

Dearborn STEM Early College Academy

A new school in the heart of Roxbury will be among the first purpose-built STEM schools in the nation



▲ The interior of the 'world window' provides for small-scale learning

The new Dearborn 6-12 STEM/Early College Academy for Boston in the neighborhood of Roxbury manifests the mission of STEM education in its proposal for a new kind of educational building type – a school without corridors which fosters inter-relatedness and transparency. It also represents a major leap towards the realization of a new and improved future for the residents of Roxbury and the City at large.

Features

- Collaborative learning spaces interspersed through school
- Innovative Learning Commons atrium and cohort commons balconies
- Glazed Exploratory pavilions at each level make learning visible
- Expositional technology demonstrates building science through exposed structure, mechanicals and sustainability
- LEED Silver
- Extensive daylighting reduces operating costs while enhancing learning
- Highly visible teacher preparation/mentoring offices promote supervision and display activity
- Building massing and materials sensitive to neighborhood context

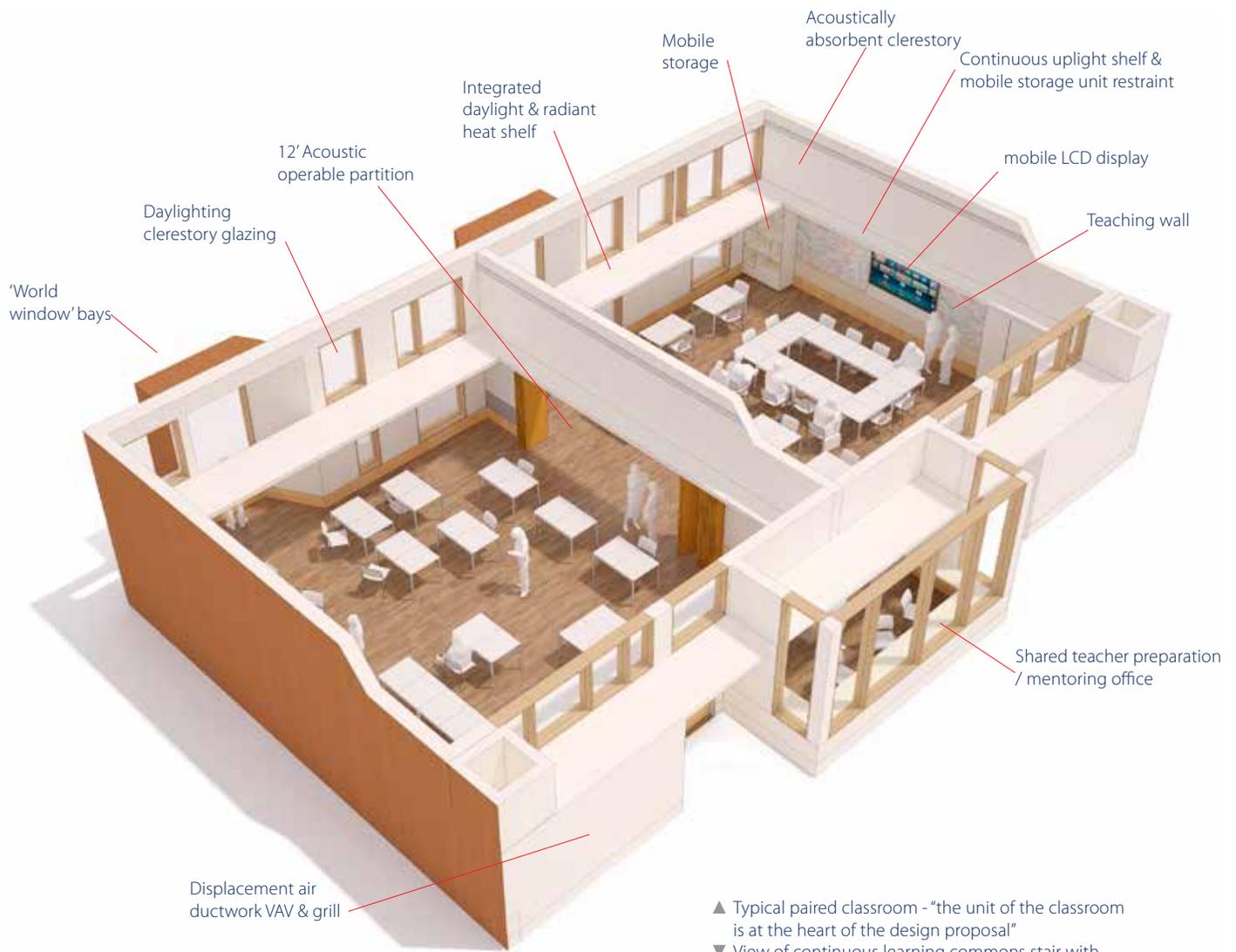




▲ Winthrop Street Entry view

▼ A cross section through the center of the building:
Diverse learning spaces are woven together in a
hub of visible learning activity.





Program

The new Dearborn anticipates through design the means of promoting a specific set of educational qualities set out in the STEM educational vision. These qualities or 'Learning Space Principles' are woven through the fabric of the educational environment. Including spaces for:

- Small Scale Learning
- Collaborative Learning
- Collaborative Teaching
- Visible Learning
- Flexible Learning
- Community Engagement
- Outdoor Learning
- Visible Technology

These qualities, taken together with the pedagogic approaches they interactively support, will form a new kind of middle/high school experience which emphasizes the pre-eminence of spontaneous interaction, mutual inspiration and student centered initiative over mono-directional instruction. A kind of 'learning' rather than 'teaching' based education which will characterize the hybrid virtual/physical learning communities of the future and of which the designs for the new Dearborn are a prudent harbinger and model.

The building is broken down into three educational communities or 'cohorts'. Each of which is sited on a different level and is centered on a satellite office suite with dean's office, staff preparation and reception area. Classrooms with moveable acoustic walls are paired for teacher collaboration and arranged interactively around the central learning commons atrium.

JLA Role
Lead Design Architect/Architect
of Record

Personnel Jonathan Levi FAIA,
Project Designer/Principal-in-
Charge; Philip Gray AIA, Project
Manager

Client City of Boston

Location Boston, MA

Size 128,000 gsf

Construction Cost \$58M

Completion Sept 2017



SECOND FLOOR PLAN/AXON