FIELD OBSERVATION REPORT

Lincoln Trail Elementary School, Hardin County Schools, Elizabethtown, KY 201752 -CA8

Date: 4/24/2020 Time: 10:30 AM ET

Weather: 60/overcast

Observed by: Joseph Jones Report No: 21

Est. Completion: 49%

Present on Site:

Masons, Carpenters, HVAC Installers, Plumbers, Electricians

1. Work in Progress

a. Masons were laying block in the kitchen, removing scaffolding at the elevator shaft and preparing scaffolding at the south wall of the Cafeteria.
b. Carpenters were installing exterior blocking at the windows on the north wall of Area B.
c. HVAC Installers were installing ductwork in the truss space over Area C.
d. Plumbers were installing piping in block walls in the kitchen.
e. Electricians were installing conduits in Area B.

2. General Observations

a) The weather was mild but overcast skies made interior spaces in the building relatively dark. The site and building were relatively wet after rain storm on Thursday. Rain and storms were expected over the weekend with drier weather next week.

Several trades were on site on what normally would be a day off due to the rainout yesterday.

When I contacted Gerald by phone on Monday, he reported that he will be on site four days a week now. He also said that the plan is to relocate the crane to set the steel over Area B and then roof trusses after that. HVAC units will be set in Area C. The large unit in the Area A upper mechanical room will be set so the roof structure can be placed of the area. Metal stud framers and mechanical/electrical trades will be working on the second floor of Area C.

Work Gerald and I discussed during our call after my last visit was mostly complete on this visit. The most visible new work was the placement of roof underlayment and rigid insulation over Area C. This protects most of Area C from direct rain. That being said, parts of the first floor were fairly wet from driving rain entering at the open entrances and migrating back into the first floor rooms. The second floor was relatively dry. I did notice that most of the bottoms of the concrete planks were dry. All the moisture that has entered the building has taken a toll. Ferrous metals that are not completely primed are starting to rust. All the corroded ferrous metals need to be cleaned and repainted per

the scope of work for the trade contractors. Another result of the rainy weather is mud appearing on structural steel and the roof trusses as a result of the material being stored on the muddy site. With the building quickly becoming enclosed, the mud needs to be washed off the steel as soon as possible.

Wood blocking is mostly in place at the tops of block walls for low roof areas at Area B. This must be in place before the roof system can be installed. The fiber cement panel system above the low roof areas also need to be installed ahead of the roofing work to avoid damage to the roofing system.

The roof joist and associated deck was installed over the Kitchen and Loading Dock.

The masons have almost completed the interior block walls in Area B. They were installing the interior block walls in the Kitchen. They were removing scaffolding at the elevator shaft which is topped out. They had brick staged along the south wall of Area C. The steel lintels and sill angles are in place. Three courses of brick below grade and the base flashing can be laid. The brick cannot be laid above grade until the exterior block walls are spray with foam insulation.

The mechanical/electrical and fire protection trades continue to install rough-ins. Water piping has been installed in the first floor and insulated. Some of the insulation have been covered with plastic to avoid water damage and some has not. If the insulation gets wet and damaged, it will have to be replaced.

Carpenters were installing wood blocking at the north wall of Area B at the second floor

b) The installation of the roofing system over Area C has begun. Zack Hadden, Garland Roofing's representative, was on site while the work was being done. The lower membrane and most of the rigid installation and the top membrane were installed before the rainy weather stopped work. Standing seam metal roofing will be installed over that. Zack issued a field report concerning his observations and expressed no concerns. Normally, the installation of the roof system is the signal that a project is about 50% complete. Once the light metal trusses and deck are installed over Area B and roof joist and deck installed over the Cafeteria and the Gym, the roofer will be able to move from Area C then to Area B and on to Area A. Of course, their work will depend on the weather.

c) When work was stopped on the installation of the roofing system, a seal was made at the edges so the rigid insulation would not get wet. The lower side of the top membrane was carried over the edge of the wood edge blocking and nailed in place. The lowest layer of membrane is showing past the insulation.

d) When I arrived on site, the lower portion of the south wall for the Cafeteria had been laid. Through this opening the highest point on the building was visible. This is the structure that houses the upper mechanical room.

e) As I was leaving, the mason had moved the Hydra-lift scaffolding system into place to lay the rest of the south wall of the Cafeteria.

f) The masons were laying block in the Kitchen while working with the plumber to install piping in the walls.

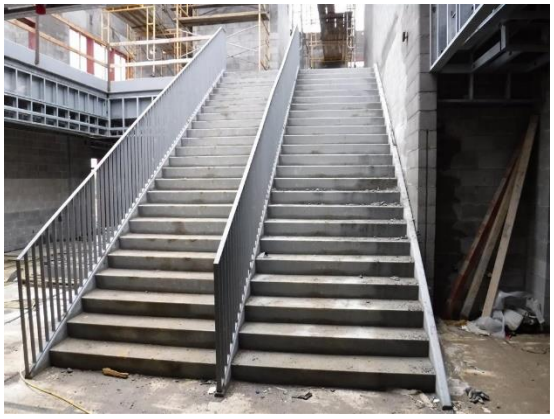

g) Roof deck and joist are in place over the Kitchen and the Loading Dock. When the weather is dry, Gerald plans to have the roof systems installed over these areas. Most of the interior blockwork is in place along the west side of the Kitchen.


h) Fortunately, the slab construction above the Mechanical Room kept this room with its moisture sensitive electrical equipment dry.

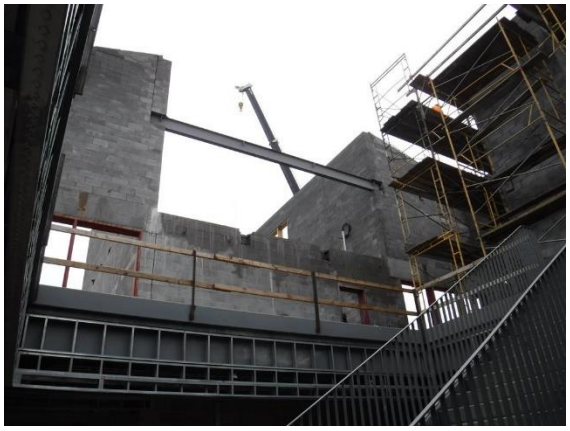
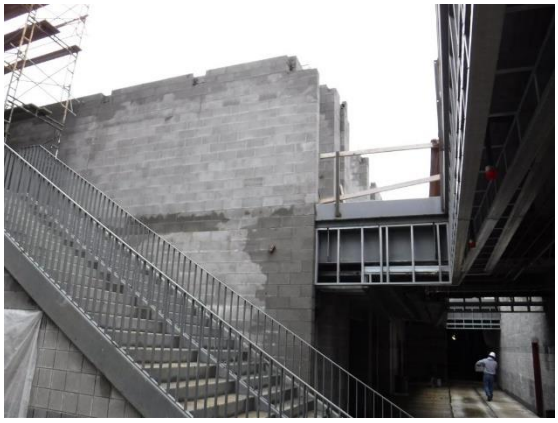

i) The canopy attachment plates mentioned in Icon's report had been installed on the beam across the main entrance to the building.


j) The slab in the administrative area was covered with water. It did not appear that the wood blocking mounted to the steel studs had been affected by the water since it migrated to the slab from the main entrance and floor opening.


k) The building is open to sky at the main lobby until the steel trusses and roof deck is installed over Area B. The elevator shaft has been laid up to the top. Metal floor decking and a concrete slab will be installed to seal the top of the shaft.



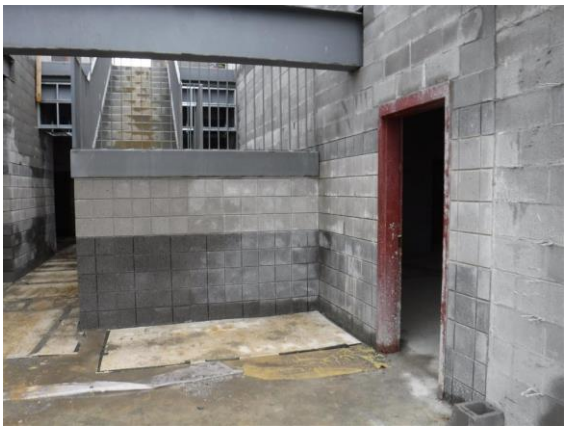

l) The sloped top block walls are visible through the floor opening in the main lobby. The walls will be capped with concrete beams. When this, the steel framing and the mechanical platform deck and slab are in place, the trusses and roof deck can be installed over the area.

m) The tops of the high walls around the Cafeteria and the Gym are in place. The upper mechanical room is clearly visible from the Gym. Mason helpers were cleaning the bottom of the gym wall where block was laid above.

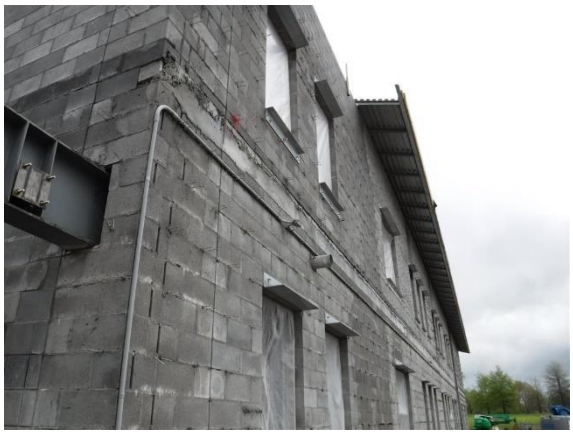

n) The Library/Media Center had quite a bit of standing water from the storm.


o) The mason had completed the realignment of the ground faced block at the entry to the Family Resource Room and covering the wall below Stair ST-B with ground faced soaps.

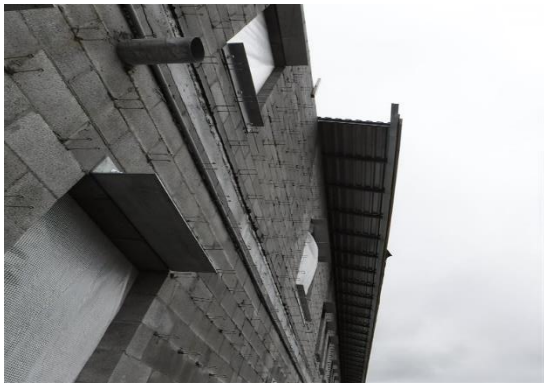


p) Brick was staged at the south wall of Area C. Three courses of brick will be laid. These brick will be below grade and the base flashing. Spray foam insulation will be applied to the exterior block walls above the flashing.

q) The galvanized lintels and sill angles had been installed on the south face of Area C. Refer to the SPIN report for comments on this.

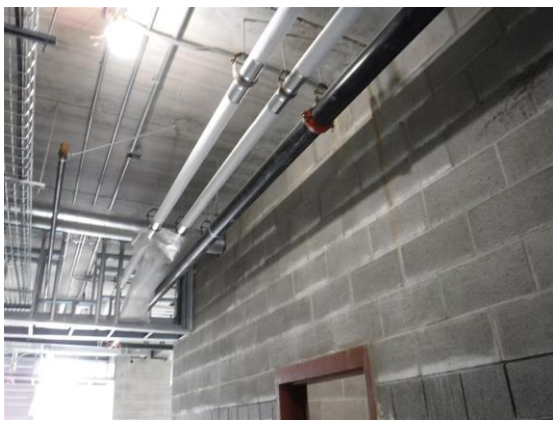


r) The foam insulation will cover all but the eyes on the brick ties. The brick will set on the lintels and a through wall flashing.



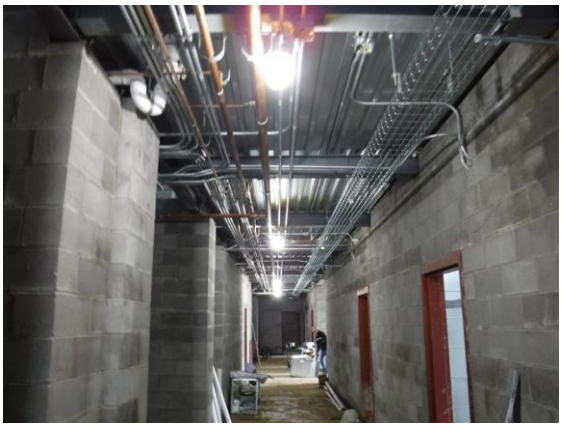
s) If the joints and false joints in the split faced block are not filled with mortar, a considerable amount of repair will need to be made to the damaged block. Most of this is the result of chipped corners.

t) Ductwork and piping are insulated on the first floor. Gerald told the contractors that they either need to cover this with plastic or be ready to replace any insulation damaged by moisture.



u) Some of the floor slabs on the second floor of Area C are dry and some had standing water. The water migrates to some areas due to the open end of the floor areas. This will continue until the building is totally dried in.

v) A significant amount of the mechanical/electrical rough-ins are in place over the second floor of Area C.



w) This is the truss base plate mentioned in the supplemental instruction from Icon. If the edges and corners are rounded, there will be sufficient clearance. The electrical box may need to be relocated since it will be the way of the handhold at the railing.

x) Ductwork was being run through the trusses over the second floor of Area C.


y) There is a significant amount of missing primer on the steel allowing rust to form. The rust must be removed and the primer repainted per the scope in the steel trade contract.


z) The steel framing needs to be cleaned. Mud is visible on some of the members. This must be done before any finish material would be affected by the cleaning process.

aa) The roof trusses need to be cleaned. Mud is visible in several places on the framing. This must be done before any finish material would be affected by the cleaning process.

bb) Interior block walls on the second floor of Area B are mostly complete. The mechanical platform will be placed at the tops of the walls after the steel is placed. Gerald said the Skudo protection system has been repaired in places where it is dislocated.

cc) Masons were completing the last of the interior walls on the second floor of Area B. They still need to build block chases around the vertical ductwork in the corners of the rooms.

dd) Electricians were installing conduits in the rooms on the second floor of Area B. The ductwork that will be in chases serving the first floor are in place. The chases will be constructed with block.

ee) Carpenters were installing pressure treated wood blocking at the window heads over the low roof areas. These areas will receive the fiber cement panels system.

ff) Pressure treated wood blocking has been installed on top the parapets at the low roof areas.

gg) From the mechanical platform, the tops of the classrooms walls in Area B are visible as are the gabled walls at the east side of Area A and the peak of the upper mechanical room wall. The mechanical platform will be installed on the tops of the classroom walls extending it to the upper mechanical room.

hh) The site lighting poles and fixtures are in place. They are protected by a concrete base. Care needs to be taken when moving construction equipment around the site so that these poles are not damaged.

ii) A welding trailer and lifts are located on the second floor. Gerald said that he stressed that care must be taken when moving these to avoid damage to wall, door frames and other materials in place.

3. Stored Material:

a. Electrical conduit and boxes and equipment.
b. Hollow metal doors.
c. Concrete block and materials.
d. Steel mesh and vapor barrier material for the Gym slab.
e. Steel roof joist and metal roof deck.
f. Light gauge steel roof trusses and roof decking.
g. Plumbing and mechanical rough in materials and equipment.
h. Sprinkler piping and fittings.

4. Follow up items:

a. Keep as-built locations for site utility work up to date.
b. Keep as-built locations of plumbing and electrical lines up to date.
c. Maintain site silt control measures.
d. Develop a plan to repair the ground face block.
e. Develop a plan to repair damage to the floor slabs to be polished.

Follow up by:

☐ Architect, ☐ Owner, ☐ MEP Engineer, ☐ Structural Engineer, ☐ Civil Engineer
☑ Contractor, ☐ Other

Respectfully submitted,
Joseph Jones, AIA
JRA Architects

Cc: 201752, CA8