

Building Dialogue

Seven Oaks

11/20/2006

Year Open: 1950 Additions: 1951, 1953,
1990

Square Footage: 66035 Acreage: 6

FACILITY MANAGEMENT SYSTEM

Date Dialogue**10/19/2006 Mechanical : Existing HVAC system**

Currently, the facility is not occupied. The building has been vacant for a couple of years, according to school district personnel. Therefore, the operational condition for all HVAC equipment is unknown. In addition, the roof was not accessible. The survey is solely based on visual inspection and judgement.

Two(2) Freeman steam boilers provide low pressure steam for heating throughout the facility. Steam coils are located in the fan room on ground level where three(3) fans (Gymnasium, Auditorium and House) circulate tempered OA throughout the entire building. Additional heat are provided through cast-iron radiators located around the perimeter of the building on each floor.

Air-conditioning does not seemed to be available at all for the facility.

10/19/2006 Mechanical : Recommendations for HVAC renovation

Two(2) 2400 MBH hot water boilers are proposed to provide heating throughout the building together with recirculating pumps and other associated accessories. Two additional pipes are proposed to be added to form a four-pipe circulation loop for heating and cooling. A 300-ton chilled-water system with chiller(s), condenser(s) and pumps is proposed to provide air-conditioning for the facility. AHUs with heating, cooling and OA ventilating capabilities are recommended to replace the existing fan units. Unit ventilators with heating only are also proposed to provide additional heat in classrooms and other areas of the building replacing the existing steam radiators. The existing relief vents on the roof shall be capped and sealed water-tight. Exhaust system shall be provided through all restroom areas. A gas-fired MAU shall be connected to the kitchen exhaust hood system. With the new HVAC system, a DDC control with WEB based Lonworks protocol is proposed to provide an efficient and economical operation.

10/19/2006 Mechanical : Cost estimate for HVAC improvements

The cost estimates are based on rules of thumb for the building size, age, condition and types of usage. Any requirements of asbestos removal are not included in the following estimation:

1. Install two(2) 2400 MBH hot water boilers with recirculation pumps - \$300,000
2. Install 300-ton chilled-water system with chillers, condensers, pumps and a four-pipe setup - \$400,000
3. Install AHUs for classrooms, Gym, and Auditorium - \$120,000
4. Install new 4-pipe unit ventilators with heating only - \$150,000
5. Install MAU for the kitchen - \$25,000
6. New DDC control system with WEB based Lonworks protocol - \$300,000
7. Demolition and removal allowance - \$50,000
8. Miscellaneous and architectural allowance - \$20,000

9/8/2006 Asphalt/Concrete : Asphalt

Poor condition, north and west side are strewn with broken glass. Alligator cracking is massive all sides of the building. Surface texture is poor through out. Asphalt is heaving on northeast side and raveling and splitting on south side. Unusable area on northwest corner with exposed 2in X 2ft concrete pads with iron rings a 6ft. on center each way probably intended for future expansion. Parking only 4 or 5 markings still visible.

9/8/2006 Asphalt/Concrete : Concrete

Small area of slab at east end of north lot, cracked and settling with biogrowth. West sidewalk from street is broken and settling with biogrowth. Stair at south side west entry is broken and spalled.

9/8/2006 Asphalt/Concrete : Play Equipment

Located in Seven Oaks Park to the south and adjacent to deteriorated hard surface. Jungle gym and slides in good condition on pad, 3 basketball goals on seperate pads, softball with backstop on grass, picnic tables, walks and shelter house, with two tennis courts. (All in park)

9/8/2006 Doors: Exterior Entrances

Hollow metal doors and frames with plexiglass in good condition.

9/8/2006 Windows: Windows

Wood sash and frame single hung. Steel with vents in greenhouse. Most are cracked, broken, and missing glass (boarded on inside). Wire glass in 1st floor kitchen, toilets and skylights. Frosted glass in kitchen. Broken and rotting sashes, frames and stools prevalent. Live and dead pigeons on 2nd and 3rd floors. Security screens on first floor.

9/8/2006 Walls : Exterior Walls

Brick and ashlar stone appear fair. Trim work is architectural terra cotta and cast stone. Spalling brick at parapet along south wall, parapet cracking and step cracking at south east corner has pushed parapet outward. Open brick joints at base of 2 doors- north wall. Terra cotta is deteriorating and cracking in middle level sills, below greenhouse, around east entry south side and low horizontal trim north and west sides. Brick is deteriorating at top of stack and east wall- east end. Soffit below greenhouse is broken and corroded. Metal counter flashing at base parapet north and east walls deteriorating. Interior side of exterior walls are corroded, peeling ceilings, and falling tile in 3rd floor toilets, corridor skylights and 6 classrooms, 2nd floor classrooms, gym auditorium, and 1st floor corridor and 5 rooms. Wall cracking noted. Ceiling types: 2X4 acoustical tile, 1X1 glue on tile, plaster and painted concrete. Peeling and buckling floor tile 1st and 2nd floors and wood floor in gym.

9/5/2006 Electrical :

7 Oaks Middle School has been closed 2 years--looks like 20. The service hasn't been upgraded. The school has a 600A service, 208Y/120V. The mechanical equipment is antique, and the starters also. If this school were to be air conditioned, we would recommend a 1200A 480Y/277V service. In view of the probability of re-lighting the entire school, this would probably be on 277V and we would recommend replacement of the existing 600A service with a step down transformer from the new service resulting in a single service. Branch panels still contain plug fuses rather than circuit breakers.

The school lighting is not only in disrepair and of the old T12 technology, the number of fixtures is inadequate. The predominant fixture type is 4 lamp Acrylic Wrap Pendant with T12 Lamps and Ballasts. These are widely spaced. Only 4 are installed in some classrooms. Based on the minimum IES recommendation of 50 f.c. for classrooms, the number of fixtures should be doubled. However, with additional mechanical equipment, it is unlikely pendants will be used in a remodel scenario. The corridors are lighted with pendant mounted egg crate style 2 lamp T12 fluorescents spaced at 24 feet. The selection of fixture is inappropriate. The corridors would benefit from a fixture designed to distribute light at shallow angles. The spacing for a 2 light fixture should be no more than 8 ft c.c. The Cafeteria is lighted with pendant Fixtures for type A lamps. These are all broken. The Kitchen has recessed 4 light fixtures, but these total about half the number reasonably required for a kitchen. The Gym has (6) only Rat Guard type A lamp fixtures. Not adequate. The boiler room, if it is to receive new mechanical equipment, will also likely receive new fluorescent fixtures to replace the rat guard type A lamp fixtures it has. One surprise is the existence of good quality theatrical lights at the auditorium stage--the thought of salvage to benefit

9/5/2006 Fire Prot:

There is an INTELEKNIGHT 5820XL FA panel, but there are insufficient pulls to represent a manual FA system. There are insufficient notification devices. It is impossible to confirm that there is egress lighting. Exit lights are missing where required.