VOCATIONAL EDUCATION PROGRAM

Electrical Trades

I. PROGRAM REQUIREMENTS

Refer to the project-specific Schedule of Spaces for student stations, square footage, and for any requirements that may differ from the prototype requirements listed below:

1. Laboratory
2. Material Storage Room
3. Tool Storage Room
4. Project Storage Room
5. Related Classroom
6. Teacher Planning Area

II. PROGRAM FURNITURE AND EQUIPMENT

Refer to the Furniture and Equipment List for Owner-provided furniture and equipment.

III. SPECIAL CONSIDERATIONS

- **Floor**
  Provide sealed concrete in the Laboratory and Storage Rooms. The Laboratory floor should be adequately sloped to the floor drains.

- **Walls**
  Provide chain link partitions (all metal construction) to fully enclose the Material Storage Room, Tool Storage Room, and Project Storage Room.

- **Ceiling**
  Provide an 18’ high ceiling in the Laboratory.

- **Windows**
  Provide windows in the Laboratory, sill height to be minimum 5’ above the floor. Provide a half-glass door from the Teacher Planning Area into the Laboratory.

  Provide an observation window, 3’ wide x 4’ high, from the Teacher Planning Area into the Related Classroom, sill height to be 36” above the floor.

  Provide an observation window, 12’ wide x 4’ high, from the Related Classroom into the Laboratory, sill height to be 36” above the floor.

- **Doors**
  In addition to a standard single door, provide an overhead roll-up door, 12’ wide x 10’ high (manually operated), to the Laboratory.

  Provide a wire Dutch-type door from the Laboratory into the Tool Storage Room.

  Provide 4’ wide wire mesh doors from the Laboratory into the Material Storage Room, and from the Laboratory into the Project Storage Room and from the Laboratory into the Tool Storage Room.
III. SPECIAL CONSIDERATIONS (continued)

- **Water**
  - Provide one (1) wall mounted sink with cold water in the Laboratory.
  - Provide one (1) semi-circular wash station with three (3) faucets.
  - Provide one (1) pull-cord emergency shower with eyewash, in accordance with District Design Guidelines.
  - Provide an electric water cooler in the general vicinity of the Laboratory.
  - Provide one (1) hose bib and floor drains, number as required, in the Laboratory.

- **Communications**
  - Provide a clock, speaker and intercom handset in the Laboratory and Related Classroom.
  - Provide a clock and speaker (no intercom handset) in the Teacher Planning Area.
  - Provide a data outlet with adjacent power outlet in the Laboratory, Related Classroom, and Teacher Planning Area, in accordance with District Design Guidelines.
  - Provide a TV bracket with DVD bracket, CCTV jack, and adjacent power outlet in the Related Classroom, in accordance with District Design Guidelines.

- **Electrical**
  - **Laboratory**
    - Provide a duplex outlet at each Owner-provided student workbench and/or student workstation.
    - Provide power poles if required, located as directed.
    - Provide convenience outlets 10'-0" apart on three (3) walls.
    - Provide 110v, 20amp electrical cord reels and outlets, located as directed, in the Laboratory
    - Provide two (2) master disconnect switches to shut down all receptacles, located so as to be easily accessible to the teacher.
    - Provide a keyed reset mounted adjacent to each master disconnect switch.
    - Provide two (2) 240v outlets for general use, located as directed.

- **Gas and Air**
  - Provide one (1) compressed air outlet on each wall of the Laboratory, 120 psi, 10cfm, with one pressure regulator and dryer for each outlet.
III. SPECIAL CONSIDERATIONS (continued)

- **Service Drives**
  
  Provide a service drive from a main driveway or parking lot to the Outside Covered Project Area, for delivery of materials.

- **Contractor-Provided Equipment and Casework**

  **Laboratory**
  
  Provide one (1) glasses/goggles sanitizing cabinet with 20 safety glasses and 10 goggles, in accordance with District Design Guidelines.

  **Tool Storage Room**
  
  Provide a pegboard, 20’ long x 5’ high and bottom to be mounted 36” above the floor. The pegboard is to be mounted so as to provide a minimum of 1/2” clearance between the back of the pegboard and the wall.

- **Contractor-Provided Instructional Aids**

  **Laboratory**
  
  Provide a 12’ wide x 4’ high markerboard with a 4’ wide x 4’ high tackboard on one (1) side, bottom to be mounted 36” above the floor.

  Provide a wall-mounted video projection system in accordance with District Design Guidelines.

- **Other Considerations**

  In the Laboratory the Owner will provide student workbenches and may provide student workstations (i.e. computer). The quantity, type of workbenches and workstations and the configuration will vary depending on the program and the design of the space.

  In the Laboratory the work areas must be properly laid out to allow normal sequence of operations with a minimum of cross traffic.

  Provide adequate clearances between Owner-provided machines to avoid interference between operators and to allow free flow of traffic and materials.