Somerville High School







1. INTRODUCTION

- 1.1 Statement of Interest Summary
- 1.2 Invitation to Feasibility Study
- 1.3 Design Enrollment
- 1.4 Capital Budget Statement
- 1.5 Project Directory
- 1.6 Project Schedule

2. EDUCATIONAL PROGRAM

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- 2.2 Class Size Policy
- 2.3 School Scheduling Methodology
- 2.4 Teaching Methodology and Structure
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- 2.7 Kindergarten
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- 2.16 Transportation Policies

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- 3.2 Narrative description of the variances between the Districts proposed program and the MSBA guidelines
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- 4.10 Traffic Report (attached as separate document)
- 4.11 Geo-Environmental Report (Phase 1) (attached as separate document)
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- 8.3 Approved Design Enrollment
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Section 1 - Introduction

1.1 STATEMENT OF INTEREST SUMMARY

The existing Somerville High School is located at 81 Highland Avenue, in Somerville, MA. The existing school was built over the course of many years, with the oldest portion dating back to 1895. The site measures approximately 13 acres around the high school, and is located on a shared parcel that also includes Somerville City Hall and the Somerville Main Public Library branch.

In April, 2013, the City of Somerville submitted a Statement of Interest (SOI) to the Massachusetts School Building Authority (MSBA) for the High School. At the November 19, 2014 Board of Directors meeting, the MSBA board voted to issue an invitation to the City to conduct a feasibility study for this Statement of Interest to identify and study possible solutions and, through a collaborative process with the MSBA, reach a mutually-agreed upon solution. The SOI focused on the replacement, renovation or modernization of aged and inoperable facility systems, and replacement or addition to obsolete buildings to provide for a full range of educational programs. Since the submission of the SOI, an evaluation of all major building systems has shown that the HVAC, plumbing, electrical, technology, fire alarm and emergency power systems are all at the end of their useful life. The existing 360,000 square foot building, with the oldest section dating back to 1895, is supported on conventional spread footings; aside from the most recent additions constructed in 1986, there is no lateral force resisting structural system in the building. The existing exterior wall system is a combination of uninsulated brick mass masonry walls and brick veneer walls over metal stud backup with limited insulation within the stud cavity. The existing building is completely noncompliant with the current energy code. The building is partially accessible but the third and fourth floors of the school are served by a single elevator that does not comply with current car size requirements. Asbestos in located throughout the building including behind the exterior brick veneer in the 1986 construction; see Section 4.9 for a detailed analysis. In addition, there are a number of general educational concerns in the building including: a geographic separation between the general academic and vocational portions of the comprehensive high school; classrooms not equipped for 21st century instruction; and a lack of differentiated learning environments. Additional existing conditions information is included in Section 4 and the complete SOI is included in Appendix 8.1.

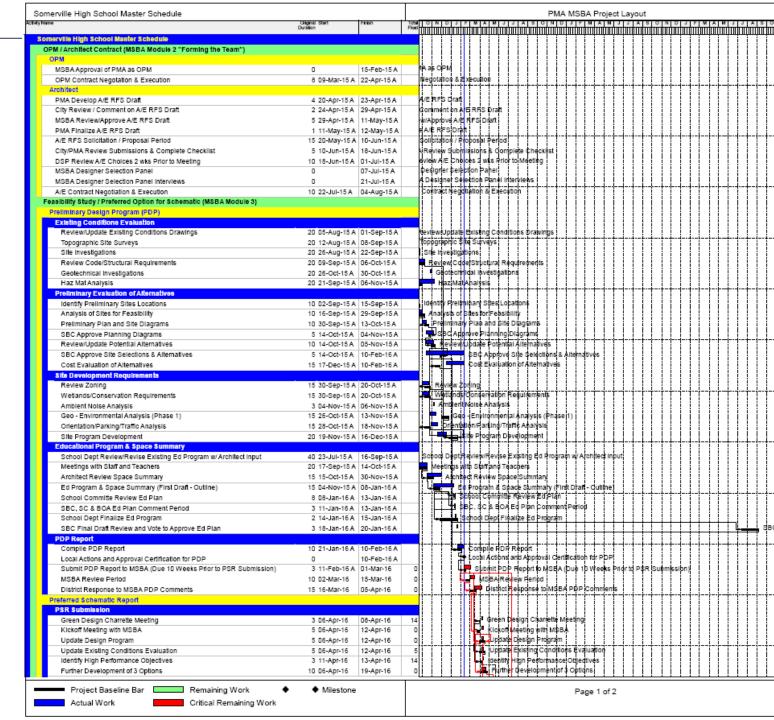
1.2 INVITATION TO FEASIBILITY STUDY

At the November 19, 2014 Board of Directors meeting, the MSBA board voted to issue an invitation to the City to conduct a feasibility study for this Statement of Interest to identify and study possible solutions and, through a collaborative process with the MSBA, reach a mutually-agreed upon solution. The invitation is included in Appendix 8.2.

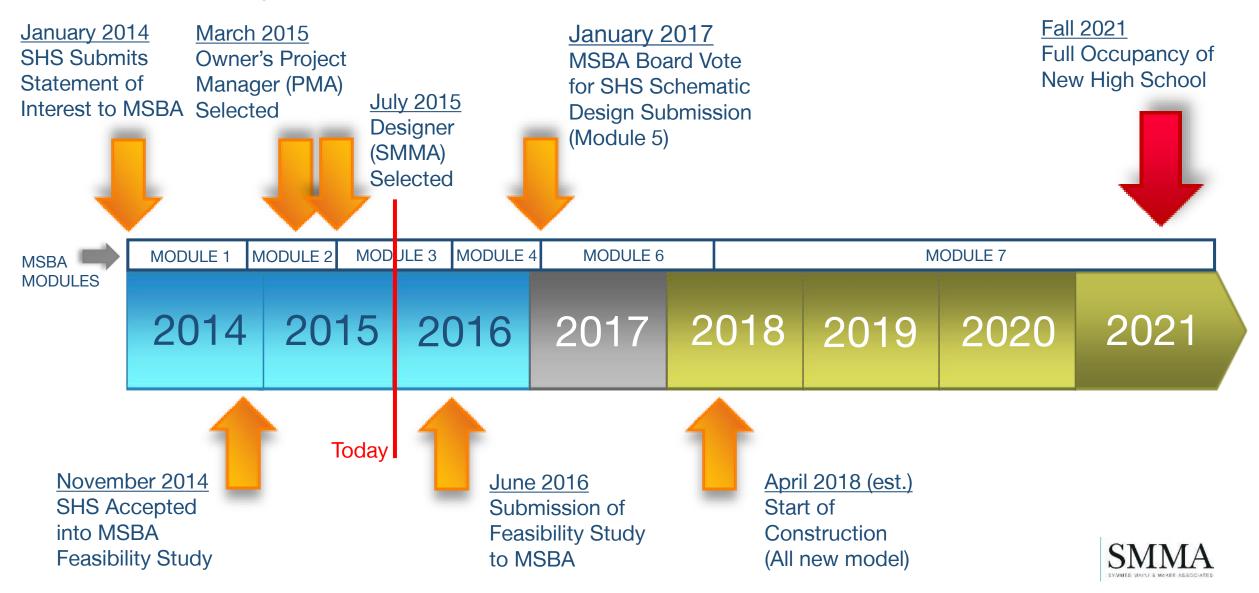


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1.6 Project Schedule



Preliminary Design Program (PDP) - Submit March 1st 2016

Conceptual Cost estimates by Designer (SMMA) with Owner's Project Manager (OPM – PMA) support & review

- 1. School Building Committee (SBC) vote on full report
- 2. School Committee Chair's approval and signature
- 3. Superintendent's approval and signature
- 4. Mayor's approval and signature



Preferred Schematic Report (PSR) - Submit June 1st 2016

Cost estimates by SMMA & PMA

- 1. SBC vote on full report
- 2. School Committee Chair's approval and signature
- 3. Superintendent's approval and signature
- 4. Mayor's approval and signature
- 5. Board of Aldermen vote on funding ballot question



Schematic Design (SD) - Submit November 28th 2016

Cost estimates by SMMA & PMA

- SBC vote on full submission.
- 2. School Committee Chair's approval and signature
- 3. Superintendent's approval and signature
- 4. Mayor's approval and signature
- 5. Board of Aldermen vote on funding full project cost



Design Development (DD) - Submit July 5th 2017

Select Construction Management team (IG approval)

Cost estimates by SMMA & CM

1. SBC vote on full submission



Construction Documentation (CD) – Complete April 11th 2018

Cost estimates by SMMA & CM at 60% and 90%

Early construction or procurement packages by SMMA & Construction Management team (TBD)

1. SBC vote on full submission



2. EDUCATIONAL PROGRAM

2.1	Grade and School Configuration Policy
2.2	Class Size Policy
2.3	School Scheduling Methodology
2.4	Teaching Methodology and Structure
2.5	Teacher Planning
2.6	Pre-kindergarten
2.7	Kindergarten
2.8	Lunch Programs
2.9	Technology Instruction Policies and
	Program Requirements
2.10	Visual Art Programs

SMMA

Section 2 Educational Programming

EDUCATIONAL PROGRAM

2.1 GRADE AND SCHOOL CONFIGURATION POLICIES

A. Current grade configuration

Somerville High School currently serves students in grades 9-12. The ages of students at SHS range from 13 to 22 years old. The current SHS Grade 9-12 configuration includes a small group of special education students whose IEPs call for education until they are 22 years old. They belong to either the Life Skills program or to the SHIP program which services students with complex medical/health issues.

B. Proposed grade configurations to be considered

While no changes are planned to the existing 9-12 grade configuration for the comprehensive curriculum at SHS, the district's special education day/alternative junior high school and high school (Next Wave - grades 6-8; and Full Circle grades 9-12) are planned to occupy a portion of the new Somerville High School design as a separate educational program located in a substantially separate space within the building that includes a separate entrance. Students who currently attend Next Wave and Full Circle are housed in a separate building, the Edgerly, which is a 15-minute walk from Somerville High School. The design of the school is to serve 60% students on IEPs and 40% students who are at risk and need an alternative education model. Although some Full Circle students are independent enough to take classes in the CTE program at SHS or to participate in sports and extracurricular activities at SHS, the sheer distance between the buildings and commute time serves as a barrier for this to happen on any regular basis. Our current proposal aims to locate Next Wave/Full Circle within the new SHS building so that this group of students, if their education plans allow for it, can benefit from a more comprehensive school experience by having easy access to CTE programs, sports programs, clubs and extracurricular activities, a full-time nurse, and ELL services.

C. Advantages of proposed grade configuration

I. Describe District's Approach to Facilitating Student Transitions

A transition plan is in place for rising 8th grade students throughout the district to visit Somerville High School and to attend a formal transition orientation during the summer months. These transitional experiences have been successful in helping SHS staff identify the academic, social and emotional needs of rising 8th graders so that they are able to make a more seamless transition to the 9th grade. Somerville High School also offers a Ninth Grade Experience (NGE) designed to provide a strong support structure to ninth graders as they ease into high school.

Ninth grade teachers function as a team and meet two times per week to determine



2. EDUCATIONAL PROGRAM

2.1	Grade and	School	Configuration	Policy
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2.5 Teacher Planning

2.6 Pre-kindergarten

2.7 Kindergarten

2.8 Lunch Programs

2.9 Technology Instruction Policies and

Program Requirements

2.10 Visual Art Programs

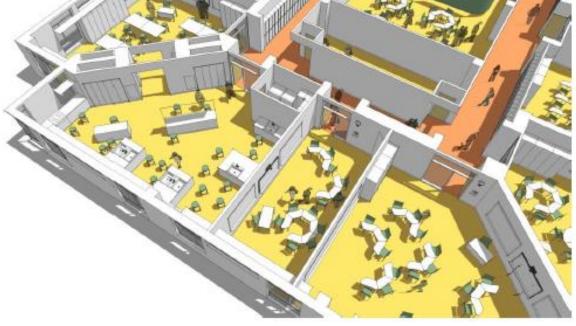
Blook	Start	End	Monday	Tuesday	Wednesday	Thursday	Friday
1	7:55	9:02	A1	A2	A3	A4	B4
2	9:06	10:01	B1	D2	B2	B3	C4
3	10:05	11:00	O1	Rotating Extension Block	C2	C3	D4
4	11:04 11:34 12:04	11:34 12:04 12:34	D1	E2	D3	E3	E4
5	12:38	1:33	E1	F1	F2	F3	F4
6	1:37	2:32	G1	G2	Advisory/Common Plan. Time/Assemblies	G3	G4



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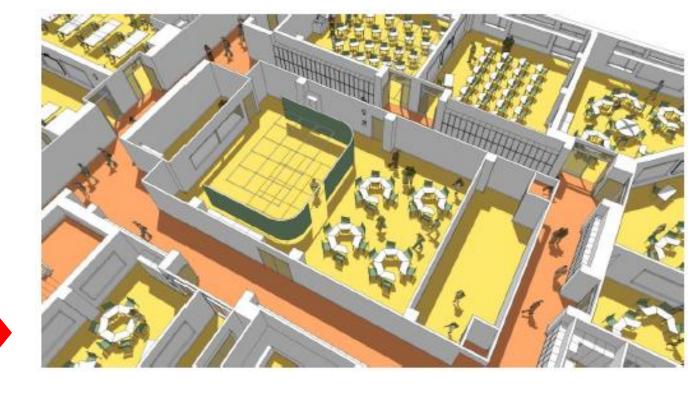






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2. EDUCATIONAL PROGRAM

2.11 Performing Arts Programs

2.12 Physical Education Programs

2.13 Special Education Programs

2.14 Vocations and Technology Programs

2.15 Narrative description of the types of

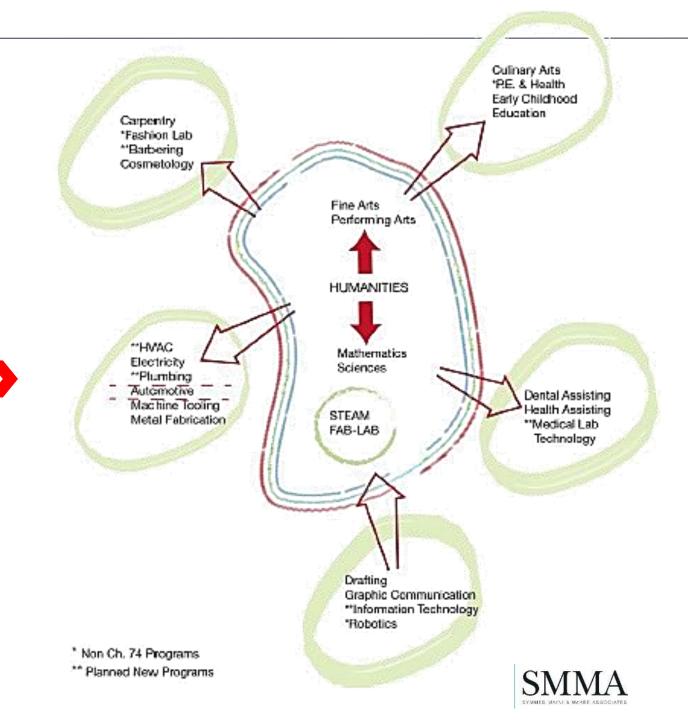
educational activities.

2.16 Transportation Policies

2.17 Functional and Spatial Relationships

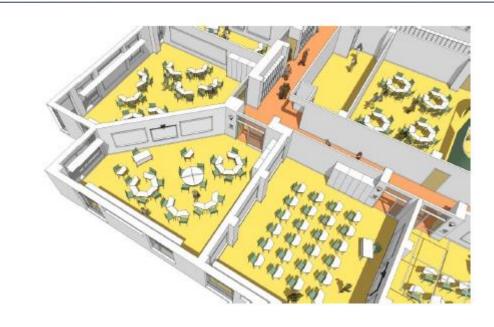
2.18 Security and Visual Access

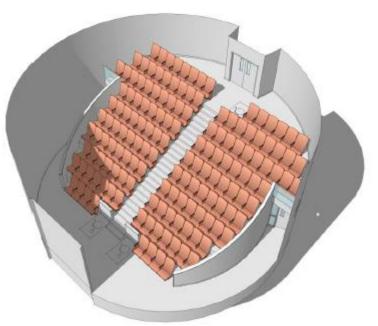
Requirements



2. EDUCATIONAL PROGRAM

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2. Next Wave Alternative School EDUCATIONAL PROGRAM

2.10	Viodai / II Ci Togiai II o	to Somerville High School Educational Program)		
2.10	Visual Art Programs	(sub-se	ction headings analogous	
	Program Requirements		ricquirente	
2.9	Technology Instruction Policies and	2.18	Security and Visual Access Requirements	
2.8	Lunch Programs	2.17	Functional and Spatial Relationships	
2.7	Kindergarten	2.16	Transportation Policies	
2.6	Pre-kindergarten		educational activities.	
2.5	Teacher Planning	2.15	Narrative description of the types of	
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2.2	Class Size Policy	2.12	Physical Education Programs	
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3. INITIAL SPACE SUMMARY

3.2

- 3.1 Space Summary Template
 - Narrative description of the variances between the Districts proposed program
- 3.3 Scaled floor plans of the Existing Facility

and the MSBA guidelines

3.1 SUMMARY

The Initial Space Summary was developed to address the goals and vision of the Educational Program through a series of interviews with the District administration and the High School administration, teachers, staff, and students. This section includes the Initial Space Summary.

There were 17 meetings conducted between September 18 and September 30, 2015 that included 37 individual participants. The meeting reports, located in Appendix 8.4 of this report are a record of those discussions. They do not represent a promise of inclusion in the project but rather participants' desires as well as attitudes towards organization and pedagogy for teaching and learning.



3.1 Space Summary - All New Construction

								PROPOSED									
Somerville High School		Existing Conditions			g to Remain/R	enovated	New			Total				MSBA Guidelines (refer to MSBA Educational Program & Space Standard Guidelines)			
ROOM TYPE	ROOM NFA ¹	#OFRMS	area totals	ROOM NFA ¹	#OFRMS	area totals	ROOM NFA ¹	# OF RMS	area totals	ROOM NFA ¹	# OF RMS	area totals	Ch. 74 Requirements	ROOM NFA ¹	#OFRMS	area totals	Comments
ORE ACADEMIC SPACES			59,494			0			69,580			69,580					# of RMS based on FTE Students w/o NWFC
Classroom - General	varies	54	34,794	1			850	42	35,700	850	42	35,700		850	47	39,950	825 SF min - 950 SF max
Classroom - ESL	varies	5	4,286				850	3	2,550	850	3	2,550					
Teacher Planning	varies	12	3,389				850	5	4,250	850	5	4,250		100	47	4,700	
Small Group Seminar (20-30 seats)				1			425	4	1,700	425	4	1,700		500	4	2,000	
Large Group Instruction (80-100 seats)							1,800	1	1,800	1,800	1	1,800					
Lecture Hall/Mini-Theater (200 seats)				1			2,600	1	2,600	2,600	1	2,600					
Science Classroom / Lab	varies	13	12,339				1,440	12	17,280	1,440	12	17,280		1,440	13		3 x85% ut=20 Seats-1 per /day/student
Prep Room	varies	8	1,633	1			400	6	2,400	400	6	2,400		200	13	2,600	
Central Chemical Storage Rm	105	1	105				200	1	200	200	1	200		200	. 1	200	
Computer Labs	varies	3	1,998	1								l					
Language Lab	950	1	950				1,100	1	1,100	1,100	1	1,100					
PECIAL EDUCATION			5,282			0			19,959			19,959					# of RMS based on Total Student Population w/ NWF0
Self-Contained SPED	see below													950	11		assumed 8% of pop. in self-contained SPED
Self-Contained SPED Toilet							60	2	120	60	2	120		60	11	660	
Life Skills Classroom	981	1	981				1,500	1	1,500	1,500	1	1,500					
Shared Kitchenette							200	1	200	200	1	200					
"SHIP" Medically Fragile Student Classroom	1,175	1	1,175	1			1,500	1	1,500	1,500	1	1,500					
ASD Classroom w/ Breakout - Moderate				1			850	1	850	850	1	850					
Quiet Room				I			150	1	150	150	1	150					
ASD Classroom w/ Breakout - Moderate							850	1	850	850	1	850					
Study Skills Classroom				L			425	1	425	425	1	425					
Therapeutic Classroom							425	1	425	425	1	425					
PT/OT/Speech Sensory Room							425	1	425	425	1	425					
Transition Skills Classroom (for 18-22 year old students)	297	1	297				425	1	425	425	1	425					
Resource Room	varies	3	1,835				425	4	1,700	425	4	1,700		500	5	2,500	1/2 size Geni. Cim.
Small Group Room	150	1	150	1			425	4	1,700	425	4	1,700		500	5	2,500	1/2 size Geril Cim.
SPED Office - Adj Counselor	varies	3	358				200	3	600	200	3	600					
SPED Office - Department Head							150	1	150	150	1	150					
SPED Office - Workroom	486	1	486	I			425	1	425	425	1	425					
Next Wave/Full Circle Program																	
FC Classrooms							425	8	3,400	425	8	3,400					
NW Classrooms	1			1			425	4	1,700	425	4	1,700					
NWFC Reception							400	1	400	400	1	400					
NWFC Clinical Counselor Office	1			1		l	120	2	240	120	2	240					
NWFC Director Office	1					l	150	1	150	150	1	150					
NWFC Aide Workstation							54	1	54	54	1	54					
NWFC Crisis Counselor Office							120	2	240	120	2	240					
NWFC Nurse Station							200	1	200	200	1	200					
NWFC Conference Room (20 seats)	1			1			425	1	425	425	1	425					
NUMBER OF THE PERSON (SEE SEED)	1			1								.20					

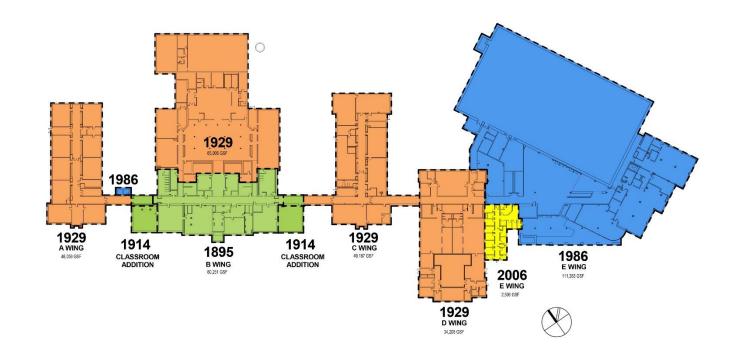
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NWFC Reception				400	1	400	· · · · · · · · · · · · · · · · · · ·			400		400					
NWFC Clinical Counselor Office	1		- 1	120	2	240	0	0	_	120	2	240					1
NWFC Director Office				150	1	150	0	0		150	1	150					
NWFC Aide Workstation	1		l	54	1	54	0	0	-	54	1	54					
NWFC Crisis Counselor Office	1		l	120	,	240	0	0	-	120	,	240					
NWFC Nurse Station	1		I	200	1	200	U	U	-	200	1	200					
man o nuise addudt				200		200				200		200					1



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Somerville High School Somerville, Massachusetts Existing Conditions Report Kitchen

The existing kitchen space is 3,640 net square foot plus an additional 690 net square feet for the Teacher Overview of Existing-Based on 11/5/15 Meeting Servery. The current configuration of the kitchen is traditional with a straight line configuration with students entering from one end and exiting from the other. The amount of space creates congestion with too many students trying to get through the line. A separate Salad Bar is away from the main servery. The limited space restricts the menu options and any expansion.

The storage is spread out between multiple areas, including the receiving area and general storage area. The Cooler and Freezer storage areas are deep in the kitchen. The shipments must be carried through the

There are two snack bar areas, one off of the teacher's server and one at the opposite end of the serving prep spaces to get into the Storage. line. This latter one includes a dishwasher and the 3 bay sink.

Currently there is no recycling/cardboard space. This needs to be accommodated.

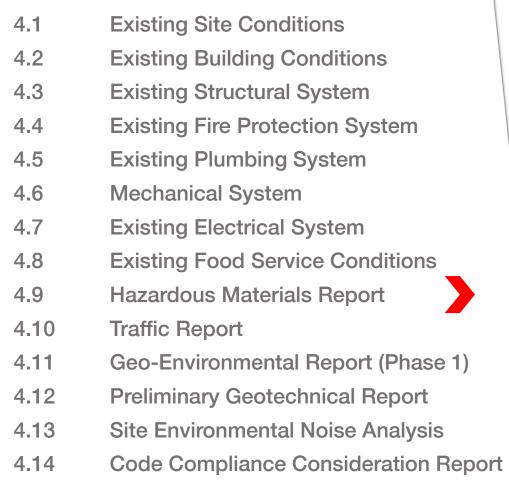
Current Kitchen Equipment

- 3 Double Convection Ovens
- 1 Two Compartment Streamer
- 1 40 Gallon Tilting Kettle
- 1 Tilting Kettle
- 1 Six Burner Range
- Flat Top

Future Equipment

- 1 Blast Chiller
- Townsection Oven

4. EVALUATION OF EXISTING CONDITIONS





HAZARDOUS MATERIALS SUMMARY REPORT

Somerville High School 81 Highland Avenue Somerville, Massachusetts

Prepared for

Symmes Maini & Mckee 1000 Massachusetts Avenue Cambridge, MA 02138

November 2015

CDW Project # 1491.0

EVALUATION OF EXISTING CONDITIONS

4.1	Existing Site Conditions
4.2	Existing Building Conditions
4.3	Existing Structural System
4.4	Existing Fire Protection System
4.5	Existing Plumbing System
4.6	Mechanical System
4.7	Existing Electrical System
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4.9	Hazardous Materials Report
4.10	Traffic Report
4.11	Geo-Environmental Report (Phase 1)
4.12	Preliminary Geotechnical Report
4.13	Site Environmental Noise Analysis
4.14	Code Compliance Consideration Report

SOMERVILLE HIGH SCHOOL Somerville, Massachusetts

Existing Conditions Traffic Analysis

Prepared For:

Symmes Maini & McKee Associates

Prepared by:

Design Consultants, Inc.

January 2016





4. EVALUATION OF EXISTING CONDITIONS

4.1	Existing Site Conditions
4.2	Existing Building Conditions
4.3	Existing Structural System
4.4	Existing Fire Protection System
4.5	Existing Plumbing System
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PHASE I ENVIRONMENTAL SITE ASSESSMENT (ASTM E 1527-13)

Somerville High School 81 Highland Avenue Somerville, Massachusetts

November 30, 2015

Prepared for:

Symmes Maini and Mckee 1000 Massachusetts Avenue Cambridge, Massachusetts

CDW Project #1491.00

EVALUATION OF EXISTING CONDITIONS

	TIDITION O
4.1	Existing Site Conditions
4.2	Existing Building Conditions
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November 19, 2015

Ms. Lorraine Finnegan Symmes Maini & McKee Associates 1000 Massachusetts Avenue Cambridge, MA 02138 Phone: (617) 547-5400

Fax: (617) 648-4920 E-mail: lfinnegan@smma.com

Preliminary Geotechnical Report Proposed Somerville High School Somerville, Massachusetts LGCI Project No. 1538

Lahlaf Geotechnical Consulting, Inc. (LGCI) has completed a preliminary geotechnical study for Somerville High School in Somerville, Massachusetts. We are submitting this preliminary report Dear Ms. Finnegan: electronically, please notify us if you need a hard copy.

The soil samples from our explorations are currently stored at LGCI for further analysis, if requested. Unless notified otherwise, we will dispose of the soil samples after three months.

Thank you for choosing LGCI as your geotechnical engineer.

Very truly yours,

Lahlaf Geotechnical Consulting, Inc.

Todd Dwyer, P.E. Senior Project Manager Abdelmadjid M. Lahlaf, Ph.D., P.E. Principal Engineer

Tel: (978) 330-5912

EVALUATION OF EXISTING CONDITIONS

	TIDITION O
4.1	Existing Site Conditions
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617 499 8000

November 24, 2015

Matthew D. Rice, AIA Symmes Maini & McKee Associates, Inc. 1000 Massachusetts Avenue

Cambridge, MA 02138 By email: mrice@smma.com

Subject: Site Environmental Noise Analysis Somerville High School, Somerville, MA

Acentech Project 626687; SMMA Project 15070

This letter presents the results of our ambient noise survey at the site of Somerville High School. This survey will inform basis of design criteria relating to outdoor noise emissions from building mechanical equipment included in the new school to be designed.

The City of Somerville Noise Control Ordinance¹ sets limits on noise emissions to adjacent properties based on the zoning district, the time of day, and the duration of the noise. Most relevant to this project is the limit of 40 dBA on noise emitted to residential properties between the hours of 10 pm to 7 am for longer than 2 hours. This limit typically applies to continuously operating outdoor or rooftop mechanical equipment that may This limit typically applies to continuously operating outdoor of rootop mechanical equipment that may operate overnight or begin operation before 7 am on school days. This 40 dBA limit is quite stringent, 2 and 1 and 2 decreases the second of the second residential properties are located close to the site in all directions.

The Massachusetts DEP noise regulation states that sound levels following the installation of new noise Sources are not to exceed the existing ambient noise at the property line of the subject site by more than 10 dBA (A-weighted decibels). The Commonwealth of Massachusetts Department of Air Quality Control Policy States, "Ambient is defined as the background A-weighted sound level that is exceeded 90% of the time states. Ambient is defined as the background A-weighted sound level that is exceeded 90% of the time measured during equipment operating hours." This metric is commonly known as the L_{90} , expressed in dBA.

We placed five calibrated sound level monitors to collect sound levels continuously from November 4 to November 9, 2015. The monitor locations are described below and shown in Figure 1 on the next page:

- Location A: School Street across from Madison Street
- Location B: Medford Street, near gymnasium loading dock
- Location C: Medford Street, behind library
- Location D: Highland Ave, across from Vinal Street
- Location E: Highland Ave, at City Hall driveway entrance



EVALUATION OF EXISTING CONDITIONS

	1121110110
4.1	Existing Site Conditions
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January 29, 2016

Matthew Rice Symmes Maini & McKee 1000 Massachusetts Avenue Cambridge, MA 02138

Somerville High School Feasibility Study Code Compliance Considerations Report

The Feasibility Study is addressing the existing Somerville High School building located at 82 Highland Street. More specifically, scenarios are being studied and considered including:

- Code Upgrade Option (Alternative 0) This scenario considers code minimum upgrades to effectively operational restore and upgrade the existing building based on code requirements. Under this scenario there are no changes in use, additions or reconfigured spaces.
- 2. Renovation Option (Alternative 1) This scenario includes all efforts in Alternative 0 plus reconfiguration of existing spaces to address educational needs. Under this scenario there may be changes in use or additions, and reconfiguration of space is possible, including new systems such as HVAC, core electrical and core plumbing.
- 3. Renovation and Possible Change in Use and Addition Options (Alternatives 2 through 4) These scenarios include all efforts in Alternative 1 but more extensive (Level 3 Alterations, Change in Use and Additions).

There are multiple distinct laws and regulations that are applicable to construction projects for existing buildings. Each is must be reviewed independently to identify "retroactive provisions" and "triggering provisions" based on proposed work.

APPLICABLE CODES

The following primary codes are applicable to this project: Accessibility - Massachusetts Architectural Access Board, 521-CMR and the Americans with Disabilities Act Guidelines (2010 ADAAG).



5. SITE DEVELOPMENT REQUIREMENTS

5.1 Existing Site Plan

5.2 Site Development Requirements





6. PRELIMINARY EVALUATION OF ALTERNATIVES

6.1	School Assignment Practices and Available Space
6.2	Regionalizing or Tuition Agreements with Adjacent School Districts
6.3	Leasing, Renting, Acquisition of Existing Buildings for School Use
6.4	Project Goals
6.5	Site Alternatives
6.6	Construction Alternates including cost Estimate and Schedules



HEALTH & FITNESS

KITCHEN / SERVERY

SPECIAL EDUCATION

VERTICAL CIRCULATION

VOCATIONAL & TECHNOLOGY

PHYSICAL EDUCATION & SPORT SUPPORT

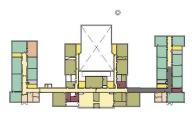


PROGRAM PLAN LEGEND

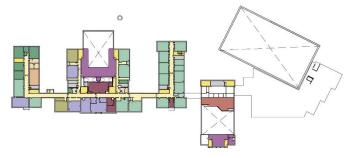
- ADMINISTRATION / GUIDANCE / STUDENT SERVICES / NURSE
 BUILDING EQUIPMENT
- CAFETERIA & CIRCULATION
- CHAPTER 74
- CLASSROOM & GENERAL EDUCATION SUPPORT
- COMMUNITY USE
- CUSTODIAL / MAINTENANCE / STORAGE

LEVEL 1

SCALE: 1" = 160'-0"



4 LEVEL 4
SCALE: 1" = 160'-0"



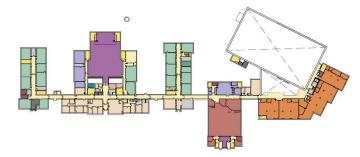
Alt 0 &1

Alternative 0 – Code Upgrade & Repair Only

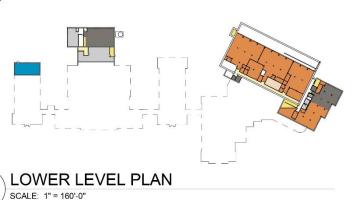
Alternative 1 – Full Gut Renovation, No New Additions

Both Alternatives Involve Phased Construction





2 LEVEL 2
SCALE: 1" = 160'-0"









Alternate 0

PROS

- Cost
- Duration

CONS

- The completed construction would not accommodate the current or future curriculum.
- No space or flexibility is provided for the projected growth in student population.





Alternate 1

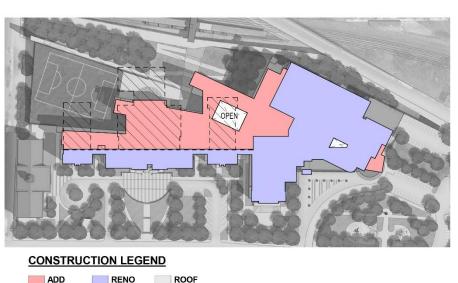
PROS

- Cost
- Completely renewed school with modern & functional systems
- Potential for improved energy conservation and lower operating costs
- Some response to current educational programming needs

CONS

- Neither current nor future curriculum are fully accommodated.
- Neither space nor flexibility provided for the projected growth in student population.
- Less potential for meeting community design and image goals given the ability to only refresh the existing exterior envelope.
- Complicated construction phasing
- Long construction duration
- Swing space is required
- Internal and external construction congestion



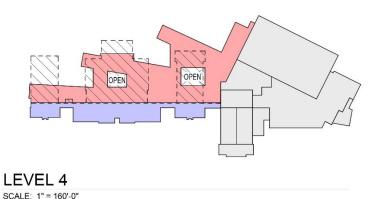


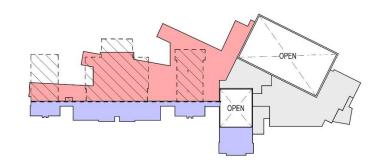
ADD RENO

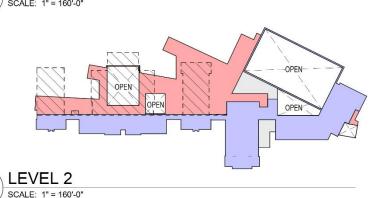
SCALE: 1" = 160'-0"

1 LEVEL 1
SCALE: 1" = 160'-0"









LEVEL 3

Alt 2

Alternative 2 – Addition / Renovation

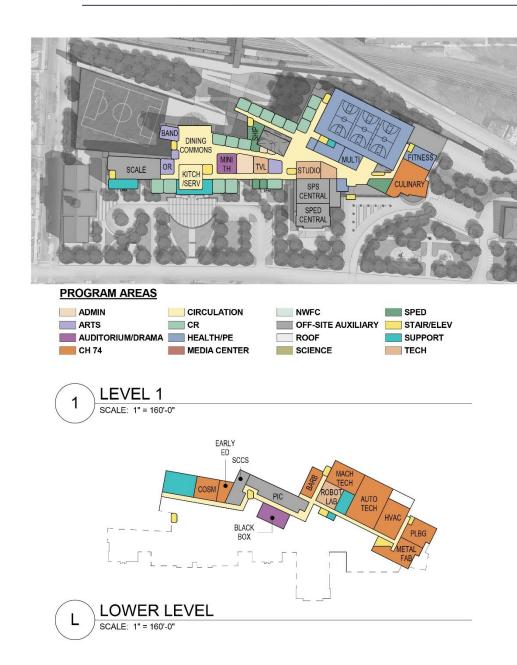
Renovate 1986 CTE Wing & Southern Portions of 1895/1929 Classrooms

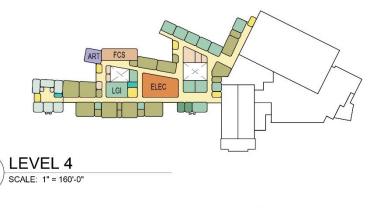
New Auditorium & Cafeteria

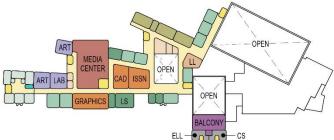
Phased Construction

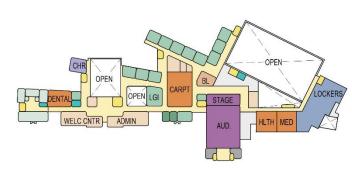














LEVEL 3

SCALE: 1" = 160'-0"

Alt 2

Alternative 2 – Addition / Renovation

Renovate 1986 CTE Wing & Southern Portions of 1895/1929 Classrooms

New Auditorium & Cafeteria

Phased Construction

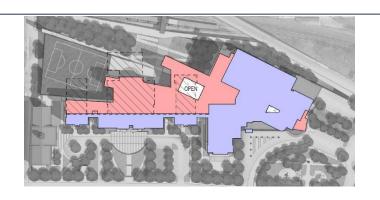




Alternate 2

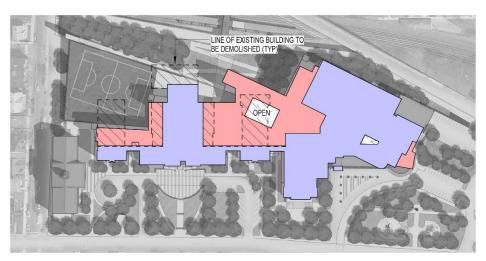
PROS

- Completely renewed school, leveraging the most recent construction on site for renovation economy
- Potential energy conservation and lower operating costs
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals
- Preserves the historic assets of the highest-value construction facing the main lawn.



- Third highest cost (3 of 8)
- Complicated construction phasing
- Long construction duration
- Swing space is required
- Internal and external construction congestion

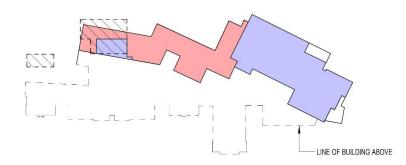




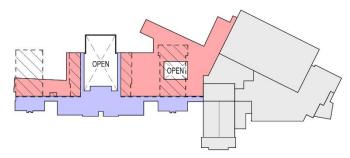
CONSTRUCTION LEGEND

RENO ROOF

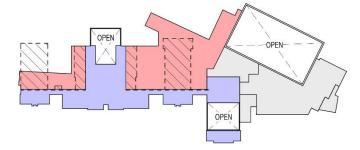
LEVEL 1 SCALE: 1" = 160'-0"



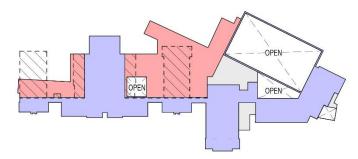




LEVEL 4



LEVEL 3



LEVEL 2 SCALE: 1" = 160'-0"

Alt 3

Alternative 3 – Addition / Renovation

Renovate 1986 CTE Wing & Southern Portions of 1895/1929 Classrooms

Renovate Auditorium

New Cafeteria





LINE OF EXISTING BUILDING TO BE DEMOLISHED (TYP) OPEN

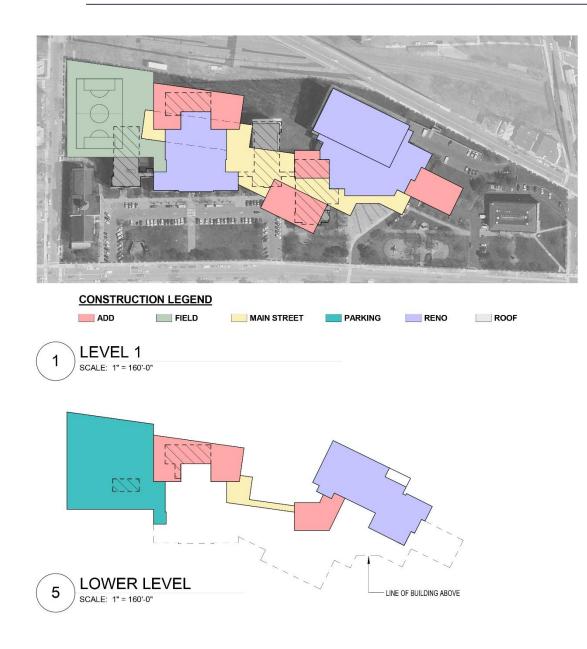
Alternate 3

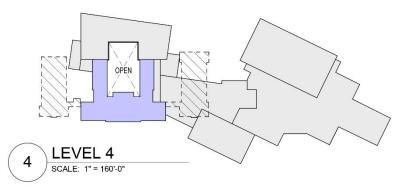
PROS

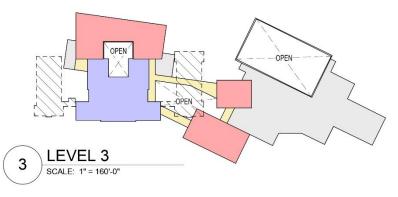
- Completely renewed school, leveraging the most recent construction on site for renovation economy
- Potential for energy conservation and lower operating costs
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals
- Preserves the historic assets of the highest-value construction facing the main lawn

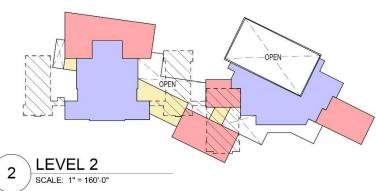
- Cost
- Complicated construction phasing
- Long construction duration
- Swing space is required
- Internal and external construction congestion











Alt 4

Alternative 4 – Addition / Renovation

Concourse Approach

Enclosed / Open Central Circulation and Activity Space – Incorporates Cafeteria

Renovate 1986 CTE Wing & 1895/1929 B Wing

Renovate Auditorium





FEFF REFERENCE IN THE PROPERTY OF THE PROPERTY

Alternate 4

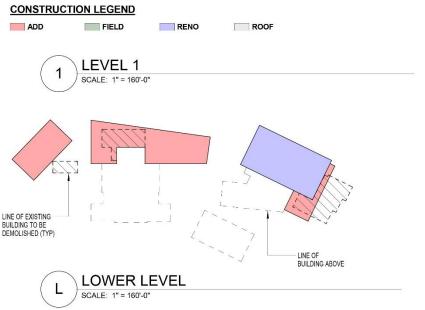
PROS

- Completely renewed school, leveraging the most recent construction on site for renovation economy
- Potential for energy conservation and lower operating costs
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals

- Cost
- Complicated construction phasing
- Long construction duration
- Swing space is required
- Internal and external construction congestion









Alt 4a

Alternative 4a – Addition / Renovation

Campus Approach

Renovate 1986 Gymnasium & 1895 Building

Renovate Auditorium

New Cafeteria

New Disconnected Buildings





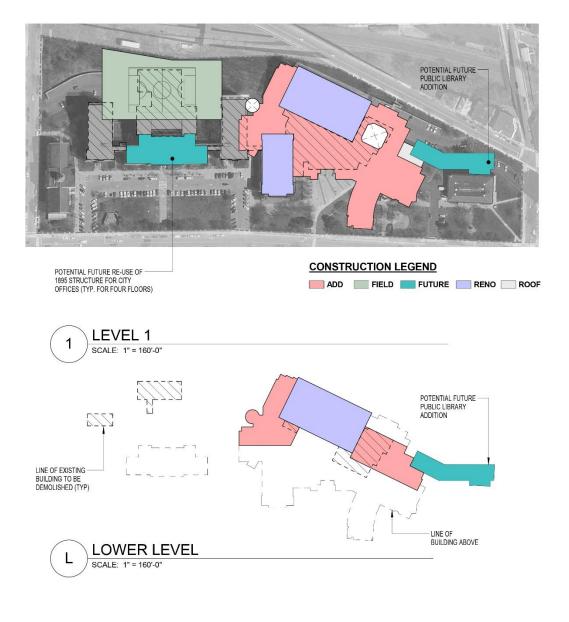


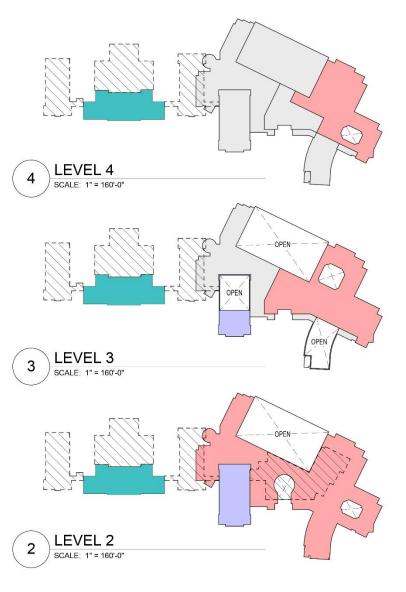
Alternate 4a

PROS

- Completely renewed school.
- Potential for energy conservation and lower operating costs
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals
- Greater ability to isolate operations of individual buildings for improved security and energy consumption during after-hours use.

- Cost
- Complicated construction phasing
- Long construction duration
- Swing space is required
- Internal and external construction congestion
- Maintaining a secure campus is more complicated due to multiple buildings and multiple entry points.
- Increased grossing requirements associated with multiple buildings to account for additional stairs, elevators, toilet rooms and similar support services.
- Disconnected buildings compromise day-to-day operations of the school, with the potential to reinforce curriculum separation, rather than unification.





Alt 4b

Alternative 4b – Addition / Renovation

Build HS to East Site

Enclosed / Open Central Circulation and Activity Space – Incorporates Cafeteria

Renovate 1986 Field House & CTE Spaces below Wing & D Wing (1929 War Memorial)





POTENTIAL FI POBLICUBRA ADDITION

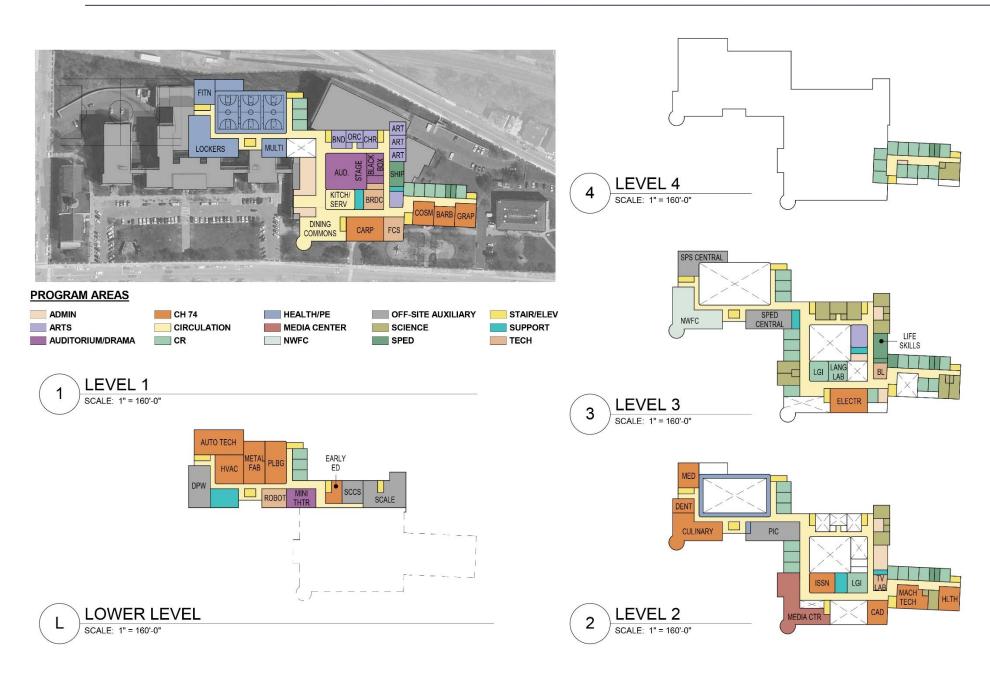
Alternate 4b

PROS

- Completely renewed school.
- Potential for energy conservation and lower operating costs
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals
- Simplified phasing approach by building new addition on a relatively open portion of the site.
- Allows for a potential future addition connection to the Somerville Public Library Main Branch building

- Cost
- Long construction duration
- Swing space is required for the heavy vocational shops given the extent of proposed construction in the E Wing.
- External construction congestion





Alt 5

Alternative 5 – New Construction

Demolish Existing High School and Build Completely New on the Existing High School Site





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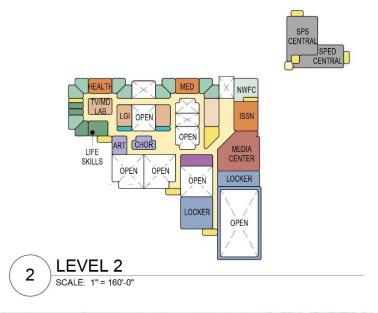
Alternate 5

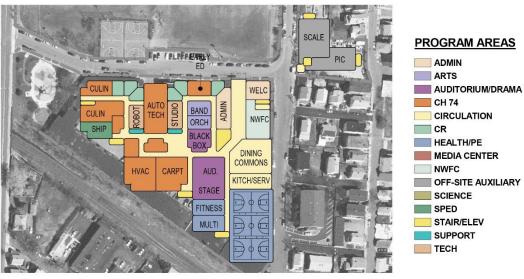
PROS

- Completely new school
- Simplified construction
- Greatest potential energy conservation and lowest operating cost
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals

- Cost
- Complicated construction phasing
- Long construction duration
- Swing space is required
- External construction congestion
- No indoor track program given the new, smaller gymnasium size.

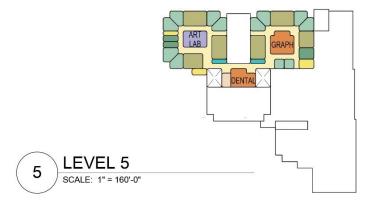


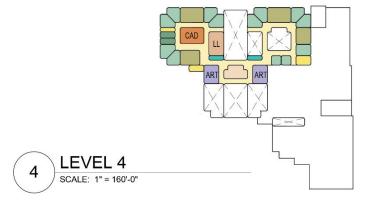


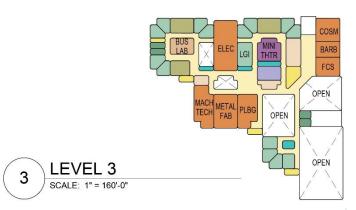


LEVEL 1

SCALE: 1" = 160'-0"







Alt 6

Alternative 6 – New Construction

Demolish DPW Structures and Build New at Franey Road Site

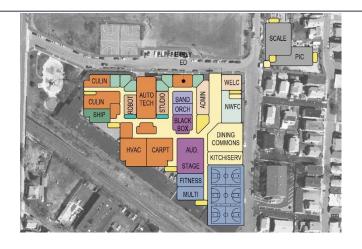




Alternate 6

PROS

- Completely new school
- Greatest potential energy conservation and lowest operating cost
- Response to current educational programming needs
- Full accommodation of current and future curriculum
- Space and flexibility is provided for the projected growth in student population
- Potential for meeting community design and image goals
- No swing space is required



- Cost
- Complicated construction involving underground parking garage below the entire footprint of the school
- Longest overall project schedule
- External construction congestion
- No indoor track program given the new, smaller gymnasium size



