

## 15.0 Day Surgery/Procedure Unit

### 15.1 Introduction

#### 15.1.1 Description

A Day Surgery/Procedure Unit is where operative or endoscopic procedures are performed and admission, procedure and discharge occurs on the same date. It comprises one or more Operating Rooms, with provision to deliver anesthesia and accommodation for the immediate post-operative recovery of day patients.

The range of procedures that may be undertaken in a Day Surgery/Procedures Unit may include:

- Surgical procedures, particularly ENT, Dental, Plastic Surgery, Ophthalmology
- Endoscopy – gastrointestinal, respiratory, urology
- Electroconvulsive Therapy (ECT) for mental health inpatients
- Day Medical Procedures including intravenous infusions and minor treatments.

### 15.2 Planning

#### 15.2.1 Operational Models

The range of options for a Day Surgery/Procedure Unit may include:

- A stand-alone center, fully self-contained
- A dedicated fully self-contained unit within a hospital
- A Unit collocated with a specialist clinical service such as Gastroenterology or Respiratory Medicine, within an acute hospital
- A Unit collocated with the Operating Unit with shared facilities.

If the facility is part of an Acute Care Hospital or other Medical Facility, services can be shared as appropriate to minimize duplication.

#### 15.2.2 Functional Areas

The Day Surgery/Procedure Unit may consist of a number of Functional Zones:

- Entry/Reception/Administration and Waiting areas
- Perioperative Area (provides for admission on the day of surgery), including patient change areas, toilet and lockers
- Procedural Area
- Recovery Area (this may also include extended recovery areas where patients are discharged within 24-hours)
- Discharge Lounge
- Staff Amenities
- Day Medical Unit (if collocated).

##### Entry/Reception/Waiting Areas

A covered entrance for picking up patients after surgery shall be provided. The Entry may be a shared Outpatient Facility and shall include:

- Reception and information counter or desk
- Waiting areas that allows for the separation of pediatric and adult patients, if organized Pediatric Services are provided
- Convenient access to wheelchair storage
- Convenient access to public toilet facilities
- Convenient access to public telephones.

### Administrative Areas

General and individual offices shall be provided as required for business transactions, records and administrative and professional staff. These shall be separate from public and patient areas with provision for confidentiality of records.

Enclosed office spaces shall be provided for:

- Administration and consultation
- Manager/Nurse Unit Manager as required.

Offices are to comply with Standard Components.

### Clinical Records

A secure room shall be provided with provision for storage, recording and retrieval of clinical records. If geographically appropriate, and if the Day Procedures Unit is part of, or attached to, an acute hospital, the general clinical records facility might be used in lieu of a dedicated and separate room.

### Holding Area

A Holding Area may be provided where gowned patients enter after changing and wait for their procedure. Additional holding areas may be provided for seated patients before an operation or procedure. Such an area must have access to nurse call services.

The Pre-operative Holding area shall be provided with the following minimum requirements as appropriate to the proposed service:

- A patient trolley or patient seating
- Privacy screening
- Handbasins with liquid soap and paper towel fittings
- Patient nurse call/emergency call buttons with pendant handsets and indicators
- Medical gases including oxygen and suction and power outlets to each bed.

### Operating/Procedures Rooms

The design of the Operating/Procedure Rooms must allow for adequate space, ready access, free movement and demarcation of sterile and non-sterile zones. Operating Rooms are to comply with Standard Components.

### Operating Rooms for Endoscopy

The number and operation of Operating Rooms for Endoscopy shall be as determined by the Service Plan.

Room size may vary, dependent upon:

- The use of video equipment
- Electrosurgical laser treatment
- Fluoroscopy
- Multiple endoscope activity
- Multiple observers
- The use of X-Ray (image intensifying).

Where basic endoscopy is to be performed, the room size shall be no smaller than 36m<sup>2</sup>. Where video equipment is used the room size should be 42m<sup>2</sup>. Larger sizes, where possible, are recommended for flexibility and future developments. The ceiling height shall be 3000mm.

Operating Rooms for Endoscopy shall be fitted out as for a Minor Operating Room, for example, it will be suitable for general anesthetic with appropriate medical gases, power, lighting, air-conditioning and ventilation. Staff assistance call shall be provided. Consideration shall also be given to the special requirements of laser equipment.

A clinical scrub up basin shall be provided outside the entrance to the Operating Rooms for Endoscopy.

Direct access to the Clean-up Room is recommended.

Impervious wall, floor and ceiling treatments are essential for ease of cleaning.

#### Patient Change Areas

Separate areas shall be provided where outpatients can change from street clothing into hospital gowns and be prepared for surgery, convenient to the Waiting Area. The patient change areas shall include Waiting Rooms and lockers. Design of Change Areas is to facilitate management of patient lockers, patient property and keys.

#### Perioperative Unit

Where Day Procedures (day-only surgical service) are provided within the same area as Inpatient Acute Surgery (shared facility), the design shall consider the need to separate the two distinct functions at the incoming side. The design shall also preclude unrelated traffic from the Day Procedures Unit and the Operating Unit.

#### Preparation Room

A Preparation Room may be required for patients undergoing certain procedures such as Endoscopy or Ophthalmology.

If included, the Preparation Room should include:

- Hand basin – Clinical
- Bench, and cupboards for setting up of procedures
- Adequate space for procedures equipment trolleys
- Examination couch
- Patient privacy screening.

#### Recovery Areas

In larger facilities it is often considered desirable to have a three-stage recovery area. The first stage involves intensive supervision, the second stage has changing facilities in more casual surroundings and in the third stage, the patient is fully mobile and is awaiting discharge. Supervision of the patient is vital at each stage.

If Pediatric Surgery is part of the function, the Recovery Room shall provide for the needs of parents/attendants.

Recovery areas will require:

- Staff station with a centrally located resuscitation trolley
- Linen Bay
- Clean Utility
- Dirty Utility
- Store room.

#### Stage 1 – Recovery

The number of bed/trolley spaces in the Stage 1 Recovery Area will be dependent upon the nature of surgery or procedures performed as outlined in the Operational Policy and the proposed throughput. As a minimum, two bed/trolley spaces per Operating Room shall be provided. High turnover procedures may require a higher ratio of bed/trolley spaces per Operating Room.

#### Stage 2 – Recovery

Stage 2 Recovery Room may be provided as required to accommodate:

- Patients who have regained consciousness after anesthesia but require further observation
- Patients who have undergone procedures with local anesthetic.
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The patient is required to remain under observation until ready for discharge. Patients in this area may recover in trolleys or recliner chairs; each recovery bay should be able to accommodate either trolley or chair. External windows are to be provided in Stage 2 Recovery.

A ratio of three Trolley/Chair Bays to each Operating/Procedure room is considered appropriate.

#### Stage 3 – Recovery Lounge

The Stage 3 Recovery Lounge is also referred to as a Discharge Lounge. Patients are ambulant, dressed and may await discharge in comfortable chairs. The lounge will require access to patient refreshment facilities and patient toilets.

Seating should be comfortable recliner lounges. A ratio of three Chair Bays to each Operating/Procedure room is considered appropriate.

### 15.2.3 Functional Relationships

#### External

The Day Surgery/Procedure Unit will have functional relationships with the following units

- Operating Suite
- Pre-Admission Clinic
- Transit Lounge.

#### Ambulance Access

A discrete pick-up point, preferably under cover, shall be provided for the transfer of patients to and from the Day Surgery/Procedure Unit.

#### Car Parking

Adequate car parking facilities with convenient access needs to be provided.

#### Internal

Within the Unit, key functional relationships will include:

- Unidirectional patient flow from arrival at Reception, through holding, Procedure Rooms, Recovery rooms, then to the Perioperative Unit, Inpatient Unit, Lounge areas and discharge to home
- Separation of clean and dirty traffic flows
- Staff visibility of patient areas for patient supervision and safety.

## 15.3 Design

### 15.3.1 General

Pre-operative and post-operative patient facilities can be located together as required.

### 15.3.2 *Environmental Considerations*

#### Acoustics

Design should consider reduction of the ambient noise level within the unit, particularly waiting areas.

Acoustic privacy treatment will be required to:

- Consulting/Interview Rooms
- Operating/Procedure Rooms.

#### Natural Light

The design of the unit should incorporate external views and natural light as far as possible, particularly to Waiting Areas, Pre-operative and Recovery areas.

It is recommended that external views and natural light are provided in staff areas such as Staff Rooms and Offices and areas where staff are confined to one location e.g. Reception, Clean-up Rooms.

When external views and natural light are provided in patient areas, care must be taken to minimize glare and ensure privacy is not compromised. Sun penetration should be controlled to exclude glare and heat gain or loss.

If Procedure Rooms include external windows, provision of controlled level of lighting during procedures will be required and dimmable lighting will be required within the room.

### 15.3.3 *Safety and Security*

Security measures will include the following:

- Controlled access to Procedural and staff areas
- Security and safe storage of drugs.

### 15.3.4 *Building Services Requirements*

#### Radiation Shielding

Radiation shielding to recommended safety standards will be required in all procedure rooms where imaging will occur.

## 15.4 Components of the Unit

The Day Surgery/Procedure Unit will contain a combination of Standard Components and Non-Standard Components. Provide Standard Components to comply with details in the Standard Components described in these Guidelines. Refer also to Standard Components Room Data Sheets and Room Layout Sheets.

### 15.4.1 *Non-Standard Components*

#### Endoscope Store

##### Description and Function

The Endoscope Store may be provided to store a variety of cleaned and decontaminated and sterile endoscopes, ready to use.

##### Location and Relationships

The endoscope store will be located immediately adjacent to the endoscope processing room.

##### Considerations

Endoscopes will be stored in appropriately ventilated cabinets. Air supply to this room should be HEPA filtered to prevent contamination of clean endoscopes.

## 15.5 Schedule of Accommodation

### Typical Day Surgery/ Procedure Units at Levels 3 to 6

The schedule will need to be amended in accordance with the requirements of the Service Plan. Provision of Offices, Workstations and support areas will be dependent on the Operational Policy and service demand and may vary from the Schedule of Accommodation.

ROOM/SPACE	Standard Component				Level 3/4 Qty x m <sup>2</sup>			Level 5/6 Qty x m <sup>2</sup>			Remarks
Reception/Pre-op Holding Areas											
Reception/Clerical	RECL-10-SJ Similar				1	x	10	1	x	15	May include space for porter
Waiting – Male/Female	WAIT-10-SJ				2	x	10	2	x	15	Separate areas for female waiting
Waiting – Family	WAIT-20-SJ Similar				1	x	25	1	x	50	
Meeting Room – Small	MEET-9-SJ Similar							1	x	12	Interviews
Patient Bay – Holding	PBTR-H-10-SJ				4	x	10	16	x	10	Provide a minimum of one per Operating/Procedure Room
Office – Write-up Bay	OFF-WIS-SJ				1	x	6	1	x	12	Staff work area based on 3m <sup>2</sup> per person
Staff Station	SSTN-5-SJ				1	x	5	1	x	5	
Bay – Handwashing, Type B	BHWS-B-SJ				1	x	1	4	x	1	1 per 4 patient bays
Bay – Linen	BLIN-SJ				1	x	2	1	x	2	1 per 16 patient bays
Bay – Blanket/Fluid Warmer	BBW-SJ				1	x	1	1	x	1	As required
Clean Utility – Sub	CLUR-8-SJ				1	x	8	1	x	8	
Dirty Utility – Sub	DTUR-S-SJ				shared			1	x	8	
Store – Files	STFS-10-SJ				1	x	8	1	x	8	Include recycle bin
Operating Rooms Areas											
					4 Rooms			16 Rooms			
Anaesthetic Induction Room	ANIN-SJ				2	x	15	12	x	15	Optional; provide one per Operating Room; Optional for procedures ORs
Operating Room – General (Short Case)	ORGN-SJ				2	x	42	6	x	42	High turnover cases
Operating Room – General	ORGN-SJ							6	x	42	
Operating Room – Minor	ORMS-SJ				2	x	42	2	x	42	Endoscopy; May be sized at 36m <sup>2</sup>
Operating Room – Emergency	ORGN-SJ					x	42	2	x	42	Urgent procedures
Scrub Up	SCRB-6-SJ				4	x	6	16	x	6	One per operating/procedure room
Exit Bay					4	x	8	16	x	8	One per operating/procedure room
Operating Rooms Support Areas											
Audio-Visual Room	AUDV-SJ							1	x	10	Optional
Anaesthetic Store	ANST-SJ				1	x	10	1	x	40	2.5m <sup>2</sup> per operating room
Anaesthetic Workroom and Biomedical Equipment	ANWM-SJ				1	x	10	1	x	15	
Bay – Blanket/Fluid Warmer	BBW-SJ							2	x	1	
Bay – Linen	BLIN-SJ				1	x	2	2	x	2	One per eight operating rooms
Bay – Mobile Equipment	BMEQ-4-SJ Similar				4	x	2	16	x	2	One per operating room
Bay – Pathology	BPATH-SJ				1	x	1	1	x	2	Specimen holding and despatch
Blood Store	BLST-SJ				1	x	2	1	x	2	
Cleaner's Room	CLRM-5-SJ				1	x	5	2	x	5	One per eight operating rooms
Clean-Up Room	CLUP-7-SJ				4	x	15	16	x	15	One per operating/procedure room
Disposal Room	DISP-8-SJ				1	x	8	2	x	8	
Flash Steriliser	FST-2-SJ				1	x	2	1	x	2	Depends on operational policies
Office – Write-up Bay	OFF-WI-1-SJ Similar				1	x	3	1	x	6	
Set-up Room	SETUP-8-SJ				2	x	8	4	x	8	Optional; Depends on operational policy

ROOM/SPACE	Standard Component				Level 3/4 Qty x m²			Level 5/6 Qty x m²			Remarks
Store – Equipment, Major	STEQ-16-SJ Similar				1	x	20	2	x	40	5.0m² per operating room
Store – Equipment, Minor	STEQ-16-SJ Similar				1	x	15	2	x	30	3.75m² per operating room
Store – Non-Sterile/Deboxing	STGN-20-SJ Similar				1	x	10	1	x	40	2.5m² per operating room
Store – Sterile Stock	STSS-12-SJ				1	x	40	2	x	80	Provide 10m² per operating room
Recovery Area											
Patient Bay-Recovery Stage 1	PBTR-RS1-SJ				10	x	12	40	x	12	Two bays per operating room; Three bays per short case/endoscopy room; May be divided into halls
Bay – Blanket/Fluid Warmer	BBW-SJ				1	x	1	1	x	1	As required
Bay – Handwashing, Type A	BHWS-A-SJ				2	x	1	10	x	1	One per four recovery bays
Bay – Linen	BLIN-SJ				1	x	2	2	x	2	One per 20 recovery bays
Bay – Resuscitation Trolley	BRES-SJ				1	x	1.5	1	x	1.5	
Clean Utility	CLUR-12-SJ				1	x	12	2	x	12	
Dirty Utility	DTUR-12-SJ				1	x	12	2	x	12	
Staff Station	SSTN-14-SJ Similar				1	x	14	2	x	20	
Store – General	STGN-12-SJ Similar				1	x	8	1	x	12	
Perioperative Areas											
					For 4 ORs			For 16 ORs			
Admissions/Reception											
Reception/Clerical	RECL-10-SJ				1	x	10	1	x	10	
Office – Clerical Support	OFF-2P-SJ							1	x	12	
Waiting – Male/Female	WAIT-10-SJ Similar				2	x	10	2	x	15	Separate female waiting
Waiting – Family	WAIT-20-SJ				1	x	20	1	x	30	
Toilet – Public	WCPU-3-SJ				2	x	3	2	x	3	May share general public amenities
Toilet – Accessible	WCAC-SJ				1	x	6	2	x	6	May share general public amenities
Pre-op Area											
Change – Patient (Male/Female)	CHPT-12-SJ Similar				2	x	12	2	x	24	Includes toilets, showers and lockers
Waiting – Changed Patient	WAIT-10-SJ Similar				2	x	10	2	x	25	Separate male and female areas
Anteroom	ANRM-SJ							1	x	6	For Negative Pressure Isolation Room
Patient Bay – Holding	PBTR-H-10-SJ										Provided in OR area
Patient Bay – Holding, Enclosed, Isolation	PBTR-H-E-12-SJ							1	x	12	Negative Pressure Isolation; As required by service plan
Consult Room	CONS-SJ				2	x	14	6	x	14	
Bay – Handwashing, Type B	BHWS-B-SJ				2	x	1	2	x	1	Accessible to changed waiting areas
Bay – Linen	BLIN-SJ				1	x	2	1	x	2	
Bay – Resuscitation Trolley	BRES-SJ				1	x	1.5	1	x	1.5	
Clean Utility	CLUR-8-SJ CLUR-12-SJ				1	x	8	1	x	12	Includes medications
Ensuite – Standard	ENS-ST-SJ				1	x	5	1	x	5	For enclosed Isolation Bay
Toilet – Patient	WCPT-SJ				1	x	4	2	x	4	
Recovery Areas											
Patient Bay – Recovery, Stage 2	PBTR-H-10-SJ Similar				6	x	10	24	x	10	2 bays per short case/endoscopy ORs; 1 bay per general ORs
Lounge – Recovery, Stage 3	LNPT-RS2-SJ				8		6	32	x	6	3 chairs per short case/endoscopy OR; 1 chair per general OR
Staff Station	SSTN-14-SJ Similar				1	x	14	1	x	20	
Bay – Beverage	BBEV-OP-SJ				1	x	4	1	x	4	
Bay – Blanket/Fluid Warmer	BBW-SJ				1	x	1	1	x	1	As required
Bay – Handwashing, Type A	BHWS-A-SJ							15	x	1	1 per 4 bed bays; 1 per 4 chairs
Bay – Linen	BLIN-SJ				1	x	2	2	x	2	
Bay – Pathology	BPATH-SJ				1	x	1	1	x	1	



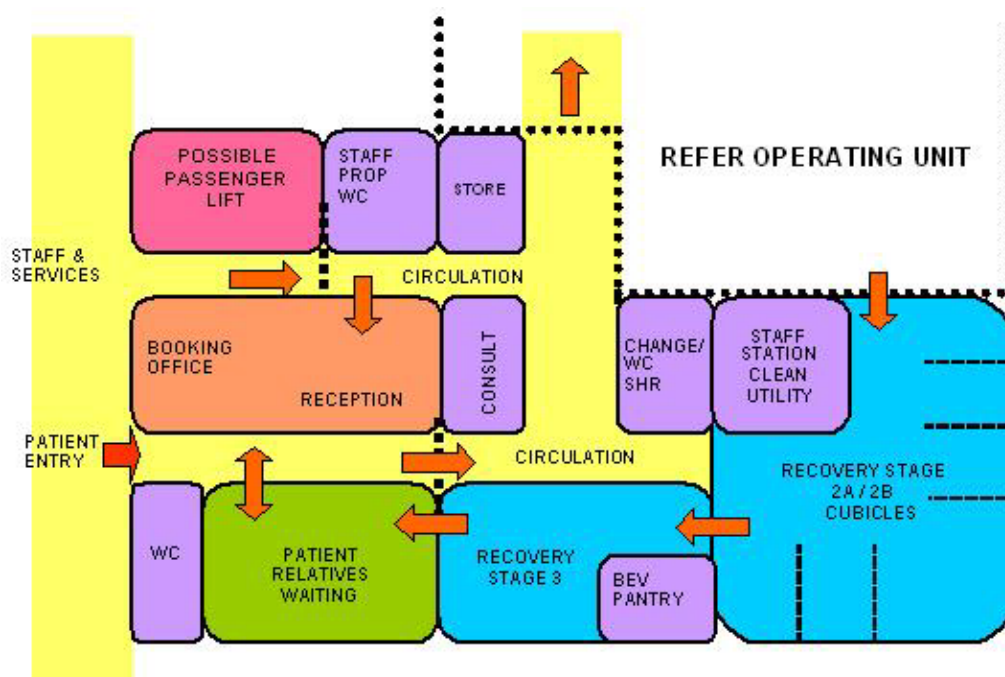
ROOM/SPACE	Standard Component				Level 3/4 Qty x m <sup>2</sup>			Level 5/6 Qty x m <sup>2</sup>			Remarks
Bay – Resuscitation Trolley	BRES-SJ				1	x	1.5	1	x	1.5	
Cleaner's Room	CLRM-5-SJ							1	x	5	May share with adjacent areas
Clean Utility	CLUR-8-SJ CLUR-12-SJ				1	x	8	1	x	12	
Dirty Utility	DTUR-12-SJ				1	x	8	1	x	12	
Disposal Room	DISP-8-SJ							1	x	8	
Store – Equipment	STEQ-10-SJ							1	x	10	
Store – General	STGN-8-SJ Similar				1	x	10	1	x	10	
<b>Staff Areas: Shared</b>											
Change – Staff, Male/Female	CHST-20-SJ Similar				2	x	20	2	x	80	Size according to staffing numbers
Meeting Room – Interviews	MEET-9-SJ				1	x	9	1	x	9	
Meeting Room – Medium/Large	MEET-L-30-SJ							1	x	30	Training/Education/Meetings
Office – Manager	OFF-S9-SJ Similar				1	x	12	1	x	12	Nurse Manager
Office – Single Person	OFF-S9-SJ				1	x	9	2	x	9	Nurse Consultant/Medical Officers
Office – 2-Person Shared	OFF-2P-SJ				1	x	12	2	x	12	Nurse Educators/Clerical support
Staff Room	SRM-25-SJ				1	x	25	2	x	40	May have separate zones for staff
Toilet – Staff	WCST-SJ				1	x	3	2	x	3	In addition to toilets in Change rooms
<b>Net Department Total</b>					<b>1230.5</b>			<b>3945.5</b>			
<b>Circulation %</b>					<b>40</b>			<b>40</b>			
<b>Grand Total</b>					<b>1722.7</b>			<b>5523.7</b>			

**Notes:**

- Areas noted in Schedules of Accommodation take precedence over all other areas noted in the FPU
- Rooms indicated in the schedule reflect the typical arrangement according to the Role Delineation
- Exact requirements for room quantities and sizes will reflect Key Planning Units identified in the Service Plan and the Operational Policies of the Unit
- Room sizes indicated should be viewed as a minimum requirement; variations are acceptable to reflect the needs of individual Unit
- Office areas are to be provided according to the Unit role delineation and staffing establishment; Executives and Managers may be responsible for more than one area but should have only one office assigned within the campus
- Staff and support rooms may be shared between Functional Planning Units dependent on location and accessibility to each unit and may provide scope to reduce duplication of facilities.



## 15.6 Functional Relationship Diagram



## 15.7 Further Reading

- Australasian Health Infrastructure Alliance (Aus.). 'Australasian Health Facility Guidelines'. Retrieved from website: [www.healthfacilityguidelines.co.au](http://www.healthfacilityguidelines.co.au) 2014
- Australasian Health Facility Guidelines (Aus.). 'Part B – Health Facility Briefing and Planning; 270 Day Surgery/Procedure Unit Revision 4' 2010. Retrieved from website: [http://www.healthfacilityguidelines.net.au/AusHFG\\_Documents/Guidelines/Archive/AusHFG%20Complete%20Version%204.pdf](http://www.healthfacilityguidelines.net.au/AusHFG_Documents/Guidelines/Archive/AusHFG%20Complete%20Version%204.pdf) 2014
- Estates and Facilities Division of the Department of Health (UK). 'Health Building Note 10–02: Day Surgery Facilities' 2007. Retrieved from website: [https://www.gov.uk/government/uploads/system/uploads/attachment\\_data/file/142696/HBN\\_10-02.pdf](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/142696/HBN_10-02.pdf) 2014
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- The Facility Guidelines Institute (US). 'Guidelines for Design and Construction of Health Care Facilities' 2010 Edition. Retrieved from website: [www.fgiguidelines.org](http://www.fgiguidelines.org) 2014.