CHAPTER 100: MEDICAL / SURGICAL INPATIENT UNITS

1  PURPOSE AND SCOPE .................................................................................................................. 100-2
2  DEFINITIONS................................................................................................................................. 100-2
3  OPERATING RATIONALE AND BASIS OF CRITERIA .......................................................... 100-3
4  INPUT DATA STATEMENTS ......................................................................................................... 100-4
5  SPACE CRITERIA........................................................................................................................... 100-6
6  PLANNING AND DESIGN CONSIDERATIONS ......................................................................... 100-12
7  FUNCTIONAL RELATIONSHIPS ................................................................................................. 100-13
8  FUNCTIONAL DIAGRAM ............................................................................................................. 100-13
1 PURPOSE AND SCOPE
This document outlines Space Planning Criteria for Chapter 100: Medical / Surgical Inpatient Units. It applies to all medical facilities in Veterans Affairs (VA).

Services which are accommodated in the units listed above include, but are not limited to, those focused on Cardiac, Cardiac Step Down, Neurological, and Orthopedic patients. See Table 1 for a full list of Medicine and Surgery inpatient units.

Refer to the following chapters for additional programming data:

A. Chapter 102 – Intensive Care Nursing Units

2 DEFINITIONS
Accessible: A site, building, facility, or portion thereof that complies with provisions outlined in the Architectural Barriers Act of 1968 (ABA).

Architectural Barriers Act (ABA): A set of standards developed to insure that all buildings financed with federal funds are designed and constructed to be fully accessible to everyone. This law requires all construction, renovation, or leasing of sites, facilities, buildings, and other elements, financed with federal funds, to comply with the Architectural Barriers Act Accessibility Standards (ABAAS). The ABAAS replaces the Uniform Federal Accessibility Standards (UFAS).

Full-Time Equivalent (FTE): A staffing parameter equal to the amount of time assigned to one full time employee. It may be composed of several part-time employees whose total time commitment equals that of a full-time employee. One FTE equals 40 hours per week.

Functional Area: The grouping of Bedrooms and spaces based on their function within a clinical service. Typical Functional Areas within VA Space Criteria are: Reception Area, Patient Area, Support Area, Staff and Administrative Area, and Education Area.

Inpatient Care Unit: A dedicated unit for inpatient accommodations, providing direct health care, support facilities, and institutional services. The minimum number of beds, of all types, to generate one Inpatient Unit is seventeen (17), and the maximum number of beds allowed on one Inpatient Unit is thirty-three (33).

Input Data Statements: A set of questions designed to elicit information about the healthcare project in order to create a Program for Design (PFD) based on the criteria parameters set forth in this document. Input Data Statements could be Mission, Workload, or Staffing related, based on projections and data provided by the VHA or the VISN about the estimated model of operation for the facility. This information is processed through mathematical and logical operations in VA-SEPS.

Medical Patient Care Unit: This unit provides for the care of patients with medical (non-surgical) disease or illness.

Neurological Inpatient Care Unit: This unit provides for the care of patients whose primary treatment is for the injury or dysfunction of the brain, spinal cord, and/or nervous system.

Orthopedic Inpatient Care Unit: This unit provides for care to the surgical and/or medical orthopedic patients, allowing consolidation of all specialized orthopedic equipment (beds, frames, crutches, etc.) on one unit.

Picture Archiving and Communication System (PACS): The digital capture, transfer, and storage of diagnostic images. A PACS system consists of: workstations for interpretation, image/data producing modalities, a web server for distribution, printers for file records,
Program for Design (PFD): A space program generated either manually or by VA-SEPS based on criteria set forth in this document and specific information entered about mission, workload projections, and staffing levels authorized.

Provider: An individual who examines, diagnoses, treats, prescribes medication and manages the care of patients within his or her scope of practice as established by the governing body of a healthcare organization.

SEPS (VA-SEPS): Acronym for Space and Equipment Planning System, a digital tool developed by the Department of Defense (DOD) and the Department of Veterans Affairs to generate a Program For Design (PFD) and an Equipment List for a VA healthcare project based on specific information entered in response to Input Data Questions. VA-SEPS incorporates the propositions set forth in all VA space planning criteria chapters. VA-SEPS has been designed to aid healthcare planners in creating a space plan based on a standardized set of criteria parameters.

Step Down Patient: A general medical, surgical, or coronary care unit can provide care to those patients discharged from an intensive care unit who require more care than that provided on a general Inpatient Care unit. Step Down patients require telemetry monitoring.

Surgical Patient Care Unit: This unit provides for the care of patients whose primary treatment was an invasive procedure.

Telemetry Unit: See Step-Down Patient Care Unit.

Workload: Workload is the anticipated number of clinic stops that is processed through a department/service area. The total workload applied to departmental operational assumptions will determine overall room requirements by modality.

3 OPERATING RATIONALE AND BASIS OF CRITERIA

A. Utilization projections or planned services / modalities for a specific VA project are provided by the VA Office of Policy and Planning and the VISN Support Services Center (VSSC). These utilization projections are generated by a methodology based upon the expected veteran population in the respective market/service area. Healthcare planners working on VA projects will utilize and apply the workload based criteria set forth herein for identified services and modalities to determine room requirements for each facility.

B. Space planning criteria have been developed on the basis of an understanding of the activities involved in the functional areas of the Medical / Surgical Inpatient Units and their relationship with other services of a medical facility. These criteria are predicated on established and/or anticipated best practice standards, as adapted, to provide environments supporting the highest quality health care for veterans.

C. These criteria are subject to modification relative to developments in equipment, medical practice, vendor requirements, and planning and design. The selection of the size and type of Medical / Surgical Inpatient Unit equipment is determined by anticipated medical needs.

D. All patient beds are to reside in single-occupancy Bedrooms, with direct access to an attached toilet / shower room.
<table>
<thead>
<tr>
<th>BED SECTION NUMBER</th>
<th>BED SECTION NAME</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Allergy</td>
</tr>
<tr>
<td>2</td>
<td>Cardiology</td>
</tr>
<tr>
<td>3</td>
<td>Pulmonary Tb</td>
</tr>
<tr>
<td>4</td>
<td>Pulmonary Non-Tb</td>
</tr>
<tr>
<td>5</td>
<td>Gerontology</td>
</tr>
<tr>
<td>6</td>
<td>Dermatology</td>
</tr>
<tr>
<td>7</td>
<td>Endocrinology</td>
</tr>
<tr>
<td>8</td>
<td>Gastroenterology</td>
</tr>
<tr>
<td>9</td>
<td>Hematology / Oncology</td>
</tr>
<tr>
<td>10</td>
<td>Neurology</td>
</tr>
<tr>
<td>11</td>
<td>Epilepsy Center</td>
</tr>
<tr>
<td>14</td>
<td>Metabolic</td>
</tr>
<tr>
<td>15</td>
<td>Gen (Acute) Med</td>
</tr>
<tr>
<td>16</td>
<td>Cardiac Step Down Unit</td>
</tr>
<tr>
<td>18</td>
<td>Neurology Obs</td>
</tr>
<tr>
<td>19</td>
<td>Stroke</td>
</tr>
<tr>
<td>20</td>
<td>Rehab Medicine</td>
</tr>
<tr>
<td>24</td>
<td>Medical Observation</td>
</tr>
<tr>
<td>31</td>
<td>Gen Acute Medicine</td>
</tr>
<tr>
<td>34</td>
<td>Gen Neurology</td>
</tr>
<tr>
<td>35</td>
<td>Gen Rehab</td>
</tr>
<tr>
<td>41</td>
<td>Rehab Medicine Obs</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>BED SECTION NUMBER</th>
<th>BED SECTION NAME</th>
</tr>
</thead>
<tbody>
<tr>
<td>50</td>
<td>Surgery (Gen)</td>
</tr>
<tr>
<td>51</td>
<td>Gynecology</td>
</tr>
<tr>
<td>52</td>
<td>Neurosurgery</td>
</tr>
<tr>
<td>53</td>
<td>Ophthalmology</td>
</tr>
<tr>
<td>54</td>
<td>Orthopedic</td>
</tr>
<tr>
<td>55</td>
<td>Ear, Nose &amp; Throat</td>
</tr>
<tr>
<td>56</td>
<td>Plastic Surgery</td>
</tr>
<tr>
<td>57</td>
<td>Proctology</td>
</tr>
<tr>
<td>58</td>
<td>Thoracic Surgery</td>
</tr>
<tr>
<td>59</td>
<td>Urology</td>
</tr>
<tr>
<td>60</td>
<td>Oral Surgery</td>
</tr>
<tr>
<td>61</td>
<td>Podiatry</td>
</tr>
<tr>
<td>62</td>
<td>Peripheral Vascular</td>
</tr>
<tr>
<td>65</td>
<td>Surgical Obs</td>
</tr>
</tbody>
</table>

Note: Patient bed projections use only the Bed Sections numbers shown in Table 1: Strategic Planning Group Acute Inpatient Medicine and Acute Inpatient Surgery.

4 INPUT DATA STATEMENTS

A. Mission Input Data Statements
   1. Is a Family Lounge for each Medical / Surgical Inpatient Unit authorized? (M)
   2. Is a Family Pantry for each Medical / Surgical Inpatient Unit authorized? (M)
3. Is a Recreation Dayroom for each Medical / Surgical Inpatient Unit authorized? (M)
4. Is a Patient Discharge Lounge authorized? (M)
5. Is a Waste Disposal Chute Room in the Common Support Area authorized? (M)
6. Is a Soiled Linen Disposal Chute Room in the Common Support Area authorized? (M)
7. Is a Recycling Room in the Common Support Area authorized? (M)
8. Is a Medical Gas Storage for each Medical / Surgical Inpatient Unit authorized? (M)
9. Is a Multipurpose / Specialty Storage in the Common Support Area authorized? (M)
10. Is a Copier / Printer Room for each Medical / Surgical Inpatient Unit authorized? (M)
11. Is a Medical / Surgical Inpatient Education Program authorized? (M)
   a. Is a Medical / Surgical Inpatient Residency Program Director authorized? (M)
   b. How many Intern FTE positions are authorized? (S)
   c. How many Resident FTE positions are authorized? (S)
   d. How many Fellow FTE positions are authorized? (S)
   e. How many Patient Care Instructor FTE positions are authorized? (S)

B. Workload Input Data Statements
1. How many Acute Inpatient MEDICINE patient beds are projected? (W)
2. How many Acute Inpatient SURGERY patient beds are projected? (W)

C. Staffing Input Data Statements
1. How many Nurse Manager FTE positions are authorized for each Inpatient Care Unit? (S)
2. How many Nurse Supervisor FTE positions are authorized for each Inpatient Care Unit? (S)
3. How many Dietician FTE positions are authorized for each Inpatient Care Unit? (S)
4. How many Social Worker FTE positions are authorized for each Inpatient Care Unit? (S)
5. How many Ward Clerk FTE positions are authorized for each Inpatient Care Unit? (S)
6. How many Physician FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)
7. How many Physician Assistant FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)
8. How many Nurse Clinician FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)
9. How many Consultant FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)
10. How many Clinical Researcher FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)
11. How many Clinical Pharmacist FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)
12. How many Administrative Clerk FTE positions for the Medical / Surgical Inpatient Units are authorized? (S)

D. Miscellaneous Input Data Statements
1. How many Medical / Surgical Inpatient Protective Environment Patient Bedrooms are authorized? (Misc)
5 SPACE CRITERIA

For functional descriptions of key spaces refer to the Design Guide for Medical / Surgical Inpatient Units.

A. FA 1: Medical / Surgical Inpatient Unit Calculation:

1. Number of Medical / Surgical Inpatient Units (CALC1) .............. 0 NSF (0 NSM)
   The minimum number of patient beds, of all types, to generate one Medical / Surgical Inpatient Unit is seventeen; the maximum is thirty-three.

B. FA 2: Medical / Surgical Inpatient Unit Reception Area:

1. Waiting (WTG10) .................................................................. 215 NSF (20.0 NSM)
   Provide one per each Medical / Surgical Inpatient Unit if the total number of Patient Bedrooms in the Unit is less than sixteen; provide WTG16 if the total number of Patient Bedrooms in the Unit is sixteen or greater.
   This space can be aggregated with waiting space required for other similar adjacent units to serve all of the resulting Medical / Surgical Inpatient Units adequately.
   WTG10: Allocated space accommodates eight standard chairs @ 9 NSF each, one bariatric chair @ 14 NSF, one accessible space @ 10 NSF, and circulation; total ten people.
   WTG16: Allocated space accommodates twelve standard chairs @ 9 NSF each, two bariatric chairs @ 14 NSF each, two accessible spaces @ 10 NSF each, and circulation; total sixteen people.

2. Consult Room (OFDC2) ....................................................... 120 NSF (11.2 NSM)
   Provide two per each Medical / Surgical Inpatient Unit.
   This room provides privacy for grieving or counseling. Provide access from both Waiting and an adjacent corridor.

3. Lounge, Family (WRF01) ..................................................... 120 NSF (11.2 NSM)
   Provide one if a Family Lounge is authorized for each Medical / Surgical Inpatient Unit.
   Consider combining the Family Lounge with the Family Pantry as appropriate. Consider sharing family services with an adjacent Medical / Surgical Inpatient Unit.

4. Pantry, Family (NCWD1) .......................................................... 80 NSF (7.5 NSM)
   Provide one if a Family Pantry is authorized for each Medical / Surgical Inpatient Unit.
   Consider combining the Family Pantry with the Family Lounge as appropriate. Consider sharing family services with an adjacent Medical / Surgical Inpatient Unit if possible.

5. Patient Education / Resource Kiosk (CLSC1) ......................... 30 NSF (2.8 NSM)
   Provide one per each Medical / Surgical Inpatient Unit.
   Patient Education / Resource Kiosk to be used for private patient education needs and also as a medical information resource, which may include electronic and hard copy material, for patients and visitors. Locate accessible to Waiting.

6. Toilet, Public (TNPG1) ............................................................. 60 NSF (5.6 NSM)
   Provide one per each Medical / Surgical Inpatient Unit.
Allocated NSF accommodates one accessible toilet @ 25 NSF, one wall-hung lavatory @ 12 NSF, ABA clearances, and circulation.

7. **Toilet, Family (TNPFM)** .......................................................... 80 NSF (7.5 NSM)
   Provide one per each Medical / Surgical Inpatient Unit.

Allocated NSF accommodates one accessible toilet @ 25 NSF, one wall-hung lavatory @ 12 NSF, ABA clearances, and circulation.

C. **FA 3: Medical / Surgical Inpatient Unit Patient Area:**

1. **Patient Bedroom (BRMS1)** .................................................. 280 NSF (26.1 NSM)
   Provide one for eighty percent of the total number of projected beds, of all types; deduct the number of authorized Protective Environment Patient Bedrooms from the calculated number of Patient Bedrooms.

2. **Toilet / Shower, Patient (TSPG1)** ............................................. 70 NSF (6.6 NSM)
   Provide one per each Patient Bedroom.

Allocated NSF accommodates one accessible toilet @ 25 NSF, one accessible counter lavatory @ 16 NSF, one accessible shower @ 28 NSF, ABA clearances, and circulation.

3. **Patient Bedroom, Airborne Infection Isolation (BRIT1)** ................. 240 NSF (22.3 NSM)
   Provide one for ten percent of the total number of projected beds, of all types.
   Negative Pressure.

4. **Anteroom, Airborne Infection Isolation (BRAR1)** ............................ 65 NSF (6.1 NSM)
   Provide one per each Airborne Infection Isolation Patient Bedroom.

5. **Patient Bedroom, Protective Environment Isolation (BRIT2)** ............. 240 NSF (22.3 NSM)
   Provide one per each Protective Environment Patient Bedroom authorized for each Medical / Surgical Inpatient Unit.
   Positive Pressure.

6. **Anteroom, Protective Environment Isolation (BRAR2)** ..................... 65 NSF (6.1 NSM)
   Provide one per each Protective Environment Patient Bedroom.

7. **Toilet / Shower, Patient Isolation (TSPG1)** .................................. 70 NSF (6.6 NSM)
   Provide one per each Airborne Infection Control Isolation and Protective Environment Isolation Patient Bedroom.

Allocated NSF accommodates one accessible toilet @ 25 NSF, one accessible counter lavatory @ 16 NSF, one accessible shower @ 28 NSF, ABA clearances, and circulation.

8. **Patient Bedroom, Bariatric / Physical Disabilities (BRBA1)** .............. 280 NSF (26.1 NSM)
   Provide one for ten percent of the total number of projected beds, of all types.

9. **Toilet / Shower, Bariatric / Physical Disabilities Patient (TSPB1)** ........ 85 NSF (7.9 NSM)
   Provide one per each Bariatric / Physical Disabilities Patient Bedroom.

Allocated NSF accommodates one bariatric toilet @ 25 NSF, one bariatric
Chapter 100: Medical / Surgical Inpatient Units - Page 8 of 14

lavatory @ 21 NSF, one bariatric shower @ 30 NSF, ABA clearances, and circulation.

10. **Dayroom, Recreation (DAYR1) ........................................... 210 NSF (19.6 NSM)**

   Provide one per each Medical / Surgical Inpatient Unit if a Recreation Dayroom in each Medical / Surgical Inpatient Unit is authorized; minimum NSF; provide an additional 10 NSF per each Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedroom in each Medical / Surgical Inpatient Unit greater than twenty-five.

   This room to be used for veteran socialization outside the patient room and can be used for group education for clinical issues such as medications, hypertension, diabetes, nutrition, mental health, and detoxification.

D. **FA 4: Medical / Surgical Inpatient Unit Support Area:**

1. **Nurse Station (NSTA1) ........................................................ 160 NSF (14.9 NSM)**

   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 40 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   Allocated NSF can be decentralized to promote delivery of safe and efficient patient care.

2. **Alcove, Telemetry Monitoring (NSTA3) .................................. 80 NSF (7.5 NSM)**

   Provide one per each Medical / Surgical Inpatient Unit.

3. **Medication Room (MEDP1) ..................................................... 80 NSF (7.5 NSM)**

   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 20 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   Allocated NSF can be decentralized to promote delivery of safe and efficient patient care.

4. **Nourishment Station (NCWD1) ............................................... 80 NSF (7.5 NSM)**

   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 20 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   Allocated NSF can be decentralized to promote delivery of safe and efficient patient care.

5. **Workroom, Nurse (WRCH1) ................................................ 120 NSF (11.2 NSM)**

   Provide one for each Medical / Surgical Inpatient Unit.

6. **Utility Room, Clean (UCCL1) ............................................... 100 NSF (9.3 NSM)**

   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 20 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   This room is used for storage of sterile and non-sterile medical supplies. Allocated NSF can be decentralized to promote delivery of safe and efficient patient care.
7. **Utility Room, Soiled (USCL1)** ................................................ 100 NSF (9.3 NSM)
   
   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 20 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   This room provides an area for pre-cleaning of medical equipment, instruments, and for disposal of waste material. Allocated NSF can be decentralized to reduce travel distances for staff.

8. **Linen Room, Clean (LCCL2)** .................................................... 80 NSF (7.5 NSM)
   
   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 20 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   This room is used for storage of clean linen. Allocated NSF can be decentralized to reduce travel distances for staff.

9. **Storage, Equipment (SRSE1)** .............................................. 120 NSF (11.2 NSM)
   
   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 60 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

   Allocated NSF can be decentralized to reduce travel distances for staff.

10. **Storage, Medical Gas (SRGC2)** ............................................... 50 NSF (4.7 NSM)
    
    Provide one per each Medical / Surgical Inpatient Unit if a Medical Gas Storage is for each Medical / Surgical Inpatient Unit is authorized.

    This room is for storage of medical gas cylinders.

11. **Alcove, Crash Cart (RCA01)** .................................................... 20 NSF (1.9 NSM)
    
    Provide two per each Medical / Surgical Inpatient Unit.

12. **Alcove, Mobile X-Ray Machine (XRM01)** ................................. 40 NSF (3.8 NSM)
    
    Provide one per each Medical / Surgical Inpatient Unit.

13. **Alcove, Wheelchair / Stretcher (SRLW2)** ................................ 40 NSF (3.8 NSM)
    
    Provide two per each Medical / Surgical Inpatient Unit.

14. **Housekeeping Aides Closet (HAC) (JANC1)** .......................... 60 NSF (5.6 NSM)
    
    Provide one per each Medical / Surgical Inpatient Unit.

E. **FA 5: Medical / Surgical Inpatient Unit Staff and Administrative Area:**

1. **Office, Nurse Manager (OFA09)** ........................................... 100 NSF (9.3 NSM)
    
    Provide one per each Nurse Manager FTE position authorized for each Medical / Surgical Inpatient Unit.

    Locate the Nurse Manager office in close proximity to the Nurse Station.

2. **Office, Nurse Supervisor (OFA09)** ........................................ 100 NSF (9.3 NSM)
    
    Provide one per each Nurse Supervisor FTE position authorized for each Medical / Surgical Inpatient Unit.

3. **Workstation, Social Worker (OFA07)** .......................... 56 NSF (5.3 NSM)
    
    Provide one per each Social Worker FTE position authorized for each Medical / Surgical Inpatient Unit.
4. **Workstation, Dietician (OFA07)** .............................................. 56 NSF (5.3 NSM)  
   Provide one per each Dietician FTE position authorized for each Medical / Surgical Inpatient Unit.

5. **Workstation, Ward Clerk (OFA07)** .......................................... 56 NSF (5.3 NSM)  
   Provide one per each Ward Clerk FTE position authorized for each Medical / Surgical Inpatient Unit.

6. **Conference Room (CFR02)** ................................................. 300 NSF (27.9 NSM)  
   Provide one per each Medical / Surgical Inpatient Unit.  
   Allocated NSF accommodates ten conference chairs @ 7.5 NSF each, four 5'-0" x 2'-0" tables at 10 NSF each, one credenza @ 8 NSF, and circulation; total ten people.

7. **Copier / Printer Room (RPR01)** ............................................... 80 NSF (7.5 NSM)  
   Provide one per each Medical / Surgical Inpatient Unit if a Copier / Printer for each Inpatient Unit is authorized.

8. **Lounge, Staff (SL001)** .......................................................... 120 NSF (11.2 NSM)  
   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 60 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

9. **Locker Room, Staff (LR001)** ................................................... 80 NSF (7.5 NSM)  
   Provide one per each Medical / Surgical Inpatient Unit; minimum NSF, provide an additional 20 NSF if the total number of Patient, Airborne Infection Isolation Patient, Protective Environment Patient, and Bariatric Patient Bedrooms in each Medical / Surgical Inpatient Unit is greater than twenty-five.

10. **Toilet, Staff (TNPG1)** .......................................................... 60 NSF (5.6 NSM)  
    Provide two per each Medical / Surgical Inpatient Unit.  
    Allocated NSF accommodates one accessible toilet @ 25 NSF, one wall-hung lavatory @ 12 NSF, accessible clearances, and circulation.

**F. FA 6: Common Support Area:**

1. **Lounge, Patient Discharge (DL001)** ........................................ 200 NSF (18.6 NSM)  
   Provide one if a Patient Discharge Lounge is authorized.

2. **Materials Handling Terminal, Clean (MMRP2)** .............................. 80 NSF (7.5 NSM)  
   Minimum NSF; provide an additional 20 NSF for every increment of two Medical / Surgical Inpatient Units greater than two.  
   Space designated for access to the Clean Materials lift.

3. **Materials Handling Terminal, Soiled (MMRP3)** ............................. 80 NSF (7.5 NSM)  
   Minimum NSF; provide an additional 20 NSF for every increment of two Medical / Surgical Inpatient Units greater than two.  
   Space designated for access to the Soiled Materials lift.

4. **Chute Room, Waste Disposal (UTLC2)** ....................................... 40 NSF (3.8 NSM)  
   Minimum NSF if a Waste Disposal Chute Room is authorized; provide an additional 40 NSF per each Medical / Surgical Inpatient Unit greater than one.
5. **Chute Room, Soiled Linen Disposal (UTLC3)** ..................................40 NSF (3.8 NSM)
   Minimum NSF if a Soiled Linen Disposal Chute Room is authorized; provide an additional 40 NSF per each Medical / Surgical Inpatient Unit greater than one.

6. **Storage, Multipurpose / Specialty (SRE01)** ..........................160 NSF (14.9 NSM)
   Provide one if a Multipurpose / Specialty Storage is authorized.

7. **Storage, Environmental Management Service (SRS01)** ...............60 NSF (5.6 NSM)
   Minimum NSF; provide an additional 60 NSF for every increment of two Medical / Surgical Inpatient Units greater than two.
   This space provided for storing bulk supplies and large equipment used by Environmental Management Services.

8. **Recycling Room (UTR01)** .....................................................80 NSF (7.5 NSM)
   Provide one if a Recycling Room is authorized.

---

**G. FA 7: Common Staff and Administrative Area:**

1. **Workstation, Physician (OFA07)** ...........................................56 NSF (5.3 NSM)
   Provide one per each Physician FTE position authorized.

2. **Workstation, Physician Assistant (OFA07)** ...............................56 NSF (5.3 NSM)
   Provide one per each Physician Assistant FTE position authorized.

3. **Workstation, Nurse Clinician (OFA07)** .....................................56 NSF (5.3 NSM)
   Provide one per each Nurse Clinician FTE position authorized.

4. **Workstation, Consultant (OFA07)** ..........................................56 NSF (5.3 NSM)
   Provide one per each Consultant FTE position authorized.

5. **Workstation, Clinical Researcher (OFA07)** .................................56 NSF (5.3 NSM)
   Provide one per each Clinical Researcher FTE position authorized.

6. **Workstation, Clinical Pharmacist (OFA07)** ..................................56 NSF (5.3 NSM)
   Provide one per each Clinical Pharmacist FTE position authorized.

7. **Workstation, Administration (OFA07)** .......................................56 NSF (5.3 NSM)
   Provide one per each Administrative Clerk FTE position authorized.

---

**H. FA 8: Education Area:**

Spaces listed in this section are to be authorized. Spaces should be reviewed for coordination with SPC Chapter 402 – Educational Facilities.

1. **Office, Residency Program Director (OFA09)** .............................100 NSF (9.3 NSM)
   Provide one if a Medical / Surgical Inpatient Education Program and a Residency Program Director is authorized.

2. **Workstation, Intern / Resident / Fellow (OFA07)** .......................56 NSF (5.3 NSM)
   Provide one per each Intern, Resident, and Fellow FTE position authorized if a Medical / Surgical Inpatient Education Program is authorized.

3. **Workstation, Patient Care Instructor (OFA07)** ...........................56 NSF (5.3 NSM)
   Provide one per each Patient Care Instructor FTE position authorized if a Medical / Surgical Inpatient Education Program is authorized.

4. **Training Room, Resident (CFR02)** ..........................................300 NSF (27.9 NSM)
   Provide one if a Medical / Surgical Inpatient Education Program is authorized.
   Allocated NSF accommodates ten conference chairs @ 7.5 NSF each, four 5'-0" x
2'-0" tables at 10 NSF each, one credenza @ 8 NSF, and circulation; total ten people.

6 PLANNING AND DESIGN CONSIDERATIONS

A. Net-to-department gross factor (NTDG) for Patient Care Unit is 1.65. This number, when multiplied by the programmed Net Square Foot (NSF) area determines the Departmental Gross Square Feet (DGSF).

B. Separation of patient, visitor, and support traffic should be considered to the greatest extent possible, and should be considered in the placement of the bed tower and in connections to ancillary services.

C. Standardization of Bedrooms and modular design should be considered to allow flexibility to adapt to new technologies and respond to changes in patient volumes.

D. Design should accommodate patient privacy and confidentiality in all areas, and in reception and patient care areas in particular. This includes visual and auditory considerations.

E. Where possible, the department should be configured to limit the mix of patient and service functions, and to maintain clear separation of clean and dirty functions to avoid cross contamination.

F. Corridors should be designed to a minimum of 8 feet clear width to accommodate passage of equipment or beds and two stretchers and/or wheelchairs.

G. Administration and support areas should be located and designed to maximize staff and space efficiency, and reduce staff travel distances.

H. Refer to Department of Veterans Affairs (VA) Office of Construction and Facilities Management Technical Information Library (www.cfm.va.gov/til/) for additional technical criteria.

I. Refer to Design Guide for Medical/Surgical Inpatient Units for a detailed discussion of functional and design considerations.
7 FUNCTIONAL RELATIONSHIPS
Relationship of Medical / Surgical Inpatient Units to services listed below:

**TABLE 3: FUNCTIONAL RELATIONSHIP MATRIX**

<table>
<thead>
<tr>
<th>SERVICES</th>
<th>RELATIONSHIP</th>
<th>REASON</th>
</tr>
</thead>
<tbody>
<tr>
<td>ICU</td>
<td>3</td>
<td>G, H</td>
</tr>
<tr>
<td>Patient Prep and Recovery</td>
<td>4</td>
<td>G</td>
</tr>
<tr>
<td>Emergency Department</td>
<td>4</td>
<td>C, G</td>
</tr>
<tr>
<td>Main Entrance</td>
<td>4</td>
<td>H</td>
</tr>
<tr>
<td>Surgery</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Cardiovascular Labs</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Endoscopy</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Ambulatory Surgery/ Minor Procedure</td>
<td>N</td>
<td></td>
</tr>
<tr>
<td>Radiology</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Diagnostic Testing</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Pulmonary Clinic / Testing</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Cardiology Clinic / Testing</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Digestive Disease Clinic/Testing</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Neurology Clinic/Testing</td>
<td>3</td>
<td>C, G</td>
</tr>
<tr>
<td>Ventilator Storage</td>
<td>3</td>
<td>B, G</td>
</tr>
<tr>
<td>Respiratory Therapy</td>
<td>3</td>
<td>G</td>
</tr>
<tr>
<td>Pharmacy</td>
<td>5</td>
<td>B, C, G, I</td>
</tr>
<tr>
<td>Laboratory</td>
<td>5</td>
<td>B, C, G, I</td>
</tr>
<tr>
<td>Social Work / Case Management</td>
<td>1</td>
<td>H</td>
</tr>
<tr>
<td>PT/OT</td>
<td>2, 3</td>
<td>H</td>
</tr>
<tr>
<td>Food Service / Kitchen</td>
<td>5</td>
<td>E</td>
</tr>
<tr>
<td>Sterile Processing Service (SPS)</td>
<td>5</td>
<td>B</td>
</tr>
<tr>
<td>Staff On-Call Bedrooms</td>
<td>4</td>
<td>G</td>
</tr>
<tr>
<td>Linen Storage</td>
<td>5</td>
<td>B</td>
</tr>
<tr>
<td>Waste Management</td>
<td>5, X</td>
<td>B, E, F</td>
</tr>
<tr>
<td>Loading Dock</td>
<td>5</td>
<td>B, D</td>
</tr>
</tbody>
</table>

Legend:

- Relationship:
  1. Adjacent
  2. Close / Same Floor
  3. Close / Different Floor Acceptable
  4. Limited Traffic
  5. Connection Needed
  X. Not Applicable
  Y. Separation Desirable

- Reasons:
  A. Common use of resources
  B. Accessibility of supplies
  C. Urgency of contact
  D. Noise or vibration
  E. Presence of odors or fumes
  F. Contamination hazard
  G. Sequence of work
  H. Patient convenience
  I. Frequent contact
  J. Need for security
  K. Closeness inappropriate
  L. Interference
FUNCTIONAL DIAGRAM

1. Windows at the end of corridors enable way finding and bring natural light into the core.

2. Locate support space doors in cross corridors off stage of main corridors to reduce traffic and limit noise in patient corridors. Access from both corridors.

3. Separate public entry points from patient and service access.

4. Locate nurse station or communication center adjacent to entrance to the unit.

5. Decentralize nurse stations on larger units to increase patient visibility and reduce nurse travel distances.

6. Decentralize support functions to reduce hunt and gathering by staff.

7. Locate staff support close to unit but away from patient rooms for staff respite and to reduce noise on unit.

8. Suggested locations for patient isolation room.

LEGEND

- Patient Room
- Clinical Support Area
- Staff Support Area
- Public/Waiting Area
- Staff/Service
- Visitor
- Inpatient
- Visitors Elevators
- Patient & Service Elevators