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Architects Inc.

MEETING MINUTES

PROJECT NAME:	Northern Adelphi Area HS	CLIENT NAME:	Prince George's County Public Schools	PROJ #:	2002
DATE:	03/09/2021	MEETING TYPE:	PPC Meeting	MEETING #:	1
ATTENDEES:	John Wooden, Deanna Newman, Kyle Cross, Scott Adams, Lillian Garcia, Joselyn Nolasco Guevara, Magalie Salas, Tom Dernoga, Pamela Boozer-Strother, Joshua Thomas, Alvi Escobar, Bianca Flores, Gloria Mikolajczyk, Elizabeth Chaisson				

DISCUSSION ITEMS (list by subject):

GENERAL

1. Members of the committee introduced themselves. Mr. Wooden asked for everyone to type their name and role in the chat and if they did not receive the invitation directly, to add their email address in the chat as well.
2. Ms. Newman reviewed that the HS will be constructed on the existing Cherokee Lane ES site while Cherokee Lane will move to a new location adjacent to Buck Lodge MS.
3. PGCPS is moving to a regional school philosophy regarding CTE programs. Northern Adelphi Area HS will be the Northern CTE HUB and is sized to accommodate a total of 2,600 students.
4. CTE programs will consist of Automotive/Transportation, Construction Trades, Child Care, Cosmetology/Barbering, Culinary Arts, Intecs, Project Lead the Way, Networking, Media Arts, Healthcare (Dental, Nursing, Clinic), and Business Programs.
5. Current philosophy is to integrate CTE programs into academic aspects in the school rather than a dedicated CTE wing.

SITE PLAN

6. Mr. Cross presented the overall site plan identifying the existing Cherokee Lane Elementary School and the surrounding University of Maryland, State of Maryland, Adelphi Community Park, Tabernaculo de la Fe, and Buck Lodge Middle School/Cherokee Lane Elementary School.
7. Mr. Cross presented the High School property indicating the traffic access to the site, with Parent drop-off at the front of the school. Staff and buses will enter the site from a new access drive from Metzerott road. Buses will travel behind the HS building while the main teacher parking is located at the front of the school with some parking spaces along the rear bus drive.
8. Concerns were raised about activities occurring in Adelphi Community Park. PGCPS will contact their Security Division about working with Parks and Rec on improving security of the Adelphi park. Concerns voiced about the separation of the playground facilities since baseball and softball are shown on M-NCPPC property. Having HS security onsite may alleviate concerns about the park property.
9. Mr. Dernoga has requested looking at all access to the site to come from the Metzerott Road access drive including student and parent drop-off to eliminate any traffic coming through the neighborhood.

10. Mr. Dernoga indicated that the High Point community will be disappointed that CTE programs will not be constructed as part of the High Point project. Mr. Dernoga indicated that there is the need for equity as High Point has been left behind on previous projects.
11. Ms. Boozer-Struthers indicated her support for High Point and indicated that if CTE is happening at Northern then High Point should have its own unique focus.
12. Ms. Chaisson noted that some CTE programs will remain at other high schools, but this high school will be the northern hub with all available CTE programs. New and replacement high schools such as Suitland HS are currently being designed with a smaller number of CTE programs. The High Point community will have an opportunity to discuss CTE and other programs to remain at High Point when their Project Planning Committee starts meeting.
13. Ms. Graves voiced concerns about student parking being in several locations on the site. She indicated that it should be consolidated in one location on the site. She also indicated concerns about mixing staff parking with the bus drive as at her school there are issues as many of the teachers like backing into the parking spaces in the morning which delays the bus traffic.
14. Questions were asked about the delay of Cherokee Lane Elementary School and what the anticipated construction completion is. Mr. Adams responded that the approval process for Cherokee Lane ES was significantly extended due to organic soils onsite, as well as coordinating approval of the offsite construction. The schedule for the project has the onsite work and total school completed by Spring 2022. Approximately 70% of the building is being constructed offsite which is approximately 70% complete currently. Ms Chaisson shared the link to the Cherokee Lane ES replacement school web page with pictures of the off-site building. She also shared the link to the New Northern Adelphi Area HS web page that will be updated with today's presentation and the Ed Spec.
15. The floor plans were presented to the group by Mr. Cross. The ground floor consists of Automotive/Transportation, Construction Trades and Building Services. The lower floor has a central atrium space that will serve as the school cafeteria. Child Care, Intec, Networking and Project Lead the Way programs are located on this level along with Art and general classrooms. Gender neutral bathrooms are located on all five levels and stack on each floor. The main building entrance with Administration, Guidance and the Media Center is located on the first floor with public areas to the left of the entrance consisting of Auditorium, Gymnasium, Music and Locker rooms. Culinary Arts, Media Arts, and Cosmetology/Barbering are in the classroom wing on this level along with general classrooms and the regional Special Education program. The second floor contains the Business CTE program, CTE Teacher academy and ESOL newcomers suite as well as many general classrooms. Science and Health Sciences are on the third floor overlooking the roof of the cafeteria/atrium below.
15. Ms. Salas expressed her appreciation of the design efforts so far to provide a well needed facility for the school system.
16. Mr. Wooden requested input on a frequency and time for future community meetings. in light of the participants schedules – Wednesdays seem to work well. The next meeting has been set for March 24 – 4:30 p.m. Following that, meetings will occur once per month, dates yet be determined.

ACTION ITEMS (Who's doing what and by when?):

GAI to continue to develop floor plans. Next meeting should include the presentation of other site options explored to date.

NEXT MEETING (Date, time, location, purpose):

March 24, 2021 4:30 p.m.

ITEMS DISTRIBUTED (What was distributed and to whom):

Introductory PowerPoint, overall site plan indicating adjacent properties, School site plan showing traffic flow around the school, Floor plans for all five levels were presented and will be posted on the PGCPS website when available.

COPY (Who wasn't at this meeting, who needs this information?):

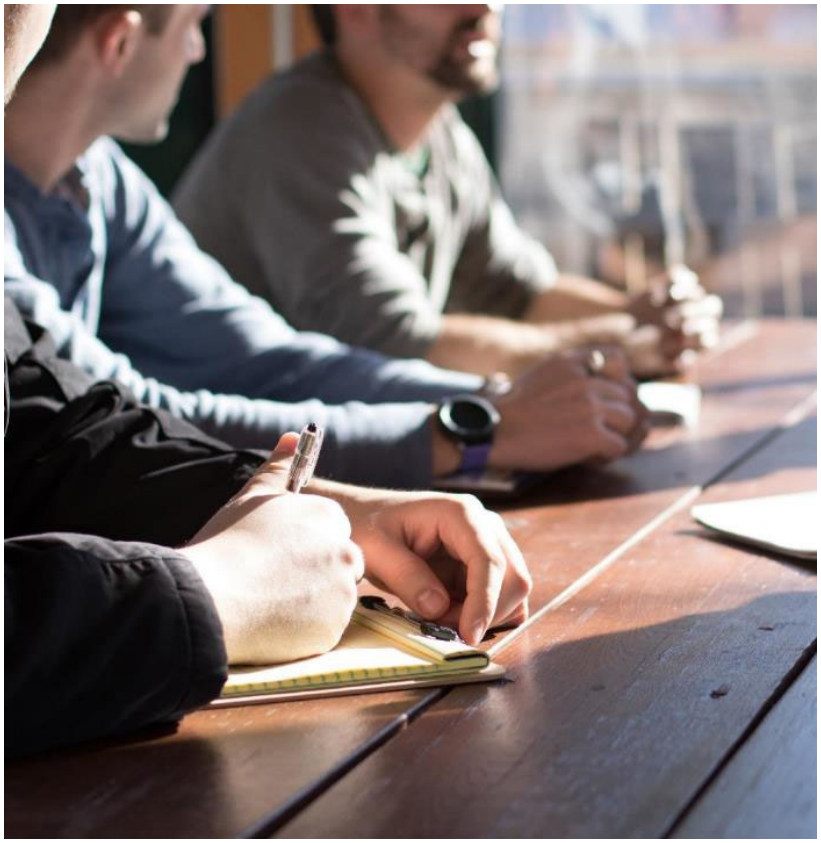
Joseph Howell

Northern Adelphi Area High School
Project Planning Committee #1

March 9, 2021

Agenda

- Role of the PPC
- Introduction of Project and Status
- Overview of Ed Specs
- Introduction of the Architects
- Concept/Site Design



Role of the Project Planning Committee

Project Planning Committee (PPC)

- Provide input on the early stages of the design (advisory)
- Represent feedback from the community or other stakeholders
- Communicate progress to broader community

Project Planning Committee Members

The PPC is chaired by the school principal (or a designee). However, most meetings will be coordinated and facilitated by the Department of Capital Programs (CP) staff or consultants.

- Teachers/School staff
- Parent/ Teacher Association Representatives
- Neighborhood/Business Representatives
- Students
- Board Member and other elected officials
- PGCPS Central Staff Representatives, as needed
- Supporting Services Representatives, as needed
- MD State Dept of Education (MSDE) School Facilities Architect, ex-officio

Current Status

- PGCPS Board Approval
  - February 21, 2019
- Educational Specification Draft (for Test Fit)
  - Summer 2020
  - Revised Fall 2020/March 2021
- Design Process
  - Architect Selection, Board Approval (Gilbert Architects)
  - Test Fit/Schematic Design
  - Project Planning Committee Convened
  - Future Community meeting TBD

Our New High School

- Located on the current Cherokee Lane ES site (new Cherokee Lane ES being built adjacent to Buck Lodge MS)
- Provide enrollment relief to High Point HS and other northern area high schools
- In addition to a comprehensive high school program, this school will be the Career and Technical Education (CTE) Northern Area Hub

Overview of Educational Specification

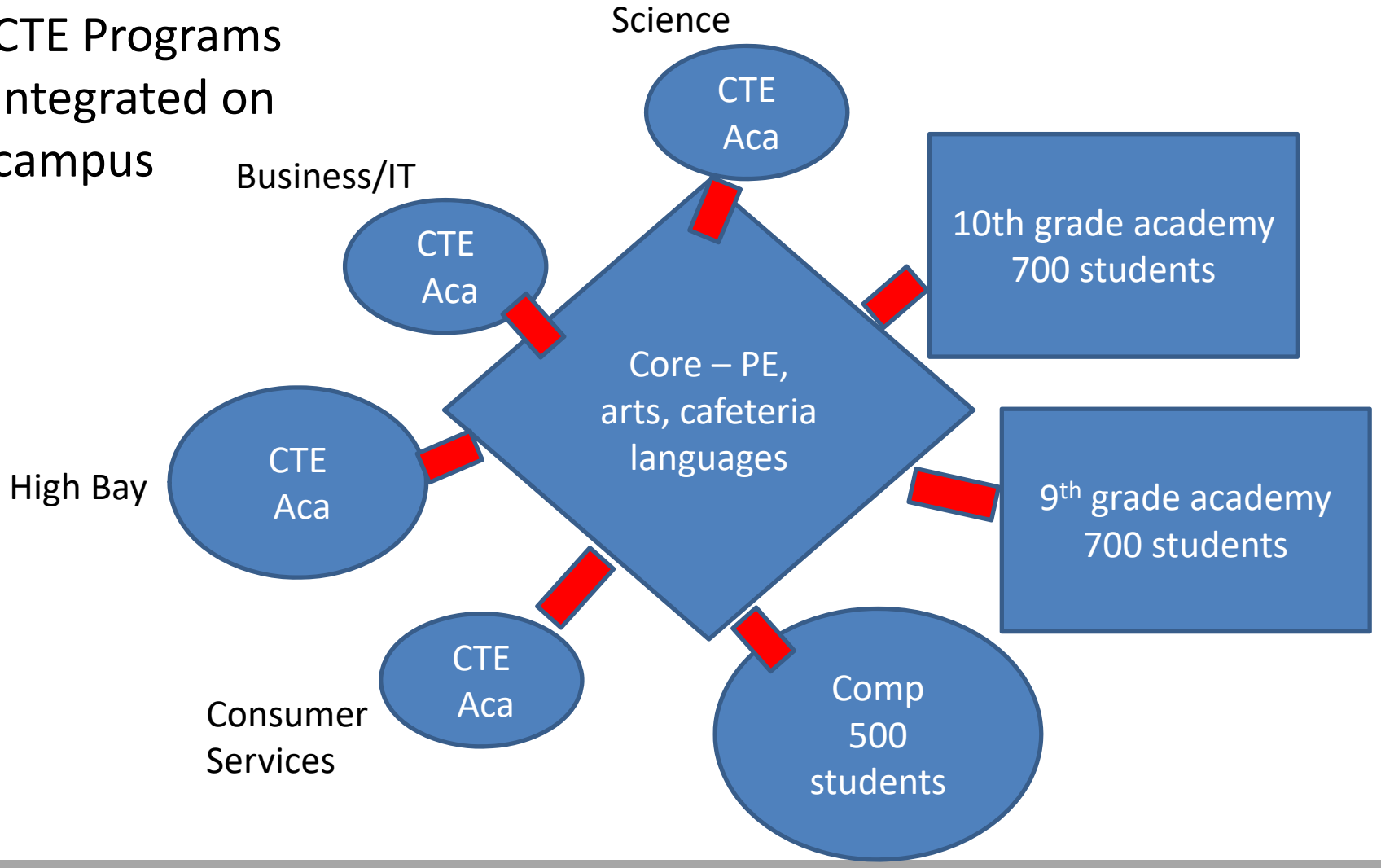
	# of Rooms	# Students/ Room	State Capacity
Core Academic Classrooms/Studios (English 20; Math 20; Social Studies 15; World Language 4; Health 1; Other* 5)	65	25	1,625
Special Needs Students	6	10-15	60
ESOL	6	20	120
Science Labs	12	25	300
Performing Arts (Band/ Chorus/ Dance)	3	25-50	75
Elective Labs	2	25	50
Visual Arts/STEAM	4	25-32	100
Technology Education	3	25	75
PE/ Gym	6	25	150
Other PE (Fitness)	1	25	25
Total **At 85% Utilization (SRC)**	**110**		**2,580** **2,193**

Overview of Educational Specification

CTE Programs	# of Rooms	Students/ Room	Capacity
Construction and Development	7	20	140
Transportation Technologies	2	20	40
Barbering and Cosmetology	3	20	60
Early Childhood Education /Teacher Academy of Md.	2	20	40
Culinary Arts	1	20	20
Health and Biosciences	3	20	80
Information Technology (Cisco)	1	20	20
Business	3	20	60
Interactive Media, and Communication	1	20	20
Manufacturing, Engineering and Technology	3	20	60
Total State Rated Capacity At 85% Utilization (SRC)	26		540 459

Overview of Educational Specification

CTE Programs integrated on campus



Communications

New Northern Adelphi Area HS (pgcps.org)

- Educational Specification
- All Presentations
- Minutes

Prince George's County Public Schools

Northern Adelphi Area High School with Northern Career and Technical Education (CTE) Hub Educational Specifications 2650 Capacity

March 2021
Draft v3

Table of Contents

General Planning Considerations

Northern Area Career and Technical Education (CTE) Hub

The new Adelphi Area HS will be the location of the Northern Career and Technical Education (CTE) Hub. This hub will house all the certificate-based programs PGCPS offers in one location. In addition to a neighborhood enrollment, the school will accept students from out-of-boundary who want to enroll in one of the 26 CTE programs.

Although most CTE courses are two-year (11th – 12th grade) programs, the entire curriculum is expected to focus on prerequisite knowledge and cohort development. The CTE programs should be distributed throughout the school like academies in a flexible 'wheel and spoke' model (ex. Business/IT 'spoke', Science and Health Care 'spoke', Consumer Services 'spoke').

The Architecture and Design and Automotive Engineering 'academies' must be designed for high bays and outside access. It is important for these areas to be flexible to accommodate a changing number and type of courses.

Performance Requirements

Design for Learning

PGCPS considers the entire school grounds as a teaching opportunity, with a central space as the 'outdoor learning area or classroom'. The architect shall include formal and informal learning spaces throughout the campus, including, but not limited to:

(a) Structured outdoor classroom areas, with appropriate site furniture and physical layout
(b) Learning gardens
(c) Indoor and outdoor colloquy and small group spaces for gathering and instruction.
(d) Educational displays and instructional material in community and public spaces
(e) Display space for student projects, artwork and awards

Equity and Accessibility

Handicapped Accessibility

The entire facility shall be accessible for students, staff, and visitors. This will be accomplished through judicious use of ramping and elevators with enough internal clearances for circulation, convenient bus/van loading and unloading, and nearby handicapped parking spaces.

All elements of the Americans with Disabilities Act must be complied with, including
(a) 'wayfinding' and signage,
(b) appropriate use of textures, lighting, and other sensory cues, and
(c) universal accessibility of all indoor and outdoor school facilities.

Students with Special Needs

The design shall integrate special education facilities throughout the school to support the concepts of inclusion and the specialized requirements for the students. Special attention will be given to accessibility of all facilities and an integrated learning program.

Planning Considerations

Facilities shall be designed and constructed to address students' needs, including sensory indicators. Attention shall be paid to lighting, color, ambient acoustics, etc.

Restrooms, Shower and Changing Facilities and other private accommodation

PGCPS respects and supports students' desire for both privacy and inclusiveness regarding restrooms, shower and changing facilities, and other private accommodations. In addition to the typical gender-based group restrooms near the gymnasium and cafeteria, the design shall provide gender neutral bathroom clusters in the classroom wings to include the following:

(a) Single-occupancy, lockable student toilet rooms (quantity per code)
(b) Hand-washing facilities adjacent to each toilet room or row of rooms
(c) Design/placement that allows direct adult supervision of student ingress and egress from the corridor or public area

Special Programs

In addition to being the northern area Career and Technology Hub, Northern Adelphi Area HS will house a regional special education program.

Language Access

Provide dual language signage in Spanish.

Community Use

The facility shall be designed and constructed to facilitate community use both during ad outside regular school hours. It is assumed that the community will use the building for recreation, meetings and educational functions.
Design elements shall include:

(a) Zoning and security layering to allow for selective use of space. Layering shall include both passive (gates and fencing) and active (intrusion detection) measures
(b) Placement of facilities and circulation to provide direct access from outside to community spaces, and to minimize mixing of traffic
(c) Zoning of MEP systems to allow for selective use of space.

Student, Staff and Visitor Safety

The design shall apply the principles of Crime Prevention Through Environmental Design (CPTED), a multidisciplinary approach to deterring criminal behavior that relies on both passive and active measures. CPTED's main principles include "natural surveillance," which gives legitimate users opportunities in the course of their ordinary activities to keep an eye on the place and the people around them; "natural access control," which directs users to enter through observable areas (single point of entry); and "territorial reinforcement," which encompasses a variety of strategies for signaling that a place is occupied and cared for. One main idea of designing safety is to create several layers of security, or concentric rings of access, starting with the perimeter and then working inward into the school. If there is an intruder, each layer of security is designed to delay him or her until first responders can arrive.

Planning Considerations

Site Perimeter: School sites shall have perimeter security fencing around the building/campus preventing access to walkways and courtyards when facility is not occupied but allow for public use of exterior athletic facilities.

Fencing and landscape leading up to the entrance. Create a perimeter where everyone must walk up on foot, so that people inside the school can easily see who is coming.

Building Perimeter: Exterior doors shall prevent unauthorized entry by minimizing key locks and hardware on doors which would not be used for the purpose of entry but are installed for emergency egress.

Interior Spaces

(a) Locate administrative and teacher preparation with good visual contact of major circulation areas (i.e., corridors, cafeteria, bus drop-off, parking)
(b) Locate areas likely to have significant community use close to parking and with zoned access

Egress and Life Safety

(a) All doors into classrooms, offices and support areas must have a clear safety glass window with blinds for control of views into the classroom; doors should be able to lock from the inside allowing the ability to shelter in place
(b) Provide emergency/stand-by generator capability for kitchen equipment, emergency lighting, one boiler, one pump. Where appropriate, size equipment to be in compliance with MEMA regulations

Types of Building Materials

(a) Incorporate pitched roofs (ground floor) which inhibit roof entry and are aesthetically pleasing
(b) Install non-slip floors at point of entry
(c) Limit size of windows – use multiple smaller windows rather than one large window
(d) Use durable wall surfaces that are easy to clean so graffiti can be removed

Uses of Technology:

(a) A Visitor Management system which enables schools to issue visitor badges with names, pictures and reasons for the visit, and time and date printed on them; to monitor volunteer and visitor hours; and instantly check all visitors against registered sexual offender databases in all 50 states.
(b) Card access and video intercom at the main entrance, cafeteria, and hallway entry-exit points.
(c) Building-wide all-call designed to be heard throughout the school and on the playfields
(d) Key systems that track users
(e) DMP Control Panel and keypads for burglar alarm system control
(f) DMP wireless panic buttons at the secretary desk and administration offices
(g) Tri-Tech passive infrared and microwave Doppler radar detection with cover tamper and anti-masking including normally open alarm circuit
(h) Phones in every instructional and support area
(i) Genetec VMS monitoring Axis IP cameras installed inside and outside of the building
(j) Bosch TriTech+ detectors in all classroom and instructional spaces

Security Camera Requirements

(a) One (1) camera to provide coverage of the exterior of the main entrance

Planning Considerations

(b) One (1) camera to provide coverage of the main entrance vestibule
(c) One (1) camera to provide coverage of the interior of the main entrance and lobby
(d) One (1) camera to provide coverage of the entrance of the main office
(e) In all hallways, no less than one (1) camera every 50 (fifty) feet, with cameras on opposite walls facing different directions so as to provide coverage of the hallway in both directions
(f) In stairwells, no less than one (1) camera per landing
(g) In gymnasiums, cafeterias, media centers, and all other spaces with a capacity larger than 50 (fifty) people, no less than one (1) camera in each of the four corners of the space
(h) In the Digital Media Suite, one (1) camera to provide coverage of the production multi-media studio, one (1) camera to provide coverage of the control room, and one (1) camera to provide coverage of the media lab.
(i) No less than one (1) camera to provide coverage of any courtyard spaces
(j) No less than one (1) camera to provide coverage of any data outlets located on the exterior of the building or in any outdoor spaces
(k) No less than one (1) camera to provide coverage of every exterior corner of the building
(l) No less than one (1) camera to provide coverage of every exterior entrance to the building
(m) No less than one (1) camera to provide coverage of each outdoor classroom or outdoor learning area

All student spaces shall have interior vision glazing in the form of interior windows, door vision panels, and/or sidelights to allow for passive supervision and monitoring of space, except where noted in the Area Data Sheets, or where required for privacy. Glazing shall be designed to minimize concealed spaces, while limiting the potential for distraction

Privacy cubicles (restrooms, showers, etc.) shall have full height doors and partitions in classroom wings. Group gender-based restrooms may have partial partitions typical of school design.

Transparency from the classrooms into the hallways will increase supervision and encourage use of the space for learning. However, the height, opacity, and number of windows must be balanced against distraction to students and staff in classrooms. Students must be able to ‘shelter in place’ in their classrooms out of sight of the hallway.

Wayfinding and Orientation

The campus layout shall be designed to provide clear wayfinding and orientation without relying solely on signage. The building massing and orientation shall be designed to focus on key circulation elements.

(a) Every school shall have a monument sign and a mounted building sign. The monument sign is a free-standing, durable sign that has the name and address of the school with electric, protected message board. It shall be located on the site to be visible by cars on the main road in front of the school. The school name building sign must be located above the main entrance visible from the visitor parking
(b) From the parking and walking access areas, all visitors must be able to identify a ‘single point of entry’ to the school.

Immediately upon entry, universal signage and visual cues shall guide visitors to a main lobby area with seating and access to the main office staff. Visitors are required to enter the welcome center before proceeding into the rest of the school.

Registration and family services shall be located near the main office. The other administrative offices and guidance services may be decentralized to increase security and supervision throughout the campus.

Site Design Requirements
Exterior Site Security Requirements

School sites shall have perimeter security fencing preventing access to walkways and courtyards when facility is not occupied but allow for public use of exterior athletic facilities. Design exterior doors to prevent unauthorized entry by minimizing key locks and hardware on doors which would not be used for the purpose of entry but are installed for emergency egress.

A flagpole and electronic marquee will be installed in the front of the school.

Stand-off distance and crash protection

(a) Buildings and site shall be protected at all points from vehicle impact. The design intention is to prevent penetration of the exterior by vehicle impact, including intentional acts.

(b) The level of protection shall be minimum K8 rating, as set forth in the Department of State SD-STD-02.01 Certification Standard: Test Method for Vehicle Crash Testing of Perimeter Barriers and Gates, Revision A, March 2003, such that a vehicle shall not be able to penetrate the exterior envelope. Protection may be provided by site configuration, by strengthening at the exterior envelope, or by adjacent structures, landscape features or bollards. Where site configuration limits potential vehicle speeds, the level of strengthening or protection required may be reduced accordingly provided the overall design intent is maintained.

Landscaping

(a) The architect shall comply with the PGCPS Design and Construction Standards and design and construct landscaping to allow good visibility for personal security and to eliminate areas of concealment.

(b) Planting at Utility Devices that require access, including fire hydrants, backflow preventers, and such like, shall be installed as to allow a minimum of three (3) feet of clear access between the edge of plant when mature and the utility element on all sides, and clear access to roads or pathway. Planting at such elements shall not have thorns or bee attractants, or in any other way pose a hazard to people accessing the Utility Device.

Project Site Circulation
Vehicle & Pedestrian Circulation

Site Circulation

The architect shall design and construct a circulation system for the Project that is planned to provide safe mobility for all road users, including bicyclists, pedestrians, transit vehicles, deliveries, and motorists. The circulation system must serve multi-modal movement within the site and integrate

Planning Considerations

into the campus via seamless, convenient, and inviting connections to existing transportation facilities. The system shall be context sensitive and meet transportation goals in harmony with campus goals and the natural environment.

On and Off-Site Circulation shall be planned to ensure that facility can be in full compliance with the requirements of COMAR Article 13A.06.07 Student Transportation at all times.

Site Circulation Functional Requirements

(a) School bus loading and unloading areas shall be separated from parent drop-off areas and from staff parking.
(b) All areas shall be clearly identified. Use signage, curb striping and other pavement markings to direct parent pick-up/drop-off lanes and to prohibit unauthorized vehicles from entering the school bus loops. Signage and bumpers for parking spaces shall be provided by the builder.
(c) Non-bus riders who walk and/or bike to school shall be isolated from all types of vehicular traffic and provided adequate pathways to and from the school building. Bike racks shall be provided with visibility from the main office.
(d) Adequate space is shall be provided to load and unload students who have physical disabilities. Identify a school bus loading and unloading area closest to a door that is accessible for students who have physical disabilities to reduce the distance from the school building to the bus.
(e) Bus loops shall accommodate both immediate and future needs to allow for expansion of programs and an increase in bus ridership that will result in more buses.

Pedestrian Walkways and Bicycle Paths shall be designed to adequately support pedestrian and bicycle circulation. Width shall be commensurate with the level of pedestrian activity projected within the particular location of such pedestrian.

All paths of travel shall meet ADA requirements, and at a minimum, shall be wide enough to accommodate two-way pedestrian and wheelchair traffic.

Design official pathways to minimize creation of ad-hoc paths.

Fire Access Lanes

Fire access lanes shall be designed in accordance with the county code requirements: https://library.municode.com/md/prince_george's_county/codes/code_of_ordinances?nodeId=PTIITI17PULOLAPRGECOMA_SUBTITLE_11FISA_DIV4FIPRCO_S11-276REACFIAP

Project Site Roadway Signage

The builder shall provide all required signage for safe operations and wayfinding for all roadways, parking, pedestrian walkways, and bicycle paths. All pavement markings and roadway signage for circulation roadways shall conform to the requirements of the current edition of the MUTCD.

Bicycle Facilities Requirements

Design and construct the Facilities to adequately support bicycle circulation and storage and to meet the following requirements:

(a) Short-term bicycle parking shall be provided through the use of bicycle racks securely anchored to the ground.

(b) Short-term bicycle parking shall be provided for at least 50 bikes with associated racks carefully integrated with the landscape design placed with in proximity of the main entrance to the IBTT but also serving the DMC.
(c) Parking shall be provided in conformance with LEED v4 guidelines.
(d) Bicycle parking installations shall include a bicycle area parking pad with a pervious surface. A minimum clear space of five (5) feet shall be provided between the edge of the bicycle area parking pad and adjacent roadways or sidewalks.

Parking and Circulation

Bus parking shall be designed and constructed in accordance with the following principles

(a) All buses for Arrival and Dismissal shall be accommodated on site with no off-site stacking. All buses are scheduled to arrive at the same time to the school for the dismissal bell time.
(b) No backing of buses on school grounds as per the county's Transportation Operating Procedures Handbook.
(c) Bus doors shall open towards the school building.
(d) Wheelchair loading/unloading zone shall be provided.

General Parking Requirements

Design and construct the Facilities to include a parking system that adequately supports the Program, complies with ADA regulations, and meets the following requirements:

(a) Privately owned vehicles (POV) parking is for cars and light trucks. Motorcycle/scooter parking, if provided, shall be conveniently located and is in addition to the POV parking space requirements.
(b) Up to 2.5% of the new POV parking spaces may have electric vehicle (EV) charging stations. Within the required number of EV charging stations, EV parking shall be provided at 2.5% of ADA compliant accessible stalls.
(c) Provide EV charging infrastructure for all EV stalls. EV charging Infrastructure shall include all power and data conduit, and charging and pay stations, and switchgear or panelboards adequate to support the fully connected loads. The EV charging infrastructure system shall be sized to allow simultaneous charging of all installed stations.

Trash/Recycling Handling Yard, Service Areas and Loading Zones

Design and construct Trash/Recycling Handling Yard, Service Areas and Loading Zones in accordance with the following requirements:

(a) The Trash/Recycling Handling Yard, and Service Areas & Loading Zones Areas shall be placed such that traffic use does not interfere with pedestrian, bicycle or vehicular traffic flow or safety. Particular attention shall be paid to vehicle maneuvering and reversing.
(b) On street loading shall not be permitted.
(c) Trash/Recycling Handling, Yards and Service & Loading Zone Areas must be large enough to accommodate delivery trucks and trailers, such that vehicles do not encroach into traffic lanes or emergency access lanes.

Planning Considerations

Circulation Requirements

Architectural Circulation Requirements

(a) Interior circulation systems shall provide clear and direct access to the Program Areas of each level, afford views to the exterior along and bring daylight into the interior along their length, through clerestories above adjacent doors, frosted glazing along walls, alcoves, connecting stairs, or other means. Exterior views shall, where possible, be designed to include scenic elements such as vistas or views of exterior landscape features. At a minimum, primary corridors shall provide views to the exterior at ends and corners as termination points.

(b) Interconnecting stairs shall be provided to encourage circulation and interaction between floors at intervals no greater than two hundred (200) feet.

(c) Interconnecting stairs may be integrated with egress stairs required by applicable Law provided the interconnecting stairs are designed as Non-Assignable Spaces: Interior: Stairwell: Primary Circulation.

(d) Where Programs are similar at multiple levels within the Building, interconnecting stairs shall be designed to be visible and open stairs, except where security layering requires closed or restricted access. Where fire control doors or shutters are installed, they shall be designed to be open normally and to be closed only in the event of fire alarm.

The Buildings shall be designed to provide universal access and to conform to all ADA requirements.

Educational Technology

The implementation of a voice, data, and video telecommunications system throughout schools is standard across the country. Appropriate and strategically designed and installed technology greatly enhances the teaching and learning of basic skills and positions a school to take advantage of technological developments in the future. All classrooms shall be multi-use/multi-purpose with invisible technological support. There should be a seamless web of technology to support the classroom management between administration, teachers, students, and the home.

Technology requirements in the building:

(a) Voice: Provide telephone (IP) and voice communications in every classroom and throughout the entire building as well as to other persons in the school system and external resources including parents and community members.

(b) Data: Provide wired broadband and wireless data retrieval capabilities in every classroom and throughout the entire building as well as network capabilities district-wide and to other external databases.

(c) Video: Provide video distribution in every classroom and throughout the entire building with interactive video capabilities to support whole and small group instruction, distance learning, and providing access to a wide range of internal and external resources.

A two-way voice communication system shall be installed that will provide communication between the administrative area and each teaching station or support area, with a telephone in every room. This same system should have the potential to carry an auditory signal automatically controlled and located in the administrative area. Provision should be made for these signals to reach all teaching and support areas including the outdoor activity area. The public address system shall be integrated with the telephone system with a Call Back (CB) feature from the classrooms and support areas to the main office.

All Teaching Stations

(a) Each learning studio (classroom, lab, resource room, conference room) will be equipped for multimedia presentation. The choice of equipment will be verified one year prior to school opening and will represent the best available teaching and learning tools at that moment.

(b) Interactive panels shall be mounted in all classrooms, labs and small group areas. Mobile interactive boards will be used in the media center and gymnasium

(c) All playback devices and accessories in classrooms are placed in a lockable A/V cart situated near teacher's desk. All devices are permanently connected to the display panel and the teacher can control the operation by remote control at the desk.

General Requirements

(d) Comply with PGCPS Design and Construction Standards and construct IT specific spaces in each Building including MDF rooms and IDF rooms (collectively, the "**IT Rooms**") in accordance with the PGCPS specification Division 27

Audiovisual Systems

(e) Design and install Audiovisual (AV) systems at the Facilities in accordance with the requirements of Division 27 of the PGCPS Specifications

(f) Design and construct the Facilities to accommodate the Indicative AV Equipment Package for each Area Type.

(g) The builder shall be responsible for any power outlets required in connection with the AV Equipment are in addition to the outlets required for convenience power.

(h) Design and install Integrated sound system speakers, including in-wall and in-ceiling speakers. Speaker number, distribution and location shall be determined and shall be sufficient to provide uniform sound levels within the room with no distortion, feedback or echo

(i) The builder shall be responsible for the interface between AV control systems and building systems, including the room lighting control systems and Building Management Systems, and including any conduit, wiring and programming required at the lighting control or the Building Management System (herein referred to as "AV/Building System Interface").

(j) Owner shall procure, install, commission and test all AV Equipment detailed in the Area Data Sheets and the AV Equipment Packages including any mounting walls or ceilings. AV Equipment shall be installed to provide a complete, functional system.

(k) Any telecom service provided to installed AV Equipment shall be routed to the NEMA box by the rack and terminated to the switch installed in the AV rack. This switch will connect to main network service in the IDFs and MDFs. AV Equipment shall not receive telecom service directly from IDFs or MDFs

(l) All AV Infrastructure and the associated IT Infrastructure shall meet ADA requirements, including assistive listening systems, visual access, and other accommodations, as required by applicable Law.

(m) Control panels for lighting, window coverings, AV/Building System Interface controls, and thermostats shall be located as a group in each room.

Furnishing, Fittings and Equipment (FF&E)

Classroom activities vary in terms of grouping and orientation; therefore, the furniture should be flexible to accommodate a variety of classroom formats for both individual and group activities. Teachers and students should have storage space for personal belongings, papers, books, supplies, and teaching materials. To the extent possible, movable furnishings will be used, rather than fixed casework, to provide flexibility for future reconfiguration. Alterative seating options will be considered for comfort, mobility, and/or compatibility.

Planning Considerations

Provided FF&E includes all built-in and loose furniture (identified in the individual data sheets) and equipment needed to provide a fully functional project. An F&E matrix will be provided to clarify builder responsibility.

IT Equipment. Furnish and install passive components of the IT system including any racks, mounting points, raceways, cabling (conduit) and terminations, face plates, etc. and technology affixed to the wall such as interactive panels with audio enhancement in classrooms.

Procurement and Installation of FF&E

(a) The builder shall procure, place and install, as applicable, all FF&E in the Areas in consultation with the Owner.
(b) Provide all framing, supports, restraints, gasketing and sealants, and all connections to building systems for FF&E. FF&E shall be placed or installed, as applicable, to allow for easy access for maintenance, repair, cleaning and replacement.

Owner Review and Approval of FF&E

(a) The architect shall submit proposed FF&E designs, layouts and model numbers to PGCPS for approval prior to procurement.
(b) FF&E shall be included in all required mock-ups
(c) In the event the materials, products, millwork or finishes to be provided by Architect offer multiple color palettes, textures or finishes, the architect shall provide PGCPS with a minimum of three (3) options for such color palettes, textures or finishes for approval.

Adjacencies and Design Considerations

Cafeteria

The cafeteria and serving lines should be well lit with natural and artificial light. The ceiling height should be balanced with the overall volume and treated acoustically. A variety of seating options (square or round, high tops, counters, outside) is desirable. A minimum of four electrical charging stations should be placed around the room.

This area will be used for student dining, group activities, and community meetings. It is proposed through creative design that this area will effectively house multiple functions.

- A movable wall (overhead sliding) is required for multiple functions and allow for smaller student groupings at lunchtime.
- At least 2 permanently mounted, white eraser boards and electrical outlets for mobile projectors will support ‘break-out’ discussions
- Wireless capacity should match, or be greater than, room capacity at tables.

Corridors and Commons Spaces

The front entry lobby must be welcoming and inviting for students, staff, and visitors. A display monitor shall be provided in the lobby and additional display systems shall be provided for 2-dimensional and 3-dimensional student work and awards. Finishes must be durable and easy to maintain.

Minimize long low-lit hallways lined with classroom doors. Consider informal learning/ collaborative areas for pull-out and views to the outside. Transparency from the classrooms into the hallways will increase supervision and encourage use of the space for learning.
Provide alcoves at intersections to store two trash/recycling collection bins out of the trafficked corridor.

Sustainable Water Coolers shall include reusable bottle fill-up options.

Media Center

School libraries are changing from being quiet book-lined spaces for research and contemplation to multi-media, interactive studios for social collaboration for faculty and students. It is one of the largest most flexible areas in the school, transforming itself from dozens of varied self-directed activities to a large group meeting and presentation space in a matter of minutes.

Often part of school commons, new media centers are more than 50 percent digital and offer both learning areas as well as production areas. The ideal media 'commons' might move from noisy to quiet - through a 'café' and mobile computing environment, to small group study areas, to individual study carrels or an on-line learning room. Visual access and varied seating is important to create a transparent and inviting culture.

On-line and independent learning applications are some of many new learning paths that schools are embracing. Virtual schools and 'blended learning' models are successfully reaching some students who need to learn at their own pace. As part of the media commons, the on-line learning center will have access to a variety of resources and expertise.

Environmental Performance

Environmental Performance

Acoustic Performance Requirements

Design spaces to the acoustic performance as follows:

Acoustics	
AC1	Very High Performance: Performance or Lecture Space: Space suitable for performance or lectures. Very low ambient noise in the room, with good acoustic isolation from outside space, for both airborne and structure borne sound. Interior space acoustically designed to manage reflection and reverberation.
AC2	High Performance: Classroom, Conference Room or Confidential Space: Space suitable for teaching, confidential conversations and high speech intelligibility. Low ambient noise in room, with good acoustic isolation from outside space, for both airborne and structure borne sound. Interior space acoustically planned to manage.
AC2-1	High Performance: Classroom, Conference Room or Confidential Space (Large volume space): Space suitable for teaching, confidential conversations and high speech intelligibility. Low ambient noise in room, with good acoustic isolation from outside space, for both airborne and structure borne sound. Interior space acoustically planned to manage.
AC3	Medium Performance: Closed office: Space suitable for private conversations. Low ambient noise in room, with good acoustic isolation from outside space, for both airborne and structure borne sound.
AC4	Medium Performance: Open office and Workroom office: Low ambient noise in room. Interior space acoustically planned to absorb noise and manage reflection and reverberation.
AC5	Labs and Workshops: Space suitable for teaching, confidential conversations and high speech intelligibility. Potentially noisy activity in space. Low ambient noise in room, with good acoustic isolation to and from outside space,for both airborne and structure borne sound.
AC7	Public Space: Space suitable for public use, with moderate to high internal noise generation. High acoustic isolation to sound sensitive spaces. Interior space acoustically planned to absorb noise and manage reflection and reverberation.
AC8	Utility Space: High internal noise generation. Space perimeter designed to limit transmission of air or structure borne noise to other spaces.

Name	NC	STC	IIC	Max Reverb	Sound Masking
AC1	20	65/45	65	1.0	Not permitted
AC2	30	50/35	50	0.6	Permitted
AC2-1	30	50/35	55	1.0	Permitted
AC3	35	50/30	55	0.6	Permitted
AC4	35	50/30	55	0.7	Required

Name	NC	STC	IIC	Max Reverb	Sound Masking
AC5	40	50/35, limit transmitted from within space to 30dBA	50	0.6	Permitted
AC7	40	N/A	55	0.6	Permitted
AC8	60	limit transmitted sound from within space to 30dBA	55	0.4	Permitted

Acoustic separations shall continue above the ceiling plane and shall include any penetrations or joints. For areas with an STC rating of sixty (60) or greater, doors shall be fully gasketed doors with automatic door bottoms.

Fenestration (natural light) Requirements

Design spaces to achieve daylight illuminance levels of a minimum of 10 footcandles (fc) and a maximum of 500 fc in a clear sky condition on September 21 at 9 a.m. and 3 p.m. for the percentage of floor area noted in the table 3.9.3.2. Demonstrate compliance through modeling or field measurement. In addition, achieve a direct line of sight to the outdoor environment via vision glazing between 30 inches and 90 inches (between 0.8 meters and 2.3 meters) above the finish floor.

All windows will have roller shades, manually operated with blackout capability.

Temperature and Humidity Requirements

Summer outside air design temperature and humidity shall be consistent with the most stringent conditions for Washington, DC per ASHRAE Fundamentals Handbook (latest volume: 2017). Winter outside air design temperature shall be 11° DB, with low ambient conditions being designed to 0° DB.

Prince George's County Government requires all entities to keep setpoints at 78° DB in the summer and 68° DB in the winter. The design parameters below take these numbers into consideration along with keeping our facilities comfortable when true outside air temperatures exceed ASHRAE design standards.

Occupied spaces shall be designed to meet the following dry bulb temperature (DB) and relative humidity (RH) requirements:

- Summer: 72°F DB, 50% RH (Occupied setpoint: 76° DB; no higher than 78° DB)
- Winter: 72°F DB, 40% RH (Occupied setpoint: 70° DB; no lower than 68° DB)

Environmental Performance

Artificial Lighting Requirements

Design spaces to lighting performance specified below:

Lighting	
	Typical for classrooms, laboratories, large meeting rooms: 25 FC ambient and at work surfaces and teaching displays with multiple sets. Laboratory spaces shall be 50 FC
	Typical for offices & other workspaces: 30 FC ambient and at work surfaces
	Typical for conference rooms: 30 FC ambient and at work surfaces and walls
	Typical for circulation, stairwells, public areas: 50 FC ambient with focus lighting areas
	Typical for service & utility: 40 FC ambient, 70 FC at any service points or equipment
	Typical for restrooms, locker rooms: 10 FC ambient

Lighting Quality

(a) Luminance Balance: Illuminance uniformity and balance shall not exceed 3 to 1 for task to immediately surrounding areas and 40 to 1 at any point in any space.

(b) Color Appearance: The color corrected temperature (CCT) shall be 3,500K. The color rendering index shall be 80 or greater.

(c) Illumination levels: Illumination levels shall be as specified in the area data sheets. Minimum surface reflectance levels shall be 80% for ceilings, 50% for walls, and 20% for floors.

Lighting Layers and Controls

(a) Lighting Layers: Provide multiple lighting layers, including general room lighting and functional lighting as appropriate for room uses. Functional layers include focus lighting, downlights, wall illumination, task lighting and such like. Lighting layers shall be controlled through the lighting control system and individual occupant controls as required by room function.

(b) Lighting Controls: Design and build the Facilities to include the following lighting controls.

Lighting Control	
	Performance or Lecture Space: Lighting layers and Presets shall include multiple room settings for all planned room uses. Systems shall accommodate, at a minimum: lecture, stage presentation, projected image, video screen image, classroom participation mode, etc., and shall allow multiple audience lighting levels. All fixtures to be controlled via occupancy sensors and a local scene control dimming system. The local scene control shall be from devices at the Front of House (or lectern, where provided) and at the rear of the room. Each fixture type within the room shall be under a single lighting zone. The lighting zones together make up scenes which the dimming system shall have the capabilities to program and control. Fixtures at the perimeter shall have a photocell as well and have the capability to dim the fixtures closest to the window independently from the other fixtures. The scene control dimming system shall control the window shades. System shall have a separate zone for each window orientation and shade type (room darkening and blackout).

Environmental Performance

Lighting Control	
	Classroom and Multipurpose Room: Lighting layers and Presets shall include multiple room settings for all planned room uses. Systems shall accommodate, at a minimum: class, projected image, video screen image and classroom participation mode. All fixtures to be controlled via occupancy sensors and a local scene control dimming system. The local scene control shall be from devices at the teacher desk. Each fixture type within the room shall be under a single lighting zone. The lighting zones together make up scenes which the dimming system shall have the capabilities to program and control. Fixtures at the perimeter shall have a photocell as well and have the capability to dim the fixtures closest to the window independently from the other fixtures. The scene control dimming system shall control the window shades. System shall have a separate zone for each window orientation and shade type (room darkening and blackout)
	Conference Rooms: Lighting layers and Presets shall include room settings for all planned room uses. Systems shall accommodate, at a minimum: meeting, projected image, and video screen image All fixtures to be controlled via occupancy sensor and low-voltage switch (dimmed or bi-level control depending on fixture type). Each fixture type within the room shall be under a single lighting zone. Window blinds, if not controlled by scene controller shall have independent switching located adjacent to room switching/controller. Large conference rooms with multiple scene sets shall include scene controller, which shall also control window shades.
	Closed offices and Workspaces: Lighting layers shall include room settings for all planned room uses. Systems shall accommodate, at a minimum: general room lighting and task lighting. All fixtures to be controlled via occupancy sensor and line or low-voltage switch (dimmed or bi-level control depending on fixture type). Each fixture type within the room shall be under a single lighting zone. Window blinds may be manually operated, unless automatic control is required by energy management system or building design.
	Workrooms / Utility: Lighting layers shall include, at minimum, general room lighting. All fixtures to be controlled via occupancy sensor and low-voltage switch (dimmed or bi-level control depending on fixture type). Each fixture type within the room shall be under a single lighting zone. Window blinds may be manually operated, unless automatic control is required by energy management system or building design.
	Public Space: Lighting layers shall include room settings for all planned room uses. Systems shall accommodate, at a minimum: general room lighting and any functional lighting required for space use. Functional lighting includes countertop lighting, lounge lighting, etc. All fixtures to be controlled via central BMS control. Occupancy sensor may be used for staged lighting reduction where appropriate, provided minimum security and emergency light levels are maintained. Each fixture type within the room shall be under a single lighting zone. Areas shall be zoned to separate daylit areas from non daylit areas, and to match planned usage. Window blinds, if used, shall be automatically operated via central BMS control.

Environmental Performance

Outdoor Environmental Classroom

Connection to the Overall School Site: The outdoor classroom shall be in a controlled and secure location but not isolated from view. The exit from the school shall be accessible by all classes, e.g., not through a doorway in a classroom. The location should capitalize on natural site features (trees, steam, etc.).

Accessibility: All outdoor areas should be fully accessible to students of different mobility. For instance, at least some garden beds should be raised 18"-24" to be easily access from a wheelchair (if garden beds are built).

Layout: Provide a teachers' station with electrical outlet. Seating can be either fixed or flexible, depending on the site, but should accommodate up to 35 students.

Materials: The outdoor classroom should be built with natural materials like wood or stone. Limit the use of concrete to high traffic areas, for example the walkway connecting the school and the outdoor classroom. Permeable paving is encouraged.

Plants: When choosing plant material, preference should be given to native shade trees and low maintenance shrubs. Chose plant species based on how the mature size would fit into the landscape. Also, plants should be chosen with all 4 seasons in mind.

Required Site Elements:

- Duplex Electrical outlet at the 'teachers station'
- Wi-Fi access
- Exterior water hose hook-up
- Point of access for larger vehicles and supplies
- Seating for one class (35 students)
- Shade, either by a shade structure or by trees
- Tool shed for manual garden tools (shovels, hoes, rakes- provided by PGCPS)

Potential Site Elements:

- Composting area
- Greenhouse
- Interactive water and energy usage learning station
- Managed meadow
- Pollinator garden, with space and paths for students to get in and investigate
- Rain garden
- Vegetable/community garden plots/raised beds

Solar aspect/shade: The teaching area must be shaded, but the nearby areas for potential expansion with garden plots should receive 6-8 hours of sunshine a day.

Capacity Calculation

Table 1 shows the breakout of classrooms by subject area and the associated State Rated Capacity (SRC). Based on scheduling data, average class sizes vary from 20 to over 30. The SRC assumes that classrooms will be used 85% of the school day.

Graduation Requirements

All students graduating from a State of Maryland School must have 4 Carnegie Units (CU) in English and 3 each in Math, Social Studies and Science. Although only 3 credits of math are required for graduation, students must be enrolled in a math class every year. They will need 1 unit each in the fine arts and technology education plus .5 PE and .5 Health credits. Final selection includes either 2 credits of a world language or 2 credits of advanced technology education and 3 credits in electives OR 4-9 credits by successfully completing a State-approved career & technology (CTE) program and 1-4 credits in other electives.

As a career and technology hub, it is assumed that approximately 80% of juniors and seniors will be taking a CTE completer. In addition, all 9th grade students will be required to take a financial literacy class.

Most high schools in Prince Georges County Public Schools offer a continuum of class sizes that include classrooms with two teachers (one teacher trained in either special education or English for Speakers of other Languages), 'intensive' coursework in classes of 15-20 and honors classes that may have as many as 30 students. Depending on the school, 20-25% of the classes could be below the state formula of 25:1.

Table 1	Carn. Units Required	Classrooms Needed*	Classrooms Proposed
English	4	20	20
Math (every year)	3	15	20
Social Studies	3	15	15
Science*	3	15	12
Fine Arts	1	5	7
Technology*	1	5	3
PE/Health	1	5	5
Financial Literacy*	1	5	5
ESOL (20 teachers)*		10	10
CTE @16:1	2	25	26
World Language	0-2	5	4
Electives/Other	1-3	3	3
Total w/o special education (6 TS)		**128**	**130**

* Plus 3 CTE science labs, 2 PLTW labs, and 4 CTE technology/business labs
Financial Literacy is a PGCPS requirement
Estimate by PGCPS

Capacity Calculation

Capacity Summary for a 2652 Student School

	# of Rooms	# Students/ Room	State Capacity
Core Academic Classrooms/Studios (English 20; Math 20; Social Studies 15; World Language 4; Health 1; Other* 5)	65	25	1,625
Special Needs Students	6	10-15	60
ESOL	6	20	120
Science Labs	12	25	300
Performing Arts (Band/ Chorus/ Dance)	3	25-50	75
Elective Labs	2	25	50
Visual Arts/STEAM	4	25-32	100
Technology Education	3	25	75
PE/ Gym	6	25	150
Other PE (Fitness)	1	25	25
Total **At 85% Utilization (SRC)**	**110**		**2,580** **2,193**

* Avid, Financial Literacy, electives

Capacity Summary for Career and Technology HUB

	# of Rooms	Students/ Room	Capacity
Construction and Development	7	20	140
Transportation Technologies	2	20	40
Barbering and Cosmetology	3	20	60
Early Childhood Education /Teacher Academy of Md.	2	20	40
Culinary Arts	1	20	20
Health and Biosciences	3	20	80
Information Technology (Cisco)	1	20	20
Business	3	20	60
Arts, Media, and Communication	1	20	20
Manufacturing, Engineering and Technology	3	20	60
Total State Rated Capacity **At 85% Utilization (SRC)**	**26**		**540** **459**

Space Requirements Tables

Space Requirements Summary

Base Required Space	Square Footage
Academic Core /Science/Academic Support	95,700
Academic Special Education	8,850
ESOL	7,270
Administration/ Health/Guidance	12,000
Media Center	5,960
PE/Indoor	31,195
PE/Athletics Outdoor	2,460
Performing Arts	23,650
Student Dining & Food Service	18,250
Visual Arts	7,400
Building Maintenance & Custodial Services	3,050
Northern Technology Center	79,230
Net Total	**295,015**
Gross	**395,052**
Community Health Center	1,600

Site Requirements/Athletics

Priority One	
Stadium Field (soccer/football)	
Bleacher Seating - 2600 seats (Master Plan up to 3400)*	
400 Meter Track - 200 Meter Straight	
Long Jump & Triple on one side, Pole Vault Pit, Shot Put	
Baseball Field	
Softball Field	
Multi-purpose practice field for football, soccer and lacrosse (If feasible)	
Concessions/Restrooms	3,150 SF
Press Box [10 - 15 people in three sections]	600 SF
Storage (Exterior Grounds Equipment) [secure – brick w/ roll-up door]	600 SF
Ticket Booth	60 SF
Total Outside	**4,410**

* Bleaching seating expansion only allowable with additional parking

Space Requirements Tables

Academic Core Area Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Academic Classrooms/ Learning Studios	65	900	58,500	Average classroom 900 SF
Collaborative Learning Areas/ Commons/balcony	5	100-900	6,700	Independent and informal learning areas on each floor
~~Business Lab~~ Elective	1	1000	1,000	
Family and Consumer Science	1	2000	2,000	ProStart
Technology Education	3	1,100	3,300	~~May be lecture/labs or Suite = 1 wet lab and 2 classrooms~~
Science Classroom	12	900	10,800	Same SF, only a clarification of the design
- Biology/Generic Lab	5	1,000	5,000	One per 2 teaching stations
- Chemistry Lab	1	1,000	1,000	One per 2 teaching stations
Science Prep	6	200	1,200	
Small Group Instruction/ Alternative Education/ Resource Room	6	250-500	2,700	Located in learning areas
Storage, Chemical	1	100	100	In prep area between chemistry labs
Total			**92,300**	

Support Suite Space Requirements (1 per learning community)

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Administrative Offices	4	150	600	
Conference rms.	4	200	800	
Storage (Department Office)	4	100	400	English, math, SS, World, Lang
Teacher Support Rooms	4	400	1,600	
Total			**3,400**	

Space Requirements Tables

Academic Special Needs Space Requirements

Space	Design Guideline			Comments
As needed	Qty.	S.F.	Total	
Regional Program	3		5400	See appendix
Classrooms/Studios	3	850	2,550	One toilet centrally located with changing area
Co-teacher Suite	1	900	900	Special Education
Total			**8,850**	

English for Speakers of Other Languages (ESOL) Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	One larger toilet centrally located
Newcomers suite	1	1,600	1,600	
ESOL Resource Suites	2	2,400 2,400	4,800	Flexible spaces for 2-4 teachings stations each
Teacher Support Room - office - Conference	1 1 1	600 120 150	870	
Total			**7,270**	

Administrative Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Lobby	1	900	900	In addition to regular circulation
Reception/ Waiting Area	1	850	850	Includes 50 SF coat closet
Principal's Office	1	230	230	Includes 50 SF private toilet
Conference Room	1	400	400	
Mail Room	1	200	200	
Office, Administrative Assistant's	1	120	120	
Office, Attendance/ Clerical	1	150	150	
Office, Business Manager's	1	150	150	Includes 50 SF vault
Office, IT Coordinator - Storage	1	120 150	270	
Security Center/Office	1	300	300	
Staff Break Room/ Dining	1	600	600	Includes restrooms
Storage, Administrative Supplies	1	150	150	
Storage, Central Text Book	1	900	900	2,000 linear ft. shelving
Telecom (Head End) Room	1	250	250	Could be near Media Center
Toilet (adult)	1	60	60	
Workroom	1	200	200	
Total			**5,730**	

Space Requirements Tables

Guidance/Student Services Space Requirements

Space	Suggestions			Comments
	Qty.	S.F.	Total	
Reception/ Work Area	1	250	250	
Career and Workforce Center	1	650	650	
Conference/ Testing Room	1	250	250	
Offices				
Counselors	12	150	1800	
Registrar	1	150	150	
School to Career Coordinator	1	150	150	
Parent Resource Center			0	
Reception	1	150	150	
Office	1	150	150	
Parent Volunteer Room	1	700	700	
Pantry	1	300	300	
PTA Storage	1	200	200	
Records Room	1	300	300	
Toilet (Adult)	1	60	60	
Total			**5,110**	

Health Suite Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Reception/ Waiting Area	1	250	250	
Cot Rooms	2	200	400	
Exam Rms/ Treatment Area	1	140	140	
Office	1	200	200	Includes toilet
Storage	1	50	50	
Toilet	2	60	120	One per cot area
Total			**1160**	

Maintenance & Custodial Space Requirements

Space	Suggestions			Comments
	Qty.	S.F.	Total	
Receiving	1	800	800	
Recycling	1	100	100	
Building Supervisor Office	1	150	150	
Custodial Shop	1	250	250	
Custodial Storage	4	150	600	
Engineering Office	1	150	150	
Engineering Storage	1	400	400	
Outside Storage	1	300	300	
Toilet/Shower/Lockers	2	150	300	
Total			**3050**	

Media Center Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Library Commons	1		5,300	
- Reading and collaboration commons		3,800		
- Media Arts Lab		500		
- Media Center Classroom		800		
- Breakout area		200		
Office, Media specialist	1	150	150	
Storage (Equipment)	1	150	150	
Toilet (Staff)	1	60	60	
Workroom	1	300	300	
Total			**5,960**	

Performing Arts Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Auditorium	900	10	9,000	Seats 900 (30% of SRC)
Lobby	1	1,700	1,700	
Stage (including wing)	1	2,250	2,250	
Stage Support Suite			1,800	Includes dressing rooms and costume storage
- Stage support (Greenroom)		1,100		
- Scene storage		300		
- Piano storage		100		
- Drama/Dance program storage		300		
Sound and Light Control Room	1	200	200	
Ticket Booth/Box Office	1	100	100	
Subtotal			**15,050**	
General Music				
Band/ Orchestra Room	1	2,500	2,500	
Band (Uniform Storage)	1	250	250	
Choral/ Guitar Room	1	1,800	1800	
Choral Practice Rooms	2	125	250	
Choral Storage	1	300	300	
Instrument Practice Rooms	2	75	150	For SmartMusic or similar tool
Instrumental Practice Room (Large)	1	150	150	
Instrument Storage	1	400	400	
Keyboarding Lab	1	500	500	
Dance Studio	1	2,000	2,000	Ceiling fans; includes office and storage
Changing rooms		300	300	
Subtotal			**8,600**	
Total			**23,650**	

Space Requirements Tables

Physical Education Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Lobby	1	1,250	1,250	in addition to regular circulation
Consolidated Gymnasium complex	1		18,845	Three regulation practice gyms when the bleachers are retracted
Concession	1	300	300	
Fitness/ Weight Room	1	2,400	2,400	
Laundry	1	150	150	
Locker Room/ Showers	2	1,700	3,400	Male and female
Locker Rooms (Athletic Team)	2	800	1,600	Male and female (Share showers w/ PE)
Gender Neutral Locker rooms	2	100	200	SF from locker rooms
Offices (Dept./ Athletic)	3	150	450	
Showers/changing area for staff	2	100	200	
Storage	4	Varies	1,600	
Training Room	1	300	300	
Workroom (Staff/ Coaches)	2	250	500	w/toilets
Total			**31,195**	

Student Dining & Food Service Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Cafeteria/Commons	1	13,000	13,000	Movable partitions: Cafeteria seating is 1/3 of student SRC
Chair Storage	1	350	350	
Kitchen	1	2,650	2,650	
Office	1	150	150	
Serving Area	1	1,600	1,600	
Receiving (Food Service)	1	250	250	
Toilet/ Locker area	2	125	250	
Total			**18,250**	

Educational specification shows an abbreviated specification for the kitchen. The architect will work with the PGCPS food services to finalize design.

Space Requirements Tables

Visual Arts Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Art Commons/Gallery	1	600	600	Part of circulation
3D Studio	1	1,600	1,600	
Kiln Rm.	1	200	200	
Multi-purpose Studio (2D/3D)	2	1,400	2,800	
Photography/Graphic Arts	1	1,400	1400	Label 'Graphic Arts'
Storage	5	varies	800	
Total			**7,400**	

Northern Career and Technical Education Hub Space Requirements

	# of Rooms	Total Square Feet
Construction and Development	7	26,020
Transportation Technologies	2	12,520
Barbering and Cosmetology	3	9,360
Business and Finance	3	3,950
Early Childhood Education	1	2,300
Culinary Arts	1	4,290
Health and Biosciences	3	7,740
Information Technology (Cisco)	1	1,950
Arts, Media, and Communication	1	1,400
Manufacturing, Engineering and Technology	3	8,700
Teacher Academy*	1	1,000
Total	**26**	**79,230**

Academic Core Space

Academic Core Space
ACADEMIC CLASSROOMS/ LEARNING STUDIOS

CAPACITY:
- 25-32 students
- 1-2 staff members
- Guest speakers and volunteers

SIZE:
- 800-1000 SF

SPATIAL RELATIONSHIPS:
- Near science lab
- Near teacher center
- Within the academies near informal learning spaces

GOAL:
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.
- To provide a learning environment that frees teachers and students to customize the classroom daily – different seating set-ups, wireless mobile computing, and various teaching/presentation options.
- To provide flexible space and layout to accommodate any of the core academic disciplines, such as English, mathematics, and social studies.

PROGRAM ACTIVITIES:
- Computerized instruction
- Hands-on activities
- Large and small group instruction
- Oral presentations
- Team teaching

Exceptions:

HEALTH LAB
- Regular classroom F&E
- Sink with cabinets above and below

ENVIRONMENTAL CONSIDERATIONS:
- Doors between classrooms
- Electrical outlets for equipment
- Provide operable partition between a pair of classrooms in each grade level for team teaching
- Uniform lighting with multi-level switching
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress

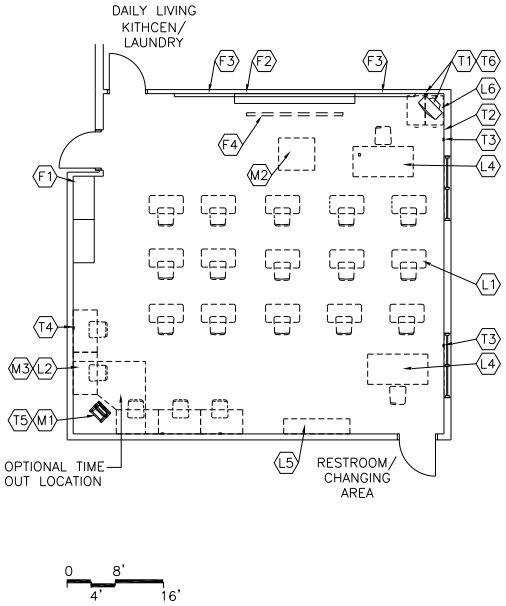
Built-in Fixtures:
- 2 Dry, white eraser-board (4’ x 20’ on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Clock (on side walls instead of rear walls)
- Tack board (4’ x 20’) minimum; tack strips on all walls

Loose Furnishings:
- 1 work table
- 2 file cabinets w/lock, 4-drawer
- 28-30 student chairs
- 28-30 student desks (trapezoid or square)
- Adjustable height bookshelves (24 LF)
- Cabinet (lockable) w/ charging station for 25 laptop computers or 30 tablets or graphing calculators (optional)
- Permanently-mounted projection screen (not in front of the interactive board) or white eraser board
- Teacher wardrobe (lockable) with coat rod; tall cabinet w/ shelving (may be one unit)
- Teacher’s desk/workstation and chair

Classroom Technology
See Educational Technology Pg 10

NOTES:

SPECIAL NEEDS CLASSROOM/ STUDIO



QUANTITY:
- 3 classrooms

CAPACITY:
- 2 or more staff
- 10 to15 students

SIZE:
- 850 SF

SPATIAL RELATIONSHIPS:
- Accessible ingress/egress to the building and classroom
- CRI classrooms to Daily Living Kitchen
- One per grade level community

GOAL:
- To provide a safe, accessible, and comfortable learning environment for students who are physically, mentally or emotionally challenged
- To provide classroom space and a flexible, specially-adapted learning environment that will meet the needs of students who have exhibited a need for more functional/ intensive services

PROGRAM ACTIVITIES:
- Independent work
- Individual instruction
- Small group work

ENVIRONMENTAL CONSIDERATIONS:
- Comfortable rooms with pleasant décor that contribute to an atmosphere conducive to creativity
- Positive acoustics for easier listening when conversing
- Window treatment to darken room for AV presentations
- Windows to provide natural light

Built-in Fixtures:

F1 Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)

F2 2 Dry, white eraser-board (4' x 20' on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above

F4 Permanently-mounted projection screen (not in front of the white eraser board) or interactive board

F3 Tack board (4' x 20') minimum; tack strips on all walls

Loose Furnishings:

L1 10 Student desks/tables and chairs (one piece)

L2 5 Computer workstations

L3 Printer table (optional)

L4 Teacher desk/workstation and chair

L4 Workstation and chair for co-teacher/aide

L5 Adjustable height bookshelves (24 LF)

L6 2, file cabinets w/ lock, 4-drawer

Classroom Technology

See Educational Technology Pg 10

Miscellaneous Equipment M1-3:

Owner provided

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Academic Core Space

COLLABORATIVE LEARNING AREAS

QUANTITY:
- Varies

CAPACITY:
- 3 to 60 persons

SIZE:
- 100-900 SF open space incorporated into corridors or lobbies

SPATIAL RELATIONSHIPS:
- Collaboration areas may be as small as an alcove outside of a classroom in the corridor or a place for large group activities to include such amenities as tiered seating, platform stage, large screens, etc. The space should be intentional and have appropriate fixtures and furniture. No loose furniture is allowed in the right-of-way.

GOALS:
- To provide a space for small group instruction, students working independently or in small groups
- To provide informal learning space for pull-out instruction

PROGRAM ACTIVITIES:
- Conferences
- Small group activities
- Students working on projects
- Tutoring

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting with multi-level switching
- Visual access to Classrooms and Corridor

Fixed Equipment:
- Clock (on side walls instead of rear walls)
- 2 Dry, white eraser-board (4’ x 20’ on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Tack board (4’ x 20’) minimum; tack strips on all walls

Loose Furnishings:
- 1 work table
- 3 student chairs
- 3 student desks (trapezoid or square)
- Permanently-mounted projection screen (not in front of the white eraser board or interactive white board)

Classroom Technology
See Educational Technology Pg 10

Electrical Features:
- Electrical Outlets for Equipment

NOTES:

FOUNDATIONS OF TECHNOLOGY
Technology Learning Studio/ Classroom

QUANTITY:
- 3

CAPACITY:
- 25-30 students
- 1-2 staff members
- Guest speakers and volunteers

SIZE:
- 1,100 SF

GOAL:
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.
- To provide a learning environment that frees teachers and students to customize the classroom daily – different seating set-ups, wireless mobile computing, and various teaching/presentation options.
- To provide flexible space to accommodate the foundations of technology curriculum

PROGRAM ACTIVITIES:
- Computerized instruction
- Large group, small group, and hands-on activities and instruction
- Oral presentations
- Team teaching

ENVIRONMENTAL CONSIDERATIONS:
- Doors between studios/ classrooms
- Electrical outlets for equipment
- Uniform lighting with multi-level switching
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress

Built-in Fixtures:
- Clock (on side walls instead of rear walls)
- Dry, white eraser-board (4’ x 20’) on two walls track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Tack board (4’ x 20’) minimum; tack strips on all walls

Loose Furnishings:
- 1 work table
- 2 file cabinets w/lock, 4-drawer
- 28 student chairs
- 28 student desks (trapezoid or square)
- Adjustable height bookshelves (24 LF)
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- Teacher’s desk/workstation and chair

Classroom Technology
See Educational Technology Pg 10

NOTES:

Academic Core Space

FAMILY AND CONSUMER SCIENCE LAB/ CLASSROOM (ProStart)

QUANTITY:
- 1

CAPACITY:
- 28 students
- 2 teachers

SIZE:
- 2,000 SF

ANCILLARY SPACES:
- Storage Closet (2 @100 SF) w/ adjustable non-corrosive shelving

SPATIAL RELATIONSHIPS:
- Accessible to students from all learning communities

GOALS:
- Flexible space and layout to accommodate Mini learning units covering a wide variety of topics such as money management, software applications, child care, cooking, textiles, and nutrition

PROGRAM ACTIVITIES:
- Computerized instruction
- Data collection and analysis
- Hands-on activities
- Large and small group instruction
- Oral presentations
- Team teaching

ENVIRONMENTAL CONSIDERATIONs:
- Consider future technology needs; build-in
- Electrical outlets for equipment flexibility to retain options
- Moisture and stain/chemical resistant finishes: Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Window treatment to darken room
- Windows to provide natural light

Demonstration Area:
- Provide demonstration island with counter top, 9'L x 30"D x 34”H, sink and range with double outlets on each end of the demonstration table and slant mirror.
- Provide oven, counter and cabinet storage behind the island.
- Provide tall storage cabinet/pantry unit, lockable with adjustable shelves, 84”H X 36”W X 30”D.

Kitchen Areas (3):

Built-in Fixtures:
- 3 - Double bowl stainless steel kitchen sink with goose neck, swivel kitchen faucet and garbage disposal (HW/CW)
- 3 – Dishwashers
- Above counter cabinets: double doors, lockable with adjustable shelves. No upper cabinets protruding into the room- must provide clear visual supervision of all kitchen spaces.
- Base cabinets: 24”D x 34”H storage cabinets for work space/food preparation, and storage of various pieces of equipment, baking, cookware, etc. One bank of cabinets shall have all drawers of various depths, with one locking drawer. The remaining cabinets shall have adjustable shelves, with one bank of lockable doors.
- Provide cabinet mounted microwave ovens in all kitchens.
- Provide plastic laminate counter surface for kitchen work area. U-shaped kitchens are preferred. Kitchen units: one ADA compliant and two regular.
- Soap dispenser
- Towel dispenser

Loose Furnishings:
- 3 - Microwaves-1,200 watt, residential, under cabinet mount
- 3 - Range, 30" w, front controls, timer, visual light door, self- cleaning oven with exhaust hood
- Refrigerator, commercial upright, frost-free, 54”, vertical hinge double doors, minimum 46 cu. ft. stainless steel with shelving (used for storage of demonstration foods and as central storage of unprepared foods), lockable

Classroom Area:

Built-in Fixtures:

- 1 Dry, white eraser-board (4' x 16') on track; eraser-board shall be installed with a marker tray, map rails with tack strip above
- Casework for dining equipment (dishes, table cloths, etc.)
- Casework: Teacher's wardrobe
- Clock (on side walls instead of rear walls)
- Tack board (4' x 8') minimum; tack strips on all walls

Loose Furnishings:

- 30 chairs
- 5, 6-person tables (duplex electric outlet for each table for sewing machines)
- Adjustable height stool for teacher
- Fire blanket/First Aid Kit
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)

Classroom Technology

See Educational Technology Pg7

- Upright freezer, commercial, frost-free, 30" W, vertical hinge single door, stainless steel with shelving, lockable

Laundry Area:

- Washer
- Dryer
- Counter with cabinets above and below

Plumbing Features:

- 4 sinks for kitchens
- Hook-up for washer
- Eye Wash station

HVAC Features:

- Ventilation for stoves and dryer

NOTES:

Academic Core Space

SCIENCE CLASSROOM/ WET LAB SUITES

CAPACITY:
- 25-32 students
- Teachers
- Staff

SIZE:
- 900 SF classrooms (2 per lab) and
- 1000 SF Wet labs
  Optional
- 1400 lab/lecture

ANCILLARY SPACES:
- Science Prep
- Chemistry adjacent to Chemistry Storage

SPATIAL RELATIONSHIPS:
- Doors into prep area
- Sliding door between classrooms and labs

GOALS:
- Flexible space and layout to support delivery of entire science curriculum
- To help students become aware of the physical and biological world
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Computer simulations
- Computerized instruction
- Data collection and analysis
- Hands-on activities
- Large and small group instruction
- Oral presentations (teacher, student, group?)
- Team teaching

ENVIRONMENTAL CONSIDERATIONS:
- Consider future technology needs; build-in flexibility to retain options
- OSHA requirements maintained
- Rooms designed for ease of movement and accessibility; students need to be able to move around the labs with chemicals, etc. in a safe way
- Window treatment to darken room for AV
- Windows to provide natural light

Classrooms

Built-in Fixtures:
- Casework: Wardrobe
- Clock (on side walls instead of rear walls)
- Manual projection screen
- Marker board (8 LF) and Marker board with grid (8 LF); all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Tack board (8-16 LF); tack strips on all walls

Loose Furnishings:
- 12, 2-person adjustable height science tables
- 2 tall cabinets for equipment storage -one with glass front (both lockable)
- 24 student chairs
- Adjustable height stool for teacher
- Digital science instrumentation
- Extra tables and chairs for flexibility
- Fire blanket
- Fire extinguisher (ABC type), first aid kit, a shower/eye wash stations with floor drain
- Goggle storage and sanitizer cabinet
- Mobile demonstration table with utilities
- Teachers' Mobile Cart for Technology

Classroom Technology
See Educational Technology Pg 10

Wet lab (generic)

Built-in Fixtures:
- A demonstration table (30" X 5 ft.) with a top of black epoxy resin.
- An ultrasonic goggle sterilizer
- Equip with a fire extinguisher (ABC type), first aid kit, a shower/eye wash stations and a fire blanket.
- Labs must be free of barriers that would prevent access by the handicapped. Science laboratories shall have a minimum of at least one worktop set at a height to serve the physically handicapped.
- Seven (7) lab stations may be peninsulas located along the walls or be islands. Teacher must have sight lines to workspace. Each lab station will have epoxy resin counter tops with two (2) GFI equipped electrical outlets and data port. Each lab station will accommodate four (4) students. Gas may be available.

Chemistry Lab

Built-in Fixtures:

Same as generic wet lab plus

- A fume hood (nominal 30" x 60" footprint) shall be provided in the lab. Make-up air shall be provided to compensate for the fume hood exhaust.
- The water and gas shall be at table level. The trough sink area shall be without an elevated shelf and include a cover. This arrangement will allow the instructor a clear view of all student lab stations.
- Storage cabinet with glass doors will be built over counters.

Classroom Technology

See Educational Technology Pg 10

Loose Furnishings:

- 24 student stools
- Teacher's stool
- Goggle sterilizer

Plumbing Features:

- Plumbing connections: 7 Sinks w/ goose neck faucets; Sink at demonstration table, Safety chemical showers/eye wash Stations, Floor drains
- Towel/Soap Dispenser

Electrical Features:

- Electrical Outlets for equipment
- Uniform lighting with multi-level switching

HVAC Features:

- Adequate ventilation/exhaust

Finishes:

Flooring:

- Moisture and stain-resistant finishes

Counter/Table Tops:

- Heat and chemical-resistant (to acids, etc.)

NOTES:

Academic Core Space

SCIENCE PREP ROOM

QUANTITY:
- 3 rooms

CAPACITY:
- 1 or 2 staff members
- Student assistants

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- One per grade level community
- Central to science labs

GOAL:
- To allow for lab preparation

PROGRAM ACTIVITIES:
- General lab preparation
- Store equipment
- Set up experiments

Finishes:

Flooring:
- Moisture and stain-resistant finishes

Counter/Table Tops:
- Heat and chemical-resistant (to acids, etc.)

Built-in Fixtures:
- Casework: Base/wall cabinets
- Clock
- Towel/ Soap dispenser

Loose Furnishings:
- 2 file cabinets on mobile pedestals
- 2 workstations
- 1 Chemical (acid) storage cabinets (lockable)
- 1 Flammable cabinet - one per school on upper floor – vented to the outside
- Ductless fume hood – one per school
- Drying rack (glassware)
- Stools

Miscellaneous Equipment:
- Autoclave in at least one prep room
- Dishwasher
- Under the counter, non-self-defrosting refrigerator
- High temp oven – one per school

Electrical Features:
- Duplex receptacles in raceway above countertop
- Electrical Outlets for equipment
- Uniform lighting with multi-level switching

HVAC Features:
- Adequate ventilation/exhaust

Plumbing Features:
- Plumbing connections, floor drain
- Large and deep sink with a goose neck and acid trap

NOTES:

SCIENCE STORAGE (Chemical)

QTY:
- 1

CAPACITY:
- 1 or 2 staff members
- Student assistants

SIZE:
- 100

ANCILLARY SPACES:
- Science Classroom/Lab

SPATIAL RELATIONSHIPS:
- Access to Corridor
- Adjacent and access to Science Classrooms/Labs (Chemistry)

GOAL:
- To store science curriculum related chemicals in a central area

PROGRAM ACTIVITIES:
- Chemical storage
- Set up experiments

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Chemical-resistant counter tops
- Electrical outlets for equipment
- Moisture and stain-resistant finishes
- Uniform lighting

Built-in Fixtures:
- Casework: Base/wall cabinets
- Casework: Tall shelving (12" deep epoxy lined w front lip)
- Soap dispenser
- Towel dispenser

Loose Furnishings:
- Cart (lockable)
- Chemical storage cabinets (lockable)
- Under the counter refrigerator

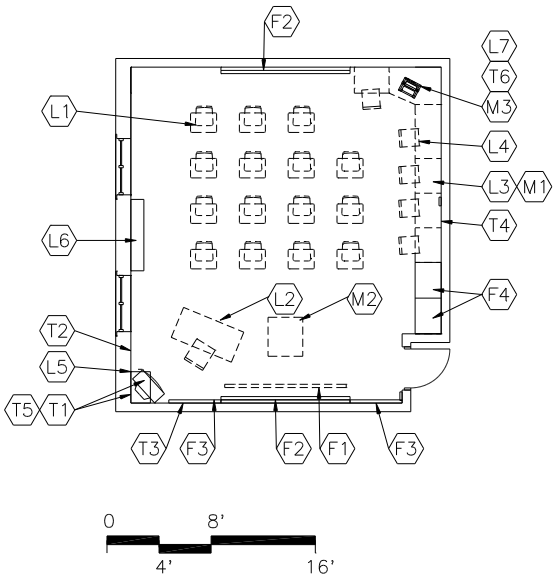
Plumbing Features:
- Acid waste system
- Floor drain
- Plumbing connections
- Sink w/ Safety chemical shower/eye wash

HVAC Features:
- 24 hour exhaust for acid storage cabinet
- Gas/local compressed air connections
- Independent temperature control
- Manual exhaust
- Supply/return air system

NOTES: Consult with each school's science department for specific requirements for fume hood

Academic Core Space

SMALL GROUP INSTRUCTION/ ALTERNATIVE EDUCATION/ RESOURCE ROOM



QTY:
- 6

CAPACITY:
- Up to 15 students
- 1 staff member

SIZE:
- 250-500 SF

SPATIAL RELATIONSHIPS:
- Distributed in pairs

GOAL:
- To provide flexible space to accommodate any of the special needs 'pull-out' curricula
- To provide informal learning space for pull-out instruction

PROGRAM ACTIVITIES:
- Computerized instruction
- Hands-on activities and instruction
- Small group instruction
- Team teaching

ENVIRONMENTAL CONSIDERATIONS:
- Comfortable rooms with pleasant décor
- Electrical outlets for equipment
- Uniform lighting
- Window treatment to darken room for AV presentation
- Windows to provide natural light and egress

Built-in Fixtures:
- 1 Dry, white eraser-board (4' x 16') on track; eraser-board shall be installed with a marker tray, map rails with tack strip above
- Casework: Tall cabinet
- Clock (on side walls instead of rear walls)
- Manual projection screen
- Tack board (4' x 8') minimum; tack strips on all walls

Loose Furnishings:
- 1, file cabinet , 4-drawer
- 10-15 student desks and chairs
- 3 chairs
- 3 computer workstations
- Adjustable height bookshelves (12 LF)
- Printer table
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- Teacher's desk/workstation and chair

Classroom Technology
See Educational Technology Pg 10

Miscellaneous Equipment (Owner provided)

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

STORAGE (Student Lockers and Corridors)

CAPACITY:
- Students
- Teachers

SPATIAL RELATIONSHIPS:
- Corridors have occasional views to the outside (courtyard, green roof, play areas)
- Lockers distributed by Grade level
- Shared space with informal learning areas/commons

GOAL:
- To create inviting, well-lit and acoustically soothing spaces for transitioning to class, socializing, and learning
- To minimize dark, vacant hallways lined with closed doors
- To provide space for student storage at one locker per student plus an additional 5% locker quantity over capacity

ENVIRONMENTAL CONSIDERATIONS:
- Coordinate Commons finishes and loose furnishings with corridors
- Coordinate plumbing/HVAC/ electrical/ technology needs with building's overall technology plan.
- Uniform lighting

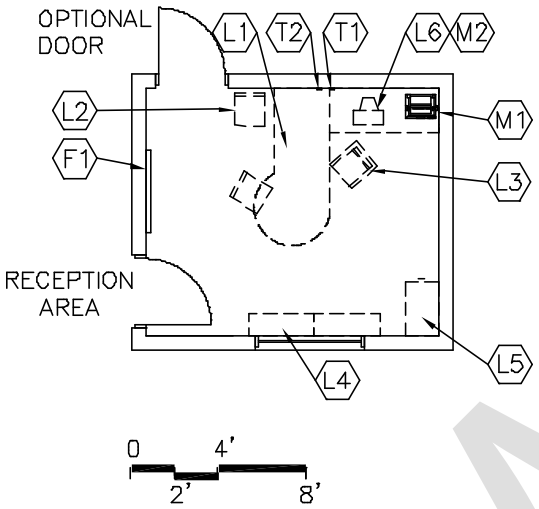
Built-in Fixtures:
- Centrally located large display monitor for school announcements and videos
- Display areas for 2D and 3D exhibits
- Lockers: 12" wide x 15" deep x 72" high
- Only permanent seating options to meet fire code restrictions

Note: Evaluate all student storage options to minimize crowded, noisy hallways while still providing a variety of storage options.

NOTES:

Academic Core Space

ADMIN OFFICE (For academic support areas)



QUANTITY:
- 4

CAPACITY:
- Assistant Principal

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Decentralized Administration distributed

GOAL:
- To provide an office for the assistant principal to perform administrative functions

PROGRAM ACTIVITIES:
- Telephone communications (private)
- Coordination of school and support services
- Conferencing with parents, students, and staff

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Environmental sound control:
  - Wall minimum: STC 45
  - Ceiling minimum: CAC 35
- Electrical outlets for equipment
- Uniform lighting
- Windows to provide natural light

Built-in Fixtures:
F1 Tack board (4 LF)

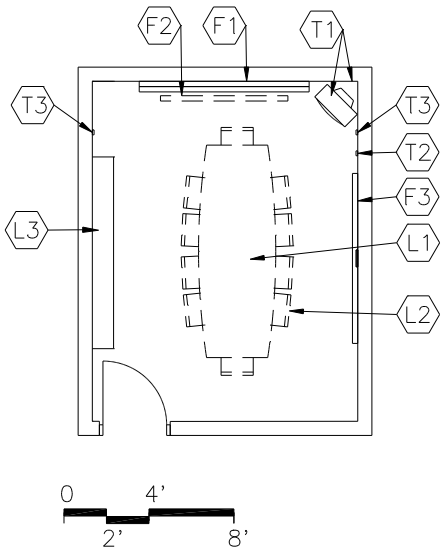
Loose Furnishings:
L1 Desk with conference table
L2 2 guest chairs
L3 Ergonomic task chair
L4 Adjustable height bookshelves (12 LF)
L5 1, 4-drawer locking file cabinet
L6 Computer workstation

Room Technology:
T1 1 voice port and phone
T2 2 data ports or wireless

Miscellaneous equipment (owner provided)

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

CONFERENCE ROOM



QUANTITY:
- varies

CAPACITY:
- Staff
- Teachers
- Visitors

SIZE:
- varies (800 SF total)

SPATIAL RELATIONSHIPS:
- Near decentralized office and storage

GOAL:
- To provide a place for teacher conferences or meetings

PROGRAM ACTIVITIES:
- Conferencing with staff, teachers, and visitors

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
F1 Marker board (8 LF)
F2 Manual projection screen
F3 Tack board (8 LF)

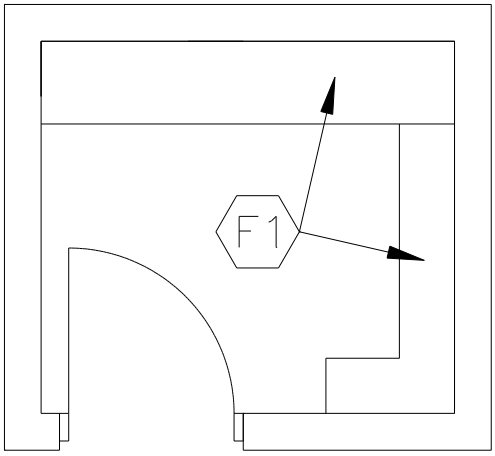
Loose Furnishings:
L1 1-2 Conference tables for 12 w/ conference room technology built-in
L2 10-12 chairs (sm); 24 chairs (lg)
L3 Adjustable height bookshelves (24 LF)

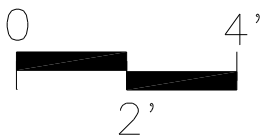
Room Technology:
T1 1 video port, monitor and brackets (proportion viewing size for larger conference room)
T2 1 voice port and phone
T3 2 data ports or wireless

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Academic Core Space

STORAGE





QUANTITY:
- 4

CAPACITY:
- Staff

SIZE:
- 100 SF (400 SF total)

GOAL:
- To provide a place for storage of supplies and equipment

SPATIAL RELATIONSHIPS:
- Near decentralized office and conference Rm

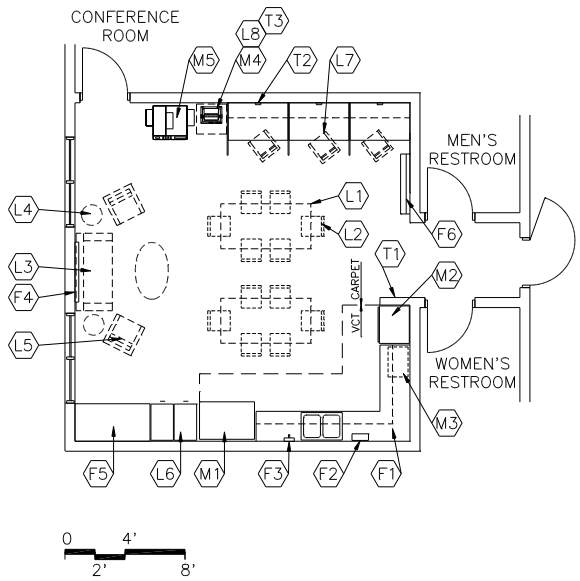
PROGRAM ACTIVITIES:
- Storing equipment and supplies for core academic departments (English, Math, Social Studies and World Language, other)

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Security of equipment and supplies
- Uniform lighting

Built-in Fixtures:
F1 Storage shelving:
12" deep & 18" deep

NOTES:

TEACHER SUPPORT AREA



QUANTITY:
- 1-4

CAPACITY:
- 6-20 teachers

SIZE:
- 400 SF

GOAL:
- To provide space for teachers to carry out their administrative duties, prepare materials for class, access the Internet, lock up personal items, and to socialize and relax.

SPATIAL RELATIONSHIPS:
- Near decentralized office and conference rm.
- Access from Corridor
- Located near individual restrooms

PROGRAM ACTIVITIES:
- Enter and access data
- Grade papers
- Prepare lessons using computer, video, and other resources.
- Store files [floating or shared department files]
- Eating lunch

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Consider future technology needs, build-in flexibility to retain options
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- OSHA requirements maintained
- Uniform lighting with multi-level switching
- Windows to provide natural light and egress

Built-in Fixtures:
F1 Casework:
Base/wall cabinets
F2 Towel dispenser
F3 Soap dispenser
F4 Tack board (4 LF)
F5 Casework: Wardrobe for floating teachers
F6 Marker board (4 LF)
Lockers for floating teachers

Loose Furnishings:
L1 2 Rectangular tables
L2 12 Chairs
L3 Sofa (optional)
L4 End tables
L5 Lounge chairs
L6 Two 2-drawer locking file cabinet for floating teachers
L7 Two Workstations for floating teachers
L8 Printer table
M1 Vending machine
M2 Refrigerator
M3 Microwave

Room Technology:
T1 1 voice port and phone
T2 1 data port in each workstation or wireless
T3 1 data port for printer

NOTES: Loose furnishings and features shown represent one of many possible arrangements

Special Support Education Space

Special Education Support
CO-TEACHERS' SUITE

QUANTITY:
- 1

CAPACITY:
- 7-9 teachers

SIZE:
- 900 SF

SPATIAL RELATIONSHIPS:
- Located near special education classrooms
- Central location for ESL support

GOAL:
- To provide a home base for co-teachers

PROGRAM ACTIVITIES:
- Paperwork
- Small meetings

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment presentation
- Proportion classroom for effective viewing and listening from all areas of the classroom
- Uniform lighting
- Window treatment to darken room for AV
- Windows to provide natural light and egress

Built-in Fixtures:
- Marker board (8 LF)
- Tack board (8 LF minimum)

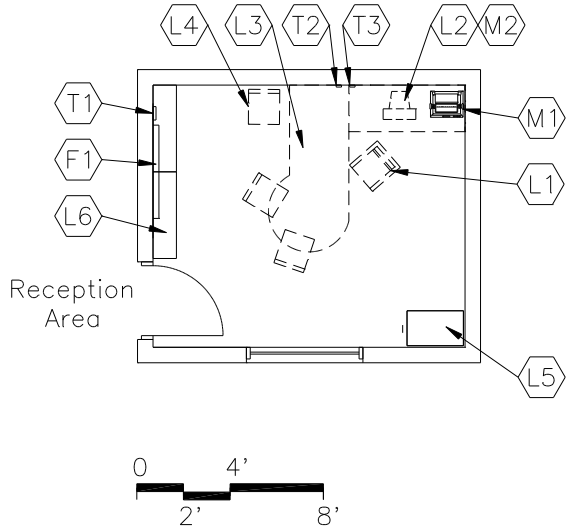
Loose Furnishings:
- Conference table
- Cubicles for up to nine teachers each with desk/workstation, lockable file cabinet, and coat rack

Room Technology:
- Voice, data, VGA , and HDMI

NOTES:

Special Support Education Space

OFFICE/ COORDINATOR
Special Education Support



QUANTITY:
- 3

CAPACITY:
- Counselors
- Instructional personnel
- Psychologists
- Social workers

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Reception Area
- Within the Core academic Suite

GOAL:
- To provide service to accomplish the requirements of IEPs

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  - Wall minimum: STC 45
  - Ceiling minimum: CAC 35
- Uniform lighting
- Windows to provide natural light, desirable

Loose Furnishings:
L1 Ergonomic task chair
L2 Computer workstation
L3 Desk
L4 Guest chair
L5 4-drawer locking file cabinet
L6 Adjustable height bookshelves (12 LF)

Room Technology:
T1 1 voice port and phone
T2 2 data ports or wireless

Miscellaneous equipment (owner provided)

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

ESOL Space

ACADEMIC LEARNING STUDIOS
ESOL Newcomers suite

CAPACITY:
- 20 students
- 1-2 staff members
- Guest speakers and volunteers

SIZE:
- 1600 SF

SPATIAL RELATIONSHIPS:
- Near ESOL support rooms
- Provide for two teaching stations and one shared pull-out area (100 SF)

GOAL:
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.
- To provide a learning environment that frees teachers and students to customize the classroom daily
- To provide flexible space and layout to accommodate entry level ESOL instruction

PROGRAM ACTIVITIES:
- Computerized instruction
- Large and small group instruction
- Oral presentations
- Team teaching

ENVIRONMENTAL CONSIDERATIONS:
- Doors between classrooms
- Electrical outlets for equipment
- Uniform lighting with multi-level switching
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress

Built-in Fixtures:
- 4 Dry, white eraser-board (4' x 20' on different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- 2 Clocks (on side walls instead of rear walls)
- 4 Tack boards (4' x 20') minimum; tack strips on all walls

Loose Furnishings:
- 2 work table
- 4 file cabinets w/lock, 4-drawer
- 20 X2 student chairs
- 20 X2 student desks (trapezoid or square)
- 2Adjustable height bookshelves (24 LF)
- 2Teacher wardrobe (lockable) with coat rod; tall cabinet w/ shelving (may be one unit)
- 2 Teacher's desk/workstation and chair

Classroom Technology
See Educational Technology Pg 10

NOTES:

ESOL Space

ACADEMIC LEARNING STUDIOS
ESOL Resource Suites

CAPACITY:
- 20 students
- 1-2 staff members
- Guest speakers and volunteers

SIZE:
- 2400 SF

SPATIAL RELATIONSHIPS:
- Larger Resource Suite central to 9-10th grade academic areas
- Smaller CTE Resource Suite central to 'high bay' CTE wing
- Movable walls for easy reconfiguration (spaces may be from 500 SF to 1200 SF depending on wall arrangement)

GOAL:
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.
- To provide a learning environment that frees teachers and students to customize the classroom daily
- To provide flexible space and layout to accommodate entry level ESOL instruction

PROGRAM ACTIVITIES:
- Computerized instruction
- Large and small group instruction
- Oral presentations
- Team teaching

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Uniform lighting with multi-level switching
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress

Built-in Fixtures for each suite:
- 4 Dry, white eraser-board (4' x 20') on peripheral walls to match any configuration of space
- 3 Clock (on side walls)
- 4 Tack board (4' x 20'); tack strips on all walls

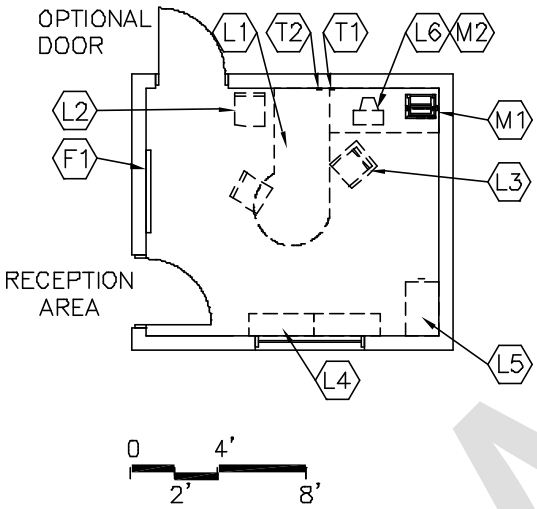
Loose Furnishings for each suite:
- 3 worktables
- 3 file cabinets w/lock, 4-drawer
- 60 Student chairs
- 60 Student desks (trapezoid on casters)
- 3 Adjustable height bookshelves (24 LF)
- 3 Teacher wardrobe (lockable) with coat rod; tall cabinet w/ shelving (may be one unit)
- 3 Teacher's desk/workstation and chair

Classroom Technology
See Educational Technology Pg. 10

NOTES:

ESOL Space

ESOL OFFICE (Coordinator)



QUANTITY:
- 1

CAPACITY:
- Assistant Principal/administrator

SIZE:
- 120 SF

SPATIAL RELATIONSHIPS:
- Near newcomers' classrooms

GOAL:
- To provide an office for the assistant principal to perform administrative functions

PROGRAM ACTIVITIES:
- Telephone communications (private)
- Coordination of school and support services
- Conferencing with parents, students, and staff

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Environmental sound control:
  - Wall minimum: STC 45
  - Ceiling minimum: CAC 35
- Electrical outlets for equipment
- Uniform lighting
- Windows to provide natural light

Built-in Fixtures:
F1 Tack board (4 LF)

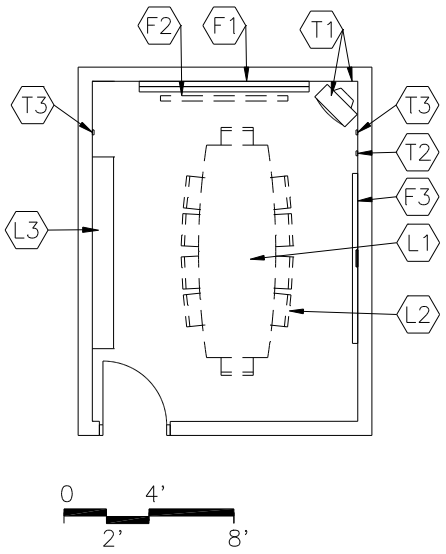
Loose Furnishings:
L1 Desk with conference table
L2 2 guest chairs
L3 Ergonomic task chair
L4 Adjustable height bookshelves (12 LF)
L5 1, 4-drawer locking file cabinet
L6 Computer workstation

Room Technology:
T1 1 voice port and phone
T2 2 data ports or wireless

Miscellaneous equipment (owner provided)

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

CONFERENCE ROOM



QUANTITY:
- one

CAPACITY:
- Staff
- Teachers
- Visitors

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Near ESOL office

GOAL:
- To provide a place for teacher conferences or meetings

PROGRAM ACTIVITIES:
- Conferencing with staff, teachers, and visitors

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
F1 Marker board (8 LF)
F2 Manual projection screen
F3 Tack board (8 LF)

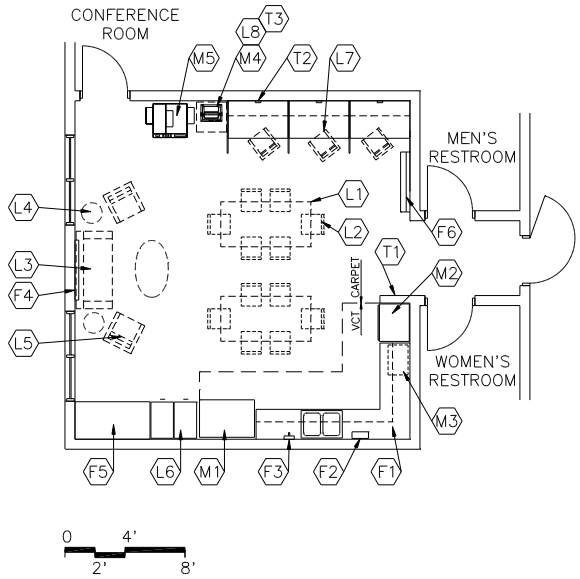
Loose Furnishings:
L1 Conference table for 10 w/ conference room technology built-in
L2 10-12 chairs
L3 Adjustable height bookshelves (24 LF)

Room Technology:
T1 1 video port, monitor and brackets (proportion viewing size for larger conference room)
T2 1 voice port and phone
T3 2 data ports or wireless

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

ESOL Space

TEACHER SUPPORT AREA



QUANTITY:
- 1

CAPACITY:
- 15-20 teachers

SIZE:
- 600 SF

GOAL:
- To provide space for teachers to carry out their administrative duties, prepare materials for class, access the Internet, lock up personal items, and to socialize and relax.

SPATIAL RELATIONSHIPS:
- Near ESL Office and conference rm
- Access from Corridor
- Located near individual restrooms

PROGRAM ACTIVITIES:
- Enter and access data
- Grade papers
- Prepare lessons using computer, video, and other resources.
- Store files [floating or shared department files]
- Eating lunch

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Consider future technology needs, build-in flexibility to retain options
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- OSHA requirements maintained
- Uniform lighting with multi-level switching
- Windows to provide natural light and egress

Built-in Fixtures:
F1 Casework:
Base/wall cabinets
F2 Towel dispenser
F3 Soap dispenser
F4 Tack board (4 LF)
F5 Casework: Wardrobe for floating teachers
F6 Marker board (4 LF)

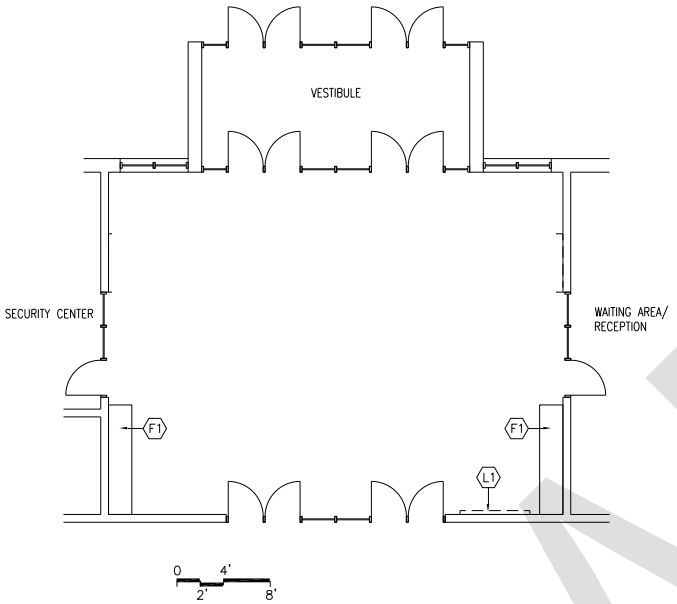
Loose Furnishings:
L1 2 Rectangular tables
L2 12 Chairs
L3 Sofa (optional)
L4 End tables
L5 Lounge chairs
L6 Two 2-drawer locking file cabinet for floating teachers
L7 Three Workstations for floating teachers
L8 Printer table
M1 Vending machine
M2 Refrigerator
M3 Microwave

Room Technology:
T1 1 voice port and phone
T2 1 data port in each workstation or wireless
T3 1 data port for printer

NOTES: Loose furnishings and features shown represent one of many possible arrangements

Administration Space Requirements

LOBBY



QUANTITY:

- 1

SIZE:

- 900 SF

GOAL:

- To immediately greet visitors with a welcoming atmosphere and to provide easy accessibility for the public

SPATIAL RELATIONSHIP:

- Adjacent and access to Security Office
- Adjacent and access to Main Office

ENVIRONMENTAL CONSIDERATIONS:

- Uniform lighting with accent lighting as appropriate
- Electrical outlets for equipment
- Aesthetically pleasing
- Provide exterior canopies at entrances
- Window to provide ample natural light
- Treat for sound attenuation
- The architect is to work with the school and district security to develop a safe and respectful security arrangement for students, staff and visitors
- The school wants all visitors during the day to go through the welcome area to get into the school.

Built-in Fixtures:

F1 Display cases
L1 Electronic board
Security desk/counter with workstation

Room Technology:

- Voice and data to security desk

NOTE:

- The morning student entrance may be located near the dining area.
- The teachers' entrance may be near staff parking and must be pass key protected for controlled access at all times.

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administration Space

RECEPTION/ WAITING AREA

QUANTITY:
- 1

CAPACITY:
- 10

SIZE:
- 850 SF (includes 50 SF Coat Closet)

SPATIAL RELATIONSHIPS:
- Adjacent to Lobby
- Easy to locate and identify
- Maximize view to Lobby and entry

GOAL:
- To provide a welcoming atmosphere and to serve as an information area for those coming into the school

PROGRAM ACTIVITIES:
- Greeting people and directing them to the proper location or person
- Waiting area for visitors and staff members

ENVIRONMENTAL CONSIDERATIONS:
- Coat Closet
- Electrical outlets for equipment
- Inviting to visitors
- Wheelchair accessibility
- Windows to provide natural light (if feasible)

Built-in Fixtures:
- 18' minimum reception counter (two level for handicapped access) with adjustable shelf storage on the inside
- Counter and base cabinets along back wall; space for master intercom console
- Tack board (8 LF)

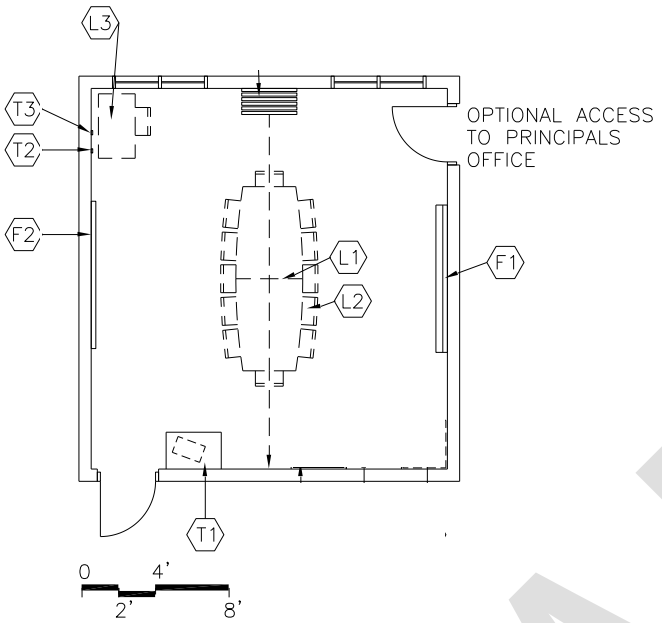
Loose furniture:
- 2 End tables
- 2 ergonomic chairs
- 2 under the desk file cabinets
- 6-8 Visitor chairs
- Desk/Workstations for 2 staff
- Display rack

Room Technology:
- Ability to 'buzz' access main entrance when security is not available
- Master intercom console and appropriate electric and communication connections
- Voice and data for each workstation

NOTES:

Administration Space

CONFERENCE



CAPACITY:
- Staff
- Teachers
- Visitors

SIZE:
- 400 SF

SPATIAL RELATIONSHIPS:
- In administrative suite

GOAL:
- To provide an area adequate for small and medium group conferences for teacher s and staff

PROGRAM ACTIVITIES:
- Conferencing with staff, teachers, and visitors
- Staff collaboration

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
F1 Marker board (8 LF)
F2 Tack board (8 LF)
- Manual projection screen

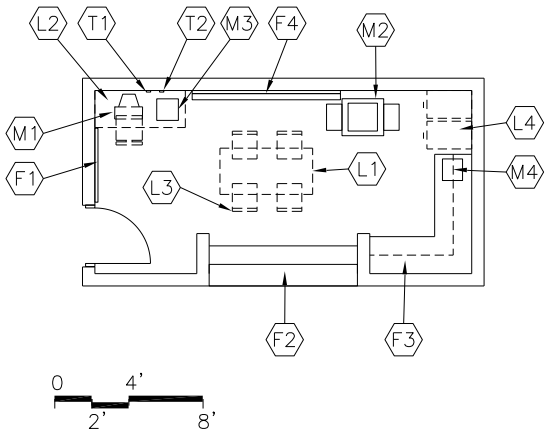
Loose Furnishings:
L1 1-2 Conference tables for 12 w/ conference room technology built-in
L2 12-20 chairs
L3 Computer workstation furniture

Room Technology:
T1 1 video port, monitor and brackets (proportion viewing size for larger conference room)
T2 1 voice port and phone
T3 2 data ports or wireless
- Design for computer aided presentations (electrical outlets from table for projection device, screen along short wall, light darkening capability)

NOTES:

Administration Space

MAILROOM



SIZE:
- 200 SF

SPATIAL RELATIONSHIP:
- Located within/adjacent to the Administrative Area
- May be combined with workroom

GOAL:
- To provide adequate space and equipment for office work projects and an area to disseminate incoming mail to staff members

PROGRAM ACTIVITIES:
- Collating materials
- Copying
- Delivery of general mail
- General office work
- Storing of pertinent files

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Uniform lighting

Built-in Fixtures:
F1 Tack board (4 LF)
F2 Casework:
Two sided mail slots for 110% of staff with base cabinets below
F3 Casework: Base/wall cabinets
F4 Marker board (8 LF)

Loose Furnishings:
L1 Work table
L2 Computer workstation with ergonomic task chair
L3 2-4 Chairs
L4 2, four-drawer file cabinets

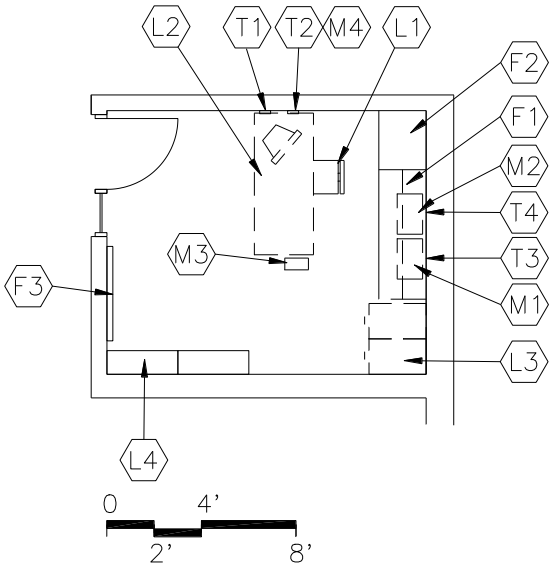
Miscellaneous Equipment (owner provided):

Room Technology:
- Voice ports and phones

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administration Space

OFFICE (Administrative Assistant and IT Coordinator)



QUANTITY:
- 2

CAPACITY:
- 2 people

SIZE:
- 120 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Waiting Area/Reception
- Visual access to Waiting Area/Reception
- Adjacent to Principal's Office
- The attendance office will have a lockable window to the corridor with a counter.

GOAL:
- To serve as an area from which the secretary can effectively provide administrative support

PROGRAM ACTIVITIES:
- Financial accounting and bookkeeper functions
- General office work
- Answering telephone
- Data input and retrieval
- Duties of confidential secretary

Built-in Fixtures:
F1 Casework:
Base cabinets and shelving
F3 Tack board (4 LF)
F2 Casework: Wardrobe

Loose Furnishings:
L2 Desk
L1 Ergonomic chair
L3 Four-drawer locking file cabinet
L4 Bookcases

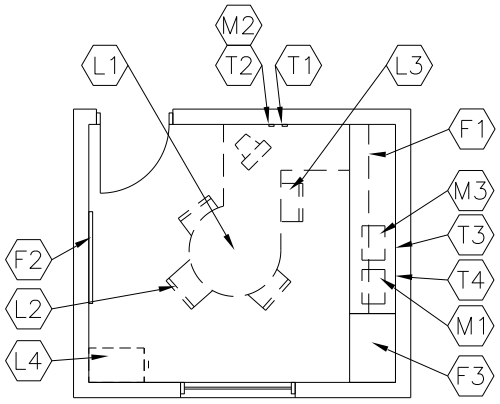
Miscellaneous Equipment (owner provided):

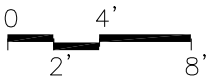
Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3 Fax port
T4 Data port for printer

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administration Space

OFFICES (Attendance and Business Manager)





QUANTITY:
- 2

CAPACITY:
- 4 people

SIZE:
- 150 SF

ANCILLARY SPACES:
- School safe

SPATIAL RELATIONSHIPS:
- Adjacent to Administrative Assistant's Office
- Near Main Office

GOAL:
- To serve as the home base for administrators from which he/she can provide leadership in a personal, flexible, and organized environment for students, staff, and community

Note: The business manager will have the school vault near his or her office

PROGRAM ACTIVITIES:
- Student counseling
- Telephone calls
- Administrative paperwork
- Planning
- Computer input
- Meetings with parents, students, and staff

Built-in Fixtures:
F1 Casework:
Base cabinets and shelving
F2 Tack board (4 LF)
F3 Casework: Wardrobe

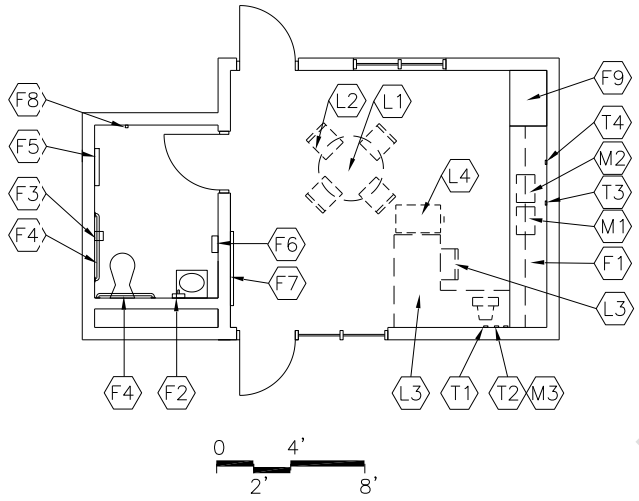
Loose Furnishings:
L1 Desk
L2 Side chairs
L3 Ergonomic hair
L4 Four-drawer locking file cabinet
School safe (6 cubic ft minimum)

Miscellaneous Equipment (owner provided):

Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3/4 Data port for printer/FAX

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

PRINCIPAL'S OFFICE



QUANTITY:
- 1

CAPACITY:
- 5 people

SIZE:
- 230 SF (Including 50 SF Private Toilet)

SPATIAL RELATIONSHIPS:
- Adjacent to Administrative Assistant's Office
- Near Conference Room

GOAL:
- To serve as the home base for the principal from which he/she can provide instructional leadership in a personal, flexible, and organized environment for students, staff, and community

PROGRAM ACTIVITIES:
- Administrative paperwork
- Computer input
- Conferences with staff and other visitors
- Interaction with students
- Planning
- Telephone calls

ENVIRONMENTAL CONSIDERATIONS:
- Adequate exhaust (restroom)
- Auditory privacy
- Private restroom

Built-in Fixtures:
F1 Casework: Base/wall cabinets and shelving
F2 Soap dispenser
F3 Toilet tissue holder
F4 36" and 42" grab bars
F5 24" x 60" mirror
F6 Towel dispenser
F7 Tack board (4 LF)
F8 Coat hook
F9 Casework: Wardrobe

Loose Furnishings:
L1 Conference table
L2 4 side chairs
L3 Desk and chair
L4 4-drawer locking file cabinet

Miscellaneous Equipment (owner provided):

Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3 Fax port
T4 Data port for printer

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administration Space

SECURITY CENTER/ OFFICE

QUANTITY:
- 1

CAPACITY:
- Up to 8 people

SIZE:
- 300 SF

SPATIAL RELATIONSHIPS:
- Near entrance to Main Corridor
- Near student entrance if different
- Suite needs 3 activity areas:
  1) Work/meeting space for team
  2) Breakout/quiet area (100 SF)
  3) Camera monitor area w/ privacy screen

GOAL:
- To serve as an area from which the school resource officers can perform their administrative and law enforcement functions

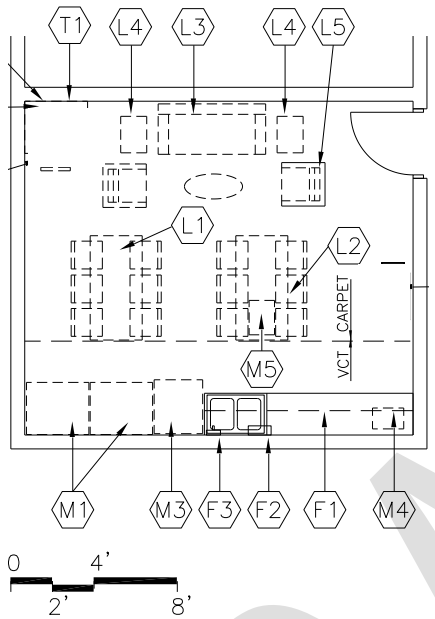
PROGRAM ACTIVITIES:
- Complete reports
- Meet with parents, staff, and other law enforcement officials
- Monitor surveillance equipment
- Perform counseling

Loose Furnishings:
- 6-8 chairs
- 2 Desks/workstation and chairs
- 1 chair in breakout area
- 2 Work tables

Room Technology:
- Base system for security cameras
- Data ports near workstations
- Voice ports and phones to both desks

NOTES:

STAFF BREAK ROOM



QUANTITY:
- 1

CAPACITY:
- Up to 15 person

SIZE:
- 600 SF

SPATIAL RELATIONSHIPS:
- Access from corridor
- Bathrooms within or near
- Near Dining

GOAL:
- To provide as an area for staff to relax and prepare for classes

PROGRAM ACTIVITY:
- Eating
- Interacting with peers
- Planning lessons
- Relaxing
- Using the telephone

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- OSHA requirements maintained
- Uniform lighting
- Wheelchair accessibility

Built-in Fixtures:
F1 Casework:
Base cabinets and shelving
F2 Sink w/soap dispenser
F3 Towel dispenser
- Tack board (4 LF)
- Casework: Lockers for floating teachers

Loose Furnishings:
L1 2 Rectangular tables
L2 12 Chairs
L3 Sofa
L4 End tables
L5 Lounge chairs

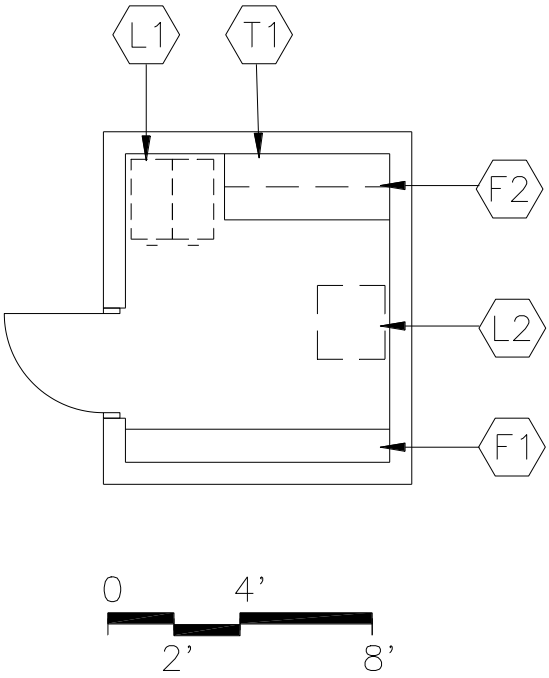
Miscellaneous Equipment (owner provided):
M1 Vending machines
M3 Refrigerator
M4 2 Microwaves

Classroom Technology
See Educational Technology Pg7

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administrative Space

STORAGE (ADMINISTRATIVE SUPPLIES)



QUANTITY:
- 1

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Administrative Workroom
- Located within Administrative Area

GOAL:
- To provide adequate and secure storage for office supplies

PROGRAM ACTIVITY:
- Storing of office supplies, forms, and files

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Uniform lighting

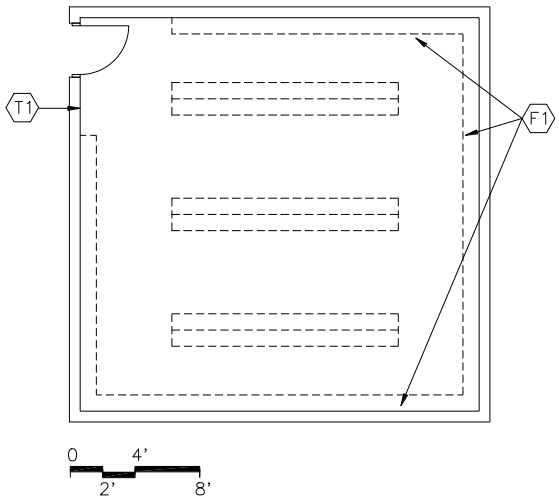
Built-in Fixtures:
F1 Shelving
F2 Lockable cabinets

Loose Furnishings:
L1 2, four-drawer file cabinet
L2 Small safe

Room Technology:
T1 Data port

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

STORAGE (CENTRAL TEXT BOOK ROOM)



QUANTITY:
- 1

SIZE:
- 900 SF (2,000 LF of shelving)

SPATIAL RELATIONSHIPS:
- Near Administration

GOAL:
- To provide secure storage for teaching materials

PROGRAM ACTIVITY:
- Storage of textbooks and teaching supplies and forms
- Inventory

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for charging laptop carts (6)
- Uniform lighting
- Condition room for repurposing in the future (up to 16 occupants)

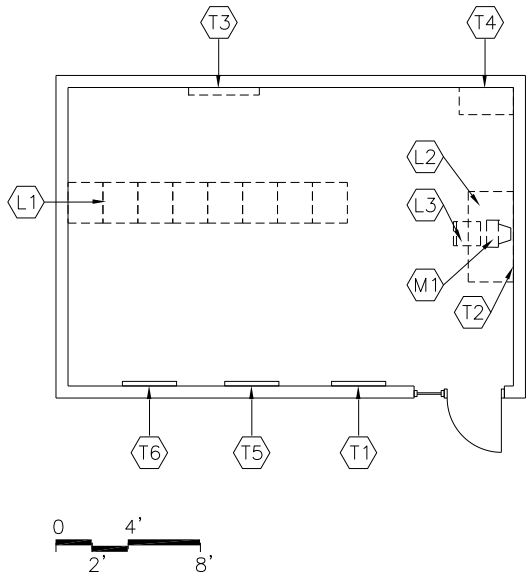
Built-in Fixtures:
F1 Adjustable shelving (2,000 LF)

Room Technology:
T1 Voice port

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administrative Space

TELECOMMUNICATIONS (HEAD END) ROOM



QUANTITY:
- 1

SIZE:
- 250 SF

SPATIAL RELATIONSHIPS:
- Near Administration or Media Center

GOALS:
- To provide a secure area to serve as the information hub of the school. File servers will serve the buildings computer network
- To provide satellite up and down links that will send and receive voice, video, and data. Fiber optic cable will serve the telephone, fax, and video of the school and other district buildings

PROGRAM ACTIVITIES:
- Cable and CATV reception and broadcasting
- Network management
- Security system location
- Telephone wiring entry and distribution
- Voice, video, data reception and distribution

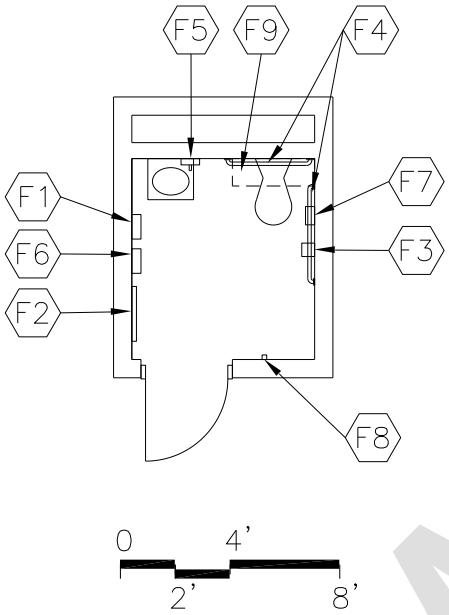
ENVIRONMENTAL CONSIDERATIONS:
- Access to ceiling and ceilings for modifications to systems and wiring
- Adequate power supply will be required and auxiliary UPS power for back-up. (Quality of power is important.)
- Adequate ventilation
- Air conditioning dedicated to this space
- Dedicated electrical circuitry
- Security of door

Loose Furnishings:
L1 6-8 racks
L2 Computer workstation/M1 computer
L3 Ergonomic task chair

Room Technology:
T1 Data network system
T2 Voice port and phone
T3 Telephone switchgear
T4 Video network control
T5 Satellite dish connection
T6 Satellite and cable system controls access

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

TOILET



QUANTITY:
- 1

CAPACITY:
- Up to 1 person

SIZE:
- 60 SF

SPATIAL RELATIONSHIPS:
- Accessed from the welcome center

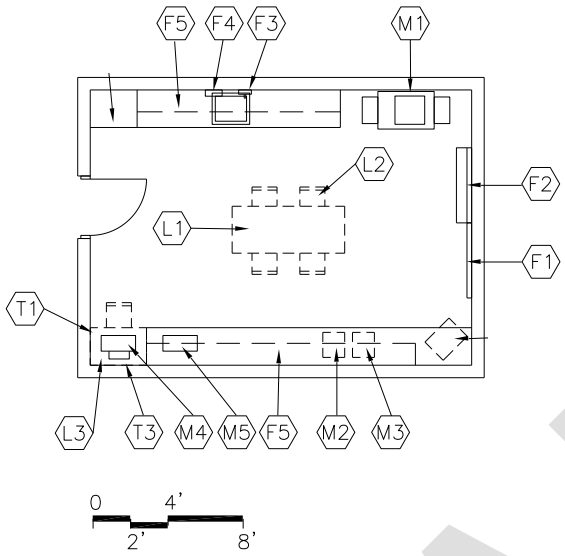
ENVIRONMENTAL CONSIDERATIONS:
- Adequate exhaust/ventilation
- Moisture- and stain-resistant finishes
- Wheelchair accessibility

Built-in Fixtures:
F1 Towel dispenser
F2 24" x 60" mirror
F3 Toilet tissue holder
F4 36” and 42” grab bars
F5 Soap dispenser
F6 Sanitary dispenser
F7 Sanitary disposal
F8 Coat hook
F9 Casework: Wall cabinet

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Administrative Space

WORKROOM



QUANTITY:
- 1

CAPACITY:
- Up to 4 people

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- Near Waiting Area/Reception
- May be combined with mailroom

GOAL:
- To provide an area for office projects to be completed

PROGRAM ACTIVITIES:
- Binding reports
- Collating
- Copying
- Laminating
- Preparing communications for mailing
- Sorting of files
- Telephone communications

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- OSHA requirements maintained
- Uniform lighting
- Wheelchair accessibility

Built-in Fixtures:
F1 Tack board (4 LF)
F2 Marker board (4 LF)
F3 Sink w/soap dispenser
F4 Towel dispenser
F5 Casework:
Base cabinets and shelving

Loose Furnishings:
L1 Work table
L2 4 chairs
L3 Computer workstation with ergonomic task chair

Miscellaneous Equipment:
Provided by PGCPS

Room Technology:
T1 Voice ports and phones
T3 2 data ports

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Guidance/Student Services Space Requirements

RECEPTION AND WORK AREA

CAPACITY:
- Staff
- Students
- Parents
- Visitors
- Up to 5 People

SIZE:
- 250 SF (Guidance)
- 150 SF (Parent Center)

SPATIAL RELATIONSHIPS:
- Glass into the corridor for security and visibility
- Locate near entrance

GOAL:
- To provide a space designated to help students and the public feel welcome and to provide information
- Waiting area for counselors

PROGRAM ACTIVITIES:
- Administrative activities
- Greeting visitors
- Waiting area for students

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Wheelchair accessibility
- Uniform lighting

Built-in Fixtures:
- Tack board (4 LF)

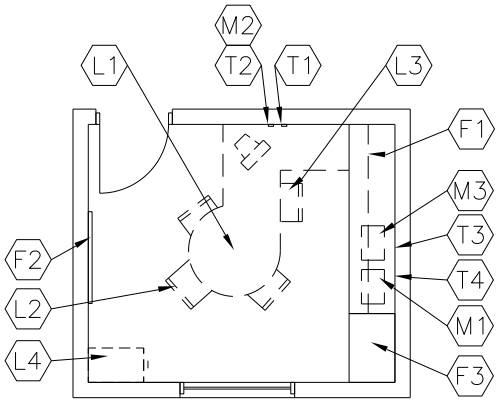
Loose Furnishings:
- 4 visitor chairs
- End table
- Administrator desk
- Ergonomic task chair
- Information kiosk/display

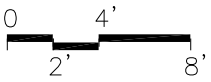
Room Technology:
- Data port for printer
- Data port near workstation
- Voice port and phone

NOTES:

Guidance/ Students Services Space

OFFICES (Counselors, Registrar, Coordinators)





QUANTITY:
- 14

CAPACITY:
- 4 people

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Accessed through reception
- Near main entrance

GOAL:
- To serve as the home base for guidance counselors
- Private space to meet with parents or students

PROGRAM ACTIVITIES:
- Student counseling
- Telephone calls
- Administrative paperwork
- Planning
- Computer input
- Meetings with parents, students, and staff

Built-in Fixtures:
F1 Casework:
Base cabinets and shelving
F2 Tack board (4 LF)
F3 Casework: Wardrobe

Loose Furnishings:
L1 Administrator desk
L2 Side chairs
L3 Ergonomic chair
L4 Four-drawer locking file cabinet

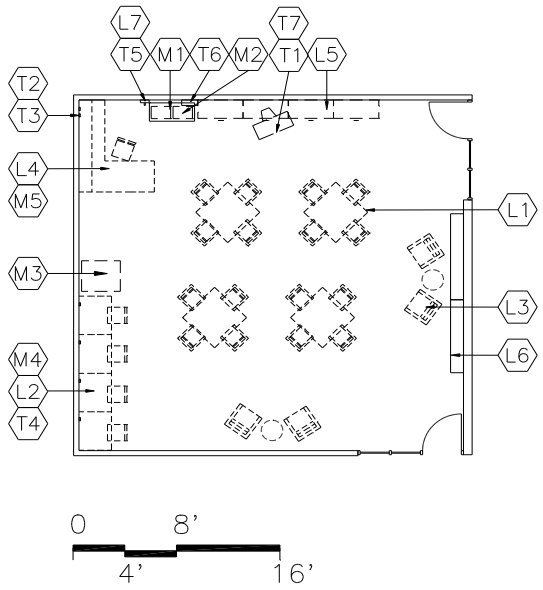
Miscellaneous Equipment (owner provided):

Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3 Fax port (optional)
T4 Data port for printer

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Guidance/ Students Services Space

CAREER AND WORKFORCE CENTER



CAPACITY:
- 1 Staff person
- Up to 3 people

SIZE:
- 650 SF

SPATIAL RELATIONSHIPS:
- Access from Corridor ad reception area

GOAL:
- To provide a space for career counseling and exploration opportunities for students

PROGRAM ACTIVITIES:
- Career exploration groups
- Career seminars
- Classroom visitations
- Group sessions with college representatives
- Research on colleges or careers

ENVIRONMENTAL CONSIDERATIONS:
- Comfortable, quiet environment
- Electrical outlets for equipment
- Uniform lighting
- Visual access from Corridor

Loose Furnishings:

L1	Work tables and chairs
L2	4-5 Computer workstations
L3	Lounge chairs
L4	Reception desk
L5	2 Lateral file cabinets
L6	Adjustable height bookshelves (24 LF)
L7	Printer table

Miscellaneous equipment (owner provided)

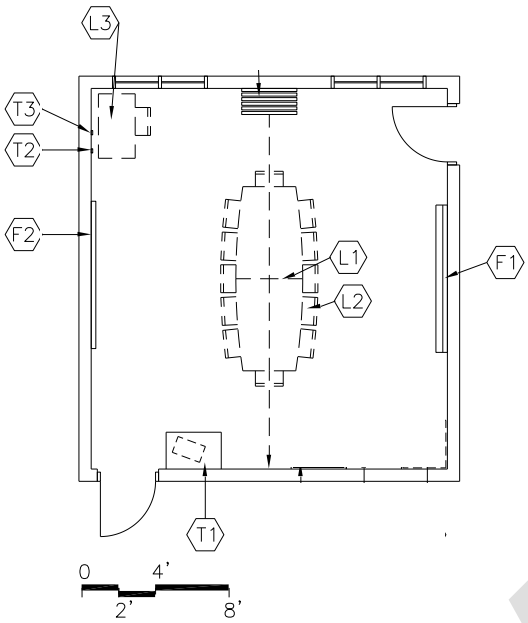
Room Technology:

T1	Video port, monitor, VCR, and brackets
T2	Voice port and phone
T3	Data port near aide workstation
T4	Data port at each workstation
T5	Fax port
T6	Data port for printer

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Guidance/ Students Services Space

CONFERENCE/ TESTING ROOM



CAPACITY:
- Staff
- Teachers
- Visitors

SIZE:
- 250 SF

SPATIAL RELATIONSHIPS:
- In guidance suite
- Door to corridor

GOAL:
- To provide an area adequate for small and medium group conferences for teacher s and staff
- To provide and area for testing.

PROGRAM ACTIVITIES:
- Conferencing with staff, teachers, and visitors
- Staff collaboration

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
F1 Marker board (8 LF)
F2 Tack board (8 LF)
- Manual projection screen

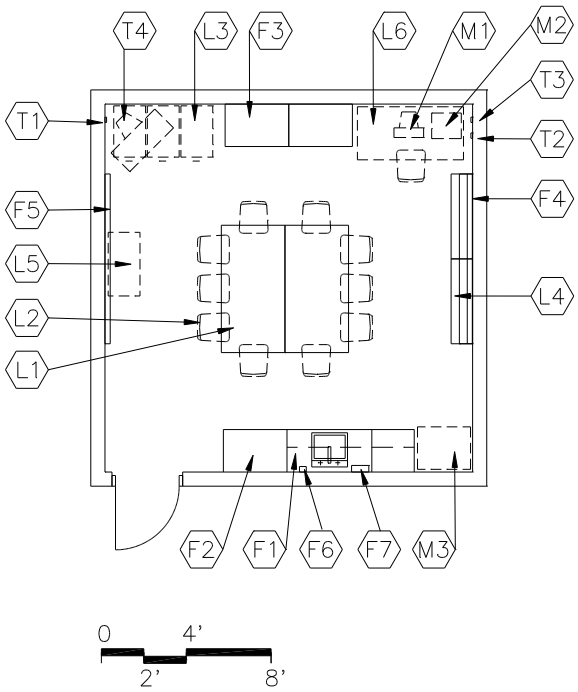
Loose Furnishings:
L1 1-2 Conference tables for 12 w/ conference room technology built-in
L2 12-20 chairs
L3 Computer workstation furniture

Room Technology:
T1 1 video port, monitor and brackets (proportion viewing size for larger conference room)
T2 1 voice port and phone
T3 2 data ports
- Design for computer aided presentations (electrical outlets from table for projection device, screen along short wall, light darkening capability)

NOTES:

Guidance/ Students Services Space

PARENT RESOURCE CENTER/PARENT VOLUNTEER ROOM



QUANTITY:
- 1

CAPACITY:
- Up to 12 People
- Parents new to school
- PTA members
- Volunteers

SIZE:
- 700 SF

SPATIAL RELATIONSHIPS:
- Near Welcome Center
- Near Lobby Entrance
- Near Public Restrooms

GOALS:
- To provide a place for parents to meet and work when they volunteer at school
- To provide space for parents to check-out and use parenting sources
- To provide a place for the PTSA to store their materials
- To provide space for parents to check-out and use parenting sources

PROGRAM ACTIVITIES:
- Parent training
- Small group meetings
- Storage for personal items
- Storage of fundraising materials (PTO/PTA)
- Work area

Built-in Fixtures:
F1 Casework:
Base/wall cabinets
F2 Casework
Wardrobe cabinet
F3 Casework:
Storage cabinets
F4 Marker board (8 LF)
F5 Tack board (8 LF)
F6 Soap dispenser
F7 Towel dispenser

Loose Furnishings:
L1 2 tables (36" x 72")
L2 10 chairs
L3 Four-drawer file cabinet
L4 Adjustable height bookshelves (20 LF)
L6 Computer workstation
M3 Refrigerator with ice maker

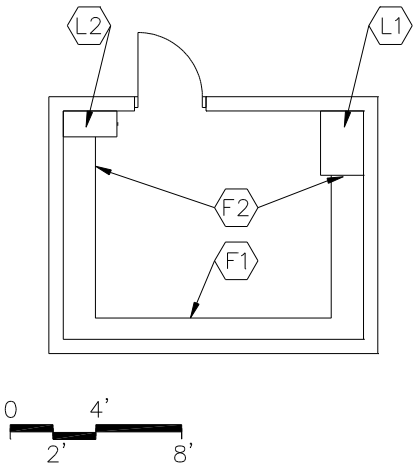
Miscellaneous equipment (owner provided)

Plumbing:
- Plumbing connections
- Sink, single/deep bowl
- Hook-up for ice maker

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Guidance/ Students Services Space

PTA STORAGE



QUANTITY:
- 1

SIZE:
- 200 SF

SPATIAL RELATIONSHIP:
- In Parent Resource Center

GOAL:
- To provide a safe and secure area for storage of equipment and supplies

ENVIRONMENTAL CONSIDERATION:
- Security of door
- Uniform lighting with single-level switching
- Windowless

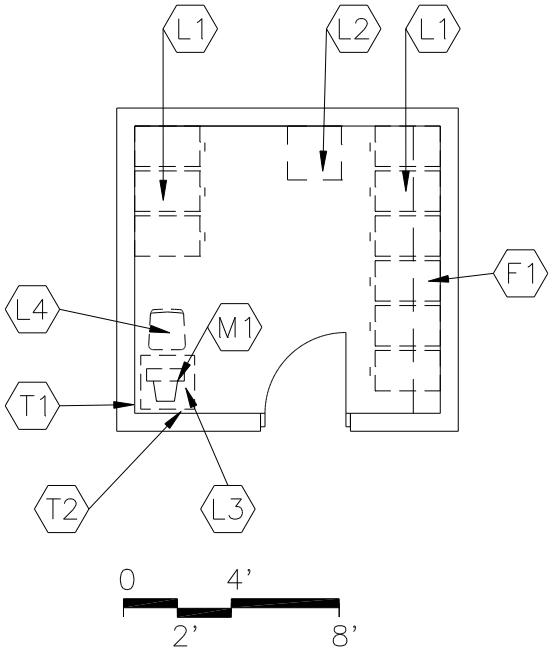
Built-in Fixtures:
F1 Storage shelving (12" deep)
F2 Storage shelving (18" deep)

Loose Furnishings:
L1 Adjustable height shelving (24" deep)
L2 4-drawer file cabinet (legal)

Electrical Features:
- Single-level switching

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

RECORDS ROOM



QUANTITY:
- 1

CAPACITY:
Staff Up to 2 people

SIZE:
- 300 SF

SPATIAL RELATIONSHIPS:
- Near guidance suite

GOAL:
- To provide secure, fireproof, and adequate storage for money, records, and other valuable items

PROGRAM ACTIVITIES:
- Storage of files and records
- Accessible to administration staff

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Security of door

Built-in Fixtures:
F1 Casework:
Wall shelving above file cabinets

Loose Furnishings:
L1 10--20, four-drawer file cabinets (fireproof)
L2 Small safe
L3 Small table
L4 Chair

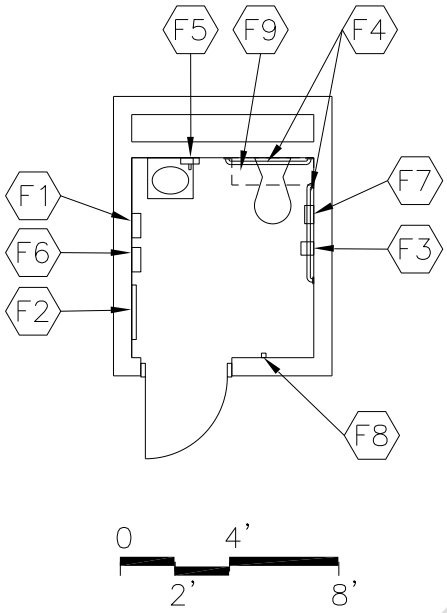
Room Technology:
T1 Voice port and phone
T2 Data port

Miscellaneous Equipment (Owner provided)

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Guidance/ Students Services Space

TOILET (Adult)



QUANTITY:
- 2

CAPACITY:
- Up to 1 person

SIZE:
- 60 SF

SPATIAL RELATIONSHIPS:
- Located within guidance suite

PROGRAM ACTIVITY:
- Changing clothing
- Personal and health needs for the health suite

ENVIRONMENTAL CONSIDERATIONS:
- Adequate exhaust/ventilation
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Moisture- and stain-resistant finishes
- Uniform lighting
- Wheelchair Accessibility

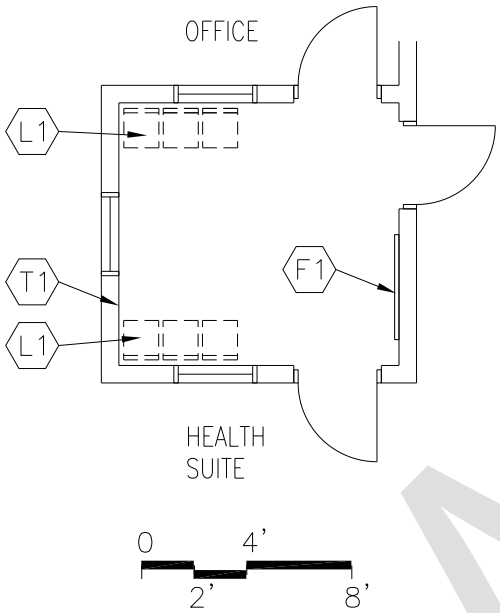
Built-in Fixtures:

F1	Towel dispenser
F2	24" x 60" mirror
F3	Toilet tissue holder
F4	36" and 42" grab bars
F5	Soap dispenser
F6	Sanitary dispenser
F7	Sanitary disposal
F8	Coat hook
F9	Casework: Wall cabinet

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Health Suite Space Requirements

RECEPTION/ WAITING AREA



QUANTITY:
- 1

CAPACITY:
- Up to 6 people

SIZE:
- 250 SF

SPATIAL RELATIONSHIPS:
- First space one enters in Health Suite
- Ground floor
- May include Nurse's desk and work station (see office for description of F&E)

GOAL:
- To provide an area for students waiting to see the nurse or for parent pick-up

ENVIRONMENTAL CONSIDERATIONS:
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting
- Windows to provide natural light

Built-in Fixtures:
F1 Tack board
- Brochure rack

Loose Furnishings:
L1 6 visitor chairs
- 2 Side tables w/ lamps

Room Technology:
T1 Voice port

Finishes:
Flooring:
- Moisture and stain-resistant finishes

Counter Tops:
- Chemical-resistant

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Health Suite Space

COT ROOMS

QUANTITY:
- 2

CAPACITY:
- 1 person per cot
- 2-3 cots per area

SIZE:
- 200 SF

ANCILLARY SPACES:
- Bathroom in each cot area

SPATIAL RELATIONSHIPS:
- Located within Health Suite
- Separate Male and Female Cot areas visible to the Office and Waiting Area

GOAL:
- To provide a place for students and staff to lie down when feeling ill

PROGRAM ACTIVITIES:
- Resting

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Audio and visual privacy
- Visual access to Waiting Area/Reception or Welcome Center

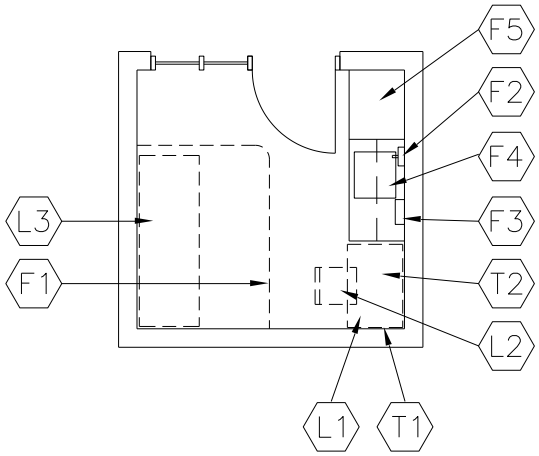
Built-in Fixtures:
Cubical curtain

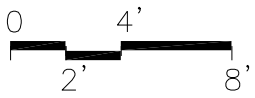
Loose Furnishings:
3 cots
3 guest chairs

Finishes:
Flooring:
- Moisture and stain-resistant finishes

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

EXAM ROOMS/ TREATMENT AREA





QUANTITY:
- 1

CAPACITY:
- Up to 2 people

SIZE:
- 140 SF

GOAL:
- To provide school based health services

PROGRAM ACTIVITIES:
- Administrative paperwork
- Consultation with students
- First aid
- Health screening
- Medical treatments
- Medication administration

SPATIAL RELATIONSHIPS:
- Located within Health Suite
- Near Waiting Area

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Electrical outlets for equipment
- Sink with hot and cold water/gooseneck with paddle handles
- Visual access to Waiting Area/Reception
- Wheelchair area within space

Note: Nurse should have visual control over the cots and reception area even while in the treatment area.

Built-in Fixtures:
F1 Cubical curtain
F2 Soap dispenser
F3 Towel dispenser
F4 Casework: Base/wall cabinets
F5 Casework: Student-access medicine cabinet (see staff for space and design requirements)

Loose Furnishings:
L1 Desk
L2 Ergonomic chair
L3 Cot or exam table

Room Technology:
T1 Voice port and phone
T2 Data port

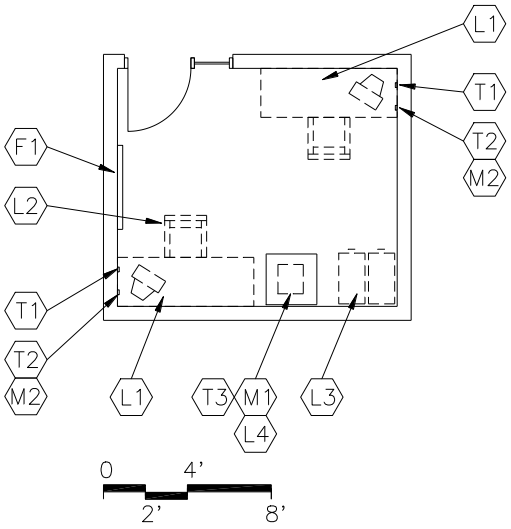
Finishes:
Flooring:
- Moisture and stain-resistant finishes

Counter Tops:
- Chemical-resistant

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Health Suite Space

OFFICES



QUANTITY:
- 1

CAPACITY:
- Up to 2 people

SIZE:
- 200 SF (includes 50 SF toilet)

SPATIAL RELATIONSHIPS:
- Adjacent and visual into Waiting Area/Reception

GOAL:
- To provide an office for the staff to perform clerical functions

PROGRAM ACTIVITIES:
- Computer input
- Conferences with staff and other visitors
- Paperwork
- Planning
- Telephone calls

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  - Wall minimum: STC 45
  - Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
F1 Tack board

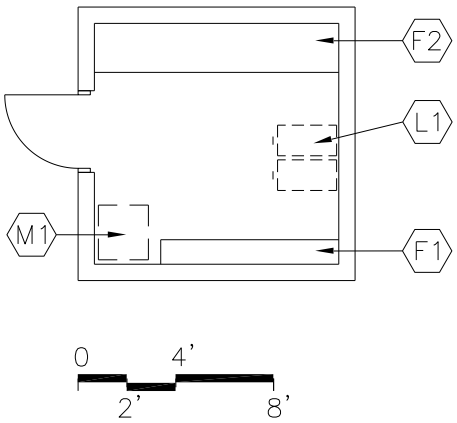
Loose Furnishings:
L1 1 desk
L2 1 ergonomic task chair
L3 1, 4-drawer file cabinet
L4 Printer table
Guest chair

Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3 Data port for printer

Miscellaneous Equipment (owner provided):
M1 Printer
M2 Computer

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

STORAGE AREAS



QUANTITY:
- 1

CAPACITY:
- Up to 1 person

SIZE:
- 50 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Treatment Area

GOAL:
- To provide storage for medical supplies and equipment

PROGRAM ACTIVITIES:
- Storage

ENVIRONMENTAL CONSIDERATIONS:
- Security of equipment, supplies, and medicines
- Uniform lighting

Built-in Fixtures:
F1 Storage shelving - 12" deep
F2 Storage shelving - 24" deep

Loose Furnishings:
L1 File cabinets

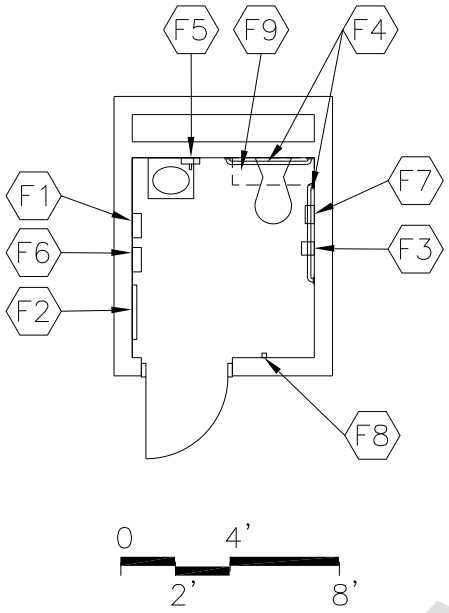
Miscellaneous Equipment:
M1 Refrigerator (lockable) with ice maker (may be in treatment room instead)

Plumbing:
Plumbing connections
- Ice maker, refrigerator

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Health Suite Space

TOILET



QUANTITY:
- 2

CAPACITY:
- Up to 1 person

SIZE:
- 60 SF

SPATIAL RELATIONSHIPS:
- Located within Health Suite adjacent to the Cot Rooms

PROGRAM ACTIVITY:
- Changing clothing
- Personal and health needs for the health suite

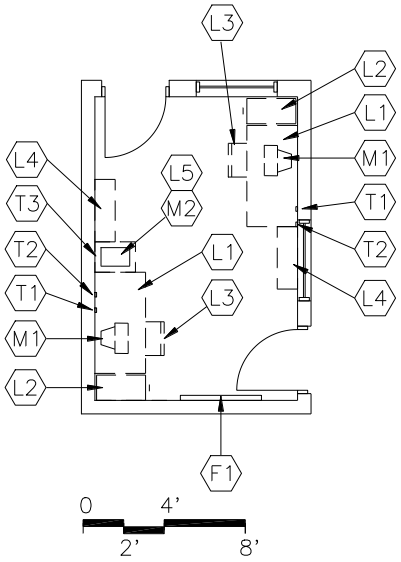
ENVIRONMENTAL CONSIDERATIONS:
- Adequate exhaust/ventilation
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Moisture- and stain-resistant finishes
- Wheelchair Accessibility
- Uniform lighting

Built-in Fixtures:
F1 Towel dispenser
F2 24" x 60" mirror
F3 Toilet tissue holder
F4 36" and 42" grab bars
F5 Soap dispenser
F6 Sanitary dispenser
F7 Sanitary disposal
F8 Coat hook
F9 Casework: Wall cabinet

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Maintenance & Custodial Space Requirements

BUILDING SUPERVISOR OFFICE



QUANTITY:
- 1

CAPACITY:
- Up to 2 People

SIZE:
- 150 SF

ANCILLARY SPACES:
- Toilet/Shower/Lockers

SPATIAL RELATIONSHIPS:
- Adjacent and access to Custodial Shop
- Adjacent and access to Receiving
- Near corridor

GOAL:
- To provide an area for the maintenance manager, staff, and building engineer to provide supervision of the physical plan

PROGRAM ACTIVITIES:
- Conferences with staff and other visitors
- Paperwork
- Telephone calls

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Uniform lighting
- Visual control from Custodial Shop
- Visual control from Receiving

Built-in Fixtures:
F1 Book shelves

Loose Furnishings:
L1 2 desk
L2 2, four-drawer file cabinets
L3 2 ergonomic task chairs
L4 Adjustable height bookshelves (12 LF)
L5 Printer table

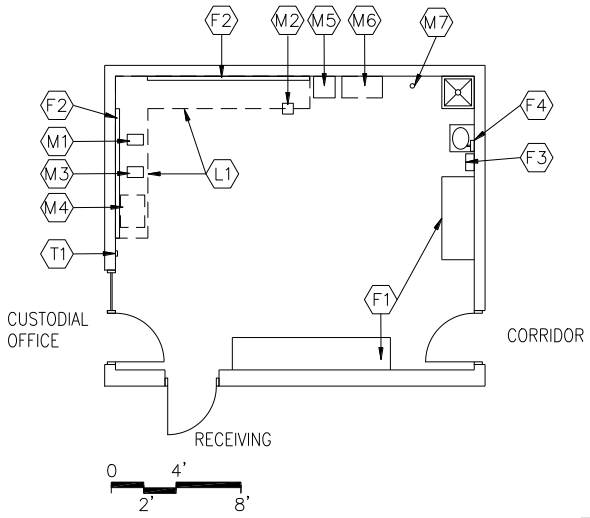
Room Technology:
T1 2 voice port and phone
T2 2 data ports

Miscellaneous Equipment (owner provided):

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Maintenance/ Custodial Space

CUSTODIAL SHOP



QUANTITY:
- 1

CAPACITY:
- Up to 4 People

SIZE:
- 250 SF

ANCILLARY SPACES:
- Toilet/Shower/Lockers

SPATIAL RELATIONSHIPS:
- Access to a main corridor
- Adjacent and access to Custodial Office
- Adjacent and access to Receiving
- Near boiler room

GOAL:
- To provide a safe and orderly area for maintenance of equipment, furniture, and real property assets

PROGRAM ACTIVITIES:
- General maintenance
- Painting
- Preventative maintenance
- Repair of small electrical items, equipment, furniture, doors, blinds, fixtures, etc.

ENVIRONMENTAL CONSIDERATIONS:
- Drainage for dumpster pad area for clean-up
- Electrical outlets for equipment
- High ceiling
- Sound proofing
- Uniform lighting

Built-in Fixtures:

F1 Workbench on two walls with storage below
- Storage shelving (locking), 84" high, 24" deep

F2 Pegboard (16 LF)
F3 Towel dispenser
F4 Soap dispenser
M7 Eye wash station

Miscellaneous Equipment (owner supplied):

NOTES:

Maintenance/ Custodial Space

CUSTODIAL STORAGE

QUANTITY:
- 4 for custodial

SIZE:
- May vary (600 SF total for custodial)
- 100 SF for recycling storage and temporary holding

SPATIAL RELATIONSHIPS:
- Adjacent to receiving and kitchen
- Easy access to a main corridor
- Near Custodial Shop

GOAL:
- To serve as points for storage of bulk commodities and equipment

PROGRAM ACTIVITY:
- Storage of furniture, materials for special events, paper, and general supplies

ENVIRONMENTAL CONSIDERATIONS:
- Double doors with removable mullions to Receiving and Corridor
- Electrical outlets for equipment
- High ceilings
- Uniform lighting

Built-in Fixtures:

Storage shelving (40 LF): 84” high x 36” deep

Storage shelving: 84" high x 24" deep

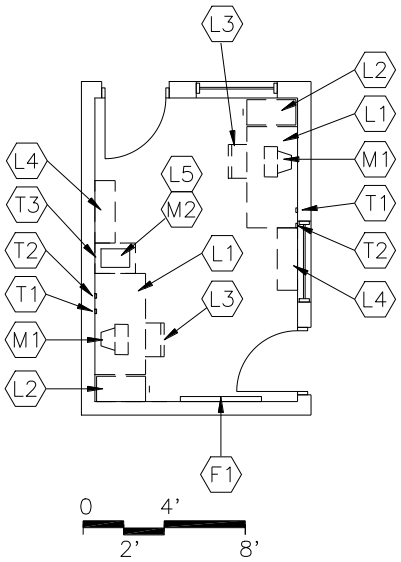
Loose Furnishings:

Chemical storage cabinet

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Maintenance/ Custodial Space

ENGINEERING OFFICE



CAPACITY:
- Up to 2 People

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Near Receiving or mechanical rooms
- Near corridor

GOAL:
- To provide an area for the maintenance manager, staff, and building engineer to provide supervision of the physical plant

PROGRAM ACTIVITIES:
- Conferences with staff and other visitors
- Paperwork
- Telephone calls

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Uniform lighting
- Visual control from Receiving

Built-in Fixtures:
F1 Book shelves

Loose Furnishings:
L1 2 desk
L2 2, four-drawer file cabinets
L3 2 ergonomic task chairs
L4 Adjustable height bookshelves (12 LF)
L5 Printer table

Technology
See standard Office

Room Technology:
2 voice port and phone
2 data ports

Miscellaneous Equipment (owner supplied):

NOTES:

Maintenance/ Custodial Space

ENGINEERING STORAGE

QUANTITY:
- 1

SIZE:
- 400 SF

SPATIAL RELATIONSHIPS:
- Adjacent to Receiving
- Easy access to a main corridor

GOAL:
- To serve as the central point for storage of bulk commodities and equipment

PROGRAM ACTIVITY:
- Storage of furniture, materials for special events, paper, and general supplies

ENVIRONMENTAL CONSIDERATIONS:
- Double doors with removable mullions to Receiving and Corridor
- Electrical outlets for equipment
- High ceilings
- Uniform lighting

Built-in Fixtures:
Storage shelving (40 LF): 84” high x 36” deep
Storage shelving: 84" high x 24" deep

Miscellaneous Equipment :
Metal cabinet for chemicals

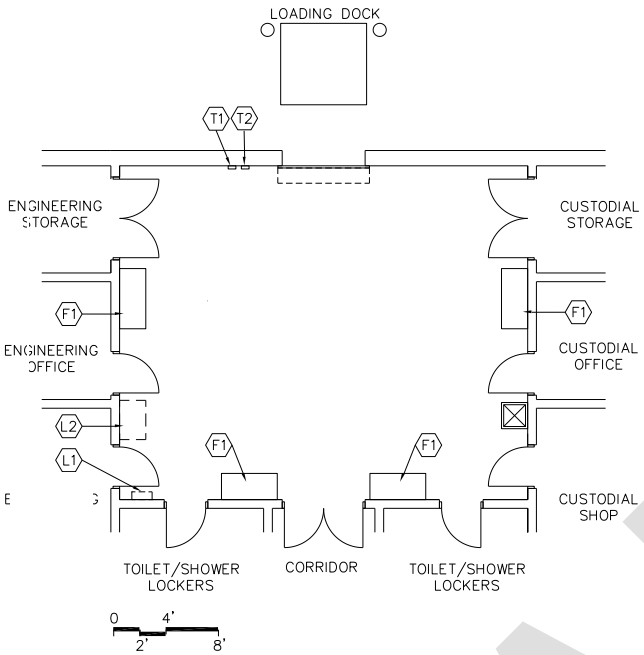
Loose Furnishings:
Desk and chair

Room Technology:
Voice port

NOTES:

Maintenance/ Custodial Space

RECEIVING



CAPACITY:
- Up to 4 People

SIZE:
- 800 SF

SPATIAL RELATIONSHIPS:
- Access to a main corridor
- Access to loading dock area

GOAL:
- To serve as the central point for delivery and shipping of bulk commodities and equipment and provide adequate storage for supplies and materials

PROGRAM ACTIVITIES:
- Loading and unloading
- Storage of furniture, materials for special events, paper, and general supplies

ENVIRONMENTAL CONSIDERATIONS:
- Double doors with removable mullions to corridor
- High ceiling
- Staging area with insulated overhead door large enough for forklift access
- Uniform lighting
- Electrical outlets for equipment

Fixed Equipment:
F1 Storage shelving (36" deep)

Loose Furniture:
L1 Step ladder (owner provided)
L2 Metal cabinet for flammables

T1-2
Voice and PA ports

NOTES:

Media Center Space

LIBRARY COMMONS

QUANTITY:
- 1

CAPACITY:
- 100 students
- 150 persons for community or staff meeting
- Media Specialist
- Media Assistant

SIZE:
- 4,600 SF (including 800 SF media specialist classroom)

ANCILLARY SPACES:
- Equipment Storage (150 SF)
- Office (150 SF)
- Staff Toilet (60 SF)
- Workroom (300 SF)

SPATIAL RELATIONSHIPS:
- Three (3) activity areas:
  1. Individual Research and Reading around periphery where stacks are located
  2. Interactive and Small Group areas
  3. Media Specialist classroom
- Good sight lines to all ancillary spaces
- Mobile circulation desk located centrally
- Locate standing card catalog station next to information desk
- Mobility for all free-standing furniture including book shelves

GOAL:
- To provide a place for social interaction and multi-media production and presentation
- To provide students, staff, and community with access to paper and digital information

Electrical:
- Duplex outlets throughout
- Electrical outlets at all column locations
- Flush covers for floor outlets
- Multilevel lighting

HVAC:
- Supply/return air system
- Independent temperature control

Flooring: Carpet

PROGRAM ACTIVITIES:
- Reading, storytelling, speakers
- Circulation of materials and resources
- Whole group and small group instruction
- Meetings for staff and parents

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Ceiling height in proportion to room dimensions
- Lighting appropriate to task with switches to dim separate zones of media center
- Security of school when center is in use after school hours
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress

Loose Furnishings:

Individual research and reading area:
- 10 lounge chairs (mobile)
- 5 end tables (mobile)
- Book stacks mostly peripheral (quantity site specific); some low shelving (36") on castors (20,000 volumes – fiction and non-fiction)
- Independent workstations distributed around the periphery (w/outlets); comfortable chairs

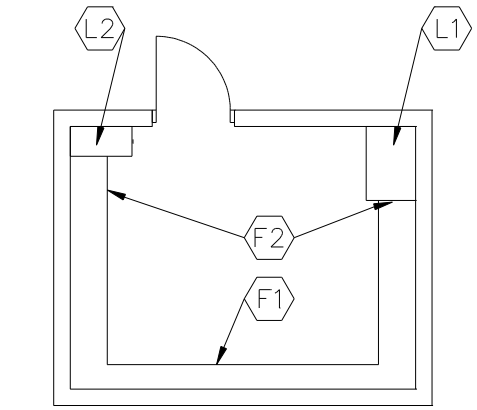
Interactive and Small Group area
- 10-12 four-person tables and chairs (mobile); consider different heights and alternative seating/standing choices (outlets at every location)

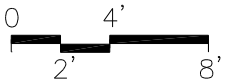
Room Technology:
- 2 data ports for network printers
- Robust wireless access

Circulation Desk area
- Modular mobile circulation desk combo
  - Book Return
  - Three locking drawers
  - Check-out module
- 2 data ports
- Bar code reader
- Voice ports and phones

Media Center Space

EQUIPMENT STORAGE





QUANTITY:
- 1

SIZE:
- 150 SF

SPATIAL RELATIONSHIP:
- Adjacent and access to the workroom

GOAL:
- To provide a safe and secure area for storage of equipment and supplies

ENVIRONMENTAL CONSIDERATION:
- Security of door
- Uniform lighting with single-level switching
- Windowless

Built-in Fixtures:
F1 Storage shelving (12" deep)
F2 Storage shelving (18" deep)

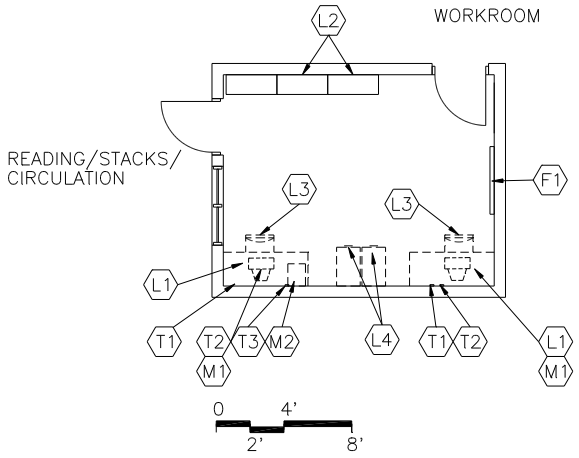
Loose Furnishings:
L1 Adjustable height shelving (24” deep)
L2 4-drawer file cabinet (legal)

Electrical Features:
- Duplex receptacles to charge laptop carts when not in use
- Single-level switching

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Media Center Space

OFFICE



QUANTITY:
- 1

CAPACITY:
- Media Specialist

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Reading/ Stacks/ Circulation
- Adjacent and access to Workroom
- Near Circulation desk

GOAL:
- To provide a private work area for the media specialist, easy access to the circulation desk, media production area, and computer resource area

PROGRAM ACTIVITIES:
- Ordering
- Scheduling
- Cooperative learning
- Administrative work (preparing budget, reports, etc.)
- Processing and repairing books, videos, discs, etc.

ENVIRONMENTAL CONSIDERATIONS:
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Auditory privacy
- Electrical outlets for equipment
- Uniform lighting
- Visual access to Reading/Stacks/Circulation

Built-In Fixtures:
F1 Tack board (4 LF)

Loose Furnishings:
L1 1-2 Computer workstations
L2 Adjustable height bookshelves (24 LF)
L3 1-2 Ergonomic task chairs
L4 2, 4-drawer file cabinets

Room Technology:
T1 Data network system near each workstation
T2 Voice port and phone near each workstation
T3 Data port for printer/copier/fax

Miscellaneous Equipment :
Provided by PGCPS

NOTES: Loose furnishings and features shown represent one of many possible arrangements; not all tags required.

Media Center Space

MEDIA ARTS SUPPORT

CAPACITY:
- 5-10 students
- 1 teacher

SIZE:
- 460 SF Studio (includes 100 SF Control Room)
- 40 SF Storage

SPATIAL RELATIONSHIPS:
- Accessible to and near the Library Commons
- Door from the corridor
- Door into adjacent Classroom

GOAL:
- To provide a soundproof, properly lighted room for video productions, audio productions, publication purposes, and multimedia productions using computer accessories and peripherals such as scanners, digital cameras, etc.

PROGRAM ACTIVITIES:
- Closed circuit TV production
- Creative writing
- Digitizing
- Newspaper production
- Scanning
- Video creation/production
- Voice over/dubbing

Finishes:
- **Flooring:** Studio floor should be medium gray tiles, and the Control Room should have VCT.
- **Walls/ Ceilings:** Should be painted flat black.

Electrical Features:
- Electrical outlets for equipment
- Lighting bar or grid with dimmer board in Control Room
- Provide a medium duty cyclorama I-beam supplied for “walk along” operation.
- Special lighting for video production
- Uniform lighting with an appropriate visual comfort level

ENVIRONMENTAL CONSIDERATIONS:
- Capability of transmitting live or pre-recorded programs to the rest of the school.
- Dual glass windows (typically 6’ x 3’) required between the studio and control room.
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 40
  Acoustically improved entry door seals

Built-in Fixtures (studio/control booth):
- Counter along window between and facing control room.
- Dry erase board (16’)
- Manual projection screen or interactive white board
- Hanging Green Screen
- Lighting grid (apx. 12’ X 12’ but dependent on configuration of studio)

Loose Furnishings (Studio/Control booth)
$30,000 cap for studio equipment
- Recommend a ‘turnkey integrated package’ to include: Audio mixer and audio and video switching equipment; Digital recording and sending equipment with ancillary microphones (3-4), and speakers
- Studio cameras (2)
- Studio lights (2-3)
- Pod cast and tricast equipment
- Anchor desk
- Work table

Area Technology:
- Audio connection from counter along window wall between and facing Control Room
- Cable connections to Control Room for light and sound controls
- Communication connections between studio and control room
- Voice Port and phone

HVAC Features:
- Separate HVAC control from the Media Center

Storage area
Adjustable shelving on three walls

BREAKOUT ROOM

QUANTITY:
- one

CAPACITY:
- 3-5 persons

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- Collaboration area with complete (floor to ceiling) transparency to the media commons

GOALS:
- To provide a space for students working independently or in small groups
- To provide informal learning space for pull-out instruction

PROGRAM ACTIVITIES:
- Conferences
- Small group activities
- Students working on projects
- Tutoring

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting with multi-level switching

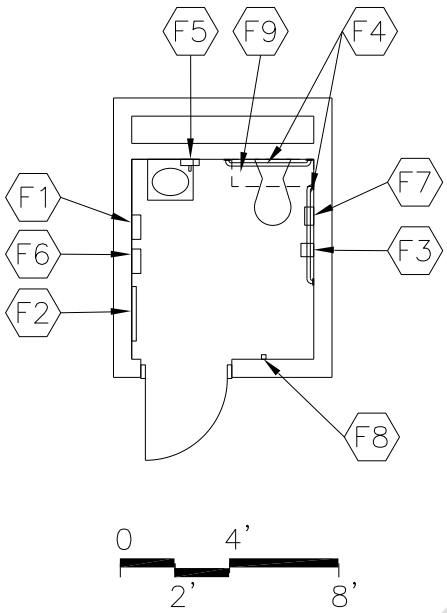
Fixed Equipment:
- 2 Dry, magnetic white eraser-board covering two walls
- Tack board (4' x 20) on third wall

Loose Furnishings:
- 1 work table
- 5 student chairs

NOTES:

Media Center Space

TOILET



QUANTITY:
- 1

CAPACITY:
- Up to 1 person

SIZE:
- 60 SF

SPATIAL RELATIONSHIPS:
- Located within Media Center near the Office and Workroom

ENVIRONMENTAL CONSIDERATIONS:
- Adequate exhaust/ventilation
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Moisture- and stain-resistant finishes
- Uniform lighting
- Wheelchair Accessibility

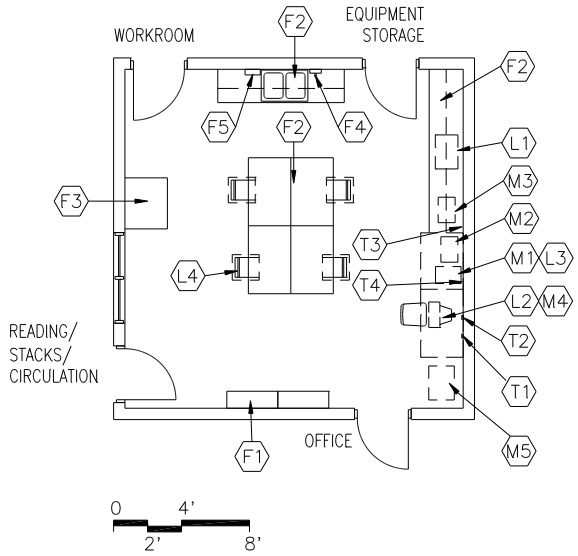
Built-in Fixtures:

F1	Towel dispenser
F2	24" x 60" mirror
F3	Toilet tissue holder
F4	36” and 42” grab bars
F5	Soap dispenser
F6	Sanitary dispenser
F7	Sanitary disposal
F8	Coat hook
F9	Casework: Wall cabinet

NOTES: Loose furnishings and features shown represent one of many possible arrangements

Media Center Space

WORKROOM



QUANTITY:
- 1

CAPACITY:
- Media specialist
- Student assistants

SIZE:
- 300 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Office
- Adjacent and access to Reading/Stacks/Circulation
- Behind circulation desk

GOAL:
- To provide space for the management and organization of media resources and processing of incoming materials

PROGRAM ACTIVITIES:
- Receiving, processing, and duplicating library materials
- Repairing damaged or worn materials
- Scanning and digitizing

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform Lighting
- Visual access to Reading/Stacks/Circulation

Built-in Fixtures:
F1 Storage shelving: video video (24 LF)
F2 Casework: Base/wall cabinets around sink
F3 Casework: Tall storage (36" X 22" X84")
F4 Soap dispenser
F5 Towel dispenser

Loose Furnishings:
L1 Paper cutter
L2 Computer workstation furniture
L3 Equipment table
L4 Admin Chair
- Teachers' Mobile Cart for Technology

Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3 Data port for printer and scanner
T4 Fax port

Miscellaneous Equipment:
Owner provided

Plumbing Features:
- Plumbing connections: Sink

NOTES: Loose furnishings and features shown represent one of many possible arrangements; not all tags required.

Performing Arts Space

Performing Arts Space Requirements
STAGE

Design the auditorium for multiple flexible learning environments — an auditorium/performance space, a multimedia theater, a lecture hall, and a classroom. Performing arts is just one possible use of the space. Design an acoustic partition to be lowered/slid behind the proscenium, separating the stage area from the rest of the auditorium.

In one possible use, the auditorium side becomes a multimedia theater/lab, complete with projector screens that can be used for presentations, animation projects and more. In another use, the auditorium side of the room becomes a traditional lecture hall. The first two rows should be removable seating to allow for a flat lecture or performance space.

Whenever the auditorium side is in use, the stage side behind the partition can be used for drama classes, black box events, or rehearsals. Consider windows on the stage to make for a pleasant teaching or performance space. Provide retractable platform seating (minimum of 30 seats).

Flexibility is continued into the stage support areas so that the 'greenroom' can be used for classes and meetings but can be divided when needed to become the make-up/dressing rooms for a performance with costume and prop storage integrated into the same space.

Scene storage backs up to an outside loading area and has direct access to the stage.

Example from EMS World Academy, Chicago

Performing Arts Space

STAGE

SIZE:
- 2,250 SF

ANCILLARY SPACES:
- Green room
- Scene Shop storage

GOAL:
- To provide space for student performances, classes, rehearsals

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment (sound and lighting)
- Uniform 'house' lighting (controls on stage)
- Door to the corridor
- Windows

Built-in Fixtures:
- Batons for stage lighting with electric connections (lowerable for maintenance)
- Stage curtains
- Movable acoustical wall across proscenium
- Motorized projection screen (outside proscenium opening)

Loose Furnishings:
- Grand piano
- Mobile seating risers
- Folding Orchestra shell
- Podium

Stage Technology:
- 1 data port in center of stage apron
- 2 data ports side stage
- Jacks for sound system in apron at front of stage
- Microphone port
- Voice port and telephone

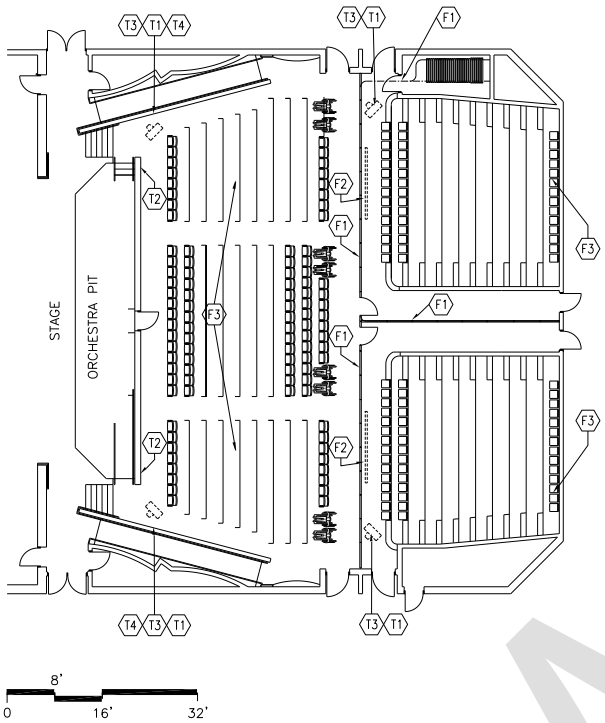
Finishes:
Flooring: Wood flooring

Typical dimensions: 40' proscenium opening; 20-foot wing on one side of the arch and a 30-foot wing on the rigging side of the arch; 25' depth behind curtain/wall

NOTES:

Performing Arts Space

AUDITORIUM SEATING



CAPACITY:
- 900

SIZE:
- 9,000 SF

ANCILLARY SPACES:
- Sound and Light Control Box
- Stage
- Ticket Booth/Box Office

SPATIAL RELATIONSHIPS:
- All facilities in this area must have easy access to the rest of the school, with capability to be closed off from all parts of the school during evenings for security
- Convenient access to visitor parking
- Opens into lobby with ticket booth, public restrooms, and a public entrance with drop-off

GOAL:
- To provide a flexible performance venue and large technology intensive multi-purpose instructional space.

PROGRAM ACTIVITIES:
- Community programs and events
- Lectures
- Student assemblies
- Theatrical, dance, and musical productions

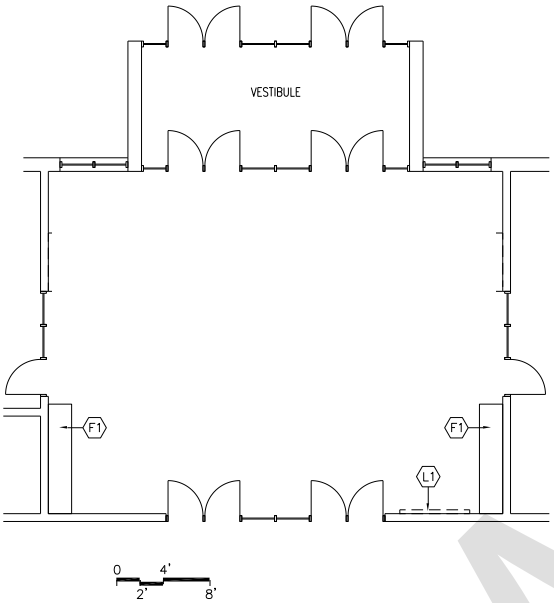
ENVIRONMENTAL CONSIDERATIONS:
- Optimize sound qualities

Built-in Fixtures:
F1 Operable wall (optional on balcony)
F2 Motorized projection screen
F3 Fixed audience seating with table arms on every other seat on first 10 rows

Room Technology:
- House and Stage lighting
- Sound system

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

LOBBY



QUANTITY:
- 1

CAPACITY:

SIZE:
- 1,700 SF

SPATIAL RELATIONSHIP:
- Adjacent and access to Auditorium

GOAL:
- To provide a standing area before performances and events.

ENVIRONMENTAL CONSIDERATIONS:
- Aesthetically pleasing
- Electrical outlets for equipment
- Provide exterior canopies at entrances
- The architect is to work with the school and district security to develop a safe and respectful security arrangement for students, staff and visitors
- Treat for sound attenuation
- Uniform lighting with accent lighting as appropriate
- Window to provide ample natural light

Furnishings & Fixtures:
F1 Display cases
L1 Electronic board
- Security desk/counter with workstation

Room Technology:
- Voice and data to security desk

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Performing Arts Space

MULTI-PURPOSE GREEN ROOM

QUANTITY:
- 1

CAPACITY:

SIZE:
- 1100 SF

SPATIAL RELATIONSHIPS:
- Near Restrooms
- Locate behind stage with corridor access
- Movable wall will divide space into two dressing rooms during theater performance

GOAL:
- To provide a multipurpose space for stage support and the drama program

PROGRAM ACTIVITIES:
- Putting on make-up
- Changing clothes
- Physical warm-up before performances
- Rehearsals
- Small group and large activities

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Electrical outlets for equipment
- Audio to monitor stage

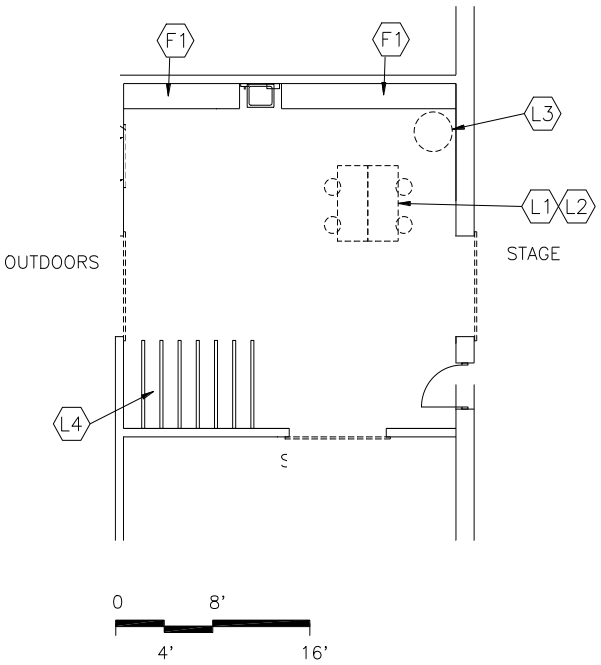
Built-in Fixtures:
- 120 SF of Costume storage closet (4' x 30') with clothes rod and shelving above
- Countertop for 4 make-up stations each on opposite walls on either side of movable wall; base casework for stations; mirrors with surround lighting; hand sinks
- Dry, white eraser-board (4' x 20')
- Clock (on side walls instead of rear walls)
- Tack board (4' x 20')

Loose Furnishings:
- 1 work table
- 25 stackable student chairs
- 25 student desks (trapezoid)
- Teacher wardrobe (lockable) with coat rod; tall cabinet w/ shelving (may be one unit)
- Teacher's desk/workstation and chair

Classroom Technology
- Mobile interactive board

NOTES:

SCENE SHOP STORAGE



CAPACITY:
- 4-10 Students
- 1 Staff member

SIZE:
- 300 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Stage
- Outside access (if feasible)

GOAL:
- To provide an area for storage of sets, flats, and scenery for production

PROGRAM ACTIVITIES:
- Cutting wood
- Hammering nails
- Production of props, etc.

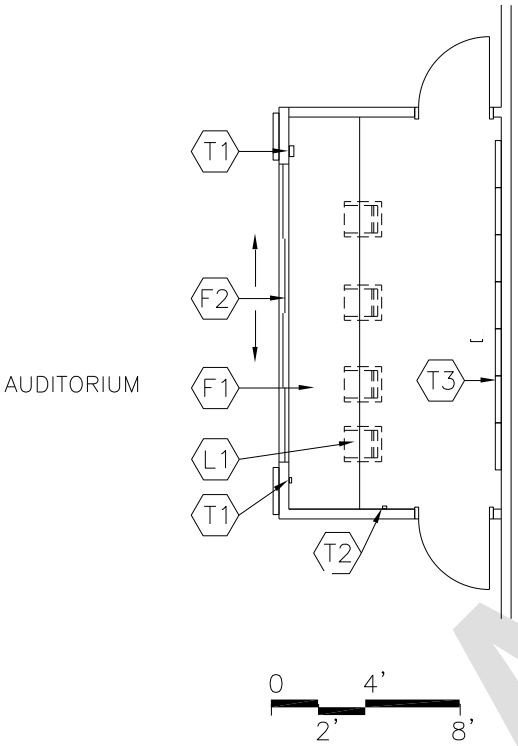
ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation and dust collection
- Doors should be 15' clear height and 10' wide to allow for moving flats to stage
- Electrical outlets for equipment
- Minimum 20' clear ceiling height
- Open floor space to allow for construction

Loose Furnishings:
L1 Work table (1)
L2 Stools (2)
L3 Large mobile trash can with lids
L4 Storage racks for flats
F1 Storage shelves

NOTES:

Performing Arts Space

SOUND AND LIGHT CONTROL



CAPACITY:
- 4 people

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- Behind and above last row of auditorium seating

GOAL:
- To provide space for the equipment needed to operate the sound, lighting, and projection equipment for the stage

PROGRAM ACTIVITIES:
- Operation of the technical support for performances
- Teaching of Technical Theater

ENVIRONMENTAL CONSIDERATIONS:
- Consider sound transfer into Auditorium during performances
- Electrical outlets for equipment
- Sound proof HVAC system
- Task lighting
- Uniform Lighting
- Unobstructed view of stage at all times

Built-in Fixtures:

F1 Casework: 36" deep plastic laminate counter top

F2 Sliding glass windows

Loose Furnishings:

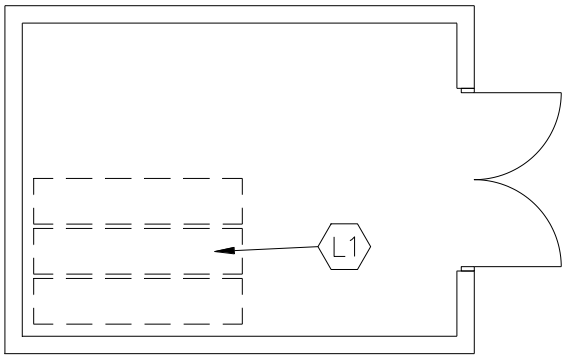
L1 Student stools

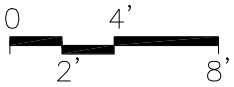
Room Technology:

T1 2 data ports
T2 Voice port and phone
T3 Video port
Intercom/headset hook-up (audio/visual)

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

STORAGE (CHAIR/ PIANO)





SIZE:
- 100 SF

SPATIAL RELATIONSHIP:
- Near auditorium orchestra pit

GOAL:
- To provide a secure area for storing and retrieving chairs

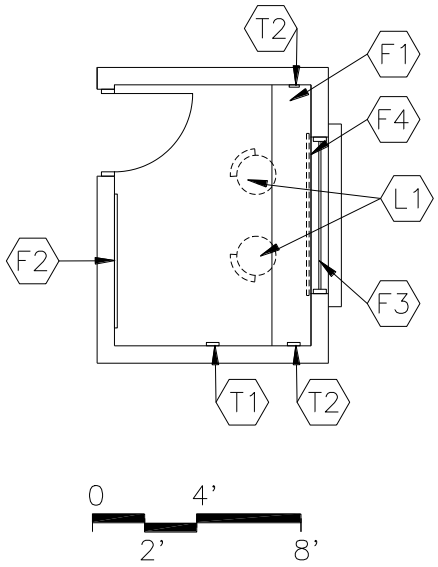
PROGRAM ACTIVITY:
- Storage for chairs

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Wide double door opening

NOTES:

Performing Arts Space

TICKET BOOTH/BOX OFFICE



CAPACITY:
- 2 persons

SIZE:
- 100 SF

SPATIAL RELATIONSHIPS:
- Located in Lobby adjacent to Auditorium
- Lockable window into corridor

GOAL:
- To provide a space for ticket sales

PROGRAM ACTIVITY:
- Selling tickets

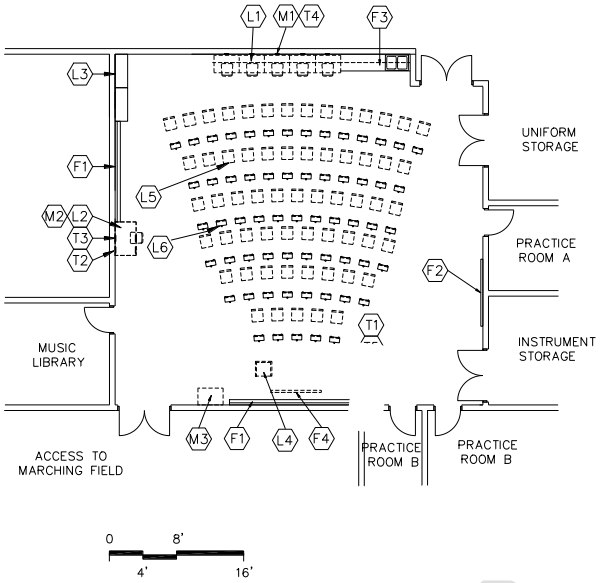
Built-in Fixtures:
Casework
- Counter

Loose Furnishings:
- 2 stools

Room Technology:
- Data port

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

BAND/ ORCHESTRA ROOM



CAPACITY:
- Up to 80 students
- Teacher

SIZE:
- 2,500 SF

ANCILLARY SPACES:
- Instrument Storage
- Practice Rooms

GOAL:
- To serve as the learning and practice area for instrument classes

PROGRAM ACTIVITIES:
- Individual and small group practice
- Jazz and chamber ensembles
- Performance
- Teaching and learning to read music

SPATIAL RELATIONSHIPS:
- Adjacent and access to Instrument Practice Room
- Adjacent and access to Storage
- Near to Stage and Outdoors

ENVIRONMENTAL CONSIDERATIONS:
- Uniform multilevel lighting
- Environmental sound control:
  Wall minimum: STC 60
  Ceiling minimum: CAC 35, STC 60
- 8' high double doors throughout this area with no mullions
- Baffled ductwork
- Sound proof HVAC system (under 35 dBa)
- Appropriate acoustics and sound attenuation
- Adequate ventilation
- Electrical outlets for equipment
- Non-parallel surfaces (walls/ceiling) for acoustical benefits
- Sound seals on doors
- Ceiling Height (14' minimum)

Built-in Fixtures:
F1 Marker board (24 LF)
1/2 with staff lines
F2 Tack board (12-16 LF)
F3 Casework:
Base/wall cabinets (8 LF)
F4 Interactive White board
Clock (on side walls instead of rear walls)

Loose Furnishings:
L2 Teacher desk and chair
L3 Sheet music cabinet
(150 concert sized folio capacity)
L4 Conductors podium/stand/chair
L5 80 Music posture chairs
L6 80 music stands
- Sound recording equipment cart
- Teachers' Mobile Cart for Technology

TECHNOLOGY and BUILT-IN EQUIPMENT
- See regular Classroom

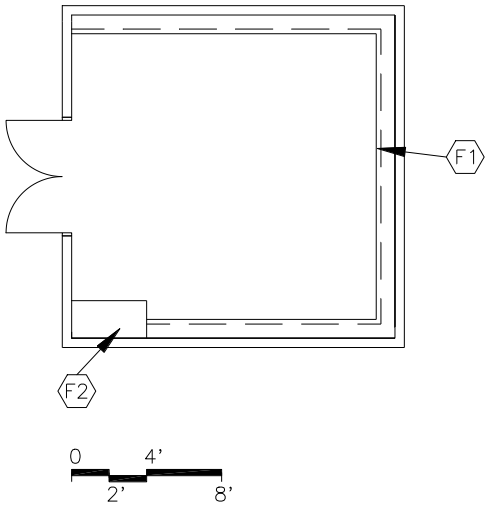
(Class)Room Technology:
- Additional ports: Printer, Clock/PA, 2 wireless
- Interactive white board (typical)
- Single point 'face plate' near teachers work station to include: Voice, data, VGA , audio enhancement, and HDMI

Miscellaneous Equipment ~~(owner provided):~~
M3 Band/orchestra sound system with sound recording/editing equipment and microphone connection

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Performing Arts Space

BAND UNIFORM STORAGE



SIZE:
- 250 SF

ANCILLARY SPACES:
- Band/Orchestra Room

SPATIAL RELATIONSHIPS:
- Adjacent to Band/Orchestra Room

GOAL:
- To provide secure and adequate storage for uniforms

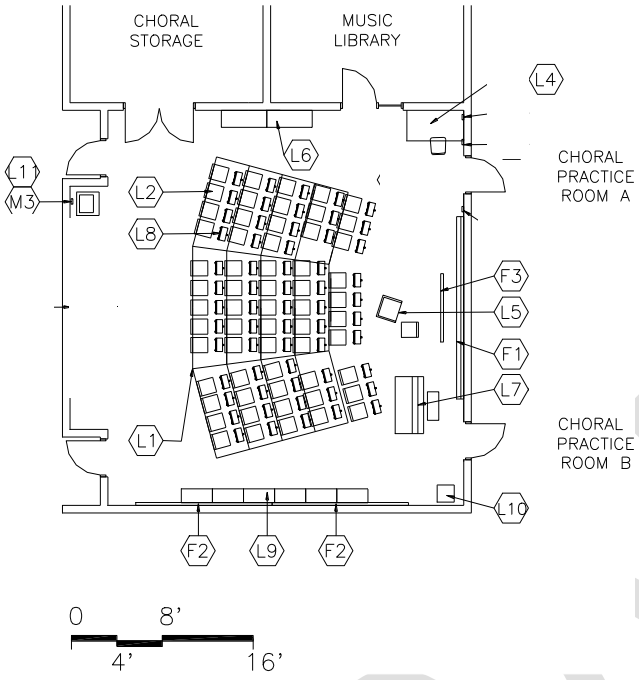
PROGRAM ACTIVITY:
- Storing and accessing uniforms

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Uniform lighting

Built-in Fixtures:
F1 Closet shelving /Double rods
F2 Casework: Tall cabinet

NOTES:

CHORAL/ GUITAR ROOM (optional KEYBOARD)



QUANTITY:
- 1

CAPACITY:
- Up to 60 students
- Teacher

SIZE:
- 1,800 SF

GOAL:
- To provide a space that will serve as the learning/ practice area for choral and general music classes

PROGRAM ACTIVITIES:
- Practice for sectional groups
- Rehearsals
- Solos
- Survey music classes

ENVIRONMENTAL CONSIDERATIONS:
- Appropriate acoustical treatment
- Baffled ductwork
- Drinking fountain in corridor
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 60
  Ceiling minimum: CAC 35, STC 60
- Higher than normal ceiling height (14' minimum)
- Non-parallel surfaces (walls/ceiling) for acoustical benefits
- Quiet HVAC system (under 35 dBa)
- Sound seals on doors

Built-in Fixtures:
F1 Marker board (16 LF)
F2 Tack board (16 LF minimum)
F3 Interactive White board (not in front of white board)
Speakers on 4 walls for sound system
- Guitar storage racks (Optional)
- Clock (on side walls instead of rear walls)

Loose Furnishings:
L1 Portable standing choral risers
L2 45 chairs with folding tablet arms
L4 Teacher desk and chair
L5 Conductor's podium, chair, and stand
L6 Sheet music cabinet
(150 concert sized folio capacity)
L7 Upright digital piano
L8 40 music stands
L9 Adjustable height bookshelves (48 LF)
L10 Sound recording/editing equipment Cabinet
15 music keyboard tables
Teachers' Mobile Cart for Technology

TECHNOLOGY and BUILT-IN EQUIPMENT
- See regular Classroom

(Class)Room Technology:
- Additional ports: Printer, Clock/PA, 2 wireless
- Single point 'face plate' near teachers work station to include: Voice, data, VGA , audio enhancement, and HDMI

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Performing Arts Space

CHORAL PRACTICE ROOM

QUANTITY:
- 2

CAPACITY:
- Up to 3 students
- Teacher

SIZE:
- 125 SF

SPATIAL RELATIONSHIP:
- Adjacent and access Choral Room

GOAL:
- To provide an area for individual student practice and rehearsals

PROGRAM ACTIVITY:
- Choral practice/rehearsals

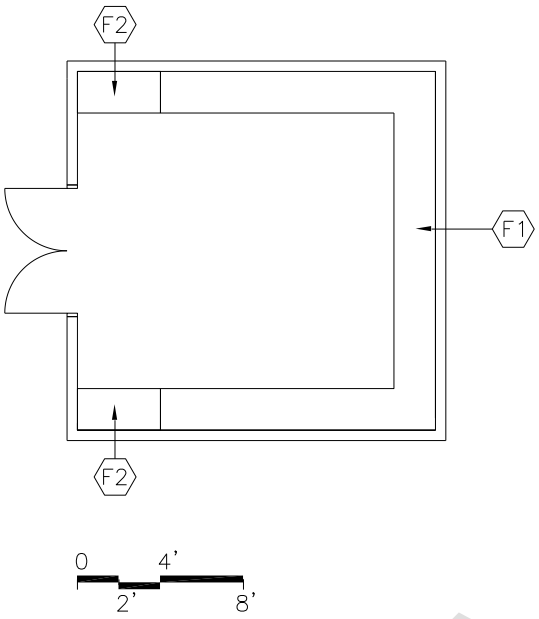
ENVIRONMENTAL CONSIDERATIONS:
- Environmental sound control:
  - Wall minimum: STC 60
  - Ceiling minimum: CAC 35, STC 60
- Adequate ventilation
- Auditory privacy
- Quiet HVAC system (under 35 dBa)

Built-in Fixtures:
- Tack board (4 LF)
- Marker board (4 LF)
- Casework: Base cabinets (6 LF) (optional)

Room Technology:
- Data port

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

CHORAL STORAGE/Library



QUANTITY:
- 1

CAPACITY:
- Student assistants
- Teacher

SIZE:
- 300 SF

SPATIAL RELATIONSHIP:
- Adjacent and access to Choral Room

GOAL:
- To provide adequate storage for portable choral risers, accessories, and equipment

PROGRAM ACTIVITY:
- Storage and simple repair of portable choral risers, accessories, and equipment

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Uniform lighting

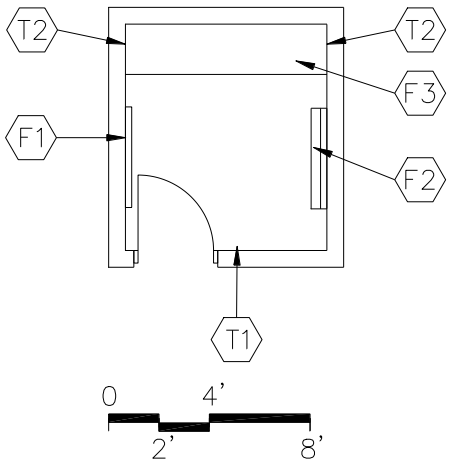
Built-in Fixtures:
F1 Rods for robes
F2 Casework: Tall cabinets

Loose Furniture:
Compact library system

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Performing Arts Space

INSTRUMENTAL PRACTICE ROOM



QUANTITY:
- 2-3

CAPACITY:
- Up to 2 students
- Teacher

SIZE:
- 75 - 150 SF

SPATIAL RELATIONSHIP:
- Adjacent and access to Band/Orchestra Room

GOAL:
- To provide an area for individual student practice and rehearsals

PROGRAM ACTIVITY:
- Instrumental practice/rehearsals

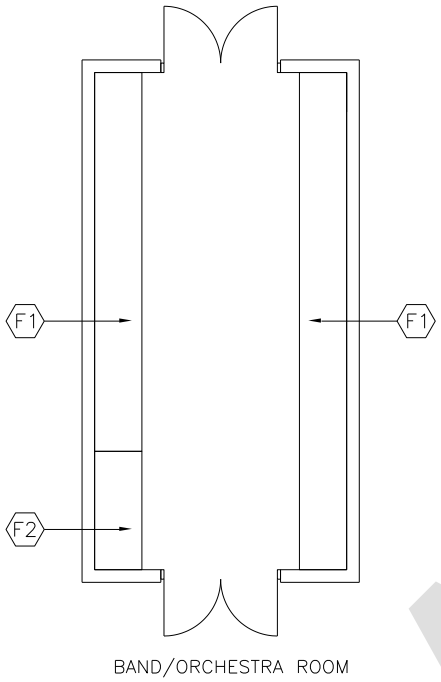
ENVIRONMENTAL CONSIDERATIONS:
- Environmental sound control:
  - Wall minimum: STC 60
  - Ceiling minimum: CAC 35, STC 60
- Adequate ventilation
- Auditory privacy
- Quiet HVAC system (under 35 dBa)

Built-in Fixtures:
F1 Tack board (4 LF)
F2 Marker board (4 LF)
F3 Casework: Base cabinets (6 LF) (optional)

Room Technology;
T2 Data port

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

INSTRUMENT STORAGE



QUANTITY:
- 1

SIZE:
- 400 SF

SPATIAL RELATIONSHIP:
- Adjacent and access to Band/Orchestra Room
- Provide entrance and separate exit to the Band/Orchestra Room

GOAL:
- To provide secure and adequate storage for instruments

PROGRAM ACTIVITY:
- Storage of instruments

ENVIRONMENTAL CONSIDERATIONS:
- Adequate year round ventilation
- Uniform lighting

Built-in Fixtures:

F1 Storage shelving: Instrument storage w/ open grille doors

F2 Casework: Tall cabinets

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Performing Arts Space

KEYBOARD LAB

CAPACITY:
- 25 Persons
- Teacher

ANCILLARY SPACES:
- Band/Orchestra Room
- Choral Room

GOAL:
- To teach music theory and appreciation classes
- To teach piano/keyboarding

PROGRAM ACTIVITIES:
- Small and large group instruction
- Listening to music

SPATIAL RELATIONSHIPS:
- Adjacent to Band/Orchestra Room
- Adjacent and access to Choral Room

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Environmental sound control:
- Wall minimum: STC 45
- Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
- Marker board (8 LF)
- Tack board (8 LF minimum)
- Interactive White board (not in front of white board) or ceiling mounted projector

Loose Furnishings:
- 25 tables for keyboards with posture chairs
- Stereo audio system, CD player, AM-FM turner, amplifier (Owner provided)
- Four wall-mounted speakers

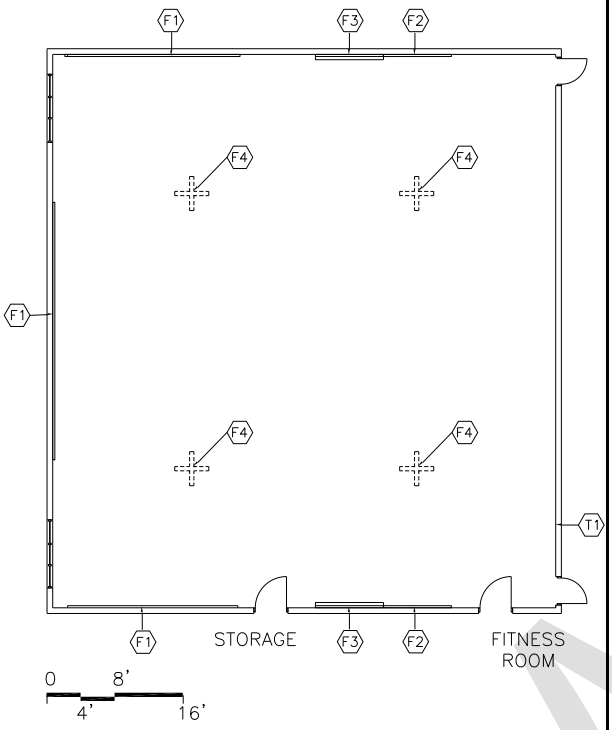
Miscellaneous Equipment:
- Keyboards (owner provided)

Room Technology:
1 voice port and phone
2 Wireless ports

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Performing Arts Space

DANCE STUDIO



QUANTITY:
- 1

CAPACITY:
- 25 Students
- 1 Teachers

SIZE:
- 1,700 SF
- 200 SF Costume storage
- 100 SF Office
- 100 SF changing area w/ 24 lockers (3 per tier)

SPATIAL RELATIONSHIPS:
- Near PE Locker Rooms/Showers
- Near stage
- Window from office to dance studio (blinds)

GOAL:
- To support the Dance program

PROGRAM ACTIVITIES:
Ballet, Modern Dance, Jazz Dance and World Dance.

ENVIRONMENTAL CONSIDERATIONS:
- Open Ceiling -18-22'
- Drinking Fountain with refillable -Water Bottle Station
- Purchase a portable marley floor in black along with a case of black gaffers tape to be used on the Cafetorium stage for performances

Built-in Fixtures:
- 18 foot tack board
- 32 cubbies (12" X 8") stacked 4 rows high for students to place their street shoes
- 8 Portable metal dance barres 6 foot
- Sound system should be stored in a mounted sound cabinet that locks (Bluetooth capability
- Curtain track and Black curtain to go around rm to cover mirrors for informal performance space
- Projection Screen

Room Technology:
T1 Voice port and phone

Miscellaneous Equipment:
M1 Surround sound system – consult staff
Portable Marley Floor and carrier

Finishes:
Flooring:
- Sprung Wooden floating sub floor -Light finish

Office
- Teacher desk and chair
- Office technology – See Pg. 9
- Book Case for Dance Textbooks (75-100 total)
- Tack board (4')
- White board (4')

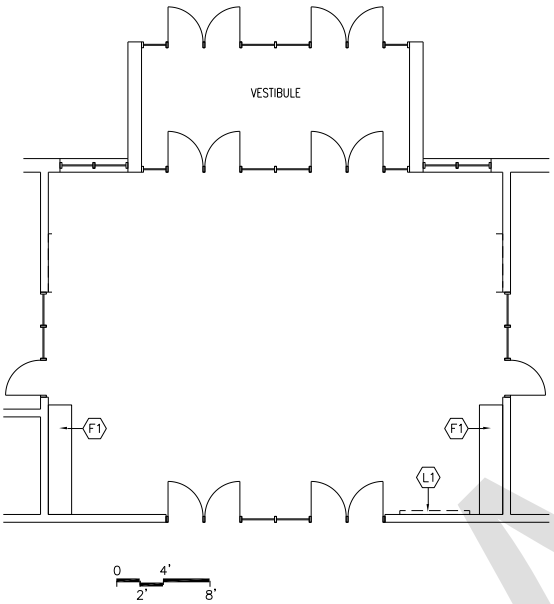
Costume storage
- Adjustable shelving
- Garment storage racks on wheels

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Physical Education Space

Physical Education Space Requirements

LOBBY



QUANTITY:
- 1

CAPACITY:

SPATIAL RELATIONSHIP:
- Adjacent and access to Gymnasium
- Access to group toilets
- Water Fountain
- Awning outside door for gathering during inclement weather
-

GOAL:
- To provide a standing area before performances and events.

ENVIRONMENTAL CONSIDERATIONS:
- Aesthetically pleasing
- Electrical outlets for equipment
- Provide exterior canopies at entrances
- The architect is to work with the school and district security to develop a safe and respectful security arrangement for students, staff and visitors
- Treat for sound attenuation
- Uniform lighting with accent lighting as appropriate
- Window to provide ample natural light

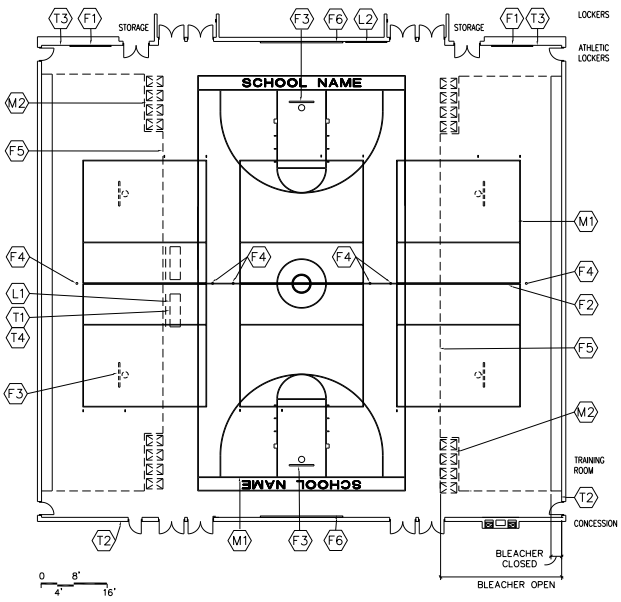
Furnishings & Fixtures:
F1 Display cases
L1 Electronic board
- Security desk/counter with workstation

Room Technology:
- Voice and data to security desk

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Physical Education Space

GYMNASIUM



QUANTITY:
- 1

CAPACITY:
- 75-1450 Students
- 2-4 Teachers
- Capacity of bleachers shall be the student capacity (2200-2600)

SIZE:
- 18,845 includes gymnasium and auxiliary gym consolidated

ANCILLARY SPACES:
- PE Locker Rooms/Showers
- Department Offices
- Storage
- Laundry

SPATIAL RELATIONSHIPS:
- Near outdoor athletic fields
- Near visitor parking and public
- Provides 3 full basketball courts when the bleachers are closed

GOAL:
- To serve as physical education facility during the school day, a practice and recreation area during non-school hours

PROGRAM ACTIVITIES:
- Community programs and activities, secured
- Interscholastic competition and daily practices
- Physical education classes

ENVIRONMENTAL CONSIDERATIONS:
- Clear height of 25' from floor to nearest obstruction
- Drinking fountain in adjacent corridor
- Must be able to isolate the gymnasium from the rest of the school after hours
- The walls and ceilings will require acoustical treatment:
- Uniform lighting with multilevel controls

Built-in Fixtures/Equipment:
- 2 white boards with electrical outlets on either side of the curtain.
- P/A sound system
- Clock (with protective cage)
- Padding on walls behind the goals and on the backboards
- Block outs for three sets of volleyball standards and nets.
- Dividing curtain between two basketball courts when the bleachers are withdrawn; ~~motorized wall between third court~~
- Tack strips on the walls are required to fasten banners.
- Bleacher seating to be electrically operated & fold back to provide a flat surface.
- Multi-sport scoreboard.
- Glass lexon basketball backboard (2), with break-away rims, forward swing, main court, Fiberglass basketball backboard (4), forward swing, side, cross court. Each backboard (6) is to be raised and lowered electrically and shall retract away from bleachers.

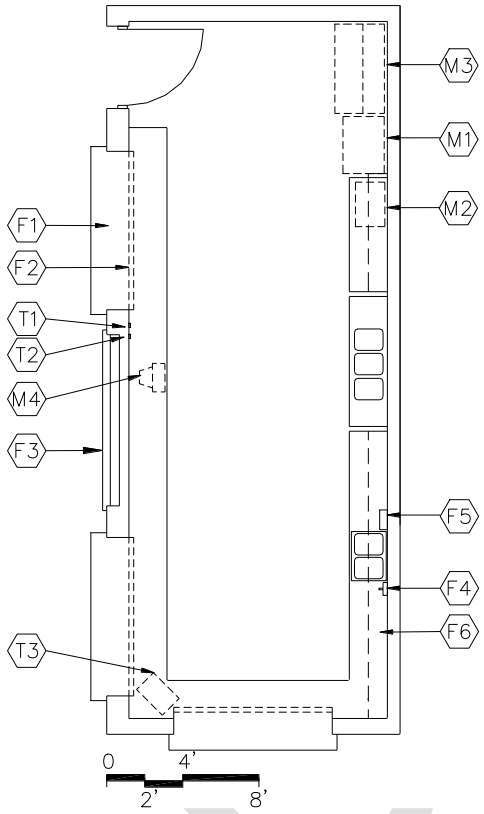
Room Technology:
T1 Microphone port
T2 Outside microphone port
T3 2 voice ports and phones
T4 Port for sound system
- Data ports near each white erase board
- Wireless capability

Finishes:
Flooring:
- Wood strip flooring for athletic applications

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Physical Education Space

CONCESSION



CAPACITY:
- Students
- 1 Teachers

SIZE:
- 300 SF

SPATIAL RELATIONSHIPS:
- Near Gymnasium
- Near public restrooms

GOALS:
- To provide display areas to celebrate triumphs of the school
- To provide space for the public to purchase refreshments and tickets during events

PROGRAM ACTIVITIES:
- Ticket sales
- Displaying school recognition awards
- Refreshment sales
- Common gathering place for community and school athletic events

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Cleanable building surfaces/floor drains
- Easy to supervise
- Electrical outlets for equipment
- Food service department and public health, requirements, as applicable
- Good signage
- Good traffic flow
- Large door to transport large boxes and equipment to and from the area
- Plumbing for double bowl sink

Built-in Fixtures:
F1 Counter area for concessions and ticket sales
F2 Coiling overhead counter door
F3 Display case
F4 Soap dispenser
F5 Towel dispenser
F6 Casework: Base/wall cabinets (lockable)

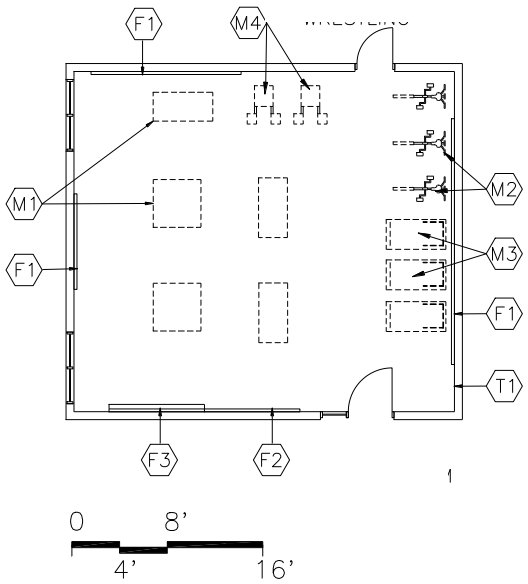
Miscellaneous Equipment:
M1 Refrigerator
M2 Microwave
M3 Ice machine
M4 Computer /register

Room Technology:
T1 Data port
T2 Voice port and phone

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Physical Education Space

FITNESS/ WEIGHT ROOM



QUANTITY:
- 1

CAPACITY:
- 28 Students
- 1 Teachers

SIZE:
- 2,400 SF

SPATIAL RELATIONSHIPS:
- Must be able to isolate the Fitness Room from the rest of the school after hours

GOAL:
- To serve as a physical education teaching area and a wellness/workout area for students and community members.

PROGRAM ACTIVITIES:
- Community and staff members learning to develop and maintain health and fitness
- Physical education classes learning to develop muscular, respiratory, and cardiovascular systems

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Electrical outlets for equipment
- Flexibility of space
- Windows to provide natural light

Built-in Fixtures:
F1 Mirrors
F2 Tack board (8 LF)
F3 Marker board (8 LF) with electric outlet
- Ceiling fans

Room Technology:
T1 Voice port and phone
Wireless capability

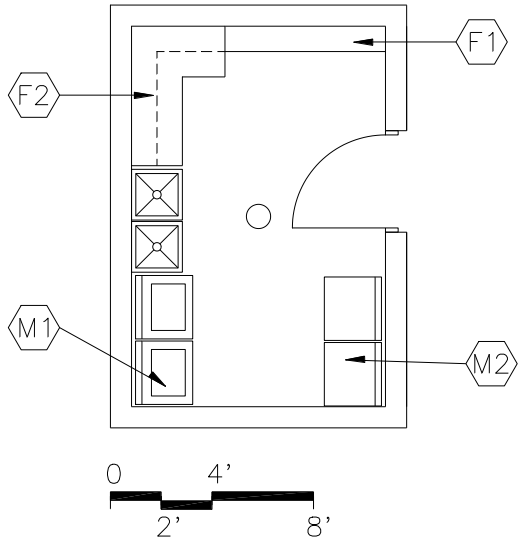
Miscellaneous:
M1 Exercise equipment TBD
M2-3 Aerobic Equipment TBD

Finishes:
Flooring:
- Resilient athletic flooring

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Physical Education Space

LAUNDRY



QUANTITY:
- 1

CAPACITY:
- 1-2 Teachers

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Near PE Locker Room/Showers
- Near Athletic Lockers

GOAL:
- To provide space to wash/dry athletic/PE garments, towels, etc.

PROGRAM ACTIVITY:
- Washing and drying clothes

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Cleanable building surfaces
- Electrical outlets for equipment

Built-in Fixtures:
F1 Rust-resistant 12" deep shelving
F2 Casework: Base/wall cabinets and shelving

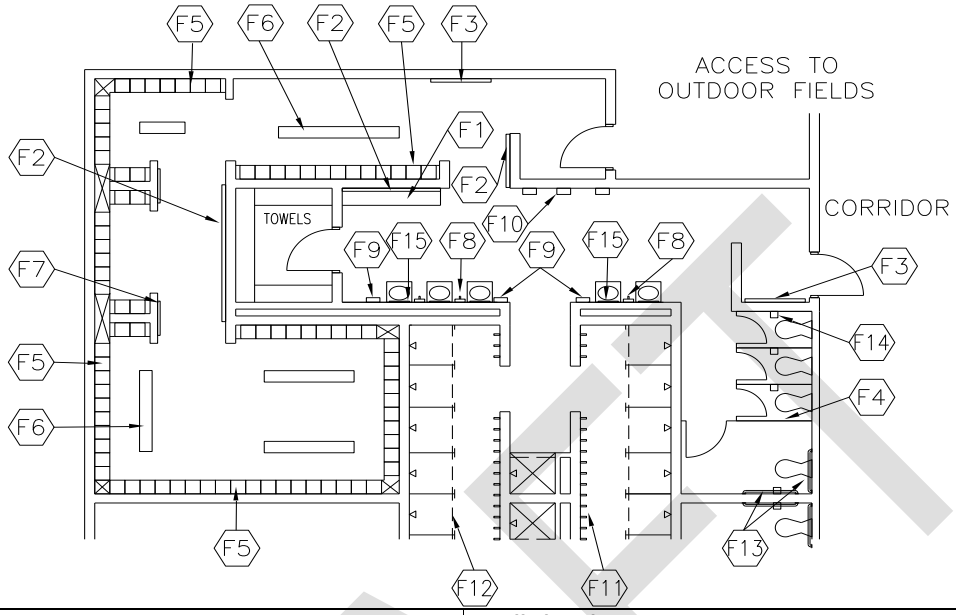
Miscellaneous Equipment:
M1 Heavy Duty washers (1)
M2 Heavy Duty dryers (1)
Ice machine

Plumbing:
- Plumbing connections
  Sinks, utility
  Floor drains

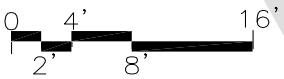
HVAC:
- Washer and dryer connections

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

LOCKER ROOM/SHOWERS (PE)



QUANTITY:
- 2



CAPACITY:
- 40 Students
- 1 Teachers

SIZE:
- 1,700 SF
- 100 SF gender neutral locker (toilet stall and 2 lockers)

GOAL:
- To provide a safe and clean area for students to change and store clothes.

PROGRAM ACTIVITIES:
- Change clothing
- Showering
- Clothing storage

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Cleanable building surfaces
- Humidity and temperature controls
- Locate lockers on wall outside of toilet shower room
- Minimize isolated areas.
- Towel storage in adjacent area

Built-in Fixtures:

F1	Narrow counter
F2	Mirrors
F3	Tack board (8 LF)
F4	Toilet partitions
F6	Benches
F7	24" x 60" mirror
F8	Soap dispenser
F9	Towel dispenser
F10	Hand / hairdryers
F11	Towel hooks
F12	Shower curtain and rod
F13	36" and 42" grab bars
F14	Toilet tissue holders
F15	16" x 24" mirror
F5	300 lockers at each area (boy's and girl's) approximately 12"W x 12"H x 16"D in size with a combination lock for each locker. Fasten lockers to floor or wall, approximately, 6" to 8" above floor. Install benches in front of lockers, approximately, 30" away from lockers. Supervision should be possible from one central location.

NOTES: Features shown represent one of many possible arrangements.

Physical Education Space

LOCKER ROOM (ATHLETIC TEAM)

QUANTITY:
- 2

CAPACITY:
- 25 Students
- 1 Teacher

SIZE:
- 800 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Gymnasium
- Access to PE Locker Room Showers without going through the PE locker area
- Near outdoor fields
- Provide separation between PE and Athletic locker rooms to accommodate up to four teams

GOAL:
- To provide a safe and clean area for students to change, store clothes, and shower for home and visiting athletic teams and others as appropriate

PROGRAM ACTIVITIES:
- Change clothing
- Showering (shared with PE locker area
- Clothing storage

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Cleanable building surfaces
- Humidity and temperature controls
- Locate lockers on wall in vestibule outside of toilet/shower room
- Minimize isolated areas.
- Towel storage in adjacent area

Built-in Fixtures:
- Mirrors
- Tack board (8 LF)
- Security mirrors as required for visibility in blind spots
- Athletic lockers: 40 lockers at each area (boy's and girl's) approximately 12"W x 36"H x 16"D in size with a combination lock for each locker. Additional 30 football lockers in boy's locker room. Fasten lockers to floor or wall, approximately, 6" to 8" above floor. Install benches in front of lockers, approximately, 30" away from lockers.

NOTES: Features shown represent one of many possible arrangements.

Physical Education Space

OFFICES (DEPARTMENT/ ATHLETIC)

QUANTITY:
- 3

CAPACITY:
- 1-2 Teachers
- Athletic Director

SIZE:
- 150 SF

SPATIAL RELATIONSHIP:
- Near Locker Rooms/Showers
- PE offices have window and door into the locker room

GOAL:
- To provide a work area for physical education teachers and athletic director to conduct administrative duties

PROGRAM ACTIVITIES:
- Maintaining records
- Meeting
- Ordering
- Planning
- Scheduling

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Uniform lighting
- Secure locks on office door; 'no break' windows

Built-in Fixtures:
F1 Tack board (4 LF)

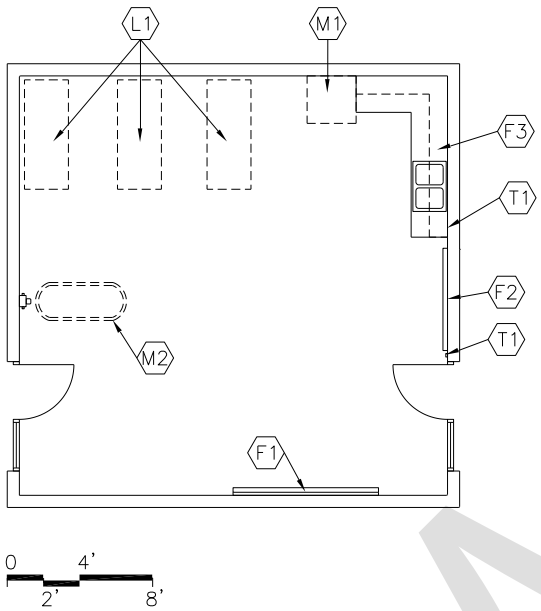
Loose Furnishings:
L1 Teacher's desk
L2 Ergonomic task chair
L3 Computer workstation
L4 4-drawer file cabinet
L5 Adjustable height bookshelves (12 LF)
L6 Guest chairs
Blinds on window
- Teachers' Mobile Cart for Technology

Room Technology:
- See standard office technology

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Physical Education Space

TRAINING ROOM



QUANTITY:
- 1

CAPACITY:
- 2 Students
- 1 Teacher/trainer

SIZE:
- 300 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Gymnasium
- Near Athletic Lockers
- Near PE Locker Room/Showers

GOAL:
- To provide a place for treatment of injuries

PROGRAM ACTIVITIES:
- Minor rehabilitation
- Taping of joints

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Electrical outlets for equipment
- Flexibility of space

Built-in Fixtures:
F1 Marker board (8 LF)
F2 Tack board (8 LF)
F3 Casework: Base/wall cabinets, Sink

Loose Furnishings:
L1 2 Taping/massage tables
Trainer's workstation with chair and file cabinet

M1 Refrigerator with ice machine
M2 Whirlpool

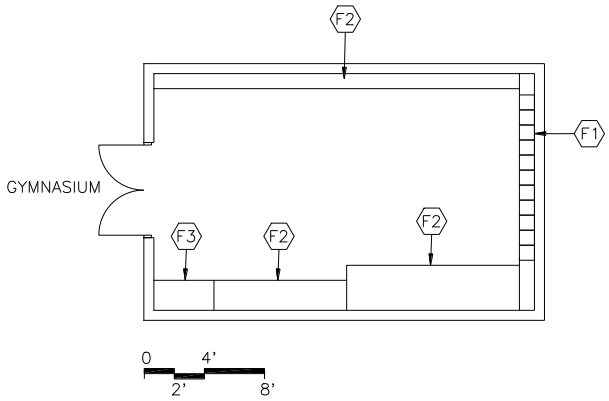
Plumbing:
Plumbing connection
Sink
Ice machine

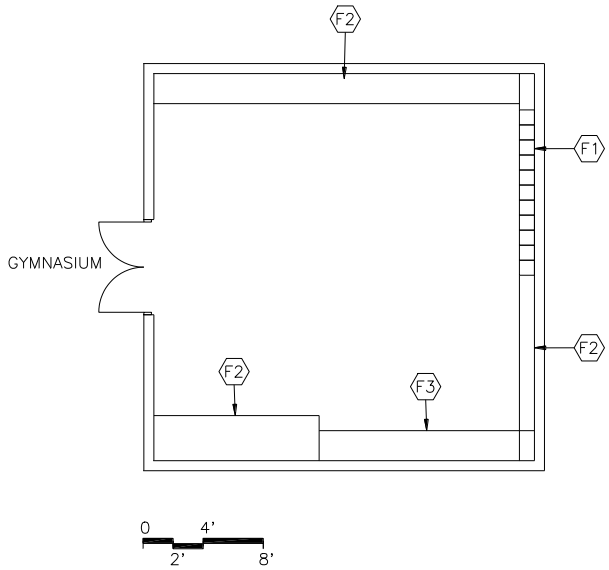
T1 Voice and data port

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Physical Education Space

STORAGE





QUANTITY:
- 4

SIZE:
- Varies (1,600 SF total)

SPATIAL RELATIONSHIPS:
- Adjacent and access to Gymnasium
- Near PE areas

GOAL:
- To provide space to adequately store PE and athletic equipment (PE and athletic equipment needs to be stored separately)

PROGRAM ACTIVITIES:
- Storage for equipment
- Storing sound system and other equipment in the physical education/athletic area

ENVIRONMENTAL CONSIDERATIONS:
- Climate control to dry uniforms and other equipment which get wet during use
- Separate storage areas for inactive sports, physical education, and athletics
- Uniform lighting
- Open space
- Provide secure storage
- Flexibility of storage use
- Uniform lighting

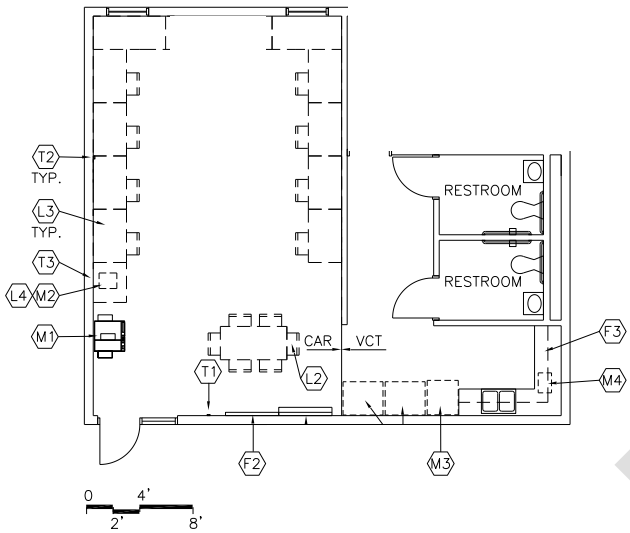
Built-In Fixtures:

Varies: Peg boards, shelving, cabinets

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Physical Education Space

WORKROOM (Staff/ Coaches)



QUANTITY:
- 2

CAPACITY:
- Coaches
- Teachers

SIZE:
- 250 SF

SPATIAL RELATIONSHIPS:
- Contains restrooms, kitchenette, shared workstations and conference space
- Near PE spaces

GOAL:
- To provide space for teachers and coaches to carry out their administrative duties, prepare materials for class, access the Internet, lock up personal items, and to socialize and relax

PROGRAM ACTIVITIES:
- Contact community resources via telephone and e-mail
- Enter and access data
- Grade papers
- Prepare lessons using computer, video, and other resources

Store files (floating teachers or shared department files)

Built-in Fixtures:
F1 Marker board (8 LF)
F2 Tack board (8 LF)
F3 Casework: Base/wall cabinets

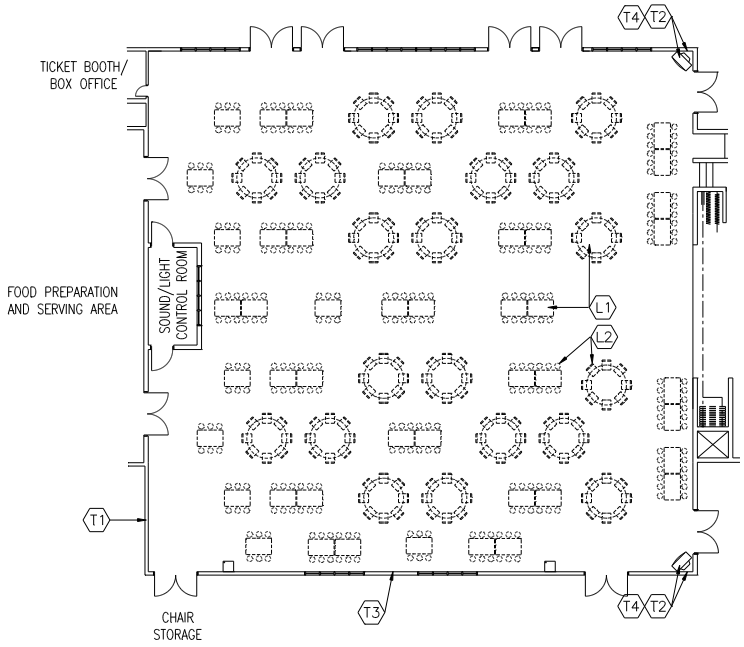
Loose Furnishings:
L2 Worktable
L3 8 individual workstations (coaches)
L4 Printer table
- 8 under the desk file cabinets

Miscellaneous Equipment (owner provided):
M1 Copier
M2 Printer
M3 Refrigerator with icemaker
M4 Microwave
Vending machines (optional)

Room Technology:
T2-3 Voice and data for each workstation and the printer

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Student Dining & Food Service Space Requirements



CAFETERIA / COMMONS

CAPACITY:
- Community – primarily after school hours
- Number of students per lunch to be 800

SIZE:
- 13,000 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Kitchen
- Centrally located to Administration, Gymnasium, Main Academic areas
- Near parking and main entry to building

GOALS:
- To provide a flexible meeting space for groups if needed
- To provide a pleasant atmosphere for students to eat meals

Loose Furnishings:
L1/2 Foldable Tables with attached seating (variety of shapes and heights) Consider some high top and bench seating
- Portable sound system
- Waste receptacles with lids
- Recycling bins

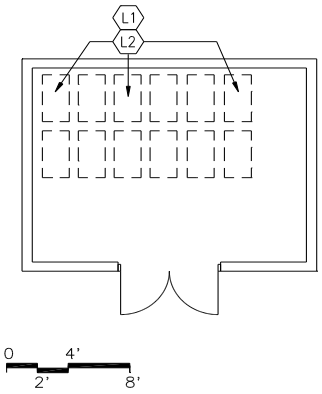
ENVIRONMENTAL CONSIDERATIONS:
- Adjust space and materials to manage acoustics; provide sound system
- Adjustable lighting
- Cleanable building surfaces
- Good sight lines to all areas of the room for supervision
- Identify 2 locations for presentations for up to 100 people (screen and electricity, barrier-free)
- Proportion ceiling to volume
- Window treatment to darken room for AV presentations.
- Windows to provide ample natural light
- Consider options to partition room for smaller settings

Room Technology:
T1 1 voice port and phone
T2 2 video ports, large screen monitors, and brackets
T3 1 data port
T4 2 cable/ MATV ports (TBD)
T5 Microphone jacks

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Student Dining/ Food Svcs Space

CHAIR/ TABLE STORAGE



ENVIRONMENTAL CONSIDERATIONS:
- Accessibility for moving furniture in and out
- Cleanable building surfaces
- Uniform lighting

Loose Furnishings:
L1 200 Stackable Chairs
L2 Chair dollies per above count

QUANTITY:
- 1

CAPACITY:
- 400 Chairs

SIZE:
- 350 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Student Dining Area/Multipurpose

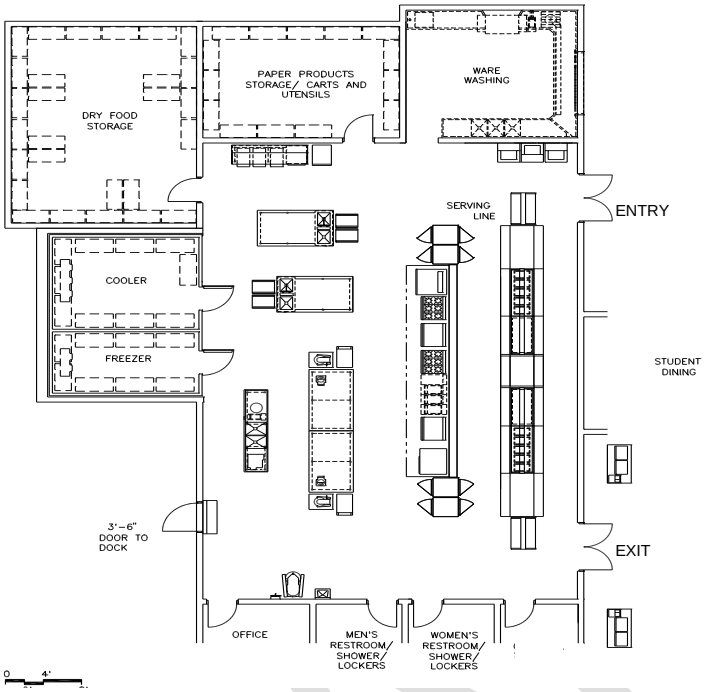
GOAL:
- To provide convenient storage of dining chairs and tables to be used for meetings and performances

PROGRAM ACTIVITY:
- Storage

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Student Dining/ Food Svcs Space

KITCHEN



QUANTITY:
- 1

CAPACITY:
- Up to 14 People

SIZE:
- 2,650 SF

GOAL:
- To prepare and serve student meals

PROGRAM ACTIVITIES:
- Preparing and serving food to students and staff
- Storage

SPATIAL RELATIONSHIPS:
- Adjacent and access to Cafeteria/Commons
- Adjacent and access to Outdoor Loading Dock

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Beginning of serving line should be located near entry door of Cafeteria/Commons
- Cleanable building surfaces
- Food service department, public health, code requirements, as applicable
- Queuing for serving should not conflict with tray return to dishwashing area.
- Uniform lighting

Room Technology:
- 1 voice port and phone
- 2 data ports at cash registers

NOTES: This is an example of a kitchen. Food service equipment will vary from school to school; confirm requirements with PGCPS Food Service Department.

Student Dining/ Food Svcs Space

KITCHEN (continued)

Features (Specifications from PGCPS):

Built-in Fixtures:

- Hand Sink (5)
- Soap & Towel Dispenser (5)
- Walk in Cooler/Freezer
- Cooler Refrigeration System
- Freezer Refrigeration System
- Prep Sink
- Floor Trough
- Tilting Skillet 30-Gallon
- Comb Oven (2)
- Convection Oven – double stack (2)
- Counters for serving with Cashier's Stand (3)
- Pot Washing Sink
- Sterilizer dispensers outside of kitchen lavatories, outside of kitchen office door, next to each kitchen hand sink, and at all entry and exit points into and out of the kitchen

Loose Furnishings Required for Kitchen:

- Utility carts mobile (3)
- Dunnage Rack (3)
- Mobile shelving (14)
- Can Rack (2)
- Worktables (6)
- Reach In refrigerator (2)
- Pass thru refrigerator, mobile (3)
- Pass thru heated cabinet, mobile (3)
- Milk cooler, mobile (3)
- Refrigerated display (3)
- Condiment Counter, mobile (2)
- Pot and Pan shelving, mobile (2)
- Railings for service lines (3)
- Bun Racks (4)

Note: Model and vendor will be reviewed with kitchen consultant

Plumbing:

- Connections to food service equipment
- Floor drains
- Hand washing lavatory
- Plumbing and gas connections

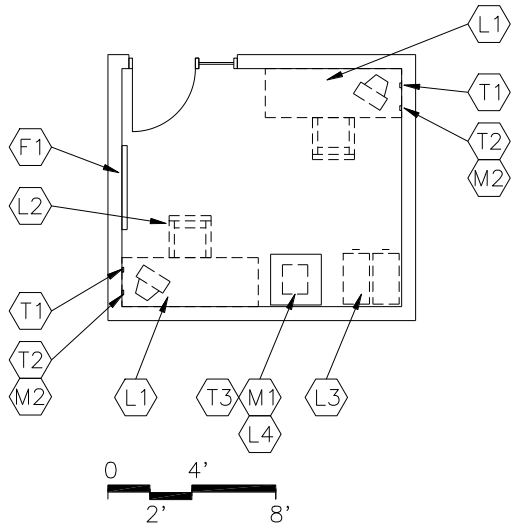
HVAC:

- Air conditioning
- Independent temperature control
- Kitchen canopy exhaust system
- Supply/return air system

NOTES:

Student Dining/ Food Svcs Space

OFFICE



QUANTITY:
- 1

CAPACITY:
- Up to 2 people

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Adjacent and visual to Kitchen or Receiving area

GOAL:
- To provide an office for the staff to perform clerical functions

PROGRAM ACTIVITIES:
- Computer input
- Conferences with staff and other visitors
- Paperwork
- Planning
- Telephone calls

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  - Wall minimum: STC 45
  - Ceiling minimum: CAC 35
- Uniform Lighting

Built-in Fixtures:
F1 Tack board

Loose Furnishings:
L1 1-2 desks
L2 1-2 ergonomic task chairs
L3 2 4-drawer file cabinets
L4 Printer table
- Guest chair

Room Technology:
T1 Voice port and phone near workstation
T2 Data port near workstation
T3 Data port for printer

Miscellaneous Equipment (provided by owner):
M1 Printer
M2 Computer

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Student Dining/ Food Svcs Space

SERVING AREA

QUANTITY:
- 1

SIZE:
- 1,600 SF

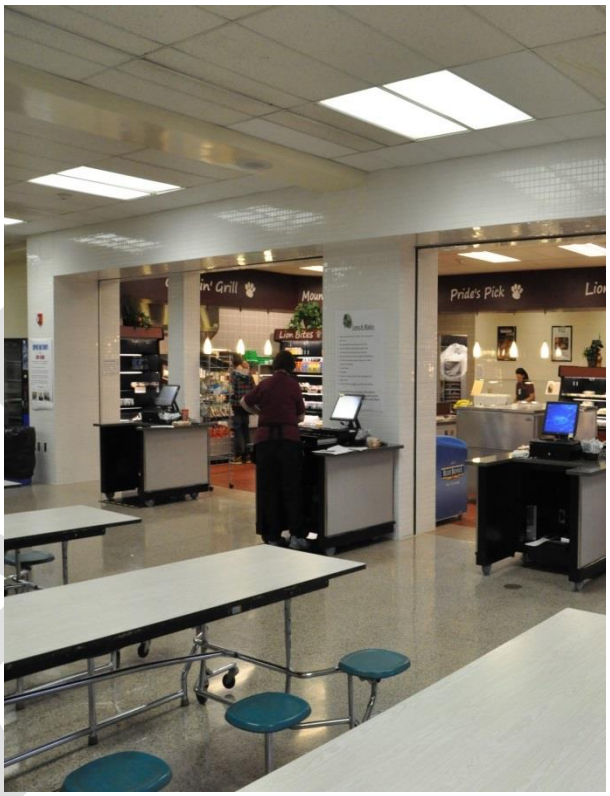
GOAL:
- To provide space and equipment to serve student meals

PROGRAM ACTIVITIES:
- Serve food

SPATIAL RELATIONSHIPS:
- Adjacent and access to the Kitchen
- Adjacent and access to the Cafeteria/ Commons

DESIGN GUIDE:
- Four 'food court' serving lines: TBD

Sample Lines and equipment needs below:



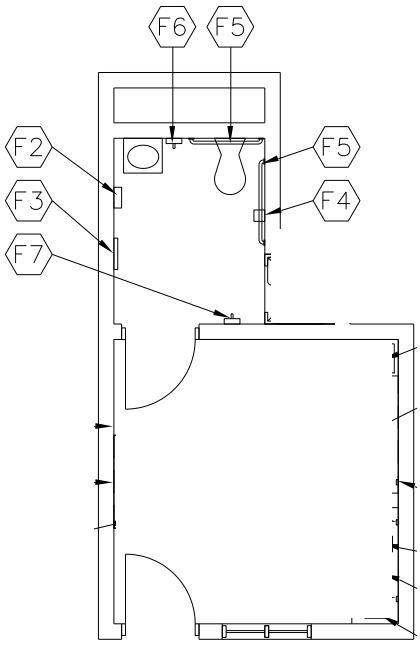
- Additional satellite services may be able to provide a salad bar or pre-made items

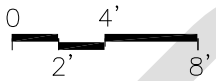
Built-in Fixtures:
- See PGCPS food services staff

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Student Dining/ Food Svcs Space

TOILET/ LOCKER AREA





QUANTITY:
- 2

CAPACITY:
- Kitchen Staff: Separate Male and Female rooms

SIZE:
- 125 SF

SPATIAL RELATIONSHIP:
- Adjacent to Kitchen/ Serving Area

GOAL:
- To provide an area for kitchen staff to change and clean-up before and after work.

PROGRAM ACTIVITIES:
- Changing
- Resting

Built-in Fixtures:
F2 Towel dispenser
F3 24" x 60" mirror
F4 Toilet tissue holder
F5 36" and 42" grab bars
F6 Soap dispenser
F7 Towel rack

Loose Furnishings:
- Benches and lockable lockers

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Visual Arts Space

Visual Arts Space Specifications
MULTI-PURPOSE STUDIO (2D/ 3D)

CAPACITY:
- 32 Students
- 1 Staff member

SIZE:
- 1,400 SF

ANCILLARY SPACES:
- Storage

GOAL:
- To provide a learning environment where students can learn two dimensional art and create their own art pieces

PROGRAM ACTIVITIES:
- Art history and culture
- Computer graphics and internet access
- Cooperative group work
- Drawing/Painting
- Viewing of slides/ DVDs/ CD-Roms

Plumbing Features:
- Plumbing connections

Sink with hot and cold water, one island to hold four sinks, (54" x 54") overall dimensions, each sink cabinet bases with two sink bowls. Each sink bowl should be ten (10") deep x thirty-two (32") across and sixteen (16") wide with one faucet, each having a hot and cold water faucet. Storage with shelves below sinks in cabinets. Sink cabinet should a minimum of 2-drawers on each side. Clay and plaster traps should be included in the sinks.

ENVIRONMENTAL CONSIDERATIONS:
- Adjustable full-spectrum lighting/Track lighting for display wall
- Double width doors (with removable mullion) to allow for moving of large equipment and projects.
- Windows to provide natural light and egress
- Electrical outlets for equipment
- Window treatment to darken room for AV presentations

Built-in Fixture
- Marker board (16 LF)
- Tack board (12-24 LF)
- Tack strip on all walls at two heights (or trackable surface)
- Casework: Base/wall cabinets and shelving
- Paper storage
- Vertical files (30" x 40" work)
- Towel and soap dispenser

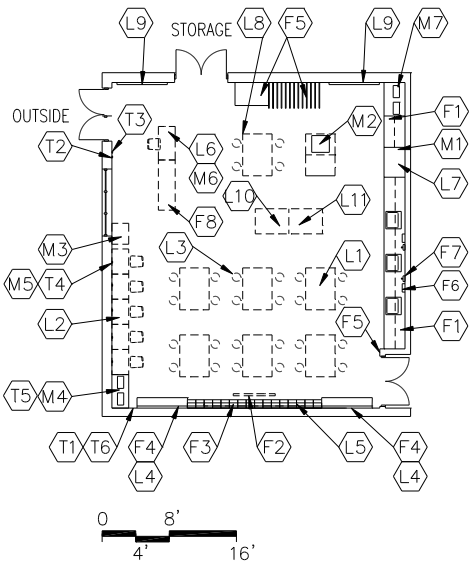
Loose Furnishings:
- 7 worktables (seat 4)
- 4 Computer workstations (MACs)
- 28 stools
- Adjustable height bookshelves (24 LF)
- Project storage lockers (60 lockers for 3D and 2D)
- Teacher desk and chair
- Cabinets w/ drying racks
- Movable art display panels
- Light table
- Extra worktable

Miscellaneous (owner provided):
M1 Owner provided

Room Technology:
See regular academic classroom

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

3-D STUDIO



CAPACITY:
- 32 Students
- Teacher

SIZE:
- 1,600 SF

ANCILLARY SPACES:
- Kiln Room
- Storage

GOAL:
- To provide a learning environment where students can learn about three dimensional art and create their own art pieces

PROGRAM ACTIVITIES:
- 3-D construction
- Architectural modeling
- Ceramics
- Creation of interactive displays
- Fiber
- Metal working
- Sculpture

ENVIRONMENTAL CONSIDERATIONS:
- Acid/heat resistant counter tops
- Adjustable full-spectrum lighting
- Double width doors (with removable mullion) to allow for moving of large equipment and projects
- Electrical outlets for equipment
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress

Built-in Fixtures:
F1 Casework: Base/wall cabinets and shelving (lockable)
F2 Tack board (12 LF)
F3 Marker board/Chalk board (12 LF)
F4 Manual projection screen
F5 Casework: Clay bin storage
F6 Towel dispenser
F7 Soap dispenser

Loose Furnishings:
L1 8 work tables
L2 24 stools
L3 Project storage lockers (10" x 15" x 20")
L4 Damp box (ceramics)
L7 Teacher desk and chair
L8 Work tables
L9 Adjustable height bookshelves (24 LF)
L10 Mobile storage (art carts)
- Damp cabinets (7) – see staff for existing equipment list

Miscellaneous (owner provided):
M2 6 potter's wheels (ceramic rm only)
M6 Printer
M8 1 computer for teacher use

Room Technology:
See regular academic classroom

Plumbing:
- Compressed air
- Floor drains with sediment traps
- Four large sinks with solids interceptor
- Natural gas connections (optional)
- Plumbing connections

NOTES: All drawings are for illustration only. Tags not noted in the text are not required elements.

Visual Arts Space

~~PHOTOGRAPHY/~~ GRAPHIC ARTS STUDIO

QUANTITY:
- 1

CAPACITY:
- 30 Students
- 1 Staff member

SIZE:
- 1400 SF

ANCILLARY SPACES:
- Storage

GOALS:
- To provide students with the technology and space for computer and photographic art

PROGRAM ACTIVITIES:
- Computerized instruction
- Hands-on activities
- Large and small group instruction/Oral presentation
- Team teaching

Dark Room (TBD):
- 150 SF
- 3 enlarger stations each 40" wide and 28" deep and 38" high; shelves below and electrical supply along the wall
- An eye wash station with a floor drain
- Counter space for paper cutter (dry area)
- Dedicated ventilation.
- Floor shall be sealed concrete.
- Stainless steel sink (28"X7" deep) with storage (some slotted) below

Plumbing:
- Plumbing connections
- Sink

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Provide treatment to darken room for AV presentations

Built-in Fixtures:
- Casework: Tall lockable cabinets
- Tack board (32 LF)
- White board (12 LF)

Loose Furnishings:
- 2, 4-drawer file cabinet
- 3 Work tables
- 30 computer workstations
- 30 student swivel chairs
- Adjustable height bookshelves (24 LF)
- Printer table
- Scanner table
- Teacher chair and desk

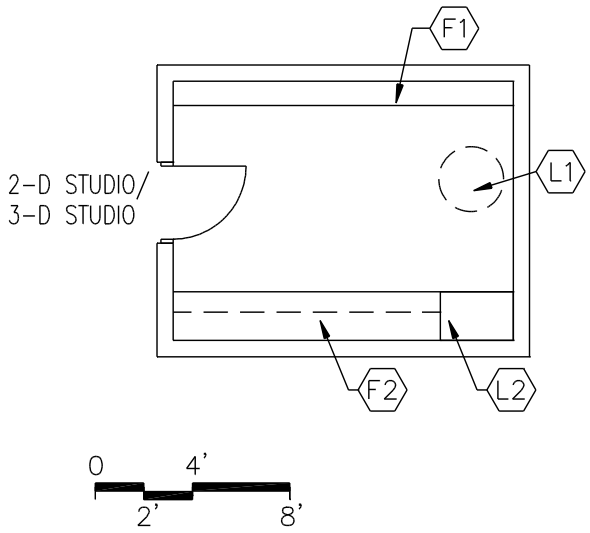
Miscellaneous Equipment (provided by owner)
- 30 Large monitor computers
- Color and B&W printer
- Computer for teacher use
- Interactive white board
- Large format scanner
- Plotter

Room Technology:
- 30 data ports
- Data port near teacher workstation
- Interactive white board
- Voice port and phone

See regular academic classroom technology:

NOTES:

KILN ROOM



QUANTITY:
- 1

CAPACITY:
- 2 Students
- 1 Staff member

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to 3-D Studio

GOAL:
- To provide a space to fire and temporarily store completed clay work and clay bins

PROGRAM ACTIVITIES:
- Firing the kiln
- Storing ceramics work

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Electrical outlets for equipment (208 voltage) for up to three kilns

Built-in Fixtures:
F1 Storage shelving (12" deep)
F2 Casework: Base cabinets and wall shelving

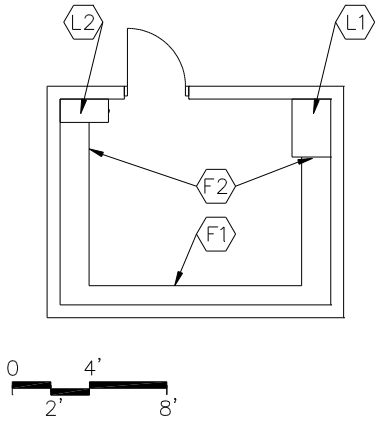
Loose Furnishings:
L1 Kiln (up to three kilns)
L2 Greenware shelving
- Fire extinguisher

HVAC:
- Temperature controlled exhaust
- Ventilation for kiln outside
- Hooded exhaust for glazing

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Visual Arts Space

STORAGE



ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust

Built-in Fixtures:
F1/2 Shelving, thirty inches (30") deep on three sides, with countertop adjustable shelving
F1 Storage shelving (12" deep)
F2 Storage shelving (18" deep)

Loose Furnishings:
L1/2 Lockable base cabinets / wall cabinets
Built-in cabinets above counters
Electrical outlets
L1 Greenware Shelving
L2 Four-drawer file cabinet (legal)

QUANTITY:
- 5

SIZE:
- Varies (800 SF total)

SPATIAL RELATIONSHIPS:
- Adjacent and access to each studio

GOAL:
- To provide secure and adequate space to store art supplies, portable equipment, technology peripherals, and materials

PROGRAM ACTIVITIES:
- Storage of equipment, supplies, and projects

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Athletic Fields Space Specifications

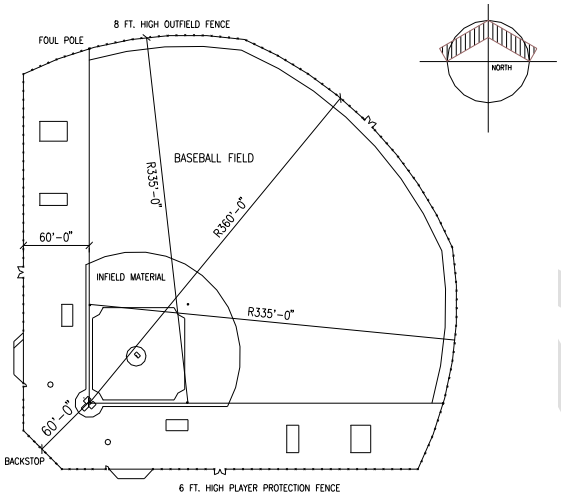
ATHLETIC FIELDS

Provide 6 to 8 lane running track with center soccer/football field; field events; bleacher seating for 400, 3 basketball and 4 tennis courts as a minimum.

Provide grading of fields with 1 percent to 1-1/2 percent slope.

BASEBALL FIELD

Verify radius required based on program use of field. Estimate of area needed is based on 360 feet radius to center field and 335 feet to right and left outfield. See below Figure.



Provide infield area in compliance with High School Athletic Association guidelines. See adjacent Figure.

Provide a 24-foot high backstop a minimum of 60 feet from home plate.

Provide a player protection fence that is 6-foot high chain link fence offset 60 feet from first and third base lines.

Consider outfield fencing 8-foot high chain link fence with foul poles and top rail protective pad between foul lines for competition fields.

Provide for player benches, set back from side fence line.

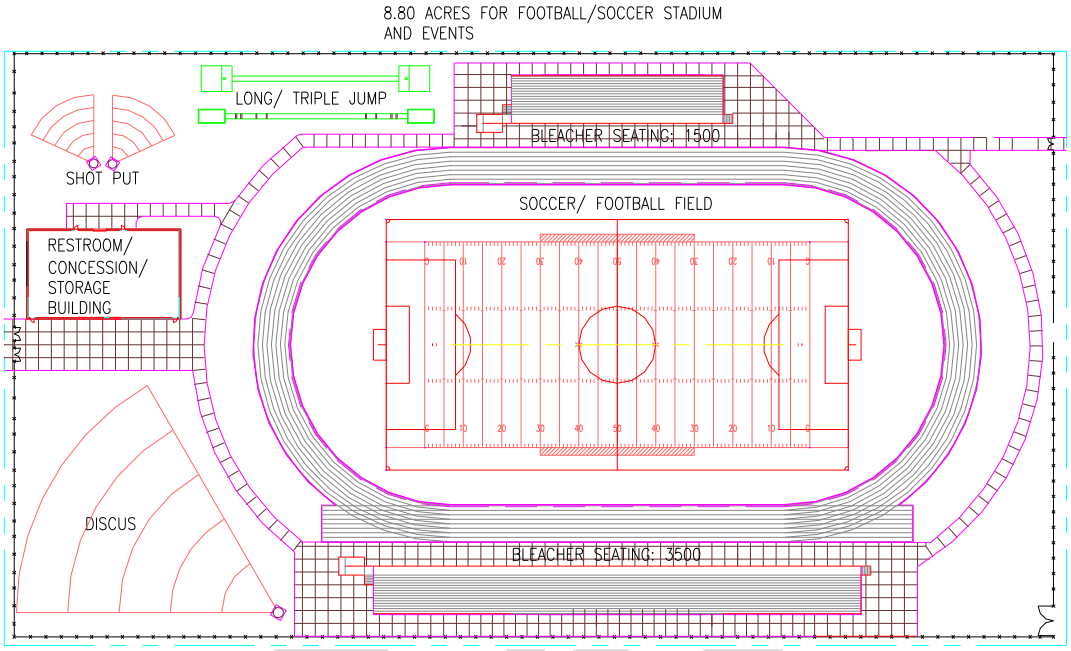
Provide secure storage (under bleachers if provided.)

Provide bleacher seating on home and visitor sides for competition fields only.

Athletics

FOOTBALL/SOCCER FIELD w/ running track

Provide 8 foot high chain link fence around perimeter of stadium area with controlled entrance/ exit. Locate gates for emergency access and maintenance.



Provide field events that include high jump long/triple jump, discus, shot-put and pole vault.

Running Track

Provide 6- or 8-lane, 400-meter running track around football field in accordance with NCAA standards. See adjacent Figure.

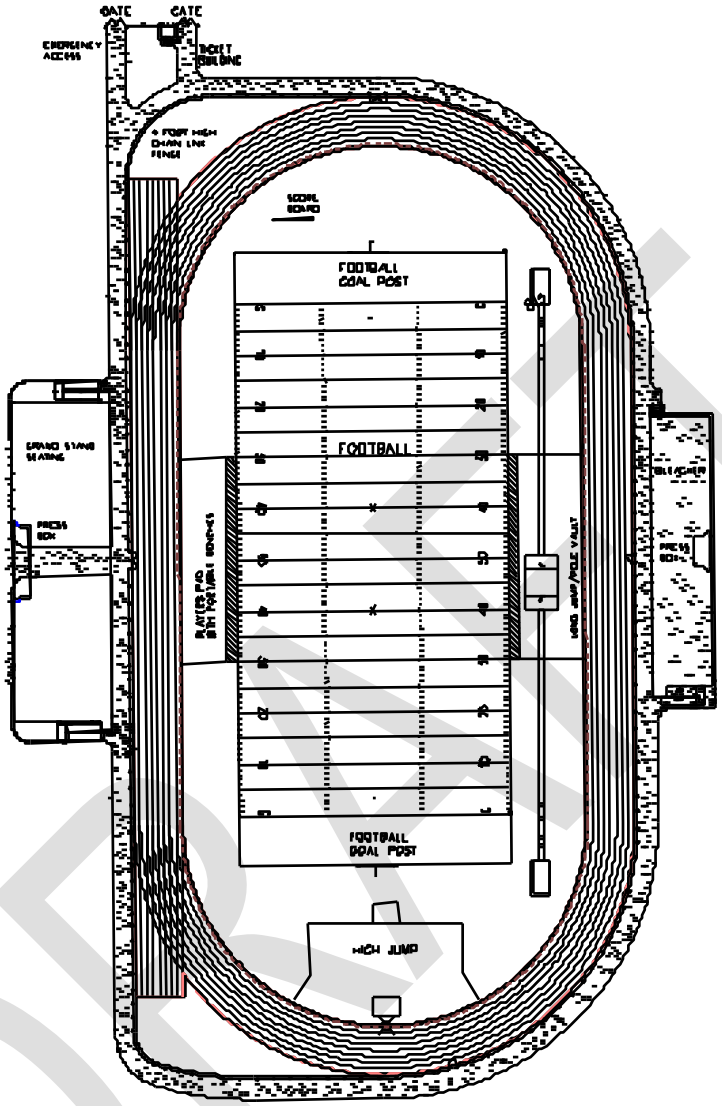
Design track radius to allow for a soccer or football field inside the track with player benches.

Include track equipment storage under bleachers – drive-in if feasible.

Provide a 4-foot high chain link perimeter fence surrounding track with gates at center field and as needed for maintenance.

Locate restroom/concession/storage building at one end of track for accessibility to visitor and home bleachers.

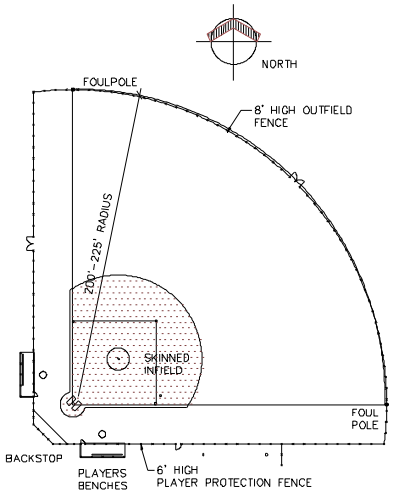
Athletics



Athletics

SOFTBALL FIELD

Provide softball field radius of 225 feet to 275 feet. See below Figure.



Provide infield area in compliance with the High School Athletic Association guidelines. See adjacent Figure.

Provide a backstop having a 17-foot 6-inch overhang height; and a 10-foot high by 20-foot wide back panel with 10-foot wide side panels. Locate backstop a minimum of 25 feet and a maximum of 30 feet behind home plate.

Provide 6-foot high chain link player protection fence.

Consider 8-foot high chain link outfield fencing, foul poles, and top rail protective pad for competition fields.

Provide player benches, set back from side fence line.

Provide bleacher seating on home and visitor sides for competition fields only.

Provide secure storage (under bleachers if provided.)

ATHLETIC STADIUM SUPPORT FACILITIES

These areas shall be located centrally to all competitive athletic fields. Locate the ticket booth so that it creates a main gate area for the public attending outdoor competitive sporting events.

~~1)~~ Restrooms ~~(Home side: 2 @ 300 SF; Away side: 2 @ 300 SF if needed)~~

- Restrooms (Male & Female) shall have steel, securable entrance doors.
- Ceilings shall be hard – no lay-in ceiling.
- Restroom partitions and fixtures shall be durable
- Forced ventilation shall be provided in restrooms.
- The restroom area floor surface shall be non-slip epoxy resin sloped to a floor drain. Note: Maintenance of the floor will include mopping so that the texture of the epoxy resin cannot be excessively rough.
- The restroom walls shall be block with epoxy paint.

2) Ticket Booth (60 SF)

- This will be an unsecured building when not in use.
- The utility closet floor shall be sealed concrete.

3) Concessions Stand (600 SF)

- This building will be centrally located with window facing the home and visitors' sides.
- The concession stand shall include serving windows and counters to accommodate up to 4 lines of customers.
- The concession stand shall be equipped with plumbing and electrical outlets for popcorn poppers, coffee makers, microwaves, ice machine, etc.
- The concessions stand floor shall be sealed concrete.

4) Storage (500-1,000 SF)

- Floor shall be sealed concrete.
- Include shelving for storage of small equipment
- Install an overhead door plus a steel personnel door.
- Provide electrical outlets for lighting.
- Provide room with sufficient ventilation.

7) Stadium Press Box (600 SF)

- This building shall be located on the home side at the football/soccer/track stadium.
- The press box shall be a minimum of 600 SF.
- The press box shall be totally enclosed with sufficient glazing to provide an unobstructed view of the entire tack and playing field area.
- The front windows of the press box shall be operable.
- A high desk counter shall be provided under the front press box windows.
- The press box shall be heated and air-conditioned.
- A P/A sound system shall be provided.
- An upper deck with safety railing on all sides shall be provided on the roof of the press box. Access to the upper deck shall be by stairs from inside the press box.
- Provide electrical power on press box upper deck for video recording equipment.
- Provide electrical wiring and control connections from the press box to the scoreboard location.

Career and Technical Education (CTE) Lab Space Requirements

Background

There is ample research to suggest that there is a need for workers in the career and technology fields. There is also strong support in the academic reform community that a high school program with a vigorous STEM program engages and prepares students better for a future in college or employment. The vision for the PGCPS high school CTE Hubs is 1) cutting edge technology preparing students for a future that is automated and innovative, 2) preparing students in a real world setting that allows them to move confidently into the work world, and 3) more integrated with the core academic program and the arts as part of a comprehensive school STEM focused program.

The attached educational specification is a basic description of flexible spaces and should be adequate for the next steps. However, to complete the design may require that PGCPS and the architect understand the processes and skills that will be needed in the future, and this may require meeting with work-world partners.

Capacity and Space Summary

	# of Rooms	Total Square Feet
Construction and Development	7	26,020
Transportation Technologies	2	12,520
Barbering and Cosmetology	3	9,360
Business and Finance	3	3,950
Early Childhood Education	1	2,300
Culinary Arts	1	4,290
Health and Biosciences	3	7,740
Information Technology (Cisco)	1	1,950
Arts, Media, and Communication	1	1,400
Manufacturing, Engineering and Technology	3	8,700
Teacher Academy*	1	1,000
Total	**26**	**79,230**

* The classroom for the Teacher Academy will be outfitted similar to a regular comprehensive classroom.

Construction and Development

The Construction and Development cluster focuses on providing broad transferable skills in all aspects of designing and erecting buildings and other physical structures. In addition to the construction trades, students will learn about management, finance, technical and production skills, labor issues, health and safety regulations, and environmental issues as they relate to the construction trades.

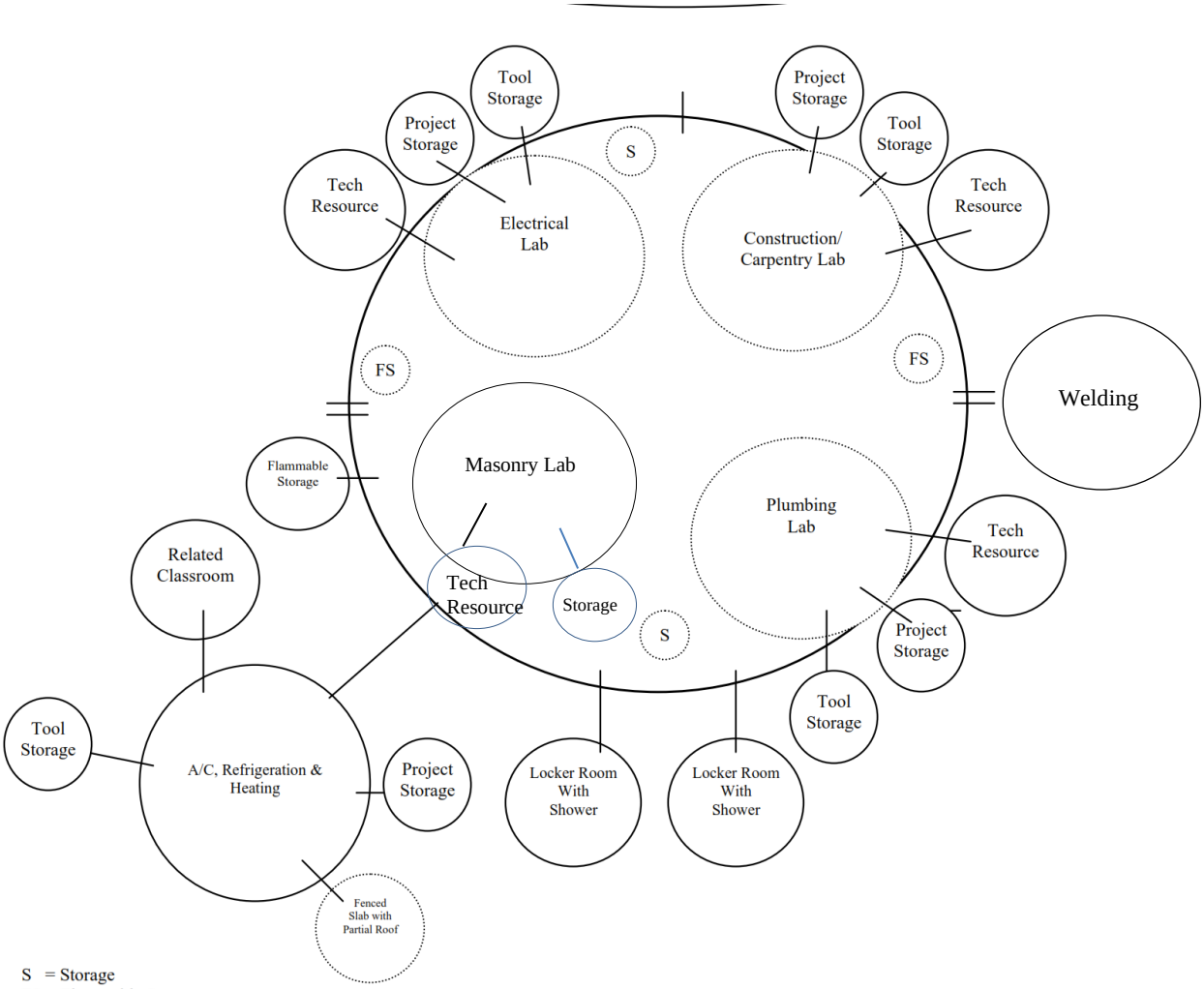
Programs of Study

a. **Carpentry/Electrical/Masonry/Plumbing/HVAC/Welding**
Students enrolled in this program will learn about the construction industry while working within these specialties. Students will learn skills such as how to install piping and plumbing fixtures, wiring a building for electricity and building and maintaining a home through wood working skills. Students will gain on-the-job experience through participating in construction of a student-built house.

B. **Construction Design and Management**
The architecture design and management will allow students to explore the practice of architecture. Students will learn computer assisted drafting (CAD) and how it applies to architectural drawings and model building.

The Architecture and Design area should be flexible to allow for changes to the number and types of programs. All labs must have direct access to the outdoors. Consider connections between labs to encourage collaboration on projects and team teaching.

Construction Trades



Construction Trades Area Space Requirements

Space	Design Guideline			Comments/ Prototype Lab
	Qty.	S.F.	Total	
Department Lockers	2	400/800	1200	Larger locker area for males
Planning/Conference	1	200	200	
Outdoor work areas		varies		Partially covered
Construction Design & Management	1	1,200	1,200	Studio w/ peripheral stations
High Bay labs (all trades)	6	2400-2600	15,000	
Classroom/tech resource	6	650	3,900	
Storage per lab (tool/supplies)	6	600	3,600	
Flammable storage	1	200	200	
Staff offices	6	120	720	
Total			**26,020**	

General Lab requirements

- Labs will have a minimum of 18’ ceilings. Open, industrial ceilings, concrete walls and cement floors are typical.
- Labs will have overhead 10’ X14’ doors to the exterior of the building.
- Windows for natural light is desirable but must be 10’ off the floor in the labs.
- Appropriate dust collection, exhaust and fresh air exchange is needed for all labs and the commons.
- All labs need floor drains and hose bibs and a deep well clean-up sink
- Electrical outlets are needed every 6 ft. and for large specialty equipment (See individual lab requirements). Ceiling electrical (50’) with GFCI attachments required over lab stations – a minimum of four per lab. All shots need at least four pneumatic outlets each.
- A safety station is to be installed, with shower, automatic shut-off eyewash, and drain with a sloped floor, and should accommodate persons with disabilities.
- The shower and eyewash should have a spring loaded mechanism.
- Master cutoff for water and electricity needs to be easily accessible to the teacher only. The emergency cut-off key should be removable in the “on” position.

CARPENTRY LAB

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Classroom
- Tool/material Storage
- Project Storage/lockers

SPATIAL RELATIONSHIPS:
- Adjacent other labs

GOALS:
- Students enrolled in the Carpentry program will learn about the construction industry with a specialty focus on building and maintaining homes through wood-working skills.
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light

Features of lab:
- 2 person workbenches with power outlets and storage locker below.
- One dust collection system.
- Table saw
- Panel saw
- Planer
- Radial arm saw
- Drill press
- Chop saw
- Rock out rack
- Metal master.
- Steel tree cantilever rack
- Vertical bar storage racks
- Five tool racks
- Stainless steel trough sink
- Access to outdoor area
- White erase board (16 FT)
- Two 16’ tack boards should be installed on different walls
- Install goggle storage and sterilization with adequate ventilation.

Plumbing:
- Plumbing connections
- Two sinks w/ clay & plaster traps in all studios

CTE HUB

ELECTRICAL LAB

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Classroom
- Tool/material Storage
- Project Storage/lockers

SPATIAL RELATIONSHIPS:
- Adjacent other labs

GOALS:
- The Electrical program focuses on wiring buildings for electricity
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- Install 240 single phase volt outlets on each wall and at least 2-240 volt 3 phase outlets on opposite walls
- Install 2 Variable Frequency Drive controls mounted to wall.
- Windows to provide natural light

Features of lab:
- 9 foot by 3 foot by 33 inches workbenches with vises, power outlets and horizontal storage lockers.
- Hanging tool racks
- Stationary grinder
- Motor control station
- 240 volt air compressor
- Drill press
- Steel tree cantilever rack
- Vertical bar storage racks
- Sheet metal break
- Sheet metal shear
- Scroll saw
- Squaring shear
- Table saw
- Band saw
- White erase board (16 FT)
- Two 16’ tack boards should be installed on different walls
- Install goggle storage and sterilization with adequate ventilation.

Plumbing:
- Plumbing connections
- Two sinks

HVAC LAB

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Classroom
- Tool/material Storage
- Project Storage/lockers

SPATIAL RELATIONSHIPS:
- Adjacent other labs

GOALS:
- HVAC focuses on the heating, ventilation, and air conditioning systems
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- Install 240 single phase volt outlets on each wall and at least 2-240 volt 3 phase outlets on opposite walls
- Install 2 Variable Frequency Drive controls mounted to wall.
- Windows to provide natural light

Plumbing:
- Plumbing connections
- Sinks

Features of lab:
- 9 foot by 3 foot by 33 inches workbenches with vises, power outlets and horizontal storage lockers.
- Pittsburgh type locking forming machine
- Box and Pan brake
- Foot Shear
- Manual slip roll with cart
- Drill press
- Steel tree cantilever rack
- Vertical bar storage racks
- Roll out rack
- Gas working systems
- R410 AC systems
- Heat pumps with 5K back-up
- Oil furnace working with flue to exterior of school
- Easy edger
- Stationary grinder
- Table top brake and shear
- Hanging tool racks
- Gas fired trainer
- Solid state control trainers
- Basic refrigeration trainer
- Mobile refrigeration system trainer
- Solar photovoltaic trainer
- Heat pump trainer
- Refrigeration trainers
- Air/Hydronic gas/oil
- One stainless steel trough sink with mirror and water fountain
- White erase board (16 FT)
- Two 16’ tack boards should be installed on different walls
- Install goggle storage and sterilization with adequate ventilation.
- Testing stations for control heating and air conditioning are to include: 2 Gas, 2 Oil, 2 Heat Pump and 1 Heat Transfer Unit with vents to the exterior of the school.
- Pittsburgh Lock Former Machine

CTE HUB

MASONRY LAB

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Classroom
- Tool/material Storage
- Project Storage/lockers

SPATIAL RELATIONSHIPS:
- Adjacent other labs

GOALS:
- Masonry focuses on building and maintaining brick, concrete, and stone structures.
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility;
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Provide 110 and 220 volt electric utilities
- Provide a trough drainage system
- Provide hose bibs near mortar mix area. Locate 5 feet above the floor.
- Windows to provide natural light

Features of lab:
- Staging area for mortar pans
- Training mortar bin
- Tall sand storage bin
- Free standing masonry cutting saw
- Wall mounts for various shovels, mortar hoes, squeegees, brooms and scrapers
- Heavy duty steel tree cantilever racks
- Stainless steel trough sink
- Access to outdoor area
- White erase board (16 FT)
- Two 16’ tack boards should be installed on different walls
- Install goggle storage and sterilization with adequate ventilation.

Plumbing:
- Plumbing connections
- Two sinks w/ clay & plaster traps in all studios

PLUMBING LAB

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Classroom
- Tool/material Storage
- Project Storage/lockers

SPATIAL RELATIONSHIPS:
- Adjacent other labs

GOALS:
- Plumbing on installing piping and fixtures for plumbing purposes
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility;
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Provide 110 and 220 volt electric utilities
- Hooded exhaust system for student soldering area
- Provide natural gas access.
- Windows to provide natural light

Features of lab:
- Workbenches with vices, power outlets and lockers
- Cantilever racks
- Tall sand storage bin
- Hose bibs
- Pipe cutting machine
- Wall mounts for tools
- Digital recording monitors
- Display area showing:
  - Tub
  - Shower
  - Bathroom cabinet with sink
  - Kitchen sink with dishwasher and garbage disposal
  - Water heaters
  - Electric and gas vented to exterior of school
  - Water closet
  - water and drain connections for every display
- Stainless steel trough sink with mirror and water fountain.

CTE HUB

CLASSROOMS/TECH RESOURCE

CAPACITY:
- 15-20 students
- 1-2 staff members

SIZE:
- 650 SF

GOAL:
- To provide flexible space to accommodate non-lab learning
- To provide a learning environment that frees teachers and students to customize the classroom daily – different seating set-ups, wireless mobile computing, and various teaching/presentation options.
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.

PROGRAM ACTIVITIES:
- Large group, small group
- Oral presentations
- Computerized instruction
- Team teaching

SPATIAL RELATIONSHIPS:
- Adjacent to lab
- Door to corridor

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting with multi-level switching
- Windows to provide natural light and egress
- Electrical outlets for equipment
- Window treatment to darken room for AV presentations

<u>Fixed Equipment</u>
- Clock (on side walls instead of rear walls)
- 2 Dry, white eraser-board (4’ x 20’ on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Tack board (4’ x 20’) minimum; tack strips on all walls

<u>Loose Furnishings</u>:
- Teacher’s desk/workstation and chair
- Two (2) file cabinets w/lock, 4-drawer
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- Lockable cabinet w/ charging station for 20 laptop computers or tablets
- 20 student desks (trapezoid or square)
- 20 student chairs
- Adjustable height bookshelves (24 LF)

<u>Classroom Technology;</u>
- See Educational Technology Pg. 7

~~PROJECT STORAGE ROOM~~ Requirement removed

~~GOAL:~~
- ~~To provide storage for student projects~~

~~SPATIAL RELATIONSHIPS:~~
- ~~Door and/or window from classroom~~

~~ENVIRONMENTAL CONSIDERATIONS:~~
- ~~Uniform lighting~~
- ~~Moisture and stain-resistant finishes~~
- ~~Adequate ventilation/exhaust~~

~~Features:~~
- ~~Locate near suite entrance.~~
- ~~Provide 40 wide double tier lockers.~~
- ~~Wall hooks for aprons, etc.~~

~~Plumbing:~~
- ~~Plumbing connections~~
- ~~Sink (hand washing)~~

CTE HUB

TOOL/MATERIAL STORAGE

QUANTITY:
- 6

SIZE:
- 600 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Labs

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Moisture and stain-resistant finishes
- Chemical-resistant counter tops
- Adequate ventilation/exhaust
- Electrical outlets for equipment

Loose Furnishings:

Tool storage
- Lockable storage cabinets.
- Metal shelves
- Fastener cabinets

Material storage
- Lockable storage cabinets.
- Metal shelves
- Flammable liquid cabinet
- Fastener cabinets

- Smoke detector, per code
- Exhaust fan, per code
- Fire extinguishers, per code
- Fire blanket, wall-mounted
- First Aid kit, wall mounted
- Stainless steel laboratory, cart

See individual staff for additional details

WELDING LAB

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Classroom
- Tool/material Storage
- Project Storage/lockers

SPATIAL RELATIONSHIPS:
- Adjacent other labs

GOALS:
- Welding booths and 4 work stations
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility;
- Poured cement floor.
- OSHA requirements maintained
- Provide electricity for equipment
- Exhaust system for booths and lab
- Provide natural gas access.
- Windows to provide natural light

Features of lab:
- 20 – 7 X 10' welding stations for up to two power sources (pneumatic outlets up to 120 psi at each work-station)
- Grinding Station
- Cutting Station
- Hydraulic Press
- Cooling Station
- Consider plasma cutting and robotic stations

Plumbing:
- Plumbing connections
- Two sinks

CTE HUB

TOILETS/LOCKERS

GOAL:
- To provide a safe and clean area for students to change and store clothes

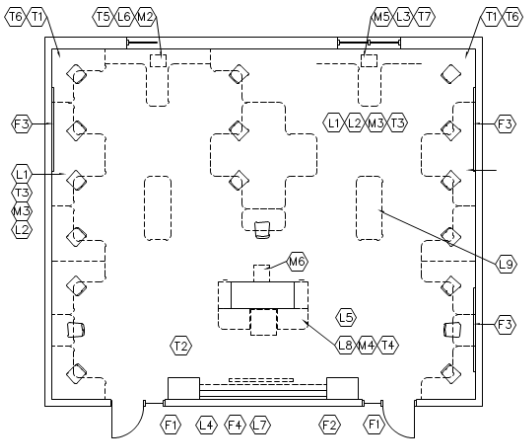
SPATIAL RELATIONSHIPS:
- Access to Labs

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Cleanable building surfaces
- Handicapped accessible

Fixed Equipment:
Mirrors
Tack board (8 LF)
60 lockers at boy's and 20 lockers girl's approximately 12"W x 36"H x 16"D in size with a combination lock for each locker.

Toilets adjacent to locker with access from the corridor

CONSTRUCTION DESIGN LAB



SIZE:

- 1200 SF

GOALS:

- To provide a space to teach overview of trades and CAD drafting
- To provide students with a diversified approach to uses of technology and technology education in which students will work individually and in teams in a project-based curriculum
- Emphasis on problem solving, technology literacy, and communication skills

PROGRAM ACTIVITIES:

- Large and small group instruction/Oral presentation
- Hands-on activities
- Team teaching
- Computerized instruction

SPATIAL RELATIONSHIPS:

- Construction trade labs

ENVIRONMENTAL CONSIDERATIONS:

- Uniform lighting with an appropriate visual comfort probability level
- Electrical outlets for equipment
- Comfortable rooms with pleasant décor that contributes to an atmosphere conducive to creativity
- Windows desirable, provide treatment to darken if windows are provided
- Proportion classroom for effective viewing and listening from all areas or the classroom

Fixed Equipment:

F1 Casework: Tall cabinets
F2 White board (12 LF)
F3 Tack board (32 LF)
F4 Projection screen

Loose Furnishings:

L1 20 student chairs
L2 20 computer workstations
L3 Scanner table
L4 Adjustable height bookshelves (24 LF)
L5 2, four-drawer file cabinet
L6 Printer table
L7 Multimedia cart for teacher use (optional)
L8 Teacher chair and desk
L9 Work tables

Miscellaneous:

M1 Ceiling mounted projector
M2 Printer
M3 28 computers for student use
M4 Computer for teacher use
M5 Scanner
Audio enhancement equipment

Communications:

T2 Voice port and phone
T3 20 data ports (TBD)
T4 Data port near teacher workstation
T5 Data port for printer
T7 Data port for scanner

NOTES: Loose furnishings and features represent one of many possible arrangements.

CTE HUB

CONFERENCE ROOM

SIZE
- 200 SF

GOAL:
- To provide a collaboration and work sharing space

PROGRAM ACTIVITIES:
- Telephone calls
- Storage of office supplies
- Copying and printing
- Meetings with parents, students, and staff

SPATIAL RELATIONSHIPS:
- Near labs

Fixed Equipment:
Casework:
Base cabinets and shelving
Tack board (4 LF)
Screen

Loose Furnishings:
Conference table
Eight Side chairs

Miscellaneous:
High speed printer
Copy machine

Communications:
Voice port and phone
Data port for printer

FLAMMABLE STORAGE

SIZE
- 200 SF

GOAL:
- To provide a shared storage area for Category 1, 2 and/or 3 flammable liquids

SPATIAL RELATIONSHIPS:
- Room should be attached to the main building separated by a blank wall.
- The room must be ventilated for removal of vapors. Ventilation must be either a gravity or mechanical exhaust ventilation system. The architect will present option to PGCPS during design.
- Explosion-proof wiring is required. Class I, Division 2 wiring is required for rooms that store sealed containers.
- Ceilings, floors and walls must have a fire resistance rating of two hours. The door must be Class B, self-closing, and be fire rated for 1½ hours. Signage must identify area as Flammable Liquids.
- Floors and wall edges that join the floor must be liquid tight.
- Raised sills of at least 4 inches in height must be present to prevent liquid from flowing to adjoining areas. A permissible alternative is an open-grated trench, which drains to a safe location, across the width of the opening inside of the room.

Fixed Equipment:
Adjustable metal shelving

Loose Furnishings:
Up to three 60 gallon flammable storage cabinets

Transportation Technologies

The Transportation Technologies Cluster prepares students to service and maintain all types of vehicles and to do body work on the vehicles.

Programs of Study

a. **Automotive Technology**
This instructional program prepares individuals to service and maintain all types of automobiles. The program includes instruction in the following: diagnosis of malfunctions and the repair of engines; fuel, electrical, cooling, and brake systems; and drive train and suspension systems. Also instruction is given in the adjustment and repair of individual components and systems such as radiators transmissions, and carburetors.

b. **Automotive Body Repair**
This program prepares individuals to repair body and fenders of automobiles. The program includes instruction in surface preparation for painting and finishing. Student activities include:

- Learning to identify major panels and sections of an automobile body and type and body construction
- Selecting and use the power tools necessary to disassemble, assemble, repair, sand and refinish vehicles
- Removing ornaments, molding, license plates, wheels and other items as necessary to repair and/or sand a vehicle and replace these items on the repaired and/or repainted vehicle.

Space	Design Guideline			Comments/ Prototype Labs
	Qty.	S.F.	Total	
Department				
~~Toilets/Lockers~~	~~2~~	~~200/300~~	~~500~~	~~Located between labs~~
Staff Offices	2	120	240	Adjacent to labs
Auto Body			0	
Auto Body Shop	1	4,000	4,000	
Classroom	1	650	650	
Tool/material Storage	1	480	480	
Auto Tech			0	
Shop	1	6,000	6,000	
Classroom	1	650	650	
Tool/Material Storage	1	500	500	
Total			**12,520**	

General Lab requirements

- Labs will have a minimum of 15' ceilings. Open, industrial ceilings, concrete walls and cement floors are typical.
- Labs will have overhead 10' X14' doors to the exterior of the building for each bay.
- Windows for natural light is desirable but must be 8' off the floor in the labs.
- Appropriate dust collection, exhaust and fresh air exchange is needed for all labs..
- All labs need floor drains and hose bibs and a clean-up deep well sink
- Electrical outlets are needed every 6 ft. and for large specialty equipment (See individual lab requirements).
- A safety station is to be installed, with shower, automatic shut-off eyewash, and drain with a sloped floor, and should accommodate persons with disabilities.
- The shower and eyewash should have a spring loaded mechanism.
- Master cutoff for water and electricity needs to be easily accessible to the teacher and located so that students can't get to it. The emergency cut-off key should be removable in the "on" position.
- Two adult toilets for teacher and customer use in corridor
- Consider radiant heat - floor or overhead

CTE HUB

AUTOMOTIVE TECHNOLOGY LAB

SIZE:
- 6000 SF

ANCILLARY SPACES:
- Classroom
- Storage
- Outside fenced parking

SPATIAL RELATIONSHIPS:
- Adjacent to auto body lab

GOALS:
- Students in the automotive technician program learn how to diagnose and repair components in the engine, transmission, and transaxle systems of automotive vehicles. Working under the hood and using computerized diagnostic equipment and specialty tools, students use their knowledge of engines, critical thinking, and problem solving skills to maintain and repair cars and light vehicles.
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light

Features of lab:
- Three lifts and 2 open work stations
- Overhead circulating fans
- Hard surface / smooth face concrete floors
- All electricity should be ground fault breakers.
- 220 volt - arc welder
- 110 volt throughout entire area per electrical code (walls)
- Six workstations with 110 volt hanging outlets from ceiling
- Two water outlets (one on each side of shop)
- Screw air compressor (large enough capacity to service auto tech /auto body) centrally located.
- The following equipment is recommended:
  - Three lifts - electric over hydraulic (above floor design)
  - Two 2-1/2 ton floor jacks
  - two cylinder hone: range 2" to 7" with flexible drive
  - Various teaching units (see staff for activity area and utility requirements) – oil and lube, tire balancing, brakes, engine and battery testing, etc.

AUTOMOTIVE BODY LAB

SIZE:
- 4000 SF

ANCILLARY SPACES:
- Classroom
- Storage
- Paved parking lot, large enough to hold 5 vehicles, surrounded by a 6' fence or wall with privacy screening and a lockable gate

SPATIAL RELATIONSHIPS:
- Adjacent to auto tech lab

GOALS:
- The automotive body repair program prepares students to use technical manuals and knowledge of vehicle construction, along with specialized tools and repair techniques, to straighten components, replace parts, and restore vehicle bodies to their original specifications. The work ranges from repairing minor damage like a dent or scrape to replacing complex parts after a major collision.
- Students will learn to assess damage and make decisions regarding repairs and replacement of parts.
- Flexible space and layout

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light

Features of lab:
- One lift bay and four open work bays
- Welding area in one work bay
- Down draft spray booth located in one corner of the laboratory (500 SF).
- Clean-up area in front of spray booth with a drain in the floor
- Electric car lift located in one work area.
- A sink, soap and towel dispenser
- Three fireproof storage cabinets
- High intensity lighting appropriate for each instructional activity
- Ventilation fans must be provided to exhaust fumes and vapors in all weather conditions.
- Two air lines should be placed in each work area.
- Rotary compressor of 20 hp

CTE HUB

CLASSROOMS

CAPACITY:
- 15-20 students
- 1-2 staff members

SIZE:
- 650 SF

GOAL:
- To provide flexible space to accommodate non-lab learning
- To provide a learning environment that frees teachers and students to customize the classroom daily – different seating set-ups, wireless mobile computing, and various teaching/presentation options.
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.

PROGRAM ACTIVITIES:
- Large group, small group
- Oral presentations
- Computerized instruction
- Team teaching

SPATIAL RELATIONSHIPS:
- Adjacent to lab
- Door to corridor

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting with multi-level switching
- Windows to provide natural light and egress
- Electrical outlets for equipment
- Window treatment to darken room for AV presentations

Fixed Equipment
- Clock (on side walls instead of rear walls)
- 2 Dry, white eraser-board (4’ x 20’ on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Tack board (4’ x 20’) minimum; tack strips on all walls

Loose Furnishings:
- Teacher’s desk/workstation and chair
- Two (2) file cabinets w/lock, 4-drawer
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- Lockable cabinet w/ charging station for 15 laptop computers or tablets
- 15 student desks (trapezoid or square)
- 15 student chairs
- Adjustable height bookshelves (24 LF)

Classroom Technology;
See Educational Technology Pg. 7

TOOL/MATERIAL STORAGE

SIZE:
- 480 SF
- 500 SF
-

SPATIAL RELATIONSHIPS:
- Adjacent and access to Lab

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Moisture and stain-resistant finishes
- Chemical-resistant counter tops
- Adequate ventilation/exhaust
- Electrical outlets for equipment

Loose Furnishings:

Tool storage
- Lockable storage cabinets.
- Metal shelves
- Flammable liquid cabinet
- Fastener cabinets

Material storage
- Lockable storage cabinets.
- Metal shelves
- Flammable liquid cabinet
- Fastener cabinets

- Smoke detector, per code
- Exhaust fan, per code
- Fire extinguishers, per code
- Fire blanket, wall-mounted
- First Aid kit, wall mounted
- Stainless steel laboratory, cart

See individual staff for additional details

CTE HUB

STAFF OFFICES (all CTE Offices)

Apply this description to all CTE teacher offices

CAPACITY:
- Teachers
- Assistants

SIZE:
- 120 SF

SPATIAL RELATIONSHIPS:
- Adjacent Labs

GOAL:
- To provide clean space for teachers to conduct administrative activities

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting
- Window to lab

Fixed Equipment:
White erase board (3' X4')

Loose Furnishings:
Ergonomic task chair
Teacher Desk
4-drawer locking file cabinet
Adjustable height bookshelves (12 LF)

Room Technology:
1 voice port and phone
2 data ports or wireless

Consumer Services, Hospitality and Tourism
Barbering and Cosmetology

Programs of Study

a. **Barbering & Hairstyling Careers**
The Barbering program of study provides theoretical and practical skills necessary for students to become proficient in aspects of haircutting and styling, shaving, and permanent cold waving. Students are required to earn 1200 clock hours and take the Maryland State Board Barbering examination. Upon passing the exam, students graduate as licensed professionals.

b. **Careers in Cosmetology**
Cosmetology instruction and experiences include techniques of cutting and grooming hair; make-up artistry; nail care including new fashionable techniques; applying such hair treatments as shampooing, coloring, cold wave perms and relaxers, applying facial, scalp and skin care treatments; and operating, managing and owning a cosmetology services business. Students are required to earn 1500 clock hours and to take the Maryland State Board of Cosmetology examination. Upon passing the exam, students graduate as licensed professionals.

CTE HUB

Space	Design Guideline			Comments
Shared	**Qty.**	**S.F.**	**Total**	
Locker Room/toilets	2	300	600	
Public Restroom	2	60	120	In corridor
Laundry/linen storage	1	150	150	
Staff Office	2	120	240	
Dispensary	1	200	200	Chemical storage; sink, cabinets
Barbering & Hairstyling			0	
Barbering Lab	1	1800	1,800	
Storage	1	150	150	
Classroom	1	650	650	
Cosmetology			0	
Cosmetology Lab with	1	1800	3,550	
Manicure and facial stations	2	800		
- wig station	1	150		
Storage	2	200	400	
Classroom	2	750	1500	
Total			9,360	

General Lab requirements

- The Consumer Services wing should have a public entrance through the main security with a ‘storefront’ façade facing the visitor parking.
- Windows for natural light is desirable but must be 8’ off the floor in the labs.
- Appropriate exhaust and fresh air exchange is needed for all labs.
- All labs need floor drains and hose bibs.
- Electrical outlets are needed every 6 ft. and at every work station

BARBER AND COSMETOLOGY LAB

SIZE:
- 1,800 SF Barbering
- 3,550 SF Cosmetology

ANCILLARY SPACES:
- Classroom
- Cosmetology lab – nail and facial stations

SPATIAL RELATIONSHIPS:
- Adjacent to Reception

GOALS:
- The Barbering program of study provides theoretical and practical skills necessary for students to become proficient in aspects of haircutting and styling, shaving, and cold waving.
- Cosmetology instruction and experiences include techniques of cutting and grooming hair; make-up artistry; nail care including new fashionable techniques; applying hair treatments such as shampooing, coloring, cold wave perms and relaxers; applying facial, scalp and skin care treatments; and operating, managing and owning a cosmetology services business.
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting and task lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Electrical outlets for equipment
- Plumbing for equipment
- Windows to provide natural light

<u>Features of Cosmetology lab</u>:
- 18-20 hair stations
  - Vanity style with mirror
- Areas for hair drying (4 stations), manicures (5 stations), pedicures (3 stations), facials (2 stations), and wigs
- Hand washing sink near manicure and pedicure area
- Handwashing sink near facial area
- 4-5 hair washing stations
- Tack board on available walls
- Casework: cabinets with storage below near each activity area (washing, manicures, pedicure spas, facials)
- Reception counter inside public entrance

<u>Features of Barbering lab</u>:
- 18 hair stations
  - Vanity style with mirror
- 4-5 hair washing stations
- Tack board on available walls
- Casework: cabinets with storage below washing stations

FURNITURE
- 18-20 X 2 Salon chairs
- 4-5 Washing station chairs
- 4 drying stations
- Ergonomic chairs for 5 manicure station(s)
- Three pedicure spa chairs and tubs
- Two facial stations beds

CLASSROOMS

CTE HUB

CAPACITY:
- 15-20 students
- 1-2 staff members

SIZE:
- 650-750 SF

GOAL:
- To provide flexible space to accommodate non-lab learning
- To provide a learning environment that frees teachers and students to customize the classroom daily – different seating set-ups, wireless mobile computing, and various teaching/presentation options.
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.

PROGRAM ACTIVITIES:
- Large group, small group
- Oral presentations
- Computerized instruction
- Team teaching

SPATIAL RELATIONSHIPS:
- Adjacent to lab
- Door to corridor

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting with multi-level switching
- Windows to provide natural light and egress
- Electrical outlets for equipment
- Window treatment to darken room for AV presentations

<u>Fixed Equipment</u>
- Clock (on side walls instead of rear walls)
- 2 Dry, white eraser-board (4’ x 20’ on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Tack board (4’ x 20’) minimum; tack strips on all walls

<u>Loose Furnishings</u>:
- Teacher’s desk/workstation and chair
- Two (2) file cabinets w/lock, 4-drawer
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- Lockable cabinet w/ charging station for 20 laptop computers or tablets
- 20 student desks (trapezoid or square)
- 20 student chairs
- Adjustable height bookshelves (24 LF)

<u>Classroom Technology;</u>
See Instructional Technology Pg. 10

SUPPLIES STORAGE

SIZE:
Varies: See table

SPATIAL RELATIONSHIPS:
- Adjacent and access to Lab

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Moisture and stain-resistant finishes
- Chemical-resistant counter tops
- Adequate ventilation/exhaust
- Electrical outlets for equipment

Material storage
- Lockable storage cabinets.
- Metal shelves
- Flammable liquid cabinet

- Smoke detector, per code
- First Aid kit, wall mounted
- Stainless steel laboratory, cart

See individual staff for additional details

CTE HUB

LOCKER ROOM

CAPACITY:
- 20 students
- 1-2 staff members

SIZE:
- 300 SF

GOAL:
- To provide a safe and clean area for students to change and store clothes

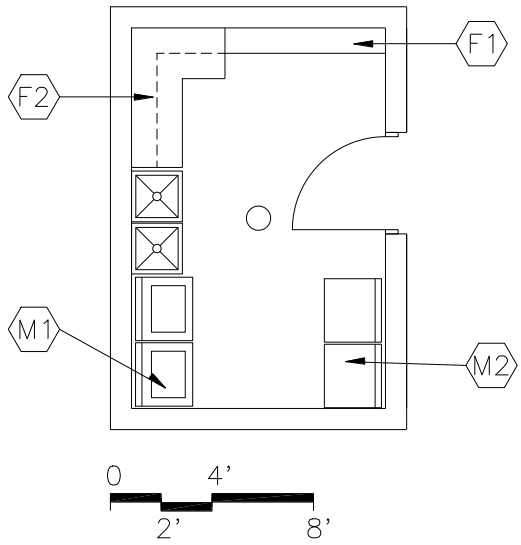
SPATIAL RELATIONSHIPS:
- Locate between labs with doors into labs

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Cleanable building surfaces
- Handicapped accessible

Fixed Equipment:
Mirrors
Tack board (8 LF)
40 lockers at each area (boy's and girl's) approximately 12"W x 36"H x 16"D in size with a combination lock for each locker.

Toilets adjacent to locker with access from the corridor

LAUNDRY



QUANTITY:
- 1

CAPACITY:
- 1-2 Teachers

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Near Labs

GOAL:
- To provide space to wash/dry garments, towels, etc.

PROGRAM ACTIVITY:
- Washing and drying clothes

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation/exhaust
- Cleanable building surfaces
- Electrical outlets for equipment

Built-in Fixtures:
F1 Rust-resistant 12" deep shelving
F2 Casework: Base/wall cabinets and shelving

Miscellaneous Equipment:
M1 Commercial washers (2)
M2 Commercial dryers (2)

Plumbing:
- Plumbing connections
  Sinks, utility
  Floor drains

HVAC:
- Washer and dryer connections

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

CTE HUB

DISPENSARY

QUANTITY:
- 1 room

CAPACITY:
- 1 or 2 staff members
- Student assistants

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- Central to Labs

PROGRAM ACTIVITIES:
- Store equipment
- Store supplies

Finishes:

Flooring:
- Moisture and stain-resistant finishes

Counter/Table Tops:
- Heat and chemical-resistant (to acids, etc.)

Built-in Fixtures:
- Casework: Base/wall cabinets around sink
- Towel/ Soap dispenser
- Adjustable shelving on two walls

Loose Furnishings:
- 2 file cabinets on mobile pedestals
- 1 Chemical (acid) storage cabinets (lockable)

Miscellaneous Equipment:
- Dishwasher
- Under the counter, non-self-defrosting refrigerator

Electrical Features:
- Duplex receptacles in raceway above countertop
- Electrical Outlets for equipment
- Uniform lighting with multi-level switching

HVAC Features:
- Adequate ventilation/exhaust

Plumbing Features:
- Plumbing connections, floor drain
- Large and deep sink with a goose neck and acid trap

Business and Finance

The Business and Finance Cluster provides courses to prepare high school students for employment and advancement in the business industry. Students learn the basics of entrepreneurship, the foundations of business, finance, accounting, communications, technology, and Microsoft Office tools. They learn about various financial analysis strategies and the methods by which businesses raise capital. The Business and IT wing may be located on the second floor.

Programs of Study

- Accounting
- Business Administrative Services
- Business Management
- Finance (NAF)

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Business and Finance			0	
Computer-enabled classrooms	3	1200	3,600	
Storage	3	50	150	
Planning /Conference	1	200	200	
Total			**3,950**	

CTE HUB

BUSINESS LAB (w/ storage)

GOALS:
- To provide a space to teach computer business skills
- To provide students with a diversified approach to uses of technology and technology education in which students will work individually and in teams in a project-based curriculum
- Emphasis on problem solving, technology literacy, and communication skills

PROGRAM ACTIVITIES:
- Large and small group instruction/Oral presentation
- Hands-on activities
- Team teaching
- Computerized instruction

SPATIAL RELATIONSHIPS:
- Business and IT wing
- Storage

Storage Requirements:
50 SF
Adjustable shelving

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting with an appropriate visual comfort probability level
- Electrical outlets for equipment
- Comfortable rooms with pleasant décor that contributes to an atmosphere conducive to creativity
- Windows desirable, provide treatment to darken if windows are provided
- Proportion classroom for effective viewing and listening from all areas or the classroom

Fixed Equipment:
- Casework: Tall cabinets w/ adj. shelving
- White board (12 LF)
- Tack board (32 LF)

Loose Furnishings:
- 20 student desks and chairs (wheels)
- 20 computer workstations
- Scanner table
- 2, four-drawer file cabinet
- Teacher chair and desk
- 2 Worktables

Classroom Technology;
See Instructional Technology Pg. 10

NOTES:

PLANNING/CONFERENCE

SIZE:
- 200 SF

GOAL:
- To provide a collaboration and work sharing space

PROGRAM ACTIVITIES:
- Telephone calls
- Storage of office supplies
- Copying and printing
- Meetings with parents, students, and staff

SPATIAL RELATIONSHIPS:
- Near labs

Fixed Equipment:
Casework:
Base cabinets and shelving
Tack board (4 LF)
White board (4 LF)

Loose Furnishings:
Conference table
Eight Side chairs

Miscellaneous:
Owner provided

Communications:
Voice port and phone
Data port for printer

Human Resource Services: Child Development

Space	Design Guideline			Comments
ACADEMIES	Qty.	S.F.	Total	
Child Development			2,300	2 child-height toilet rooms
- Child Lab	1	1150		
- Classroom	1	800		
- Storage	1	150		
- Outside storage	1	100		
- Laundry	1	100		
Total			2,300	

Outdoor Play area

An outdoor play area should be located in a protected area accessible directly from the lab. The area should allow for 60 SF per child/student or 600 – 1200 SF. Age appropriate play equipment must be for ages 3-5.

From:
Outdoor Play: Designing, Building, and Remodeling Playgrounds for Young Children
By Francis Wardle, Ph.D
"A good playground needs to provide all children who use it with opportunities for a variety of play: physical, social, constructive, dramatic, and games with rules (Wardle, 1996). This can be done in a variety of ways, but needs to include climbing structures, opportunity for wheeled toys, moveable parts, sandboxes, dramatic play structures, and grass areas for games.

Playgrounds need to replicate nature (Greenman, 1993; Rivkin, 1995; Wardle, 1995). They also need to allow children to experiment, risk, and control the environment. Finally, playgrounds need to be responsive to each child. Thus playgrounds often appear somewhat messy and disorganized to the adult (Moore, 1986; Wardle, 1990).
[ ]
General Guidelines
All playground designs will differ, depending on space availability, geographic location, age of children, financial resources, and type of program (e.g., a part-day program's needs are different from a full-day program's). With this in mind, the following general points should be considered when choosing equipment and designing a playground.

Surfaces. Provide at least three surfaces: fall zone, hard top (for balls, bikes, and trikes), and grass.

Areas. Provide an area for gross motor play-climbing equipment, an area for dramatic play, an area for games with rules (e.g., large grass area and concrete area for basketball), and an area for wagons, bikes, and trikes-usually trails and pathways. [ ]

Garden. A garden is a fantastic way for children to learn about basic scientific facts of seasons, growth, sun and water, and where vegetables come from."

CHILD DEVELOPMENT CLASSROOM/LAB

GOAL:
- To provide space for students to explore careers in education and early childhood fields

ANCILLARY SPACES:
- Restrooms (60 SF)
- Storage
- On the ground floor

SPATIAL RELATIONSHIPS:
- Suite includes:
  - Student classroom with one way mirror into lab area and door access
  - Early childhood lab
  - Kitchenette
  - Laundry
  - Storage
  - Outdoor play area
- Locate at first floor for emergency evacuations, near a parent drop-off and pick-up area

PROGRAM ACTIVITIES:
- Student projects
- Team teaching
- Play with 3-4 year olds
- Computer instruction and research

Technology in classroom;
See Educational Technology pg. 7

Feature/Furnishings in classroom :
- 5 4-person tables or desks
- 20 chairs
- Desk and chair for teacher
- Four-drawer file cabinet
- Marker board (16 LF)
- Tack board (8-16 LF)
- Casework: Teacher's wardrobe

ENVIRONMENTAL CONSIDERATIONS:
- Windows to provide natural light and egress
- Adequate ventilation
- Electrical outlets for equipment
- Uniform lighting
- Window treatment to darken room

Features in lab:
- Student cubbies (18)
- Casework: Wall shelving (over cubbies)
- Marker board (1 wall)
- Tack board flanking marker board
- Plus two (2) parallel rows of continuous tack strips on all available walls (4 LF or longer) at 30" and 48" AFF
- Manual projection screen (60"X60") facing ceiling mounted LCD projector
- Kitchenette with sink, range, oven and refrigerator; mounted microwave.
- Soap dispenser
- Towel dispenser
- Child-height sink outside bathrooms with bubbler.

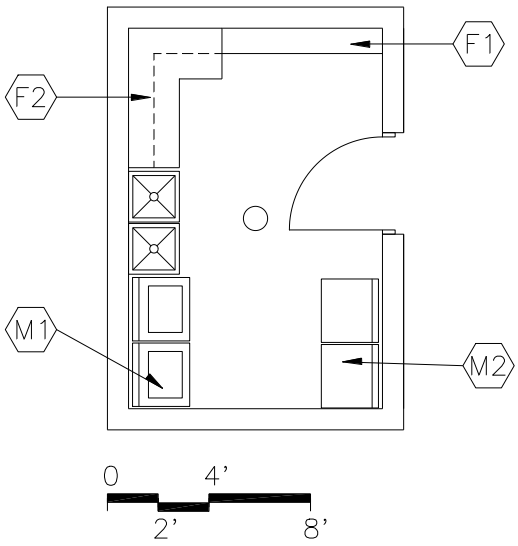
Loose Furnishings in lab:
- 16 11-13" stackable chairs, 4-5 tables (adjustable)
- Adult work table with 4 chairs
- 2 computer stations w/ chairs (for the children)
- Bound carpet rug (oval), rug for block area, rug for reading area
- Mobile shelving (various)
- Bookshelves
- Learning center sets such as sand/water tables, kitchen, child-height dining, dress-up center, art cart, science light board, and blocks.

Storage (Inside):
- Adjustable shelving

Storage (outside)
- Open area with wall hunks
- If feasible, storage should be part of the building with a door into the student play area.

LAUNDRY

CTE HUB



GOAL:
- To provide space to wash/dry athletic/PE garments, towels, etc.

PROGRAM ACTIVITY:
- Washing and drying clothes

SPATIAL RELATIONSHIPS:
- Near FACS classrooms

ENVIRONMENTAL CONSIDERATIONS:
- Cleanable building surfaces
- Electrical outlets for equipment
- Adequate ventilation/exhaust
- Cleanable building surfaces

Fixed Equipment:
F1 Rust-resistant 12" deep shelving
F2 Casework: Base/wall cabinets and shelving

Plumbing:
Plumbing connections
Sinks, utility
Floor drains

HVAC:
Washer and dryer connections

Miscellaneous:
M1 Commercial washers (2)
M2 Commercial dryers (2)

INSIDE/OUTSIDE STORAGE

SIZE:
Varies: See table

SPATIAL RELATIONSHIPS:
- Inside storage adjacent to lab
- Outside storage adjacent to play yard; may be a separate building or in the school with double doors to play yard

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Adequate ventilation/exhaust

Inside storage
- Adjustable shelves

Outside storage
- Lockable double doors
- Adjustable shelves
- First Aid kit, wall mounted

Consumer Services, Hospitality and Tourism: Culinary Arts Lab

The café is the demonstration area and learning studio.

The outside area should be a partially covered patio with dining space for good weather. There should be a small kitchen garden for herbs and vegetables. The Consumer Services wing should have a public entrance through the main security with a 'storefront' façade facing the visitor parking.

Space	Design Guideline			Comments
ACADEMIES	**Qty.**	**S.F.**	**Total**	
Culinary Arts			4,290	
- Kitchen	1	1,550		
- Cafe	1	1,800		
- Lockers	2	210		
- Storage	2	200		
- Office	1	120		
Total			4,290	

Kitchen/Café

SIZE:
- 3870 SF

ANCILLARY SPACES:
- Storage
- Office

SPATIAL RELATIONSHIPS:
- Separate kitchen from café with double swing doors with 'peak' windows

GOALS:
- Flexible space and layout for a teaching kitchen and serving area
- To provide students with experience that will acquaint them with fields in culinary arts

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis
- Oral presentations
- Computerized instruction

ENVIRONMENTAL CONSIDERATION:
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light in cafe
- Window treatment to darken room in café
- Comfortable lighting in café for dining experience

Furnishings in café area:
- 12 6-person tables
- 72 stackable chairs
- Fire blanket/First Aide Kit
- Marker board (16 LF)/
- Tack board (8-16 LF)
- Projection screen
- Casework for dining equipment (dishes, table cloths, etc.)

Kitchen Equipment:

Technology in cafe;
Classroom technology
Large screen and presentation technology

Features in kitchen
Culinary Preparation Kitchen - 4 student centers (baking, preparation, cooking, ware washing) and two storage centers (cooling and dry storage)
- Baking center: two double stacked commercial ovens (4), proofer, bakers table, pan and utensil storage
- Preparation area: stainless steel 6' prep tables (6), utensil storage
- Cooking: Two 6 burner gas stoves, pots and pan storage, table
- Ware Washing: commercial dishwasher, pot washing sink, drying area
- Cooling: walk-in cooler/freezer
- Upper and lower storage on all peripheral walls of kitchen but no visual obstructions in the lab area; hand washing sinks near each center
- Soap dispensers
- Towel dispensers
- Fire extinguisher(s) per code

Plumbing
7 sinks
Eye Wash station

HVAC:
Exhaust for cooking equipment

• Commercial hood unit with ansel system • Open burner gas stove 6 burner/convection ovens • Open burner gas stove 6 burner with fry top/convection ovens • Full sized convection ovens-stacked unit electric • Combination steamer-oven • Holding/proofer • Deep fat fryer 40 frialator • Microwave, 1200 watt • Set in racks with sliders • Walk-in refrigerator (with metal shelving) • Walk-in freezer (with metal shelving) • Steamer • Ice maker, large capacity • Salamander • Trunnion kettle (small steam jacket) • Sinks, single compartment, for hand washing, per code • Sink, two-compartment, Vegetable prep • Turbo garbage disposal, low profile • Single tank dishwasher in warewashing area • Dish tables in warewashing area • Sink, three-compartment, oversized pot sink in warewashing area • Mop Sink in mop room Additional equipment provided by school	

LOCKERS

GOAL:

- To provide a safe and clean area for students to change and store clothes

SPATIAL RELATIONSHIPS:

- Adjacent and access Lab

ENVIRONMENTAL CONSIDERATIONS:

- Adequate ventilation
- Cleanable building surfaces
- Handicapped accessible

Fixed Equipment:

Mirrors
Tack board (8 LF)
20 lockers at each area (boy's and girl's) approximately 12"W x 36"H x 16"D in size with a combination lock for each locker.

Toilets adjacent to locker with access from the corridor

CTE HUB

STORAGE

SIZE:
- 200 SF

GOALS:
- To provide storage for dry goods
- To provide storage for pots, pans, utensils

SPATIAL RELATIONSHIPS:
- Adjacent to kitchen

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Adequate ventilation/exhaust

Fixed Equipment:
- Lockable double doors
- Adjustable metal shelves

Health and Biosciences

The Health and Biosciences Cluster provides a unique learning environment for high school students interested in pursuing a career in biological science, health care, or medicine. Students will become active participants in the learning process as they develop their skills through the application of the scientific method and relevant, real world scenarios. Students will gain in depth knowledge of the human body, disease mechanism, major biological themes, mathematical topics and other concepts related to medicine.

Biomedical Science
The Biomedical Sciences program is based on the national content standards for Science, Mathematics, and English language Arts and the Accountability Criteria for the national Health Care Cluster Foundation Standards.

Health Professions
The Health Professions Program uses project and problem based learning, clinical experiences, as well as classroom and lab instruction to teach students about the field of health care. Students progress through two foundation courses: Foundations of Medicine and Health Science and Structure and Functions of the Human Body.

Certified Nursing Assistant (CAN)
Medical Assistant
Certified Clinical Medical Assistant (CCMA)
Dental Assistant

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Health Professions			0	
Nursing Assistant	1	2,200	6,600	
Dental Lab Assistant	1	2,200		
Clinical Medical Assistant	1	2,200		
Storage	Varies		900	
Toilet	2	120	240	With shower
Total			**7,740**	

The dental lab should the on the ground floor near the school-based health clinic if feasible.

General Lab requirements

- Locate in Health and Biosciences Wing near at least one each chemistry and biology labs.
- Windows for natural light is desirable.
- Electrical outlets at each work station and for large specialty equipment (See individual lab requirements).
- Large student lockers in corridor to store lab clothing and supplies

NURSING AND CLINICAL MEDICAL LAB

SIZE:
- 1450 Lab SF/750 classroom SF

ANCILLARY SPACES:
- Classroom (Classroom and lab may be separated by a movable wall or a partial wall) Description follows.
- Storage

SPATIAL RELATIONSHIPS:
- In Health and Biosciences Wing

GOALS:
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting and task lighting
- Rooms designed for ease of movement and accessibility;
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Windows to provide natural light

Features of lab:
- Eight hospital beds with nightstands for each bed and an overhead light.
- Design one bed with a teaching wall that mimics the monitors and switches that would exist in a hospital setting.
- Electrical power for each hospital bed.
- Space for the following items:
  - Stretcher
  - Medical cart
  - Linen cart
  - Examination table
- Twelve (12) LF counter with 2 sinks with hands free operations. Cabinets over and under the counter
- A shower and toilet area to teach geriatric aide.
- Eight feet of whiteboard and tackboard

Note: Verify movable furniture for clinical medical lab.

DENTAL LAB

SIZE:
- 1450 Lab SF/750 classroom SF

ANCILLARY SPACES:
- Classroom (Classroom and lab may be separated by a movable wall or a partial wall) Description follows
- Storage

SPATIAL RELATIONSHIPS:
- In Health and Biosciences Wing

GOALS:
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting and task lighting
- Rooms designed for ease of movement and accessibility;
- Lab table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Windows to provide natural light

Features of lab:
- Six dental stations with plumbing, air, and electric to support equipment – consult manufacturer
- Six (6) LF counter with sink with hands free operations. Cabinets over and under the counter in each dental station
- Peripheral sink with 12 LF of counter and storage above and below for supplies

CTE HUB

STORAGE

SPATIAL RELATIONSHIPS:
- Adjacent and access to Labs

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Moisture and stain-resistant finishes
- Chemical-resistant counter tops
- Adequate ventilation/exhaust
- Electrical outlets for equipment

Loose Furnishings:

To store the following equipment:
- Three wheelchairs
- Crutches
- General medical supplies
- CPR mannequins
- Three blood pressure monitor

- Electrical outlets to charge each of the blood pressure monitors.
- Stackable washer and dryer

See individual staff for additional details

Information Technology

The Information Technology cluster prepares students to meet the demands of the 21st century with a rigorous academic curriculum, while exposing them to the varied career paths and opportunities available in the information technology industry.
Students are provided concentrated coursework in networking, computer science, web design, and interactive media production which prepares students for post-secondary training and/or a career path in the information technology field. Locate in the business and IT wing.

Programs of Study

IT Networking (CISCO – Cybersecurity)

The IT Networking Program (CISCO) is a nationally recognized program that prepares students for successful careers in information technology fields such as computer network design and administration, hardware, software, and network installation, local and wide area network (LAN/WAN) management and systems engineering. Courses are designed with the option of an applied or theoretical approach. As a result, students can earn industry certifications that are the first steps to earning the CISCO Certified Network Professional (CCNP) licensure.

Space	Design Guideline			Comments
Shared	**Qty.**	**S.F.**	**Total**	
Networking Lab				
Lab/Classroom	1	1800	1800	
Storage	1	150	150	
Total			1950	

CTE HUB

NETWORKING LAB

SIZE:
- 1800 SF

ANCILLARY SPACES:
- Lab/classroom
- Storage
- Near business labs

GOALS:
- Students will learn how to build and design and support computer networks. They will be taught to design, install, configure and monitor computer networks and internet access
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting and task lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- Table tops, floors, etc., need to be resistant to acids, heat, spills, etc.
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light

Features of lab:
- The computer networking lab/Cisco Lab should have a lecture area in one end of space.
- Lab furnished with 8-10 two-person workbenches (3'X5') and stools. Each workbench is to be furnished with network trays related to racks with servers, power, and data connection.
- Counters along the side of the room with plug mold above counter

Fixed Equipment
- Clock (on side walls instead of rear walls)
- Dry, white eraser-board (4' x 20')
- Tack board (4' x 20') minimum; tack strips on all walls

Loose Furnishings:
- Teacher's desk/workstation and chair
- Two (2) file cabinets w/lock, 4-drawer
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- 20 student desks (trapezoid or square)
- 20 student chairs

Classroom Technology;
See Instructional Technology pg. 10

SUPPLIES STORAGE

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Lab

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Moisture and stain-resistant finishes
- Chemical-resistant counter tops
- Adequate ventilation/exhaust
- Electrical outlets for equipment

Material storage
- Lockable storage cabinets.
- Metal shelves

- Stainless steel laboratory, cart

See individual staff for additional details

Arts, Media, and Communication

The Arts, Media, and Communication career cluster provides students the opportunity to explore the world of graphic arts, graphic design, multimedia, and video production. Students are provided with knowledge of the equipment, materials, and processes currently used in the industry. Locate near the arts electives.

Programs of Study
Interactive Media Production
The Interactive Media Production (IMP) program includes a strong foundation in arts and communication with particular emphasis on design, graphic and media communications, interactive technologies, and project development. Students complete one foundation course and two advanced courses- Interactive Media Production. Interactive Media Production students gain experience in Internet technology and website development, computer graphics, digital media production and project management.

Space	Design Guideline			Comments
ACADEMIES	Qty.	S.F.	Total	
Interactive Media Production			1,400	
- Media Classroom	1	1,200		
- Project Storage	1	100		
- Storage	1	100		
Total			1,400	

CTE HUB

MEDIA CLASSROOMS/ LEARNING STUDIOS

CAPACITY:
- 20 students
- 1-2 staff members
- Guest speakers and volunteers

SIZE:
- 1200 SF

SPATIAL RELATIONSHIPS:
- Near arts electives
- Adjacent to storage and dark room

GOAL:
- To create a learning environment that is comfortable, well lit, and acoustically designed for small and large group learning.

PROGRAM ACTIVITIES:
- Computerized instruction
- Hands-on activities
- Large and small group instruction
- Oral presentations
- Team teaching

ENVIRONMENTAL CONSIDERATIONS:
- Electrical outlets for equipment
- Uniform lighting with multi-level switching
- Window treatment to darken room for AV presentations
- Windows to provide natural light and egress
- Plumbing for sink

Built-in Fixtures:
- 2 Dry, white eraser-board (4' x 20' on two different walls) on track; all eraser-boards shall be installed with a marker tray, map rails with tack strip above
- Clock (on side walls instead of rear walls)
- Tack board (4' x 20') minimum; tack strips on all walls
- Sink outside door to dark room

Loose Furnishings:
- 30 student chairs and computer workstations
- Scanner table
- Printer table
- Mobile iPad cart
- 5 Work tables with power (with seating for six)
- 2 file cabinets w/lock, 4-drawer
- Adjustable height bookshelves (24 LF)
- Teacher wardrobe (lockable) with coat rod; tall cabinet w/ shelving (may be one unit)
- Teacher's desk/workstation (height-adjustable) and chair

Classroom Technology;
- See Technology pg. 10

NOTES:

CTE HUB

DARK ROOM

CAPACITY:
- 2 students
- 1 teacher

SIZE:
- 100 SF (approx. 10 X 10)

SPATIAL RELATIONSHIPS:
- Accessible from the classroom

GOAL:
- To provide a space for developing film

Finishes:
- **Flooring:** Acid resistant with floor drain
- **Walls/ Ceilings:** Should be painted flat black.

HVAC Features:
- Separate HVAC control

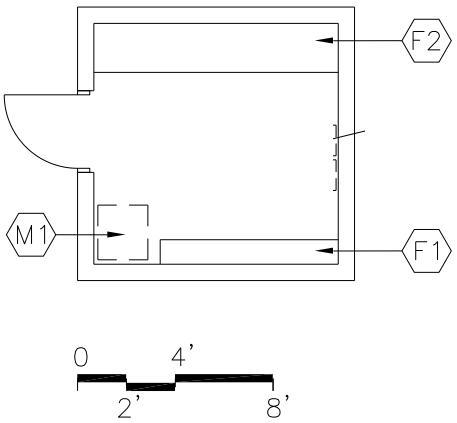
Electrical Features:
- Electrical outlets for equipment
- Regular and red light fixtures

Built-in Fixtures:
- Wet: Sink and wet developing trays on one wall; counter full length of wall with space for drying racks; open shelving below
- Dry: Counter full length of wall; electric outlets for enlarger and dry mount press
- Curtain at entrance

Loose Furnishings:
Locking storage cabinets (36"Wx24"Dx84"H)

Miscellaneous Equipment:
Enlarger
Print maker condenser

STORAGE AREAS



QUANTITY:
- 1

CAPACITY:
- Up to 1 person

SIZE:
- 100 SF

SPATIAL RELATIONSHIPS:
- Adjacent to lab

ENVIRONMENTAL CONSIDERATIONS:
- Security of equipment, supplies, and medicines
- Uniform lighting
- Double doors with removable mullion

Fixtures – Equipment Storage
F1 Storage shelving - 12" deep
F2 Storage shelving - 24" deep
M1 Cabinet (lockable)

Fixtures – Scenery Storage
F1 Storage shelving - 12" deep on one wall

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Manufacturing, Engineering, and Technology

Overview
The Manufacturing, Engineering, and Technology career cluster provides students with exposure to a wide array of Science, Technology, Engineering, and Mathematics (STEM) careers. The career cluster philosophy is based on state and national standards, strong industrial partnerships, numerous research opportunities, hands on learning experiences, and continuous technological improvements.

Programs of Study

Project Lead the Way (PLTW) Engineering
PLTW is a national not-for-profit organization that promotes an increase in the quantity and quality of engineers and engineering technologists graduating from educational systems throughout the United States. The Project Lead The Way (PLTW) Engineering program introduces students to the scope, rigor, and discipline of engineering technology. Students engage in problem solving, learn and apply the engineering process, and develop vital teamwork, communication, and critical thinking skills.

Space	Design Guideline			Comments
ACADEMIES	**Qty.**	**S.F.**	**Total**	
Engineering and Science (2)			6,000	
- PLTW computer enabled lab	2	2,400		
~~- Storage (student)~~	~~2~~	~~300~~		
- Storage (material)	1	600		Shared
- Team rooms	2	200		Shared

Integration of Technology Engineering and Computer Science (InTECS)

Space	Design Guideline			Comments
Shared	**Qty.**	**S.F.**	**Total**	
InTechs Lab				
Lab/Classroom	1	2,400	2,400	
Storage (material)	2	150	300	
Total			2,700	

PROJECT LEAD THE WAY CLASSROOM/LAB (See workshop layout to create suite)

SIZE:
- 2400 SF

ANCILLARY SPACES:
- Adjacent to shared storage and team rooms

SPATIAL RELATIONSHIPS:
- Flexible space and layout – furniture on casters, operable walls or overhead doors, team teaching opportunities.

GOALS:
- To help students become critical thinkers, problem solvers, and lifelong learners
- Teach engineering concepts

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis
- Oral presentations
- Computer simulations and instruction

ENVIRONMENTAL CONSIDERATION:
- Consider future technology needs; build-in flexibility to retain options
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light
- Window treatment to darken room

<u>Features of classroom /collaboration</u>:
- Flexible desks/seating on casters for 24 students; may be desks or tables; consider a variety of seating options
- Teacher desk and chair
- Teachers wardrobe
- 2- four drawer file cabinets
- White erase board (16 FT) on two walls
- 16’ tack board
- Bookcase to store approximately 150 2” student binders.
- Twelve 2-person computer workstations

General Technology – see pg. 10

CTE HUB

PROJECT LEAD THE WAY WORKSHOP

SIZE:
- Part of classroom/lab

ANCILLARY SPACES:
- Storage
- Classrooms
- Team rooms

SPATIAL RELATIONSHIPS:
- Flexible space and layout – furniture on casters, operable walls or overhead doors, team teaching opportunities.
- Computers/work area/lecture

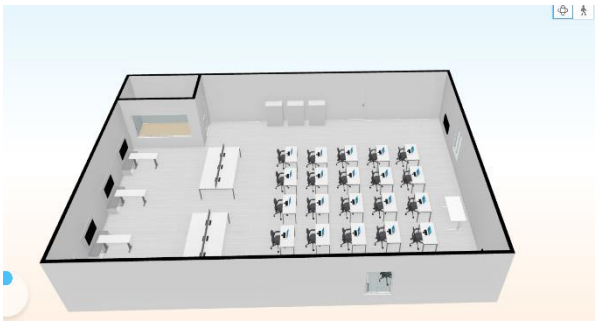
GOALS:
- To help students become critical thinkers, problem solvers, and lifelong learners
- Practice engineering concepts

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis
- Robotics
- Computer simulations and instruction

ENVIRONMENTAL CONSIDERATION:
- Consider future technology needs; build-in flexibility to retain options
- Uniform lighting
- Rooms designed for ease of movement and accessibility; Students need to be able to move around the worktables
- OSHA requirements maintained
- Electrical outlets for equipment
- Windows to provide natural light
- Window treatment to darken room

Features of maker space/workshop:
- White erase board (16 FT) on two walls
- 16’ tack board
- Counters on 2 walls with plug mold above the counter for tools.
- 48” wide lockable tote tray cabinet and 35” wide tall cabinet with adjustable shelves
- Exhaust system for dust
- Movable two or four-person wood worktables and ceiling hung electric cords.
- Wall cabinets with adjustable shelving. About half of the casework should be lockable.
- The emergency cut-off switch in each classroom for all utilities should be wall mounted high enough not to be accidentally activated and should be placed in at least two locations.
- Goggle storage and sterilization with adequate ventilation.
- Fume hood with full utilities (water, sink, gas, and light) is needed in that fits in a standard cabinet (24" x 36").
- A safety station is to be installed, with shower, automatic shut-off eyewash, and drain with a sloped floor, and should accommodate persons with disabilities.
- The shower and eyewash should have a spring loaded mechanism.
- Master cutoff for water and electricity needs to be easily accessible to the teacher and located so that students can’t get to it. The emergency cut-off key should be removable in the “on” position.

Integration of Technology Engineering and Computer Science (InTECS)



SIZE:
- 2,400 SF

ANCILLARY SPACES:
- Lab/classroom
- Storage
- Near PLTW labs

GOALS:
- Flexible space and layout
- To help students become critical thinkers, problem solvers, and lifelong learners

PROGRAM ACTIVITIES:
- Large and small group instruction
- Hands-on activities
- Team teaching
- Data collection and analysis

ENVIRONMENTAL CONSIDERATION:
- Uniform lighting and task lighting
- Rooms designed for ease of movement and accessibility;
- Electrical outlets for equipment
- Windows to provide natural light

Fixed Equipment
- 60 Locking cubbies for individual student supplies
- 2 - Mounted Whiteboards (48" X 85")
- 2 - Mountable goggle cases
- Large stainless sink (gooseneck)
- Tackboard wall (48" X 85")
- Clock

Loose Furnishings:
- 5 - collaboration stations with Computer monitor (wireless link to computer)
- 25 - 30 student chairs and computer/drafting workstations (combination of the two)
- Scanner table
- Printer table
- Heat press table
- Mobile computer cart
- 2- Work tables on castors with power (6’ X 36”)
- 2 - Mobile makerspace carts
- 5 - Cushioned/non slip floor mats Teacher’s desk/workstation and chair
- Two (2) file cabinets w/lock, 4-drawer
- Lockable teacher wardrobe with coat rod; tall cabinet w/ shelving (may be one unit)
- 3 - Locking storage cabinets (36"Wx24"Dx84"H)
- 2 - Mobile Whiteboards (3'x5')

Classroom Technology;
See Instructional Technology pg. 10

CTE HUB

Misc. Equipment provided by Owner

Interactive panels

25-30 Gaming or High Performance computers with VR capability (preferable AIO with a touch screen and unbreakable screen)

25 - 30 Microsoft Surface Pro with pens

25 - 30 headsets with mic

25 - 30 VR headsets

Teacher Gaming computer and Microsoft Surface Pro with pen

Self feeding scanner

Color printer - double sided printing capabilities

Large format printer

Laser Printer

2 - Automated Heat press machine

3 - 3D printers

2 - Zspace systems

Table top machine bundle (scroll saw, drill press, sander, etc.)

UV sanitizing light machine

Materials testing machine

STORAGE AREAS

SIZE:
- 2 @150 SF
- 600 SF Material storage shared

SPATIAL RELATIONSHIPS:
- Student storage must be open to the PLTW classroom/lab for monitoring
- Material storage must be lockable and adjacent to the Workshop/Design Lab
- InTECS material storage adjacent to lab

GOAL:
- Provide storage for supplies and equipment
- Provide storage for student works in process

ENVIRONMENTAL CONSIDERATIONS:
- Uniform lighting
- Double doors with removable mullion on material storage

Fixtures – Material Storage

Shelving on two walls:

Adjustable shelving - 12” deep

Adjustable shelving - 24" deep

Fixtures – Student

40 Project Lockers (12” X 20”)

NOTES:

Appendix A

Generic Language for all Regional Special Education Programs

PGCPS offers a continuum of services to students with special needs. To the extent possible students are educated in their home school using co-teaching, occasional 'pull-out' focused on intervention, or self-contained classroom settings. The number of students and range of teaching options may vary from year to year and all classrooms should be designed to accommodate all students regardless of their disabilities.

Special education facilities will be integrated throughout the school to support the concepts of inclusion and the specialized requirements for the students. Special attention will be given to accessibility of all facilities and an integrated learning program.

This school will serve students in the Regional Special Education program in a self-contained environment. The students often have multiple physical, medical, and instructional disabilities. Provide the following spaces in a contiguous block along a corridor shared with general education functions and spaces.

.

Space	Design Guideline			Comments
	Qty.	Sq.Ft.	Total	
Classrooms	3	900	2,700	
Toilet/Changing Rooms	3	100	300	
OT/PT	1	800	800	Includes extra equipment storage area
Life Skills Lab w/ Laundry	1	800	800	
- Office	2	150	300	Coordinator and Itinerant
- Conference Room	1	250	250	
- Teacher Support Room	1	250	250	
Total			**5,400**	
TOTAL # of SRC Rooms	**3**			

Appendix A

General Planning Considerations

Rooms can be clustered in traditional wing configuration with availability within the building to provide maximum contact between all students and staff. Support areas are to be located near the classrooms. All students in this program have Individual Education Plans (IEP), which specifies the services each student requires and the specific staffing that is required to implement their IEPs as indicated in the PGCPS Special Education Staffing Plan.

This program assumes that the school has a health clinic. If there is no clinic, the health suite requirements for the regional program should be modified to include a clinic layout.

1. Goals

- Develop sensory and motor skills
- Develop functional daily living skills
- Develop socialization skills
- Develop basic academic functional readiness
- Develop augmentative and verbal communication skills
- Develop appropriate work habits
- Develop work study skills
- Develop behavioral skills
- Develop activities which lead to greater utilization of leisure time

2. Planned Activities

- Motor Development/M.O.V.E. activities
- Total classroom group instruction
- Gross and fine motor activities
- Individualized instruction
- Arts and crafts activities
- Computer use
- Interdisciplinary instruction with classroom teacher and specialists
- Utilization of audiovisual equipment
- Vocational workshop activities

3. Number of Participants

- 21-28 Students with multiple disabilities
- 6-7 students per classroom

4. **Staff Required**

- Three to five (3-5) Teachers
- Three to five (3-5) Paraprofessionals
- One (1) Coordinator/Specialist
- One (1) Speech Therapist
- One (1) Health Technician

5. Groupings

- Small groups of 6-7 students
- Students working individually or in small groups

6. Relationship to Other Activities

- Convenient access to bus pick up and drop off point
- Direct access to middle school
- M.O.V.E./Motor/PT/OT Room should be situated closest to middle school
- Health Room should be adjacent to the school's health suite and coordinator's office (if adjacency is not feasible a larger separate health suite must be designed)

7. Environmental Requirements

- Thermal – Special consideration to ventilation in bathrooms and storage areas. Need special attention to on-floor activities.
- Acoustical – Particular attention to external equipment noise

9. Display for each classroom

- One (1) Tack board 4' x 8'
- One (1) Magnetic Marker board 4' x 8'

10. Support Facilities

- Bathroom/Changing rooms directly accessible to each classroom

11. Furniture and Equipment

Furniture and equipment not listed have generic requirements listed in General Building Considerations. Items marked with an asterisk (*) are to be provided In Contract (IC).

Academic Classroom

<u>Furniture and Equipment</u>

- 4 ceiling hooks for suspended equipment
- 2 Rifton Positioning Chairs
- 2 large teacher desks
- 1 small teacher desk
- 3 teacher desk chairs
- 3 adult chairs w/wheels
- 1 rectangular height adjustable table
- 2 round height adjustable tables
- 2 file cabinets w/locks and four drawers
- 1 art cabinet with wheels
- 2 computer tables with 2 computers, 1 for students to share and 1 for teacher
- 3-6 student chairs as needed
- 3-6 student adjustable desks as needed
- Full body-size wall mirror
- Coat rack with 6-7 hooks
- Mobile cart for TV and VCR-Up to date Technology Equipment as outlined in all classes
- Mat Table
- Large Wedge with straps for positioning

Classroom Utilities

- Ten (10) 115 volt duplex outlets per classroom
- Sink with hot and cold water, wheelchair accessible
- Minimum of five (5) computer outlets with isolated ground receptacles
- CATV outlets

Storage

- The storage closets need to be long and narrow (about 5' to 6') with entrances on either end or folding partition for easy access
- Built in cabinets on one (1) wall, w/locks accessible to teacher
- Built in cabinets below sink and counter
- Built in cabinets above sink
- On one wall, two (2) shelves 15' long and 1' deep
- On one wall, two (2) shelves 10' long and 2' deep

Bathroom/Changing Room

Furniture and Equipment

- 1 Rifton Blue Wave Toilet System
- 1 Height Adjustable Electric Changing table
- 1 Hoyer Lift
- 2 Handicap accessible adult toilets
- 1 Handicap accessible adult sink
- Built in cabinets below sink and counter
- Built in cabinets above sink

Conference Room

Furniture and Equipment

- 1 large conference table with 12 chairs
- 1 Tack Board 4' x 8'
- 1 LCS Liquid Chalk Markerboard
- Mobile cart with TV and VCR

Coordinator/Specialist Office

Furniture and Equipment

- 3 teacher desks
- 3 adult desk chairs with wheels
- 3 filing cabinets

Health Room

Furniture and Equipment

- Bathroom with 1adult size accessible toilet and sink
- Sink with counter space and built in cabinets above and below sink
- 1 electrical height adjustable changing table
- Refrigerator with ice maker for medications
- 2 Adult desks and chairs

- Locking file cabinet

Utilities

- 115 volt duplex outlets
- Sink with hot and cold water, wheelchair accessible
- Multiple computer outlets
- CATV

Storage

- Built in cabinets on one (1) wall, w/locks accessible to teacher
- Built in cabinets below sink and counter
- Built in cabinets above sink

Instructional Kitchen

Furniture and Equipment

- Sink: Split level sink accommodating students in wheelchairs and students who can stand
- Extended flat sided handles at the sink
- Extended faucet
- Wheel chair accessible work counter to include space for a microwave
- Stove: Knobs on the front, angled mirror above to reflect stove top surface
- Refrigerator: Side by side with roll out bins
- Mounted jar opener and can opener

Utilities

- Five (5) 115 volt duplex outlets
- Sink with hot and cold water, wheelchair accessible

Storage

- Cabinets: wheelchair accessible, drawers with slide out bins & shelves, drawer handles large enough for a hand to slip through

Laundry Room

Furniture and Equipment

- Commercial Washer & Dryer
- Sink with counter space and built in cabinets above and below sink

Utilities

- 100 and 220 volt as needed

Storage

- Built in cabinets on one (1) wall, w/locks accessible to teacher

M.O.V.E./Motor/PT/OT/Room

Furniture and Equipment

- 4 ceiling hooks for suspended equipment

- 4 Folding mats
- Physical Therapy training stairs
- Large Therapy Ball
- Large Mobile Mirror
- Mobile cart with TV and VCR

Utilities
- Ten (10) 115 volt duplex outlets per classroom
- Sink with hot and cold water, wheelchair accessible
- Two (2) computer outlets with isolated ground receptacles
- CATV Outlets

Storage
- Built in cabinets on one (1) wall, w/locks accessible to teacher
- 1 large storage cabinet with locks
- Built in cabinets below sink and counter
- Built in cabinets above sink

Speech Therapy Room

Furniture and Equipment
- 1 Teacher desk and chair
- 2 drawer file cabinet with locks
- 2 adult chairs with wheels
- 1 height adjustable table
- 4 student chairs
- Mobile cart with TV and VCR

Utilities
- 115 volt duplex outlets
- Sink with hot and cold water, wheelchair accessible
- Two (2) computer outlets with isolated ground receptacles
- CATV Outlets

Storage
- Built in cabinets on one (1) wall, w/locks accessible to teacher
- Built in cabinets below sink and counter
- Built in cabinets above sink

Special Education Regional Program Specification Notes

- Automatic doors are to be installed wherever needed in this facility.
- Corridors near classrooms to have alcoves for wheelchairs with quick single lane parking, handles out.
- Parking area for 15-20 and 2 spaces for Parking for the Handicapped with easy access to Special Education Wing.

Appendix C

High School Based Health Center Space Requirements

Space	Design Guideline			Comments
	Qty.	S.F.	Total	
Reception/ Waiting Area	1	150	150	
Exam Rms.#1	1	80	80	
Exam and Dental #2	1	160	160	
Lab/charting area	1	100	100	
Provider Offices	2	120	240	
Mental Health conference rm	1	200	200	
Storage	2	50/80	130	
Toilet	2	50	100	
Total			**1,160**	
@ 1.35			**1,600**	

The School Based Health Center should be located near the front entrance. During the day, all visitors must enter through the school security vestibule. However, an outside entrance is desirable so the clinic could operate when the school is closed. The design for this space must be flexible to allow for alternative uses if it is not used as a SBHC.
The following specifications indicate the full outfitting of the space. A final decision will be made prior to final furniture selection.
The clinics offer a variety of services to students including

- Immunizations
- Diagnosis and treatment of Minor/Acute/Chronic Health Problems
- Physical Examinations
- Laboratory Testing

Mental Health Services

- Individual Mental Health Assessment, Treatment, and Follow-up
- Group Counseling
- Substance Abuse Education/Counseling

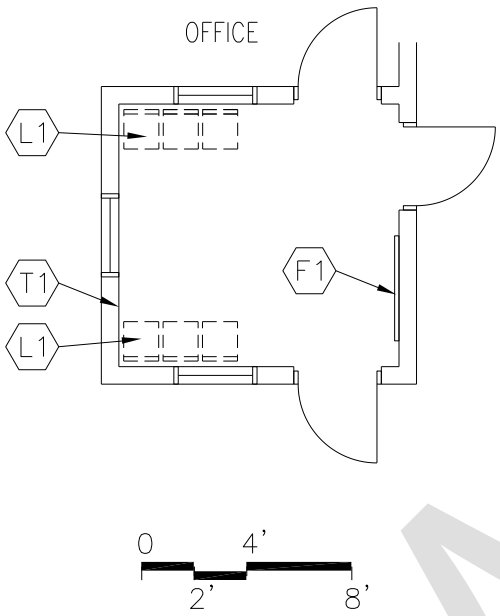
Health Education Services

- Abstinence Education
- Weight Reduction and Healthy Living
- Diabetes Education/Management
- Asthma Education/Management

Dental Health Services

- Dental Assessments
- Dental Hygiene Education
- Dental Referrals for Restorations

RECEPTION/ WAITING AREA



QUANTITY:
- 1

CAPACITY:
- Up to 6 people

SIZE:
- 150 SF

SPATIAL RELATIONSHIPS:
- First space one enters in Health Suite
- Ground floor
- May include Nurse's desk and work station (see office for description of F&E)

GOAL:
- To provide an area for students waiting to see the nurse or for parent pick-up

ENVIRONMENTAL CONSIDERATIONS:
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting
- Windows to provide natural light

Built-in Fixtures:
F1 Tack board
- Brochure rack

Loose Furnishings:
L1 4-6 visitor chairs
- 2 Side tables w/ lamps
- Teacher desk and chair
- Mounted monitor for educational videos

Room Technology:
T1 Voice port
Data port for monitor
wireless

Finishes:
Flooring:
- Moisture and stain-resistant finishes

Counter Tops:
- Chemical-resistant

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Appendix B

EXAM ROOM #1

QUANTITY:
- 2

CAPACITY:
- Up to 3 people

SIZE:
- 80 SF

GOAL:
- To provide school based health services

PROGRAM ACTIVITIES:
- First aid
- Health screening
- Medical treatments
- Medication administration

SPATIAL RELATIONSHIPS:
- Located in the health clinic
- Near Waiting Area

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Electrical outlets for equipment
- Sink with hot and cold water/gooseneck with paddle handles

Built-in Fixtures:
Cubicle curtain
Soap dispenser
Towel dispenser
Casework: Base/wall cabinets around sink

Loose Furnishings:
Ergonomic chair
Exam table

Room Technology:
Voice port and phone
Data port

Finishes:
Flooring:
- Moisture and stain-resistant finishes

Counter Tops:
- Chemical-resistant

Appendix B

EXAM RM #2

QUANTITY:
- 1

CAPACITY:
- Up to 3 people

SIZE:
- 120 SF Operatory
- 30 SF storage

GOAL:
- To provide school based dental services

PROGRAM ACTIVITIES:
- Check-ups
- Cleaning
- Education

SPATIAL RELATIONSHIPS:
- Located in the health clinic
- Near Waiting Area

ENVIRONMENTAL CONSIDERATIONS:
- Adequate ventilation
- Electrical outlets for equipment
- Sink with hot and cold water
- Utilities for the dental chair per the manufacturers direction

Built-in Fixtures:
Cubical curtain
Soap dispenser
Towel dispenser
Casework: Base/wall cabinets around sink
Lockable cabinets in the storage closet

Loose Furnishings (TBD):
Dental chair with overhead light and sink attachments
Dentist's stool
Assistant's stool
Refrigerator in the storage area

Room Technology:
Voice port and phone
Data port

Finishes:
Flooring:
- Moisture and stain-resistant finishes

Counter Tops:
- Chemical-resistant

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Appendix B

LAB/CHARTING AREA

- 1

CAPACITY:
- Up to 2 medical staff

SIZE:
- 100 SF

SPATIAL RELATIONSHIPS:
- Near Waiting Area/Reception
- Adjacent to toilet

GOAL:
- To provide for lab test and storage
- To provide a counter and plumbing for private chart maintenance

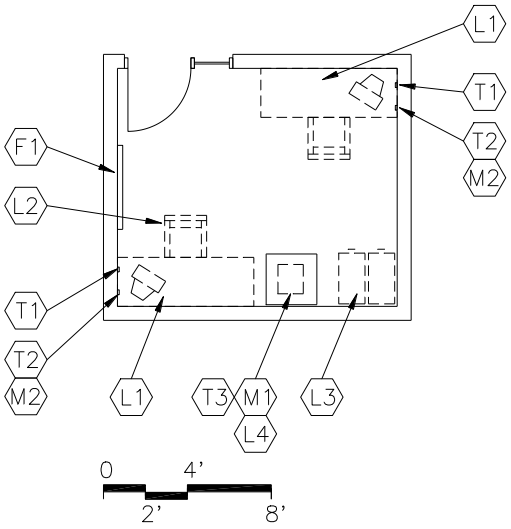
Plumbing:
Sink with hands free handles
Hook-up for refrigerator with ice maker

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- OSHA requirements maintained
- Uniform lighting
- Wheelchair accessibility

Built-in Fixtures:
Tack board (4 LF)
Sink w/soap dispenser
Towel dispenser
Specimen door to toilet
Casework:
Base cabinets and shelving along one wall

Room Technology:
Voice ports and phones
2 data ports

OFFICES



QUANTITY:
- 2

CAPACITY:
- Up to 2 people

SIZE:
- 120 SF (includes 50 SF adult toilet)

SPATIAL RELATIONSHIPS:
- Adjacent and visual into Waiting Area/Reception

GOAL:
- To provide an office for the staff to perform clerical functions

PROGRAM ACTIVITIES:
- Computer input
- Conferences with staff and other visitors
- Paperwork
- Planning
- Telephone calls

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  - Wall minimum: STC 45
  - Ceiling minimum: CAC 35
- Uniform lighting

Built-in Fixtures:
F1 Tack board

Loose Furnishings:
L1 1 desk
L2 1 ergonomic task chair
L3 1, 4-drawer file cabinet
L4 Printer table
Guest chair

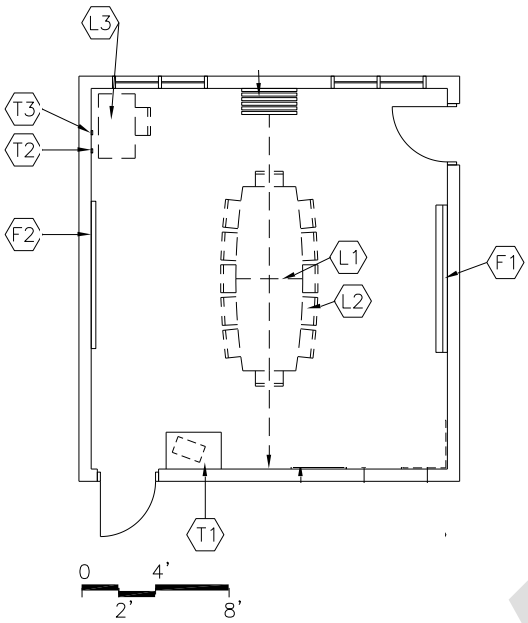
Room Technology:
T1 Voice port and phone
T2 Data port near workstation
T3 Data port for printer

Miscellaneous Equipment (owner provided):
M1 Printer
M2 Computer

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Appendix B

MENTAL HEALTH CONFERENCE ROOM



CAPACITY:
- Staff
- Teachers
- Visitors

SIZE:
- 200 SF

SPATIAL RELATIONSHIPS:
- Near Mental Health Office

GOAL:
- To provide an area adequate for small and medium group conferences
- To provide and area for testing.

PROGRAM ACTIVITIES:
- Group counseling and mediation
- Staff collaboration

ENVIRONMENTAL CONSIDERATIONS:
- Auditory privacy
- Electrical outlets for equipment
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Uniform lighting

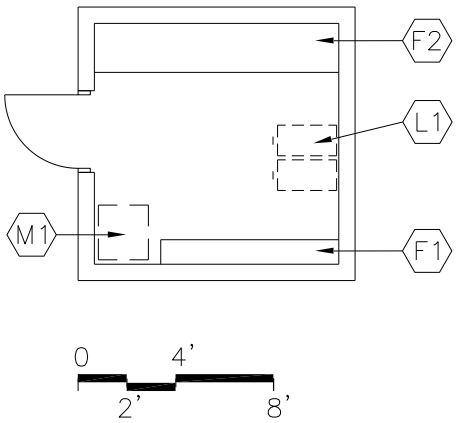
Built-in Fixtures:
F1 Marker board (8 LF)
F2 Tack board (8 LF)
- Manual projection screen

Loose Furnishings:
L1 1-2 Conference tables for 10 w/ conference room technology built-in
L2 12-15 stackable chairs
L3 Computer workstation furniture

Room Technology:
T1 1 video port, monitor
T2 1 voice port and phone
T3 2 data ports
- Design for computer aided presentations (electrical outlets from table for projection device, screen along short wall, light darkening capability)

NOTES:

STORAGE AREAS



QUANTITY:
- 1

CAPACITY:
- Up to 1 person

SIZE:
- 50/80 SF

SPATIAL RELATIONSHIPS:
- Adjacent and access to Treatment Area

GOAL:
- To provide storage for medical supplies and equipment

PROGRAM ACTIVITIES:
- Storage

ENVIRONMENTAL CONSIDERATIONS:
- Security of equipment, supplies, and medicines
- Uniform lighting

Built-in Fixtures:
F1 Storage shelving - 12" deep
F2 Storage shelving - 24" deep

Loose Furnishings:
L1 File cabinets

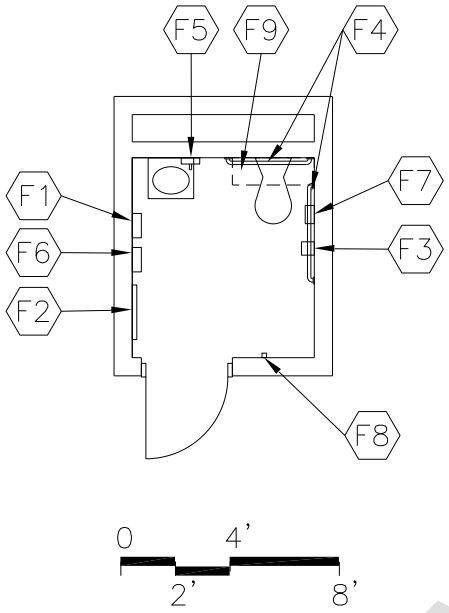
Miscellaneous Equipment:
M1 Refrigerator (lockable) with ice maker (may be in treatment room instead)

Plumbing:
Plumbing connections
- Ice maker, refrigerator

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

Appendix B

STUDENT TOILET



QUANTITY:
- 2

CAPACITY:
- Up to 1 person

SIZE:
- 50 SF

SPATIAL RELATIONSHIPS:
- Located within Health Clinic adjacent to the Lab with a pass-thru for samples

PROGRAM ACTIVITY:
- Personal and health needs for the health clinic

ENVIRONMENTAL CONSIDERATIONS:
- Adequate exhaust/ventilation
- Environmental sound control:
  Wall minimum: STC 45
  Ceiling minimum: CAC 35
- Moisture- and stain-resistant finishes
- Wheelchair Accessibility
- Uniform lighting

Built-in Fixtures:
F1 Towel dispenser
F2 24" x 60" mirror
F3 Toilet tissue holder
F4 36” and 42” grab bars
F5 Soap dispenser
F6 Sanitary dispenser
F7 Sanitary disposal
F8 Coat hook
F9 Casework: Wall cabinet

Plumbing

ADA accessible sink
Toilet
Shower with floor drain

NOTES: Loose furnishings and features shown represent one of many possible arrangements.

APPENDIX: Phys Ed Guidelines

State of Maryland
Physical Education Guidelines

Appendix C

PHYSICAL EDUCATION FACILITIES GUIDELINES

FOR NEW CONSTRUCTION AND MAJOR RENOVATIONS

MARYLAND STATE DEPARTMENT OF EDUCATION
Preparing World-Class Students

June 2011

Appendix C

5.0 Secondary School Facilities Design Guidelines

5.1 Main Gymnasium (Secondary)

Purpose/Activities
Secondary physical education instruction including games, dance, gymnastics, fitness and assessment through lecture, demonstration, and use of instructional technology and equipment and sports such as basketball, volleyball, wrestling, gymnastics, badminton, and indoor soccer

Users
1-2 teachers, typically 25-35 students per teacher, whole class, small group, and individual activities

Area, Height, Volume, Configuration
Middle School – 6,800 sq feet minimum
High School – 10,000 sq feet minimum

Should be at least the size of two basketball courts and should be able to be divided into two private teaching stations large enough to handle two classes of typically 25-35 students.

The ceiling should have a minimum height of 24' of clear space, free of obstacles and lights.

Relationships to other spaces
Should have easy access to outdoor instructional areas in order to facilitate quick transitions from indoor to outdoor facilities

Direct access to locker rooms, teacher office, storage

Acoustics
Limit background noise to 40 dB. Treat walls and ceilings for excess reverberation. Provide STC rating of 60 for walls and ceiling assemblies between adjacent spaces. See ANSI S12.60-2002.

Accessibility
Provide access for persons with disabilities to all program elements.

Display
Provide bulletin boards for class notices and instructional materials, white board or projection screen and television/DVD/VCR.

In Room Storage
Boundaries of the instructional space should be clearly defined to exclude the areas in which tables or other equipment is stored.

There should be a minimum safety zone of 10 feet between stored items and the instructional area.

Storage
Provide indoor and outdoor storage rooms. See elementary school facilities.

Finishes
Floor surface should be hardwood.

Gymnasium walls should have a smooth or flat surface from the floor up to 10 to 15 feet of height.

Mechanical & Plumbing
The gymnasium should provide mechanical heating, ventilating, humidity, and air conditioning systems to ensure healthy indoor environmental quality.

Electrical, Lighting & Telecommunications
Lights should be covered with protective grids.

Illumination should be sufficient to facilitate the instructional program (e.g., ball handling activities: striking with the body; striking w/paddles; volleyball).

Should be uniformly lit and free from shadows

Provide an ample number of electrical power outlets for routine maintenance, instructional equipment, general convenience, and computers. Provide both floor and wall outlets.

Provide minimum per MSDE standards: 1 data, 1 voice, and 1 video outlet. One set per teacher recommended.

If room will be used for public assemblies, provide an assistive listening device for people with hearing disabilities.

Appendix C

5.2 Auxiliary Gymnasium (Secondary)

Purpose/Activities
Secondary physical education instruction including games, dance, gymnastics, fitness and assessment through lecture, demonstration, and use of instructional technology and equipment and sports

Users
1 teacher, typically 25-35 students, whole class, small group, and individual activities

Should be built to accommodate a class of 25-35 students

Area, Height, Volume, Configuration
Middle School – 3,200 sq feet
High School – 6,000 sq feet

The ceiling should have a minimum height of 20' of clear space free of obstacles and lights and a preferred height of 24' of clear space.

Relationships to other spaces
Should have easy access to outdoor instructional areas in order to facilitate quick transitions from indoor to outdoor facilities

Acoustics
Limit background noise to 40 dB. Treat walls and ceilings for excess reverberation. Provide STC rating of 60 for walls and ceiling assemblies between adjacent spaces. See ANSI S12.60-2002.

Accessibility
Provide access for persons with disabilities to all program elements.

Display
Provide bulletin boards for class notices and instructional materials, white board or projection screen and television/DVD/VCR.

Finishes
Floor surface should be hardwood, adequate cushioning, or a synthetic composition product with appropriate markings.

Gymnasium walls should have a smooth or flat surface from the floor up to 10 to 15 feet of height.

Storage
Provide indoor and outdoor storage rooms. See elementary school facilities.

Mechanical & Plumbing
Should provide mechanical heating, ventilating, humidity, and air conditioning systems to ensure healthy indoor environmental quality

Electrical, Lighting & Telecommunications
Lights should be covered with protective grids.

Illumination should be sufficient to facilitate the instructional program (e.g., ball handling activities: striking with the body; striking w/paddles; volleyball).

Should be uniformly lit and free from shadows

Power and telecommunications, same as Main Gymnasium (Secondary)

5.3 Specialized Smaller Designated Space (Secondary)

Purpose/Activities
Secondary physical education instruction through lecture, demonstration, and use of specialized equipment for programs such as strength training, fitness/aerobics, adventure education (climbing walls), and dance

Users
Should be built to accommodate a class of 25-35 students

Area, Height, Volume, Configuration
As needed for programmed activities

Relationships to other spaces
Convenient to other physical education instructional and support spaces.

Acoustics
Limit background noise to 40 dB. Treat walls and ceilings for excess reverberation. Provide STC rating of 60 for walls and ceiling assemblies between adjacent spaces. See ANSI S12.60-2002.

Accessibility
Provide access for persons with disabilities to all program elements.

Display
Provide bulletin boards for class notices and instructional materials, white board or projection screen and television/DVD/VCR.

Finishes
Flooring, wall, and ceiling surfaces to support specific activity

Storage
As needed to support programmed activities

Mechanical & Plumbing
Should provide mechanical heating, ventilating, humidity, and air conditioning systems to ensure healthy indoor environmental quality

Electrical, Lighting & Telecommunications
Lights should be covered with protective grids.
Illumination should be sufficient to facilitate the instructional program (e.g., ball handling activities: striking with the body; striking w/paddles; volleyball).

Should be uniformly lit and free from shadows

Power as needed to support specialized equipment.

Telecommunications minimum, same as gymnasium

5.4 Teacher Office (Secondary)

Purpose/Activities
Office space for teacher planning, consultation, dressing, and storage

Users
Teachers, coaches

Area, Height, Volume, Configuration
120 nsf per full time teacher

Relationships to other spaces
Adjacent to gymnasium and locker rooms

Acoustics
Standard office

Display
Provide bulletin and display boards for teacher's use.

Storage
Filing cabinets, book cases, wardrobe units, First Aid supplies

Finishes
Standard office flooring, wall, and ceiling

Mechanical & Plumbing
Provide mechanical heating, ventilating, humidity, and air conditioning systems to ensure healthy indoor environmental quality.

Private toilet and shower room desirable if space permits. Toilet/shower rooms for occupants of individual offices must be accessible or adaptable for use by persons with disabilities.

Electrical, Lighting & Telecommunications
Standard office lighting and power

1 data outlet minimum per occupant plus additional data outlets for networked devices as required

1 voice outlet minimum

5.5 Indoor Storage (Secondary)

Purpose/Activities
Distribution, collection, and storage of physical education equipment

Users
Teachers, coaches, recreation program personnel, students

Area, Height, Volume, Configuration
400 to 600 nsf

Clear height of 12'-15'

8' high double doors to allow for movement and storage of large equipment

Provide adequate space with reasonable ease of access to needed equipment.

Provide labeled high racks, shelving, and hanging devices to maximize use of space and manage inventory.

All physical education equipment should be marked for purposes of keeping an updated inventory and to guard against loss or theft.

Relationships to other spaces
Adjacent to gymnasium

Convenient to teacher office, locker rooms, and access to outdoors

Isolate physically from outdoor storage rooms to minimize routes for pests to enter building.

Provide separate lockable area for equipment used by classroom teachers and/or for recess.

Provide separate secure storage areas for use by recreation and athletic programs.

Acoustics
Locate storage rooms to serve as buffers around noisy spaces.

Appendix C

Display
Provide small bulletin or notice board for announcements and record keeping.

Finishes
Standard storage room floor and wall, open ceiling acceptable

Mechanical, Plumbing, Electrical, Lighting & Telecommunications
Standard storage room utilities and lighting

Floor drain and access to hose bib for cleaning room desirable

Provide minimum 1 data outlet and 1 voice outlet in all storage rooms greater than or equal to 100 nsf to accommodate record keeping and future uses.

5.6 Outdoor Storage (Secondary)

Purpose/Activities
Distribution, collection, and storage of outdoor physical education equipment

Users
Teachers, students, coaches, recreation program personnel

Area, Height, Volume, Configuration
400 to 600 nsf, room or separate building

Clear height of 12'-15'

8' high double doors to allow for movement and storage of large equipment

Provide adequate space with reasonable ease of access to needed equipment.

Provide labeled high racks, shelving, and hanging devices to maximize use of space and manage inventory.

All physical education equipment should be marked for purposes of keeping an updated inventory and to guard against loss or theft.

When feasible, design canopies or overhangs to provide shelter in case of inclement weather.

Relationships to other spaces
Locate away from occupied classrooms.

Locate close enough to school building to permit convenient access to equipment.

Provide separate lockable area for equipment used by classroom teachers and/or for recess.

Provide separate secure storage areas for use by recreation and athletic programs.

Acoustics
Locate storage rooms to serve as buffers around noisy spaces.

Display
Provide small bulletin or notice board for announcements and record keeping.

Finishes
Standard storage room flooring and wall surfaces, open ceiling acceptable

Mechanical, Plumbing, Electrical, Lighting & Telecommunications
Standard storage room utilities and lighting

Floor drain and access to hose bib for cleaning room desirable

Provide minimum 1 data outlet and 1 voice outlet in all storage rooms greater than or equal to 100 nsf to accommodate record keeping and future uses.

Provide separate restroom facilities for recreational program groups using outdoor facilities.

5.7 Classroom (Secondary)

Purpose/Activities
Secondary physical education instruction through lecture, demonstration and use of instructional technology in subjects such as health education, fitness, wellness, and nutrition

Users
Should be able to accommodate typically 25-35 students

Area, Height, Volume, Configuration
Middle School – 800 sq feet
High School – 900 sq feet

Relationships to other spaces
Convenient to other physical education facilities

Acoustics
Limit maximum background noise level to 35 dB., maximum reverberation time to 0.6 seconds, and minimum STC rating of 45 to adjacent spaces. See ANSI S12.60-2002.

Accessibility
Provide access for persons with disabilities to all program elements.

Display
Standard classroom – marker/chalk/white boards, LCD projector

Finishes
Standard classroom – acoustical ceiling, painted walls, hard surface flooring

Storage
Standard casework, teacher storage closet, bookcases

Mechanical & Plumbing
The classroom should provide mechanical heating, ventilating, humidity, and air conditioning systems to ensure healthy indoor environmental quality.

Electrical, Lighting & Telecommunications
Should have internet access, a computer, and screen which can be used with an LCD projector.

Minimum 5 data, 1 voice, and 2 video outlets per MSDE standards

5.8 Locker Rooms (Secondary)

Purpose/Activities
Storage of personal items for each student enrolled in physical education

Users
Locker room space should also be provided for sports teams and visiting teams.

Area, Height, Volume, Configuration
Locker room design provides for student supervision and safety.

Locker rooms should provide restroom facilities, individual showers, sinks, and paper towels for student use as needed.

Relationships to other spaces
Locker rooms should have access to the outside in case of emergencies.

Convenient to equipment storage rooms

Adjacent to the physical education teacher's office to allow students convenient access to their teacher for supervision, consultation and/or assistance

Acoustics
See ANSI S12.60-2002.

Accessibility
5%, but not less than one of all fixed and built-in seats, table, work surfaces and storage units, including lockers, must be accessible to persons with disabilities, per ADA.

Display
Bulletin boards, marker boards, electronic display

Finishes
Durable, easily maintained, anti-slip flooring in wet areas

Storage
Towels, equipment, uniforms, etc.

Mechanical & Plumbing
Provide an accessible shower, locker and changing area, per ADA.

Provide towel washing and drying facilities as needed.

Electrical, Lighting & Telecommunications
Protected for wet areas, toilet, shower

Sufficient power for custodial services

Control humidity.

5.9 Bleachers (Secondary)

Purpose/Activities
Gymnasiums may be built with bleachers for seating during classes, assemblies, sports events, before- and after-school programs, and weekend recreational activities.

Users
Children and adults (One large Maryland school system provides seating for 80% of the school capacity.)

Area, Height, Volume, Configuration
Bleachers should meet specifications determined by the individual district and the manufacturer of the bleachers. The International Building Code includes provisions regulating guardrails, openings, and regular safety inspections.

It is of utmost importance that the gymnasium be free from potential safety hazards such as protruding structures.

Appendix C

Boundaries of the gymnasium should be clearly defined to exclude the area in which bleachers or other equipment is stored.

Relationships to other spaces
Should be a space between open bleachers and the instructional area

Accessibility
Bleacher design must include seating for persons with disabilities, per ADA.

5.10 Outdoor Hard Surface Area (Secondary)

Purpose/Activities
Physical education and fitness instruction, practice, games, and drills

Users
1 teacher, typically 25-35 students

Area, Height, Volume, Configuration
Provide sufficient space for students to move freely and safely.

110-150 nsf per child

2,200-4,500 nsf per space recommended

Provide a level area, sloped to drain, approximately 50' x 80' typical.

Surface may be asphalt or a synthetic product designed for outdoor physical education instruction.

Relationships to other spaces
Isolate from the general play areas to ensure physical education instruction may be conducted without interruptions by other classes.

Accessibility
Provide accessible or adaptable equipment such as benches with backs and arms or adjustable height basketball nets.

Provide accessible routes from the school building into and around the hard surface area.

Display
Mark all-weather outdoor surfaces with circles, lines, courts, etc. to permit participation in a wide variety of activities that are appropriate for students with varied ability levels.

Mechanical & Plumbing
Provide access to drinking water.

Electrical, Lighting & Telecommunications
Provide access to electrical power.

Provide security and task lighting as appropriate.

Public Address Systems
Within range for emergency announcements

5.11 Outdoor Playing Fields (Secondary)

Purpose/Activities
Physical education and fitness instruction, practice, games, and drills

Users
Teachers, students, coaches, recreation personnel

Area, Height, Volume, Configuration
150' x 300' per class

If permanent structures such as backstops, volleyball standards, benches, and goals are present they should be inspected and maintained regularly.

Provide area for students to gather as a class.

Provide access to shade if possible.

Relationships to other spaces
Location shall allow for instruction without interruption and away from occupied classrooms.

Accessibility
Provide accessible route from school building to and around edge of fields.

Display
Provide notice boards protected from the weather for posting announcements and rules.

Storage
Provide lockable storage containers as required.

Mechanical & Plumbing
Provide access to drinking water.

Electrical & Lighting
Security and task lighting and power as required

Telecommunications & Public Address Systems
Emergency communications as required

5.12 Secondary Pools

This document does not address pools or specific guidelines for pools. However, pools are an eligible expense under the PSCP. If a district desires to add a pool under new construction or renovations, it should seek the services of knowledgeable design consultants for pools and pool construction. Acoustics, accessibility, safety, and mechanical considerations are key design elements.

5.13 Secondary Indoor & Outdoor Spaces for Sports

Courts and fields to be used for interscholastic sports must comply with the design standards of the individual sport's governing body. Stadia may be designed to support interscholastic sports.

The website for the National Federation of State High School Associations (NHFS) (www.nfhs.org) includes court and field diagrams for the following sports: basketball, football, soccer, track and field/cross country, baseball, field hockey, softball, and volleyball (see Appendix H). The Maryland Public Secondary Schools Athletic Association is a member of NFHS.

For tennis, see the United States Tennis Association (www.usta.com) and for golf, see the United States Golf Association (www.usga.org).

See specific sports associations for archery, lacrosse, wrestling, gymnastics, water polo, swimming, and diving.

5.13.1 Synthetic Surfaces

There is a trend toward the use of synthetic, all-weather, track and field surfaces in new high schools. Similarly, synthetic turf is frequently specified for the main football or soccer field in a new stadium complex. The cost of the synthetic surface fields is sometimes shared with local parks and recreation departments, local semi-professional leagues, or sports clubs. Exterior lighting for night games and recreation programs is desirable.

Synthetic surfaces have an advantage over natural grass fields in that they can be used throughout the year and under most weather conditions. They are sometimes criticized for increasing injuries and increasing temperatures of the playing surface. The estimated cost for converting high school fields ranges from $700,000 to $1.2 million.

5.14 Secondary Equipment Guidelines

Sufficient regulation equipment should be available for secondary physical education programs to teach a variety of movement forms, including at least one from each of the following:

1. Team Sports (basketball, football, soccer, softball, volleyball, team handball, lacrosse, and field/floor hockey)

   Equipment such as: basketballs, footballs, soccer balls, softballs, volleyballs, volleyball trainers, team handballs

2. Outdoor/Adventure Education (adventure/ initiatives, backpacking, orienteering, geocaching)

   Equipment such as: compasses, global positioning system (GPS) units, various sports equipment for adventure/cooperative initiatives

3. Dance (jazz, folk, aerobic, modern, creative, line, western, square)

   Equipment such as: variable speed record/tape/CD player with remote and a collection of music for folk, creative, and rhythmical dance

4. Individual and Dual Activities (gymnastics, archery, badminton, self defense, golf, tennis, wrestling, track and field)

   Equipment such as: racket/club/bow, etc. for every student, a ball for every two students, golf clubs, hurdles, high jump standards, discus, shot put, and sufficient pieces of large equipment for various activities in gymnastics

5. Fitness Education

   Equipment such as: heart rate monitors, pedometers, bioelectrical impedance machines, sit and reach boxes, fitness data collection software, treadmills, ellipticals, stationary bikes, rowers, strength training equipment/dumbells, step-aerobic boxes, and jump ropes

6. Recreational Activities (bowling, bocce, frisbee golf)

   Equipment such as: bowling sets, bocce sets, frisbees

To allow for maximum learning opportunities, enough equipment for one class should be provided so that students spend virtually no time waiting for turns or standing in lines. All equipment should be maintained and in good condition. All equipment should be inspected regularly and repaired or replaced as needed.

Appendix C

General Shared Equipment

- Chalk or white board
- Bags To Carry Balls
- Rolling Ball Carriers
- Ball Inflator
- Bulletin Board
- Clipboards
- First Aid Kit
- Measuring Tape 100', 50'
- Crates or Baskets for Storage
- Field Marker (for chalking lines)
- Portable Gym Standards
- Nets for Standards
- Cones
- Pinnies, Sashes, or Vests
- Scooter Boards w/Handles
- Spotmarkers
- Stopwatches
- Computers (6 per class)
- Multiple Computer Jacks/Data Outlets
- Walkie-Talkie for Communication
- Gymnastic Mat Storage/Movers
- Mobile Technology Cart (could include resources such as computers, TV/Video Projector, CD/Tape Player, and Smart Board)

5.15 Space Recommendations for Secondary Physical Education Programs

This document does not specify all the many areas required to support full secondary physical education, interscholastic sports, and community recreation programs likely to be offered in Maryland middle and high schools. Local school systems must evaluate staffing, enrollments, sports programs, and community life and support in developing the educational specifications for the gymnasium and ancillary facilities. Connecting the physical education facilities to improving the health and wellness of all students should be a primary focus of the physical education program. Consideration should be given to linking the space and equipment needs of the facilities to the State curriculum for physical education and any elective courses that are offered in the schools.

A comparison of space requirements for five recently planned Maryland public high schools is included as **Appendix E**. The schools range in size from 1,000 to 2,000 students. The area provided for physical education, interscholastic athletes, and public recreation range from 26,000 to 38,000 net square feet and from 16 to 29 net square feet per student. The outdoor facilities required at these five schools are listed as **Appendix F**. Outdoor facilities are heavily dependent on space available and degree of support for athletic programs. Some critical site planning guidelines for outdoor facilities are shown in **Appendix G**.