

# Andover High School Building Committee



August 24, 2023

HM  
FH

HMFH ARCHITECTS



# Potential scope add - Skate park

Skate park - add \$4,710,000

## Discussion - August 8, 2023

If not added to the project, the existing skate park will be removed to allow for necessary flexibility for the site program. The town is reviewing current utilization and considering if the skate park could be replaced in another location.

### Considerations:

- Current utilization
- Safety and supervision
- Cost





# Potential scope add - Sports lighting

Sports Lighting - add \$5,086,000

Discussion - July 27 & August 8, 2023

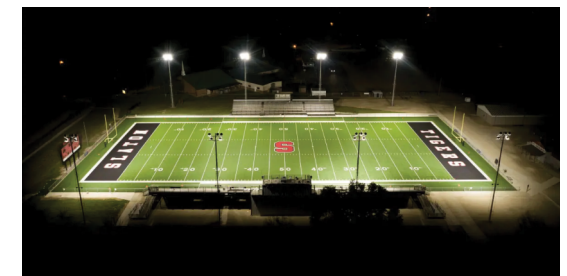
Vote - August 24, 2023

Sports lighting is not included in the base project (lighting at Lovely Field will remain). Sports lighting can extend the usable hours of the athletic facilities particularly in the shoulder seasons (early spring, late fall). Operational regulations can limit the hours of use.

Included in the cost is lighting the overlapping multipurpose fields along Shawsheen Road, and the competition baseball and softball fields.

Considerations include:

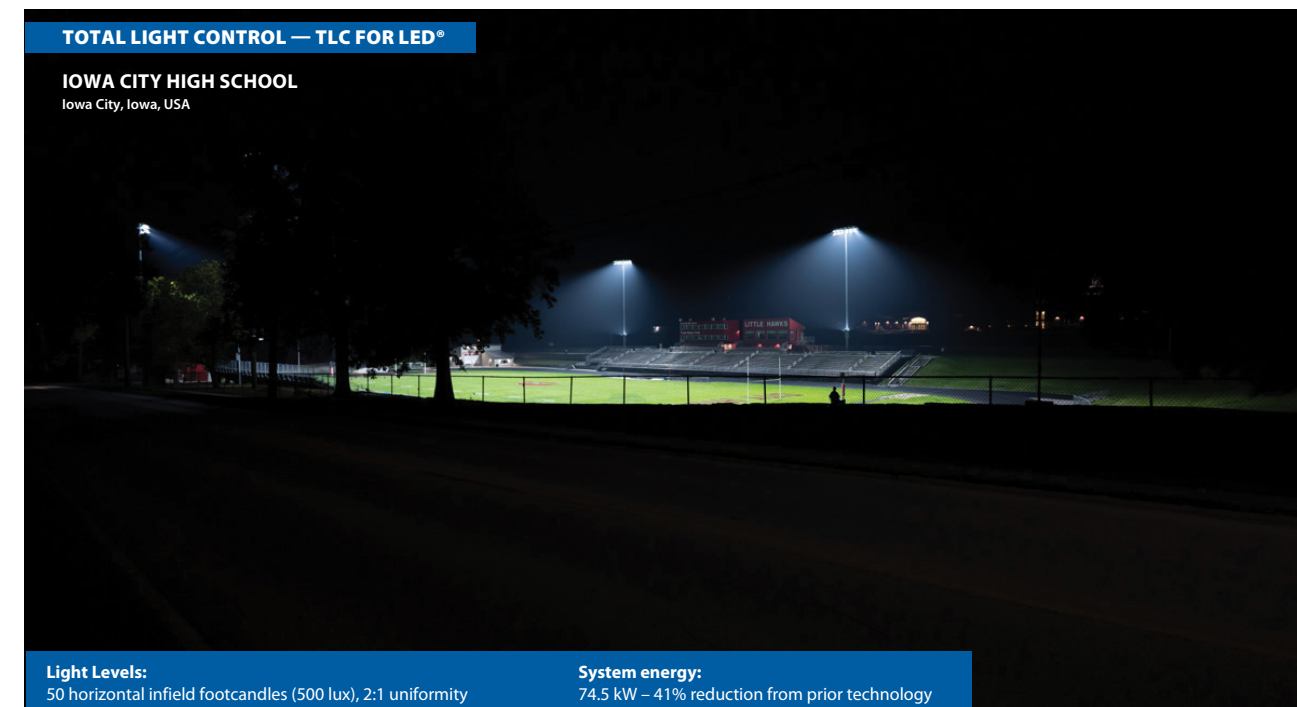
- impact to neighbors - light cut off and dark sky requirements will be met. Photometric calculations will confirm that no light is directed beyond the limits of the site. Reflected light, views of lit fields, and extended use will have impact.
- operational hours and extended field utilization - regulations can control and limit the hours of use.
- potential environmental impact
- cost - reduced scope options include:
  - lighting specific fields only (allow approximately \$1,700,000/field)
  - providing conduit and cabling for future installation (allow approximately \$125,000/field)





# Sports lighting -continued

- Baseball/ softball- assume 5 poles, 70' high, \$1,417,000 each (\$2,834,000)
- Shawsheen fields - assume 8 poles, 70' high, \$2,267,000
- Plateau field - assume 4 poles, 70' high \$1,334,000





# Sports lighting -continued - AHS Schedules

Charts are made with the Fall Schedule - this is the busiest season outdoors.

Field	Time Slot: Practice day	Team	Time Slot: Game day	Team
Grass 1: Aumias	3:30-5:30	Girls JV + V Soccer	4:00-5:30	Girls or Boys JV Soccer <b><i>No available practice time</i></b>
Grass 2: West	3:30-5:30	Girls + Boys Fr Soccer	4:00-5:30	Girls or Boys Fr Soccer <b><i>No available practice time</i></b>
Grass 3: Practice	3:30-5:30	Fr JV + V Football Girls + Boys XC	3:30-5:30	Girls + Boys XC Meet <b><i>Fr JV + V Football Practice</i></b>
Grass 4: Plateau	3:30-5:30	Fr Field Hockey	4:00-5:30	Fr Field Hockey <b><i>No available practice time</i></b>
Turf	3:30-5:30 5:30-7:30	JV + V Field Hockey Football/Soccer Practice	4:30-6:00 6:30-8	JV Field Hockey/Soccer V Field Hockey/Soccer <b><i>No available practice time</i></b>
			6:00-9:00 3:30-5:30	V Football *Friday/Thursday Night* <b><i>Field Hockey/Soccer Practice</i></b>



# Sports lighting -continued - AHS Schedules

**Without additional Lights-Does not change current schedule - see above game day. We would have the exact same number of fields and time slots available.**

With additional Lights on Plateau Only

Field	Time Slot: Practice	Team	Time Slot: Game	Team
Turf 1	3:30-5:30	G Soccer V+JV	3:30-5:30	Sub V soccer practice
Turf 2	3:30-5:30	B Soccer V+JV	3:30-5:30	Sub V Soccer game
Turf 3: Stadium	3:30-5:30 5:30-7:30	V Field Hockey Football	3:30-5:30 5:30-7 7-9  Friday Night 5:30-9:00 3:30-5:30	Football Practice V Soccer game Open practice slot  Football Game Open Practice slot
Turf 4: Plateau	3:30-5:30 5:30-7:30	B+G Sub Varsity Soccer Field hockey JV+F	4:30-6:00 6:30-8	Sub V Field Hockey game V Field hockey game
Grass/Turf:	3:30-5:30	Band* XC Practice	3:30-5:30	Band XC Meet



# Site circulation - existing





# DESIGN PRINCIPLES TO REDUCE TRAFFIC CONGESTION AND CONFLICTS

- **Place parking at the perimeter**
- **Provide two zones for arrival and dismissal**
- **Separate bus and car queuing**
- **Maximize queuing and circulation options**
- **Minimize need for enforcement**
- **Prioritize student pedestrian experience**

# INITIAL FEEDBACK RECEIVED: WHAT'S WORKING? WHAT NEEDS IMPROVEMENT?

- Focus on creating minimal need for enforcement
- Provide more separation between bus and car movement
- Shorten and simplify Moraine bus circulation
- Expand length of car pick up at West Middle School
- Reduce traffic burden on existing roadway infrastructure- considering broader context
- Remove some traffic turning from Shawsheen to Moraine, by providing more access to the west
- Consider impact of people crossing from Middle School parking on traffic
- Consider removing center site access for uninterrupted pedestrian access across site and few curb cuts on Shawsheen
- Review what is directly across from access points off of Shawsheen
- Consider/ review turn lanes from Shawsheen



# CIRCULATION PLAN Bus Circulation - Option 1 (DRAFT)

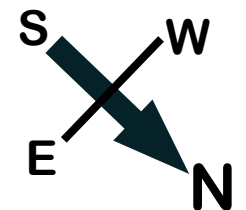
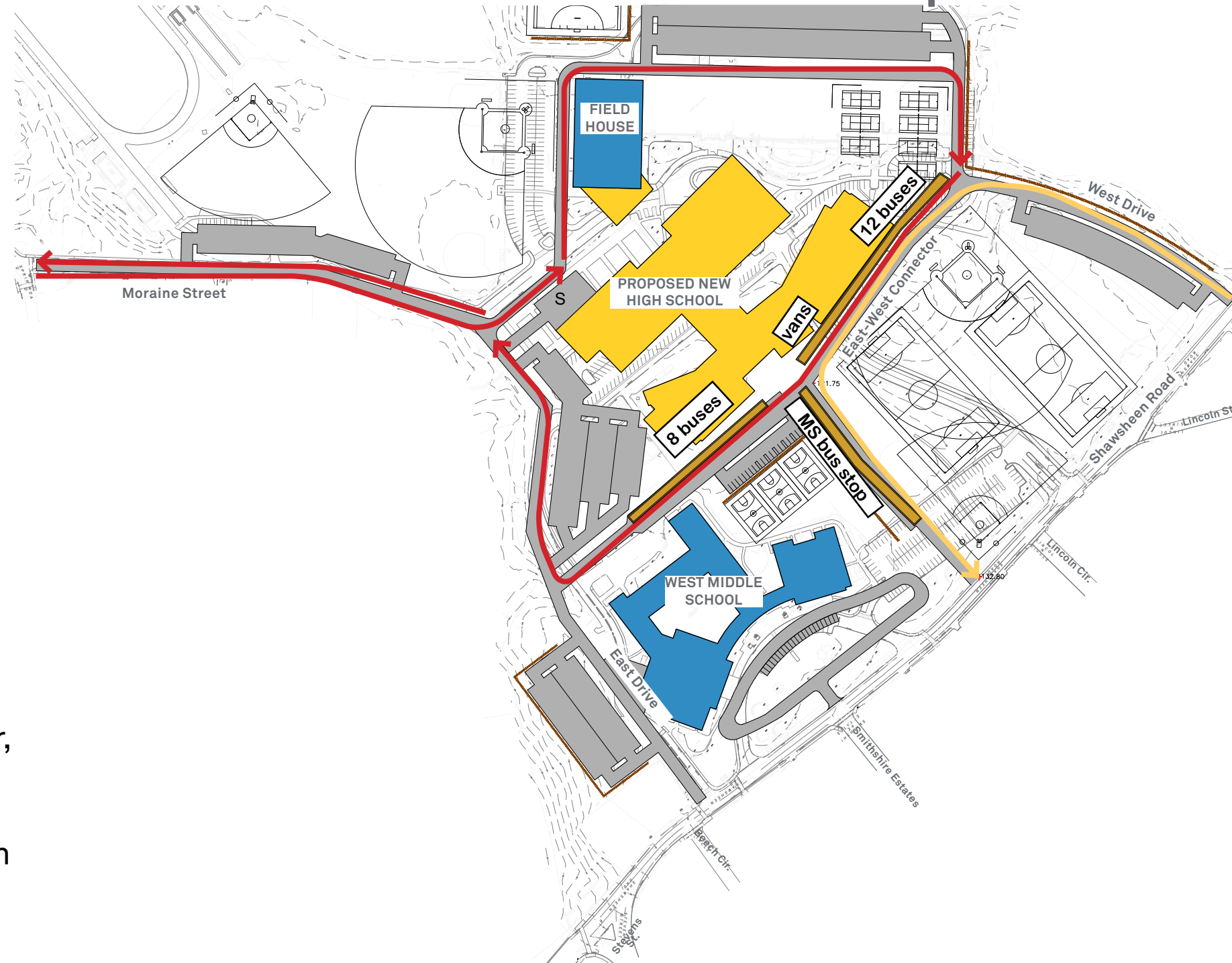
Morning drop-off and afternoon pick-up.

→ Shawsheen bus

→ Moraine bus

Option 1 and 2 change the circulation, not the road layout, and are not mutually exclusive. With this layout, the school can choose to utilize one, or the other, or both.

Circulation envelope wide enough for two-way traffic, sidewalks and separated bike lane.





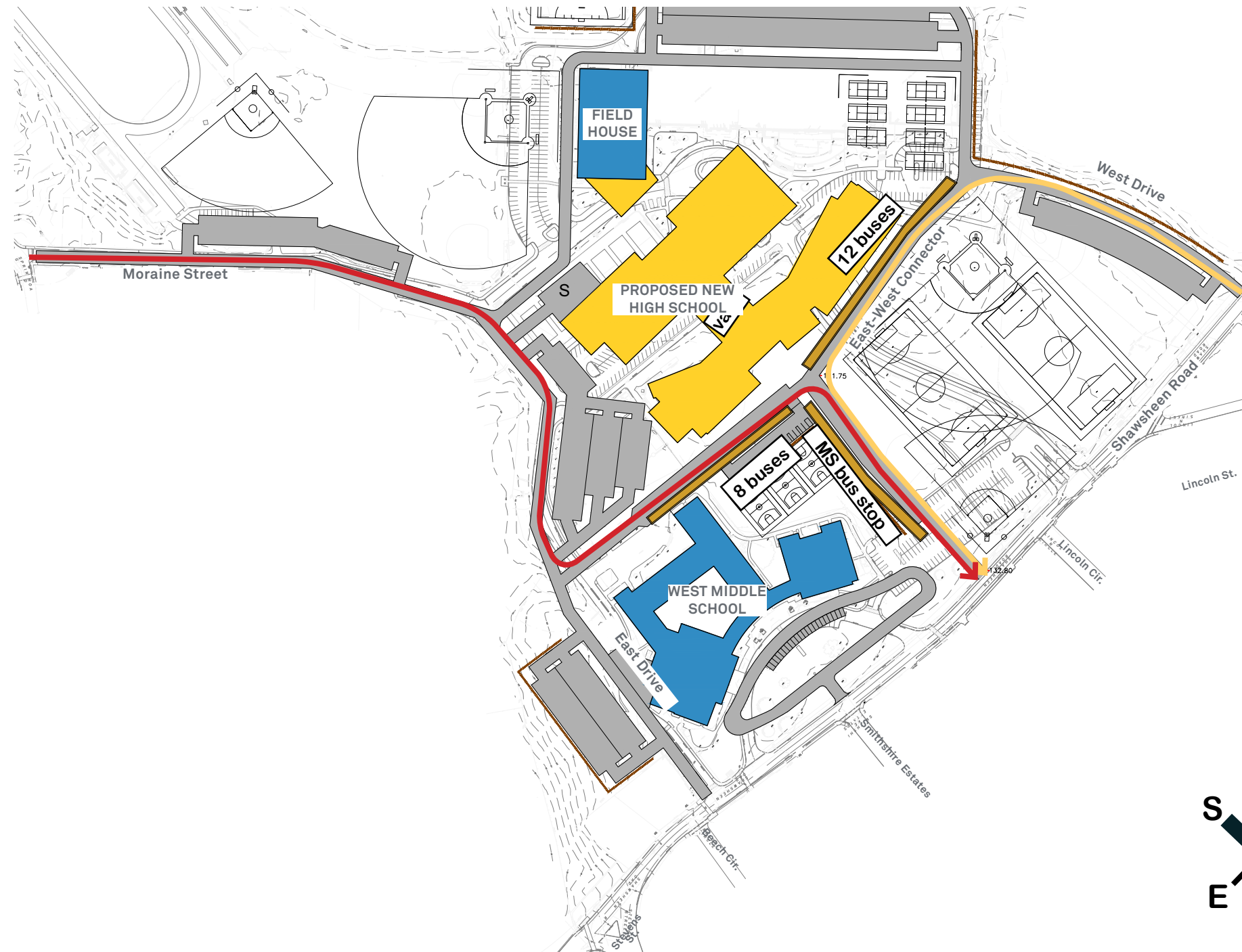
# CIRCULATION PLAN Bus Circulation- Option 2 (DRAFT)

Morning Drop-off

- Shawsheen bus
- Moraine bus

Option 1 and 2 change the circulation, not the road layout, and are not mutually exclusive. With this layout, the school can choose to utilize one, or the other, or both.

Circulation envelope wide enough for two-way traffic, sidewalks and separated bike lane.



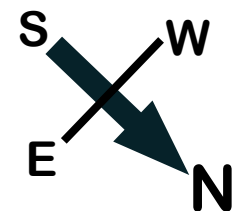
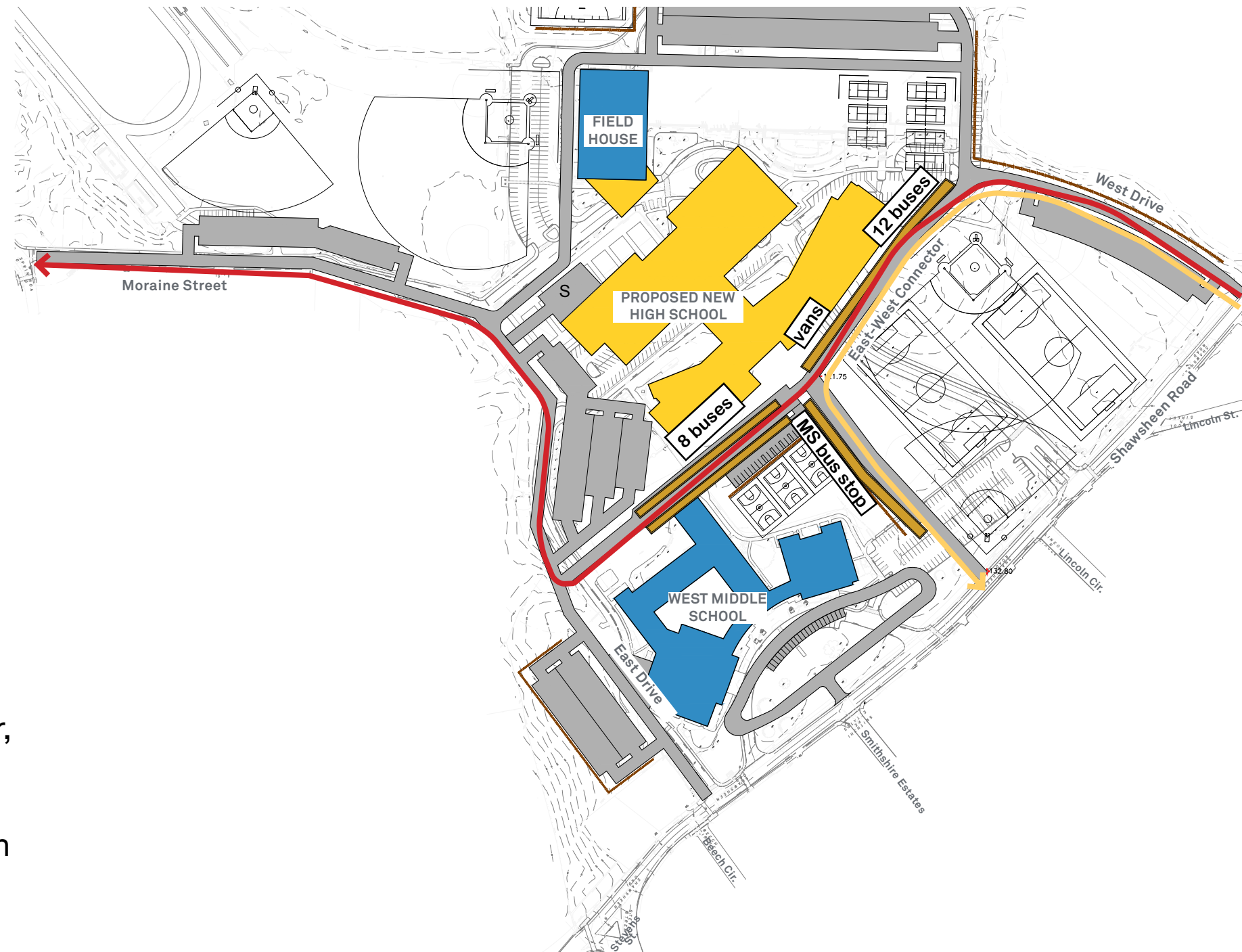
# CIRCULATION PLAN Bus Circulation Option 2 (DRAFT)

Afternoon Pick-up

- Shawsheen bus
- Moraine bus

Option 1 and 2 change the circulation, not the road layout, and are not mutually exclusive. With this layout, the school can choose to utilize one, or the other, or both.

Circulation envelope wide enough for two-way traffic, sidewalks and separated bike lane.





# CIRCULATION PLAN Car Circulation- High School

## (DRAFT)

Morning drop-off, and  
afternoon pick-up

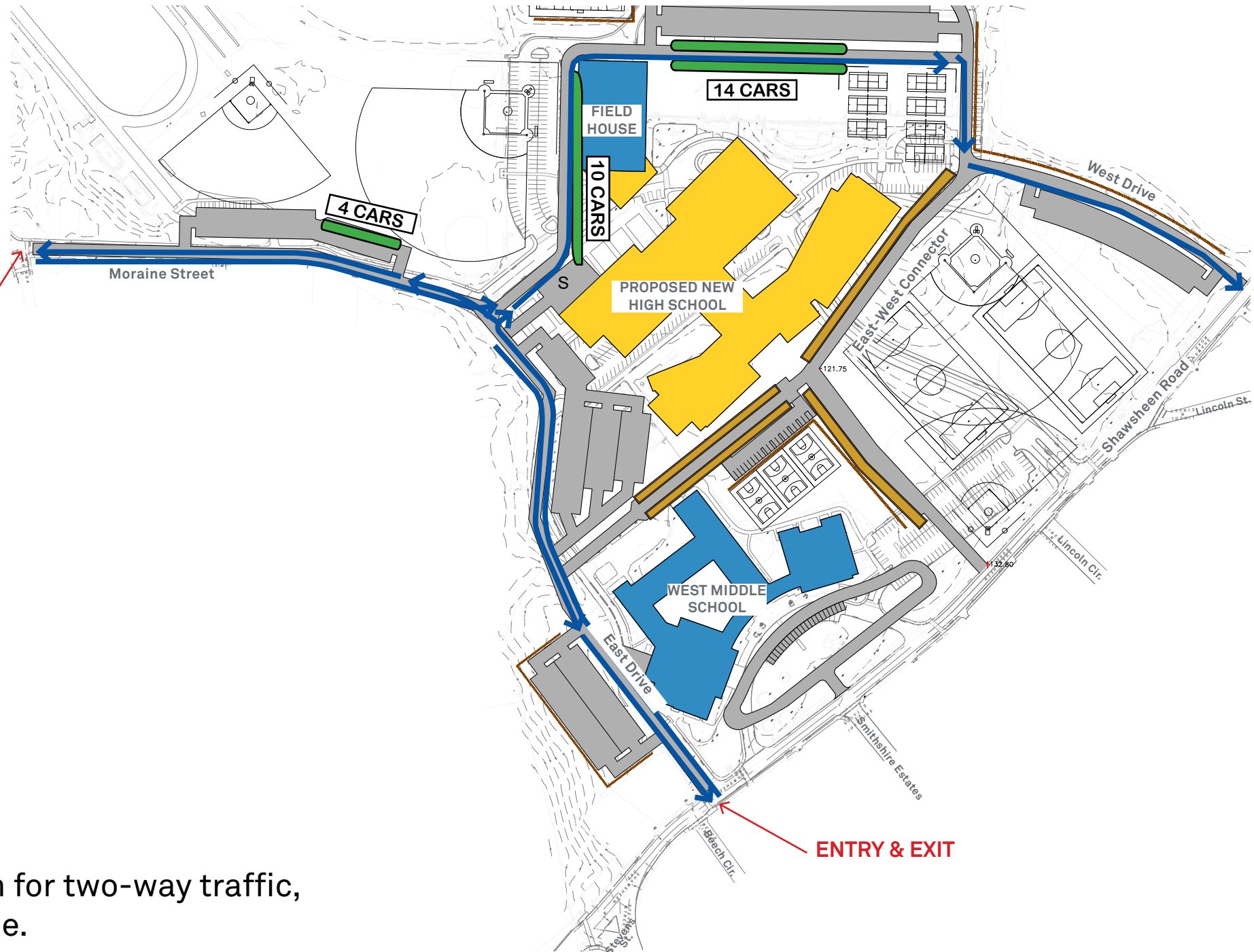
→ Car circulation  
from Moraine and  
Shawsheen

ENTRY & EXIT

ENTRY & EXIT

ENTRY & EXIT

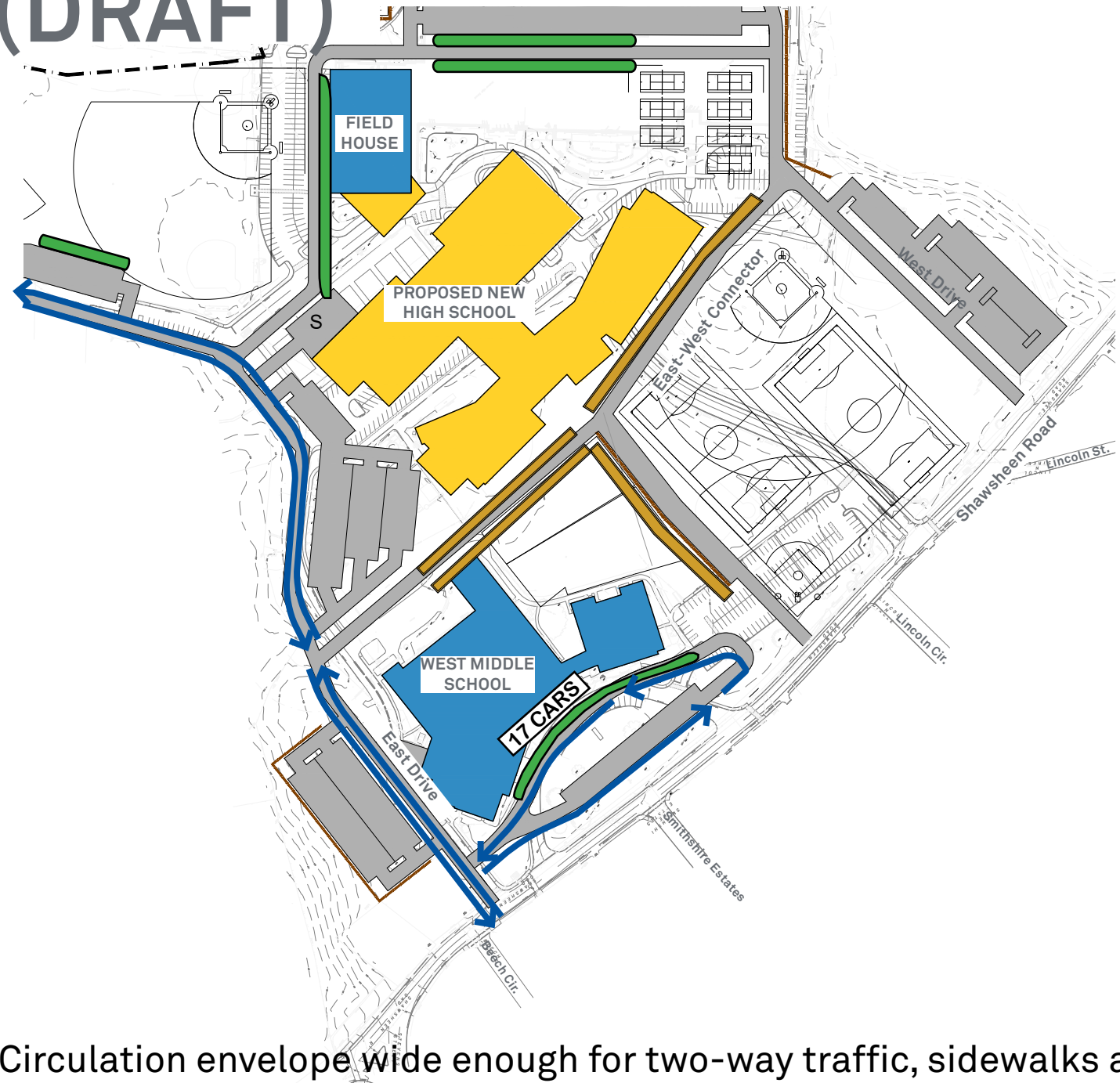
Circulation envelope wide enough for two-way traffic,  
sidewalks and separated bike lane.



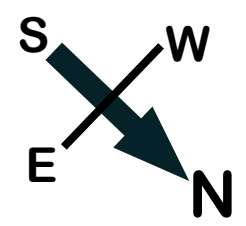
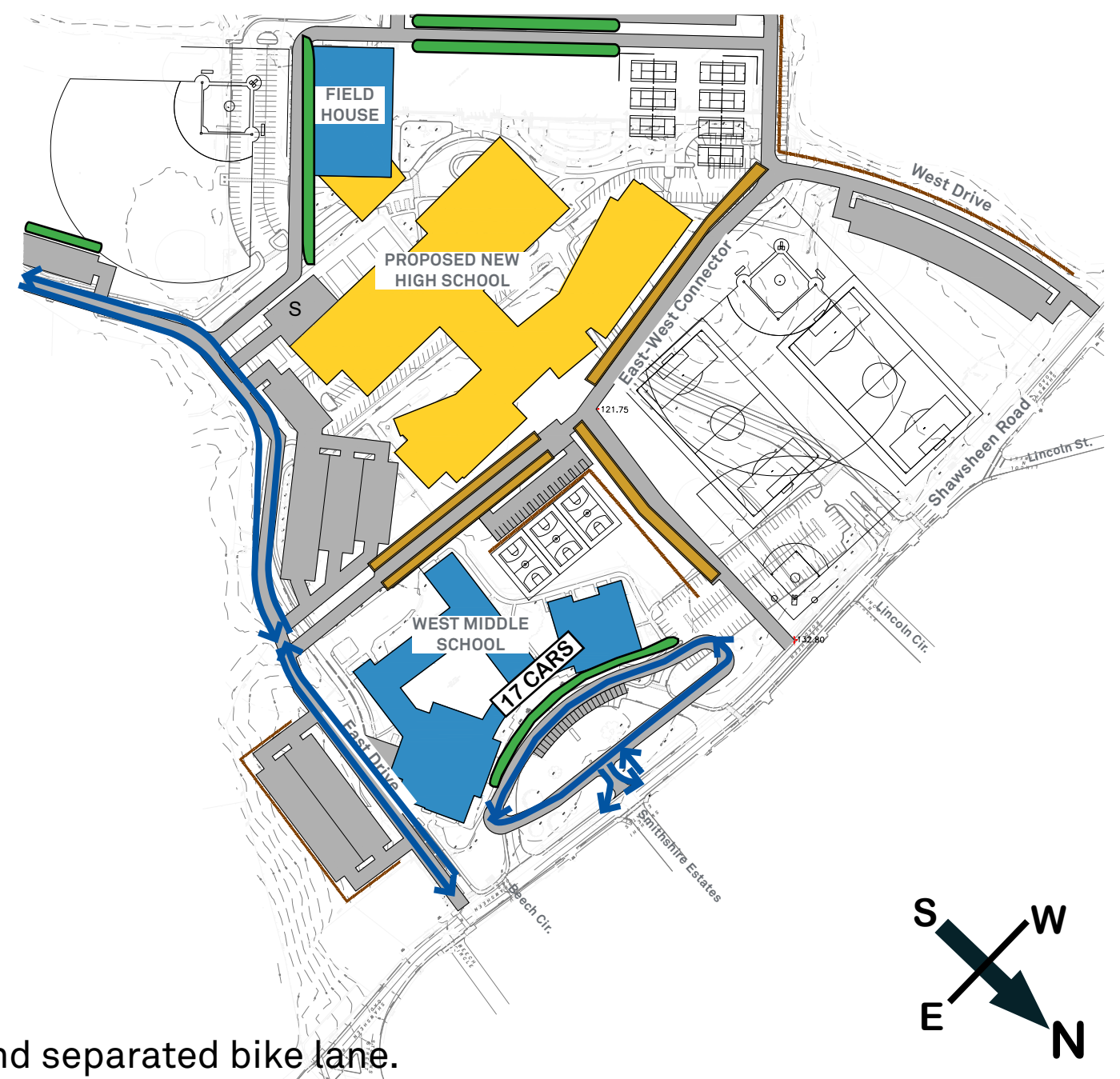


# CIRCULATION PLAN Car Circulation-Middle School (DRAFT)

OPTION 1




OPTION 2

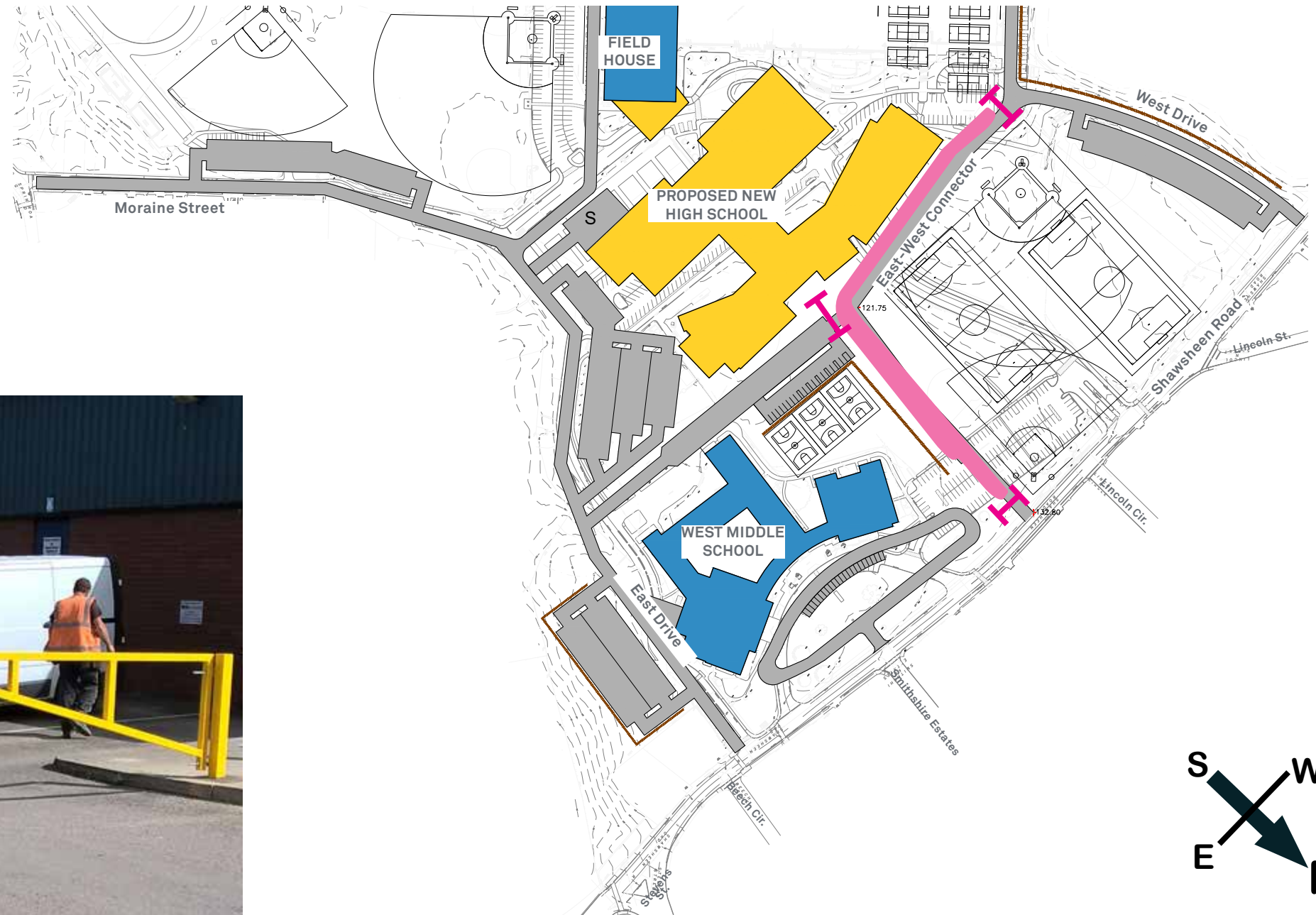


Circulation envelope wide enough for two-way traffic, sidewalks and separated bike lane.



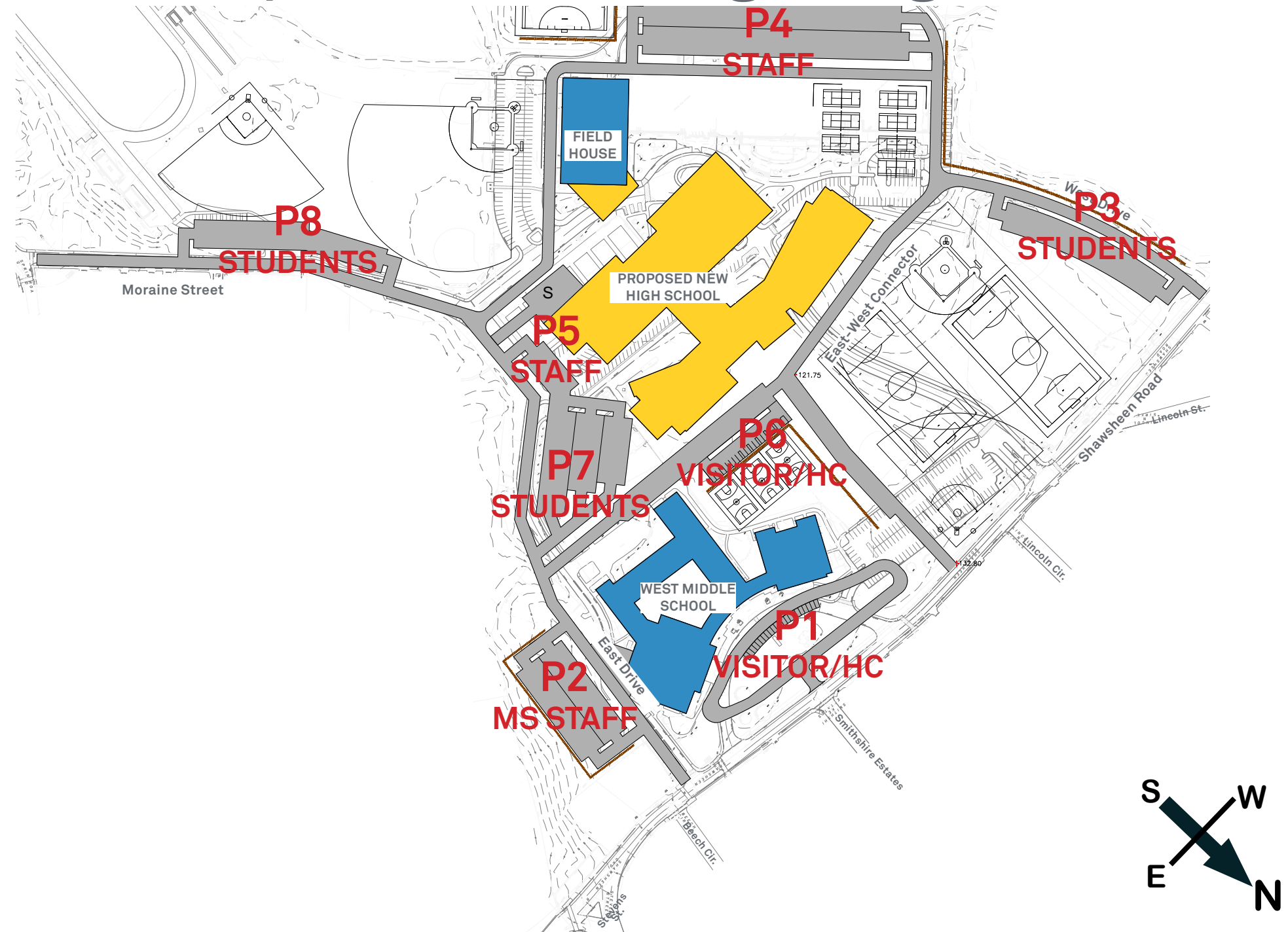
# CIRCULATION PLAN Proposed Closure of Vehicular Drives to Maximize Student Access (DRAFT)

 Pedestrian-friendly zone accommodating bus and emergency access



# CIRCULATION PLAN Proposed Parking Program (DRAFT)

Total parking provided on site = 693 spaces

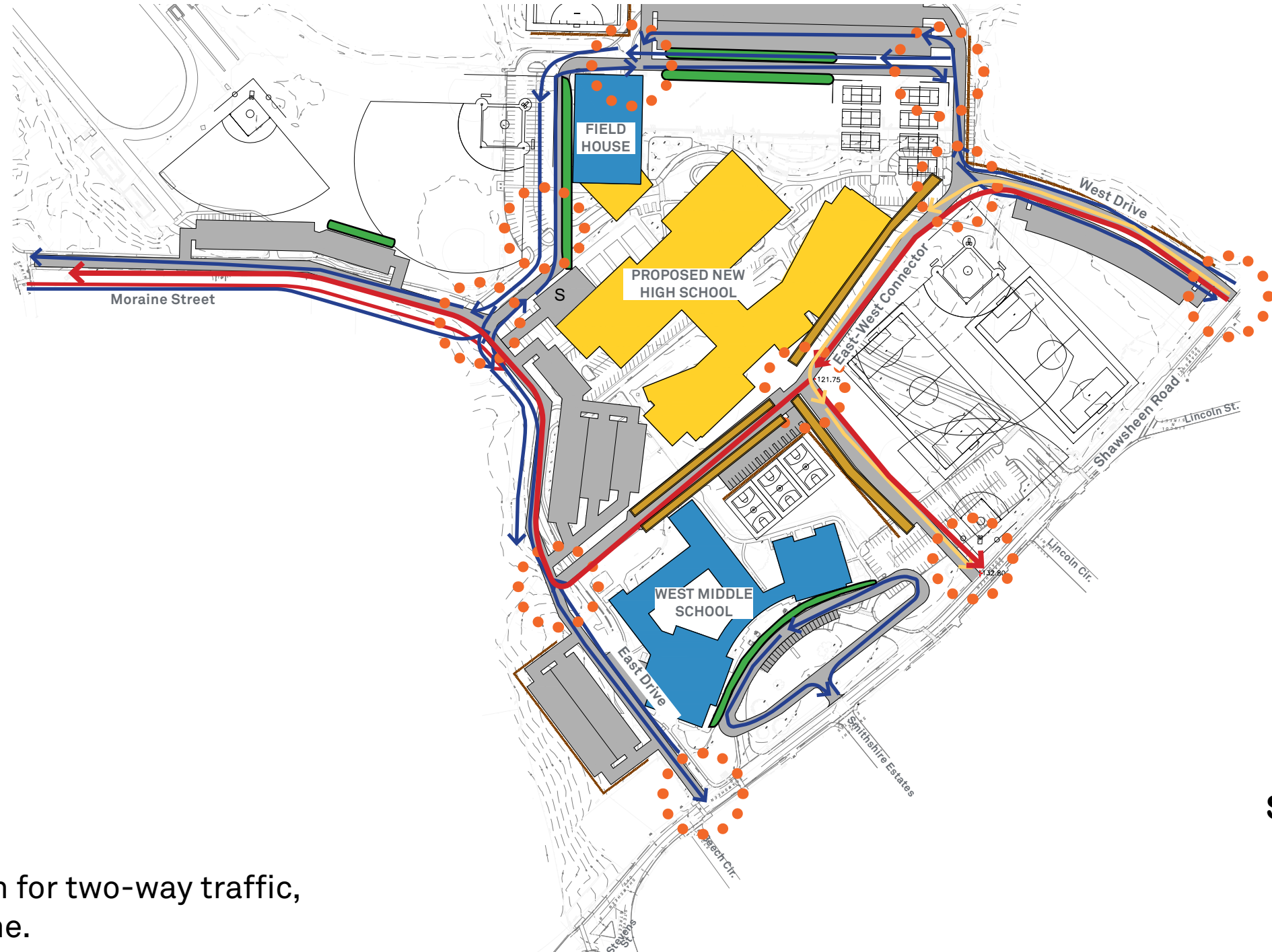
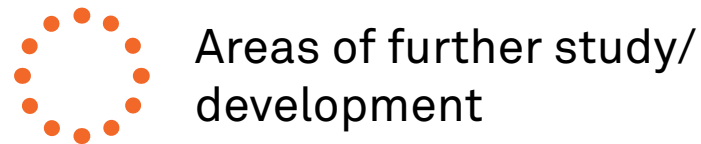




# CIRCULATION PLAN Traffic Management

## (DRAFT)

- Raised tables to be provided at all intersections for traffic calming and to prioritize pedestrian crossing.
- Access to east/west connector shall be limited to buses only during drop-off/pick-up.
- Signage, compliance, and management will be required.



Circulation envelope wide enough for two-way traffic, sidewalks and separated bike lane.

# WALKBIKE ANDOVER FEEDBACK

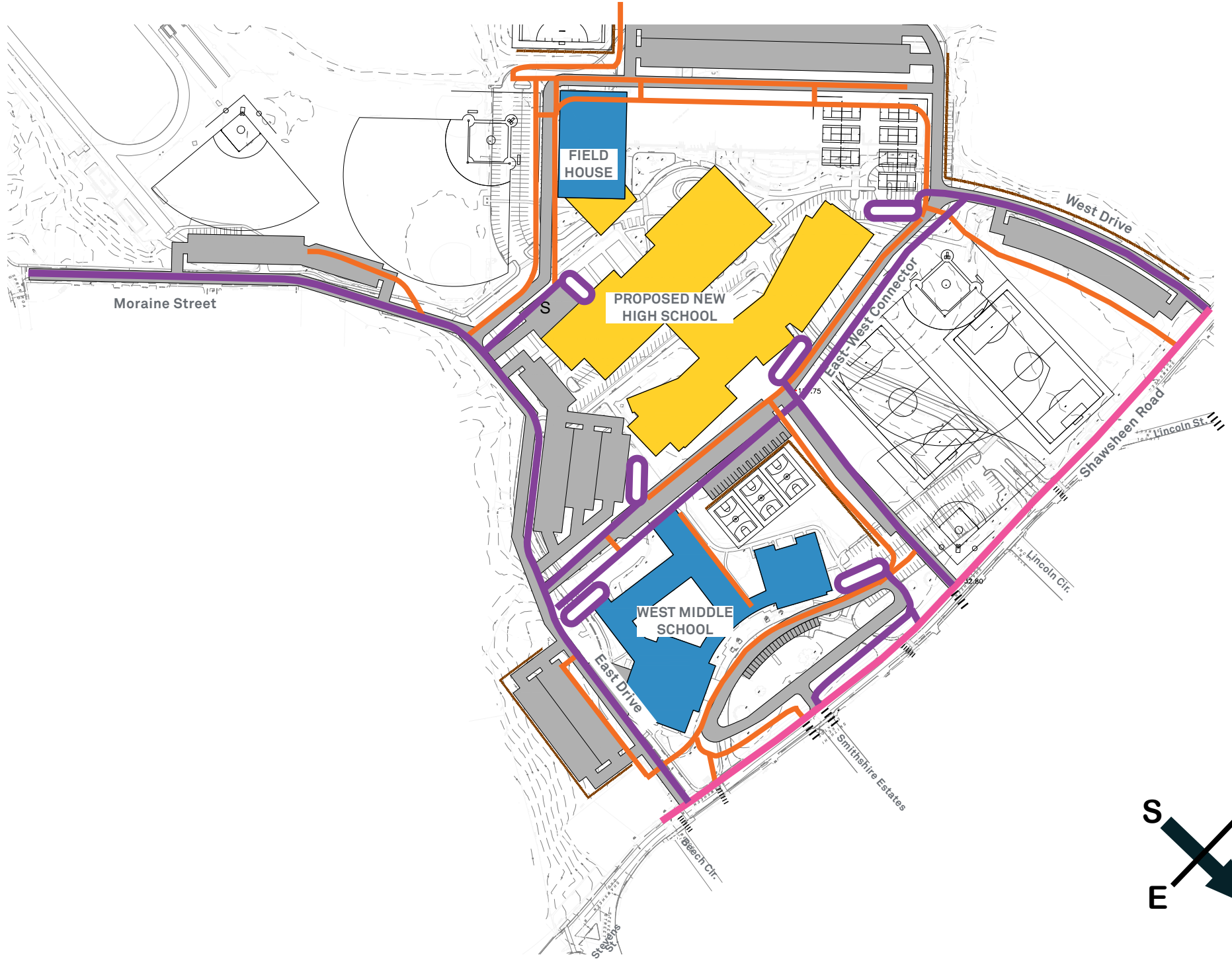
- **Support Andover Complete Street Policy**
- **Expect increased use of both traditional bicycles and E-bikes**
- **Provide covered bike storage close to main entrances**
- **Specify bike racks suitable for bike types and conforming with Walk/Bike Andover recommendations**
- **Facilitate “self enforcing infrastructure:” raised crossings, speed bumps, bollards and gates**
- **Enable bicycle access at first opportunity**
- **Provide 8’-0” minimum width for mixed bike/pedestrian path; 10’-12’ width preferred**
- **Provide vertical curb separation between travel modes, where possible**
- **Differentiate bike/ped pavement treatments**
- **Stripe center line of bike lane**
- **Safe Routes assists with surveys to help overcome barriers to bicycle usage**



# CIRCULATION PLAN Pedestrian and Bike Paths

(PRELIMINARY DRAFT)

- Public sidewalk (combined pedestrian-bike path)
- Combined pedestrian-bike path
- Pedestrian path
- Sheltered Bike Parking



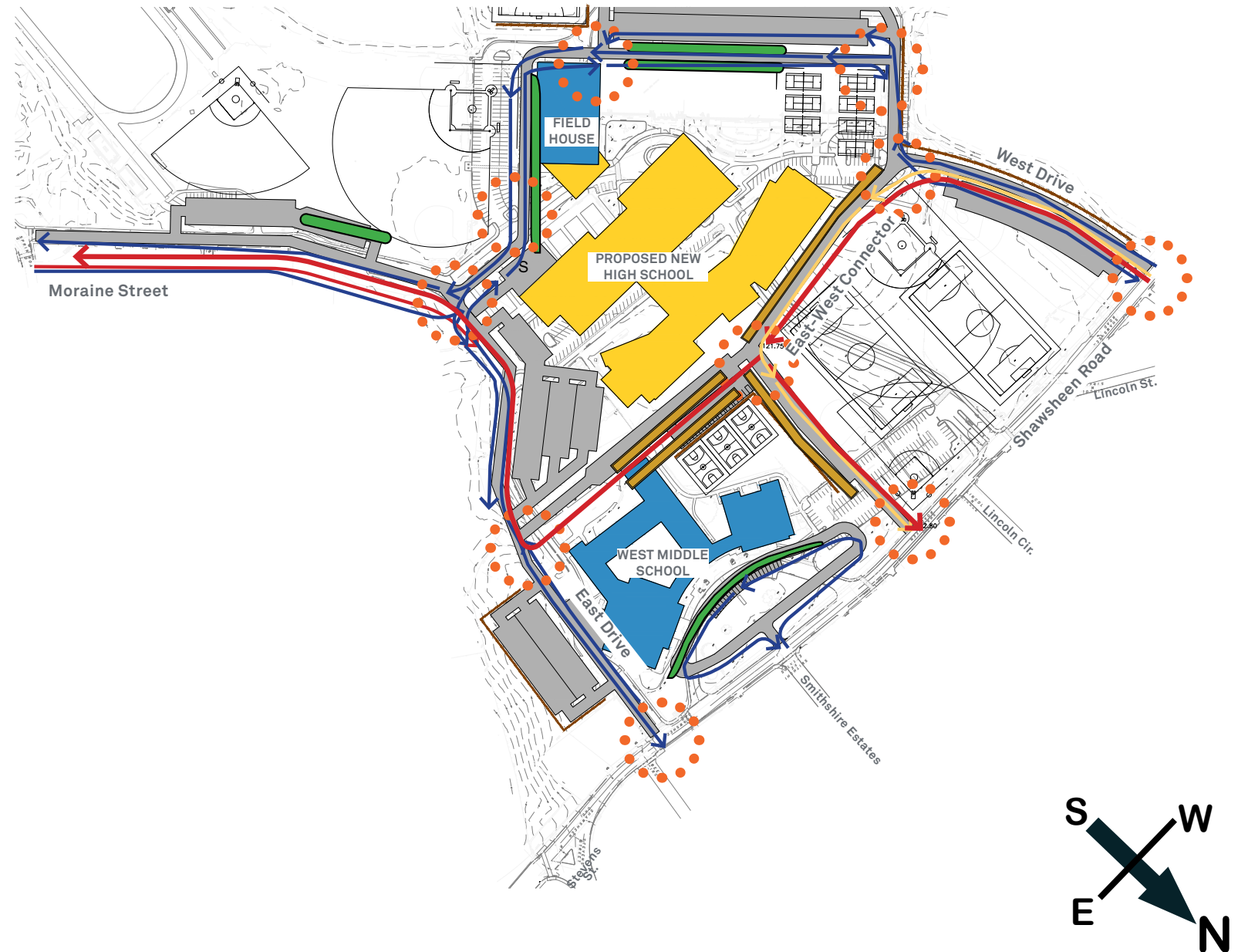


# CIRCULATION PLAN (DRAFT)

## EXISTING SITE CIRCULATION



## DRAFT PROPOSED SITE CIRCULATION





# Building massing from 7.27.2023

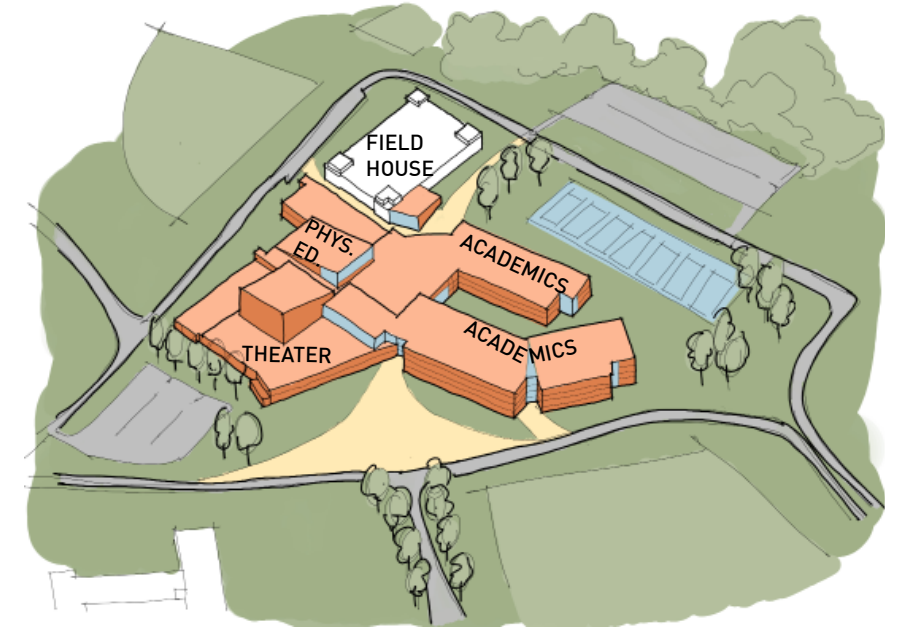
Massing configuration #1



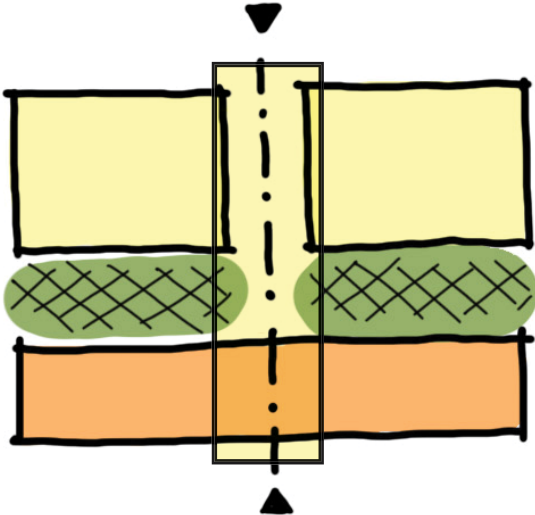
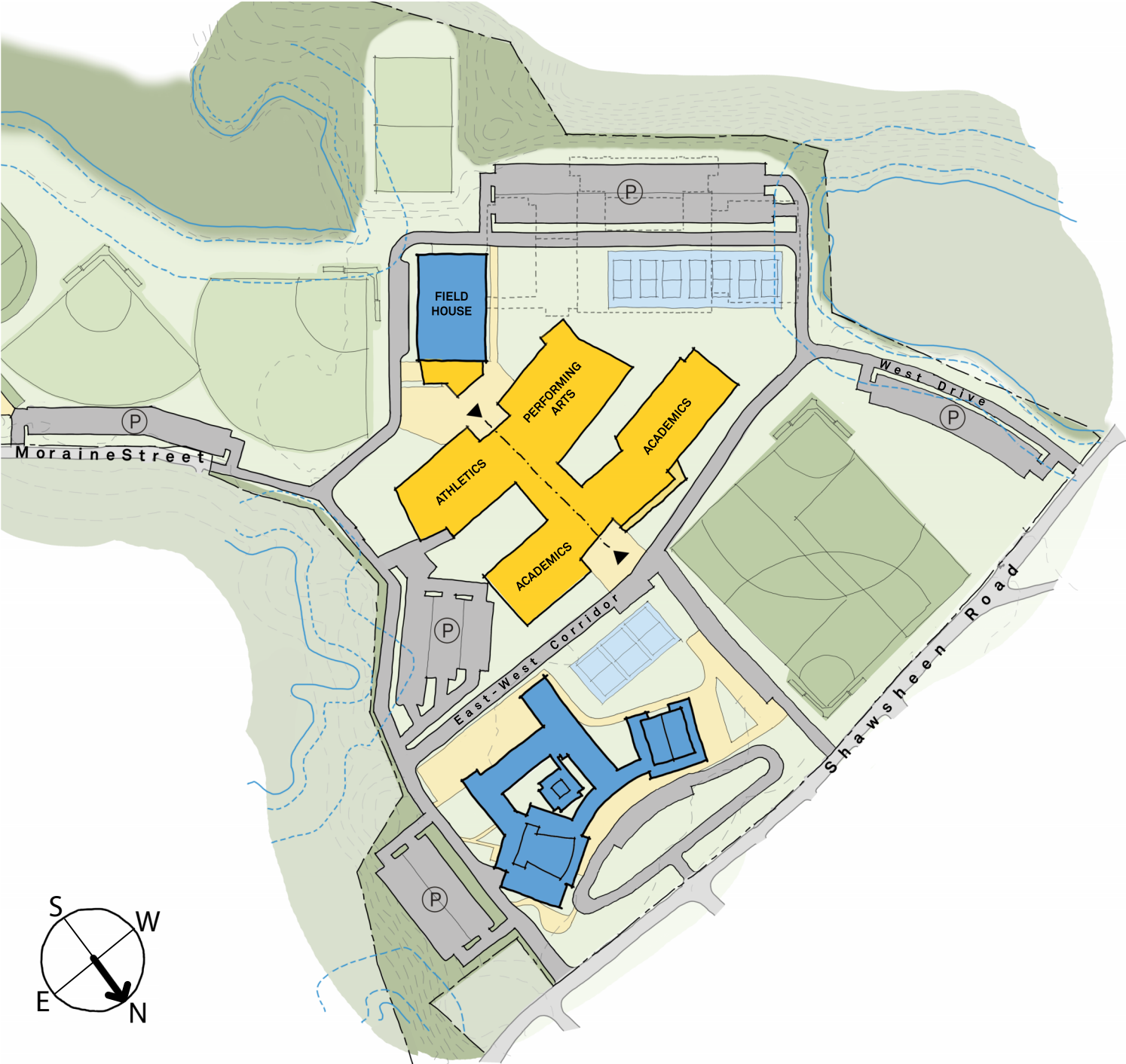
Massing configuration #2



Massing configuration #3



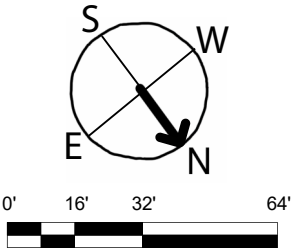
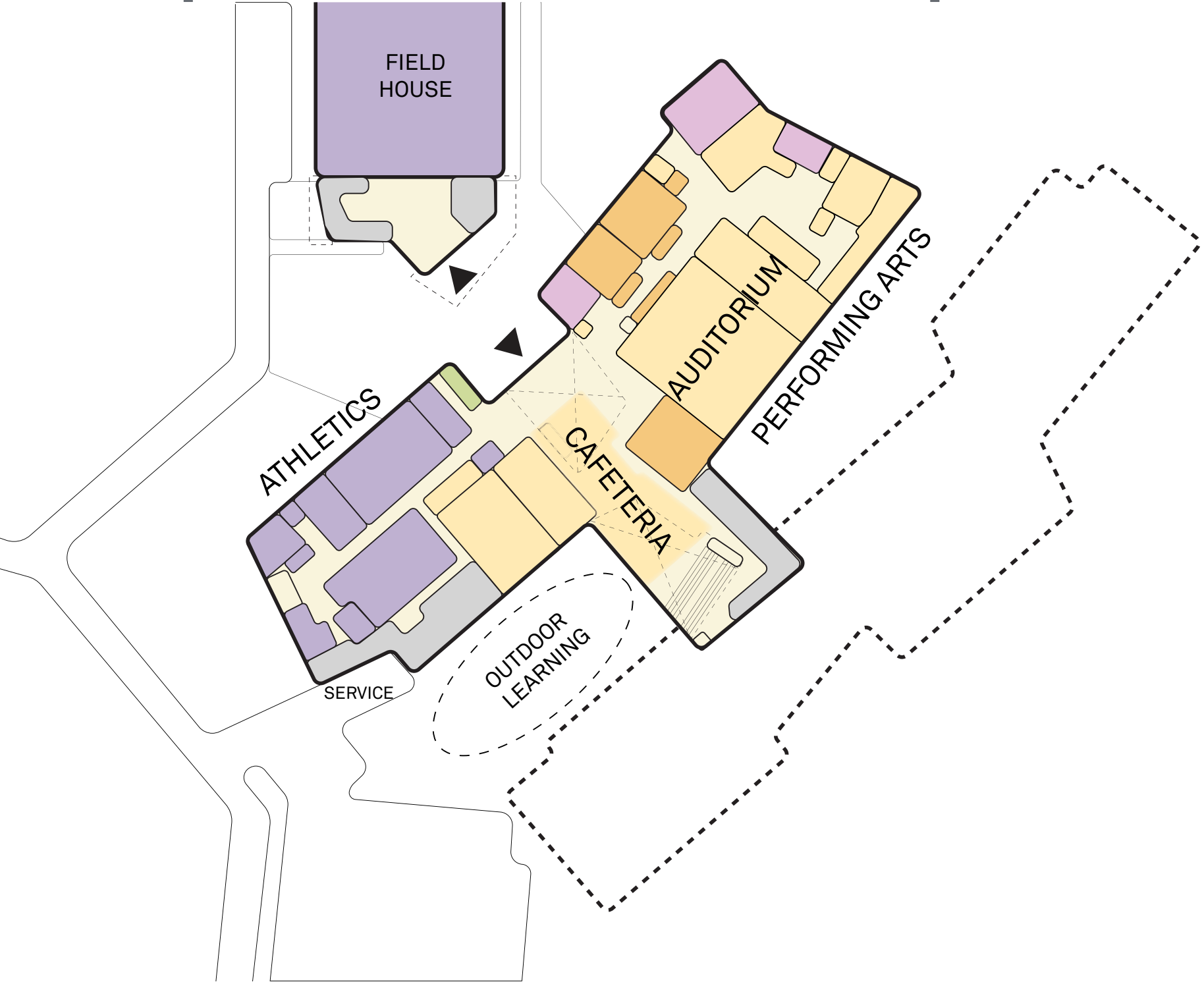
# Option 1A - Site plan



Parti Diagram



# Option 1A - First floor plan

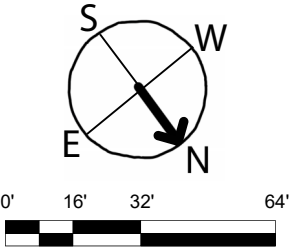


# Option 1A - Second floor plan

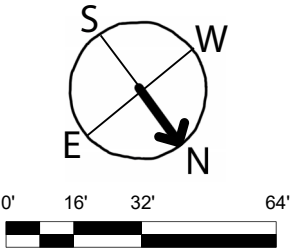




# Option 1A - Third floor plan

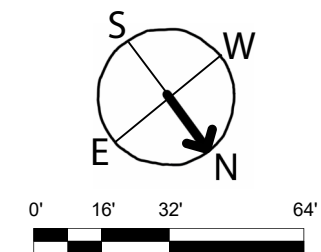


# Option 1A - Fourth floor plan

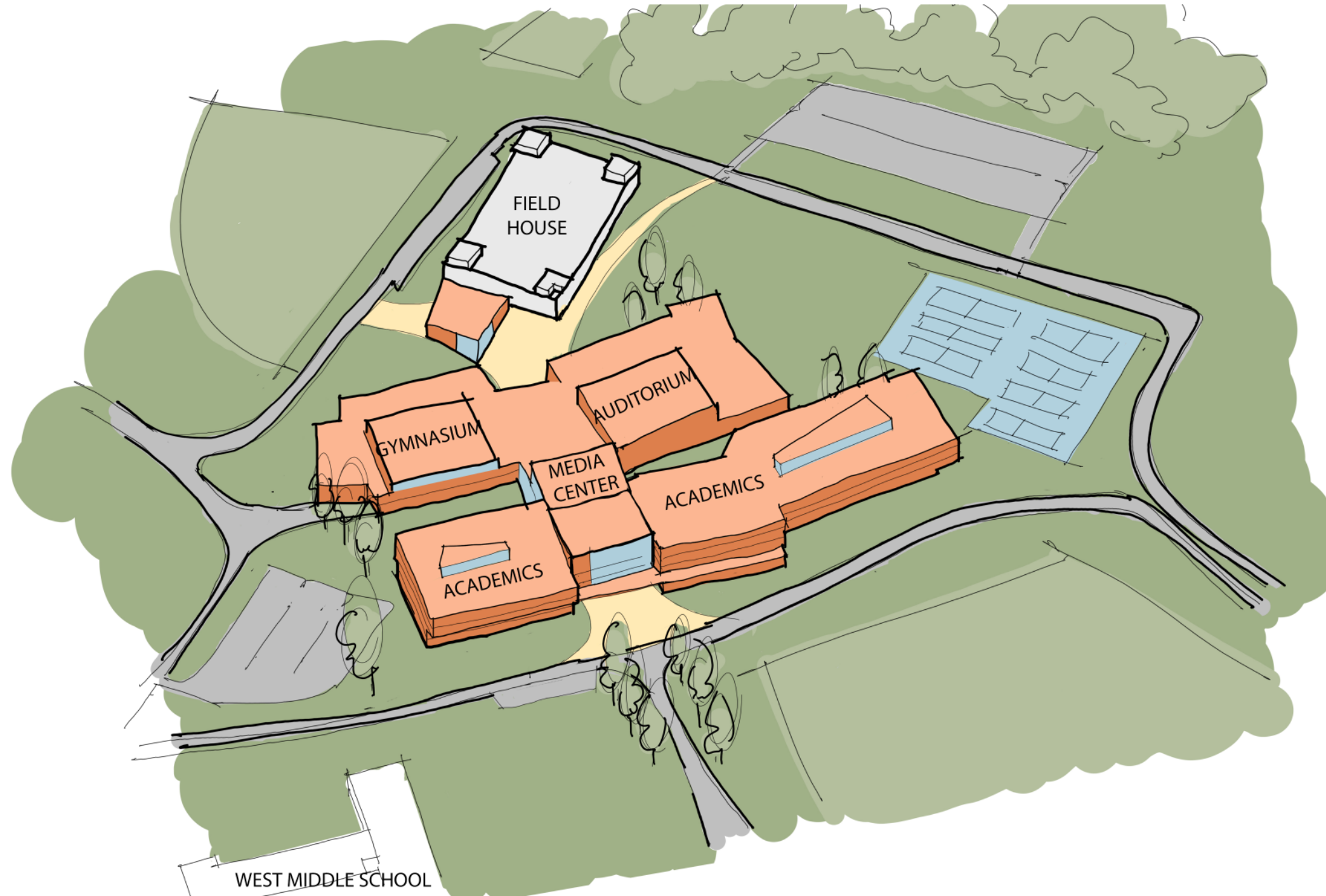




# Option 1A - Fifth floor plan

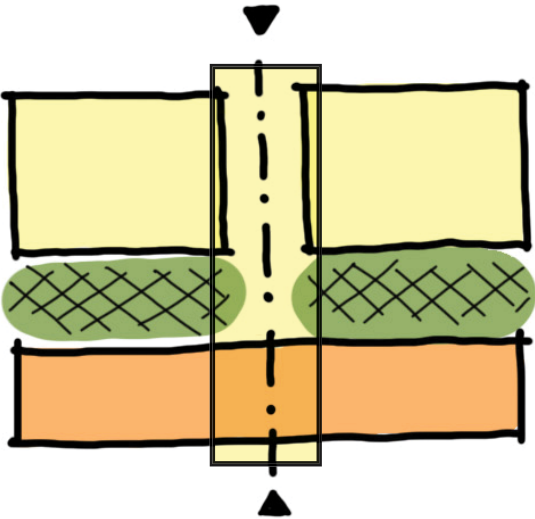
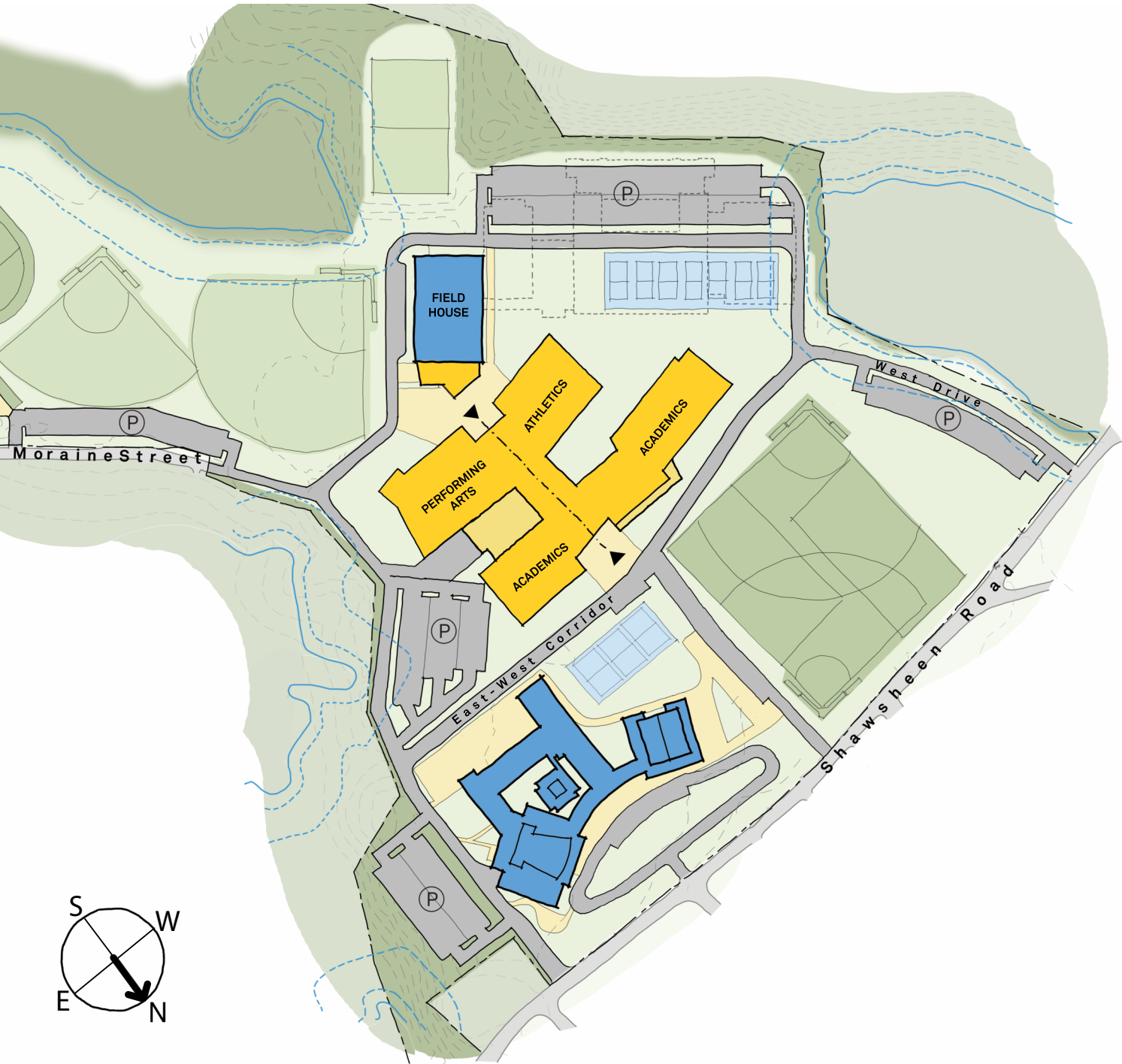


# Option 1A - Axonometric view





# Option 1B - Site plan



Parti Diagram

# Option 1B - First floor plan





# Option 1B - Floor plans



**Third floor**

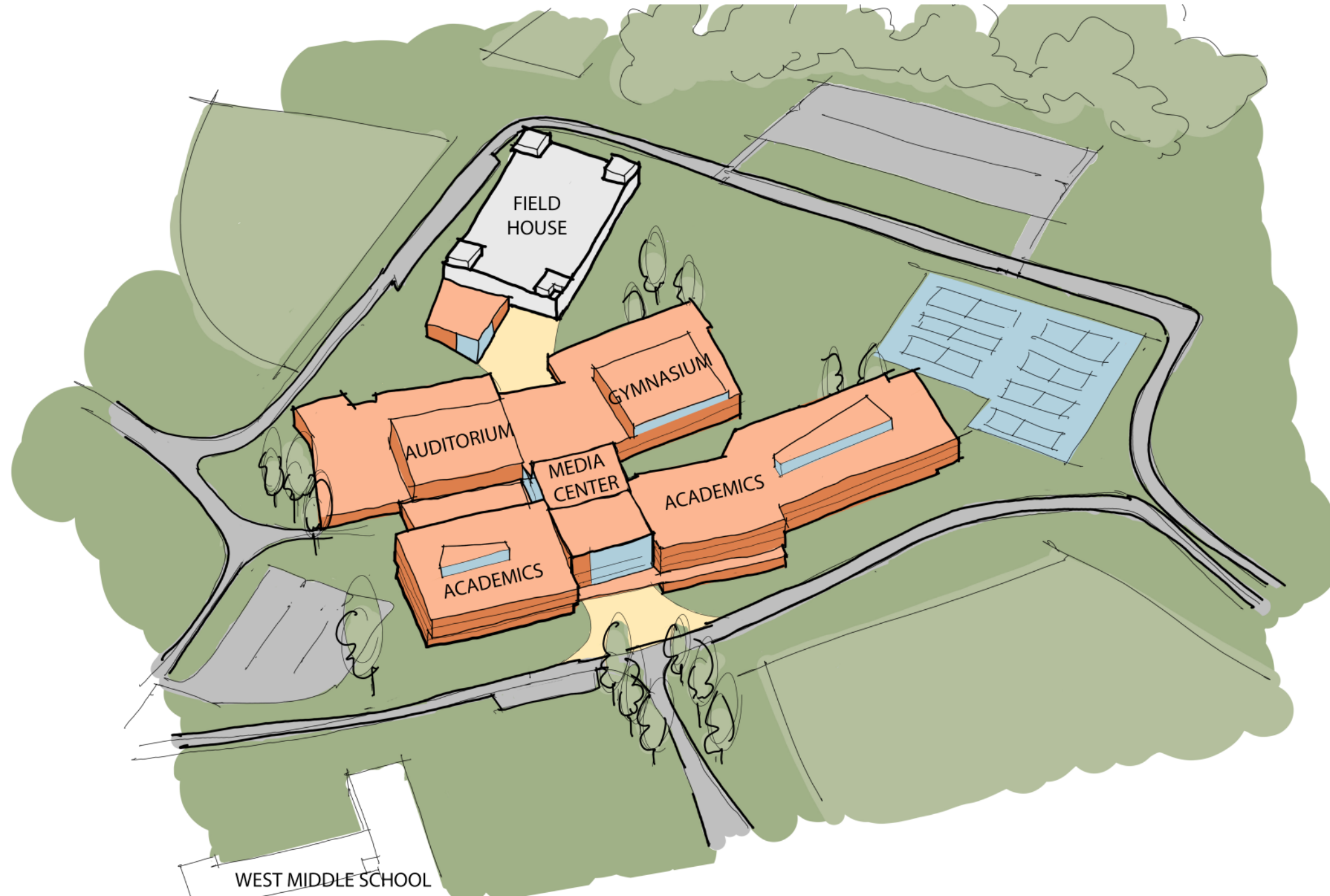


**Fourth floor**



**Fifth floor**

# Option 1B - Axonometric view





# Option 1A & B - Model photos



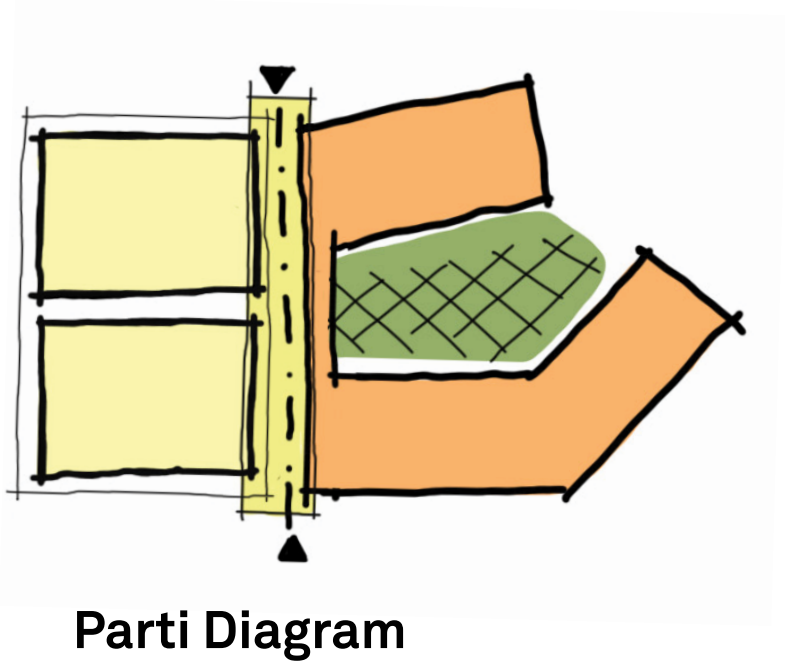
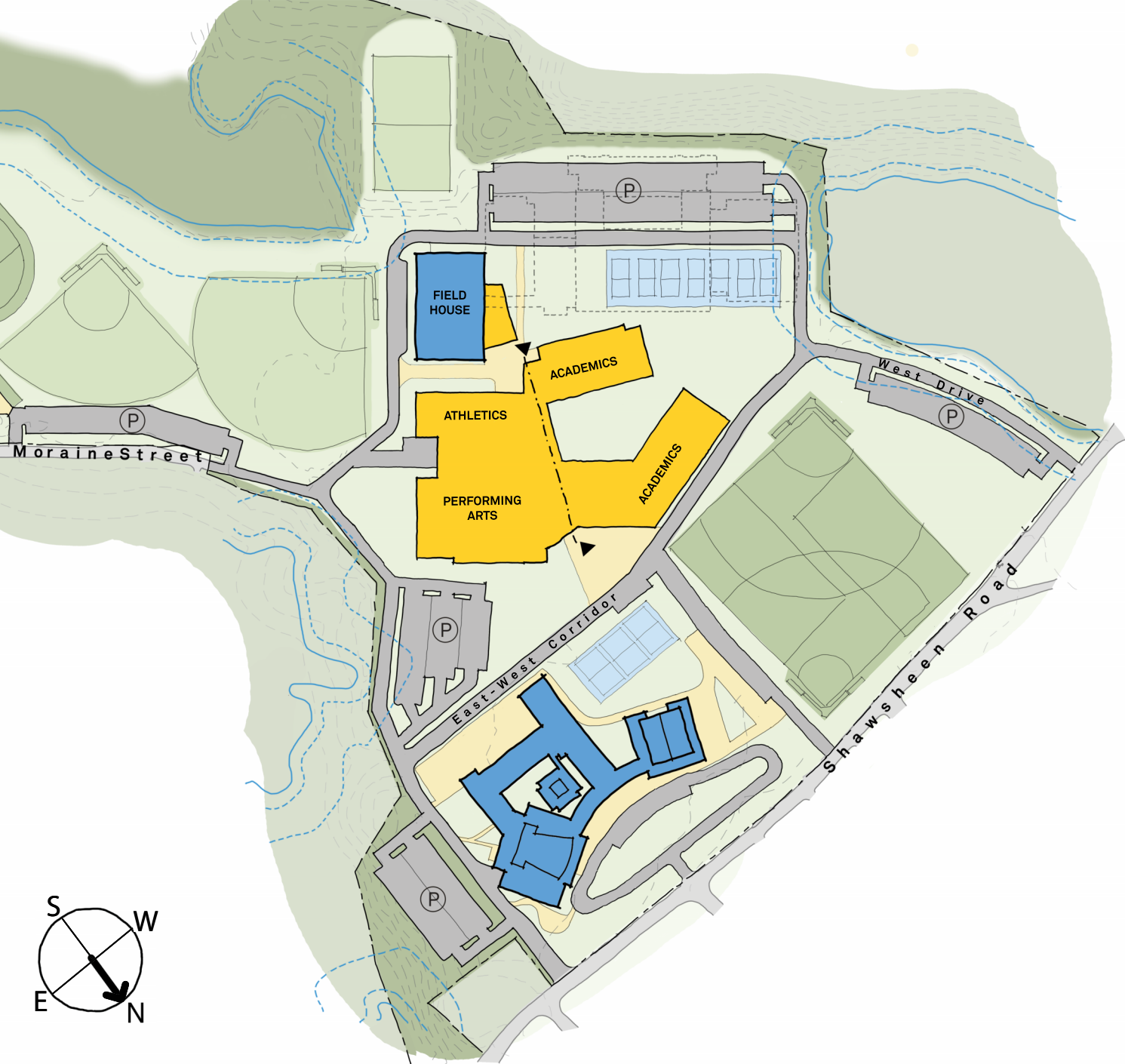
**Option 1 A (SBC Mtg. 07/27.23)**



**Option 1 B**

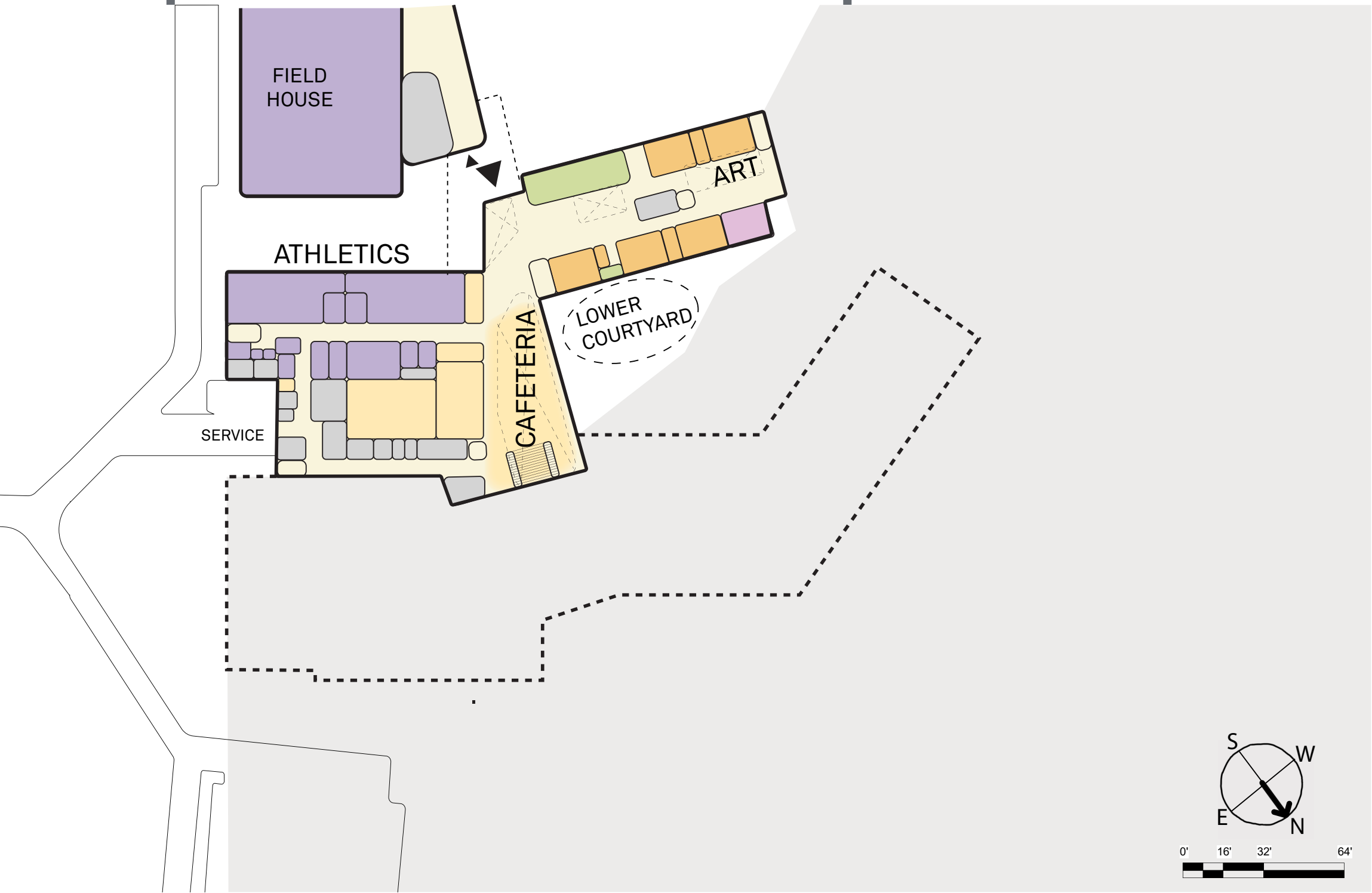


# Option 2A - Site plan

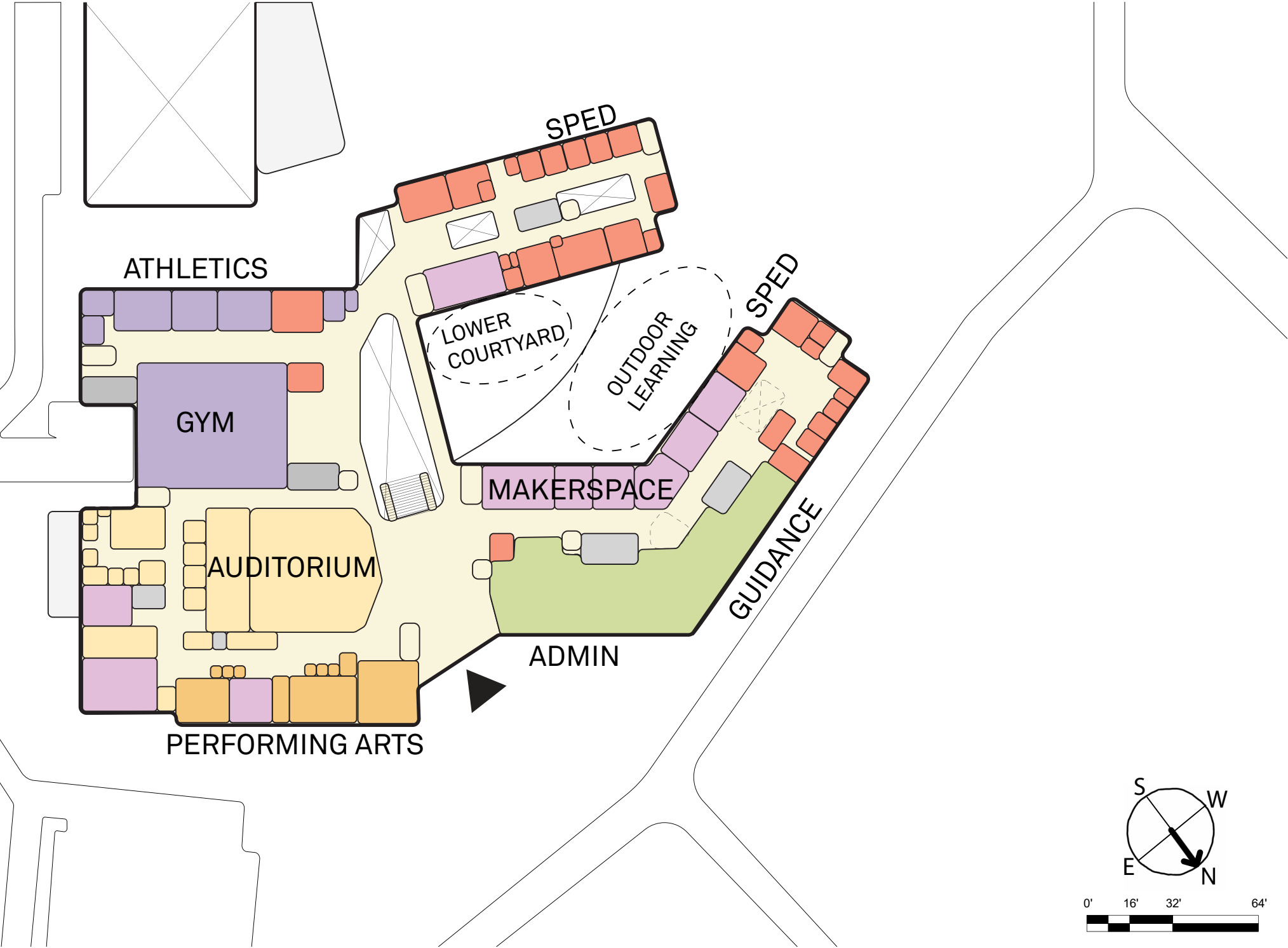




# Option 2A - First floor plan

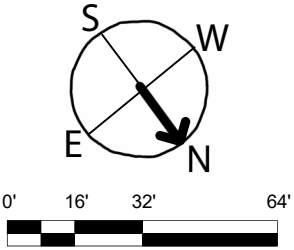
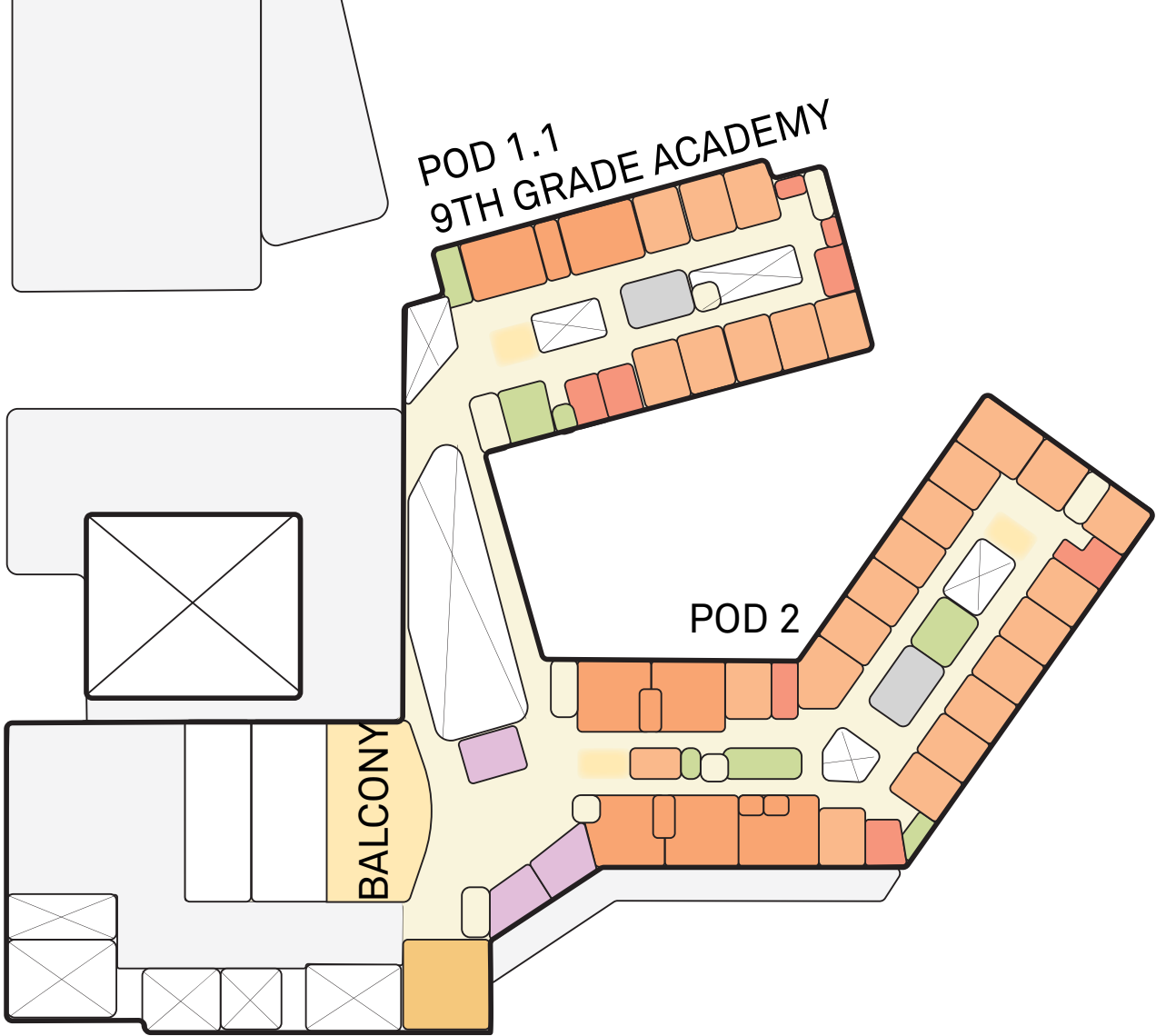


# Option 2A - Second floor plan

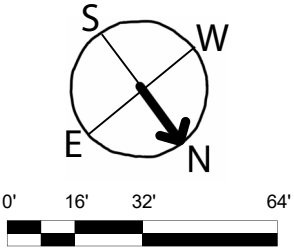
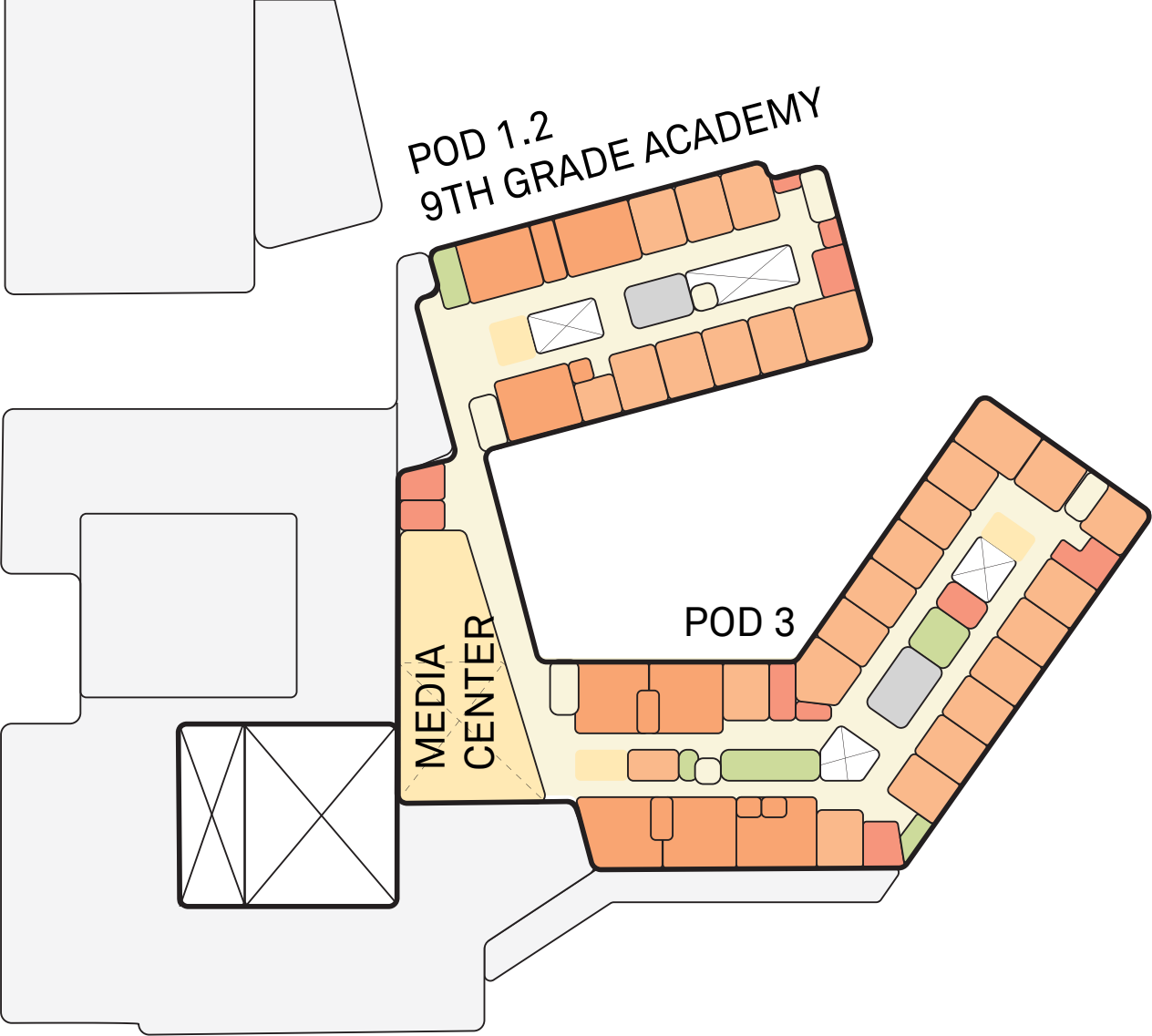




# Option 2A - Third floor plan

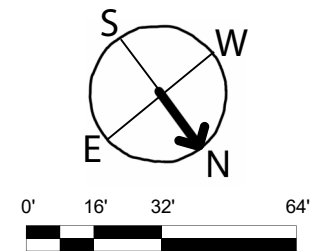
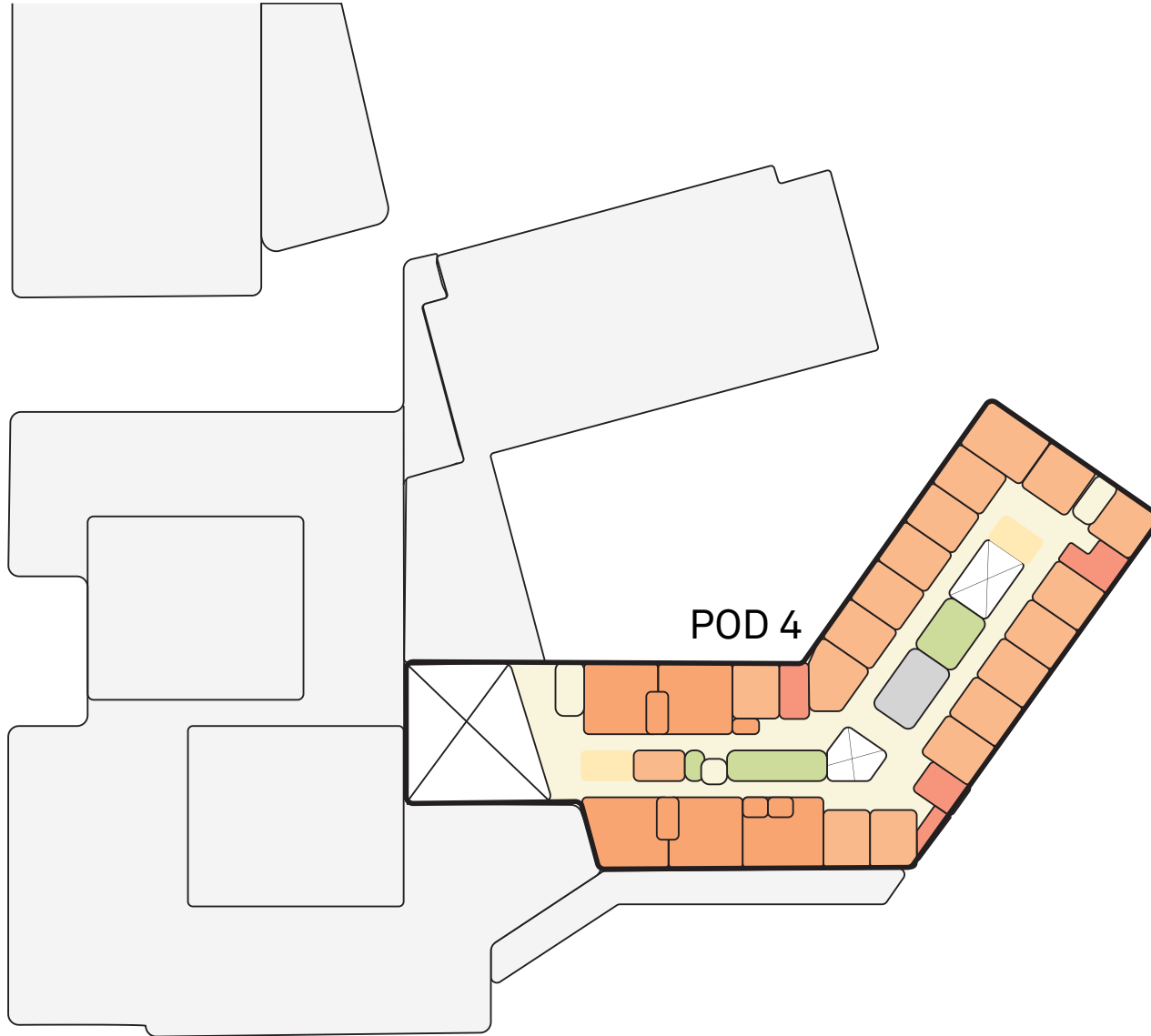


# Option 2A - Fourth floor plan





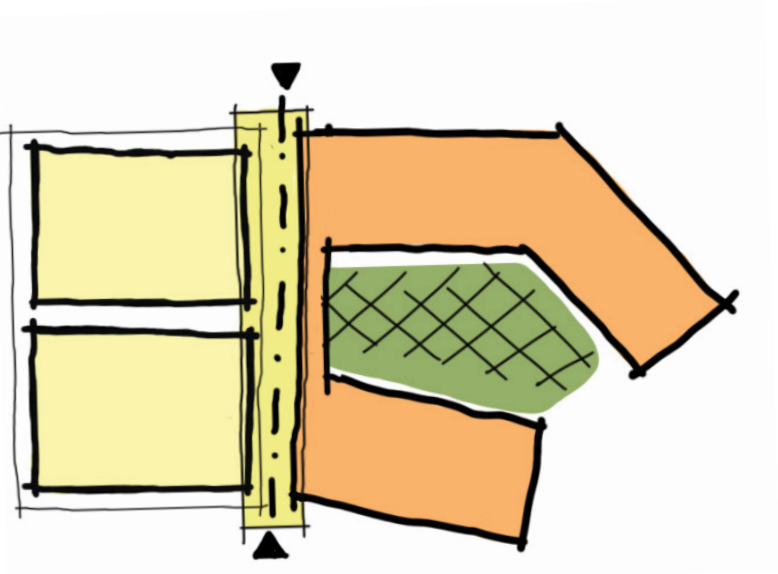
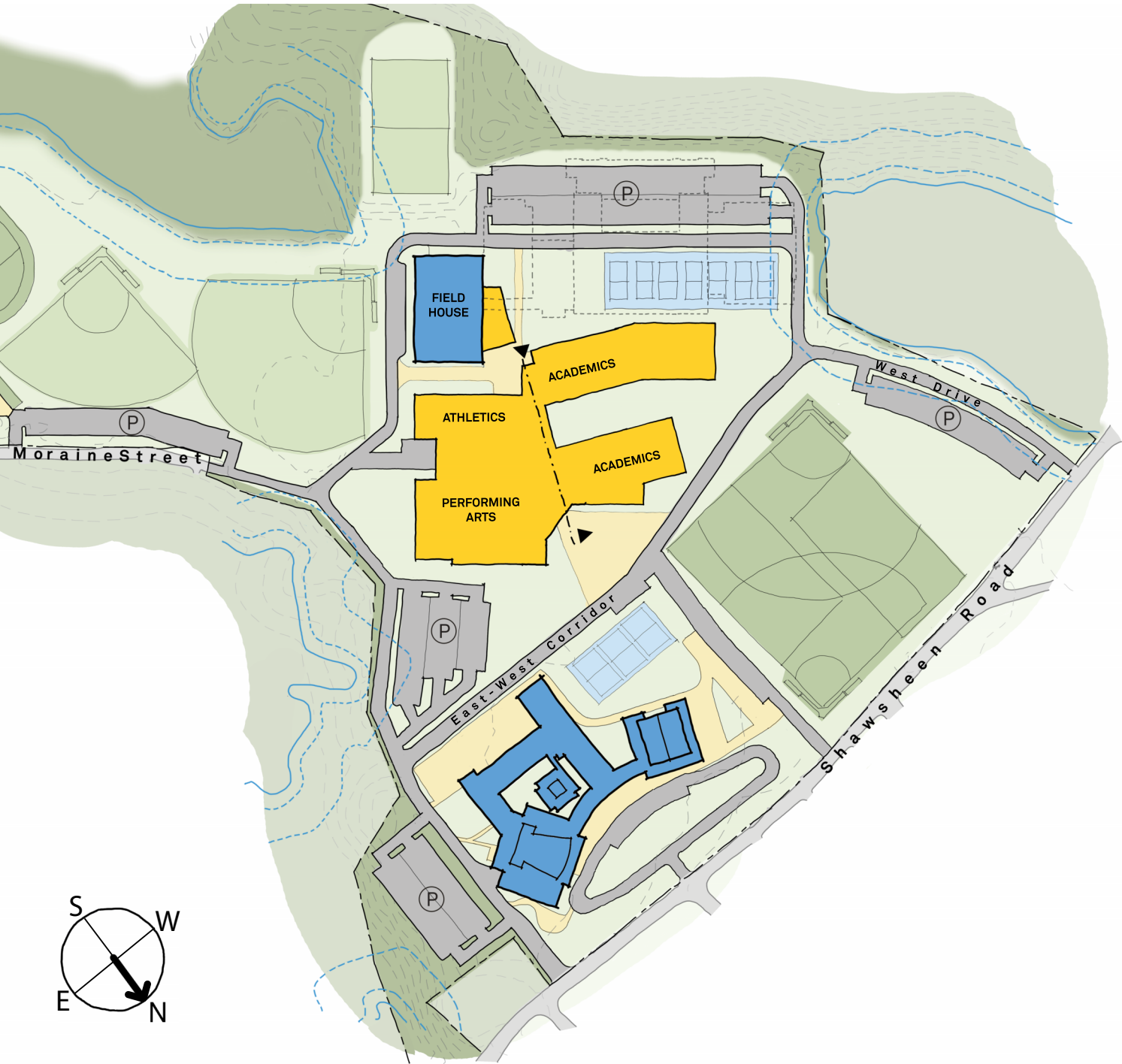
# Option 2A - Fifth floor plan



# Option 2A - Axonometric view



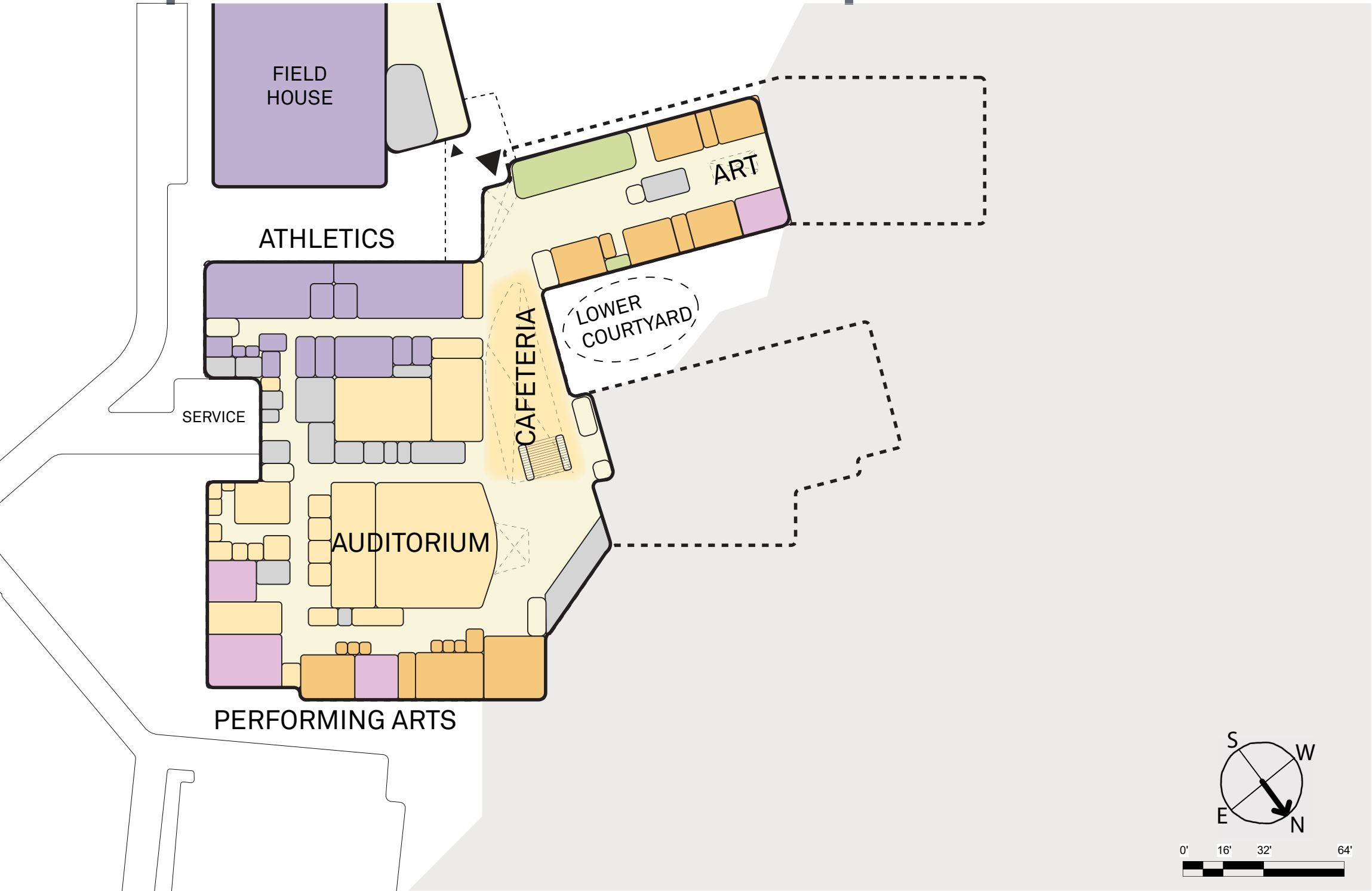
# Option 2B - Site plan



Parti Diagram



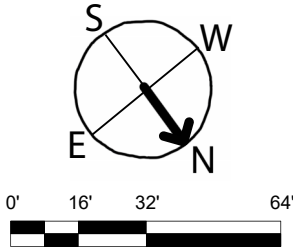
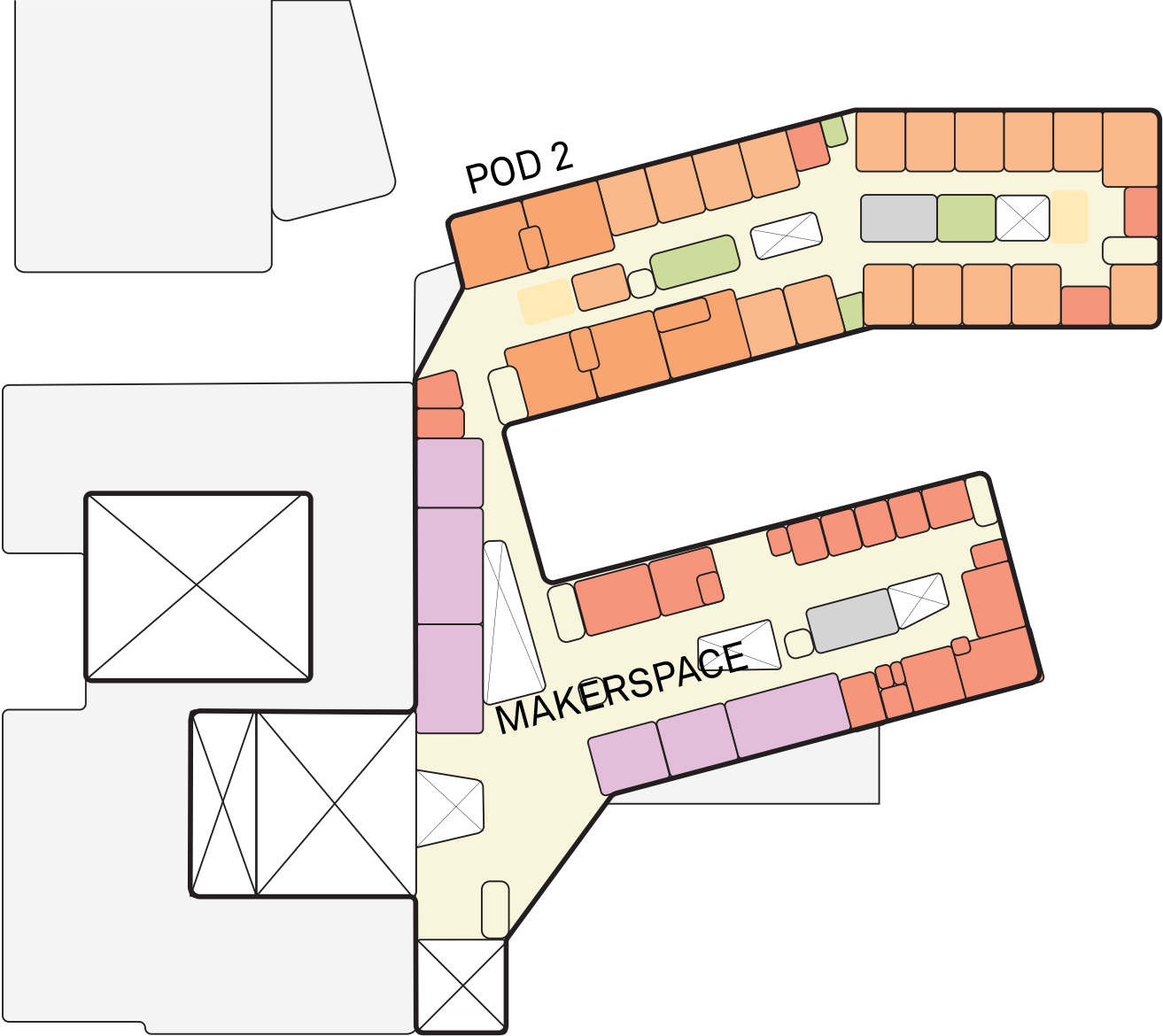
# Option 2B - First floor plan



# Option 2B - Second floor plans

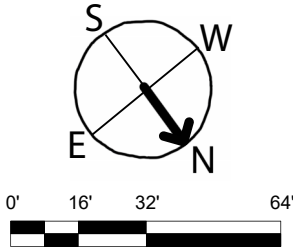
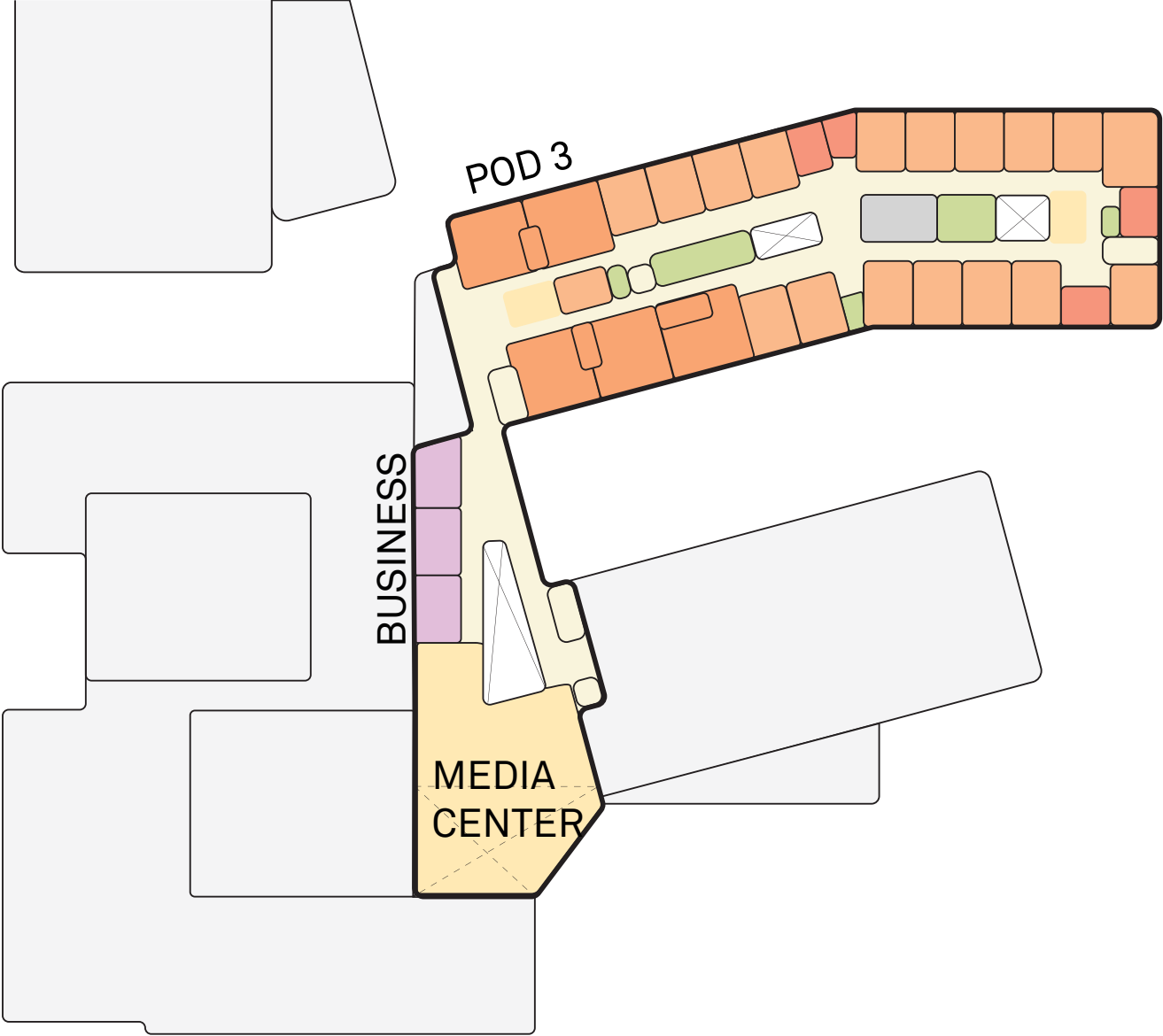


# Option 2B - Third floor plans

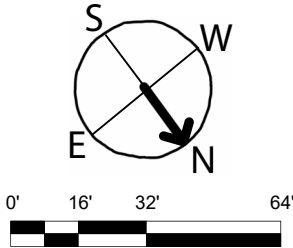
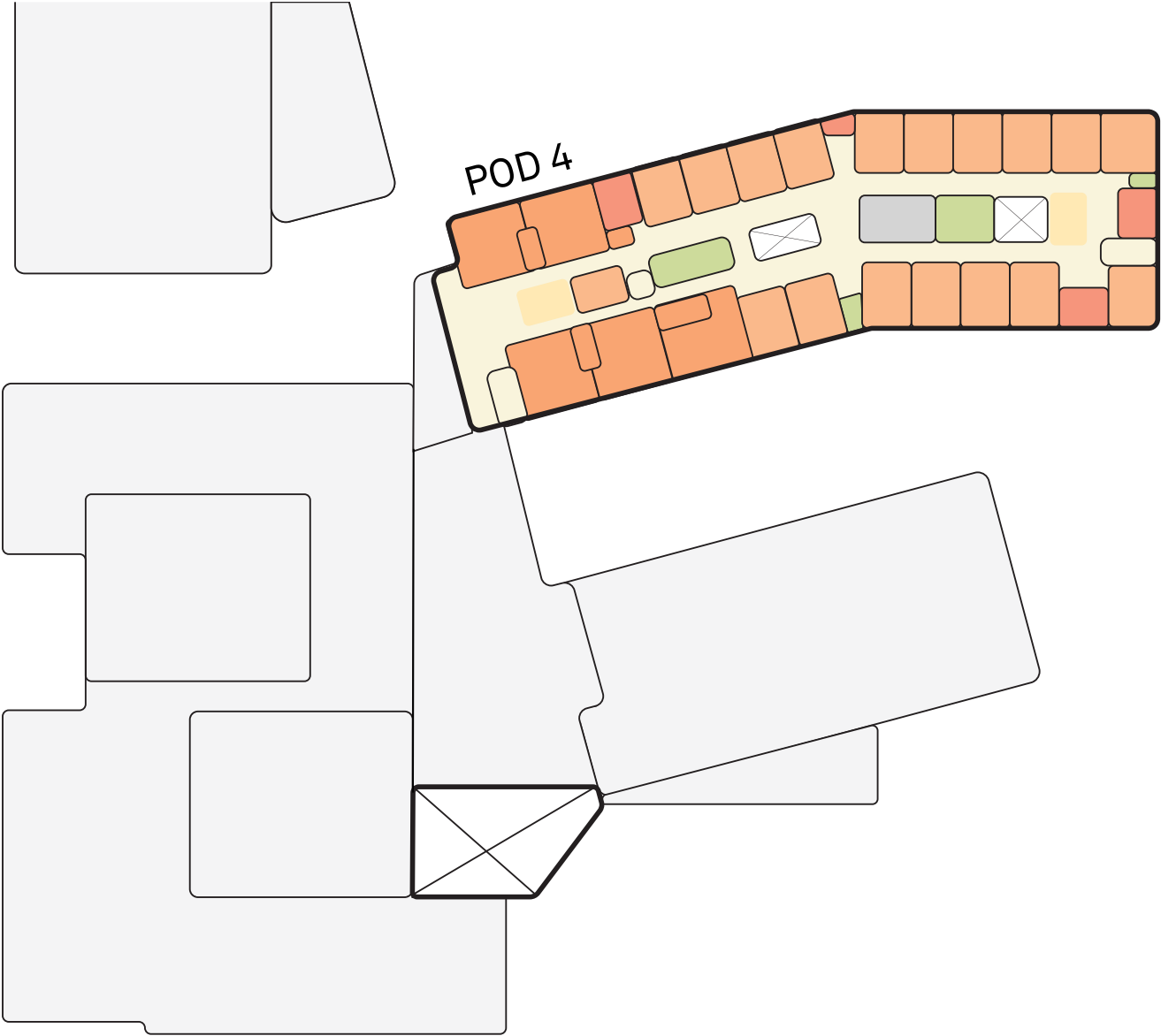




# Option 2B - Fourth floor plans



# Option 2B - Fifth floor plans



# Option 2B - Axonometric view





# Option 2A & B - Model photos



Option 2 A



Option 2 B



# Saugus High School - Tour

## Exterior materials





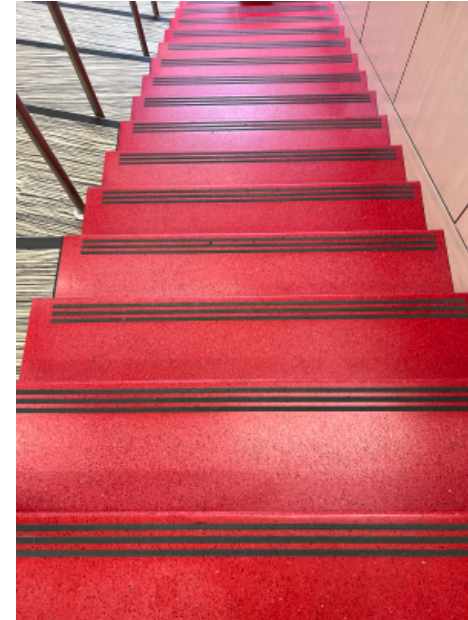
# Saugus High School - Tour

## Interior materials

### Polished concrete



### Terrazzo



### Timber structure



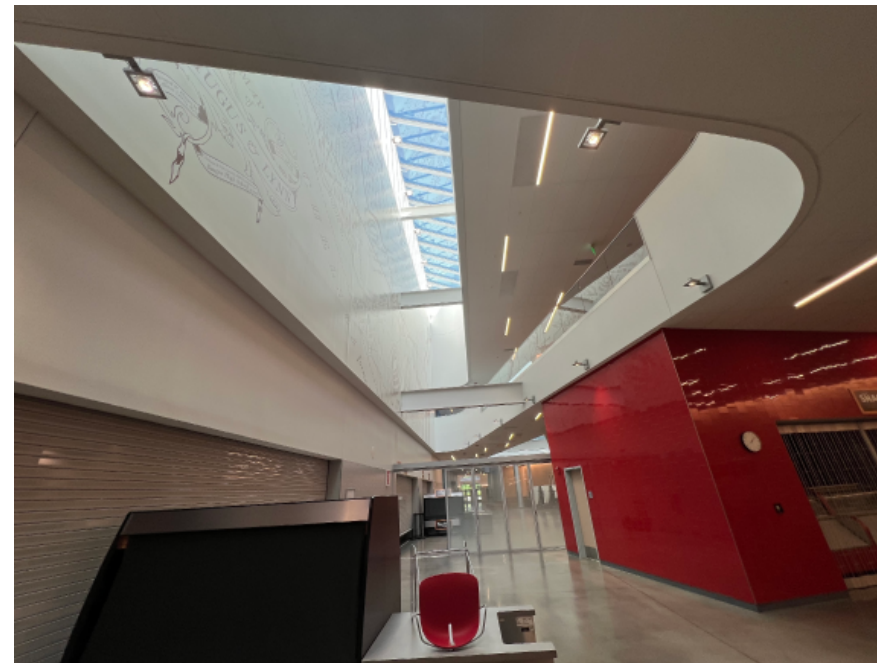


# Saugus High School - Tour

Green roof/Outdoor classroom



Lightwells



# Budget summary

Dated: 08.24.2023

Total Project Budget	MSBA Cost Code	FS & SD Phase 1 Budget (Thru Sept. '23)	Billed to Date	% Complete (Phase 1)	SD Phase 2 Budget (Oct. '23 - March '24)	Total
Feasibility Study (FS) / Schematic Design (SD)						
OPM Feasibility Study / Schematic Design	0001-0000	\$ 399,889	\$ 319,120	79.8%	\$ 125,111	\$ 525,000
A&E Feasibility Study / Schematic Design	0002-0000	\$ 2,012,500	\$ 1,470,833	73.1%	\$ 902,500	\$ 2,915,000
Env. & Site	0003-0000	\$ 243,195	\$ 119,856	49.3%	\$ 57,980	\$ 301,175
Other	0004-0000	\$ 18,511	\$ 5,162	27.9%	\$ 64,825	\$ 83,336
Owner Contingency	0005-0000	\$ 64,325	\$ -	0.0%	\$ 149,584	\$ 213,909
TOTALS		\$ 2,738,420	\$ 1,914,972	69.9%	\$ 1,300,000	\$ 4,038,420

Matches Total Available Funds

Targeting Special  
Town Meeting in  
September 2023 for  
Approval of SD  
Phase 2 Funds

# How people can get involved

**COME TO A COMMITTEE MEETING**

**Web site:** [andoverhighbuildingproject.org](http://andoverhighbuildingproject.org)

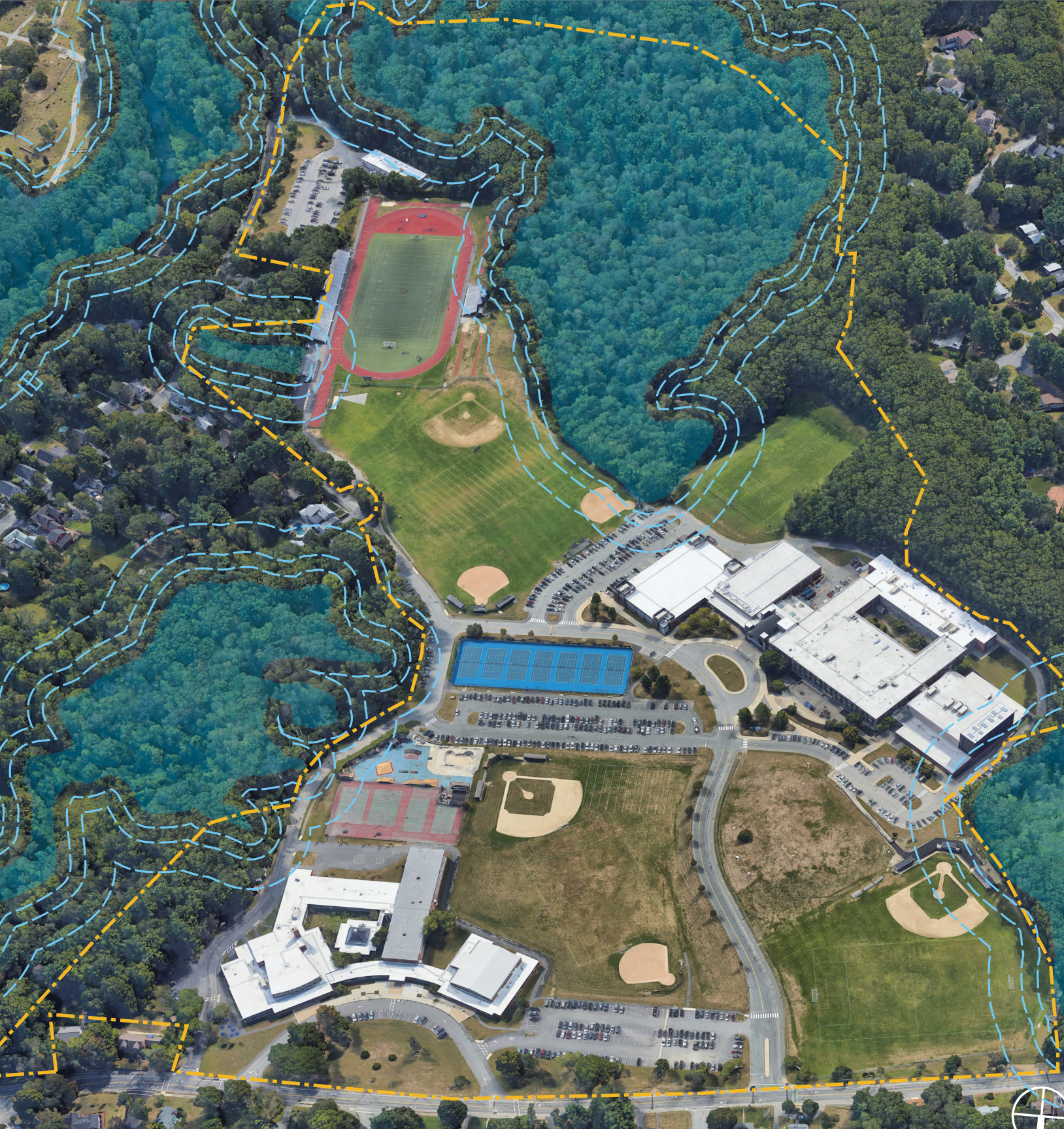
**Email:** [andoverhighbuildingproject@andoverma.us](mailto:andoverhighbuildingproject@andoverma.us)

**Facebook:** [www.facebook.com/AndoverHighBuildingProject](http://www.facebook.com/AndoverHighBuildingProject)

**Watch past meetings at:**

[www.andovertv.org/andover-high-school-building-committee](http://www.andovertv.org/andover-high-school-building-committee)





THANK YOU



HM  
FH

HMFH ARCHITECTS