



ACT
Government

**Canberra Health
Services**

Model of Service



Cardiology in
Building 5

Division of
Medicine

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Approvals

Position	Name	Signature	Date
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1. Introduction

This Model of Service (MoS) for Cardiology in Building 5 sets out the evidence-based framework for describing the right care, at the right time, by the right person / team and in the right location. A clearly defined and articulated MoS helps ensure that all health professionals are 'viewing the same picture', working towards common goals and evaluating performance on an agreed basis.

This MoS:

- outlines the principles, benefits and challenges of each of the Cardiology Building 5 Models of Care,
- provides the basis for how we deliver evidence-based care; and
- contains information of patient/client flows (the areas from where patients enter and exit the service) and service co-ordination.

The document is not intended to provide specific operational details regarding day-to-day activities. This detail sits within the operational manuals, policies, procedures, and guidelines.

2. Principles

Our vision and role reflect what we want our health service to stand for, to be known and deliver every day. The vision and role are more than just words - they are our promise to each other, to our patients and their families and to the community. We all have a role to play in delivering on the promise:

- Vision: Creating exceptional health care together
- Role: To be a health service that is trusted by our community.

Our values:

- We are reliable - we always do what we say we will do.
- We are progressive - we embrace innovation.
- We are respectful - we value everyone.
- We are kind - we make everyone feel welcome and safe.

CHS is committed to fostering an environment of inclusion, respect, and diversity. We recognise the uniqueness of every individual, regardless of their race, ethnicity, gender, age, sexual orientation, religion, disability, or socio-economic background. Together, we aim to adopt informed, flexible and adaptive practices which foster a culture of respectful and therapeutic relationships.

Our **Strategic Plan** sets out our path forward as an organisation for the next three years. It is values driven—it outlines how we will deliver against our vision of 'creating exceptional health care together' for our consumers, their families, and carers.

Our **Partnering with Consumers Framework** provides clear principles for a shared understanding of our approach and what is required from all team members for effective partnerships with consumers and carers in line with our organisational values. The principles have been developed in collaboration with our consumer and carer organisations and underpin this Framework.

In addition to the organisation values, this MoS is founded on the following service principles. They will guide our work and how we deliver services for patients/clients and families accessing Cardiology care in Building 5.

Our service principles:

Stream Models of Care – Cardiology Building 5 Models of Care are underpinned by streamlined patient pathways. This enables timely access to appropriate care and treatment in the most suitable environment.

Shared Organisational Goals - The organisation has shared goals and responsibility for achieving timely access to cardiology services including door-to-balloon times for STEMI patients of < 60 minutes and achieving Relative Stay Index Targets

Clinical Leadership and Expertise - The Cardiology Leadership team support clinicians through effective communication, clinical expertise, role modelling and commitment to excellence.

Access to treatment – Cardiology in Building 5 provides timely, accessible and appropriate health services to people with acute cardiac illness of varying urgency and complexity. Cardiology in Building 5 operates 24 hours a day, 365 days a year.

Education and Training – Cardiology has a strong focus on education, training and research programs through structured positions and portfolios. Cardiology in Building 5 contributes to teaching students from the:

- Australian National University (ANU) Medical School,
- Australian Catholic University,
- Charles Sturt University,
- Flinders University,
- University of Canberra; and
- Canberra Institute of Technology

Evidence informed best practice and continuous quality evaluation –

Cardiology uses data, evidence, research and consumer feedback to inform best practice and quality evaluation.

Supported decision making – Cardiology promotes autonomy, awareness of rights and responsibilities, equal partners within the multidisciplinary care team (MDT), patient (and where possible their family members and carers) to be actively involved in their own care.

Embracing diversity and accessibility - Cardiology fosters a culture that values respectful and therapeutic relationships, acknowledges the diversity and complexity of people accessing services through the adoption of informed, flexible, and adaptive practices including acknowledging gender identity and preferences of our LGBTIQ+ community.

3. Description of Service

The Canberra Health Services (CHS) delivers tertiary cardiology and cardiac intervention services to an estimated 620,000 individuals living in the ACT and surrounding Southern NSW Local Health Districts. Consumers accessing Cardiology in Building 5 include adults of all ages, acuity, frailty, and disability, who may present for diagnosis and treatment for a range of acute and chronic cardiac conditions.

Cardiology in Building 5 is comprised of the Acute Cardiac Care Unit (ACCU) and Cardiac Catheter Lab (CCL) and some outpatient services.

ACCU provides care for patients with a variety of cardiac conditions including acute coronary syndrome, valvular heart disease, heart failure and cardiac arrhythmias.

The CCL and Cardiac Day Unit provides diagnostic studies, interventional treatments, electrophysiology studies, catheter ablations, transcatheter aortic valve implantation (TAVI) and insertion of cardiac implantable electronic devices (pacemakers/defibrillators) for patients with ST Elevation Myocardial Infarction (STEMI's), coronary artery disease, abnormal heart rhythms and structural heart disease.

Outpatient Cardiology Services operate within Canberra Hospital Building 1, Building 5 and Building 15.

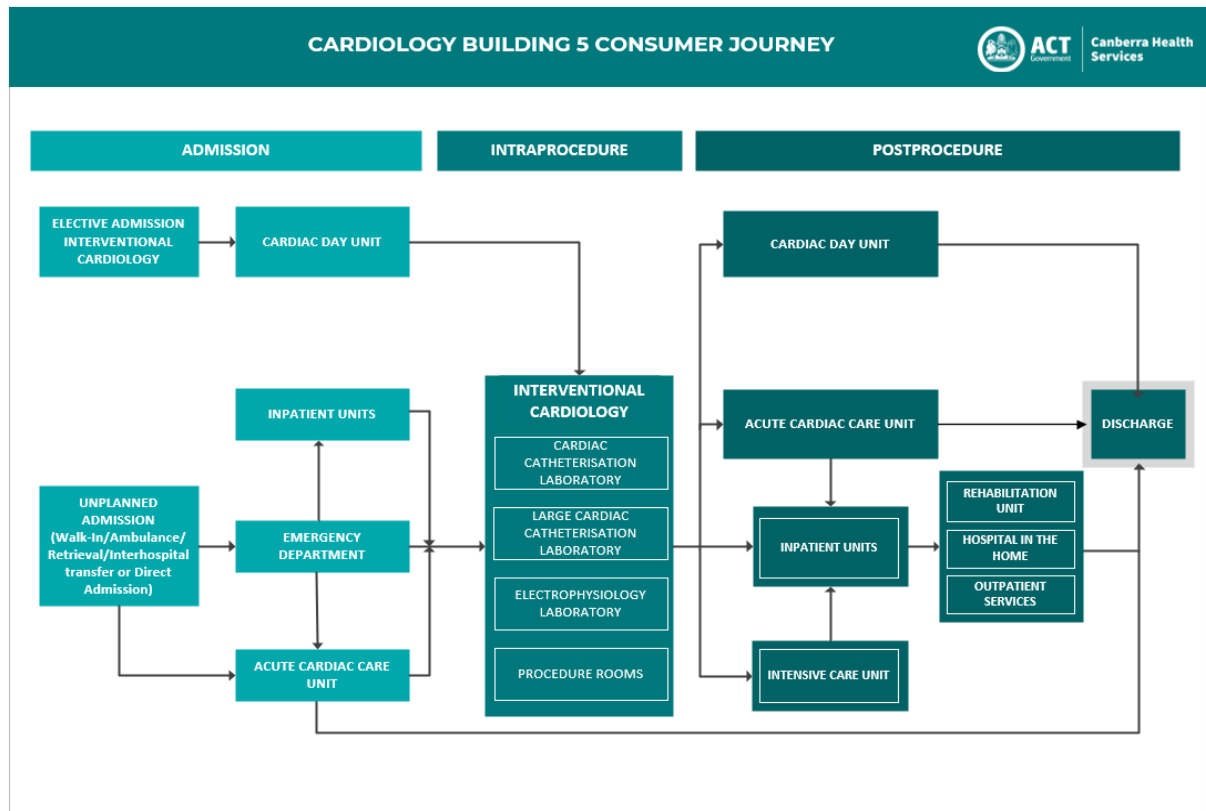
4. Models of Care and Patient Journey

The Cardiology in Building 5 MoS provides a care and acuity streaming model to ensure the ideal patient journey and subsequent discharge or transfer. This streaming model allows early assessment of people presenting to CHS and moves them to a specific care pathway depending on their level of acuity, age, intended length of stay and considers any specific individual needs. Streamlined pathways enable patients to receive appropriate care and treatment in the most suitable environment. Some patients will undertake a separate journey through either the ACCU or CCL.

Patients may require the services of both clinical units during an episode of care. Co-location of these Cardiology units in Building 5 facilitates transfers, monitoring and timely interventions for these individuals. Figure 1 provides a visual of the possible cardiac admission related care pathways.

The STEMI pathway for ACT and NSW residents is available in the Acute Coronary Syndrome Assessment Pathway, accessible on the [CHS Health Hub](#).

Figure 1: Cardiology in Building 5 Consumer Journey



4.1 Acute Cardiac Care Unit

Model of Care Principles	
Description	<p>The ACCU provides cardiac services in a dedicated unit for patients with a variety of cardiac conditions including acute coronary syndrome, heart failure and cardiac arrhythmias. Patients may be admitted to ACCU via the Emergency Department (ED), CCL, an inpatient ward/unit or directly admitted from referral hospitals.</p> <p>A procedure room fitted out with cardiac stress testing equipment is available onsite to facilitate early diagnosis of coronary artery disease.</p>
Principles	<ul style="list-style-type: none"> • Specialist medical and nursing care for acute and chronic heart conditions. • Monitoring of cardiac rhythm disorders. • Evidence based care from the multidisciplinary team. • Criteria led discharge where indicated. • Timely access to diagnostic and/or interventional procedures. • Timely referral to outpatient cardiac rehabilitation services, either at CHS or referral health services near the patient's home. • Early discharge planning.
Benefits	<ul style="list-style-type: none"> • Patient focused care. • Positive patient experience. • Positive staff experience. • Reduced clinical complications and adverse outcomes.

Model of Care Principles

Performance Indicators

- Consumer and staff feedback.
- Relative Stay Index.
- Adverse events.
- Hospital acquired complications.
- Unplanned readmission to any hospital.
- Unplanned return to CCL.

4.2 Short Stay Cardiac Unit

Model of Care Principles

Description

- Short Stay Cardiac Unit has 4 dedicated trolleys located in ACCU.
- Used for observation and treatment of patients with low to moderate risk cardiac conditions not requiring admission to ACCU.
 - These cardiac conditions include, but are not limited to:
 - Patients requiring short term cardiac monitoring.
 - Post procedural patients for next day discharge or transfer to another ward or hospital.
 - ED patients with chest pain or other cardiac conditions.
 - Not suitable for a length of stay longer than 24 hours.
 - Patients with LOS longer than 24hours will need to be transferred to an appropriate inpatient unit (including ACCU).
 - Patients may be transferred from ED, CCL or inpatient wards.
 - Operates 24 hours a day and is staffed by medical, nursing and support staff.

Model of Care Principles

Principles	<ul style="list-style-type: none"> • Patients who require cardiac monitoring. • Timely access to cardiac investigations. • Early transfer out of ED. • Safe and early discharge.
Benefits	<ul style="list-style-type: none"> • Improved NEAT targets for ED. • Decreased use of inpatient beds. • Increased patient satisfaction. • Positive staff experience.
Performance Indicators	<ul style="list-style-type: none"> • Consumer and staff feedback. • Relative Stay Index. • Adverse events. • Hospital acquired complications.

4.3 Interventional Cardiology

Model of Care Principles

Description	<p>Interventional Cardiology offers:</p> <ul style="list-style-type: none"> • Diagnostic and interventional procedures for patients with coronary artery disease. This may include ST Elevation Myocardial Infarction (STEMI), non-STEMI (NSTEMI), acute coronary syndrome and stable angina. • Diagnostic procedures that provide information about pressures in the cardiopulmonary vasculature to assist in the diagnosis of conditions such as pulmonary hypertension and valvular disease. <p>STEMI Management</p> <p>Individuals presenting to the ED as part of the ACT and NSW STEMI pathway will arrive at CHS and go directly to the CCL or await further transfer to the CCL for Primary Percutaneous</p>
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Coronary Intervention (PPCI). PPCI is considered time critical. PPCI is recommended when the time from first medical contact to balloon inflation is anticipated to be less than 90 minutes; otherwise, the patient is offered fibrinolysis (mostly from NSW referral hospitals or NSW Ambulance).

Diagnostic Cardiac Catheterisation and Right Heart

Catheterisation:

- Used to diagnose coronary artery disease, valvular disease and/or pulmonary hypertension.
- Patients can be admitted as elective patients into the cardiac day unit as a day only patient.
- Patients can also be transferred from an inpatient unit.
- Patients may proceed to an interventional procedure as clinically indicated (i.e., STEMI).

Percutaneous Coronary Intervention

- Used to treat coronary artery disease by widening narrowed coronary arteries using balloons and/or stents.
- May also require the use of vascular imaging technology such as Intravascular Ultrasound (IVUS) and Optical Coherence Tomography (OCT)
- Adjunct therapies including rotational atherectomy and intravascular lithotripsy may be performed intraprocedure.
- Can be an elective or urgent procedure.
- Elective patients can be admitted to the cardiac day unit either as a day case or as an overnight stay. Patients staying overnight will be transferred to the ACCU post procedure.
- Urgent patients are transferred from ED, ACCU or other inpatient units.

Model of Care Principles

Principles	<ul style="list-style-type: none"> • Care based on the Acute Coronary Syndromes Clinical Care Standards. • Access to specialist acute cardiac medical and nursing care. • Chest pain to balloon time < 90 minutes. • Door to balloon time < 60 minutes. • Same day procedures where indicated. • Improve patient outcomes. • Improve quality of life
Benefits	<ul style="list-style-type: none"> • Patient centred care. • Timely access to CCL. • Improved morbidity and mortality. • Reduced clinical complications and adverse outcomes. • Positive staff experience.
Performance Indicators	<ul style="list-style-type: none"> • Consumer and staff feedback. • Adverse events. • Hospital acquired complication. • Unplanned admission/readmission to any hospital. • Unplanned return to CCL. • Unplanned transfer to operating theatres.

4.4 Electrophysiology

Model of Care Principles	
Description	<p>Cardiac electrophysiology provides diagnosis and treatment of the heart's electrical system. Cardiac arrhythmias can be diagnosed and treated in several different ways. Patients undergoing electrophysiology procedures may be same day discharge or an overnight stay depending on the complexity of the procedure.</p> <p>Electrophysiology includes:</p> <p>Electrophysiology studies - diagnose abnormalities of the conduction pathway of the heart (cardiac arrhythmias). Patients may be referred for Radiofrequency Ablation (RFA), Cryoablation, Elective Cardioversion or insertion of Cardiac Implantable Electronic Device (CIED) where clinically indicated.</p> <p>Radiofrequency Ablation - used to treat cardiac arrhythmias through the application of radiofrequency energy to the abnormal cardiac cells where the cardiac arrhythmia originates.</p> <p>Cryoablation - used to treat cardiac arrhythmias by freezing abnormal cardiac cells where the cardiac arrhythmia originates.</p> <p>Pulsed Field Ablation - Uses high voltage electric pulses from a catheter delivered electrode to the abnormal cardiac cells where the arrhythmia originates.</p> <p>Elective Cardioversion - synchronised defibrillation to interrupt an arrhythmia and return the heart to sinus rhythm.</p> <p>Cardiac Implantable Electronic Devices - Includes implantable loop recorders (monitoring of heart rhythm), pacemakers (treatment of bradyarrhythmia), and defibrillators (treatment of tachyarrhythmias).</p>

Model of Care Principles

Principles	<ul style="list-style-type: none"> • Care based on Cardiac Society of Australia and New Zealand Practice Guidelines. • Diagnosis and treatment of cardiac arrhythmias. • Access to specialist acute cardiac medical and nursing care. • Improve patient quality of life.
Benefits	<ul style="list-style-type: none"> • Patient centred care. • Timely access to CCL. • Improved morbidity and mortality. • Reduced clinical complications and adverse outcomes. • Positive staff experience.
Performance Indicators	<ul style="list-style-type: none"> • Consumer and staff feedback. • Adverse events. • Hospital acquired complication. • Unplanned admission/readmission to any hospital. • Unplanned return to CCL. • Unplanned transfer to operating theatres.

4.5 Structural Heart Program

Model of Care Principles

Description	<p>One of the most common cardiac problems in the elderly is age-related calcific degeneration, known as aortic stenosis. In patients who are at higher risk of complications from valve replacement surgery, the aortic valve can be replaced less invasively using transcatheter aortic valve implantation (TAVI)</p> <p>Other components of the Structural Heart Program are:</p> <ul style="list-style-type: none"> • Balloon aortic valvuloplasty for symptomatic relief of severe aortic stenosis in patients not suitable for TAVI.
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Model of Care Principles	
	<ul style="list-style-type: none"> • Percutaneous correction of congenital heart defects such as patent foramen ovale (PFO) and atrial septal defect (ASD).
Principles	<ul style="list-style-type: none"> • Integrated multidisciplinary care between interventional and non-interventional cardiologists, cardiac anaesthetists, cardiothoracic surgeons, intensivists, nurses and allied health. • Careful patient screening and selection, including appropriate imaging. • Evidence based care. • Improve quality of life.
Benefits	<ul style="list-style-type: none"> • Alternative to cardiothoracic surgery. • Option for patients not suitable for cardiothoracic surgery. • Improved post procedure experience. • Patient centred care. • Improved morbidity and mortality. • Reduced clinical complications and adverse outcomes. • Reduced length of stay. • Positive staff experience.
Performance Indicators	<ul style="list-style-type: none"> • Consumer and staff feedback. • Adverse events. • Hospital acquired complication. • Unplanned admission/readmission to any hospital. • Unplanned return to CCL. • Unplanned transfer to operating theatres.

4.6 Cardiac Day Unit

Model of Care Principles	
Description	<p>Patients are admitted to the Cardiac Day Unit for planned cardiac procedures or interventions including:</p> <ul style="list-style-type: none">• Diagnostic coronary angiography,• Coronary angioplasty and/or stenting,• Electrophysiology procedures,• Cardiac device implantation,• Minor device procedures; and• Transoesophageal echocardiography. <p>Depending upon the level of anaesthesia administered for a procedure within the CCL, patient recovery pathways may involve:</p> <ul style="list-style-type: none">• Transfer to one of two close monitoring bays in the Cardiac Day Unit to monitor immediate recovery from general anaesthesia.• Transfer to a patient holding bay for monitoring of recovery from partial anaesthesia/ conscious sedation. Some patients may be discharged from here.• Transfer to the waiting area of the Cardiac Day Unit, where patients will receive further information about the outcomes of their procedure and await a pre-arranged pick-up by a nominated individual. <p>Most day unit patients will be discharged after their day procedure in the CCL. A small number of patients, however, may require admission to the ACCU for ongoing monitoring/management depending upon their response to anaesthesia and/or outcomes of their procedure, these scenarios may include:</p>

Model of Care Principles

	<ul style="list-style-type: none"> • Patients who have had complex interventions as part of their procedure. • Patients who have experienced complications during or after their procedure. • Patients requiring immediate referral to cardiothoracic surgery. • Any patient that is not safe for discharge. <p>The day unit provides a treat and return service for public patients requiring urgent cardiac procedures who are admitted in North Canberra Hospital (NCH). Patients are transferred to the day unit on the morning of their scheduled procedure and transferred back to NCH when they are safe for transport. Some patients may need to be accommodated in ACCU post procedure.</p> <p>The day unit also provides a preadmission service for elective patients. Patients are contacted by phone in the days prior to their procedure to assess their current health status and readiness for their procedure.</p> <p>It ensures that patients understand any instructions they have been given and provides them an opportunity to ask questions.</p>
Principles	<ul style="list-style-type: none"> • Specialist medical and nursing care for patients undergoing cardiac procedures. • Evidence based care. • Same day discharge. • Ensure patients are prepared for their procedure.
Benefits	<ul style="list-style-type: none"> • Positive patient experience. • Reduced clinical complications and adverse outcomes. • Decreased requirement for inpatient beds. • Positive staff experience.

Model of Care Principles

Performance Indicators

- Consumer and staff feedback.
- Adverse events.
- Hospital acquired complication.
- Unplanned admission to any hospital.
- Unplanned return to CCL.

4.7 Echocardiography

Model of Care Principles

Description

An echocardiogram (echo) is a non-invasive diagnostic test that provides ultrasound images of the heart. Echocardiograms in Building 5 will be performed on ED patients and inpatients. Where possible they will be performed in the diagnostic room or stress test room. For critically unwell patients the sonographer will perform the echo at the patient's bedside.

Types of echocardiograms:

Transthoracic echocardiogram (TTE) – Performed by placing the ultrasound probe over the patient's chest.

Transoesophageal echocardiogram (TOE) – A specialised ultrasound probe is inserted into the patient's oesophagus under sedation. Images gained from this view assist in the diagnosis of some cardiac conditions. The CCL performs outpatient TOEs as day patients, inpatients are performed on an as needed basis.

Exercise Stress Echo – Combination of a stress test and TTE. Images of the heart are acquired using a TTE both before and after exercise on the treadmill. Use of a specific stress echo template allows for review of pre and post exercise images side by side. This then indicates the presence or absence of coronary artery disease.

Model of Care Principles	
	Dobutamine Stress Echo – Where the patient is unable to exercise a pharmacological stress testing agent, Dobutamine, may be used instead of the treadmill. Administration of Dobutamine causes the same effect on the heart as exercise.
Principles	<ul style="list-style-type: none"> • Timely access to echocardiograms for inpatients. • Evidence based care. • Sonographers situated in Building 5
Benefits	<ul style="list-style-type: none"> • Low risk diagnostic procedure. • Reduced length of stay. • Timely care • Positive staff experience.
Performance Indicators	<ul style="list-style-type: none"> • Consumer and staff feedback. • Adverse events. • Hospital acquired complication. • Waiting times for inpatient echocardiograms.

5. Innovation

As CHS continues to expand and enhance services across the ACT, Building 5 provides a platform for innovative expansion of health care at the Canberra Hospital.

5.1 *Electrophysiology Laboratory*

A dedicated electrophysiology (EP) laboratory that uses advanced technology and equipment to conduct electrophysiology studies of the heart.

5.2 *Transoesophageal Echocardiogram/Procedure Room*

Located within the CCL, the procedure room provides a controlled environment to perform TOE as well as other approved minor procedures.

5.3 Diagnostic Room

The Level 6 diagnostic room provides an environment for planned or emergent, minimally invasive procedures performed under topical, local or regional anaesthesia. Safe sedation may be used in conjunction with the hospital safe sedation policy.

5.4 Stress Test Room

The stress test room is specifically designed to perform exercise stress tests for inpatients. In addition to the traditional treadmill, an exercise bike has also been included for patients with impaired mobility.

Both the stress test room and the diagnostic room have been fitted out with equipment for performing transthoracic echocardiograms.

5.5 Automatic Dispensing Cabinets

Automatic Dispensing Cabinets (ADC) allow medications to be stored and dispensed near the point of care. They allow for the controlling and tracking of medication distribution. The ACCU will be utilising ADCs throughout. The CCL will not have ADC capability however this will be in scope in the future.

5.6 Bariatric Rooms

Bariatric rooms within the ACCU are designed to accommodate patients up to 450kg. Bariatric rooms are fitted with equipment weight rated for bariatric patients. This includes overhead lifters and toilets.

Bariatric rooms are weight rated to 250kgs and Super Bariatric rooms are weight rated to 450kgs.

ACCU has one super bariatric room, three single bariatric room and two bedspaces capable of caring for bariatric patients.

6. Interdependencies

Interdependencies describe internal and external functional relationships with other clinical services that specifically enable the MoS and Models of Care.

6.1 *ACT and NSW Ambulance Services*

Early recognition and adequate management of ACS is critical in reducing mortality and morbidity from coronary artery disease. Moreover, patients with STEMI require prompt restoration of blood flow through the coronary artery to the affected area of heart muscle by either PCI or fibrinolytic therapy.

Patients presenting to CHS with symptoms of ACS or who are diagnosed with an acute STEMI may present directly to the CHS ED, via transfer from another hospital or via ACT or NSW ambulance services. For a patient presenting with signs and/or symptoms suggestive of STEMI via ACT Ambulance Service, or Ambulance Service NSW, direct transmission of clinical information is sent to the ED, ACCU and CCL multidisciplinary team for immediate action and early activation of the CCL.

6.2 *Helicopter Emergency Medical Service (HEMS)*

As the ACT is surrounded by the state of New South Wales (NSW), the hospital has an integral role in management of critically ill or injured patients in surrounding rural areas of NSW. HEMS is the NSW/ACT managed aeromedical service with a dedicated helicopter and road retrieval service.

The ACT HEMS team is the combination of two clinical services, the CHS Capital Region Retrieval Service (CRRS) the ACT Ambulance Service (ACTAS), a section of the Emergency Services Agency (ESA). The CRRS provides specialist medical crew for SouthCare, comprised of highly skilled emergency medicine physicians, intensivists and anaesthetists, and respective specialty senior registrars.

The use of helicopter retrieval and patient transport to and from Canberra Hospital ensures that optimum health care can be provided for time critical patients.

6.3 *Medical Emergency Team (MET)*

CHS has a dedicated MET that responds to all Code Blue emergencies. The MET provides acute resuscitation for deteriorating patients across the Canberra Hospital campus, who unexpectedly experience a medical emergency.

Due to the complex nature of medical emergencies and the interface with other CHS clinical services, the MET service has a dedicated MoS. The MET provide an outreach referral and review service, referred to as MET-Outreach or the Referral Service. This team includes a dedicated medical and nursing team, that includes members from the ICU and ED.

6.4 Cardiology Outpatients

Following their discharge from CCL or ACCU, patients may require ongoing cardiology follow up. This will take place in a separate clinical area, Cardiology Outpatients in Building 1 or Cardiac Rehabilitation in Building 15. Clinicians will work across both the Cardiology in Building 5 and Cardiology Outpatients, ensuring continuity of care.

6.5 General Inpatient Units

The Consultant Cardiologist (or nominated delegate) retains authority for the disposition of patients to downstream inpatient units. Disposition of patient is determined as per the CHS Inpatient Unit Admission Criteria document and workload pressures of the respective units. All patients must be reviewed in the ACCU by a CHS consultant (or nominated delegate) prior to confirmation of a patient's transfer to other downstream inpatient units.

6.6 Healthcare Technology Management

Healthcare Technology Management (HTM) provide biomedical engineering support and expert advice to Cardiology services in Building 5 to ensure safe, quality patient care by maintaining international best practice.

Within Cardiology services, the use of state-of-the art technology and increasingly complex equipment has given rise to the need for enhanced engineering services. As equipment becomes increasingly technical and complex there is a growing need for this to be maintained by the vendors and HTM.

6.7 Medical Imaging

The Medical Imaging department provides state-of-the-art diagnostic imaging, interventional radiology, and nuclear medicine services for Canberra Health Service patients. Medical Imaging also provides a mobile and afterhours service for post device implantation and for urgent diagnostic imaging.

Computed Tomography Coronary Angiography (CTCA) is an established and integrated component of the non-invasive assessment of patients requiring testing for a variety of cardiac conditions, including coronary artery disease (CAD), valvular heart disease, and electrophysiological treatments. An outpatient CTCA clinic, staffed by CCL nurses, currently runs out of medical imaging once a week.

7. Workforce

The Cardiology in Building 5 workforce is managed in accordance with the:

- Relevant Enterprise Agreements
- ACTPS Work Level Standards
- Public Sector Management Act (1994)
- Public Sector Management Standards 2016
- Health Act 1993
- ACT Public Sector Nursing and Midwifery Safe Care Staffing Framework
- Royal Australasian College of Physicians accreditation requirements for cardiology
- Australian College of Operating Room Nurses
- Nursing and Midwifery Patient ratios.

Table 1 provides the workforce categories for Cardiology in Building 5.

Table 1: Cardiology in Building 5 workforce categories

Category	Roles
Medical staff	<ul style="list-style-type: none"> • Director of Cardiology • Deputy Director of Cardiology • Staff Specialists • Visiting Medical Officers • Advanced Trainees • Basic Physician Trainees • Resident Medical Officers • Interns.

Category	Roles
Nursing	<ul style="list-style-type: none"> • Assistant Director of Nursing • Nurse Managers • Clinical Nurse Consultant, ACCU • Clinical Nurse Consultant, CCL and Day Unit
Nursing	<ul style="list-style-type: none"> • Clinical Development Nurses, CCL and Day Unit Registered Nurses (Levels 1, 2 and 3).
Allied health	<ul style="list-style-type: none"> • Cardiac Physiologists (available on-call 24 hours a day 7 days per week) • Cardiac Sonographers • Pharmacists • Physiotherapists • Social Workers • Aboriginal and Torres Strait Islander Liaison Officers • Dieticians • Clinical Psychologists • Speech Pathologists • Medical Physicists and radiation safety personnel • Quality and Safety Officer • National Cardiac Registry (ACT) Co-Ordinator.
Support Staff	<ul style="list-style-type: none"> • Business Manager • Administration staff • Clinical support through: <ul style="list-style-type: none"> ○ Technical Officers ○ Ward Clerks ○ Wardspersons ○ Hospital Assistants. • Allied Health Assistants. • Security • Health Technology Management • Equipment Officers • Environmental Staff

8. Implementation

The implementation and evaluation of the Cardiology in Building 5 MoS will be led by the Division of Medicine in conjunction with the Cardiology Leadership team and supported by the Campus Modernisation team.

The MoS will be implemented through the following strategies:

- Orientation and training programs for new and existing staff to work within the service.
- Ongoing training programs for staff working within the service.
- Processes and documentation used within the service that support the principles of the Cardiology in Building 5 MoS/C.

9. Performance

The Cardiology in Building 5 MoS will be delivered in accordance with key government strategic performance objectives and priorities. The CARDIOLOGY BUILDING 5 MoS supports achieving performance indicators against national service/care delivery standards and accreditation.

The objective for all performance improvements is to ensure patients receive quality, safe health care in 'the right care, at the right time, by the right team and in the right place'.

Cardiology in Building 5 will evaluate performance and improvement measures against:

- ACT Health Strategic Indicators
- Australian College of Operating Room Nurses (ACORN)
- Australian Council of Healthcare Standards (ACHS) against the National Safety and Quality Health Service (NSQHS)
- CHS, Clinical Governance Structure and Committees.
- CHS, Strategic Indicators
- Consumer Feedback
- Digital Health Record (DHR).

Cardiology in Building 5 will ensure the provision of high-quality service through ongoing feedback from patients, families and carers who use the service, as well as the measure of staff satisfaction and well-being.

Monitoring and evaluation of Cardiology in Building 5 will occur through a range of mechanisms including:

- CHS’s Clinical Governance Structure and Committees
- CHS’s Risk Management Processes
- National Safety and Quality Health Service (NSQHS) Standards Committees
- Division of Medicine Reporting Processes.

Data collected by the CHS Consumer Engagement team via the Australian Hospital Patient Experience Question Set (AHPEQS) has a key role in monitoring and identifying and acting on themes from surveys and other feedback sources. This process includes seeking input from the CHS Consumer and Carer Sub-Committee, to ensure subsequent quality indicators from the consumers perspective are appropriate and meaningful.

10. Definitions & Terms

Table 2 provides abbreviations and acronyms used in this document.

Table 2: Acronyms

Acronym	Meaning
A2RA	Angiotensin II Receptor Antagonist
ACE	Angiotensin-converting Enzyme
ACHS	Australian Council on Health Care Standards
ACSQHC	Australian Commission on Safety and Quality in Health Care
ACS	Acute Coronary Syndrome
ACT	Australian Capital Territory
ACTAS	ACTAS Australian Capital Territory Ambulance Service
ACHS	Australian Council on Health Care Standards
ACSQHC	Australian Commission on Safety and Quality in Health Care

Acronym	Meaning
ADON	Assistant Director of Nursing
AHPEQS	Australian Hospital Patient Experience Question Set
ANZICS	Australia & New Zealand Intensive Care Society
ASC	American Society of Cardiology
CABG	Coronary Artery Bypass Graft
CAD	Coronary Artery Disease
CCL	Cardiac Catheterisation Laboratory or Cardiac Cath Lab
CCTA	Coronary Computed Tomography Angiography
CDN	Clinical Development Nurse
CH	Canberra Hospital
CHF	Congestive Heart Failure
CHS	Canberra Health Service
CNC	Clinical Nurse Consultant
CSN	Clinical Support Nurse
CRRS	Capital Region Retrieval Service
CSB	Critical Services Building
ECG	Electrocardiograph
ED	Emergency Department
EP	Electrophysiology
Acronym	Meaning
ESC	European Society of Cardiology
ETA	Estimated Time of Arrival
FRACP	Fellow of the Royal Australasian College of Physicians
HEMS	Helicopter Emergency Medical Service
ICU	Intensive Care Unit

Acronym	Meaning
IT	Information Technology
KPI	Key Performance Indicator
LOS	Length of Stay
LVEF	Left Ventricular Ejection Fraction
MET	Medical Emergency Team
MI	Myocardial Infarction
MoC	Model of Care
MoS	Model of Service
MRI	Medical Resonance Imaging
NETS	Newborn and Paediatric Emergency Transport Service
NHMRC	National Health and Medical Research Council
NICE	National Institute for Health and Care Excellence
NSW	New South Wales
NP	Nurse Practitioner
PCI	Percutaneous Coronary Intervention
PREP	Physical Readiness for Expert Practice
RN	Registered Nurse
STEMI	ST Elevation Myocardial Infarction
TAVI	Transcatheter Aortic Valve Implantation
TL	Team Leader
TTE	Transthoracic Echocardiogram
TOE	Transesophageal Echocardiogram
VMO	Visiting Medical Officer

Table 3 provides term definitions used in this document.

Table 3: Term Definitions

Term	Definition
Guideline	Aimed at CHS staff, guidelines detail the recommended practice to be followed by staff but allow some discretion or autonomy in its implementation or use. Guidelines are written when more than one option is available under a given set of circumstances, and the appropriate action requires a judgement decision. Guidelines may also be used when the supporting evidence for one or other course of action is ambiguous.
Model of Care	Model of Care describes the way health services are delivered including best practice, population groups and patient cohorts through the stages of care. It aims to provide the 'right care, at the right time, by the right team and in the right place'
Model of Service	Model of Service describes overarching operational principles of a service area and performance measures.
Next of Kin	Patient nominated next of kin include biological family relations of any degree, but also family of choice who may not be biologically related, carers or loved ones such as friends.
Policy	Aimed at CHS staff, policy documents are an overarching, organisational wide directive about how staff are to act in defined circumstances or regarding a particular situation. Policies are documents based on legislation, Standards, regulations and/or ACT Government requirements and compliance is mandatory. A policy is often, but not always, supported by a procedure or guideline.
Procedure	Aimed at CHS staff, procedures details specific methods or actions staff must undertake to complete required processes within CHS. Procedures inform staff about how to complete clinical or administrative actions consistently across the organisation. The actions are evidence based and informed by

Term	Definition
	staff who are subject matter experts. Non-compliance with a clinical procedure must be clearly documented in the patient's clinical record.
Quaternary care	The term quaternary care is used as an extension of tertiary care in reference to advanced levels of medicine which are highly specialised and not widely accessed.
Riskman	A core software tool used by CHS for consumer and staff incident reporting, integrated risk management, legislative compliance and quality improvement monitoring.
Tertiary care	The term tertiary care refers to services provided by hospitals with specialised equipment and expertise. At this level, hospitals provide services such as intensive care, major trauma management, neurosurgery, cardiac surgery and interventional procedures.

11. Reference List

11.1 Frameworks

- CHS Exceptional Care Framework 2020-2023
- CHS Clinical Governance Framework 2020-2023
- CHS Partnering with Consumers Framework 2020-2023
- CHS Corporate plan 2020-2021
- CHS Strategic Plan 2020-2023
- CHS Work Health Safety Strategy 2018-2022

11.2 Policies & Procedures

- ANZCA Sedation and or Analgesia for Diagnostic and Interventional Medical, Dental or Surgical Procedures Guideline 2014 in Adults, Adolescents and Children
- CHS Acute Coronary Syndrome (ACS) Assessment Pathway
- CHS Consumer and Carer Participation

- CHS Consumer Feedback Management
- CHS Consumer Handouts
- ACT Health Violence and Aggression by Patients, Consumers or Visitors: Prevention and Management
- ACT Health Work Health and Safety
- ACT Health Work Health and Safety Management System
- CHS Work Safety Policy
- ACT Health Incident Management
- ACT Health Language Services (Interpreters, Multilingual Staff and Translated Materials)
- CHS Clinical Records Management
- CHS Protective Security – Security Design for Facilities
- CHS Waste Management

11.3 Legislation

- Human Rights Act 2004
- Charter of Health Care Rights
- Workplace Privacy Act 2011
- Work Health Safety Act 2011
- Dangerous Substances Act 2004

11.4 External Standards/Guidelines

External organisations may have standards and guidelines that are relevant to the Cardiac Care Centre which may include but not be limited to:

- Australian Commission on Safety and Quality in Health Care
- ACT Ambulance Service, Clinical Management Guidelines
- Cardiac Society of Australia and New Zealand Practice Guidelines
- NHMRC Australian Guidelines for the Prevention and Control of Infection in Healthcare

12. Model of Service Development Participants

Position
Clinical Director Cardiology, Division of Medicine
Clinical Nurse Consultant, Coronary Care Unit, Division of Medicine
Clinical Nurse Consultant, Cardiac Catheter Laboratory, Division of Medicine
Allied Health Manager, Division of Medicine
Cardiologist, Division of Medicine
Assistant Director of Nursing, Division of Medicine
Registered Nurse, Coronary Care Unit, Division of Medicine
Business Manager, Division of Medicine
Client Liaison Officer, Heart Care Centre, Campus Modernisation
Senior Change Specialist, Campus Modernisation

ACKNOWLEDGMENT OF COUNTRY

Canberra Health Services acknowledges the Traditional Custodians of the land, the Ngunnawal people. Canberra Health Services respects their continuing culture and connections to the land and the unique contributions they make to the life of this area. Canberra Health Services also acknowledges and welcomes Aboriginal and Torres Strait Islander peoples who are part of the community we serve.

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