

Fire and Chemical Hazardous Materials Satellite Storage Lockers

Hazardous Material Satellite Storage Lockers (HMSSL) is used on ship board for safely stowing, dispensing, and handling of hazardous materials (HM) like flammable liquids, corrosive liquids, and calcium hypochlorite with oxidizing characteristics. The major challenges involved in design and fabrication of HMSSL is the choice of material and fabrication techniques that meets the demands of fire and highly reactive chemicals such as calcium hypochlorite. ARIS successfully demonstrated the feasibility of HMSSL by the selection of materials through long term chemical resistance and short term fire resistance studies and provided a pathway to build HMSSL that meet the hazardous material stowage requirement of U.S. Navy Ships.

HMSSL Concept

Storage Cabinet



