230060-H: SUPPLEMENTAL MECHANICAL SOUND AND VIBRATION CONTROL (15240-H)

Related Sections

Basis Guideline: 230060 – “Mechanical Sound and Vibration Control”
230000-H – “Supplemental Basic Mechanical Requirements”
For an explanation of the use of these guidelines, see “Design Guidelines for UMHHC Facilities”

Sound Design Requirements

Duct liner shall not be permitted, either in supply, return or exhaust systems, except by special approval from UMHHC FPD. Systems using duct liner are prone to erosion into the air stream, accumulation of dirt and dust and are very difficult to keep clean. The A/E shall be responsible for utilizing hospital grade duct attenuators and utilizing the ductwork layout (i.e. elbows, flex duct, etc) to provide an acceptable level of acoustical attenuation (see NC/RC requirements under 230000-H “Supplemental Basic Mechanical Requirements”).

Vibration Isolation

Inertia bases shall be used for equipment requiring 50 hp or larger motors. In addition, all floor mounted pumps 10 hp and larger on suspended floors (not on grade) shall be required to have inertia bases.

Piping and/or ductwork connected to vibrating equipment shall have flexible connections.

Electrical connections to motors shall be by flexible conduit, long and strong enough not to stress.