

MILITARY-STANDARD 1691

Defense Health Agency
Office of the Assistant Secretary of Defense for Health Affairs

DHA

Facilities Division (FD)



Notice: The Joint Schedule Numbers (JSN) or the National Stock Numbers, within the MIL-STD-1691, shall NOT be used as substitutes for contract specifications and detail drawings. Citing JSN numbers and nomenclatures will NOT relieve the architect or design agency of the responsibility to verify and provide all necessary detail drawings and specifications showing actual dimensions, utility connections, accessories, quantity, quality, and performance required.

The data contained in the MIL-STD-1691 is a valuable tool allowing the MHS to more clearly express basic conceptual intent in the planning and programming of a project. This allows the planning and programming team to develop parametric cost estimates for associated medical equipment and furniture requirements; and allows the design team to address general design requirements early in the conceptual phases of design. The medical equipment program to this level of detail supports specificity for more focused and informed architectural concept design. In addition it supports earlier engineering design analysis of alternatives having fewer variances of unknowns relating to medical equipment and furniture.

Access to the non-public elements of the online database requires membership in the MAX.gov group “DoD MHS – Military Standard 1691 (AGY-DOD-MHS.MILSTD1691)”.

This document can be found through the World-Class Facilities website (<https://facilities.health.mil/>)

Military Standard 1691

Construction and Material Schedule for Military Medical, Dental, Veterinary and Medical Research Laboratories

AMSC N/A

FSC 6530

DISTRIBUTION STATEMENT A: APPROVED FOR PUBLIC RELEASE; DISTRIBUTION IS UNLIMITED.

DEPARTMENT OF DEFENSE WASHINGTON, DC 20301-1200

1. This Military Standard is approved for use by all Departments and Agencies of the Department of Defense.
2. Recommended corrections, additions or deletions should be addressed to the Defense Health Agency, Facilities Division (FD), Attn: Equipment Working Group, 7700 Arlington Boulevard, Falls Church, VA 22042 or through the online MILSTD 1691 tool (<https://facilities.health.mil/repository/getFile/11358>).

FORWARD

1. This standard provides a schedule of equipment for medical, dental, veterinary and medical research facilities. It is an automated, on-line tool for use as a “single source” database for both Public (restricted data access) and Authenticated (unrestricted data access) users. Used as a component of the Space and Equipment Planning System (SEPS) software, the information contained in the standard is expected to be tailored to meet the requirements applicable to a specific project.
2. The application information contained in this standard shall be applied in military construction budgets and may be used to identify equipment for construction and renovation planning not included in a military construction budget.
3. All built-in casework shall be fabricated and designated by materials, construction methods, and fabrication that align with the highest grade quality and infection control standards for casework for use in high-performing healthcare building applications. Typical industry standards for medical/laboratory grade materiel shall apply in the absence of project specific requirements/guidance.
4. The Joint Schedule Numbers (JSN) or the National Stock Numbers (NSN), within the MIL-STD-1691, shall not be used as substitutes for contract specifications and detail drawings. Citing JSN's and nomenclatures will not relieve the architect or design agent of the responsibility to verify and provide all necessary detail drawings and specifications showing actual dimensions, utility connections, accessories, quantity, quality and performance required of the actual manufacturer / model being provided under their scope of responsibility. Details shall account for all accessories and options as determined by the Using Military Department or Design and Construction Agent.

Table of Contents

1.	SCOPE	5
2.	DEFINITIONS	5
3.	GENERAL REQUIREMENTS	8
4.	SUPPLEMENTAL INFORMATION.....	8
5.	UTILITY REQUIREMENTS FOR MEDICAL/DENTAL/VETERINARY EQUIPMENT	9

1. SCOPE

- 1.1. Scope and Purpose. This standard establishes a definite demarcation of responsibilities (logistical category codes, section 2.2.a.) between the various elements involved in the planning, funding, constructing and equipping of medical, dental, veterinary and research facilities of the Using Medical Department and other using Agencies (U.S. Public Health Service, Department of Veteran Affairs, and Indian Health Service).
- 1.2. Application. This standard shall be applied to the architectural, financial and logistical planning, construction and equipping of all medical, dental, veterinary and medical research facilities included in the Medical Departments and other using Agency budgets for medical construction funds, other appropriation funds, other procurement (investment equipment) organizational maintenance funds and departmental operation funds.

2. DEFINITIONS

- 2.1. General. As used in this standard for the scheduling of items, the following definitions pertain to:
 - 2.1.1. Fixed. Fastened to walls, floors or ceiling, or to steam, gas, plumbing, electrical power, low-voltage lines in a permanent manner.
 - 2.1.2. Portable. Movable by hand (generally less than 30 pounds in weight), including that equipment which is attached to utility line by attachment plug, screw-on fitting, or quick disconnect fitting, and that which is of such size and use that special consideration must be given to its location.
 - 2.1.3. Mobile. Equipment on wheels or casters.
 - 2.1.4. Integral Equipment. This equipment may also be referred to as installed equipment, built-in equipment, building service system equipment, or building fixtures Integral equipment is affixed to or built into a real property facility as an integral part of the facility. The removal of this equipment may generally cause some damage to or alteration of the facility, or make the facility somewhat incomplete or unusable for its designed functionality.
- 2.2. Schedule Terms. Terms used in the column headings and body of the schedule are defined as follows:
 - 2.2.1. Joint Schedule Number (JSN). The number shall consist of an alpha character followed by four additional characters. The first alpha character shall denote the equipment groups as follows:

A	Architectural
C	Fixed Casework
D	Dental Equipment and Casework
E	Modular Casework
F	Furniture and Furnishings

K	Food Service Equipment
L	Laboratory Equipment
M	Miscellaneous Medical Equipment
P	Plumbing Fixtures
R	Refrigeration Equipment
S	Sterilizers, Decontamination and Associated Equipment
T	Shop Equipment and Tools
U	User Defined Items
V	Veterinary Equipment
X	X-Ray Equipment and Accessories

- 2.2.2. National Stock Number / Federal Stock Catalog (NSN). Are used to identify the Federal Supply Group (FSG), Federal Supply Class (FSC), NATO Country Code, and National Item Identification Number (NIIN) of an applicable item.
- 2.2.3. Logistical Category (LOGCAT). The LOGCAT code is used to classify procurement and installation responsibility. The responsibility column is the typical short acronym used to identify responsibility of Government and Contractor relative to procurement and installation. The description column provides a detailed definition of the LOGCAT code.

LOGCAT Responsibility Description		
A	CFCI	Contractor Furnished Contractor Installed. Equipment is purchased and installed by the construction contractor using construction funds (Construction Appropriation/Medical Construction Appropriation). Items identified as LOGCAT A are affixed and built into a facility as an integral part of that facility, and are necessary to make the facility complete and useable for its intended purpose.
B	GFCI	Government Furnished Contractor Installed. Equipment is purchased by the Government using Service operating funds (other than construction) and installed by the construction contractor using construction funds (Construction Appropriation/Medical Construction Appropriation).
C	GFGI	Government Furnished Government Installed. Equipment is provided by the Government from existing assets or purchased using Service operating funds (other than construction) and installed by the Government (equipment vendor or agent) using Service operating funds (other than construction).
D	Leased	Other. Leased or rented equipment by the Government, or that obtained under special conditions as indicated, using Service operating funds (other than construction).
E	GFCI	Government Furnished Contractor Installed. <u>THIS LOGCAT IS CANCELED FOR ALL PROJECTS FY2016 AND BEYOND.</u> Equipment is purchased by the Government using construction funds (Construction Appropriation/Medical Construction Appropriation) and installed by the construction contractor using construction funds (Construction Appropriation/Medical Construction Appropriation).
F	GFGI	Government Furnished Government Installed. <u>THIS LOGCAT IS CANCELED FOR ALL PROJECTS FY2016 AND BEYOND.</u> Equipment is purchased by the Government using construction funds (Construction Appropriation/Medical Construction Appropriation) and installed by the Government (equipment vendor or agent) using construction funds (Construction Appropriation/Medical Construction Appropriation).
G	GFGI	Government Furnished Government Installed. Equipment identified on a project to project basis that is purchased rented or leased requiring special funding (not MILCON, project specific OM / OP dollars, or DHP funded) and may require other justification and approvals.
R	Reuse	Government Furnished Government Installed. These are existing equipment assets that will be transferred and reused. There are no procurement costs unless the item will be upgraded during relocation. When this is the case Service operating funds (other than construction) will be used. Relocation funding may be required using Service operating funds (other than construction).

3. GENERAL REQUIREMENTS

- 3.1. Joint Schedule Number (JSN). The JSN's appearing in this standard shall be used to identify equipment on all architectural drawings, plans, and supporting documents for Military/Federal medical construction projects. The JSNs may also be used to identify equipment for construction and renovation planning not included in a military construction budget. The JSN's details can be found at: <https://facilities.health.mil/repository/getFile/11358>.
- 3.2. Items Not Included. Funds for items not represented by a JSN in this standard shall be included in the appropriate operating or supply budget estimates.
- 3.3. Update Process. Additions, deletions, changes, and corrections to this standard shall be made as directed by the DHA Facilities Division (FD). Instructions for updating content in the MS1691 can be found at: **(insert link to document in Knowledge Center)**

4. SUPPLEMENTAL INFORMATION

4.1. Special Instructions

- 4.1.1. The using Service/Agency shall be required to furnish specific equipment information and participate in review of shop drawings and inspections prior to acceptance of technical equipment. Inquiries shall be coordinated through the appropriate design and construction agent.
- 4.1.2. Quality and type of equipment and furniture, e.g., stainless steel, steel, wood, gas fired, or electric, shall be determined by the using service/agency in each instance, based on the intended life and mission of the facility and the location and circumstances under which construction is to be accomplished.
- 4.1.3. When design and space limitations necessitate substitution of equipment in the preparation of drawings, these substitutions shall be coordinated with the using Service/Agency.

4.2. NOTES.

- 4.2.1. Not all items listed in this standard necessarily apply to all construction projects. It is improbable that any project will include all items. Items appearing on project equipment schedules that are not listed in this standard shall be assigned a project unique number and approved by the using service/agency. It is not mandatory that every item, which applies to a specific project, be listed in this standard.
- 4.2.2. Expendable supplies, hand tools, and accessories are not included in the standard.
- 4.2.3. Unless otherwise specifically noted, dimensions indicated mean:
 - 4.2.3.1. Height: Outside dimensions bottom to top or floor to top. Not including sloping tops or counter tops.
 - 4.2.3.2. Width: Outside dimensions end to end across the front.

4.2.3.3. Depth: Outside dimensions from front to back.

4.2.4. All dimensions are approximate since they vary from manufacturer to manufacturer. Dimensions stated are the composite worst case reviewed during the MIL-STD-1691 update process.

5. UTILITY REQUIREMENTS FOR MEDICAL/DENTAL/VETERINARY EQUIPMENT

Legend of Utilities

Utility 1: Plumbing (Water and Drainage)

Code	Description
A	Hot and cold water
B	Cold water and drain
C	Hot water and drain
D	Cold and hot water and drain
E	Treated water and drain
F	Cold, hot and treated water and drain
G	Cold and treated water and drain
H	Hot and treated water and drain
I	Drain only
J	Cold water only

Utility 2: Electrical

Code	Description
A	120 volt, conventional outlet
B	120 volt, special outlet
C	208/220 volt
D	120 and 208/220 volt
E	440 volt, 3 phase
F	Special electrical requirements
G	208/220 volt, 3 phase

Utility 3: Medical Gas

Code	Description
A	Oxygen
B	Vacuum
C	Air, low pressure (30 PSIG) max
D	Air, high pressure (85 PSIG) max
E	Oxygen and medical air (50 PSIG)
H	Oxygen, vacuum and medical air (50 PSIG)
J	Vacuum and HP air (85 PSIG) minimum
K	Medical air (50 PSIG)

Utility 4: Miscellaneous Gas

Code	Description
A	Steam
B	Nitrogen gas
C	Nitrous oxide
D	Nitrogen and nitrous oxide gas
E	Carbon dioxide gas
F	Liquid carbon dioxide
G	Liquid nitrogen

Utility 5: Non-Medical Gas

Code	Description
A	Natural gas
B	Liquid propane gas
C	Methane
D	Butane
E	Propane
F	Hydrogen gas
G	Reserved
H	Acetylene gas

Utility 6: Miscellaneous

Code	Description
A	Earth ground
B	Lead lined walls
C	Remote alarm ground
D	Empty conduit with pull cord
E	Vent to atmosphere
F	Special gas requirements
G	Liquid gas requirements
H	RF/Magnetic shielding
J	Wall/ceiling support required
K	Empty conduit/pull cord & wall/ceiling support req
M	Earth ground and wall/ceiling support req
P	Lead lined walls and wall/ceiling support req
T	CAT 6 to nearest Telecommunications Room

Custodian: OSD, ASD-HA, DHA-FD