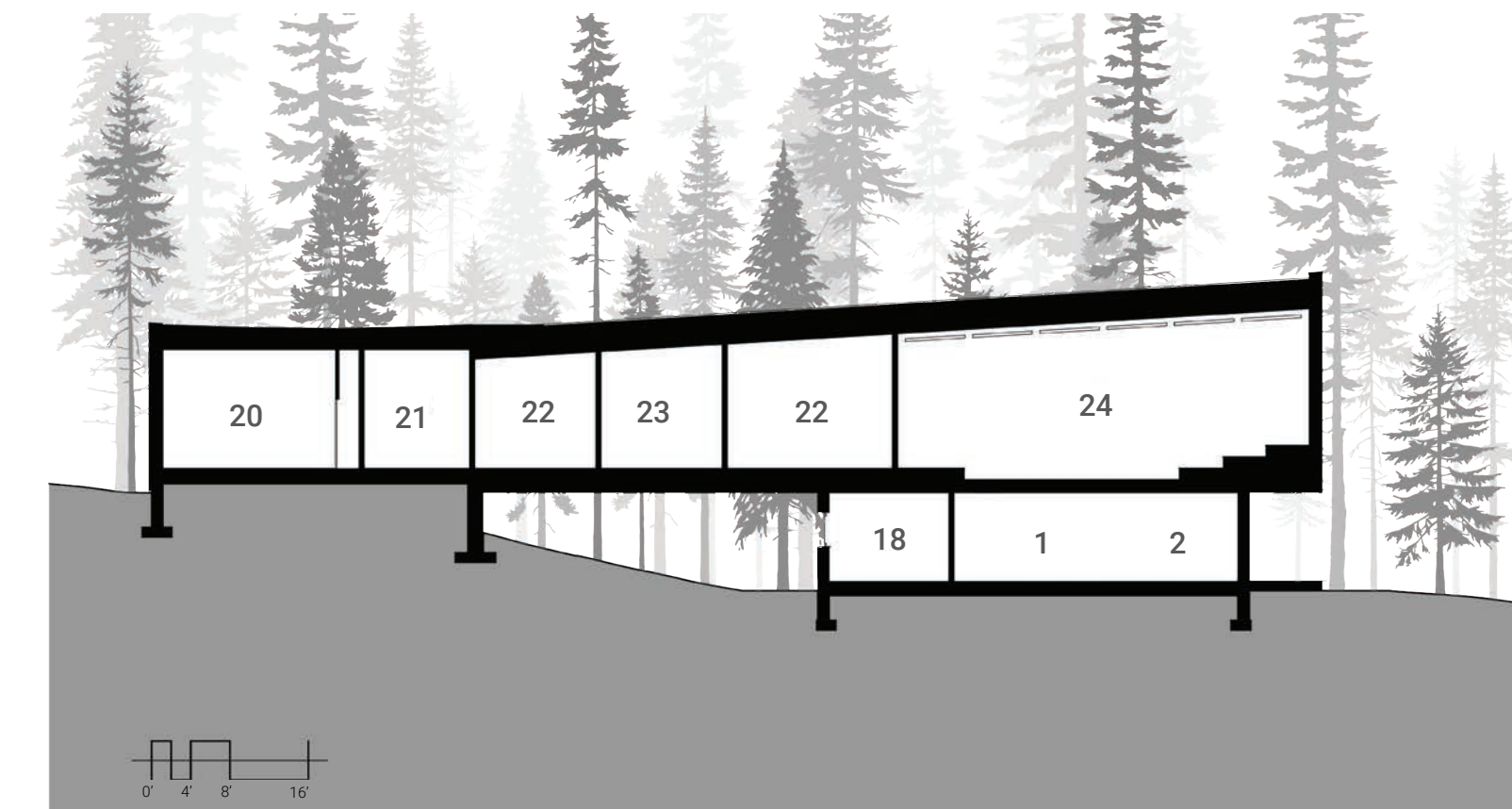
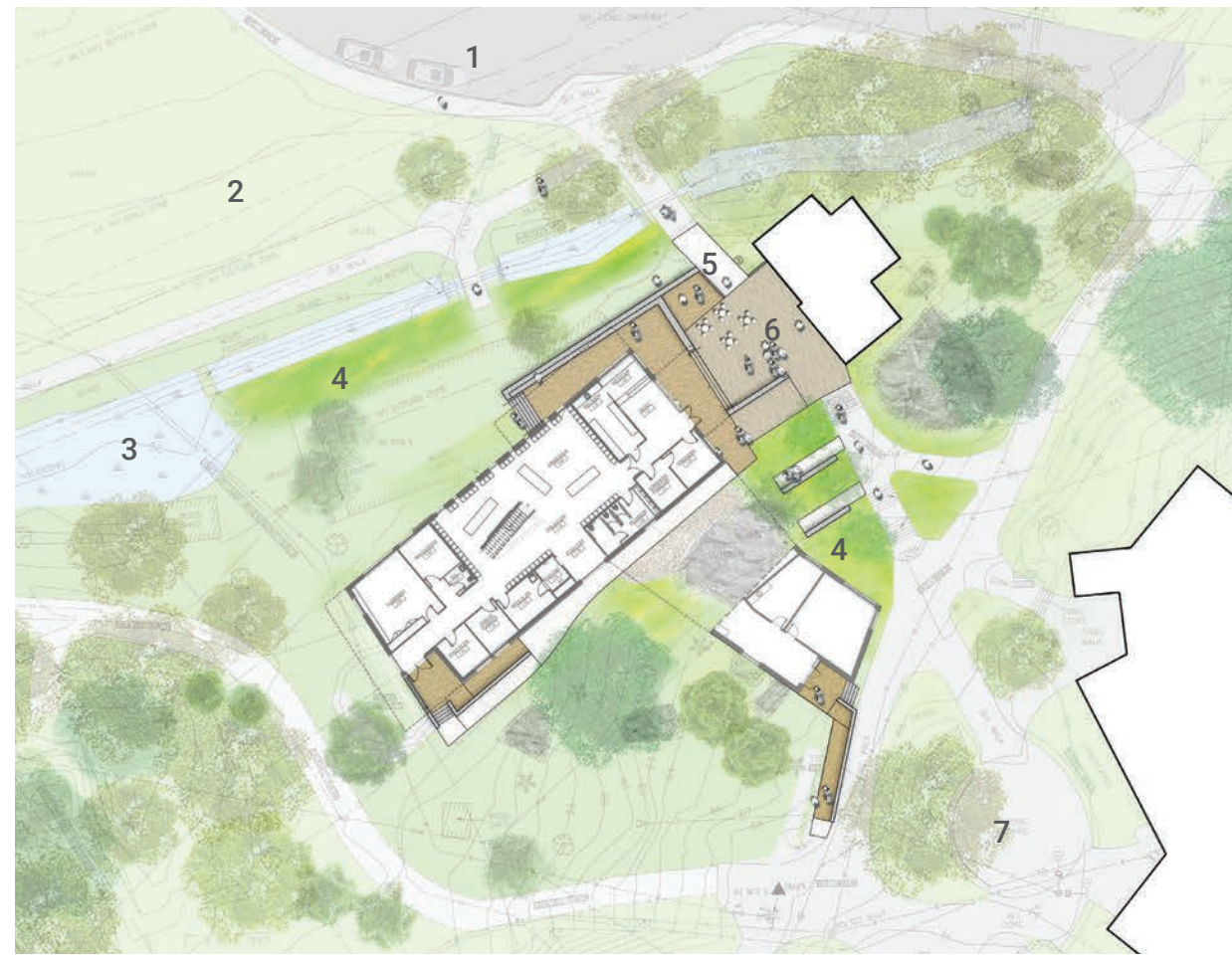


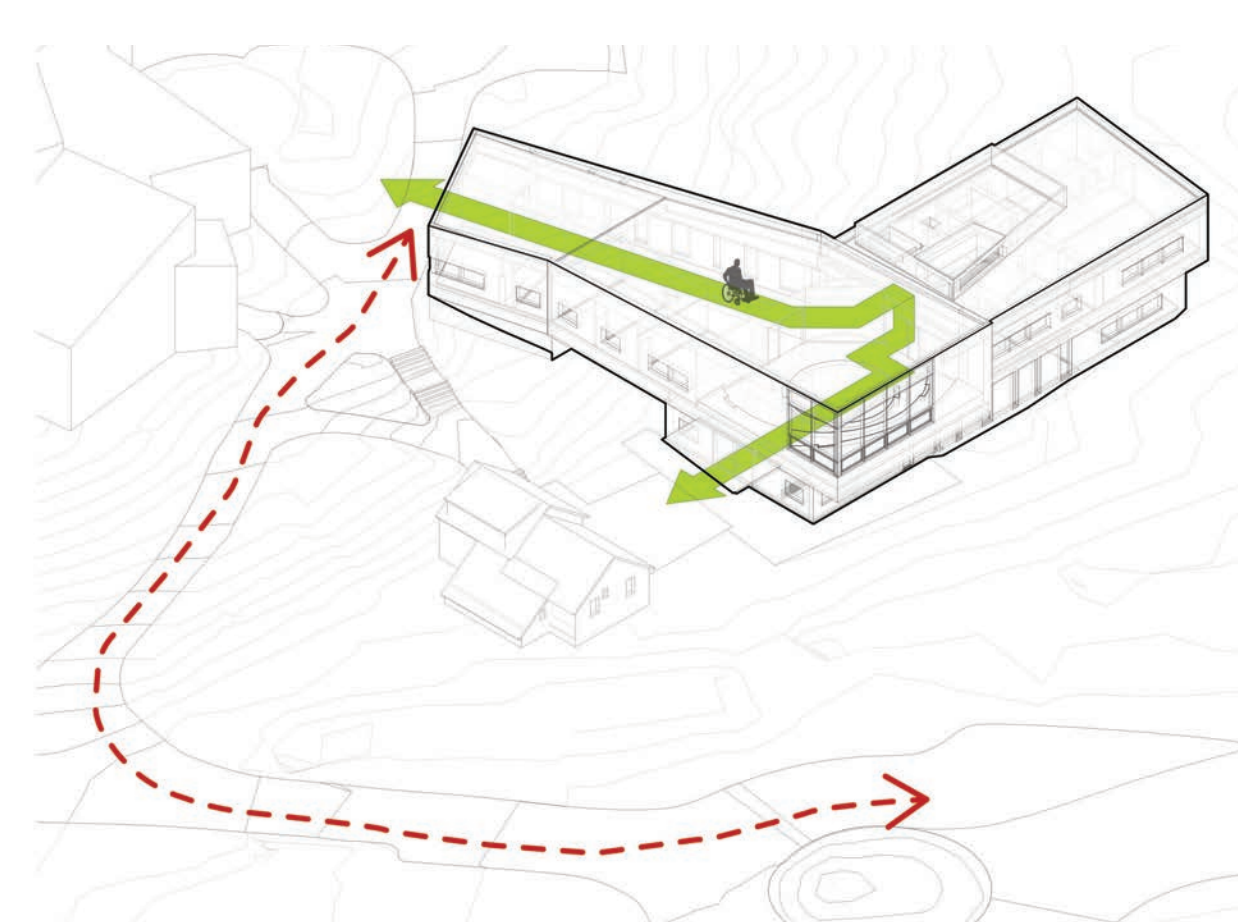
- 1 TRIPLE GLAZED WOOD CURTAIN WALL
- 2 AIR/VAPOR BARRIER
- 3 PINE WOOD BOARD SIDING
- 4 TRIPLE-GLAZED WOOD WINDOWS
- 5 STUCCO SIDING
- 6 PERMEABLE PAVER SYSTEM
- 7 SYNTHETIC RUBBER-BASED ROOFING MEMBRANE
- 8 DENSE PACK CELLULOSE INSULATION
- 9 ACOUSTICAL HUNG CEILING AND LIGHTING / EQUIPMENT RACK
- 10 CORK FLOORING
- 11 CONCRETE FLOOR FINISH
- 12 UNDERSLAB VAPOR BARRIER
- 13 RIGID EPS BOARD INSULATION



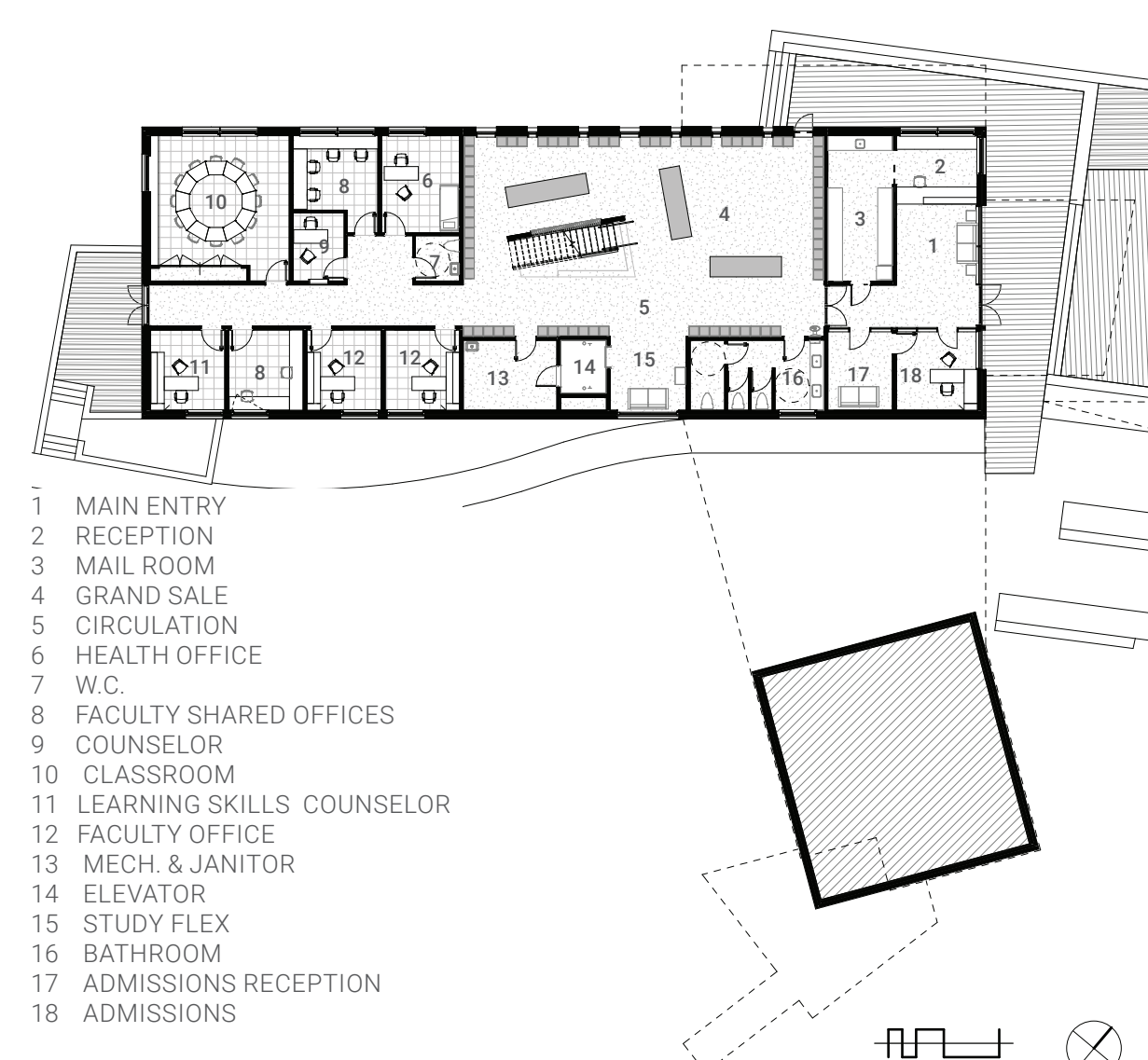
- 20 CLASSROOM
- 21 FACULTY COMMONS
- 22 FACULTY OFFICE
- 23 CONFERENCE
- 24 ALL SCHOOL MEETING
- 18 ADMISSIONS
- 1 MAIN ENTRY
- 2 RECEPTION



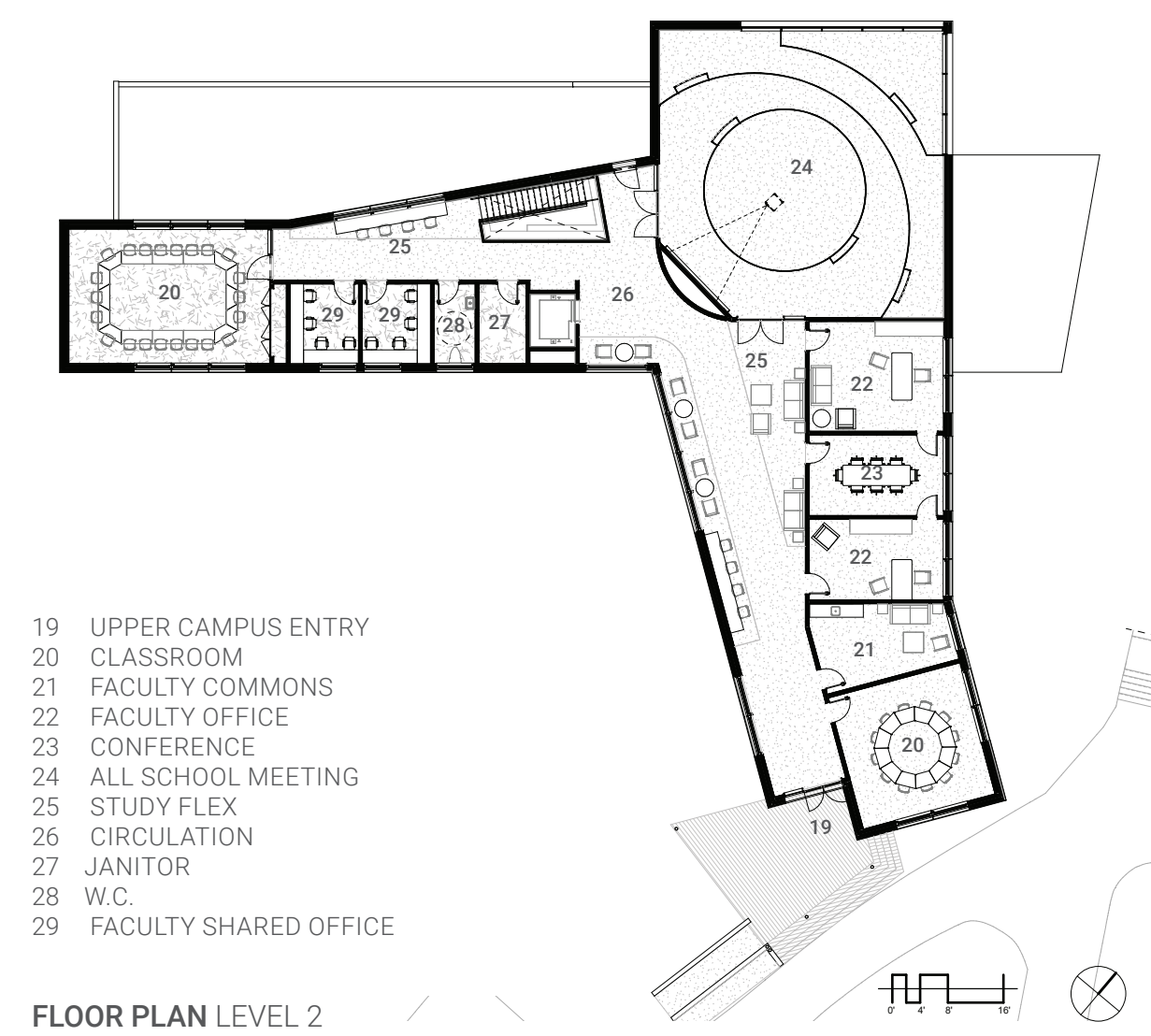
- 1 ACCESS ROAD
- 2 LOWER CAMPUS
- 3 INTERMITTENT STREAM
- 4 NATIVE PLANTING
- 5 ACCESSIBILITY RAMP
- 6 ENTRY COURT
- 7 UPPER CAMPUS



- - - ORIGINAL PATH - LIMITED ACCESSIBILITY, REQUIRING VEHICULAR USE OF ROAD
- NEW PATH - INCREASED ACCESSIBILITY WITH USE OF ELEVATOR & BUILDING



FLOOR PLAN LEVEL 1



FLOOR PLAN LEVEL 2



## THE BRIDGE

This new 13,000 square foot academic building represents a watershed in the history of Waring School, a private liberal arts middle and high school in Beverly, MA. Serving as a new campus entry point for the school's faculty and 150 students, the building houses classrooms, informal spaces for independent study and small-group sessions, and an auditorium designed around the All-School Meeting, a daily touchstone at Waring since the school's founding in 1972.

Meeting the Passive House standard of energy efficiency and indoor air quality, the design also addresses longstanding site-circulation and environmental challenges on the campus. The building replaces a repurposed residential structure that was plagued by periodic flooding. Sited above the flood plain, and spanning a 12-foot vertical slope, the new building provides a fully accessible path—as well as a visual and programmatic bridge—between the school's lower and upper campuses.

“The Bridge” is a product of a collaborative community design process. The entire community, students, faculty, staff, and the board of trustees, were directly involved in the design process. The result is a formal solution that prioritizes both the programmatic desires of the school community with a keen awareness and need arising from the community for inclusive, universally accessible design. The form of the building is used to provide an accessible route through the building and to the upper campus of the institution, deploying the architecture of a single building to provide equity for an entire campus, while providing adventurous, exterior spaces.

While modern in form and detailing, the design reflects contextual themes in its exterior materials: stucco, and vertical wood boards, which blend with the wooded site. The building's massing stacks two single-story bars, with the upper level rotated 90 degrees to create a truly unique building form - directly responding to the site and program needs. The All-School Meeting space occupies the “hinge” where the two bars overlap. The school maintains a standing meeting with the entire student body, staff, and faculty everyday. This event had grown out of its original space in another building on campus, and further, to celebrate this unique program, the client intended for this space to be visible from the street. These parameters required the most populous room on the entire campus, to not only be elevated enough to be visible several hundred feet from the road, but also house the entire community, hopefully in a prominent location within the building along the universally accessible route.

The design team settled on a solution that not only offered clear and visible location along The Bridge accessible internal circulation, but reorients the room to allow large, floor to ceiling curtain walls as a backdrop for presentation and facing the street. When lit, the room glows, displaying prominently its public nature, and the three tiers of comfortable seats offer large areas of accessible seating, along with a more intimate “conversation pit”, more suitable for younger students and smaller groups. This recess in the floor (to maintain accessibility for the middle tier) required a complex structural solution, resolved by cantilevering the space out toward the street, becoming a beacon for the new building, and the school and communities identity.

With a constrictive site, it was clear siting the building in an area of pre-existing development would be a requirement. The overlay of the stormwater management criteria on a site prone to flooding with constrictive setbacks for land conservation was also challenging. The design minimizes the building footprint, while maximizing the roof size used to store water and release it slowly into the surrounding site subgrade through filtering media. All paved patio surfaces are impervious, and used to absorb stormwater onsite, and the building is raised to eliminate flood potential. Lastly, the bridge portion of the design is threaded through old-growth pines, preserving them with a tight limit-of-work.

The client brought to the project a commitment to Passive House Certification. While the final certificate is currently pending construction phase review, the project has passed the Design Phase of Passive House Certification, and full certification is expected this year. The project is on track to be the first Certified Passive House K-12 school in Massachusetts. In meeting Passive House requirements, the project achieves an aggressive 93.5% reduction from benchmark EUI for projects of this type, with a net site EUI of 4.9 kBTU/SF/yr.