# 4.2 PSR Educational Program

### Introduction & District/School Configuration:

Sharon Public Schools (SPS) is a high performing school district that is "committed to providing an inclusive, safe and healthy learning environment for all." Our core values of acceptance, equity, honesty/integrity, respect, kindness and teamwork guides our practices and decision-making and are key to the success of our students.

Sharon is a suburban community of approximately 18,000 residents located approximately 22 miles south of Boston, and almost midway between Boston and Providence, Rhode Island. Incorporated in 1765, the town's location, beautiful scenery and historically high-performing schools attract culturally, linguistically and religiously diverse families that deeply value education.

The school district serves approximately 3,700 students in its five schools which includes a high school (9-12), middle school (6-8), three elementary schools (K-5), and an early learning center (Pre-K). As the reputation of the community and its schools continues to spread throughout the Common Wealth, the district has seen exceptional growth over the past several years. Over the past 15 years, the enrollment in Sharon Public schools (SPS) has consistently increased by approximately 600 students. Currently, the overall enrollment in SPS is 3,548 students. This school year, SPS enrolled the largest kindergarten class in seventeen years of 247 students. We reached the projected enrollment in kindergarten two years earlier than was projected. The tenyear projected enrollment for SPS is 3,988 students, which is an additional 400 students above the current enrollment. The make-up of the new students enrolling in SPS show a shift in the past five years in our demographics with non-English speaking families with a 30% increase (# of students here).

According to the Sharon 2017 Annual Town Report, "...80% of the total budget for the Town is allocated to the School Department." Residential property taxes account for roughly fifty percent of the allocated budget to the school department. According to the Department of Elementary and Secondary Education (DESE); Sharon's per expenditure is \$16,316.98 which is slightly higher than the state average of \$16,014.90.

SPS prides itself in being academically rigorous, socially conscious and ensuring the highest quality education for our students. Upon graduation, 92% of students matriculate to four-year public or private colleges/universities, 2% matriculate to two-year academic institutions, and the rest pursue work, military, or life exploration in the form of a gap year.

As of 2017, the four-year adjusted cohort graduation rate was 98.3%, and the drop-out rate stood at less than 1%. The attendance rate for students at Sharon High School is 95.9%. The faculty attendance rate is also high at 94.6%, which is indicative of our educators' commitment.

Sharon High School offers a strong college preparatory program to its students. Current graduation requirements include four years of Math and English, three years of Social Studies and Science, two years of the same Foreign Language, one year/two semesters of Unified Arts, one year/two semesters of Wellness, and additional course credits that can fulfill the 102-credit standard. The Program of Studies is published annually and includes over twenty Advanced Placement course options. Students can also pursue educational interests as well as meet some graduation requirements by taking courses through The Virtual High School, Dual-Enrollment at Massasoit Community College, or by proposing and completing an independent study.

The Sharon community is very active and supportive of our schools. Through parent and community partnerships such as the Sharon Education Foundation (SEF), Parent-Teacher-Student-Organization (PTSO), Friends of Art & Music Education (FAME), and Sports Boosters; grants and funds are provided to enhance our work with additional programming and supplies. Additional learning opportunities for our students and staff are realized through additional community partnerships with the Council on Aging, Sharon Pluralism Network, Police, Fire & Emergency Departments, and the Norfolk County District Attorney's office. Annual events such as the Financial Literacy Fair, Sharon Green Day, and Veterans and Memorial Day Activities are further examples of the kind of enrichment that exists in town.

SPS has a unique structure to ensure a strong connection with the community through the Community Education program which is a primary department within the school district. Over the past, five years, the programs and services offered through Community Education has seen exceptional growth. The Community Education program, currently serves 1050 students in all programs including the summer programs. They also offer programs for adults throughout the year that serves 738 of Sharon's adult residents. The Community Education Program is in high demand both by students and adults but has been limited in regards to the availability of adequate space for adult and summer programs.

# **Vision for Learning**

The Sharon Public Schools is committed to providing an inclusive, safe, and healthy learning environment for all. Our District is dedicated to developing an educational foundation that fosters academics, model citizenship, and cultural diversity, in collaboration with all stakeholders. We maintain the vision that all students will apply their skills and knowledge to inspire our global society. Our mission is to provide an educational community that nurtures each student on their unique journey to be lifelong learners and caring and engaged citizens of our world.

In order to achieve our vision and mission, we have four strategic objectives that guide the teaching and learning process in our district.

- <u>Social-emotional learning</u>- Promote student success by ensuring a healthy school environment that supports the social and emotional well-being and the mental health of each learner.
- <u>Relationships and Culture-</u>Foster an equitable and inclusive learning community that ensures respectful and culturally competent relationships.
- <u>Learning Environments- Provide</u> safe, secure, accessible environments conducive for learning and adaptive to changing teaching practices that meet the needs of each learner.
- <u>Curriculum and Professional Development- Implement</u> a consistent curriculum with responsive instructional practices that meet the needs of each learner.

We are committed to achieving vision through the implementation of our objectives by adopting and implementing the principles of universal design for learning, exploring 21<sup>st</sup> century learning concepts, project-based and interdisciplinary instruction, and technology integration.

It should be noted that there are currently no plans to move away from a departmental organization and we do not propose any changes to our departmental approach at this time.

# Class Size:

Class size is an important element of ensuring that students receive the best educational opportunities. The Sharon School Committee is committed to ensuring that class sizes remain at a manageable range by supporting and approving budgets to ensure a reasonable class size.

Class size is established through the collective bargaining agreement between the Sharon School Committee and the Sharon Teachers' Association. The current guidelines have been created over time and are guided by best practice, as well as space availability. As outlined in the collective bargaining agreement, the class sizes are as follows:

• Special Education programs and services follow the outlined regulations permitted by the Department of Elementary and Secondary Education.

- Elementary class sizes range from twenty-two to twenty-eight students with the potential to increase to thirty students if there is an unusual increase in enrollment after the opening of schools.
- Middle school class sizes for academic courses except for physical education range from twenty-two to twenty-six students; physical education range from twenty-five to thirty students.
- High school class sizes for the following classes range from fifteen to twenty-five students: English, Foreign Language, Science, Mathematics, Social Studies, Physical Education, and Health and Wellness.
  - NOTE: Due to space and safety concerns in science classrooms and laboratory spaces, a maximum of 24 students per classroom have been enrolled in Science classes
- Technology classes that depend on a computer lab, range from 15-20 students
- Music, maximum 50 students
- Art-Intro, maximum 22 students
- Art-Clay and AP Art, maximum of 16 students
- Other Art classes, maximum of 18 students

Currently, the average class sizes by grade and/or subject area are as follows:

K	1st	2nd	3rd	4th	5th
22	20	21	23	20	24

**Sharon Middle** 

6th	7th	8th
18	23	22

#### **Sharon High**

	9	10	11	12
ELA	22	20	19	22
Social Studies	21	23	21	22

Math/Comp Sci	21	20 19		22	
Science	21	21 20 22		20	
Foreign Lang	15	17	18	15	

Note: We do not propose any further changes in the class size guidelines.

#### **Sharon High School Schedule:**

The school day begins at 8:05 a.m. and ends at 2:40 p.m. Prior to the 2010-2011 school year, the school day began at 7:25 a.m. and ended at 2:00 p.m. The schedule consists of 6-periods that rotate on a 6-day schedule with each period meeting 5 days per cycle.

#### Sample Schedule:

	SHARON HIGH SCHOOL - BELL SCHEDULE						
Time/Day	A	В	С	D	E	F	
Block One 8:05 am – 9:00 am (55 minutes)	Period 1	Period 6	Period 5	Period 4	Period 3	Period 2	
	Passing (4 minutes)						
Block Two 9:04 am – 9:59 am (55 minutes)	Period 2	Period 1	Period 6	Period 5	Period 4	Period 3	
Eagle Block 9:59 am - 10:44 am (45 minutes)	Directed Study Mon, Wed, Fri: Chorus, Band, & Orchestra Tue, Thurs: Designated Ensembles	Directed Study Mon, Wed, Fri: Choras, Band, & Orchestra Tue, Thurs: Designated Ensembles	Directed Study Mon, Wed, Fri: Chorus, Band, & Orchestra Tue, Thurs: Designated Ensembles	Directed Study Mon, Wed, Fri: Chorus, Band, & Orchestra Twe, Thurs: Designated Ensembles	Directed Study Mon, Wed, Fri: Chorus, Band, & Orchestra Tue, Thurs: Designated Ensembles	Directed Study Mun, Wed, Fri: Chorus, Band, & Orchestra Tue, Thurs: Designated Ensembles	
			Passing (4 minutes)				
Block Three 10:48 am – 11:43 am (55 minutes)	Period 3	Period 2	Period 1	Period 6	Period 5	Period 4	
			Passing (4 minutes)				
Block Four 11:47 am - 1:41 pm (86 minute class) (28 minute lunch) 1 <sup>st</sup> Lunch: Gr. 11 2 <sup>st</sup> Lunch: Gr. 10 4 <sup>st</sup> Lunch: Gr. 12 + PE	Period 4 and Lunch 1 <sup>st</sup> Lunch: 11:03 – 12:11 2 <sup>st</sup> Lunch: 12:14 – 12:24 3 <sup>st</sup> Lunch: 12:14 – 12:45 4 <sup>st</sup> Lunch: 1:17 – 1:45	Period 3 and Lunch 1 <sup>st</sup> Lanch: 11-03-12-11 2 <sup>st</sup> Lanch: 12-14-12-42 3 <sup>st</sup> Lanch: 12-14-12-44 4 <sup>st</sup> Lanch: 1217-1245	Period 2 and Lunch 1 <sup>ot</sup> Lunch 11:43 – 12:11 2 <sup>ot</sup> Lunch 12:14 – 12:42 3 <sup>ot</sup> Lunch 12:14 – 12:44 4 <sup>ot</sup> Lunch: 1:17 – 1:45	Period 1 and Lunch 1 <sup>9</sup> Lunch 11:43-12:11 2 <sup>9</sup> Lunch 12:14-12:42 3 <sup>7</sup> Lunch 12:14-12:42 4 <sup>8</sup> Lunch: 11:17-1:45	Period 6 and Lunch 1 <sup>st</sup> Lunch: 11+31 - 12:11 2 <sup>st</sup> Lunch: 12:14 - 12:42 3 <sup>st</sup> Lunch: 12:14 - 12:44 4 <sup>st</sup> Lunch: 1:17 - 1:45	Period 5 and Lunch 1 <sup>9</sup> Lunch: 11:43 – 12:11 2 <sup>44</sup> Lunch: 12:14 – 12:42 3 <sup>75</sup> Lunch: 12:16 – 1:14 4 <sup>45</sup> Lunch: 1:17 – 1:45	
	Passing (4 minutes)						
Block Five 1:45 pm – 2:40 pm (55 minutes)	Period 5	Period 4	Period 3	Period 2	Period 1	Period 6	
Dropped Period	Day A - Period 6	Day B - Period 5	Day C - Period 4	Day D - Period 3	Day E - Period 2	Day F - Period 1	

For the 2009-2010 school year, a 45-minute directed study ("Eagle Block") was added to the schedule (9:59 a.m. - 10:44 a.m.) to address the needs of our students and faculty. We were faced with conflicts regarding our music programs and extra-curricular activities, equitable distribution of students amongst the Wellness Department and an impact on clinical counseling services.

Additionally, Eagle Block provides students with opportunities to access school-based services, academic and social-emotional interventions and supports.

The lunch period is 114 minutes long, during which students attend class for 86 minutes and lunch for 28 minutes. Lunches have historically been organized by grade. The master schedule is developed collaboratively by administration and school counseling. Course offerings include full-year and semester classes. Students request courses for September beginning the preceding March. Course sections are based on the number of student requests in the course request phase.

A committee was created during the 2015-2016 school year to consider the possibility of transitioning to a trimester schedule. Among the considered benefits to this type of schedule were opportunities for students to take a broader array of electives, an expansion of the visual and performing arts programs, and elimination of mid-year examinations. Although the committee did not conclude that a transition to trimesters was appropriate at the time, the conversation is likely to reemerge in the near future. At present, there are no imminent plans to change the schedule.

Professional collaboration time is built into the schedule. Currently, all members of ELA, Foreign Language, Mathematics, Science, Social Studies, and Special Education have a common period off for the purpose of collaboration on four of the six days in the cycle. Departmental professional development is currently built into these common planning periods, including fulldepartment, grade-level, and curriculum partner collaboration.

Our current facilities impede our ability to explore cross curricular collaboration and professional development offerings during the school day.

The vision for future collaboration includes opportunities for teachers in all disciplines (including unified arts, PE/wellness) to have common planning time and increased time and space for cross-disciplinary collaboration.

The advantage of our current scheduling methodology is the involvement and leadership of the process by the School Counselors. Our school counselors have a very good understanding of the individual students and their unique needs, goals and aspirations. A disadvantage to the current scheduling methodology is the way in which classes are determined by the number of students who select a class or have interest in the specific class selection. Students have been faced with not being able to take their top selected course because there may not be enough students who select the class in order for the class to run. In addition, the scheduling is managed solely by administration and the counseling department with limited opportunities for teacher input. In the future, it would be advantageous for us to develop class scheduling teams that are integrated and inclusive of a cross section of departments who share students.

#### **Teaching Methodology and Structure:**

Administrative and Academic Organization/Structure - Curriculum Delivery: Sharon High School is a traditional college-preparatory school that is organized by departments. Due to the limits of available classroom space, many teachers share classrooms that are available, regardless of the department assignment. While the teachers are organized by departments, many classrooms are located outside of their department. There are no policies that determine how we are organized or room assignments.

The district implemented the Digitally Enhanced Learning Initiative five years ago which provides a 1:1 computer to enhance the teaching and learning process. Currently, students in grades 9-11 have their own laptop which is used in many of their classes. While the current 12th graders were a year ahead of the implementation of the initiative, they do have access to technology laptop carts or they bring their own device. We value responsible technology use and integration and believe that technology is an additional tool that enhances the learning experience.

In order to continue to enhance innovation by our students and teachers and meet 21st century college and career readiness expectations, we envision expanding our curricular offerings to allow students to explore various careers and build their 21st century skills.

Through the innovation and creativity of our staff, we have been able to create courses that peek the interests of our students and support their matriculation to post-secondary education and/or career. We have been able to continue our high performance although our current facility significantly inhibits our capacity to broaden our courses of study to include courses and programs that allow for project-based learning and career exploration.

Through community partnerships with Sharon Community Television, our students receive reallife opportunities to learn various aspects of communication, television and media. While our current facility has a functioning television studio, it is aging and there are limits to our students' experience during the school day. Students only have access to the television staff after school hours and have to leave the school campus to travel to the local television studio or satellite sites to work with the television staff.

Our students have a wide array of strengths and interest which correlates with the diversity of our student body. This attributes to the emphasis on the Arts, Science, Technology, Engineering and Mathematics. We have an award-winning theatre company and have secured many awards in various areas of the Sciences. Currently, many science classes, all of which have laboratory components, are taught in traditional classrooms that have been repurposed. The rooms are cramped and are thus considered unsafe based on MSBA standards and the National Science

Teachers Association (NSTA) Safety Advisory Board recommendations for minimum square footage per occupant.

The current facility and school structure do not foster the opportunity for interdisciplinary and collaborative teaching. The current facility lacks adequate space for large groups of students to work collaboratively across classes. Currently, when classes want to meet together they either open the access door between classrooms and go back and forth or look for available times when other locations in the school are not occupied. When students are collaborating and working on projects, they use the hallways. Large interdisciplinary project-based learning rooms would provide the flexible spaces needed for students to develop and present their projects.

Currently, there are no specific areas specified for teacher planning and collaboration. This is often done in a classroom during a teacher's planning period. Therefore, it limits the depth of opportunity to collaborate and plan across departments.

The goal of a new Sharon High school would be to plan a newly reorganized school that fosters innovation, collaboration and integration of academics and the arts.

We envision a new school would provide:

- flexible classroom space,
- student collaboration and study spaces,
- project rooms to support project-based learning,
- teacher planning rooms for the faculty and staff to collaborate within and across disciplines,
- privacy rooms to support students in need of additional academic and/or emotional supports,
- flexible conference rooms to support student team meetings and individual parents/guardians' meetings,
- and innovation labs.

The new facility would need to be reflective and adaptable to the district's core values of acceptance, equity, honesty/integrity, respect/kindness, and teamwork.

### **Design Response:**

The proposed preferred option is organized into six wings on two floors. These wings accommodate general classrooms and science classrooms organized together at the head of each corridor. These classroom wings lead to a large circulation corridor leading to performing arts and music on the first floor and technology classrooms on the second floor. Visual arts classrooms are also located along this circulation spine. In the center of the building on each floor is a large project space / STEAM classroom that can be used as a classroom or collaboration space used to support project-based learning. The organization is intended to make the performing, visual and musical arts visible to students on a daily basis and to foster cross pollination across disciplines. The goal of the plan is to support both collaborative and interdisciplinary learning as well as departmental expertise and instruction.

## Academics, Programs and Services

Currently, Sharon High is organized and structured in a department model. This has been the structure and design of the school for many years which has been driven by our facilities. As our educational programming continues to evolve and expand, we would like to be organized based on 21st century learning concepts. While there is some interdisciplinary learning occurring at varying degrees, we desire to implement more project-based learning opportunities. While the concept of an academy model was discussed during the visioning sessions, the district does not believe this concept is appropriate to incorporate in the Sharon community. The goal however is to create a building that is flexible and structured in a way that allows for student and teacher collaboration in a socially and emotionally supportive environment.

#### **Design Response:**

The six wings (three per floor) shown in the preferred option allow the scale of classroom wings to be reduced to about 200 students per wing. This is intended to reduce the perceived size of these learning areas and address social, emotional and security challenges associated with large schools and the anxiety that these environments can produce for some students. The wings will house general curriculum classrooms and students will circulate through them during the course of the day.

### **English Language Arts:**

The Sharon High School English Language Arts Department focuses on strengthening reading, writing, and research skills. Instruction is delivered through a range of methods, which include lecture, Socratic discussion, and group and individual projects and investigations. Literature is used as a tool for learning about human nature, and to that effect, teachers also use their classrooms as interactive learning spaces, where students can role play and engage in activities that allow them to experience and explore some of the themes and questions proposed in their course texts. Teachers and students use technology for research, presentations, visual arts and texts, and writers' workshop. In grades 10 - 12, ELA and Social Studies interdisciplinary courses are offered, and these classes collaborate to make connections between history and literature.

In addition to full-year ELA classes, the department also offers semester-long electives in Film, Creative Writing, Journalism, and Comics and Culture. These courses are offered for elective credit, and they do not meet the graduation requirements for ELA course credits. These classes use technology for writers' workshop, research, film viewings, and Skype conversations with authors and interview subjects. Sharon High School has three computer labs, and one is used by the ELA department, though also shared with other departments. Other classes use laptop carts in lieu of the lab.

In the future, we would like to have more project-based and interdisciplinary learning opportunities so that students can further explore not only the connections between history and literature but also expand the connections between the electives offered and literature. Due to our space limitations, technology integration and the use of smart technologies have been limited. In the future, we are committed to more thoughtful and meaningful technology integration in the delivery of curriculum and instruction.

The ELA department also offers a Writing Center during our 45-minute Eagle Block. Due to lack of space, the writing center rotates from room to room which is inconvenient for both students and staff. Because there is no social space for students in the current building, the only space available to students is the library. As a result, the library is not a quiet, academic workspace.

Ideally, there would be adequate space to deliver core academics, electives and interventions. The space would include the following components:

- Open areas (or the potential for open areas through moveable walls) in order to create collaborative learning environments and conference spaces.
- Classrooms with adequate shelving and storage for classroom libraries and showcasing student work and materials/tools for learning.
- Age appropriate desks and workspaces that are easy to move around.
- Blackout shades for effective use of technology.
- More whiteboard space, and projection systems in each room.

Additionally, there needs to be access and space to support the writing center with an expanded academic library that could serve as a quiet workspace, and flexible spaces that could serve as small lecture halls for presentations, public speaking, and outside/community speakers.

### **Design Response:**

The preferred option includes a drama classroom to accommodate the needs of both the drama department and collaboration with the ELA department on lectures, Socratic discussions, and

group and individual projects and investigations. It also allows creative expression that comes through the interdisciplinary course offerings.

### Mathematics/Computer Science:

The Sharon High School Mathematics and Computer Science Department strives to provide appropriate courses for all students. Students are encouraged to take the courses at the level that best reflects their interests and strengths and allow for exploration so they are not locked into a particular level for their high school experience. Mathematics and science are a focused interest of a large number of our students who desire rigorous and challenging content and instruction, therefore, students are allowed to take more than one mathematics course when feasible. The mathematics and computer science courses are fully aligned with the Massachusetts Curriculum Frameworks and with National Council of Teachers of Mathematics (NCTM) and International Society for Technology in Education (ISTE) standards. All courses stress critical thinking, problem solving, written and oral communication, reasoning, and connections to other mathematics and computer science courses are near-life applications. All courses at Sharon High School incorporate the use of technology as a meaningful teaching and learning tool, and problem solving is a universal theme.

Currently, four years of Math are required for graduation. There is no current requirement for Computer Science and Computer Science courses do not satisfy the Math graduation requirement. Sharon High follows a traditional path of courses in Math leading to Calculus and Statistics in senior year. The department offers 3 AP classes in math, AP Calculus BC and AB and AP Statistics. It also offers 4 levels of calculus for seniors, 2 at the AP level and 2 at the standard level. There are four levels of Math taught at Sharon High: AP/Honors, Accelerated, Standard, and Foundations. The Computer Science Department offers four courses: AP Computers Science A, AP Computer Science Principles (both full year), Fundamentals of Python Programing (Semester), and Intro to Computer Science (semester).

The math classes meet in any room in the school as no classrooms are designated for Math instruction. Math instructors use traditional methods of instruction as well as more contemporary methods of project-based learning, collaborative groups, large and small group discussion, and direct instruction. While current space is functional, it presents difficulties when trying to implement project or collaborative group instruction. With lack of whiteboard space and aging technology, having students working together or presenting their work to the class is difficult. In addition, the current furniture in the classroom makes rearranging for collaborative or project work extremely difficult and uncomfortable thus preventing some meaningful and innovative instruction from taking place. Spaces that are flexible and have flexible furnishings would better support the delivery of instruction in this area. This would promote more effective collaborative groups and project-based learning opportunities.

In planning for new space for math instruction, the classrooms should be large and have write-on walls that would allow collaboration at any point in the room. Flexible, comfortable seating should be available to allow for easy rearrangement for project-based and collaborative instruction to take place. There should be break out space where small groups could work and larger spaces where interdisciplinary groups could work together. A teleconferencing space or capabilities should be made available in classrooms to further permit collaboration with experts/schools outside Sharon High School.

Currently, the Math/Computer Science Department also offers a Math Center during our 45minute Eagle Block. Due to lack of space, the math center rotates from room to room which is inconvenient for both students and staff. Because there is no social space for students in the current building, the only space available to students is the library. As a result, the library is not a quiet, academic workspace.

The computer science classroom currently utilizes a computer lab which is shared with a class from another department. The room is small and the technology is aging. It is not currently conducive to simulating a software programmer's project-based work environment. It presents difficulties in collaboration as there is no room for multiple or large screen workstations.

In planning for space for computer science, there needs to be a large, flexible space that can function as a computer lab but can also accommodate collaborative work among students. This would require large/multiscreen work stations throughout the room. As the computer science program expands to include hardware and network courses, large dedicated laboratory and/or project spaces would be optimal to support this expansion.

Based on student interest and need, we desire to expand our offerings to include business courses, such as accounting, finance, marketing etc. which would require space that is flexible, able to adapt easily to new technology and software, and permit project based and collaborative instruction/learning to take place.

To accommodate these goals a proposed CAD lab would be wired for various technology including laptops with ethernet access points throughout the room and our current bank of 3D printers. The CAD lab would also have space with open counters and floor space so that students can assemble products and test design solutions. In addition to the three main science disciplines and engineering design, the science department currently offers several STEAM focused courses including forensic science, biotechnology, and environmental science. The current courses and/or any future STEAM focused courses could be accommodated within two STEAM labs. As a district we felt that designing flexible STEAM lab rooms would create opportunities for changing courses in the future and fall more in line with the MSBA's high school guidelines that consider not only current but future use of these spaces.

The Innovation Lab would be an open space wired for technology around the room so that it could serve multiple uses and be accessed by all departments for groups and large projects. This lab could also house robotics courses in the future as the department does not currently offer robotics but would like to add it in the future.

### **Design Response:**

The preferred option is organized to distribute technology classrooms across the two floors of the building. The first floor has a STEAM classroom / Project Space and a TV studio. The second floor also houses a STEAM classroom along with graphics labs, cad lab and innovation lab. The technology classrooms are typically in close proximity to the twelve science classrooms that are proposed for the new school offering opportunities to expand science offerings and technology offerings such as robotics which could be offered on either floor in a STEAM lab.

### Science:

The goal of the science department is to ensure that all students graduate from Sharon High School with the skills and knowledge necessary to become scientifically literate citizens who can make informed decisions. The curriculum emphasizes scientific process and inquiry skills, problem-solving, and non-fiction reading and writing. The department is continually working to move students from procedural-based laboratory activities to more inquiry-based laboratories.

Currently, three years of science is required for graduation although the majority of students take 4 or more science courses prior to graduation. Sharon High School follows a physics first course sequence where students take physics in grade 9, chemistry in grade 10, and biology in grade 11. Each of these core science courses are offered at the foundations, standard, and honors levels. Beginning in sophomore year, students may choose to take additional elective science courses beyond the 3 core sciences. By senior year, all science courses are elective-based. Currently the department offers 5 AP, 5 multileveled (standard/honors), 2 standard, and 2 honors elective options. Of these, 4 courses are semester based and 10 are full year electives. In the 2012-2013 school year, Biotechnology was developed as a STEAM-based science elective. Over the last 5 years, the department has added more STEAM (Science, Technology, Engineering, Arts and Mathematics) focused courses such as Advanced Engineering Design, Environmental Science, and Forensic Science. The department would like to consider adding other STEAM courses however there is no physical space in which to add more courses. For example, for the past 10 years, the department has considered adding robotics courses however there is no large available space in which to run this type of course. The department is also very interested in adding an innovation/maker lab for use by several disciplines and courses. In designing a new or renovated Sharon High School these needs should be considered and plan for spaces that are flexible, located so to integrate the curriculum areas, and large enough for student projects and

collaboration. The science department utilizes thirteen rooms for current course offerings. In looking to the future, the department felt that a minimum of 12 rooms would be needed to meet the main science discipline demand while the CAD lab space would be used to house the engineering design courses. The district acknowledges the MSBA's high school lab guidelines and is committed to the future flexibility of science labs in planning for a new or renovated high school facility.

All Sharon High School science courses are designed to be lab-based courses. Currently, 13 rooms are used as science spaces. Of the 13 rooms, only 2 meet minimum space requirements for laboratory classrooms. Six rooms were designed as science labs many years ago however they are grossly undersized and thus cannot be used effectively. Future space considerations should consider the need for dedicated Science labs that ensure the safety of students and staff and support the goals of the department and district.

In planning for new science spaces, there should be flexible work space in all science classrooms. Rooms need to be designed so that there is a combination of content teaching space as well as lab space since classes blend content with hands-on experiences. A dedicated space for storage and sterilization of safety equipment should be readily available and accessible in every room. Ideally, this would be in a universal location in every science room. Drains in the floors especially underneath emergency showers is something that should be considered.

Currently, there is one chemical storage room which can only be accessed by 2 chemistry rooms and the main hallway. One central chemical storage room is needed so that teachers do not have to carry chemicals far distances to their classrooms for use in laboratories. The proposed plan locates a single chemical storage room in close proximity to the proposed chemistry classrooms which are grouped together on the same floor.

In building authentic learning opportunities including project-based learning and inquiry-based learning labs, space is often needed to be dedicated to these more long-term labs. For example, AP Biology students conduct a plant lab where plants are grown over a month of time in varying conditions. This means that the lab space used by the AP Biology classes cannot be accessed by other classes during that month of time. Ample and numerous lab spaces would be able to accommodate this need more easily.

Since each science discipline has slightly different needs for lab space and this is not likely to change significantly in the future, rooms should be designed as biology specific rooms, chemistry specific rooms, physics specific rooms, and flexible science rooms which could be used for any of the three core science disciplines or a variety of science electives. Most science classes, particularly the Astronomy and Environmental Science classes, should have easy access to an outdoor space for making observations and conducting experiments. Bringing classes

outdoors allows for more space for experiments as needed and helps to make important connections to the content being taught in natural science classes.

Science electives at Sharon High School are very popular courses in which to enroll. In addition to AP science courses, the department currently offers a range of electives including but not limited to: Biotechnology, Engineering Design, Environmental Science, Anatomy and Physiology, Astronomy, and Forensic Science. Some of these courses have very specific building needs which would enhance their already robust curriculum.

Forensic Science was introduced in the 2015-2016 school year and has been consistently enrolled with 2-3 sections of seniors per year. Now that the course is in its fourth year, the teachers have identified a need that cannot be fulfilled in the current building. Space is needed in which to set up a crime scene and let it remain set up over the course of a week, since the course requires students to fully process a scene. A flexible, open, small room with a shower hose and drain would be ideal.

The engineering design curriculum allows students to use technology, 3D printers, and other readily available materials to design solutions and test their designs for various products. The ideal space would be climate controlled, wired for various technology including laptops with ethernet access points throughout the room. It would have an adjacent space with open counters and floor space so that students can assemble products and test design solutions.

The environmental science course, AP Biology classes, and Biology courses all grow plants at varying times of year as a part of labs. A flexible space that could act as a greenhouse with outlets for grow lamps and water access would support the curriculum and instructional needs. Having such a space would allow for inclusion opportunities for students serviced in our Pathways special education program.

### **Design Response:**

The twelve science classrooms listed in the space template are broken down into three disciplines of four rooms each on the proposed plans: Chemistry, Biology and Physics. These disciplines are located in horizontal or vertical proximity to one another. Located at the beginning of the classroom wings they are also in proximity to art and technology spaces. This allows the science department to expand their offerings by using technology spaces for subjects such as forensic science and engineering design. The Biology classrooms are located on the ground level with direct access to a shared courtyard. The goal here is to take advantage of the site which includes a wetland directly adjacent to the propose school. The Chemistry department is located on the second floor with one chemical storage room in the center of the group of rooms. This adjacency limits travel distances for the handling of chemicals from the storage area to these classrooms.

All science labs also have individual dedicated prep rooms. The physics classrooms are located on two floors and are stacked. They are all adjacent to a two story corridor space that can be used for vertical indoor experiments.

### **Social Studies:**

In the Social Studies Department, teachers and students do what historians, psychologists, geographers, sociologists, lawyers, economists, anthropologists, and archeologists do. Students are taught to analyze, investigate, speculate, argue, classify, compare, generalize, hypothesize, question, and debate. Most of the Social Studies Department courses are historical in nature. Studying history means asking questions, answering questions, testing and revising answers in an ongoing attempt to know who we are, to understand how we got here and to determine where we might be going.

The Social Studies department has been developing a curriculum for grades 6 through 12 that accomplishes what Howard Gardner describes in The Unschooled Mind. Gardner makes the case that student learning should not be focused on isolated bits of knowledge but rather understanding the causes and implications of our past and current decisions.

Currently the Social Studies Department uses 14 classrooms around the building, which are shared with other members of the department as well as members of the foreign language, math, science, and ELA departments. The lack of classrooms designed for integrated, project-based learning hinders the delivery of instruction and collaborative opportunities for students. Project based activities, Socratic dialogues and collaborative learning are impeded by some of the classrooms to which teachers are currently assigned. For example, social studies classes are taught in science labs with fixed workstations that do not lend themselves to many of the group activities and collaborative dialogues conducted in Social Studies classes. Also, the lack of space within these classrooms limits the resource materials (maps, books, etc....) available to teaching staff. Plans for a new building should have some flexible spaces that lend themselves to the investigation of primary source materials. This might include technology, physical artifacts and documents. Serious planning should be given to creating comfortable learning spaces where guest speakers in person, or virtually could be invited or theatrical re-enactments, civic roleplays or the viewing of film and documentaries might take place. This kind of consideration to space design would enhance and compliment the kinds of activities the Social Studies department seeks to deliver. Additionally, an appropriate flexible space design would aid in the department's efforts to implement the new state frameworks in the classroom.

### **Design Response:**

One of the goals of the drama classroom that is located next to the auditorium is to offer a location for larger groups of students to give speeches, debate, and hold forums and view films.

In addition, the STEAM classrooms on each floor act as larger project based classrooms that could be used for project based activities for both social studies and all areas of study.

## World Languages:

Language learning and culture exploration is a very important part of the learning experience for SPS students starting as early as first grade. Therefore, our goal is to ensure that students have exceptional opportunities to continue to develop and execute their language skills in a way that enhances their learning experiences in the other curricular areas.

Currently, students typically remain in one course for the whole academic year (e.g. Spanish II). We would eventually like to see proficiency-based grouping where students could move between courses as they meet the curricular expectations.

Students are eligible to earn a Seal of Biliteracy if they can demonstrate a certain level of proficiency either in their home language or their language of study at SHS. It would be useful to have small conference areas where students could meet native speakers from the community to learn and/or maintain their home language or practice their language of study in an authentic context.

To support student's development of languages, we currently have a language lab where students can conduct their listening and speaking assessments without distractions and background noise. The current space impedes the ability to expand this lab to include virtual experiences with native speakers via SKYPE or some other video conferencing technology.

Given that food is an important component of any culture, it would be beneficial to have access or in proximity to a space that is flexible and has equipment to support simple food preparation to accompany the language instruction.

Exchange programs are an important part of the language instruction at Sharon High. We host at least two exchange groups from Spain and China each year. It would be ideal for there to be a space for the exchange students to collaborate on a virtual project prior to their arrival and culminate the project with their English-speaking peer during their exchange visit.

Currently, students participate in exchanges such as the Chinese, French, Spanish Exchanges and the CIEE (Council on International Educational Exchange) during the summer.

### **English Learner Program:**

The changing demographics of the Town of Sharon has also led to the growth of our English Language (EL) programs. The number of students identified as an English Learner has tripled in less than five years. The growth of the English Learner program at Sharon High mirrors the growth of the district. The program has grown from a half-time traveling teacher between Sharon Middle and Sharon High to two full-time teachers. The teachers provide individual and in-class services to students in grades 9-12. They work collaboratively with general education/content area teachers to ensure the success of each of our students. The work collaboratively with the K-8 EL teachers to develop and modify curriculum to meet the needs of each individual student based on the student's language level.

Due to limited space, the two EL teachers and their students move from room to room around the building, sharing space with teachers from other departments. The teachers do not have a dedicated instructional space which limits their ability to provide hands-on, authentic learning opportunities for their students. In addition, the teachers do not have a space to collaborate with one another or the content area teachers to review accommodations for students.

The EL program requires a dedicated space that includes an instructional space that is flexible to provide small group and individualized instruction. It would be optimal for the instructional space to include office space, storage space and meeting space for parent and teacher meetings/collaboration.

### **METCO:**

Sharon has been a METCO district since 1967 and values the cultural and racial diversity that the program brings to our suburban district. Sixty-six of our students are enrolled in the METCO program in grades 1-12. The program is staffed with a Director and one support staff person. It is expected that students enrolled in the program fully participate in school and community life in Sharon.

Over the past year, the program has gone through a reorganization to emphasize the need to ensure that students are fully integrated and achieve at the same level as resident Sharon students. We envision that the program will continue to evolve by offering academic enrichment support, parent/community engagement activities, and revitalizing the host family portion of the program. The program supports students in academic competition as well as socially and emotionally.

The METCO Director's office is located at Sharon High. The current space consists of a moderate sized office within the library that also acts as a meeting space. Future building plans should include office space and a meeting space that is flexible in order to provide before/after school tutoring support, parent meetings and guest speakers.

### **Special Education Programs/Services:**

The majority of special education services are delivered inclusively in the general education classroom. Whenever required, individual and small group services are delivered through "academic labs." These are opportunities for students to work individually or in small groups with a special education teacher and/or service provider on their IEP goals and objectives. Currently, the spaces designated for "academic labs" are dispersed throughout the academic areas of the school and the school library.

In order to maximize learning for students, we envision that students receiving special education services, or require supports through accommodations access those services and supports through large-room learning centers staffed by teams of special educators, specialist and related service providers. This space should be flexible and able to accommodate individual and small groups for intervention supports from general education support staff. It should be designed using universally designed concepts for the space as well as the teaching tools. These spaces would be located amongst the academic areas in the building.

Currently, substantially separate programs exist for students with autism spectrum disorder (ASD), those with social-emotional disabilities, those with cognitive and/or neurological impairments, and students in transition (18-22). They are served in the team-based learning, autism spectrum disorder, and a vocational/life skills program. These programs were developed in order to service students who would historically have been placed out of district due to the intensity of service needs. Currently, these programs are located in different areas throughout the building, separate from the core academic areas. In order to ensure a more inclusive learning community for all students regardless of need and ability, the sub-separate program classrooms should be located within the primary academic areas of the school.

The district is committed to ensuring that students with disabilities receive a quality education in the least restrictive environment. We will continue to meaningfully and purposefully include students in the general education classroom as well as the broader school community. There are currently six academic support labs for students with mild to moderate learning disabilities that we hope will be merged into two academic support centers located within the core instructional areas of the building, one on each floor, so that students can access the specialized supports and services that they need. In addition, six dedicated special education classrooms are proposed to be distributed in the six classroom wings of the proposed building. It is anticipated that half of these rooms would have associated toilets and half would not.

Due to the skills that students in the vocational/life skill program are working on, they require not only a space for academic instruction but also a space to develop daily living and work skills.

There are various related service providers who support the programs, therefore, a moderate sized office space should be located within at least two of the sub-separate instructional spaces to ensure that the related service providers are able to provide counseling and conduct assessments with students.

The district developed a partial sub-separate program for students with language-based learning disabilities called LEAP almost three years ago. The first cohort of students in the program will enter the high school in two years. Due to the matriculation of the program, we are planning to develop a high school level LEAP program. Students receiving services through the LEAP program receive individualized, small group instruction in a sub-separate classroom from a special education teacher for reading and writing and receive math, science and social studies through a co-teaching model in the general education classroom.

Sharon High School does not have an adaptive physical education/wellness program. All students participate in a general physical education/wellness class. Accommodations and modifications are provided in the class to students who need the services. Also, if required, instructional assistants support the students in class.

Occupational/Physical Therapy services are currently served on a consult basis to the teacher and student. The consult service may occur in the classroom, or the therapists meet with the teacher outside the classroom. There are no anticipated changes to this consult model, and we expect to continue servicing approximately 6-10 students per school year.

The spaces designated for special education programs in the new building should maintain the current space allocations for the academic labs and the sub-separate programs. The spaces while located amongst the school and academic areas should also consider the needs for the program servicing students (18-22) and ensure easy access into the building and instructional areas.

Nursing services are a very important part of supporting the students attending SHS whether they receive special education services or not. There is a large number of students in the district who have varied medical needs including those with chronic illnesses. Currently, we have one full-time school nurse and a part-time floating nurse to support the medical needs of the students at Sharon high. The clinic is currently located in the main office area. It includes a waiting area for students, a small office space, a sick and well child space, a restroom and an examination area. Due to the increased needs of students with allergies and diabetes, proper storage for medications and medical supplies are imperative in a new school where this is currently limited. The clinic should be located in an area of the building where it is easily accessible to students yet discretely located to ensure student confidentiality. It should be a welcoming space that offers a waiting area and a triage area for students. It should be properly equipped with the ability to refrigerate medications. Due to the growing needs of students, two restrooms would be optimal to support students who need assistance from the nurses or for those who are able to manage their medical

needs independently. We should maintain a large examination area where curtains can be drawn for privacy. Two small office spaces are needed to accommodate the nursing staff. To support the nurse's workload, the space should be equipped with up-to-date technology to keep detailed medical records and information.

### **Design Response**

The proposed plan locates six dedicated special education classrooms, one in each of the six classroom wings. In addition, each wing has a dedicated small group instruction space within the classroom environment. At the end of the circulation spine of the proposed plan on each floor there is an academic support lab. These labs are intended to offer multiple services for students looking for support with academics, and with social and emotional concerns. By creating these larger labs the intention is to attract a larger cross section of students to these locations making them seem less isolated. It also offers staff the opportunity to offer multiple levels of support and services from only two locations which should lead to a more robust level of student service.

### **Guidance and Support Services:**

### Social Emotional Supports:

Currently the high school provide social emotional supports and services through the School Adjustment Counselor and School Psychologists. They conduct individual and group counseling as well as social skills groups either during lunch block or during Eagle Block. They also provide seminars focused on various topics to build students' coping and social, emotional skills and to support families in the support of their children. In addition, they provide services to students enrolled in our sub-separate special education programs and work closely with the teachers and staff of those programs.

They are key members of the special education process, specifically, the school psychologists spend a significant time conducting confidential testing/assessments to determine eligibility for special education services and 504 accommodations. They currently are located in the library to access conference room spaces. However, their office locations are remote to the special education staff and administration for which they frequently collaborate.

Ideally, their office and conference room space would be located in a common area that is in close proximity to the special education programs that they serve, to classrooms and to the special education administration. They require spaces that ensure discretion and confidential engagement with students and families.

### School Counseling:

Six school counselors and the Dean of Academic Affairs provide academic, social, and postsecondary planning services for students at Sharon High School.

Upon entering grade 9, students are assigned a counselor based on the alphabetical split of the class. Counselors currently carry an average caseload of 187 which can go up to 200 students and continue to work with the same group of students from grade 9 through graduation. This allows counselors and students to develop meaningful relationships over the years that aide in counseling students through annual course selection and eventually to post-secondary planning.

School Counselors also provide services for students through lunch period counseling seminars that meet 8 - 10 times per year. Because there are not adequate large group meeting spaces, counselors take time out of academic periods to meet with students, and present the same information twice to groups of 25 students, rather than the cohort group of approximately 50. These seminars are scheduled into available classrooms when possible, but are more frequently scheduled into classrooms from which those students are being taken (e.g. into an English I classroom when the seminar is for grade 9 students). To better support our students through the delivery of small group seminars, we require a moderate to large capacity meeting space that is flexible and allow for movement and discussion. It should be wired and equipped with presentation and amplification equipment.

The counseling office hosts over 120 college and university admission representatives each year. Representatives meet with as many as 70 students or as few as 1. Currently, these meetings take place most frequently in a small conference room in an area of the building that is far away from the school counseling offices. The library or the Dean's office is often used for moderate to larger meetings. The library is located upstairs at an opposite side of the building from the counseling offices. The Dean must find an alternate work space when his office is used for such meetings.

The department would benefit from a College/Career Center space that would provide accessible meeting area and minimize staff disruption. Such a space, if in or nearby to the counselors' offices would allow significantly improved efficiency for the counselors in working with students, families, other staff, and college representatives.

Counselors work closely with school psychologists, adjustment counselor, METCO director, school resource officer, and special education liaisons on a regular basis, including weekly "Case Conference" meetings. Despite the close collaboration, the staff are housed at opposite ends of the building, making this work very challenging.

We envision a "student services suite" where students would be able to access all counseling and special education services, including the Special Education Administrator and the Dean of Academic Affairs. Considering the significant number of parent meetings these individuals conduct, such a space would ideally be located near the administrative offices, or near a building entrance to ensure the safety and security of students and staff.

### **Design Response**

The student services suite is located on the second floor directly above administration and immediately next to the main entrance stair. This location allows a close proximity between counseling and administration but with some separation so that counseling does not have a direct association with administration. The location directly above the main school entrance is also convenient for parent visitors and for visiting college representatives who will frequent this part of the school.

# **Teacher Planning and Room Assignment Policies**

Teachers are provided with a preparatory planning period once per day. In addition, most departments are scheduled to have the same planning period so that departmental professional development and common planning can occur during the school day. Currently no teachers in the building have their own classroom as every classroom is shared by 2-5 teachers. When planning room assignments, considerations are made so that teachers are not traveling far distances between periods unless the teacher has a prep period separating the two courses so that they have time to travel the further distance. Departments meet in classrooms for professional development since space is limited.

The current schedule is designed to allow for ongoing professional development during the school day. It is an integral part of the day that would be better enhanced with spaces that are conducive to teacher collaboration time and site-based professional development. In addition, the district utilizes half day release time for professional development. There is no plan to change the current practices for professional development but a new facility designed for this purpose would enhance the current practices and enhance cross disciplinary and vertical planning and collaboration opportunities.

Teachers currently have a few small and inadequately equipped workspaces in the building. As a result of the growth with students and teachers, previous spaces designated for teacher workspaces have been converted to staff office space or instructional spaces.

To support and promote cross curricular collaboration and to implement more interdisciplinary and project-based units of study, teachers require work spaces that centrally located near the instructional classrooms that can also act as a space for individual, content level and crosscurricular planning and professional development spaces. The space should be flexible so to allow for small group planning to occur simultaneously with a moderate group of educators receiving professional development.

There are five curriculum coordinators who serve grades 6-12. They serve as department chairpersons at the high school level. Therefore, the majority of their time is spent in the high school building. Currently, there are three small office spaces that are shared by them. The current spaces impede their ability to plan and review teacher evaluations in a safe, private area.

To ensure that the curriculum coordinators have space that supports their work. It requires spaces for both individual and collaborative work as well as shared meeting space where confidential conversations and phone calls can occur. In addition, their space should be such that they can meet with both small and large groups of teachers for curriculum planning, development and professional development. This space would be equipped with the technology supports such as charging stations and large monitors.

Although we have implemented a 1:1 technology initiative, educators still rely on actual textbooks and other supplemental materials, therefore, a small storage space is needed to store those materials to be easily accessible to the teaching staff. Additional shelving would be an adequate space to support the professional growth of teachers by providing a professional library of books and resources.

### **Design Response**

The proposed plan includes four teacher planning centers, two on each floor. These locations are centralized and highly visible as they are located directly off of the academic wings of the school. These spaces are planned to offer areas for storage, collaboration and will act as printing centers for faculty. Each will include a conference space for common planning meetings and professional development.

### Pre-Kindergarten:

The Sharon Public Schools Children's Center provides full-day and half-day substantially separate and integrated preschool education for students with disabilities. It is located in the Sharon Middle School. It serves approximately sixty-six students with and without special needs in an integrated environment. No changes to our current preschool program is proposed as part of this project.

### Kindergarten:

The Sharon Public Schools offers full day tuition-based kindergarten in each elementary school in addition to a free half day program housed at Heights Elementary School. No changes to our current kindergarten are proposed as part of this project.

### Lunch Program:

There are currently four lunches, each lasting 28 minutes long. Students generally dine by grade, and there are no plans at this point to integrate the lunches. However, if in the future, we transition from a departmental model to an academy model, the lunch schedule will be reviewed and revised as needed.

Currently, there is limited seating in the cafeteria for all students to eat within the lunch area. Many students can be found sitting in the hallway or in the library during their lunch periods. The serving lines are narrow and challenges the time frame for which students need to be served. There is an outdoor inner courtyard that students use when the weather permits.

In the future, the ideal cafeteria space would be large enough to seat <sup>1</sup>/<sub>3</sub> or <sup>1</sup>/<sub>2</sub> of the student population to optimize time on learning. Well-spaced food service stations and line with a variety of student seating options (i.e. booths, round tables, high tops) would enhance the student experience and allow this time to be one of social interaction and relaxation during the school day. In light of our robust visual and performing arts program, students would welcome an opportunity to share and display their talents. Therefore, the dining hall should include an integrated sound system, visual media (i.e. televisions), modern payment options, cameras, and charging resources for electronics to ensure its use throughout the school day. The space should be designed to allow students to use it after-school to study and complete homework rather than needing to leave campus for the local coffee shop.

The dining area should also include a separate but visible space in the area or proximity for a teacher/staff dining hall. Currently, there are two adjoining rooms that serve as a very small dining hall for educators. A proper dining facility for staff would allow teachers an opportunity to decompress between classes and collaborate over lunch. This space would include at least two staff restrooms. If student lunches decrease from four sittings to three or two sittings, the staff area would need to be large enough to accommodate a moderate group of teachers comfortably.

### **Design Response**

The proposed cafeteria is located at the end of the public entrance corridor and is open to a wide circulation zone that is intended to have flexible seating for students during the day. A snack bar is located at the entrance and on the corridor so students can purchase snacks and drinks. This

could also potentially act as a concession area during performances and games as these functions are in close proximity. Students will enter school in the morning from both ends of the main corridor and it is envisioned that they may congregate in and just outside the cafeteria before going to classes. The cafeteria also has a unique location with a view to the nearby lake and will be developed with outdoor seating as well as a variety of seating options within the space itself. A staff dining area will be located across the corridor proving some separation but reasonable proximity.

### **Technology Instruction Policies and Program Requirements:**

Technology is a tool that is necessarily and intrinsically embedded into much of the daily work of our students and staff. Teaching and learning is not only enhanced by the use of contemporary tools, it is hard to believe that any powerful learning experience didn't start with, was developed on, made use of, or was assessed using some form of technology. Our goal in how technology is used at SHS is consistent with that philosophy stated above, that technology is a necessity that holds the potential to enhance teaching and learning in profound ways.

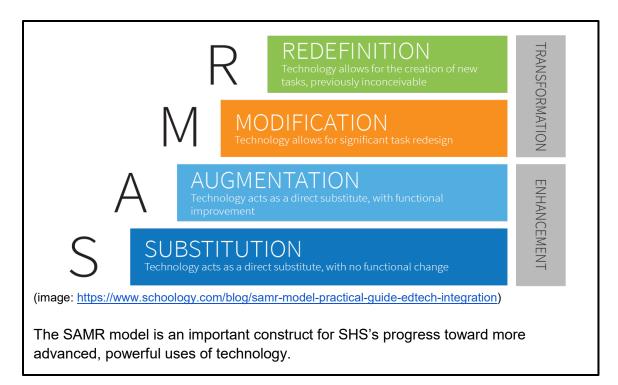
Currently, Sharon High School is in its third year of a gradual implementation of 1:1 access to mobile devices for all students and staff. All teachers and all grades 9 through 11 students have a MacBook Air laptop. Seniors and their classes still rely on either bringing their own devices or using laptops in the remaining carts stored around the building. There are 5 carts of 25 11" MacBook Airs.

Along with the advancements in mobile technology access, we have continued to cobble together a more contemporary infrastructure in and around existing, aging, often inadequate learning, working, and storage areas of SHS. One head end room with virtually no emergency back-up, and three IDFs with no A/C, connected by 1 Gig fiber, are connected to the internet with a shared 1 Gig/s fiber connection through Comcast (which is the primary connection for all five schools in the district). Over the last few years, we have run about 75 ethernet "home-runs" and have connected most of those to Aerohive wireless access points, getting close to an AP in each classroom. Each classroom is equipped with either a wall-mounted Epson interactive projector (2016-2018), a ceiling mounted projector (2012-2018) shooting to a Promethean Board (2008-2011), or a large format monitor (2016-2018). Projection and sound systems are all connected to a classroom Mac desktop. SHS has two Mac labs dedicated to graphic design and art, one general purpose lab used by computer science, journalism, and as a flex space, one foreign language lab, and one TV studio and classroom with 12 desktops. Those devices and all of the systems running on them are supported by two tech support staff.

Instructionally, the integration of technology and the promotion of best practices are supported by a .75 technology coach and the library teacher who are part of the district's Digital Literacy

Team. Teachers use technology in a variety of ways throughout the high school. The Digitally Enhanced Learning Initiative (DELI or 1:1 program) has brought with its professional development, incentives, and resources to promote a more hands-on, differentiated, innovative environment in the classroom. The use of a base Learning Management System, Schoology, allows teachers to organize, store, and present class materials and assignments electronically, making best use of student access. Additionally, the promotion of digital forms of presentation, assessment, research, communication, and writing have all been emphasized with this program. More time for teachers to collaborate, share, and explore technologically is always needed.

Unfortunately, keeping up with the demands of newer student learners who are used to being able to find, examine, and use information from anywhere at any time requires both infrastructure and pedagogical advancements. The current high school structure, with limitations on connectivity, power, storage, collaborative spaces, and open classrooms inhibits teacher creativity and student learning using technology. With each added hindrance, teachers grow increasingly reticent to experiment and develop more tech-based innovations in their instructional practice. For technology to be more fully and effectively integrated, teachers need to have more reliable access in spaces that promote collaboration, creativity, and communication. Increased support through more robust professional development is also key.



In a future-ready building, our hope is that technology is not only ubiquitous, but it is incredibly reliable, powerful, and easy to use. A new high school with a strong, scalable, and advanced infrastructure, would allow English teachers to bring in primary resources, make connections with authors and journalists, write and edit with peers around the world, and publish works in

ways we haven't even invented yet. Science teachers would be able to embed 3D virtual labs and investigations into their regular routines, perform experiments with new levels of precision, and also collaborate with experts from around the world. Math students could be exploring advanced models and developing complex representations of algebraic, computational, or geometric theorems using more powerful tools. Musicians, artists, and designers could be creating visual and aural projects that are unimaginable today.

Key to these exciting possibilities will be research and exploration of new tools and new pedagogies, supported by curriculum coordinators, digital literacy team staff, and the sharing of colleagues within the high school. The support team is in place now, but will need to continue to do research and advance their own knowledge of newer, more powerful networks, devices, and curricular tools. The technology coaching staff will also be critical to the success of the integration and the ability to get more and more instruction in the Redefinition portion of the SAMR model shown above.

### Media Center/Library:

Another critical component of the advancement of teaching and learning is the school library. As a hub of curated resources, a space for collaboration and presentation, a place to incubate and develop ideas, and an area devoted to research and literacy (in all its forms), the modern library can be one of the most important spaces in a school. If designed well, SHS's library could be a central spoke in the daily life of our school.

Today, the SHS library, which consists of one large 50' x 50' open space and several small offices, is one of the most up-to-date spaces in the building, and yet its distance from most classrooms, its closed-off entryway, and its slightly awkward second floor location provide challenges to its full use and effectiveness as a learning common. That being said, the current staff and administration have worked hard over the last few years reshaping the furniture and fixtures of the library to create more open and varied spaces, more flexible seating options, more mobile work spaces that promote collaboration, and more creation tools in a Makerspace complete with a green screen video area, robotics, electronics, art, and musical equipment. While there are some fixed desktops, the expansion of mobile devices and "collaboration stations" allow for more teams of students to work and learn together.

Students come to the library throughout the day, sometimes with a class, and sometimes on their own or in small groups. All 9th graders are introduced the current resources at the beginning of the year, and then receive brief tutorials on responsible research/citation practices and use of the online catalogue and databases. One full time Librarian and one part time assistant teach those classes, as well as co-teach with several classes throughout the year, offer before and after school

open library time, sponsor book clubs and poetry projects, and help organize community events from STEM Talks to cultural performances.

While the library has grown in many positive ways over recent years, the actual architecture of the space has continued to present challenges. Our hope is to have a library with a variety of spaces that allow for multiple uses simultaneously. Where maker activities are more active and collaboration is louder, many come to the library to read, write, and research in a quiet place. Better acoustics, design elements like knee walls or glass dividers could allow for all kinds of work and learning while avoiding either the space getting too loud/distracting or the need for staff to hush students relaxing or exploring together. Also, with the advent of maker spaces or innovation centers in other parts of the proposed building, the need for an actual Makerspace in the library decreases greatly. While collaborative or project-based learning activities may still happen in the library, the need for space, storage, and "maker" tools would move to a larger, more open space, conducive to collaborative designing, building, and creating projects.

Furniture that is comfortable, flexible, and includes the requisite need for power and data are sorely lacking in our current space, but could enhance the library experience for everyone. Having those larger and changeable set ups in the library would also allow for whole classes to research or receive direct instruction, would allow for community performance space, and could be the launching point for real-time connections with the global community.

The library, as a central hub, will be overseen by our excellent library staff, currently one library teacher and one assistant. As we do now, the library is open from before school starts until well after school closes. The library is often used for afterschool and evening clubs, activities and events, and we hope to continue and perhaps expand this access, especially as we improve the physical offerings. During the day, teachers will work with library staff to arrange for class visits and work with the library teacher. Sign-outs will be arranged for peak demand of the small group collaboration areas.

### **Design Response**

The library in the preferred option is located on the second floor in a central location at the end of the academic circulation spine. The space is located so that it can be closed and accessed from the main entrance and main entrance stair while the rest of the academic area of the school is closed off. This will allow for public access, evening and weekend use when the rest of the school is not occupied.

### Visual and Performing Arts Programs:

The arts are highly valued in Sharon. Our community prizes the arts as an important piece to living a balanced life, and as a result, a significant proportion of students are involved in visual and performing art opportunities throughout their school career.

Students can take courses in Art, Music and Theatre. They have opportunities during the day and in a variety of extra-curricular clubs after school. Students from Sharon are award winning. Currently, the Sharon High School Theatre Company is the state champion in Drama. Students from our music program are nationally recognized on their instruments and in singing and consistently place in the top tier at Districts and SEMSBA. Each year our visual artists are Gold Key winners at the Scholastic Art Festival. Students from visual and performing arts go on to the top colleges and universities in the country to pursue their passion in the arts.

The Sharon High School Art Department offers 20+ Visual Arts classes spanning traditional and digital media, 2D & 3D animation, from Intro to AP level. All of the classes run at least 1 section per year, putting enrollment in the arts between 40-45% of the student population.

The Sharon High School Performing Arts Department consists of theater, vocal and instrumental music courses and performance ensembles. Ensembles include the Band, Jazz Band, String Orchestra, Chorus, a number of small instrumental and vocal ensembles, and Drama. Elective courses are Theater Production, Acting, Improvisation, Music Technology, Guitar, School of Rock, and Music Theory. Approximately 35% percent of the student body participates in the program.

All courses in any art require specific facility needs which are woefully inadequate at Sharon High School. There is one music room and one auditorium to accommodate the rehearsal and performance needs of the entire music and theatre program, resulting in a significant shortfall of space, time, and learning opportunities. As a result of the shortfall, music courses are taught in the following areas: the string program meets in the cafeteria; the music technology classes meet in a technology lab in another part of the building and in an art room; vocal music groups, music theory, and drama classes meet in the auditorium, sometimes at the same time; and guitar class meets in the music room. Teaching in rooms not intended for performing art use prevents the direct instruction and interaction students' need. They also create classroom management issues that distract from learning and work output.

One of our current hurdles is the use of the auditorium as classroom space. This space is large and is not set up for a classroom. Our drama classes do not have access to adequate technology, privacy, or space when the class is conducted in the auditorium. Much of drama is about taking risks as a performer, and the fact that the auditorium is often a pass through, or in use by other groups during a class time, prevents teacher and student from building a trusting relationship. As in the performing arts, the visual art facilities are sorely lacking. The 2 studio rooms were originally built for the early childhood program. The former art rooms were taken over for science labs, as these rooms were much larger, but they were designed to meet the demands of an art room, unlike our current space. The newer rooms are much smaller and limit the ability to deliver the curriculum adequately and, in some cases, we are not meeting the state standards. The furniture, which lacks any flexibility, is inappropriate for the kind of artwork done in an art room, and severely limits mobility. In addition, the room was not designed with art in mind and therefore lack any functional display spaces, demonstration spaces, storage spaces, still life set-up spaces, life drawing spaces etc. In short, the curricular needs of art are not being met due to lack of appropriate space.

All of the arts share the same problem in that the spaces were not designed with flexibility in mind. All rooms lack storage for student book bags, which are placed next to chairs since, along the walls, there are all the materials associated with each discipline. The music room not only accommodates instruments, chairs and stands, but a large collection of percussion instruments along the rear wall. Art rooms have pottery wheels, easels, still-life setups, and displays. In each of these rooms there is little room to maneuver thus preventing the instructor from circling the room to assist students.

In our music room, the three walls are cinder block and the fourth is glass. Only recently were sound absorption panels installed to lower the decibel range in the room. Currently there are no practice rooms in the building, and since our after-school programs are so robust there is little space for students who wish to increase their abilities to work. Without practice rooms dedicated to individual and small group rehearsing, there is little opportunity for one-on-one teacher-to-student coaching before, during, or after school. Such instruction can greatly improve the student's musical development and achievement. With so many classes and so little space, the music room and auditorium experience rapid turnover when setting up for multiple classes every day. This results in the loss of a large amount of instruction time because of setting up at the beginning and resetting at the end of class.

The auditorium, which must function as a classroom, and a performance space, constantly has to be set up and broken down to meet the demand of the space and the wide variety of users. This significantly cuts into instructional time for our drama teacher, and requires students to work as a moving company to get the space set up, rather than attending to academics. In addition, the stage lighting and sound are completely out of date and each year require costly repairs and adjustments.

The computer labs, where our digital art and music take place are marginally better. While the rooms accommodate standard class sizes, the equipment is cobbled together, old and new. Printers are often not working in the photography classes, and the budget limits the number of

cameras available for instruction and student use. The furniture, both tables and chairs, are large, old and worn, and are not conducive to collaboration or focused work. While one lab has more recent iMacs, the other, which was not designed for real graphics work, is made up of five-year-old Mac Minis, that cannot handle the rendering demands of contemporary programs.

The lack of additional labs in the building limits additional course offerings like Architecture, Urban Design, and Industrial Design, to name a few. More art rooms/facilities are needed in addition to larger, more adequately designed spaces. Though we teach photography, there is no dark room, nor is there room for a spray booth.

Additionally, there is currently insufficient access to outdoor spaces, further limiting instructional opportunities.

Overall, a future facility should address all of the above-mentioned issues by providing dedicated space for all visual and performing arts, space that has storage, and rooms that maximize instruction opportunities will infuse all our programs with excitement and enthusiasm, as well as show a respect for visual and performing arts instruction in the school.

We envision our visual arts department t would live in a place where it can be observed daily, where students and staff can see the art-making process and the results. Ideally, the arts and other curriculum areas work together regularly and the facilities support that. Therefore, the spaces should be integrated into the content curriculum areas.

A future performing arts center would have two dedicated performance spaces. One Mainstage Proscenium Theatre/Auditorium with seating for 750 to be used for assemblies, large-scale performances, and other high-attendance events. And one drama classroom /multi-purpose room, with potential seating for 100-150 to be used for classes, presentations, small scale productions, and other low-attendance events.

The addition of a non-furnished theatre/multi-purpose room with space to build, rehearse, and design would help ensure that the educational needs of our drama classes and after-school program can always be met. At times and with frequency, use of the stage and auditorium is compromised by school/community events. This hampers daily lessons, as well as progress on the development of theatre and music productions. A supplemental space such as envisioned would eliminate this problem. Additionally, the existence of the space could foster opportunities for larger groups of students or community members (50-75) to come together for speeches, debates, min-forums, exhibitions, video presentations, smaller musical/acting performances, and interdisciplinary programming - both during and after the school day. Scheduling conflicts with other gathering spaces such as our library, cafeteria, and gymnasium could also be eased.

### **Design Response:**

The preferred option places the arts in the center of the school. The auditorium is adjacent to a theater classroom which will double as a black box, back of house area and large multi-purpose classrooms for all disciplines. Music is directly adjacent to the auditorium allowing for the easy transport of instruments to and from the stage and allowing music rooms to be used as green rooms for performances. The adjacency of theater and music to the first floor STEAM classroom provides the opportunity to use this large multi-purpose classrooms are located on the first and construction in support of the theater program. Visual arts classrooms are located on the first and second floor directly off of the major circulation spine, making these spaces visible to all students moving through the building and on the first floor, offering direct access to the exterior of the building for outdoor projects. The second floor has a series of technology classrooms that can be deployed as lab space for classes like digital arts and architecture.

#### Wellness & Athletics Programs

Sharon High School strongly values the health and wellness of all of its members: students, faculty, staff, and community. Our current facility does not permit the offering of programs, services, or activities that the schools or town of Sharon deserves. All would benefit from a well-designed gymnasium, fitness center, multi-purpose rooms, and locker room facilities. Our existing facility and adjoining fields are currently utilized by the school for all of its wellness/PE classes, interscholastic athletics, and our town's community education and youth sports' programs. The indoor and outdoor facilities play host throughout the school year and through the summer for these various programs.

Our existing gymnasium, due to its 1950's construction and lack of renovation, is not air conditioned, not well-ventilated, and runs the extremes of being uncomfortably cold in the winter and intolerably hot in the summer. We have managed to put temporary upgrades into sound and technology, but all updates are patches and not permanent renovations. Our facility fails to meet most state laws and regulations for handicap accessibility, hosting playoff games, and lacks the capability to be divided into adequate spaces for simultaneous multiple-group use. Consequently, in our new facility we aim to solve most of these shortcomings of our current facility.

The new gymnasium should be air conditioned and large enough to accommodate three teaching stations with proper drop-down curtains. The new facility should also include a modern fitness center and adjacent multi-purpose rooms for wrestling, yoga, dance, cheer and other club activities. The fitness center must improve upon the existing "weight room" that services football players and wrestlers. An emphasis will be placed on outfitting the new center with modern cardio-vascular training equipment that will be accessible and beneficial to all students and all sports teams. It should also be made readily available to our faculty and staff. Its current small size (900 sq. ft.) and emphasis on strength training is not ideal for the school and community.

The current gymnasium and weight room negatively impacts the Wellness program we can offer to our high school students. Due to the lack of space, our curriculum only requires Wellness credits from our freshmen and sophomore students. Juniors and seniors are excluded from the lifelong benefits of wellness education concerning physical activity, nutrition, and sex education. We would like to expand our Wellness offerings to students in grades 11 and 12 as well as offer various elective classes such as Yoga and Dance, sports-skills development, and cardiovascular fitness training while continuing to enhance the students' knowledge of healthy living. Our Wellness curriculum is also hampered with the lack of a turf field in the stadium adjacent to the gymnasium. Most Wellness classes are restricted to indoor activity or to the parking lot due to the typically wet mornings in the fall and spring seasons.

Our new facility should include a gymnasium large enough for three teaching stations which can be divided off by drop-down curtains. Due to the programming we offer, two additional multipurpose rooms including a Yoga/Dance/Cheer studio and Wrestling/Fitness classroom should accompany the new gymnasium. These spaces will be located near the gym and near a main corridor so that students can easily access them and so that health and wellness are made visible to the entire school community. Wellness locker rooms and teacher offices must be located within easy access of the gymnasium to allow our Wellness students to be properly supervised for changing before and after class without losing valuable instructional time due to traveling from the locker rooms to the facility.

Additionally, the existing facility, and the new proposed gymnasium and Wellness rooms, are, and would be, utilized by our extensive state-sanctioned athletics' programs:

- · Baseball (boys): varsity, junior varsity, and freshmen
- · Basketball (boys and girls): varsity, junior varsity, and freshmen
- · Cheerleading: competition and game-day
- · Cross Country (boys and girls): varsity and junior varsity
- · Field Hockey (girls): varsity, junior varsity, and freshmen
- · Football: varsity and sub-varsity
- · Golf: varsity
- · Gymnastics: varsity
- · Ice Hockey (boys and girls): varsity and junior varsity
- · Indoor Track (boys and girls): varsity and sub-varsity
- · Lacrosse (boys and girls): varsity and junior varsity
- · Sailing (boys and girls): varsity
- · Soccer (boys and girls): varsity, junior varsity, freshmen
- · Swimming and Diving (boys and girls): varsity
- Tennis (boys and girls): varsity
- Track and Field (boys and girls): varsity and sub-varsity

- · Ultimate (boys and girls): varsity, junior varsity
- · Volleyball (girls): varsity, junior varsity, freshmen
- · Wrestling: varsity and junior varsity

These extensive programs serve over two-thirds of our student body annually. Consequently, state-of-the-art facilities both indoors and outdoors are a critical need of our program. Our numbers continue to rise with the addition of new sports programs such as Ultimate, and club sports such as Rugby, Disc Golf, and Badminton. The new facility should be able to accommodate this growth and development. Male and female locker rooms are essential for both home and visiting teams, ample storage for large equipment, Athletic trainer office and exam/treatment area, an office for the Athletic Director and the Administrative Assistant, wrestling practice mat storage adjacent, or as an integral part of the wrestling/fitness class room, locker room with shower facilities for our coaches and referees. Careful consideration should be given to the location of the Athletic Director's office. They are responsible for the supervision and scheduling of all teams and areas of play in regards to our athletic program. Therefore, this office should be located in an area that allows easy access to the fields and is in close proximity to the gymnasium, fitness center, multipurpose rooms and team locker rooms.

Our vision for the gymnasium is a multi-purpose facility that has a regulation court down the center and appropriate stands for varsity athletics and the expected crowds that attend. We need to meet current and future regulations and standards for handicapped seating and movement into and out of the gymnasium. Additionally, the gym floor should include three standard basketball/volleyball training courts laid side-by-side, and counter-posed to the regulation court, to maximize practice space and times for the three levels of high school sports programs we have, and for three simultaneously scheduled Wellness classes to utilize during the school day.

With our large running program (cross country, indoor and outdoor track and field, wellness classes) an elevated track above the gymnasium floor should be installed. This would give fulltime use for faculty and staff, the community, as well as our daily high-school students, at any time throughout the school day, week, and year. The design of the ceiling should also be thoughtfully considered to include essential components of the wellness and athletics programs. These essentials include motorized curtains, basketball hoops, and an indoor batting cage that can be lowered upon demand and setup with ease. The ceiling equipment should have a centralized keypad control station for operator use and safety.

Our outdoor facilities are also in need of modernization. On the school campus itself, we are fortunate enough to have a stadium, however, it lacks adequate seating capacity to host tournament events, has no outdoor restrooms, utilizes a stand-alone basic shed with no internal power as a concession stand, a poor-quality grass field which takes hours of maintenance to keep in playable condition, and a 6-lane track that limits the size events that can be hosted. These

facilities are far from ideal for the level and number of competitions hosted throughout the fall and spring seasons. The baseball diamond and field hockey field share the same patch of grass eliminating simultaneous use. Soccer, lacrosse and football teams, plus all sub-varsity teams, must practice and compete offsite of the high school campus. This too creates safety issues and awkward practice schedules for athletes who are not fortunate enough to practice at the high school itself. It is essential to update the grass field within the stadium to turf. This would allow extensive practices and games for all of our sports programs to enjoy. The addition of lights in 2018 allows for sequential games and practices to be held. The community and youth groups could also utilize the facility on weekends and in the summer. Permanent playing surface and game-field lines would allow DPW to focus its efforts elsewhere.

While our indoor and outdoor facilities may have met the needs of our students from the 1950s to the 1990s, they have certainly lapsed since and fallen behind what is required of all state schools today. We look forward to enhancing our current Wellness curriculum and expanding its offerings to upper class students once again. Our athletic programs will truly benefit as well from a well-designed modernization plan and quality construction of both indoor and outdoor facilities.

The last Coordinated Program Review was in 2013 and any identified issues have since been remedied. The next Coordinated Program Review will be in the spring of 2019.

### **Design Response**

The preferred option locates the gym near the main entrance for game day visitors and for community use. Directly adjacent to the gym and located on the main entrance corridor are two multi-purpose spaces. This location will make the schools wellness programs present for staff and students and indicate the value the school puts in these activities. Locker rooms are located adjacent to both the gym and outside athletic facilities.

### Vocational Education Programs (non-chapter 74 programming):

Sharon High School currently offers several different vocational, technical, and STEM options for students. More offerings will be added in the future with the space that a new facility would provide. Current offerings include two engineering design courses (semester), four computer science courses (2 full year and 2 semester), several STEAM courses in both the science and art departments for example 2D/3D animation, forensic science, and TV/media production to name a few. In addition, the library includes a Makerspace. For details about these offerings and information about proposed programs please see the following departmental sections of the Educational Program as follows:

• For computer science and business courses see the Mathematics section.

- For engineering, robotics, and other STEAM courses see the Science section.
- For TV/Media production, 2D/3D animation and other STEAM offerings see the Visual and Performing Arts section.
- For information about the Makerspace see the library/media section.

### **Chapter 74 Programming:**

There is currently no Chapter 74 programming at Sharon High School, nor is there a desire to add Chapter 74 programming at this time.

### **Core Educational Activities Inside General Classrooms:**

Within general classrooms teacher utilize a blend of traditional learning, inquiry-based learning, project-based learning, dialogs and discussions, audio/visual presentations, group work, and hands-on activities. As such each classroom needs to have the infrastructure to allow for each of these types of activities to take place. In addition, teachers frequently use technology in the form of PowerPoint presentations, short videos, and utilize the 1:1 student laptop to assist in delivery of instruction and in assessing student learning.

### **Core Educational Activities Outside General Classrooms:**

Currently, Sharon High School has one outdoor classroom space within one of the school's three courtyards. There is a sign-up sheet for teachers to book this space. In addition, several teachers will use the grounds around the school to bring their classes outside. Science classes take students outside to complete laboratory activities such as estimating populations, making observations, and investigating natural phenomenon. Physics classes will use outdoor space for labs on projectile motion which cannot be done as easily indoors. Whenever outdoor space is utilized teachers remain with their classes to monitor them.

Students in the Pathways Program assist in maintaining gardens both in the courtyards and around the school facility. They also help manage the recycling program in the school. Environmental Science students have also completed project work in the courtyards and around the outside of the school. As such outdoor garden and lab space should be easily accessible to both the science classes and the Pathways Program.

It is our hope to continue to provide learning spaces that take advantage of an open-air environment. Currently, existing outdoor spaces have been the setting for direct instruction, class discussions and readings, writing and reflection, drawing/painting, scientific investigations, presentations and performances, and other learning-oriented sessions. Two such open-concept spaces are proposed in the current conceptual plan. As the case is now, these spaces would likely have paved areas. In this way, necessary maintenance is minimal. Additionally, seating could be accommodated with light, movable, and weather-proof furniture (e.g. benches). The safety, security, and accountability of students would be attended to by faculty, as the case is now when such spaces are utilized. The outdoor spaces will be accessed directly from an interior classroom or hallway.

### **Transportation:**

School buses, parent/guardian pick-ups/drop-offs, and arriving/departing staff all currently use the same entry and exit areas. The primary point for the vast majority of the population is in front of the high school off the only main road passing the high school. This creates significant congestion and puts drivers and walkers at risk. Three parking lots in the vicinity of the high school are used by students - one directly across the street from the high school, one adjacent to the lake near the high school, and one about a block away from the high school at a nearby religious center. Student busing and parking are fee-based. Staff currently park in four different areas around the school, which isn't ideal for the security of the facility before or after school.

The future complex should consider that there are limited public roadways leading to the school, so congestion is unlikely to be eliminated. Steps could be taken to mitigate the traffic and improve safety, however, by creating an access road around the school with additional entry/egress points, identifying helpful walkways with adequate lighting, ensuring separate vehicular paths for school buses and parent/guardian picks-ups/drop-offs, and developing a centralized parking area for staff that also preferably steers them to one main entrance.

**Design Response** – The site plan for the preferred option anticipates a separate car and bus loop along with multiple routes for pedestrians as student parking is distributed in multiple locations. A new central parking field offers the opportunity to have a direct path to the front door and will allow busses and cars to be close to the main entrance for dropping and picking up passengers. The new access road will be longer than the current one allowing for additional vehicle stacking on site and off of the public roadway.

### Functional and Spatial Relationships and Key Programmatic Adjacencies:

Administration Offices and the Nurse's Office should be located at the main entrance of the building to provide easy access to administration and to assist in building security. A Guidance and Student Support Services suite should be located toward the main entrance but separate from the administrative offices.

The following spaces should be accessible to the community without compromising the security of academic portion of the building: Community Education, TV/Media Studio, Gymnasium, Auditorium, and Library Media Center.

The cafeteria and student gathering space should accommodate <sup>1</sup>/<sub>3</sub> to <sup>1</sup>/<sub>2</sub> the student population at any one time, be centrally located, and have secure access to the outside. A school store would be located near the cafeteria/student gathering space. Custodial area should be near the cafeteria and convenient to deliveries. This should include a loading dock and mechanical area.

Site adjacencies should include an outdoor laboratory space for science classes, especially for environmental science and biology. Within the outdoor laboratory space, should be a greenhouse of sufficient size to support the science department. An observatory to house a 12" celestron telescope is necessary to support the astronomy classes and ideally would also be accessible to the community for evening events.

The proposed high school would maintain a departmental structure while creating the opportunity to move toward more interdisciplinary and project-based learning approaches. A large academic center or centers should be located within the academic areas of the school.

**Design Response** – The preferred option is organized around certain basic concepts. A public corridor allows access to the gym, auditorium and cafeteria on the ground level and library on the second level for public after hours use creating a community building. Community education and TV studio have direct access to the exterior. Both major building entrances are into the same corridor. The classroom wings rotate around a building core comprised of the arts and technology so every academic discipline is visible and accessible to all students. The classroom wings form outdoor spaces that can be used for programs ranging from science instruction to art activities. The building is organized to avoid an existing wetland and to take advantage of views into the landscape and to the nearby lake.

### Security and Visual Access Requirements:

Emergency response plans are developed in collaboration with the police and fire departments. The in-house SRO is part of the team that evaluates what's in place, and the principal, nurse, and various members of the staff play important roles in drills and crisis moments pertinent to the safety of the school community. This group, in concert with local officials, would update existing emergency response plans. The most recent Medical Emergency Response Plan was submitted to the DESE in September of 2018.

Currently, there is an antiquated b/w camera system that helps monitor a number of exterior points around the perimeter of the school. This will need to be significantly improved. There

are also no cameras on the inside of the building, which will be a necessity in a new or updated complex to emphasize the district's commitment to safety. Further, there is limited to no ability to secure and/or close off large sections of the building that do not require access from public or school populations that may using one section of the building (e.g. gym, auditorium). Restricting portions of the building from access when they are not being used will help maintain the integrity of those spaces.

Access to the building before and after the school day is difficult to control at this present point in time. There are several entryways, and students, staff, and guests arrive from different points. In the future, it would be ideal to design the facility so that stakeholders are guided (via signage/walkways/intercom stations/parking) to limited entry ways that can be monitored by school staff and a modern security camera system.

The school's current main entrance is awkward and not user-friendly or straightforward to guests who come into the school. Though security doors, a buzzer system, and camera are in place to help with safety, existing stairs, a lack of signage, and a series of required turns make it difficult for those visiting the school to figure out exactly where they should report to check in. Students also gather in this area before/after school making the space very congested. A future building would resolve these and other concerns with a larger foyer, with improved sightlines to check-in areas (i.e. main office or student services) and with student gathering spaces stationed away from the main entrance.

**Design Response:** The proposed building will have a secure entry vestibule to control visitor access at the main entrance. Corridors within the proposed school have direct sight lines. The main entry corridor is intended to be wide enough to accommodate larger groups of people. The classroom wings can be locked down in the event of an intruder and are separated from the main building entrance.