



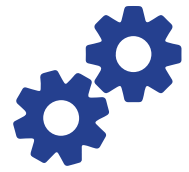
# Leicester School Building Project



**Finegold  
Alexander  
Architects**



**July 30, 2019**  
School Committee Retreat



**Efficiency**



**Safety**



**Community Improvement**



**Increased Property Value**



**Community Use**



**Financially Responsible Choice**

# **Educational Visioning**

**Visioning Workshop # 1:** January 29, 2019  
**Visioning Workshop #2:** February 5, 2019

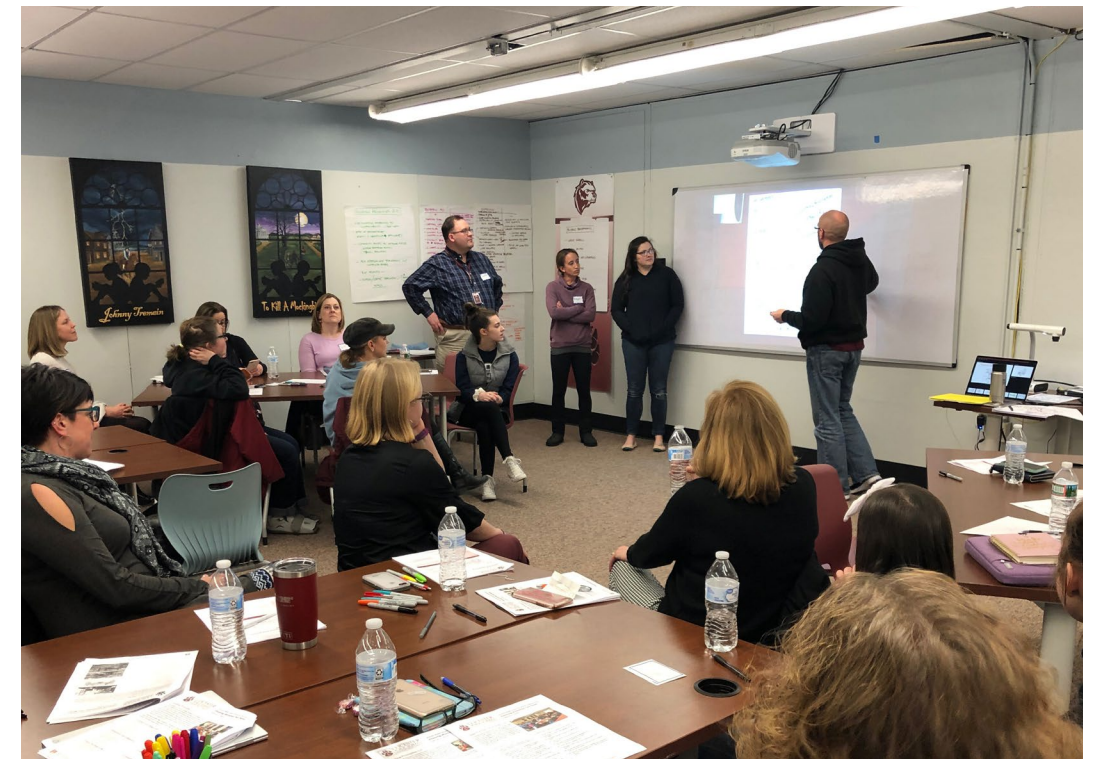
**School Tours:** February 14, 2019

Hunking Middle School (Grades K-8) Haverhill, MA

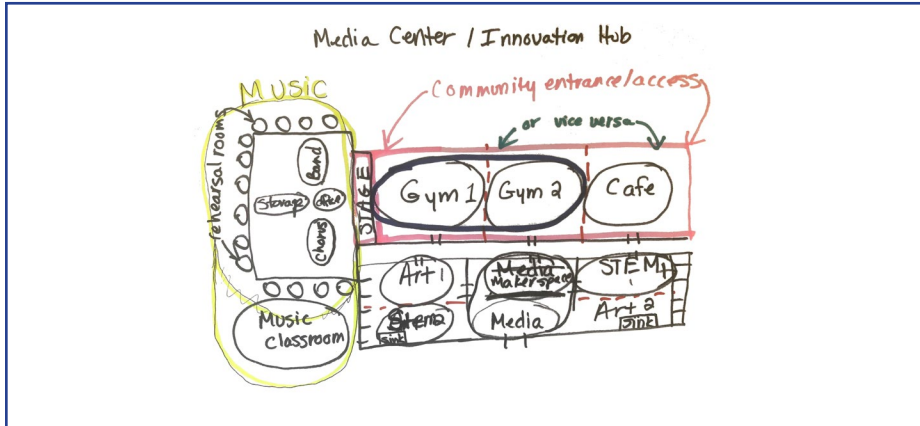
Beverly Middle School (Grades 5-8) Beverly, MA

**Visioning Workshop #3:** February 29, 2019

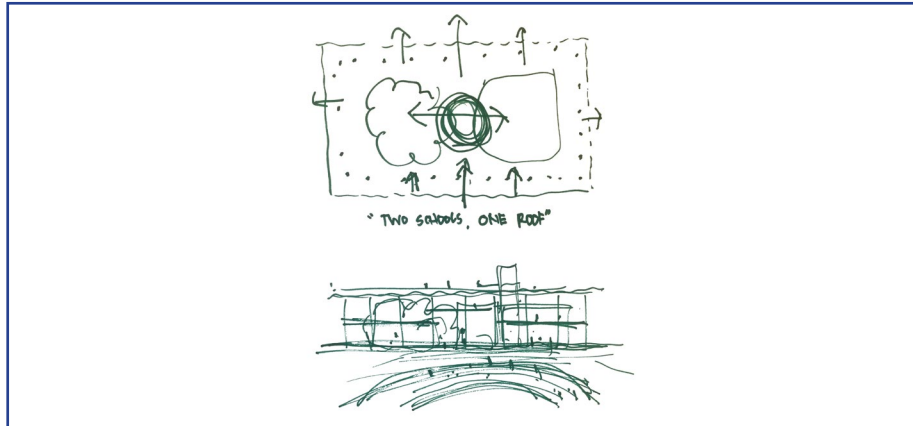
**Faculty Workshop:** March 5, 2019



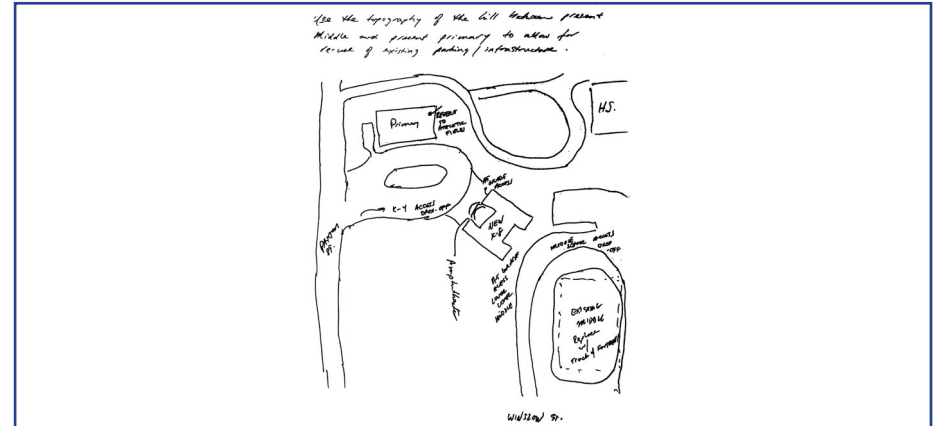
**Visioning Workshops**



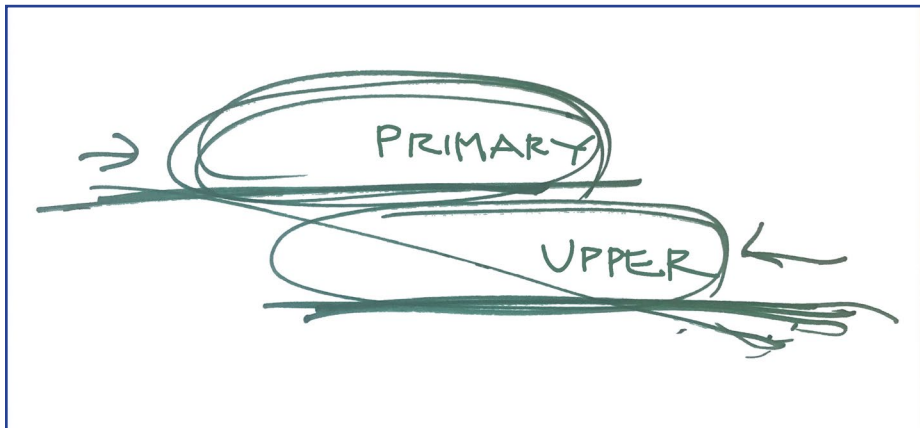
Media Center & Innovation Hub



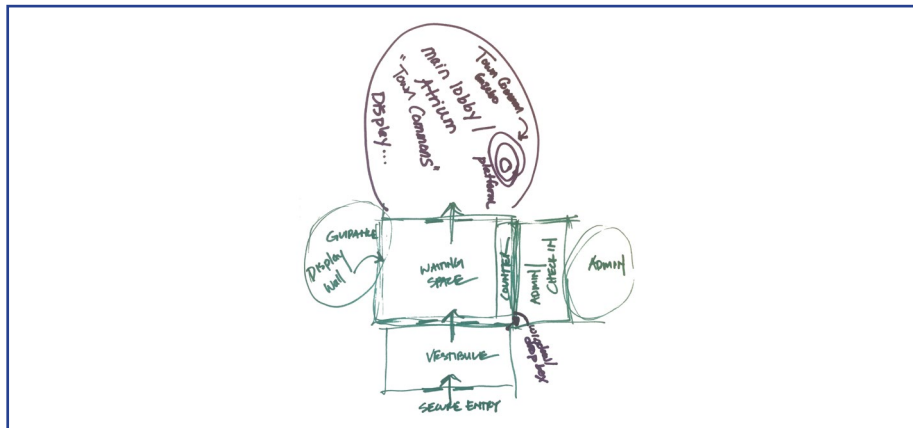
Two Schools, One Roof



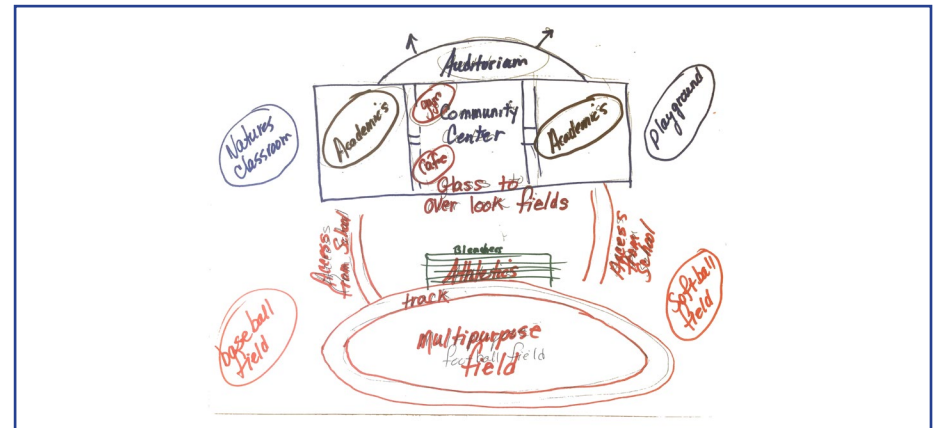
Navigating Existing Topography



Whole School



Entry Sequence



Community Access

1. Innovation and Engagement
2. Collaboration and Cooperation
3. A Place You Want to Be
4. Community Access
5. Adaptability and Flexibility
6. Outdoor and Nature Connections
7. Sustainability



MECHANICAL  
VIEWING  
AREA

# Innovation and Engagement

Guiding Principles



# Collaboration and Cooperation

Guiding Principles





# A Place You Want to Be

Guiding Principles





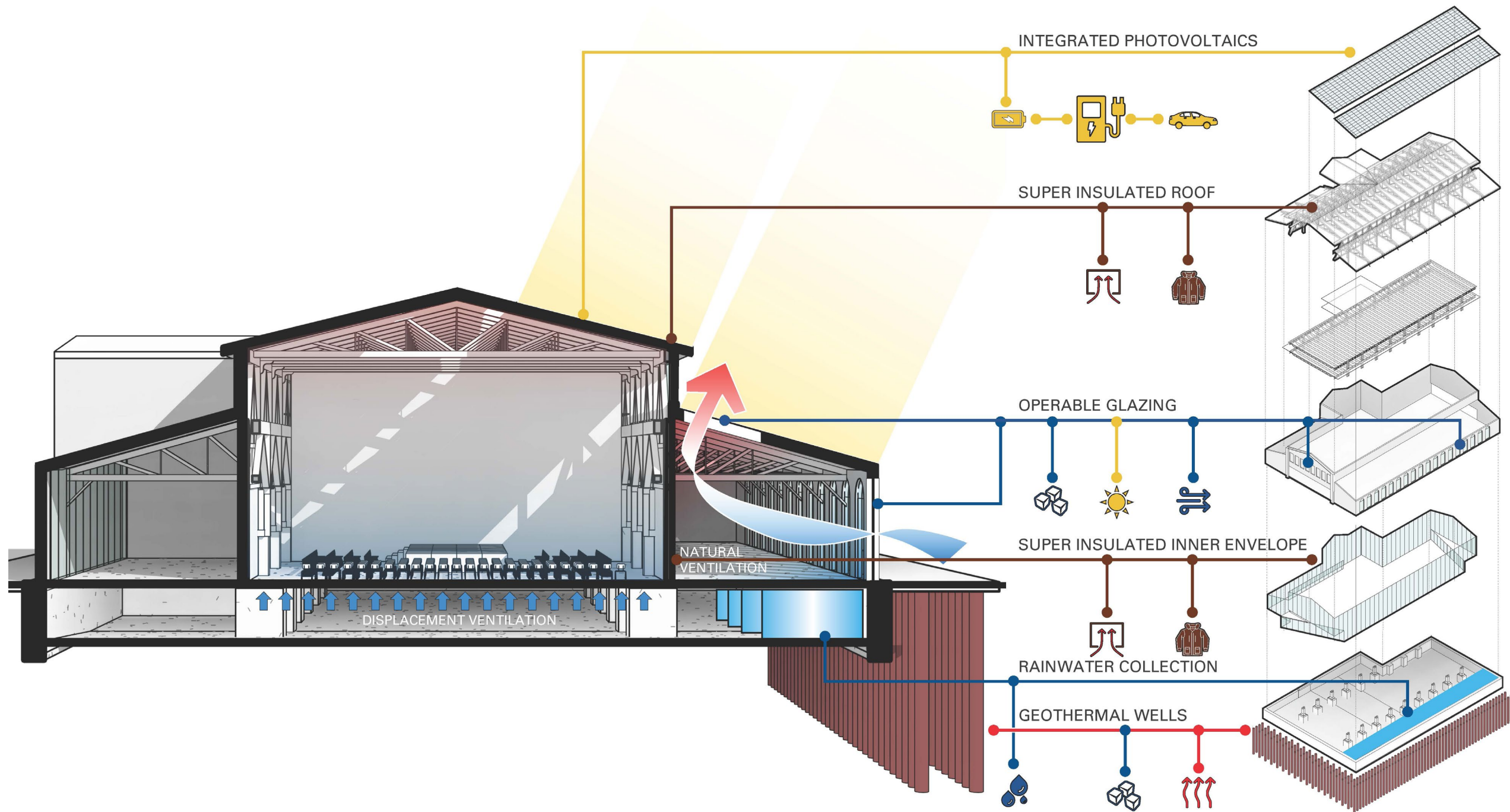
# Adaptability and Flexibility

Guiding Principles



# Outdoor and Nature Connections

Guiding Principles





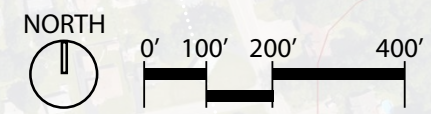
**Preferred Option**



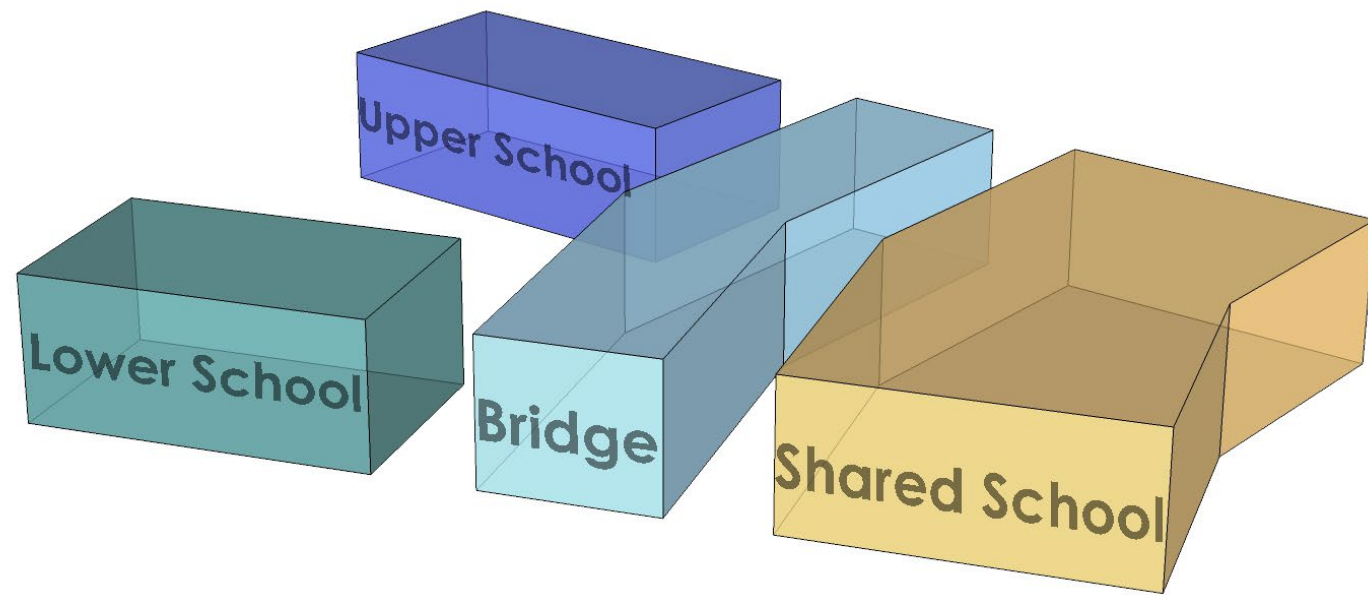
# LEGEND

## 5C - WINGS

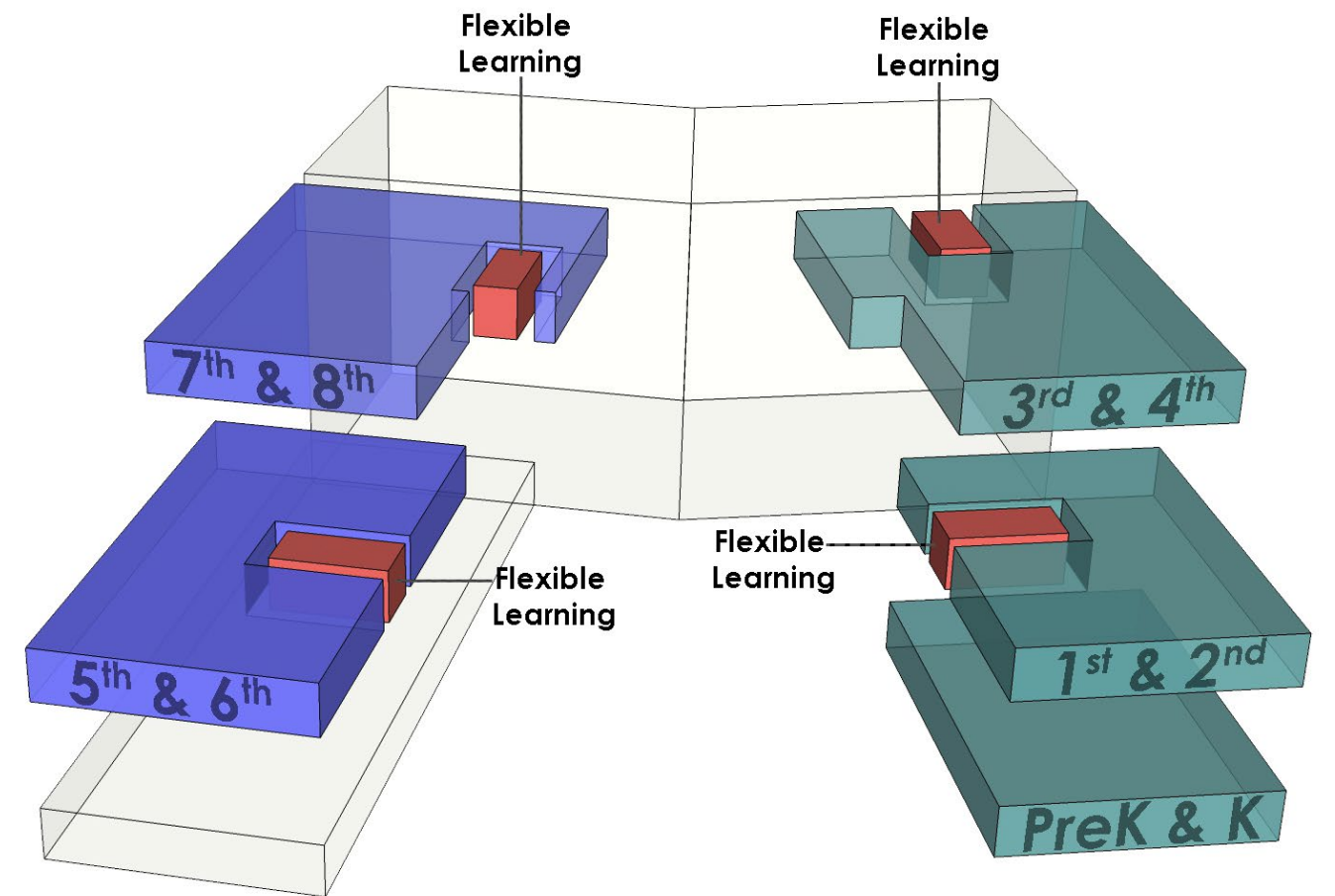
- ① NEW BUILDING, FFE 994'
- ② K-5 PLAY
- ③ PRE-K PLAY
- ④ OUTDOOR LEARNING
- ⑤ PROTECT EXISTING WELL
- ⑥ RENOVATE TENNIS & BASKETBALL
- ⑦ SOFTBALL
- ⑧ FOOTBALL PRACTICE
- ⑨ 25' NO BUILD ZONE
- ⑩ 100' WETLAND BUFFER
- ⑪ SECURITY GATE
- ⑫ PLAY LAWN
- ⑬ RETAINING WALL, 10-12' HEIGHT
- ▬▬▬ PROPERTY LINE
- - - - - SETBACK
- - - - - ACCESSIBLE PATH CONNECTION
- ▲ ENTRANCE W/ VEHICLE BARRIERS
- - - - - RELOCATE SEWER LINE
- - - - - RELOCATE WATER LINE
- ▭▭▭ STORMWATER INFILTRATION





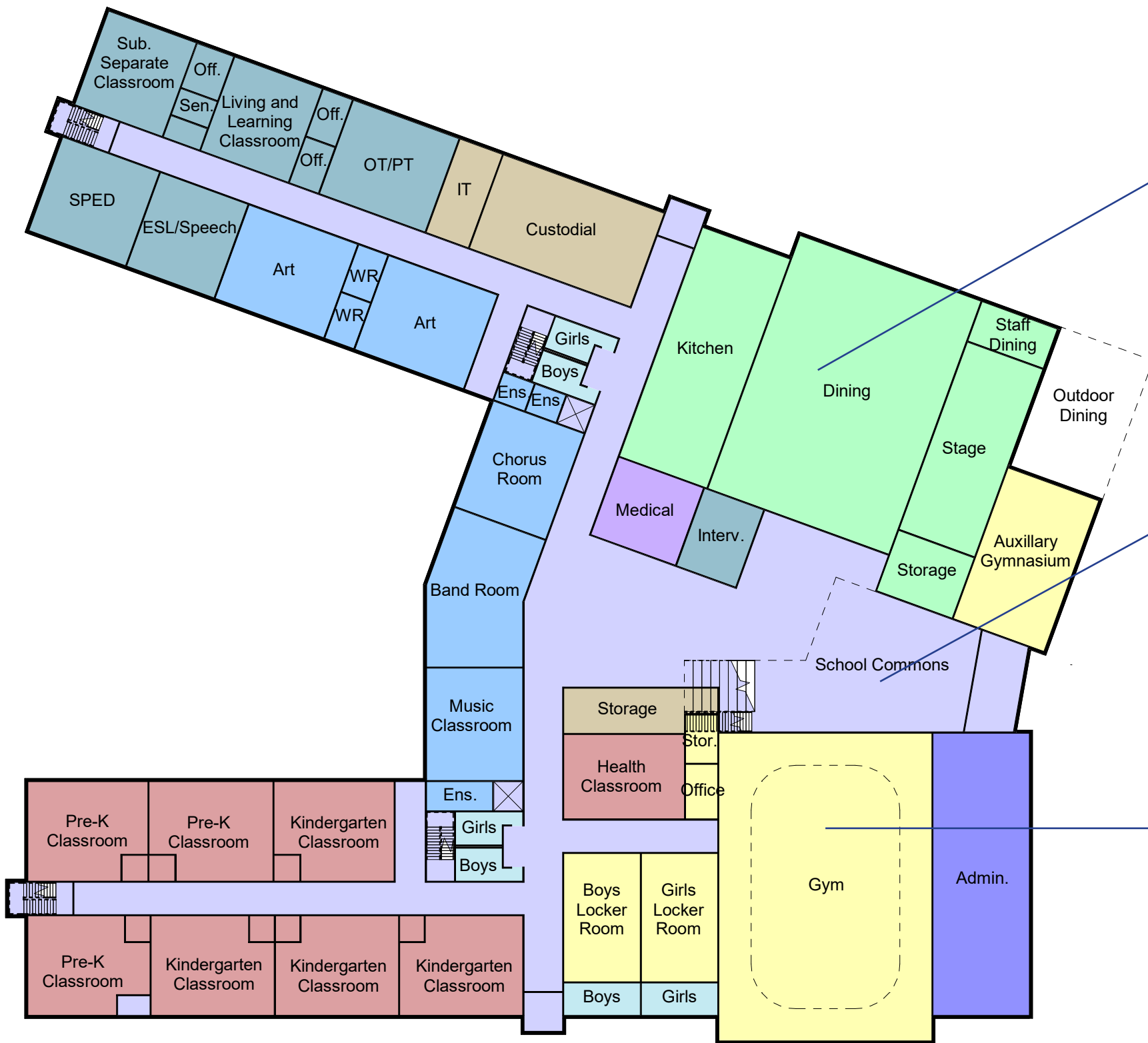


2 Schools, 1 Roof  
Educational vs. Community Space



Grade Neighborhoods with Flexible Learning Space

# Key Concepts



Arlington School, Tacoma, WA



Creekside Elementary, Boulder, CO

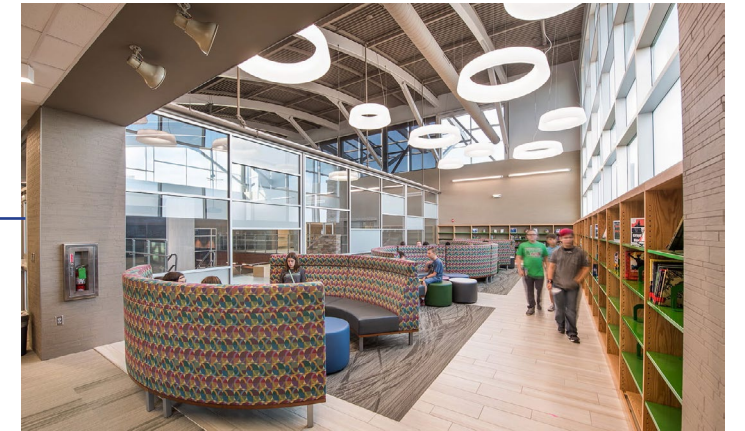


Monte Vista Elementary, Phoenix, AZ

# First Floor Plan



DaVinci Wisburn High School, El Sugundo, CA



Heartland Elementary, Edmond, OK

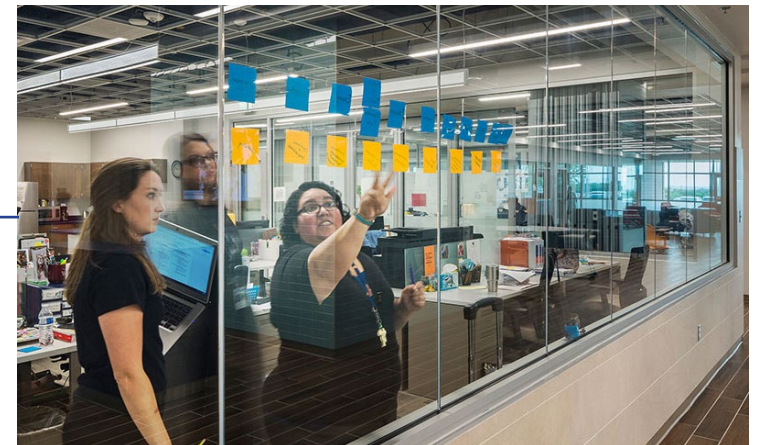


Arlington School, Tacoma, WA

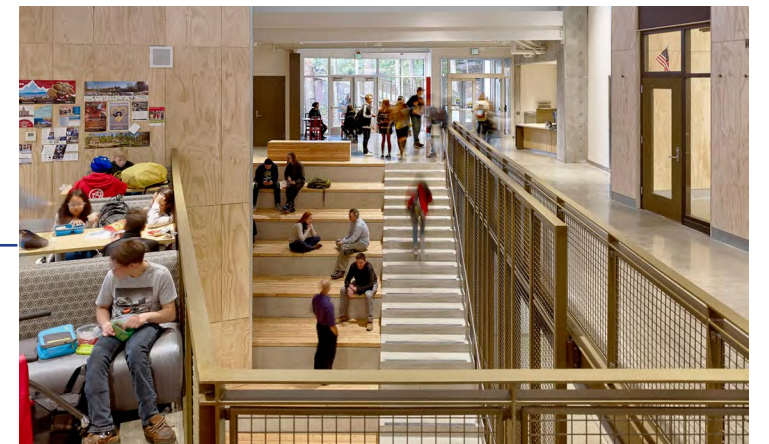
# Second Floor Plan



DaVinci Wisburn High School, El Sugundo, CA



DaVinci Wisburn High School, El Sugundo, CA



Environmental Learning Center, Tacoma, WA

# Third Floor Plan



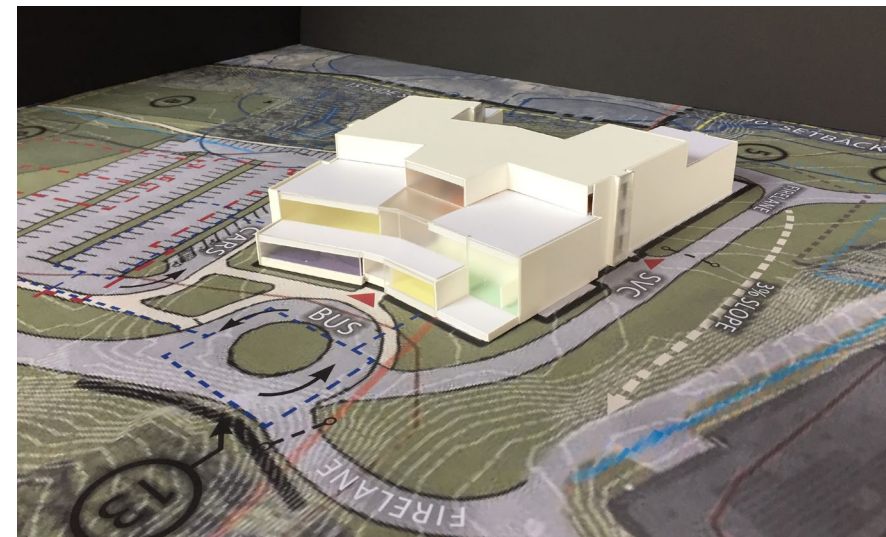
Aerial View



View Looking Northwest



View Looking Southeast



View Looking Southwest

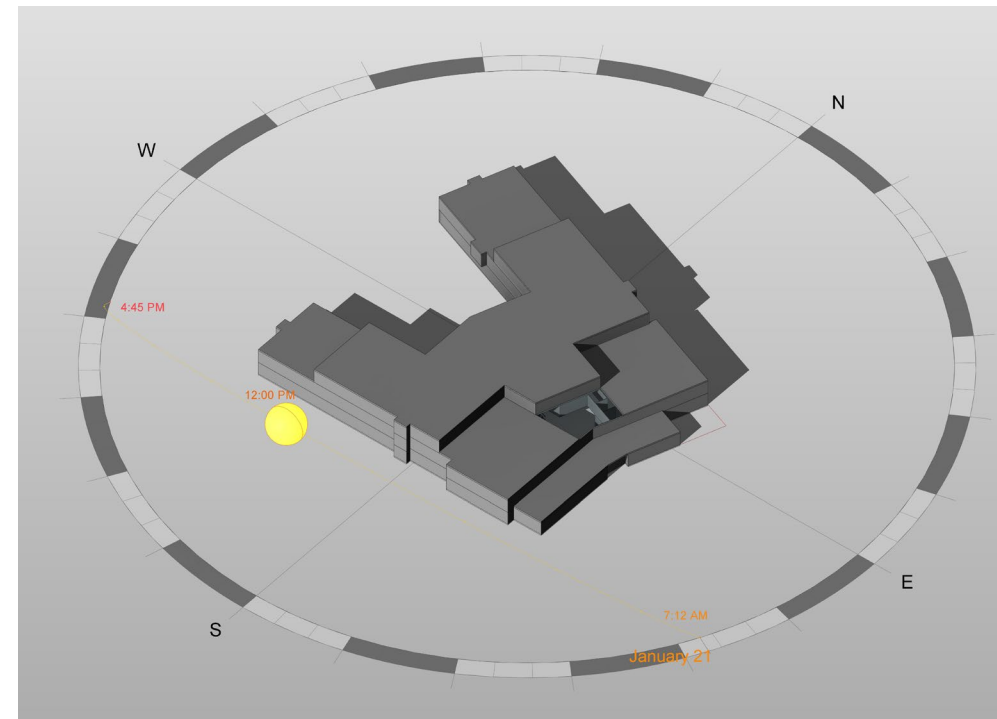
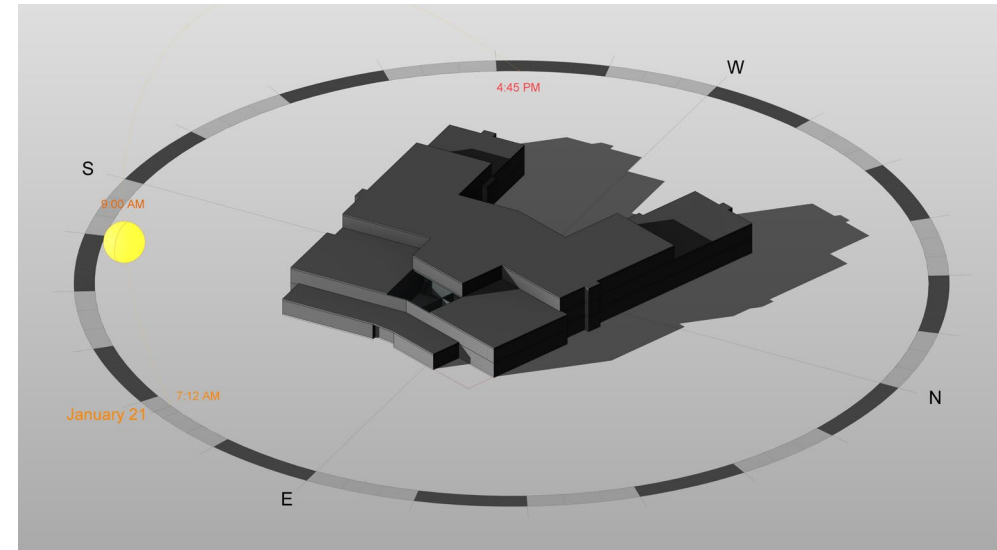
# Concept Massing Model

LEED Goal	MSBA 2%
Brig Area	140,000
Parking	
Site Area	
Staff	130-140
Students	930
Visitors	

POINT TOTALS

Yes	M+	M-	No
41	49	8	12

GENERAL PROJECT DOCUMENTATION				Responsible	Notes	
D	Y			Req'd	Team	REQUIRED: Project must meet all MPRs to be eligible for LEED certification. TGE will work with Nitsch on developing LEED boundary.
INTEGRATIVE PROCESS				1	Responsible	Notes
D	1			Req'd	Team	CREDIT: Perform energy and water-use analysis in early design through the use of a "simple box" model and development of a water budget, respectively. Follow-up discussion is needed in the next few weeks to determine if this credit will be pursued.
LOCATION & TRANSPORTATION				15	Responsible	Notes
D				Req'd	Team	CREDIT: Project located in a LEED ND development.
D				Req'd	Nitsch	CREDIT: Locate the development footprint on land that has been previously developed. Project is less than 100' to wetland.
D	2			Req'd	Nitsch	CREDIT: Locate on a brownfield where soil or groundwater contamination has been identified, and where the local, state, or national authority (whichever has jurisdiction) requires its remediation. There may be underground contamination. Project is not in a DDA.
D	1			Req'd	TGE	CREDIT: Avg. surrounding density >22,000 sf (2pts) or >35,000 (4pts) and/or within 1/2 mile walking distance of at least 8 diverse uses (2pts). Multiple uses within 1/2 mile. Calculations need to be done for walking distance.
D				Req'd	TGE	CREDIT: 1pt - 72 wkdy & 40 wknd; 3 pts - 140 wkdy & 108 wknd; 6 pts - 360 wkdy & 216 wknd trips. Project does not have enough daily trips by bus to meet the credit.
D				Req'd	FAAN/TGE	CREDIT: Locate within 200 yds of bicycle network and provide long-term bike storage for at least 5% of all regular building occupants and short-term storage for at least 2.5% of all peak visitors. Provide one shower for the first 100 regular building occupants and one additional for every 150 thereafter. There likely will not be staff showers in the school.
D	1			Req'd	Nitsch	CREDIT: Do not exceed the minimum local code requirements for parking capacity. Provide parking capacity that is a 40% reduction below the base rates recommended by the Parking Consultants Council. Provide preferred parking for carpools for 5% of the total parking capacity. Calculations need to be performed to determine if the parking count meets the requirements. In addition, the number and location of carpool parking will need to be determined.
D	1			Req'd	Nitsch/BLW	CREDIT: Designate 5% of all parking spaces as preferred parking for green vehicles (a discounted parking rate of at least 20% for green vehicles is an acceptable substitute). In addition, install electrical vehicle supply equipment (EVSE) in 2% of all parking spaces used by the project. The project will need to provide electric charging stations in addition to green vehicle parking spaces. Eversource and National Grid have a new program supporting EV charging infrastructure cost for up to 5% of the site's parking spaces.
SUSTAINABLE SITES				12	Responsible	Notes
C	Y			Req'd	Nitsch/CM	REQUIRED: Create/Implement an ESC plan for all construction activities associated with the project. The plan must conform to the requirements of the 2012 U.S. EPA Construction General Permit (CGP). The project will implement an ESC plan.
D	Y			Req'd	Env. Eng.	REQUIRED: Conduct a Phase I Environmental Site Assessment as described in ASTM E1527-05 (or a local equivalent) to determine whether environmental contamination exists at the site. If contamination is suspected, conduct a Phase II Environmental Site Assessment as described in ASTM E1903-11 (or a local equivalent). If site is contaminated, remediate the site to meet local, state, or national environmental protection agency region residential (unrestricted) standards, whichever are most stringent. Phase I site assessment and survey has been completed.
D	1			Req'd	FAAN/Nitsch/WL	CREDIT: Complete and document a site assessment that includes: Topography, Hydrology, Climate, Vegetation, Soils, Human Use, Human health effects. Project team will perform a site assessment. There are drainage issues on site - a lot of grading needed. A lot of large rocks on the site.
D	2			Req'd	WL	CREDIT: Preserve and protect from all development and construction activity 40% of the greenfield area on the site (if such areas exist) and restore 30% (including the building footprint) of the previously developed site area with native & adaptive vegetation OR provide financial support equivalent to at least \$0.40 per square foot for the total site area to a nationally or locally recognized land trust or conservation organization. Project will include native and adapted vegetation. Too early in design to determine if credit can be achieved.
D	1			Req'd	WL	CREDIT: Provide outdoor space greater than or equal to 30% of the total site area (including building footprint). A minimum of 25% of that outdoor space must be vegetated (turf grass does not count as vegetation) or have overhead vegetated canopy. The outdoor space must be physically accessible. Calculations will have to be performed as the design develops to determine if the credit can be achieved. School wants to create site education opportunities - gardens, etc.
D	3			Req'd	Nitsch	CREDIT: On site, manage the runoff from the developed site for the 85th percentile (2pts) or 98th percentile (3pts) of regional or local rainfall events using LID & GI strategies that best mimic natural site hydrology OR manage on site the annual increase in runoff volume from the natural land cover condition to the post developed condition. (2 pts). This credit can be difficult to achieve. Nitsch will look at the LEED v4.1 version of this credit and determine if the credit can be achieved. A cistern, vegetated swales, raingardens were discussed as possibilities.
D	2			Req'd	WU/FAA	CREDIT: Use any combination of non-roof Measures, High-Reflectance roof or vegetated roof to be equal to or greater than the total roof + hardscape area on-site AND/OR place a minimum of 75% of parking spaces under cover. Project will have a light colored roof. Project team should consider light colored materials for walkways and other hardscape.
D	1			Req'd	BLW	CREDIT: Do not exceed allowable backlight, uplight or glare (BUG) ratings for all exterior lighting as determined by the project's lighting zone (LZ). Project will have a limited amount of outdoor lighting - only have the quantity needed for safety. Full cut off lighting that is dark sky compliant will be specified. There will be a flag pole that will require lighting.



Grade Configurations / Building Options	Primary School	Leicester MS	New School - Fields	Total Project Budget Costs (Constr. Costs + Soft Costs)	District Share	State Share	Annual RE Tax Impact (Average Home Assessment of \$244,650)	Remarks
Grades 5-8: Add/Reno to Existing LMS	\$ -	\$ 45,500,000	\$ -	\$ 58,000,000	\$ 28,500,000	\$ 29,500,000	\$ 519	
Grades 5-8: New Stand Alone Building in Fields	\$ -	\$ -	\$ 48,000,000	\$ 60,700,000	\$ 33,900,000	\$ 26,800,000	\$ 617	
Grades PK-8: New Stand-alone PK-8 in Fields (Preferred Option)	\$ -	\$ -	\$ 70,200,000	\$ <b>87,000,000</b>	\$ <b>45,500,000</b>	\$ <b>41,500,000</b>	\$ <b>832</b>	Preferred Option as discussed by SBC
Grades PK-8: Add/Reno to Existing LMS (PK-8)	\$ -	\$ 62,100,000		\$ 78,000,000	\$ 37,500,000	\$ 40,500,000	\$ 682	
Grades PK-8: Add/Reno to Existing LMS (5-8); Add/Reno to Primary School (PK-4)	\$ <b>23,800,000</b>	\$ 45,500,000		\$ 86,500,000	\$ 57,000,000	\$ 29,500,000	\$ 1,037	<b>All Primary School Costs are District costs; no reimbursement from the State; (2) Separate Schools</b>

Notes/ Frequently Asked Questions (FAQ):

- 1) **MSBA will not participate in any construction costs to Primary School.**
- 2) Primary School Addition/Renovation based upon costs to upgrade school to 21st century learning/ MSBA Guidelines.
- 3) A PK-8 Add/Reno option to the Primary School is not practical given area and topography limitations.
- 4) Options if vote fails: One option - vote again on same MSBA approved Project (PK-8); otherwise start over.

**Building Option/Estimated costs at Feasibility**



[leicesterbuildingproject.com](http://leicesterbuildingproject.com)







# Questions & Answers

