

Concord Middle School Building Committee
Meeting Minutes
July 15, 2021

PRESENT: Dawn Guarriello, Laurie Hunter, Court Booth, Pat Nelson, Matt Root, Charles Parker, Frank Cannon, Jared Stanton, Chris Popov, Jon Harris, Peter Fischelis, Matt Johnson, Russ Hughes, Justin Cameron, Stephen Crane, Heather Bout

PRESENT FROM HILL INTERNATIONAL: Peter Martini, Ian Parks, Duclinh Hoang

PRESENT FROM SMMA/EWING COLE: Kristen Olsen, Philip Poinelli, Matt Rice, William Smarzewski, Keith Fallon, Saul Jabbawy, Anthony Jimenez, Andrew Oldeman, Martine Dion, Marissa Ramirez

MEETING ORGANIZER: Dawn Guarriello

Call to Order

Pat Nelson called the meeting to order at 7:30 A.M. via Zoom Virtual Conference call. A recording of the meeting will be made available at the Concord Public School's project page and Town of Concord's website.

Approval of Minutes

Frank Cannon made a motion to approve the June 24, 2021 meeting minutes. Seconded by Court Booth. No further discussion. Motion carried unanimously with Dawn Guarriello abstaining.

Correspondence

Heather Bout reported to the committee that there were 4 correspondences regarding Concord's Long Range Plan that addressed Town goals and questions about budget, general project timeline, and sustainability.

Co-chair, Dawn Guarriello, reported to the committee that there was a listening session with David Bearg, Building Scientist and Concord Resident, on indoor air quality and a few emails from committee members who had follow up comments on the design features. There was a request from a committee member to go over cash flow. Also, Co-Chair, Pat Nelson, Charlie Parker, Chris Popov, Russ Hughes, Aaron Joncas (Athletic Director), Matt Rice and Ian Parks met at the Sanborn school gym to discuss right sizing the gym on July 13, 2021 and a summary memo from SMMA was distributed to the committee on July 14, 2021 by email.

Schematic Design (SD)

Keith Fallon and Saul Jabbawy, with Ewing Cole, provided an update to the committee on the floor plans and massing of the building. Mr. Fallon noted on-going refinements for operable partitions, locations of SPED classrooms, and team commons. Mr. Jabbawy noted the building solar orientation is North – South. Mr. Jabbawy discussed the possibility of having the classroom building section (east) closer to the parking lot and the "public" portion of the school (west), which includes the gym and auditorium, may infringe on the flat plateau area needed for the fields.

William Smarzewsk, Ewing Cole, provided an update on the floor plans noting the biggest changes have been the mechanical spaces, teacher work rooms and specialist offices. Mr. Smarzewski presented what a typical classroom would look like and will continue working on daylighting, reducing glare and mitigating solar heat gain.

Mr. Jabbar discussed the massing concept of the building. He noted using small breaks in the surface of the building, fenestration and configuration of the building. Also the introduction of color or finer texture. The design team presented different cornice and base options to introduce different design elements on the exterior facade. Ms. Bout noted a more natural look for the façade is preferred to match the landscape. Ms. Guarriello commented on the light distribution in the classrooms noting adding window transoms allowing for more light deeper into the room from above.

Mr. Smarzewsk provided an update on the team commons spaces showing flexibility of classrooms with the use of folding glass partitions and folding solid partitions and strategies for use of the team commons with different elements. Folding partitions will continued to be studied by the design team to balance use and cost.

Andy Oldeman, Mechanical Engineer with SMMA, presented the mechanical systems for the building. The design will comply with MA-EZ and International Mechanical Codes and use demand control ventilation for classrooms and other spaces. The current heating and air conditioning design considers electrically powered heat pumps, no gas-fired equipment, and heating for freeze protection during loss of normal power. The heating/cooling system options planned for Life Cycle Cost Analysis are: 1) Air Source VRF, 2) Ground Source VRF and 3) Ground Source hot water and chilled water heat pump and fan coils. Ground source options have a construction cost premium. For the ventilation system, the current design is to use a dedicated outdoor air system (DOAS).

Marissa Ramirez, Plumbing and Fire Protection Engineer with SMMA, presented on the plumbing and fire protection systems for the building. The water service will include a domestic booster pump. The water heaters will be electric and the plumbing fixtures will be low flow. The fire service would be a double check valve assembly.

Anthony Jimenez, Electrical Engineer with SMMA, presented on the electrical system for the building including the service and distribution. The building will need a new pad-mounted transformer. The design goals will have the metering tie into the BMS system and record consumption and demand. The building will have a life safety generator. Lighting will be controlled individually. The project is considering readiness for photovoltaic (PV) canopies in the parking lot and having as much PV on the roofs as allowable. The fire alarm system will be coordinated with Concord Fire Department.

Martine Dion, Director of Sustainability with SMMA, presented on the sustainability overview of the building. Ms. Dion noted the early Schematic Design energy analysis showing an EUI of 28 and is an on-going process. The current design for electrical vehicle charging is for 10% of parking spaces to have EV supply equipment and 60% ready for EV which will impact the site EUI. SMMA will be doing an embodied carbon analysis.

Discussion ensued:

- Chris Popov asked if variances are needed for building, electrical, plumbing or fire codes. Mr. Jimenez noted the generator may need approval from the AHJ and town. Ms. Olsen mentioned the design team is reviewing if a building height variance is needed.
- Charles Parker asked if displacement ventilation is being considered for larger spaces and if any consideration for air to water instead of VRF. Mr. Oldeman noted air to water is not as efficient compared to VRF. The design team will review the option of displacement ventilation.
- Matt Johnson noted the number of electric charging station seems excessive. Ms. Dion noted the design team will review the charging station requirements.
- Pat Nelson reminded the team to review wired and wireless options. Ms. Olsen noted it will be discussed at a future technology meeting.

Ian Parks, with Hill, presented to the committee on the cash flow showing the estimated costs and actual expenditures to date. The actual expenditure to date is \$763,722.

Next Steps

Next meeting will be Thursday, July 29, 2021

New Business

No new business.

Public Comment

Dean Banfield, 73 Walden Terrace, noted that the committee is responsible for looking at opportunities to save money and he requested that his topic be added to the agenda.

Charles Parker noted the goal of reaching \$100M should be added to the presentation.

Adjournment

Co-Chair Dawn Guarriello requested the meeting be adjourned at 9:30 AM. Frank Cannon made the motion to adjourn, Chris Popov seconded the motion. The motion carried unanimously.

Details of this meeting can be found on the Zoom link below:

https://concordps.zoom.us/rec/share/NbhtAs815Y-1VyvFsL30VbztSFaA_iE6h_b9OLc-vPPzpaJp6MFWunX4VhUP4un.34ZcWKL2f0ET-qPG