2 people

Functional Description: 1 Deskwork

2 Small Meetings

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative offices

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes:

Room No: SKA-F5

Description: Archived Items

Current Name + Number: Office Supply MP 131 - Archived FD Items

Group: Administration - Fire

Quantitative Criteria: 1 118

Square feet

2 Meets with 1-2 people

Functional Description: 1 Storage

2 Possible small office

Qualitative Description: 1 Private Office

Locational Criteria: 1 Central access to administrative staff

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F6

Description: Conference Room
Current Name + Number: Conference Room 133

Group: Administration - Fire

Quantitative Criteria: 1 211

Square feet

2 Meets with 1-10 people

Functional Description: 1 Conferences

2 Meetings

Qualitative Description: 1 Private

Locational Criteria: 1 Central access to administrative staff

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes: 1

Room No: SKA-F7

Description: Office Supplies Storage

Current Name + Number: Storage 128

Group: Administration - Fire

Quantitative Criteria: 1 40

Square feet

Functional Description: 1 Stores paper supplies

2 Stores other small equipment and supplies

Qualitative Description: 1 Secure

Locational Criteria: 1 Central access to administrative staff

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes: 1

Room No: SKA-F8
Description: Toilet
Current Name + Number: Toilet 150

Group: Administration - Fire

Quantitative Criteria: 1 38

Square feet

Functional Description: 1 Unisex Toilet

2 Fully accessible

Qualitative Description: 1 Secure

2 Good ventilation3 Durable Materials

Locational Criteria: 1 Central access to administrative staff

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Existing Conditions

Power: Standard Toilet Environment Tel/Data: Standard Toilet Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F9
Description: **FD Storage**

Current Name + Number: FD Storage 316

Group: Administration - Fire

Quantitative Criteria: 1 202

Square feet

Functional Description: 1 Secure storage for records

Qualitative Description: 1 Dry, well lit and secure

Locational Criteria: 1 Near administrative staff

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Storage Environment Ventilation: Standard Storage Environment

Lighting: Existing Conditions

Power: Standard Storage Environment Tel/Data: Standard Storage Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F10
Description: Day Room

Current Name + Number: Day Room 249

Group: Staff Support - Fire

Quantitative Criteria: 1 253

Square feet

Functional Description: 1 Watching TV/Videos; Listening to music

2 Informal meeting

Qualitative Description: 1 Comfortable relaxed environment

2 Natural lighting

Locational Criteria: 1 Easy access to apparatus bays

2 Adjacent to Dining/Kitchen

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment
Tel/Data: Standard Office Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F11
Description: Dining Room
Current Name + Number: Dining 250

Group: Staff Support - Fire

Quantitative Criteria: 1 371

Square feet

Functional Description: 1 Dining Area

Qualitative Description: 1 Comfortable relaxed environment

Locational Criteria: 1 Adjacent to Kitchen and Day Room

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No:

Description: Kitchen COMBINED WITH DINING

Current Name + Number: Kitchen 251

Group: Staff Support - Fire

Quantitative Criteria: 1 0

Square feet

Functional Description: 1 Well organized area with space for 4 company needs

Qualitative Description: 1 Comfortable relaxed environment

Locational Criteria: 1 Adjacent to Dining and Day Room

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F12

Description: Janitors Closet (2)

Current Name + Number: JaniTors Closet 252 + 320

Group: Support

Quantitative Criteria: 1 70

Square feet

2 1 required per floor (see notes)

Functional Description: 1 House janitorial supplies

2 Workspace for facilities maintenance staff

Qualitative Description: 1 Durable materials

Locational Criteria: 1 One required per level

Technical Criteria:

Walls: Moisture Resistant GWB Floors: Ceramic Tile, resinous

Ceiling: GWB Windows: None

Plumbing: Standard Janitors Environment
HVAC: Standard Toilet Environment
Ventilation: Standard Toilet Environment

Lighting: Direct

Power: Standard Toilet Environment

Tel/Data: None

Security: Standard Lock

Equipment: None

Furnishings: 1 Janitors sink or mop sink

2 Rack for mops, brooms etc.

3 Shelving

Notes: Per Code, one Janitor's closet required per floor.

Room No: SKA-F13

Description: Women's Toilet
Current Name + Number: Women's Toilet 255

Group: Staff Support - Fire

Quantitative Criteria: 1 44

Square feet

Functional Description: 1 Women's Toilet

2 Fully accessible

Qualitative Description: 1 Secure

2 Good ventilation3 Durable Materials

Locational Criteria: 1 Flexible location

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Existing Conditions

Power: Standard Toilet Environment Tel/Data: Standard Toilet Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F14
Description: Men's Toilet
Current Name + Number: Men's Toilet 254

Group: Staff Support - Fire

Quantitative Criteria: 1 124

Square feet

Functional Description: 1 Men's Toilet

2 Fully accessible

Qualitative Description: 1 Secure

2 Good ventilation3 Durable Materials

Locational Criteria: 1 Flexible location

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Existing Conditions

Power: Standard Toilet Environment Tel/Data: Standard Toilet Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F15
Description: Watch Room
Current Name + Number: Roll Call 255

Group: Operations - Fire

Quantitative Criteria: 1 239

Square feet

Functional Description: 1 Receive transferred dispatch call 24/7

2 Radio Equipment; fire alrm monitoring panels

Qualitative Description: 1 Secure area

Locational Criteria: 1 Close proximity to fire staff

2 Close proximity to appartus bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F16

Description: Dorm 1, 2, 3, 4, 5, 6, 7, 8, 9, 10

Current Name + Number: Dorm 1, 2, 3, 4, 5, 6, 7, 8, 9, 10

Group: Staff Support - Fire

Quantitative Criteria: 1 1435

Square feet

Functional Description: 1 (10) single occupancy sleeping rooms for 4 shifts

Qualitative Description: 1 Good ventilation

2 Quiet

Locational Criteria: 1 Easy access to appartus bays

2 Near toilet / shower rooms

Technical Criteria:

Walls: **Existing Conditions Existing Conditions** Floors: Ceiling: **Existing Conditions** Windows: **Existing Conditions Existing Conditions** Plumbing: HVAC: Standard Environment Ventilation: Standard Environment Lighting: **Existing Conditions** Power: Standard Environment Tel/Data: Standard Environment Security: **Existing Conditions** Equipment: **Existing Conditions**

Furnishings: 1 Existing Conditions

Notes: 1 Each room is set up for 4 persons - 1 per shift

Room No: SKA-F17

Description: Women's Toilet / Shower
Current Name + Number: Women's Toilet / Shower 322

Group: Staff Support - Fire

Quantitative Criteria: 1 62

Square feet

Functional Description: 1 Toilet / Shower /Lavatory

Qualitative Description: 1 Single occupant space

2 Secure

3 Good ventialtion4 Durable materials

Locational Criteria: 1 Adjacent to dorm rooms

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Existing Conditions

Power: Standard Toilet Environment Tel/Data: Standard Toilet Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F18

Description: Men's Toilet / Shower
Current Name + Number: Men's Toilet / Shower 334

Group: Staff Support - Fire

Quantitative Criteria: 1 242

Square feet

Functional Description: 1 Toilet / Shower /Lavatory

Qualitative Description: 1 Multiple occupant space

2 Secure

3 Good ventialtion4 Durable materials

Locational Criteria: 1 Adjacent to dorm rooms

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Existing Conditions

Power: Standard Toilet Environment Tel/Data: Standard Toilet Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes: 1

Room No: SKA-F19

Description: Lieutenant Dorm Room

Current Name + Number: Lieutenant 335

Group: Staff Support - Fire

Quantitative Criteria: 1 117

Square feet

Functional Description: 1 Single occupancy sleeping room

Qualitative Description: 1 Good ventilation

2 Quiet

Locational Criteria: 1 Easy access to appartus bays

2 Near Captain / Lieutenant Toilet / Shower 338

Technical Criteria:

Walls: **Existing Conditions Existing Conditions** Floors: Ceiling: **Existing Conditions** Windows: **Existing Conditions Existing Conditions** Plumbing: HVAC: Standard Environment Ventilation: Standard Environment Lighting: **Existing Conditions** Power: Standard Environment Tel/Data: Standard Environment Security: **Existing Conditions** Equipment: **Existing Conditions**

Furnishings: 1 Existing Conditions

Notes: 1 Not currently used regularly but as overflow space during events

Room No: SKA-F20

Description: Captain / Lieutenant Toilet

Current Name + Number: Captain / Lieutenant Toilet / Shower 338

Group: Staff Support - Fire

Quantitative Criteria: 1 84

Square feet

Functional Description: 2 Toilet / Shower /Lavatory

Qualitative Description: 1 Multiple occupant space

2 Secure

3 Good ventialtion4 Durable materials

Locational Criteria: 1 Adjacent to Captain dorm room; Nearby Lieutenant dorm room

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Toilet Environment Ventilation: Standard Toilet Environment

Lighting: Existing Conditions

Power: Standard Toilet Environment Tel/Data: Standard Toilet Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes: 1

Room No: SKA-F21

Description: Captain Dorm Room

Current Name + Number: Captain 339

Group: Staff Support - Fire

Quantitative Criteria: 1 209

Square feet

Functional Description: 1 Single occupancy sleeping rooms

Qualitative Description: 1 Good ventilation

2 Quiet

Locational Criteria: 1 Easy access to appartus bays

2 Near Captain / Lieutenant Toilet / Shower 338

Technical Criteria:

Walls: **Existing Conditions Existing Conditions** Floors: **Existing Conditions** Ceiling: Windows: **Existing Conditions** Plumbing: **Existing Conditions** HVAC: Standard Environment Ventilation: Standard Environment Lighting: **Existing Conditions** Power: Standard Environment Tel/Data: Standard Environment Security: **Existing Conditions** Equipment: **Existing Conditions**

Furnishings: 1 Existing Conditions

Room No: SKA-F22

Description: Apparatus Bays
Current Name + Number: Apparatus Bays 254

Group: Operations - Fire

Quantitative Criteria: 1 4,464

Square feet

Functional Description: 1 House fire apparatus

2 House trailers, portable pumps and generators

Qualitative Description: 1 Easy access to trucks

2 Easy access to gear

3 Good air quality

4 Adequate height for clearance and maintenance of vehicles

5 Natural light

6 Sized for access to all sides and tops of vehicles

7 Overhead doors - Glass in doors

Locational Criteria: 1 Excellent access from living quarters and day room

2 Adjacent to maintenance and fire equipment support areas

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Appartus Environment Ventilation: Standard Appartus Environment

Lighting: Existing Conditions

Power: Standard Appartus Environment Tel/Data: Standard Appartus Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes: 1

Room No: SKA-F23

Description: Equipment Maintenance
Current Name + Number: Equipment Maintenance 263

Group: Operations - Fire

Quantitative Criteria: 1 163

Square feet

Functional Description: 1 Storage of tools and parts

2 Minor repair work

3 Storage of flammable materials in ventilated cabinets

Qualitative Description: 1 Flexible repair work environment

2 Good lighting3 Good ventialtion

Locational Criteria: 1 Adjacent to appartus bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Shop Environment Ventilation: Standard Shop Environment

Lighting: Existing Conditions

Power: Standard Shop Environment Tel/Data: Standard Shop Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes: 1 This area currently experiences problems with the ventialtion system

that restricts the work that can be done in this area.

Room No: SKA-F24

Description: EMT - Medical Supply Storage

Current Name + Number: EMT 264

Group: Operations - Fire

Quantitative Criteria: 1 97

Square feet

Functional Description: 1 Secure medical supplies

Qualitative Description: 1 Secured closet

Locational Criteria: 1 Central to apparatus bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Storage Environment Ventilation: Standard Storage Environment

Lighting: Existing Conditions

Power: Standard Storage Environment Tel/Data: Standard Storage Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F25

Description: EMT Washroom
Current Name + Number: EMT Washroom 265

Group: Operations - Fire

Quantitative Criteria: 1 55

Square feet

Functional Description: 1 Cleaning of backborads and other medical equipment

2 Decontamination of Personnel

Qualitative Description: 1 Wet environment

Easy access to deluge shower and eyewash

Locational Criteria: 1 Off apparatus bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Wet Environment Ventilation: Standard Wet Environment

Lighting: Existing Conditions

Power: Standard Wet Environment Tel/Data: Standard Wet Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F26

Description: Fire Alarm and Maintenance
Current Name + Number: Fire Alarm and Maintenance 266

Group: Operations - Fire

Quantitative Criteria: 1 248

Square feet

Functional Description: 1 Repair fire alarms

2 Storage of parts

Qualitative Description: 1 Flexible repair work environment

2 Good lighting3 Good ventialtion

Locational Criteria: 1 Adjacent to appartus bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Shop Environment Ventilation: Standard Shop Environment

Lighting: Existing Conditions

Power: Standard Shop Environment Tel/Data: Standard Shop Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes:

Room No: SKA-F27
Description: Storage
Current Name + Number: Storage 262

Group: Operations - Fire

Quantitative Criteria: 1 134

Square feet

Functional Description: 1 Miscellaneous storage

Qualitative Description: 1 Good lighting

2 Good ventilation

Locational Criteria: 1 Off appartus bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Storage Environment Ventilation: Standard Storage Environment

Lighting: Existing Conditions

Power: Standard Storage Environment
Tel/Data: Standard Storage Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F28
Description: Air Supply

Current Name + Number: Air Supply 261

Group: Operations - Fire

Quantitative Criteria: 1 120

Square feet

Functional Description: 1 Fill area for breathing apparatus - tanks

Qualitative Description: 1 Clean

2 Secure

3 Source of clean air

Locational Criteria: 1 Adjacent to vehicle bays

2 With compressor

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Shop Environment Ventilation: Standard Shop Environment

Lighting: Existing Conditions

Power: Standard Shop Environment Tel/Data: Standard Shop Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes:

Room No: SKA-F29

Description: W/D - Laundry

Current Name + Number: W/D 258

Group: Operations - Fire

Quantitative Criteria: 1 129

Square feet

Functional Description: 1 Room for washing and drying turnout gear

2 Washing and drying of bed linens and clothing

Qualitative Description: 1 Easy access to apparatus bays

Good ventilation for drying gear/pressurized

Locational Criteria: 1 Adjacent but separate from vehicle bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Laundry Environment Ventilation: Standard Laundry Environment

Lighting: Existing Conditions

Power: Standard Laundry Environment Tel/Data: Standard Laundry Environment

Security: Existing Conditions
Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Room No: SKA-F30
Description: Turnout Gear
Current Name + Number: Turnout Gear 257

Group: Operations - Fire

Quantitative Criteria: 1 503

Square feet 49 Gear Lockers

Functional Description: 1 Stores turnout gear and equipment

Qualitative Description: 1 Easy access to vehicle bays

2

2 Good ventilation for drying gear/pressurized

Locational Criteria: 1 Adjacent but separate from vehicle bays

Technical Criteria:

Walls: Existing Conditions
Floors: Existing Conditions
Ceiling: Existing Conditions
Windows: Existing Conditions
Plumbing: Existing Conditions

HVAC: Standard Office Environment Ventilation: Standard Office Environment

Lighting: Existing Conditions

Power: Standard Office Environment Tel/Data: Standard Office Environment

Security: Existing Conditions Equipment: Existing Conditions

Furnishings: 1 Existing Conditions

Notes:



APPENDIX D - FINAL FLOOR PLANS + RENDERINGS





35 Medford Street Somerville, MA 02143 T: 617.776.6545 F: 617.776.6678 www.hktarchitects.com

Number Revision Date

Registrations

Consultants

APRIL 2017

21608 Job number STUDY - ESTIMATE SET

Drawing set

A-101





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Number Revision Date

Registrations

Consultants

Project
Public Safety Building F
1 Union Street

STUDY - ESTIMATE SET

Drawing set

A-102

 $\frac{\text{PLAN } \text{ SECOND FLOOR}}{1/8" = 1'-0"}$





35 Medford Street Somerville, MA 02143 T: 617.776.6545 F: 617.776.6678 www.hktarchitects.com

Number Revision Date

Registrations

Consultants

Project
Public Safety Building F
1 Union Street

APRIL 2017

STUDY - ESTIMATE SET

Drawing set

A-103

 $\frac{\text{PLAN}}{1/8"} = 1'-0"$



FEASIBILITY STUDY FOR THE PUBLIC SAFETY BUILDING

WAKEFIELD, MASSACHUSETTS May 11, 2017



CENTER STREET ADDITION WITH NEW ENTRY





NEW ENTRY



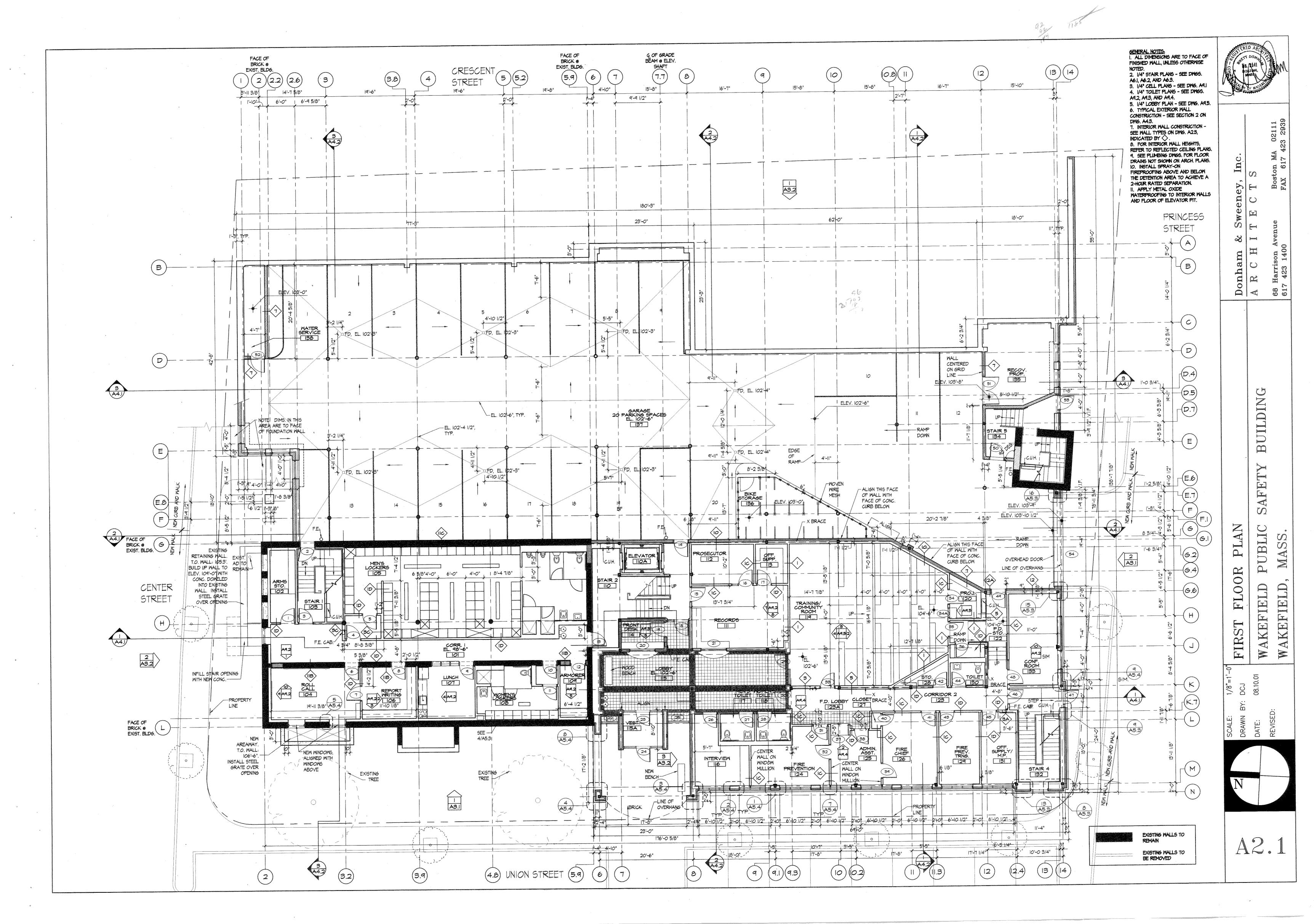


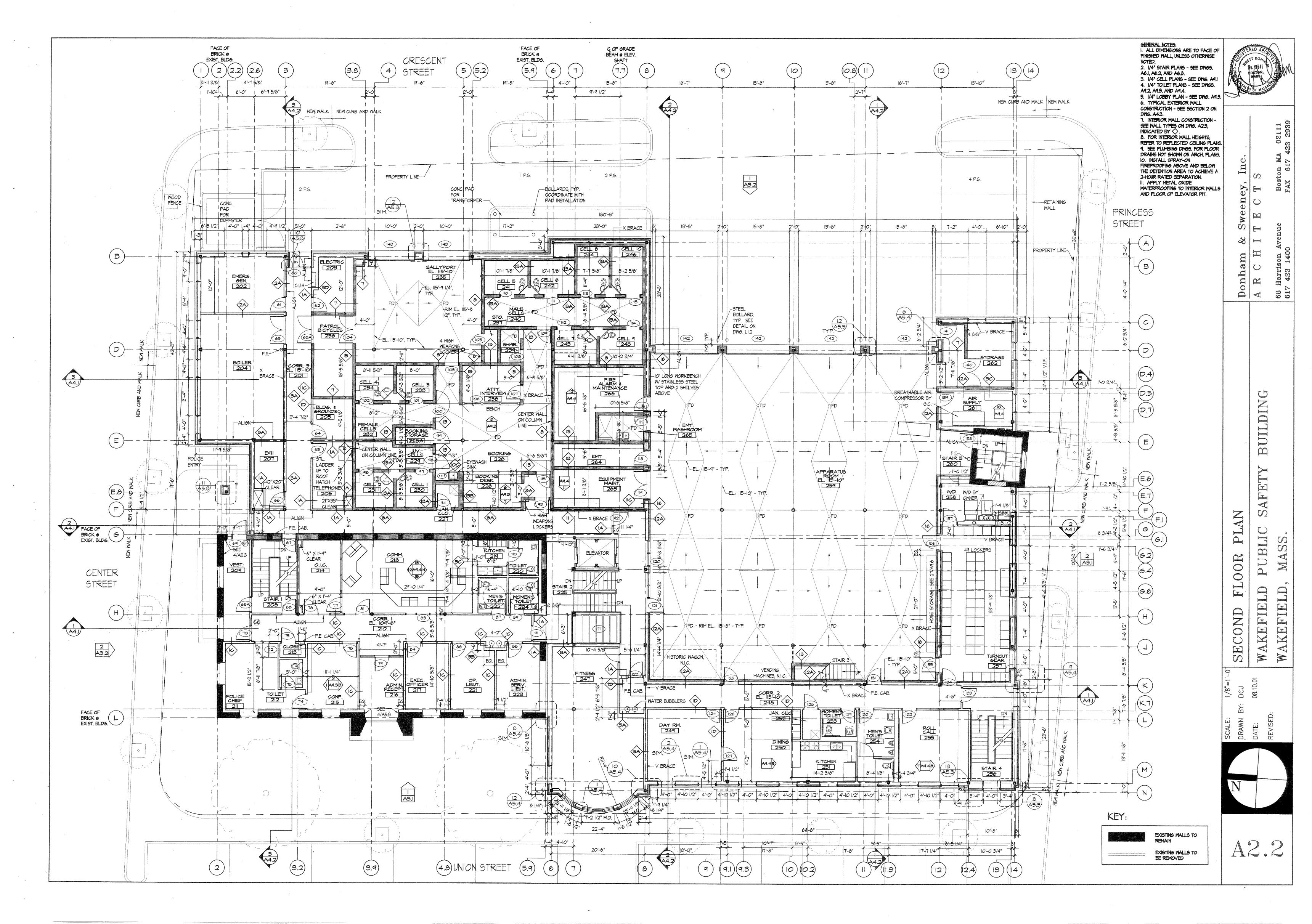
DETENTION ADDITION

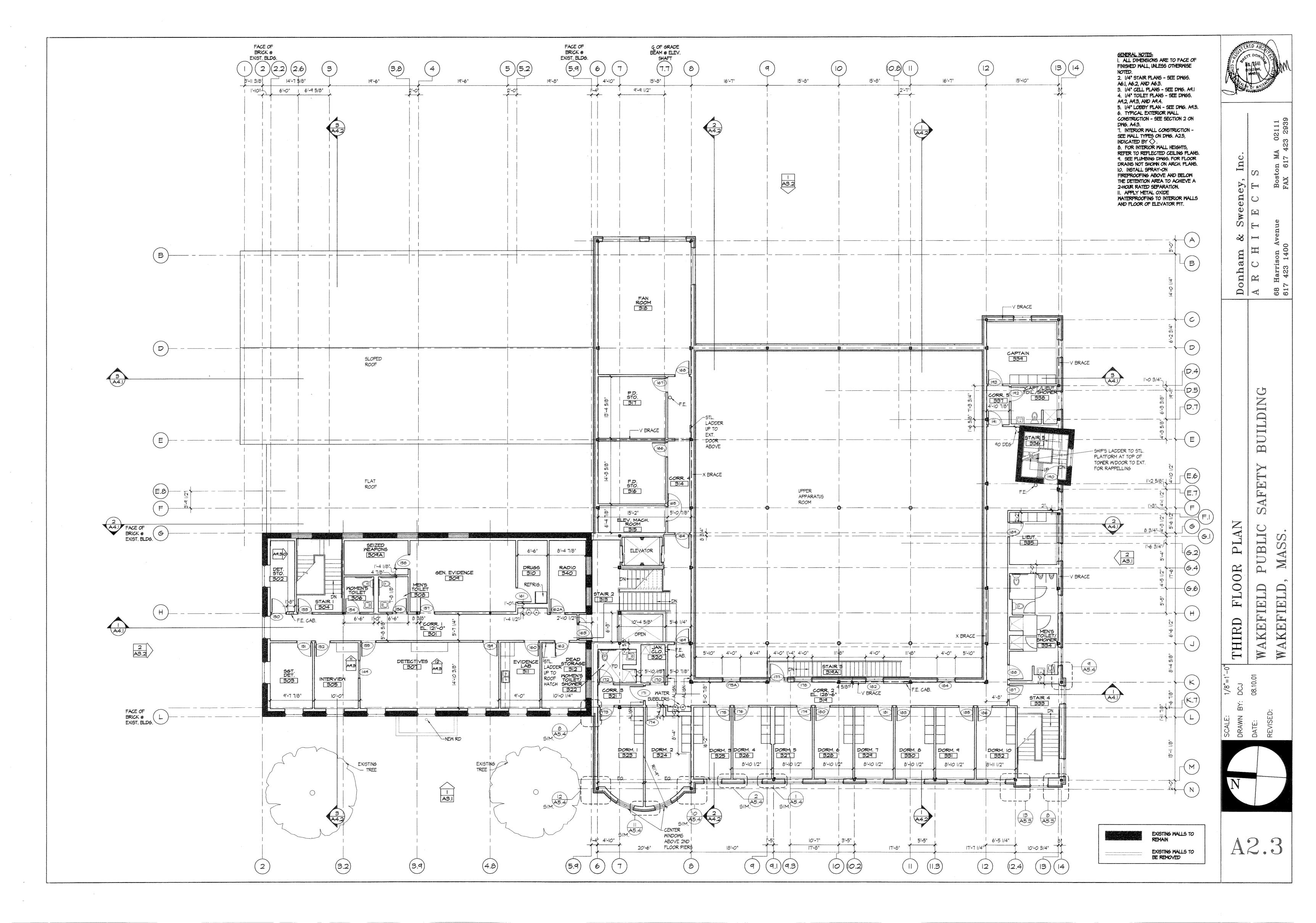




APPENDIX E – EXISTING BUILDING FLOOR PLANS









APPENDIX F - COST ESTIMATE

Wakefield Public Safety Building Renovations

1 Union Street Wakefield, Ma

Prepared by:



165 Middlesex Turnpike Suite 106 Bedford, MA 01730 phone 781-275-5511 www.tortoraconsulting.com

Prepared for:

HKT

Wakefield Public Safety Building Renovations

1 Union Street Wakefield, Ma



Study Estimate

MAIN CONSTRUCTION COST SUMMARY

	Floor Area	\$/sf	Estimated Construction Cost
RENOVATION & ADDITIONS	11,755	\$341.61	\$4,015,620
TOTAL ESTIMATED CONSTRUCTION COST			\$4,015,620
Alternates:			
1. Add cost for sallyport and related sitework		Add	\$197,593
2. Add cost for Mechanical Equipment replacements		Add	\$238,848

QUALIFICATIONS

This study cost estimate was produced from drawings and other documentation prepared by HKT architects and their design team dated April 2017. Design and engineering changes occurring subsequent to the issue of these documents have not been incorporated in this estimate.

This estimate includes all direct construction costs, general contractor's overhead and profit and design contingency. Cost escalation assumes 2018 spring bid with a 14 month phased schedule.

Bidding conditions are expected to be public bidding to pre-qualified general contractors, and pre-qualified sub-contractors, open specifications for materials and manufactures.

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

ITEMS NOT CONSIDERED IN THIS ESTIMATE

All professional fees and insurance

All Furnishings, Fixture, Equipment, Tele-data and Security devices & wiring

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

Hazardous material or soil abatement

Special foundations or ledge blasting (unless indicated by design engineers)

Utility company back charges, including work required off-site

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

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

Sales Tax

Building Permit

On or off site temporary swing space



			11,755	Affected Area
	CONSTRUCTION COST SUMMARY IN CSI FORMAT	RENOVATION & ADDITIONS	TOTAL	\$/SF
DIV. 2 DI	EMOLTION		\$55,511	\$4.72
020500	Demolition & Haz-Mat	\$55,511		
DIV. 3 CO	DNCRETE		\$121,640	\$10.35
	Cast-in-Place Concrete	\$121,640	, ,	·
DIV. 4 M	ASONRY		\$174,002	\$14.80
	Masonry Work - FSB		7 7,55-	,
042000	Unit Masonry (part of 040001 FSB)	\$174,002		
DIV. 5 M	ETALS		\$152,615	\$12.98
	Miscellaneous and Ornamental Iron - FSB	4.2.2.2		
	Structural Steel Framing Steel Decking	\$134,040 \$10,075		
	Metal Fabrications (part of 050001 FSB)	\$8,500		
	Metal Stairs and Railings (part of 050001 FSB)	\$0		
DIV 6 W	OODS & PLASTICS		\$148,055	\$12.60
	Rough Carpentry	\$8,080	\$140,033	J12.00
	Interior Architectural Woodwork	\$139,975		
DIV. 7 TH	HERMAL & MOISTURE PROTECTION		\$89,664	\$7.63
	Waterproofing, Dampproofing and Caulking - FSB		403,004	ψ
	Roofing and Flashing - FSB	44		
	Dampproofing and Waterproofing (part of 070001 FSB)	\$2,436		
	Polymer Modified Cement Waterproofing (part of 070001 FSB) Thermal Insulation	\$0 \$16,622		
	Air Barriers (part of 070001 FSB)	\$18,450		
	Metal Siding	\$0		
	Membrane Roofing and Flashing (part of 070002 FSB)	\$43,460		
	Asphalt Roofing System (part of 070002 FSB) Roof Accessories	\$0 \$2,100		
	Penetration Firestopping	\$2,100 \$0		
	Joint Sealants (part of 070001 FSB)	\$4,196		
DIV. 8 DO	OORS & WINDOWS		\$139,050	\$11.83
	Aluminum Windows - FSB		,	7-2-00
	Glass and Glazing - FSB			
	Hollow Metal Doors and Frames	\$63,700		
	Flush Wood Doors Access Doors and Frames	\$0 \$0		
	Overhead Coiling Doors	\$0 \$0		
	Aluminum-Framed Windows, Entrances and Storefronts (FSB)	\$75,350		
	Door Hardware	\$0		
	Glazing (part of 080002 FSB) Louvers and Vents	\$0 \$0		
089000	Louvers and Vents	\$0		
DIV. 9 FI			\$410,139	\$34.89
	Tile - FSB			
	Acoustical Tile - FSB Resilient Floors - FSB			
	Painting - FSB			
092110	Gypsum Board Assemblies	\$209,564		
	Tiling (part of 090002 FSB)	\$37,500		
	Acoustical Ceilings (part of 090003 FSB)	\$44,669		
096550	Resilient Flooring and Accessories (part of 090005 FSB) Carnet	\$69,005 \$0		
	Resinous flooring and base	\$0		
099000	Painting and Coating (part of 090007 FSB)	\$49,401		
DIV 10 SF	PECIALTIES		\$99,780	\$8.49
	Signage	\$5,000	, ,	,
	Toilet Accessories	\$2,850		
	Fire Protection Specialties Mice specialties	\$0 \$34,000		
106500 108500	Misc specialties Lockers	\$24,000 \$17,930		
	High Density Shelving	\$50,000		
	•	• •		



			11,755	Affected Area
CONSTRUCTION COST SUMMARY IN CSI FORMAT	F	RENOVATION & ADDITIONS	TOTAL	\$/SF
DIV. 11 EQUIPMENT			\$10,500	\$0.89
113100 Appliances		\$10,500	420,000	7010 .
118100 Industrial Equipment		\$0		
DIV. 12 FURNISHINGS			\$4,400	\$0.3
122110 Horizontal Louver Blinds		\$4,400		
124810 Entrance Floor Mats and Frames		\$0		
DIV. 13 SPECIAL CONSTRUCTION			\$0	\$0.0
13100 Pre-fabricated Metal Building		\$0		
DIV. 14 CONVEYING SYSTEMS			\$0	\$0.0
140001 Elevators - FSB				
142100 Electric Traction Elevators (part of 140001 FSB)		\$0		
DIV. 21 FIRE SUPPRESSION			\$50,540	\$4.3
210000 Fire Suppression -FSB		\$50,540		
DIV. 22 PLUMBING			\$140,000	\$11.9
220000 Plumbing - FSB		\$140,000		
DIV. 23 HVAC			\$316,475	\$26.9
220000 HVAC - FSB		\$316,475		
DIV. 26 ELECTRICAL			\$290,435	\$24.7
260000 Electrical - FSB		\$290,435		
DIV. 31 EARTHWORK			\$76,601	\$6.5
311000 Site Clearing		\$23,813		
312000 Earthwork		\$48,588		
312500 Erosion and Sedimentation Controls		\$4,200		
315000 Excavation Support and Protection		\$0		
DIV. 32 EXTERIOR IMPROVEMENTS			\$79,725	\$6.7
321216 Asphalt Paving		\$15,395		
321213 Portland Cement Concrete Paving		\$7,830		
321613 Curbs and Gutters		\$5,000		
323100 Site Improvements		\$21,500		
329000 Landscaping		\$30,000		
DIV. 33 UTILITIES			\$45,000	\$3.8
331000 Site Water Distribution		\$0		
333000 Sanitary Sewerage Utilities 334000 Storm Drainage		\$15,000 \$30,000		
SUBTOTAL DIRECT (TRADE) COST		\$2,404,132	\$2,404,132	\$204.5
PHASING PREMIUM (Renovations portions)	7.5%	\$180,310	\$180,310	
GENERAL CONDITIONS & REQUIREMENTS - 14 MONTHS PHASED		\$560,000	\$560,000	
GL INSURANCE	1.10%	\$26,445	\$26,445	
BONDS	1.75%	\$42,072	\$42,072	
BUILDING PERMIT (waived)	0.0%	\$0	\$0	
OVERHEAD AND PROFIT	4.5%	\$144,583	\$144,583	
DESIGN AND PRICING CONTINGENCY	15.0%	\$503,631	\$503,631	
ESCALATION - 1 YR	4.0%	\$154,447	\$154,447	
TOTAL ESTIMATED CONSTRUCTION COST		\$4,015,620	\$4,015,620	\$341.6

1 Union Street Wakefield, Ma



Study Estimate

			11,755	Affected Area
CONST	RUCTION COST SUMMARY IN BUILDING SYSTEM	RENOVATION & ADDITIONS	TOTAL	\$/SF
A10	BUILDING FOUNDATIONS	\$132,663	\$132,663	<i>\$11.29</i>
B10	SUPERSTRUCTURE	\$155,140	\$155,140	\$13.20
B20	EXTERIOR CLOSURE	\$325,037	\$325,037	\$27.65
B30	ROOFING	\$43,460	\$43,460	\$3.70
C10	INTERIOR CONSTRUCTION	\$471,575	\$471,575	\$40.12
C20	STAIRCASES	\$0	\$0	\$0.00
C30	INTERIOR FINISHES	\$219,398	\$219,398	\$18.66
D10	CONVEYING SYSTEMS	\$0	\$0	\$0.00
D20	PLUMBING	\$140,000	\$140,000	\$11.91
D30	HVAC	\$316,475	\$316,475	\$26.92
D40	FIRE PROTECTION	\$50,540	\$50,540	\$4.30
D50	ELECTRICAL	\$275,435	\$275,435	\$23.43
E20	FURNISHINGS	\$14,900	\$14,900	\$1.27
F10	INDUSTRIAL EQUIPMENT	\$0	\$0	\$0.00
G10	SITEWORK	\$259,509	\$259,509	\$22.08
G40	CUSTOM SALT SHED	\$0	\$0	\$0.00
TOTAL	DIRECT COST (Trade Costs)	\$2,404,132	\$2,404,132	\$204.52

See CSI summary for mark-ups



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

RENOVA	ATION & AD	DITIONS					
	GROSS FL	OOR AREA CALCULATION					
		Addition	<u>-</u>				
		1st floor			1,050		
		2nd floor			1,070		
		3rd floor			1,070		
		1st floor vestibule			65		
		Total Additions				3,255	
		Renovations					
		1st floor			3,800		
		2nd floor			2,200		
		3rd floor			2,500	0 500	
		Total Renovations				8,500	
		TOTAL GROSS FLOOR AREA (GFA)				11,755 sf	
	A10	FOUNDATIONS					
	A1010	STANDARD FOUNDATIONS					
	AIOIO	Additions					
		Strip footings to walls					
03300		Formwork	232	sf	18.00	4,176	
03300		Re-bar	1,400	lbs	3.00	4,200	
03300		Concrete material	14	су	165.00	2,310	
03300		Placing concrete	14	су	40.00	560	
		Foundation walls (frost)					
03300		Formwork	1,392	sf	18.00	25,056	
03300		Re-bar	1,276	lbs	3.00	3,828	
03300		Concrete material	36	су	165.00	5,940	
03300		Placing concrete	36	су	40.00	1,440	
07130		Dampproofing foundation wall and footing	696	sf	3.50	2,436	
07210		Rigid insulation on foundation walls	696	sf	4.00	2,784	
		Foundation work at existing					
03300		Formwork	600	sf	18.00	10,800	
03300		Re-bar	1,100	lbs	3.00	3,300	
03300		Concrete material	31	су	165.00	5,115	
03300		Placing concrete	31	су	40.00	1,240	
07720		Dampproofing foundation wall and footing	600	sf	3.50	2,100	
07400		Rigid insulation on foundation walls	600	sf	4.00	2,400	
		SUBTOTAL				•	77,685
	A1030	LOWEST FLOOR CONSTRUCTION					
02050		Modify slab at new 1st floor area Sawcut and remove	370	sf	12.00	4,440	
312000		Excavate and backfill	185	If	32.00	5,920	
03300		Infill concrete and dowel	14	су	325.00	4,550	
03300		Additions		Су	323.00	4,330	
03300		New slab on grade	1,115	sf	15.00	16,725	
312000		Underslab materials	41	sf	48.00	1,968	
03300		Interior thickened slab and column footings	15	су	325.00	4,875	
		Miscellaneous	13	~1	323.00	.,5,5	
03300		Misc pads and curbs	1	ls	6,500.00	6,500	
03300		Misc cutting and patching at existing slabs	1	ls	10,000.00	10,000	
		SUBTOTAL	•	.5	10,000.00	20,000	54,978
							•

TOTAL - FOUNDATIONS

\$132,663



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

RENOVATION & ADDITIONS

B10	SUPERSTRUCTURE					
B1030	FLOOR CONSTRUCTION					
	New Entry Vestibule addition Structure - Steel:					
	Structural steel beams, columns and bracing	0.8	tns	4,800.00	3,840	
	Roof deck	65	sf	5.00	325	
		03	51	3.00	323	
	New Addition 1st - 3rd floor/roof Structure - Steel:					
	Structural steel beams, columns and bracing	24	tns	4,800.00	115,200	
	Metal deck	3,000	sf	3.25	9,750	
	Concrete deck	39	су	225.00	8,775	
	Finish slab	3,000	sf	0.75	2,250	
	<u>Seismic</u>					
	Allow for reinforcing and expansion joints to existing	3	flrs	5,000.00	15,000	
	SUBTOTAL					155,140
	TOTAL CURERCTRUCTURE					
	TOTAL - SUPERSTRUCTURE					
B20	EXTERIOR CLOSURE					
B2010	EXTERIOR WALLS					
	New addition					
	Paint	2,768	sf	1.10	3,045	
	GWB	3,075	sf	2.50	7,688	
	Sheathing	3,075	sf	2.75	8,456	
	6" metal stud back-up	3,075	sf	12.00	36,900	
	3" rigid insulation	3,075	sf	4.50	13,838	
	Air/Vapor barrier	3,075	sf	6.00	18,450	
	Brick veneer Precast veneer	2,025 1,050	sf sf	38.00 42.00	76,950 44,100	
	Precast heads and sills at windows	128	lf	65.00	8,320	
	Repair and tie-in at existing facade to remain	3	flrs	5,000.00	15,000	
	Infill at curved entry area	•	5	3,000.00	25,000	
	Masonry wall infill for new windows	280	sf	55.00	15,400	
	SUBTOTAL					248,147
B2020	WINDOWS					
B2020	Entry Storefront and Aluminum windows					
	Addition					
	New 4x6 aluminum windows to match	16	ea	1,800.00	28,800	
	Curved fill in			_,	_5,555	
	New aluminum windows	4	02	2 000 00	8 000	
		4	ea	2,000.00	8,000	
	<u>Vestibule</u>	_	_			
	Storefront at 3 sides	210	sf	85.00	17,850	
	Metal clad canopy and signage	1	ls	10,000.00	10,000	64.650
	SUBTOTAL					64,650
	EXTERIOR DOORS					
B2030		2	ea	2,600.00	5,200 5,500	
B2030	Ext alum entry door	1	62			
B2030	Interior alum entry door and sidelights	1 110	ea If	5,500.00 6.00		
B2030	· · · · · · · · · · · · · · · · · · ·	1 110 110	ea If If	6.00 8.00	660 880	

\$325,037

TOTAL - EXTERIOR CLOSURE



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

RENOVATION & ADDITIONS

	B30	ROOFING						
	B3010	ROOF COVERINGS						
07540		New membrane roofing system, insulation, flashing and trim	1,070	sf	28.00	29,960		
07540		Vestibule membrane roofing system, insulation, flashing and trim	1	ls	3,500.00	3,500		
07540		Allow for tie-in flashing details to existing	1	ls	10,000.00	10,000		
		SUBTOTAL					43,460	
		TOTAL - ROOFING						\$43,460

		TOTAL - ROOFING						\$43,460
	C10	INTERIOR CONSTRUCTION						
	C1010	PARTITIONS Addition	_					
09211		2 1/2" studs and gwb at existing brick	3,036	sf	6.00	18,216		
09211		Partitions at evidence	300	sf	10.00	3,000		
09211		Window infills at 2nd floor	5	ea	350.00	1,750		
09211		Partitions at 3rd floor	816	sf	10.00	8,160		
09211		Partitions at 2nd floor	612	sf	10.00	6,120		
09211		Window infills at 3rd floor	3	ea	350.00	1,050		
06100		Rough blocking	400	lf	6.00	2,400		
05500		Misc metals	1	ls	3,500.00	3,500		
		Renovations		,	5.00	0.046		
09211		Fur-out at 1st floor	1,536	sf	6.00	9,216		
09211		Partitions at 1st floor	3,264	sf	10.00	32,640		
09211		Partitions at 2nd floor	2,136	sf	10.00	21,360		
09211		Partitions at 3rd floor	2,256	sf	10.00	22,560		
09211		Partitions at garage	564	sf	10.00	5,640		
04200		Partitions at 2nd floor cell to stor	444	sf	28.00	12,432		
04200		Infill OH opening	1	ea	1,800.00	1,800		
10650		Bullet resisitant paneling at lobby walls near windows	3	ea	7,500.00	22,500		
06100		Rough blocking	800	lf	6.00	4,800		
05500		Misc metals SUBTOTAL	1	ls	5,000.00	5,000	182,144	
		SOBIOTAL					162,144	
	C1020	INTERIOR DOORS						
08111		Single door, frame and HW	47	lvs	1,200.00	56,400		
08111		Double door, frame and HW	3	lvs	2,000.00	6,000		
08111		Interior side and borrowed lights	2	ea	650.00	1,300		
09900		Paint HM frames	52	ea	95.00	4,940		
07920		Sealants & caulking	52	ea	68.00	3,536	72.476	
		SUBTOTAL					72,176	



CSI					UNIT	EST'D	SUB	TOTAL
CODE		DESCRIPTION	QTY	UNIT	COST	COST	TOTAL	COST
RENOVA	ΓΙΟΝ & ΑΓ	DITIONS						
	C1030	SPECIALTIES / MILLWORK						
06402		Processing - SS cabinets and counters	11	If	575.00	6,325		
06402		Bullet resistant lobby transaction windows, security grills	3	loc	15,000.00	45,000		
06402		Lobby display cases	3	ea	2,500.00	7,500		
06402		Lunch/kitchenette - cabs & counters	40	If	400.00	16,000		
06402		Evidence pass-thru lockers and fridge	1	ls	7,500.00	7,500		
06402		Interview - cabs & counters	5	If	375.00	1,875		
06402		Fire arms Lic - cabs & counters	10	If	375.00	3,750		
06402		Lab millwork and counters	32	If	450.00	14,400		
06402		Report writing - cabs & counters	35	If	375.00	13,125		
06402		Conf - cabs & counters	10	If	375.00	3,750		
109500		Evidence high density shelving	1	ls	50,000.00	50,000		
06402		Detectives 213 - Builtin cabinets and counters	8	If	375.00	3,000		
06402		Window trim and sills	16	ea	250.00	4,000		
06402		Storage shelving	110	If	125.00	13,750		
10140		Interior and Exteror Signage	1	ls	5,000.00	5,000		
10650		Mailboxes	1	ls	1,500.00	1,500		
		<u>Lockers</u>						
10850		30x72 lockers	62	ea	275.00	17,050		
10850		Dispatch lockers	4	ea	220.00	880		
		<u>Restrooms</u>						
10280		Shower curtain and rods	1	ea	200.00	200		
10280		Soap disp	5	ea	18.00	90		
10280 10280		Mirror Robe hook	5 10	ea ea	233.00 23.00	1,165 230		
10280		Grab bar	10	ea	85.00	850		
10280		TP holder	5	ea	45.00	225		
10280		Jan mop holder and shelf	2	ea	45.00	90		
		SUBTOTAL	_	-			217,255	
ĺ		TOTAL - INTERIOR CONSTRUCTION						\$471,575
		70772 7772	_					ψ <u>-</u>)σ. σ
	C20	STAIRCASES						
	C20	STAIRCASES						
05500		Stair system - handrails and misc modifications				ETR		
09900		Paint stair and rails				ETR		
		SUBTOTAL				2111	-	
ĺ		TOTAL - STAIR CASES						\$0
		TOTAL STAIN CASES						30



Study Estimate

CSI					UNIT	EST'D	SUB	TOTAL
CODE		DESCRIPTION	QTY	UNIT	COST	COST	TOTAL	COST
RENOVA	TION & AE	DDITIONS						
	C30	INTERIOR FINISHES						
	J.		<u>.</u>					
	C3010	WALL FINISHES						
09900		Paint to GWB	34,300	sf	1.10	37,730		
09300		Tile to restroom walls 4'	1,185	sf	20.00	23,700		
		SUBTOTAL					61,430	
	C3020	FLOOR FINISHES						
09651		Floor finishes (combo VCT/Sheet/Carpet)	9,500	sf	6.00	57,000		
09300		CT to restrooms	575	sf	24.00	13,800		
09651		Rubber base	3,430	If	3.50	12,005		
		SUBTOTAL					82,805	
	C3030	CEILING FINISHES						
09510		ACT ceilings; 2' x 2'	9,404	sf	4.75	44,669		
09211		GWB ceiling	2,351	sf	8.00	18,808		
09211		GWB soffits	200	lf	40.00	8,000		
09900		Paint to GWB ceilings and soffits	3,351	sf	1.10	3,686		
		SUBTOTAL					75,163	
		TOTAL - INTERIOR FINISHES						\$219,398
								<u>.</u>
	D10	CONVEYING SYSTEMS						
	D10	CONVEYING SYSTEMS						
14210		N/A				NIC		
		SUBTOTAL					-	
		TOTAL - CONVEYING SYSTEMS						\$0
			1					•
	D20	PLUMBING						
	D20	PLUMBING						
		Addition and Renovations						

	D20	PLUMBING						
	-							
	D20	PLUMBING						
		Addition and Renovations						
220000		WC	5	ea	5,500.00	27,500		
220000		WH sink	5	ea	5,600.00	28,000		
220000		Jan sink	2	ea	4,500.00	9,000		
220000		Showers	1	ea	6,500.00	6,500		
220000		Lunch & kitchenette sinks	3	ea	4,500.00	13,500		
220000		Floor drains	8	ea	2,000.00	16,000		
220000		Gas piping	300	lf	50.00	15,000		
220000		Seismic restraints	1	ls	5,000.00	5,000		
220000		Testing and sterilization	1	ls	3,500.00	3,500		
220000		Cut, cap and demo	100	mh	95.00	9,500		
220000		Coordination	1	ls	5,000.00	5,000		
220000		Permits	1	ls	1,500.00	1,500		
		SUBTOTAL					\$140,000	
		TOTAL - PLUMBING						\$140.000

		TOTAL - PLUMBING						\$140,000
	D30	HVAC						
	D30	HVAC						
230000		HVAC system at additions (expand distribution off existing)	3,255	sf	45.00	146,475		
230000		HVAC system modification at renovations	8,500	sf	20.00	170,000		
		SUBTOTAL					316,475	
		TOTAL - HVAC						\$316,475



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

RENOVATION & ADDITIONS

	D40	FIRE PROTECTION						
	D40	FIRE PROTECTION, GENERALLY						
210000		Sprinkler system at additions (expand off existing mains)	3,255	sf	8.00	26,040		
210000		Sprinkler system at renovations (relocate, add or remove)	8,500	sf	2.00	17,000		
210000		Calculations, shops, permits and coordination	1	ls	7,500.00	7,500		
		SUBTOTAL					50,540	
		TOTAL - FIRE PROTECTION						\$50,540
	D50	ELECTRICAL						
	<i>D</i> 30	ELECTRICAL						
	D5010	SERVICE & DISTRIBUTION Power Equipment						
260000		Electrical Power and circuitry	11,755	sf	5.00	58,775		
		SUBTOTAL					58,775	
	D5020	LIGHTING & POWER						
260000		Lighting & Branch Power Lighting and branch circuitry	11,755	sf	8.00	94,040		
260000		Equipment power	11,755	sf	3.00	35,265		
		SUBTOTAL	,				129,305	
	D5030	COMMUNICATION & SECURITY SYSTEMS Telecommunications System						
260000		Rough in allowance	45	drps	400.00	18,000		
260000		Fire Alarm	11,755	sf	2.50	20.200		
200000		Fire alarm system Security System	11,/33	31	2.30	29,388		
260000		Security and dispatch modifications	11,755	sf	3.00	35,265		
		SUBTOTAL					\$82,653	
	D5040	OTHER ELECTRICAL SYSTEMS						
		Lightning protection						
260000		UL Master label lightning protection				NIC		
		Miscellaneous		_				
260000		Temp services SUBTOTAL	11,755	sf	0.40	4,702	4 702	
		SOBIOTAL					4,702	
		TOTAL - ELECTRICAL						\$275,435
	E20	FURNISHINGS						
	E2010	FIXED FURNISHINGS						
12211		Window treatments for new windows	20	ea	220.00	4,400		
11310		Kitchen appliances SUBTOTAL	3	rms	3,500.00	10,500	\$14,900	
	E2020	MOVABLE FURNISHINGS						
		All movable furnishings to be provided and installed by owner					NIC	
		SUBTOTAL						
		TOTAL - FURNISHINGS						\$14,900
								, , ,



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

RENOVATION & ADDITIONS

Ī	G	SITEWORK	1				
ļ	<u> </u>	SILWORK	ı				
		<u>Demolition</u>					
02050		W1 - demo walls	6,708	sf	3.00	20,124	
02050		W2 - demo windows	23	ea	150.00	3,450	
02050		D1 - demo doors	36	ea	110.00	3,960	
02050		C1 - demo ceilings	8,421	sf	1.50	12,632	
02050		Demo chainlink	64	lf	15.00	960	
02050		Demo lockers	67	ea	85.00	5,695	
02050		MEP removals	8,500	sf	0.50	4,250	
		SUBTOTAL					51,071
		<u>Sitework</u>					
312500		Erosion control	350	lf	12.00	4,200	
311000		Site fencing, track pad and temp facilities	1	ls	10,000.00	10,000	
311000		Site demo (areaways, entries and structures)	2	cd	5,000.00	10,000	
311000		Sawcut and remove paving and curbing	2,542	sf	1.50	3,813	
		<u>Earthwork</u>					
312000		Excavate for new foundations	130	lf	100.00	13,000	
312000		Back fill foundations	200	су	25.00	5,000	
312000		Prep slabs base and import sub base	60	су	45.00	2,700	
312000		Misc underpinning and or other foundation conditions	1	ls	20,000.00	20,000	
		<u>Utilites</u>					
334000		Allow for storm drainage relocation annd modifications	1	ls	30,000.00	30,000	
260000		Allow for electrical utilities modifications	1	ls	15,000.00	15,000	
333000		Allow for other utility relocations, protection and modifications	1	ls	15,000.00	15,000	
		Site Paving and Curbs					
321216		Paving cut and patch	3,079	sf	5.00	15,395	
323100		New brick walks	450	sf	25.00	11,250	
321613		Reinstall curbing	200	lf	25.00	5,000	
321213		New concrete walks	783	sf	10.00	7,830	
		Site Improvements					
323100		Light bollards	4	ea	850.00	3,400	
323100		Reinstall flagpoles	2	ea	3,000.00	6,000	
323100		Relocate memorial stone	1	ea	850.00	850	
		Landscaping					
329000		Loam, seed and plantings	1	ls	30,000.00	30,000	200 420
-		SUBTOTAL TOTAL - SITEWORK					208,438



DESCRIPTION	QTY	UNIT	UNIT COST	EST'D COST	SUB TOTAL	TOTAL COST
Add cost for sallyport and related sitework						
Sallyport addition Sawcut and rmove paving and curbing	1,618	sf	1.20	1,942		
Remove dumpster east side	1,018	ea	500.00	500		
New gate at dumpster enclosure	1	ea	850.00	850		
New paving	1,151	sf	6.00	6,906		
Reinstall curbing	38	lf	35.00	1,330		
D1 - demo OH doors	2	ea	350.00	700		
Excavate and backfill foundations	1	ls	5,000.00	5,000		
Foundation	10	су	600.00	6,000		
Slab	280	sf	12.00	3,360		
Roof structure and decking	280	sf	20.00	5,600		
New exterior wall - CMU back-up	736	sf	30.00	22,080		
New exterior wall - air barrier	736	sf	6.00	4,416		
New exterior wall - rigid insulation	736	sf	4.00	2,944		
New exterior wall - CMU veneer	515 221	sf sf	28.00	14,420		
New exterior wall - precast trim and base veneer Modify existing exterior wall/openings	1	ea	40.00 5,000.00	8,840 5,000		
8" bollards	3	ea	650.00	1,950		
10x10 OH doors	2	ea	7,500.00	15,000		
Chain link fence and gates	32	If	85.00	2,720		
New roof and trim	280	sf	25.00	7,000		
FP	4	ea	500.00	2,000		
Plumbing	1	ls	3,500.00	3,500		
HVAC	1	ls	6,500.00	6,500		
Electrical	1	ls	8,500.00	8,500		
SUBTOTAL			_		137,058	137,058
		DHASING	DDEMILIM (Pano	vations portions)	7.5%	10,279
			ENERAL CONDITION	5.0%	6,853	
		GL INSUR		ONS & REGOINEMENTS	1.10%	1,508
		BONDS			1.75%	2,399
			PERMIT (waived		2,333	
			D AND PROFIT	,	4.5%	7,114
		DESIGN A	ND PRICING CON	TINGENCY	15.0%	24,782
		ESCALATI			4.0%	7,600
TOTAL						\$197,593
2. Add cost for Mechanical Equipment replacements						
Replace existing equipment (based on original equipment sizes):						
RTU-1 8,500 CFM	8,500	cfm	4.00	34,000		
RTU-2 10,000 CFM	10,000	cfm	4.00	40,000		
RTU-3 7,000 CFM	7,000	cfm	4.00	28,000		
HU-1 8,000 CFM	8,000	cfm	5.00	40,000		
HV-1 13,500 CFM	3,500	cfm	4.50	15,750		
Electrical disconnect and reconnect	5	ea	2,500.00	12,500		
Gas piping disconnect and reconnect	5	ea	1,500.00	7,500		
Misc roofing and curb work	5	ea	1,500.00	7,500	40= 0=0	405.0==
SUBTOTAL			-		185,250	185,250
		ADDED G	ENERAL CONDITION	5.0%	9,263	
		GL INSUR	ANCE	1.10%	2,038	
		BONDS		1.75%	3,242	
		BUILDING	PERMIT (waived			
		OVERHEA	D AND PROFIT	4.5%	8,991	
		DESIGN A	ND PRICING CON	10.0%	20,878	
		ESCALATI	ON		4.0%	9,186

WAKEFIELD PUBLIC SAFETY BUILDING - ESTIMATED PROBABLE COSTS

	Gross Floor Area Calculation	Existing Building Total	Renovation	Addition Construc	Final Proposed Total
	1st Floor		3,464		19,389
	3rd Flor				
<u> </u>	Total GSF		8,117	3,991	
Line		Spring 2018 Construction	Spri	Spring 2020 Construction	Comments
-	Estimated Hard Construction Costs	Bid	DIG	Dia	
2	Total Estimated Hard Construction Cost	\$ 4,452,061	\$ 4,630,143	\$ 4,815,349	Includes phased construction and 15% design and estimating contingency; Escalation at 4% per year (compounded) are shown for subsequent years.
3	Construction Contingency - 10%	\$ 445,206	\$ 463,014	\$ 481,535	Contingency carried for unforeseen conditions, change orders, etc.
4	Estimated Total Hard Construction Costs	\$ 4,897,267	\$ 5,093,158	\$ 5,296,884	
7	Entimoted Soft Poots				
	Architectural + Engineering Fees			_	10% of construction cost
	Owner's Project Manager (OPM) Fees	\$ 133,562	\$ 138,904	မှာ မ	3% of construction cost
၀ ၀	Legal Costs				
	Financing			S	TBD by Town
11	Commissioning			↔	Assumes building not pursuing LEED certification
12	Onsite Testing and Inspections	\$ 40,000	\$ 41,600	\$ 43,264	
5 41	Furniture, Fixtures + Equipment (FF+E): Furniture	\$ 85,000	\$ 88,400	\$ 91,936	Existing furniture to be reused. New budget reflects additional programmed
15	Dispatch Console Furniture	\$ 65.000	009:29	€.	scoped.
16	Office Equipment	_	_	· •	Existing office equipment including phones, computers, servers, A/V and display systems is assumed to be reused. New equipment budget reflects
17	Communications (dispatch, security/access control, cameras).	\$ 150,000	\$ 156,000	\$ 162,240	Assumes Radio, antennas, cell monitoring, CCTV systems are systems to remain.
18	Permitting Fee	- \$	€	₩	Assumes Town will waive permitting fees
19	Abatement/HazMat Allowance	· \$	· \$	· &	
20	Clerk of the Works	\$ 115,000	\$ 119,600	\$ 124,384	Assumes 14 months phased construction.
21	Additional Services (survey, geotech, HazMat Utility Company Back-charges	\$ 100,000 \$ 25,000	\$ 104,000 \$ 26,000	\$ 108,160 \$ 27,040	
23	Estimated Soft Costs	\$ 1,558,768	\$ 1,620,719	\$ 1,685,132	
24	Estimated Probable Additional Soft Costs				
25	Prequalification	· &	€	€9	Required at \$10M construction cost or at the Town's discretion
26 27	Temporary Relocation and Moving Costs: Transition Costs (movers to and from temporary	\$ 40,000	\$ 41,600	\$ 43,264	
28	Temporary Infrastructure/Site Services to Trailers/Tent (Roll-up Generator, phone and computer connections, etc.)	\$ 75,000	\$ 78,000	\$ 81,120	
29	Temporary housing for Police Department	- \$	٠ ٧	۰ د	TBD. Approx. 7,000sf of space
30	Estimated Total Probable Soft Costs	\$ 115,000	\$ 119,600	\$ 124,384	
31				•	
32	Estimated Total Probable Hard and Soft Costs Owners Contingency - 3%	\$ 6,571,035 \$ 197,131	\$ 6,833,476 \$ 205,004	\$ 7,106,400 \$ 213,192	
34	Estimated Total Probable Project Costs	\$ 6,768,166	\$ 7,038,481	\$ 7,319,592	



APPENDIX G - PHOTOGRAPHS



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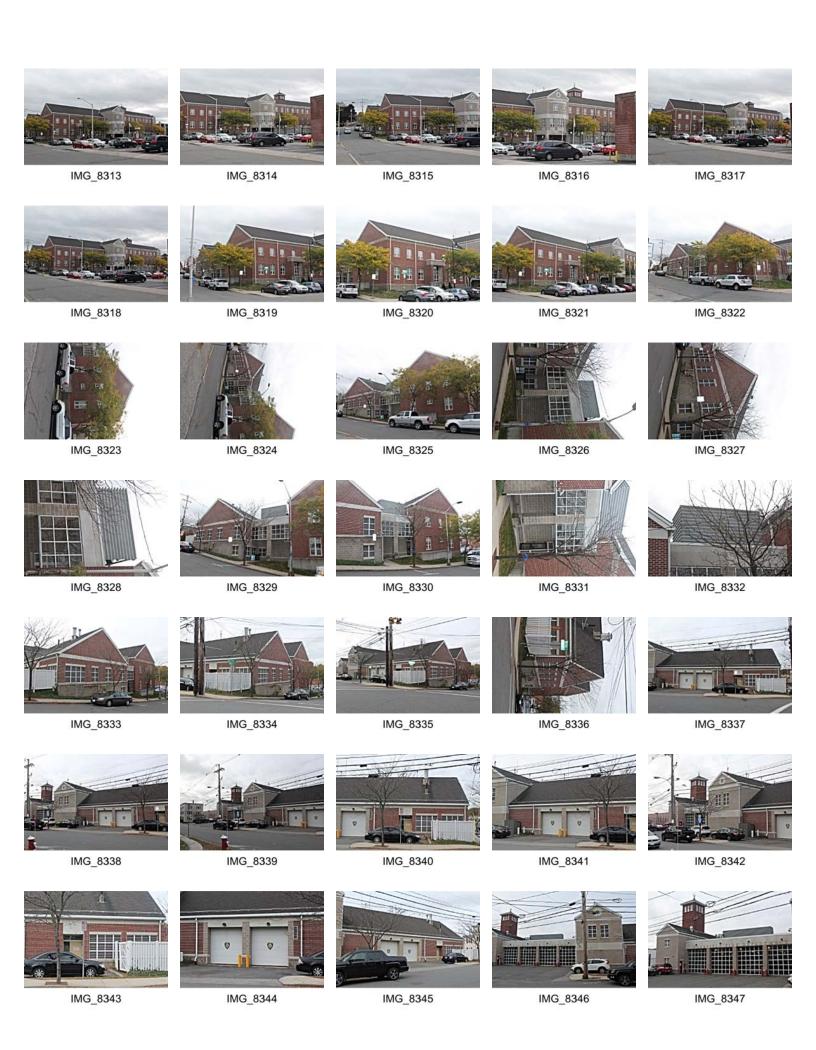
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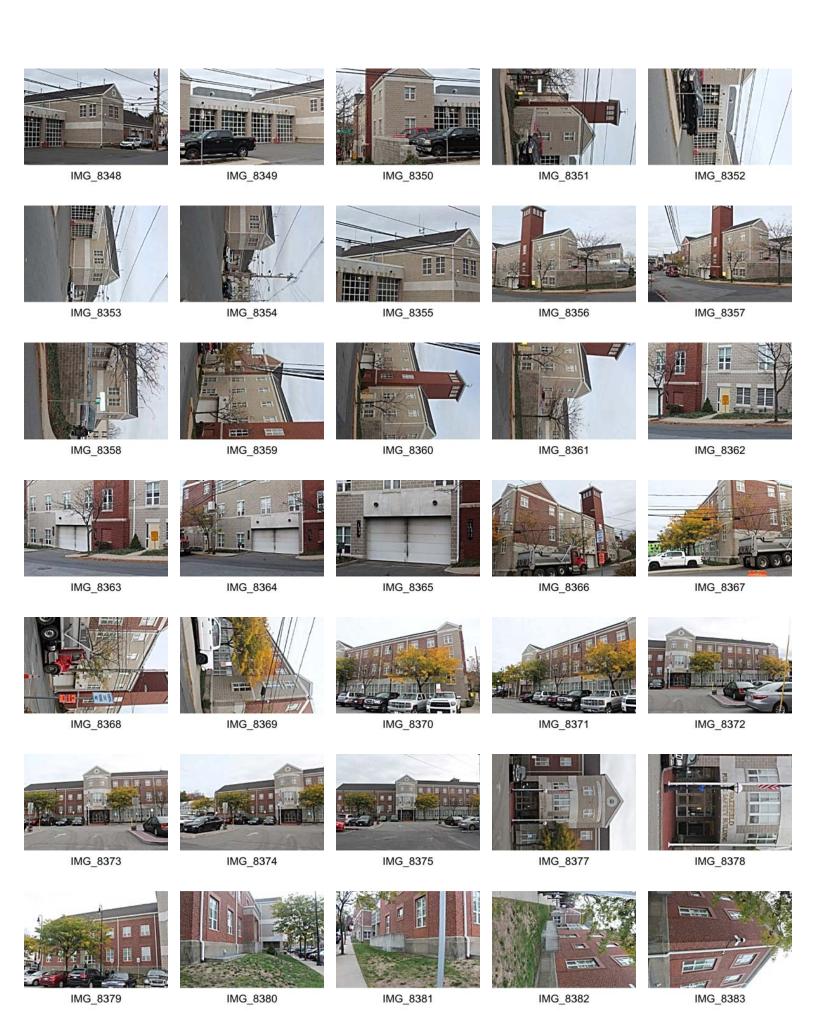


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20161027_111055



20161027_111058



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20161027_113312



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20161027_113333



20161027_113634



20161027_113645



20161027_113653



20161027_113835



20161027_114146



20161027_115058



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20161027_120318



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20161027_121256



20161027_121325



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20161027_122017



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20161027_122350



20161027_122435



20161027_122502



20161027_122506



20161027_122605



20161027_122612



20161027_122616



20161027_122641



20161027_122659



20161027_122732



20161027_122734



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20161027_122830



20161027_122902



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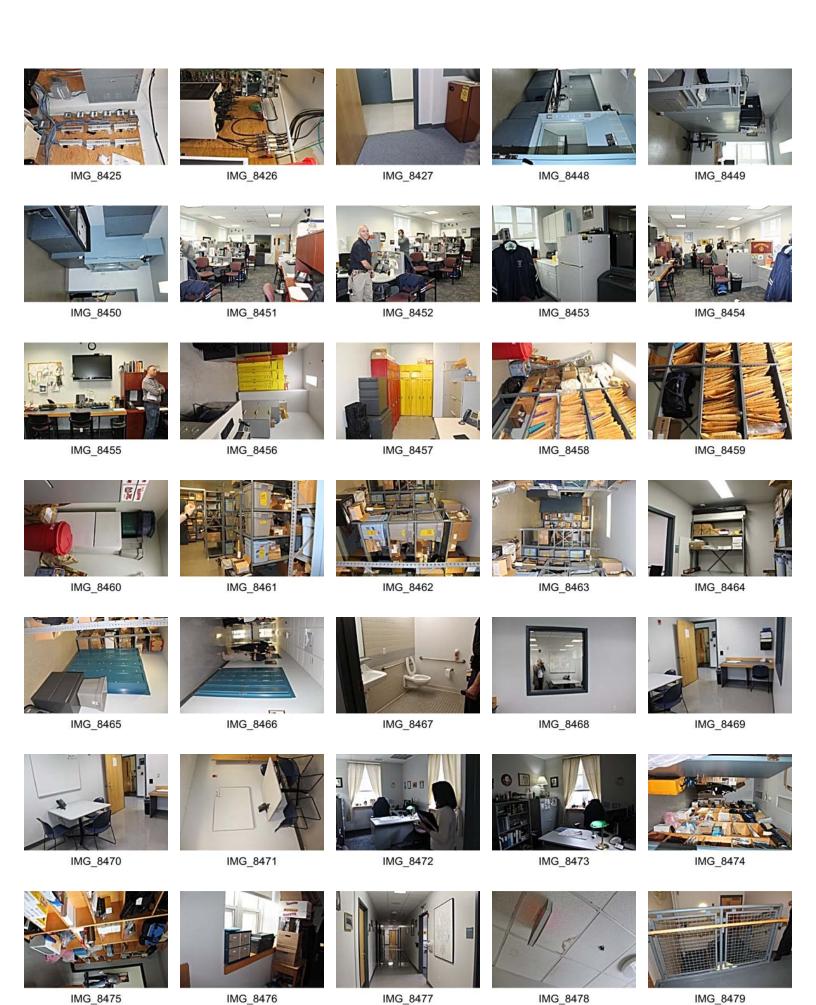
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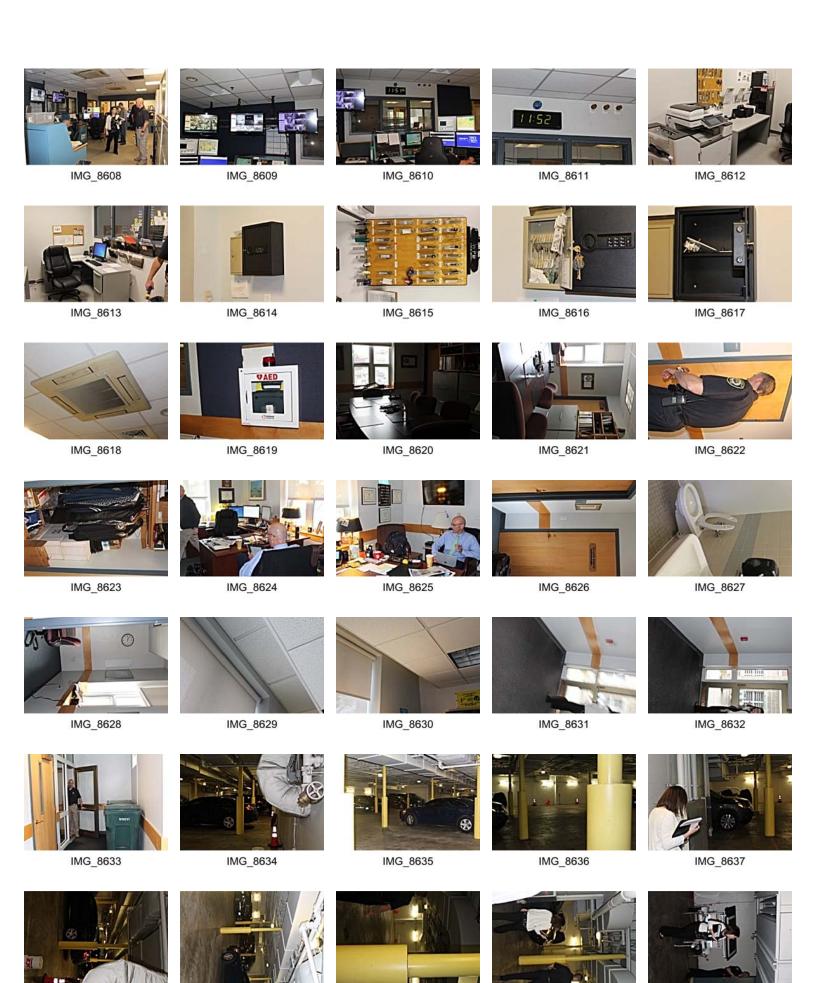
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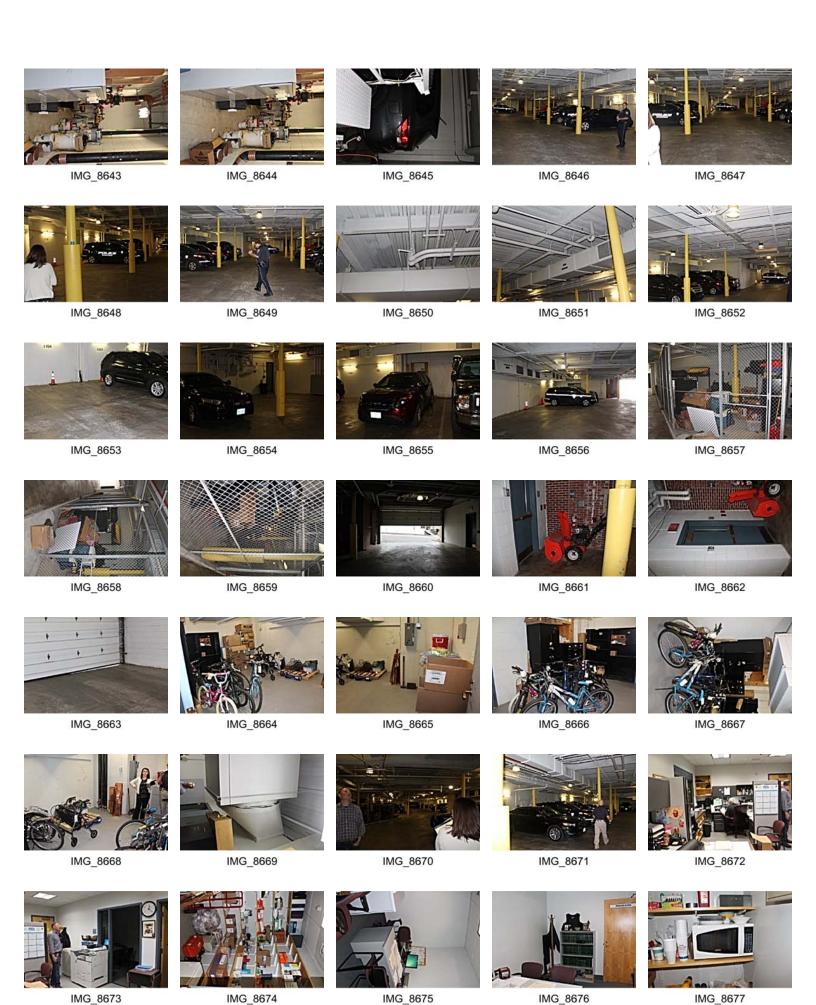
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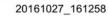












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