2022 Exhibition of School Planning and Architecture Northeast Region

Northeast Community Propel Academy | School District of Philadelphia

Philadelphia, PA

## School District of Philadelphia: Northeast Community Propel Academy



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Proposed New Design Features appear in orange circles

Paths to Second Drop-Off For Middle School Parents Separate Drop-off Loops For School Buses & Parents

Relocated Baseball Field For High School Sports

**Re-purposed Service Lane** For New K-8 Approach

**Refurbished Playing Fields** For Community Use

Relocated Softball Field For High School Sports



#### An Urban School in Nature

**Community Environment:** 

#### **The Condition** Density. Compression.

For many children in urban communities, their lived experiences reside within vast, rigid expanses of gridded streets and zero lotline structures. Learning offers little relief in industrial-era, one-size-fits-all, teachercentric school designs.

Invited to design a new K-8 School for a rapidly growing demographic, we recognized a rare opportunity to engage nature, both physically and as metaphor, and thus reinforce the idea of school as a moment of relief, a place for exploration, imagination, and socialization ... a Special Place.



#### A Community of Needs

#### **Community Environment:** The Ryan Avenue Campus

The School District of Philadelphia's Ryan Avenue Campus is a very busy place.

The population within the city's Northeast Community is exploding. The individual school facilities are far beyond their capacities, and the campus serves as the only space for community recreation.

#### EVERYONE IS A STAKEHOLDER.

We engaged in an extensive and robust community design process that resolved the apparent deadlock and found a place for the needed K-8 school.

#### THE DEBATE:

**Community Access Fields** A significant point of debate

**The Anticipated School Site** Hence, ... THE DEBATE.

And in doing so,... discovered a unique opportunity to model the learning environment through a "natural" metaphor. THE SOLUTION: Our Proposed Site For the New K-8 A rare bit of nature Pennypack Park

A Pair of ill-kept ball fields HS baseball and softball

A Middle School To be demolished.

An awkward 70's-era concrete bunker that resembles a set of gun turrets far too closely.

A High School Abraham Lincoln HS

A School District Stadium In desperate need of repair.

A Community Center & Pool Active. Dilapidated. Beloved.

## Nature as Metaphor for Learning

#### Learning Environment:

Remote and forgotten, a treelined pocket was engaged as antidote for the rigid anonymity of the city grid and of traditional instruction, and as metaphor for a more individualized and engaged learning experience.

The examples of "trails, clearings and branches" guided the organization of the school's principal spaces, common areas, and shared/dedicated learning environments. Grade-level learning neighborhoods became the extended branches of trails. Each gradelevel specific learning community was provided with shared collaborative areas that were themed, and scaled, to mimic the "den, nest, and hive" and were oriented directly against the adjacent park's tree-line, framed within broad floor-to-ceiling glass spanning the full width of these shared, grade-level collaboration areas.



#### 1 INSPIRED | Adjacent park offered a metaphor



#### and antidote for the dense, urban experience, that



#### **2 SCALED** | ordered all spaces within the school



**3 SOCIAL** | and scaled the learning environments.



## Nature as Metaphor for Learning

#### Learning Environment:

Recognizing that children learn, <u>collaborate</u> and socialize differently as age levels progress, we adopted a set of themed concepts to develop distinct learning environments at each grade-level community.

"Dens" were designed for the intimate needs, engagements and interactions of the youngest learners – allowing teachers and aides opportunities to establish one-on-one connections and more individualized attention.

"Nests" of various sizes and types were designed for grades 1 - 5, allowing a variety of focused and small-group activity.

"Hive" describes the more highly energized and socialized activity of the multi-story Middle School (Grades 6 – 8) Media Commons.





ES Grade-Level

Specific Collaboration







Teacher & students in a directed reading lesson.

Teacher & student havin
a "re-set" conversation.

Students climbing, in active play.

# MS Media Commons



## Nature as Metaphor & Inspiration

#### **Physical Environment:**

#### Transparency

A core theme that extends the learning space, invites wonder and curiosity, promotes connection and community.

#### Learning is Always on Display

The hovering 'storefronts' of the two CTE's spaces invite curiosity and promote the innovation and creativity within. Garage doors provide additional flexibility expanding CTE spaces to incorporate adjacent computing labs for a variety of multi-platform project activities.

#### **Framing Views**

Within the building and beyond extends awareness, suggests freedom, and provides an antidote to the prevailing sense of containment that defines life in this densely inhabited portion of the city.







## Nature as Metaphor & Inspiration

#### **Physical Environment:**

The adopted metaphor would have contributed little to the physical environment had the school not been designed to directly engage the adjacent park's tree-line, opening each individual classroom wing directly to wooded views, and allowing the expanse of nature to penetrate through the balance of the interior.

Opening directly onto the expansive views of the trees, the close proximity to nature and views created a sense of being in the tree canopy, of being someplace else, someplace special.

This also provided an appropriate degree of discretion and protection for the school's interior, while affording the opportunity to admit these east-west exposures without concern for glare. The classrooms were all oriented to northern and southern exposures to optimize available natural daylight.







CLEARING: ES Media

#### A Turn-key Solution to School Delivery Challenges

#### **Planning Process:**

Designed to relieve chronic, pronounced overcrowding across five neighboring schools, the turnkey, design-build procurement strategy's speed-tocompletion, 21 months from design award to opening, and the cost assurance provided were critical to meeting the community's urgent needs, while securing the District's risk.

Community engagement and input played a significant role in the siting and design of the new facility as well as in adjustment of the project's scope to address a long-standing community need for additional recreational sports fields. Numerous, open public meetings reviewed options for location of the proposed school employing interactive surveys to record inputs. These were collated with results from sets of online presentations and surveys available through the School District's website.



#### **1 TYPICAL** | PA Multi-prime Bidding Procurement



#### 2 TURN-KEY | Design-Build with GMP (\$)



**3 RESULTS** | Deliver Fixed Budget and 40% Faster

#### The Dedicated "Big Room"

#### **Planning Process:**

Co-location in a Stantec-Philadelphia conference room with ample drawing pin-up and large screen technology enabled robust debate and optimized the ability to achieve more nuanced design consensus.

This collaborative team environment included the School District, the Stantec design team, the Developer-Builder, and all their principal sub-contractors and lasted throughout the design and documentation period. The discussions, though at times intense, brought all parties into a shared consensus and afforded the District a measure of comfort and control not usually associated with Design-Build or P-3 arrangements.





#### Delivering Next Generation Learning

#### **Revolutions in Learning:**

The new Northeast Community Propel Academy marks a transformational moment for the School District of Philadelphia and fully realizes the rich potential for exciting new pedagogies.

Limited by an aged portfolio of early 20<sup>th</sup> century school buildings featuring a teachercentric, one-size-fits all, industrialized vision of education, the District struggled to implement new methodologies within the rigid cell structure of its buildings.

The environments within this new school serve as a transformative catalysts for the District's unique "NextGen" learning model, emphasizing tailored and highly socialized learning environments. Direct visibility from the classrooms encourages use of flexible collaborative work areas supported by media and technology.





Framing Views Within the building and beyond extends awareness, suggests freedom, and provides an antidote to the prevailing sense of containment.



#### Delivering Next Generation Learning

#### **Revolutions in Learning:**

The larger, common and shared areas, emphasize and reinforce 'community' by providing everyone a view of "what's going on inside?" despite age or grade level.

These framed views into specialty learning environments promotes a sense of access and inclusion, inviting curiosity about other learning while proudly placing diverse and innovative learning on display.

The vertically striped walls of the two-story gallery run the length of the school's central spine and serves as a continuous pin-up wall for student work.

#### **Taking Flight**

Flocks of colorful origami 'birds' soar above each of the shared areas, inspiring students to soar, while contributing a measure of acoustic control.





## Floor plan



*NOTE: In the interest of student safety, our office elects not to publish detailed floor plans of school facilities.* 

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### Exhibition of School Planning and Architecture Project Data

Submitting Firm :	Stantec Architecture and Engineering, LLC
Project Role	Architect
Project Contact	Luis Vildostegui, AIA
Title	Senior Principal, Education
Address	1500 Spring Garden, Suite 1100
City, State or Province, Country	Philadelphia, Pennsylvania 19130
Phone	215 665 7100

Joint Partner Firm:	N/A
Project Role	
Project Contact	
Title	
Address	
City, State or Province, Country	
Phone	

Planner on Record:	N/A
Name	
Address	
City, State or Province, Country	
Phone	
Email	

Construction Firm:	
Project Role	Gilbane Building Company
Project Contact	Susan Tully
Title	Senior Project Manager
Address	100 Penn Square East, Suite 140
City, State or Province, Country	Philadelphia, Pennsylvania 19107
Phone	267 256 2466

### Exhibition of School Planning and Architecture Project Details

Project Name	Northeast Community Propel Academy		
City	Philadelphia		
State	Pennsylvania		
District Name	School District of Philadelphia		
Supt/President	Dr. William R. Hite		
Occupancy Date	June 2021		
Grades Housed	Kindergarten – Grade 8		
Capacity(Students)	1,660		
Site Size (acres)	95		
Gross Area (sq. ft.)	180,000 SF		
Per Occupant(pupil)			
gross/net please indicate			
Design and Build?	No		
lf yes, Total Cost:			
Includes:			
Project Costs	Project Costs		
lf no,			
Site Development:			
Building Construction:			
Fixed Equipment:			
Other:			
Turnkey Design with Design–Build GMP (explained on slide 10)			
Total:	\$80,000,000		



Dappled Light at Story-telling Area Mimicking the forest's overhead canopy is intended to signal a "Special Place."

#### Middle School Portal

#### **Color-Coded Portals**

Identify the entry to each learning neighborhood, and work consistently with exterior canopies, fire stair, and other building elements to provide way-finding.







objects provide the two distinct play yards and forecourt with "clues" for creative play and for the morning queuing of students.





Nestled within a treelined pocket

The School District of Philadelphia's new Northeast Community Propel Academy provides its K-8 students a rare and unique sanctuary from the rigid and relentless density of the urban setting.

A "School in Nature" is a special place, ... as perhaps all schools should be.



### Thank you.