**Section 518.2220 Plumbing and Other Piping Systems**

a) General Requirements

All plumbing systems shall be designed and installed in accordance with the Illinois Plumbing Code, except that the number of waterclosets, urinals, lavatories, drinking fountains and other fixtures shall be as required by this Part.

b) Plumbing Fixtures

1) Plumbing fixtures shall be of nonabsorptive, acid-resistant materials.

2) The water supply spout for lavatories and sinks required for filling pitchers and for medical and nursing staff hand washing shall be mounted so that its discharge point is a minimum perpendicular distance of 5 inches above the rim of the fixture.

3) Hand-washing lavatories used by medical and nursing staff shall be trimmed with valves that can be operated without the use of hands where specifically required in this Part.

A) When blade handles are used for this purpose the blade handles shall not exceed 4½ inches in length, except that the handles on clinical sinks shall not be less than 6 inches in length.

B) The hand-washing and/or scrub sinks for major procedure rooms shall be trimmed with valves that are asceptically operated (i.e., knee or foot controls) without the use of hands. Wrist blades are not acceptable.

4) Clinical rim flush sinks shall have an integral trap in which the upper portion of a visible trap seal provides a water surface.

c) Water Supply Systems

1) Systems shall be designed to supply water at sufficient pressure to operate all fixtures and equipment during maximum demand periods.

2) Each water service main, branch main, riser and branch to a group of fixtures shall be valved. Stop valves shall be provided at each fixture.

3) Flush valves installed on plumbing fixtures shall be of a quiet operating type, equipped with silencers.

4) Water distribution systems shall be arranged to provide hot water at each hot water outlet at all times. Hot water at shower and hand-washing facilities shall not exceed 110°F (43°C).

d) Water Heaters and Tanks

1) The water-heating equipment shall have sufficient capacity to supply water at the temperatures and quantities in the following areas:

|  |  |  |
| --- | --- | --- |
|  | Clinical |  |
| gallons/hour/bed | 6½ |  |
| liters/second/bed | .007 |  |
| temperature °F | 100 |  |
| temperature °C | 43 |  |

Water temperatures are to be taken at hot water point of use or inlet to processing equipment.

2) Storage tanks shall be fabricated of corrosion-resistant metal or lined with non-corrosive material.

e) Drainage Systems

1) Drain lines from sinks in which acid wastes may be poured shall be fabricated from acid-resistant material.

2) Insofar as possible, drain piping shall not be installed over major procedure rooms and similar critical areas. Special precautions shall be taken to protect these areas from possible leakage or condensation from such overhead piping systems.

3) Building sewers shall discharge into a public sewerage system.

4) Where a public sewerage system is not available, plans for any private sewage disposal system shall be submitted to the Illinois Environmental Protection Agency for review for approval before construction is started.

f) Nonflammable medical gas systems shall be installed in accordance with NFPA 99.

g) Clinical vacuum (suction) systems shall be installed in accordance with NFPA 99.

h) Medical compressed air systems shall be installed in accordance with NFPA 99.

i) Oxygen, vacuum and medical compressed air shall be piped to the locations indicated in TABLE A with the required station outlets.

j) Service outlets for central housekeeping vacuum systems, if used, shall not be located within major procedure rooms.

k) Fire Extinguishing Systems

All fire extinguishing systems shall be designed, installed and maintained in accordance with NFPA 101, NFPA 13, and NFPA 25.

(Source: Amended at 33 Ill. Reg. 8317, effective June 4, 2009)