SECTION 08 10 00 -- DOORS AND FRAMES

PART 1 – GENERAL

A. Clear Width: In new construction doors installed in “standard” frames shall be a minimum of 36” wide to comply with the requirements for accessibility. Non-standard conditions shall be carefully reviewed with Brown Project Manager based on program needs and ADA requirements. Programs frequently need 42” wide doors.

B. Egress corridor and Stair Fire/Smoke Door Assemblies: To facilitate maintenance and movement of equipment, furnishings, and other items, provide electromechanical/electromagnetic hold-open closers with automatic release interconnected into building fire/smoke alarm system. Avoid use of magnetic holders which may require degaussing and which may hold doors open even when electrical current is disconnected. Closely coordinate electromechanical/hold open devices and closers with hardware, access control systems, electrical and fire alarm and protection Contract Documents.

C. Where an accessible entrance is created, it is required that at least one entrance door have an assisted door opener/closer.

D. Doors and frames shall be factory-prepared to receive hardware.

E. All interior doors shall have 1/2” undercut above finished floor material.

F. Proper reinforcement of all concealed and surface applied hardware including hinges, closers, and exit devices.

G. When doors are required to be thermally insulated, doors shall have a maximum R value available.

H. Provide full heavy-duty weather-stripping at all doors including head, jambs and thresholds.

I. Continuous solid wood blocking shall be provided around all wood frames in metal stud wall construction.

1.2 Design Requirements, Steel Doors and Frames:

A. Appropriate gauge shall be reviewed carefully with a Brown University Project Manager prior to specification. The following gauges are required for the identified conditions:
   1. Typical Interior Locations: 18 gauge door, 16 gauge frame.
2. Mechanical Rooms and Exterior Locations: 16 gauge door, 14 gauge frame.

3. All frames shall be of full weld unit type fabrication. Joints shall be mitered and externally welded. Contact edges shall be closed tight. Welds on exposed surfaces shall be dressed smooth and flush. **Knock-Down frame construction will only be considered for interior use with the approval of a Brown University Project Manager.**

4. Proper reinforcements shall be provided for all hardware. Reinforcements, drilling and tapping for mortised applied hardware shall be done at the factory. Surface applied hardware reinforcements shall be installed at the factory, drilling and tapping shall be done in the field by others. Reinforcement for surface applied closer, magnetic hold open and lock shall be 12 gauge steel.

1.3 Design Requirements, Wood Doors:

A. Typical doors for dormitories shall be paint grade, 5 ply hot press, with fully bonded core. Floating cores are not allowed.

B. Typical doors for dormitories shall be a standard 3’0” wide by 6’8” or 7’0” high.

C. All doors shall have solid blocking for all hardware including emergency exit devices.

D. Care shall be taken to coordinate with adjoining walls that they contain solid blocking as required for all hardware.

E. All exterior doors that swing into the weather shall be capped and have no finger joints. Stiles and rails of exterior doors shall be of laminated construction, not solid wood.

1.4 Design Requirements, Aluminum Framed Entrances:

A. Aluminum entry doors shall have both vertical and horizontal metal frame members and be minimum 6” stile for structural integrity and to accommodate hardware, unless otherwise submitted to and approved by Brown Project Manager.

B. All hardware shall be specified under and coordinated with Section 08 71 00 – Door Hardware.

C. A rigid structural thermal break is required.
1.5 Design Requirements, Automatic Entrance Doors:

A. Automatic entrance door systems shall have LCN or Stanley Best closers unless otherwise approved by a Brown University Project Manager. Electric only.

B. Coordinate system with required access control system.

C. Coordination with access control system must include review and approval by Brown DPS and Project Manager.

1.6 Design Requirements, Access Doors and Panels:

A. All doors/panels shall be steel; not drywall or plastic.

B. Access doors and panels are required in drywall, plaster and other inaccessible finishes to provide maintenance access to valves, controls, junction boxes and other items that otherwise would be inaccessible.

C. Provide keyed locks at access doors at all publicly accessible areas, and at a minimum all tel/data rooms, corridors and public spaces, unless otherwise approved by Brown Project Manager. Provide a minimum of two cam locks for sides of doors over 18 inches and three for doors over 30 inches wide, unless otherwise approved by Brown Project Manager. All locks in access panels shall be keyed with interchangeable cores, unless otherwise approved by Brown Project Manager.

D. Minimum access panel and door clear-opening sizes shall be coordinated with the intended use. Minimum sizes shall be:
   1. Reach in Access 12” x 12”
   2. Access Door for Torso only 24” x 24”
   3. Access Door for Complete Body Passage 30” x 30”

END OF SECTION