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Development of nationally consistent subacute and non-acute admitted patient care data definitions and guidelines

IHPA

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Authoritative information and statistics to promote better health and wellbeing

Development of nationally consistent subacute and non-acute admitted patient care data definitions and guidelines

Australian Institute of Health and Welfare
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Abbreviations

ABF	Activity based funding
AFRM	Australasian Faculty of Rehabilitation Medicine
AHMAC	Australian Health Ministers' Advisory Council
AIHW	Australian Institute of Health and Welfare
ALOS	average length of stay
AN-SNAP	Australian National Subacute and Non-acute Patient Classification
ANZSGM	Australian and New Zealand Society of Geriatric Medicine
COAG	Council of Australian Governments
DoH	Department of Health
DoHA	Department of Health and Ageing
GEM	geriatric evaluation and management
ICD–10–AM	International Statistical Classification of Diseases and Related Health Problems, Tenth Revision, Australian Modification
IHPA	Independent Hospital Pricing Authority
METeOR	Metadata Online Registry
NHDD	National Health Data Dictionary
NHISSC	National Health Information Standards and Statistics Committee
NMDS	National Minimum Data Set
NHMD	National Hospital Morbidity Database
NHRA	National Health Reform Agreement
NPA	National Partnership Agreement
NPA HHWR	National Partnership Agreement on Hospitals and Health Workforce Reform
PCOC	Palliative Care Outcomes Collaboration
PwC	PricewaterhouseCoopers
RANZCP	Royal Australian and New Zealand College of Psychiatrists
SCWG	Subacute Care Working Group
UK	United Kingdom
USA	United States of America
WHO	World Health Organization

Symbols

. .	not applicable
n.p.	not published because of small numbers, confidentiality or other concerns about the quality of the data

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Summary

In August 2012, the Independent Hospital Pricing Authority (IHPA) engaged the Australian Institute of Health and Welfare (AIHW) to develop nationally consistent definitions and guidelines for subacute and non-acute admitted patient care and care types for implementation from 1 July 2013 to support activity based funding.

Method

In developing these definitions and guidelines, the AIHW consulted with jurisdictions and other stakeholders, through the IHPA's Subacute Care Working Group (SCWG) and the Australian Health Ministers' Advisory Council's (AHMAC) National Health Information Standards and Statistics Committee (NHISSC), between September and December 2012. The work was also informed by review of previous related work and key literature, and review of relevant national health data.

Revised definitions

In line with the recommendations of the consultation process, the data element for 'care type' was revised to:

- include a definition of subacute care that provides a framework within which the subacute care type definitions sit
- ensure that care classified as subacute is care that:
  - is delivered under the management of or informed by a clinician with specialised expertise in the care type
  - is evidenced by an individualised multidisciplinary management plan that is documented in the patient's medical record
  - reflects both the characteristics of the patient and the expertise of the treating clinician
- use consistent, contemporary language in line with the International Classification of Functioning, Disability and Health.

Guidelines have been included in the 'guide for use' for the data element to guide clinicians in the assignment of the care types. These include guidelines around:

- timing and responsibility for assignment of care type
- retrospective changes for care type assignment
- situations where the clinician responsible for care is not located at the same facility as the patient
- changes of care type for patients who receive acute same-day intervention(s) during the course of a subacute episode of care.

Approvals

The revised data element has been agreed to by the SCWG, the IHPA and the NHISSC. It has been endorsed on behalf of AHMAC by the National Health Information and Performance Principal Committee for inclusion in the National Minimum Data Set (NMDS) for Admitted Patient Care from 1 July 2013.

An abridged version of the agreed data element is provided below. The full data element is at Appendix D.

Hospital service—care type, code N[N]

Definition: The overall nature of a clinical service provided to an admitted patient during an episode of care (admitted care), or the type of service provided by the hospital for boarders or posthumous organ procurement (care other than admitted care), as represented by a code.

Context: Admitted patient care and hospital activity:

For admitted patients, the type of care received will determine the appropriate casemix classification employed to classify the episode of care.

Value domain attributes

Permissible values:

Value	Meaning
Admitted Care	
1	Acute care
2	Rehabilitation care
3	Palliative care
4	Geriatric evaluation and management
5	Psychogeriatric care
6	Maintenance care
7	Newborn care
8	Other admitted patient care
Care other than admitted care	
9	Organ procurement—posthumous
10	Hospital boarder

Admitted care can be one of the following:

CODE 1 Acute care

Acute care is care in which the primary clinical purpose or treatment goal is to:

- manage labour (obstetric)
- cure illness or provide definitive treatment of injury
- perform surgery
- relieve symptoms of illness or injury (excluding palliative care)
- reduce severity of an illness or injury
- protect against exacerbation and/or complication of an illness and/or injury which could threaten life or normal function
- perform diagnostic or therapeutic procedures

CODE 2 Rehabilitation care

Rehabilitation care is care in which the primary clinical purpose or treatment goal is improvement in the functioning of a patient with an impairment, activity limitation or participation restriction due to a health condition. The patient will be capable of actively participating.

Rehabilitation care is always:

(continued)

- delivered under the management of or informed by a clinician with specialised expertise in rehabilitation, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record, that includes negotiated goals within specified time frames and formal assessment of functional ability.

CODE 3 Palliative care

Palliative care is care in which the primary clinical purpose or treatment goal is optimisation of the quality of life of a patient with an active and advanced life-limiting illness. The patient will have complex physical, psychosocial and/or spiritual needs.

Palliative care is always:

- delivered under the management of or informed by a clinician with specialised expertise in palliative care, and
- evidenced by an individualised multidisciplinary assessment and management plan, which is documented in the patient's medical record, that covers the physical, psychological, emotional, social and spiritual needs of the patient and negotiated goals.

CODE 4 Geriatric evaluation and management

Geriatric evaluation and management is care in which the primary clinical purpose or treatment goal is improvement in the functioning of a patient with multi-dimensional needs associated with medical conditions related to ageing, such as tendency to fall, incontinence, reduced mobility and cognitive impairment. The patient may also have complex psychosocial problems.

Geriatric evaluation and management is always:

- delivered under the management of or informed by a clinician with specialised expertise in geriatric evaluation and management, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record that covers the physical, psychological, emotional and social needs of the patient and includes negotiated goals within indicative time frames and formal assessment of functional ability.

CODE 5 Psychogeriatric care

Psychogeriatric care is care in which the primary clinical purpose or treatment goal is improvement in the functional status, behaviour and/or quality of life for an older patient with significant psychiatric or behavioural disturbance, caused by mental illness, an age-related organic brain impairment or a physical condition.

Psychogeriatric care is always:

- delivered under the management of or informed by a clinician with specialised expertise in psychogeriatric care, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record, that covers the physical, psychological, emotional and social needs of the patient and includes negotiated goals within indicative time frames and documented through formal assessment of functional ability.

Psychogeriatric care is not applicable if the primary focus of care is acute symptom control.

CODE 6 Maintenance care

Maintenance (or non-acute) care is care in which the primary clinical purpose or treatment goal is support for a patient with impairment, activity limitation or participation restriction due to a health condition. Following assessment or treatment the patient does not require

(continued)

further complex assessment or stabilisation. Patients with a care type of maintenance care often require care over an indefinite period.

CODE 7 Newborn care

Newborn care is initiated when the patient is born in hospital or is nine days old or less at the time of admission.

Newborn care continues until the care type changes or the patient is separated:

- patients who turn 10 days of age and do not require clinical care are separated and, if they remain in the hospital, are designated as boarders
- patients who turn 10 days of age and require clinical care continue in a newborn episode of care until separated
- patients aged less than 10 days and not admitted at birth (for example, transferred from another hospital) are admitted with a newborn care type
- patients aged greater than 9 days not previously admitted (for example, transferred from another hospital) are either boarders or admitted with an acute care type
- within a newborn episode of care, until the baby turns 10 days of age, each day is either a qualified or unqualified day
- a newborn is qualified when it meets at least one of the criteria detailed in Newborn qualification status.

Within a newborn episode of care, each day after the baby turns 10 days of age is counted as a qualified patient day. Newborn qualified days are equivalent to acute days and may be denoted as such.

CODE 8 Other admitted patient care

Other admitted patient care is care that does not meet the definitions above.

Care other than admitted care can be one of the following:

CODE 9 Organ procurement—posthumous

Organ procurement—posthumous is the procurement of human tissue for the purpose of transplantation from a donor who has been declared brain dead.

Diagnoses and procedures undertaken during this activity, including mechanical ventilation and tissue procurement, should be recorded in accordance with the relevant ICD-10-AM Australian Coding Standards. These patients are not admitted to the hospital but are registered by the hospital.

CODE 10 Hospital boarder

A hospital boarder is a person who is receiving food and/or accommodation at the hospital but for whom the hospital does not accept responsibility for treatment and/or care.

Hospital boarders are not admitted to the hospital. However, a hospital may register a boarder. Babies in hospital at age 9 days or less cannot be boarders. They are admitted patients with each day of stay deemed to be either qualified or unqualified.

Comments: Unqualified newborn days (and separations consisting entirely of unqualified newborn days) are not to be counted for all purposes, and they are ineligible for health insurance benefit purposes.

(continued)

Guide for use:

Only one type of care can be assigned at a time. In cases when a patient is receiving multiple types of care, the care type that best describes the primary clinical purpose or treatment goal should be assigned.

The care type is assigned by the clinician responsible for the management of the care, based on clinical judgements as to the primary clinical purpose of the care to be provided and, for subacute care types, the specialised expertise of the clinician who will be responsible for the management of the care. At the time of subacute care type assignment, a multidisciplinary management plan may not be in place but the intention to prepare one should be known to the clinician assigning the care type.

Where the primary clinical purpose or treatment goal of the patient changes, the care type is assigned by the clinician who is taking over responsibility for the management of the care of the patient at the time of transfer. Note, in some circumstances the patient may continue to be under the management of the same clinician. Evidence of care type change (including the date of handover, if applicable) should be clearly documented in the patient's medical record.

The clinician responsible for the management of care may not necessarily be located in the same facility as the patient. In these circumstances, a clinician at the patient's location may also have a role in the care of the patient; the expertise of this clinician does not affect the assignment of care type.

The care type should not be retrospectively changed unless it is:

- for the correction of a data recording error, or
- the reason for change is clearly documented in the patient's medical record and it has been approved by the hospital's director of clinical services.

Subacute care is specialised multidisciplinary care in which the primary need for care is optimisation of the patient's functioning and quality of life. A person's functioning may relate to their whole body or a body part, the whole person, or the whole person in a social context, and to impairment of a body function or structure, activity limitation and/or participation restriction.

Subacute care comprises the defined care types of rehabilitation, palliative care, geriatric evaluation and management and psychogeriatric care.

A multidisciplinary management plan comprises a series of documented and agreed initiatives or treatments (specifying program goals, actions and timeframes) which has been established through multidisciplinary consultation and consultation with the patient and/or carers.

It is highly unlikely that, for care type changes involving subacute care types, more than one change in care type will take place within a 24-hour period. Changes involving subacute care types are unlikely to occur on the date of formal separation.

Patients who receive acute same-day intervention(s) during the course of a subacute episode of care do not change care type. Instead, procedure codes for the acute same-day intervention(s) and an additional diagnosis (if relevant) should be added to the record of the subacute episode of care.

Palliative care episodes can include grief and bereavement support for the family and carers of the patient where it is documented in the patient's medical record.

1 Introduction

1.1 Background

The IHPA was established as part of the National Health Reform Agreement (NHRA) arrangements introduced in 2011 (COAG 2011). As part of its core role of supporting activity based funding (ABF) of public hospital health care services, IHPA is developing ABF classification systems and associated data and coding standards for subacute and non-acute services to ensure nationally consistent data are available for ABF purposes.

The development of nationally consistent ABF subacute and non-acute care definitions and guidelines was part of IHPA's work program of data standard and classification development to facilitate the implementation of ABF for subacute and non-acute care from 1 July 2013. The work was identified through the IHPA Jurisdictional Advisory Committee planning processes to inform the decision on the long-term classification systems for subacute care.

Previous work undertaken for the IHPA by PricewaterhouseCoopers (PwC), a professional services company, indicated a need for subacute and non-acute care to be clearly defined, so that ABF payments are made in respect of services actually delivered and to ensure consistency in reporting by jurisdictions (PwC forthcoming). This work also identified a need for guidelines around clinical governance (that is, who is responsible for care type assignment decisions).

In August 2012, IHPA engaged the AIHW to progress the development of nationally consistent definitions, metadata, guidelines and decision making processes for admitted patient subacute and non-acute care and care types to support consistent national metadata and the introduction of ABF for these care types. Amended metadata and guidelines are required for collection starting 1 July 2013.

The term subacute was first used in Australia in 1992 to describe patients whose use of hospital services was better predicted by their functionality than by their principal medical diagnosis (Poulos & Eagar, 2007). In the *National health data dictionary* (NHDD) it is defined as 'rehabilitation, palliative care, geriatric evaluation and management (GEM) and psychogeriatric care' (AIHW 2012c).

There is currently no nationally agreed definition of non-acute care. Lee et al. (1998) define non-acute care as maintenance care, which includes nursing home, convalescent and planned respite care. The AIHW also refers to maintenance care as non-acute care in relation to admitted patients (AIHW 2012a).

In Australia, data on admitted patient care are collected through the Admitted Patient Care NMDS and are held by the AIHW in the National Hospital Morbidity Database (NHMD). The overall nature of the clinical service provided during a separation is described by the data element Hospital service—care type, code N[N].N (Appendix C). This data element was revised as an outcome of this project. The revised data element is also referred to as 'care type' in the remainder of this report.

1.2 Scope of the project

The scope of the project was to develop revised nationally consistent metadata (including guides for use) for subacute and non-acute care and care types for admitted hospital patients.

The project was to be based on a review of relevant academic literature and documentation, analysis of admitted subacute and non-acute data to identify timing and patterns of care type changing, and consultation with the IHPA, jurisdictions, clinicians and other relevant stakeholders.

In addition, the need for additional data development for 'setting of care' and 'designated unit' was considered during the project.

This project was undertaken on a 'best endeavours' basis, noting the difficulties that have been associated with achieving consensus on this type of data development in the past, the relatively short time-frames for this project and the unknown impact of concurrent IHPA work on terminology/assessment instruments and on mental health classifications. The desired outcome was to reach a consensus agreement between SCWG and the NHISSC and for agreement that the revised metadata be included in the Admitted Patient Care NMDS for collection from 1 July 2013.

1.3 Project governance

The SCWG served as the working group for this project. This group is tasked with providing advice to the IHPA on the development of a framework for establishing the efficient price of subacute care services, including:

- the development of a new classification system for subacute care services in Australia that supports effective, contemporary models of care
- the international research on subacute care models of care and classification systems that support those models
- testing and trialling methods to validate the feasibility and effectiveness of any proposed classification system
- the impacts on jurisdictions of data requirements that will support the new classification system
- the implementation of the new classification system.

SCWG membership consists of:

- three IHPA representatives (CEO; Executive Director, ABF; and a consultant)
- representatives from each state and territory and the Commonwealth
- representatives from the Royal Australasian College of Physicians in the specialties of rehabilitation, geriatrics, palliative care and paediatrics
- Allied Health Professionals Australia representatives
- a Palliative Care Australia representative
- an Australasian Rehabilitation Nurses' Association representative
- a National Casemix and Classification Centre, University of Wollongong representative
- a Royal Australian and New Zealand College of Psychiatrists representative.

The SCWG met monthly via videoconference during this project.

As this project involved changes to current national data collection arrangements, the project required parallel committee approval processes. Advice on the data definitions for ABF purposes was provided by the SCWG. The IHPA approved the definition for ABF purposes. However, as the project required revisions to the current data standard Hospital service–care

type, code N[N].N, agreement was also sought from the NHISSC, the body tasked with oversight of data development for the National Minimum Data Sets.

During this project, NHISSC considered papers for this project both at scheduled meetings and out-of-session.

1.4 Admitted patient subacute and non-acute care in Australian hospitals: overview

National agreements

Admitted patient subacute care has been the focus of a number of national agreements of the Council of Australian Governments (COAG) in recent years. The National Partnership Agreement on Hospital and Health Workforce Reform (NPA HHWR) provided funding of up to $500 million to the states and territories in 2008–09 to increase the volume and quality of the subacute care services in both hospital and community settings by 5 per cent annually over the period 2009–10 to 2012–13 (COAG 2008). Under the NPA HHWR the states and territories agreed:

- to provide a state or territory-wide plan to enhance subacute services for the period 2009–10 to 2012–13
- to provide annual reporting against annual growth targets
- to participate in the National Subacute Care Working Group to address enhanced provision and mix of subacute care services
- to participate in the Australasian Rehabilitation Outcomes Centre and the Palliative Care Outcomes Collaboration.

Under the NHRA, signed by COAG in 2011, hospitals will be funded according to a national ABF system, with hospitals paid according to the number and type of services they actually deliver (COAG 2011a). This will include subacute and non-acute care services.

The NHRA is associated with a number of National Partnership Agreements (NPAs), including the NPA on Improving Public Hospital Services, under which the Commonwealth Government is providing $1.6 billion from 2010–11 to 2013–14 for states and territories to deliver at least 1,316 new subacute beds (including 'bed' equivalent services in the community) (COAG 2011b).

Subacute and non-acute admitted patient care activity

In 2010–11, there were almost 380,000 hospital separations for subacute and non-acute care, which was 4.5% of all hospital separations for the year (Table A1 in Appendix A). There were nearly 4.3 million subacute and non-acute patient days overall in 2010–11 (Table A2). This represented 16% of all patient days in 2010–11. Subacute and non-acute patients utilised 17% of patient days in public hospitals and 13% of patient days in private hospitals.

Rehabilitation care represented the highest proportion of subacute care for both separations (75.6%) and patient days (57.6%). *Palliative care* (8.9%) was the second most common subacute care type recorded in 2010–11 in terms of separations, however *Maintenance care* was second highest in terms of patient days (17.7%). *Rehabilitation care* was the most common type of care in both public (52.5%) and private sectors (93.2%).

The proportion of overall separations that were for subacute and non-acute care varied by jurisdiction: ranging from 2.2% of all separations in Western Australia to 7.2% in New South Wales. There was considerable variation between jurisdictions in the proportion of separations reported for each care type. For example, in Western Australia, 70% of subacute episodes of care in public hospitals had a care type of *Rehabilitation care*, compared with 40% in Victoria and the Northern Territory (Table A2 in Appendix A). *Geriatric evaluation and management* was most commonly reported in Victoria (41% of subacute and non-acute episodes of care) compared with between 4% and 13% in other states and territories.

The proportions of admitted subacute services delivered in the public and private sectors varied by jurisdiction (Table A1 in Appendix A). The majority of admitted subacute and non-acute care in New South Wales was delivered by private hospitals (69%). This was largely driven by the high number of *Rehabilitation care* separations in private hospitals, which made up 68% of all subacute and non-acute episodes of care in New South Wales. In contrast, 71% of subacute and non-acute care in Western Australia was delivered by public hospitals.

The reporting of care types also varied by hospital sector (public and private). In Victoria, for example, *Psychogeriatric care* was only reported by private hospitals. In contrast, little to no *Psychogeriatric care* was reported by private hospitals in New South Wales, Queensland and South Australia. Overall, the majority of *Palliative care* (84%) and *Maintenance care* (89%) was reported by public hospitals.

For *Maintenance care,* the Australian Capital Territory and the Northern Territory recorded the highest proportion of episodes (28% and 27% respectively) compared with just 2% in Victoria and between 10% and 23% in the other states (see Table A2 in Appendix A).

Separation rates per 1,000 population varied from 8.4 in Western Australia to 21.8 in New South Wales. Rates varied more widely for separations from public hospitals (3.1–17.4) than for private hospitals (2.5–15.0).

Comparison of rates for states and territories should take into consideration cross-border flows, particularly in the Australian Capital Territory. There may also be differences between states and territories in the delivery of subacute care, which should be considered when interpreting these data. However, the varied rates may also indicate varying practice in assigning care types based on the current care type definition.

How has activity changed over time?

Provision of admitted patient subacute services mostly increased between 2006–07 and 2010–11. During that time, the number of separations for subacute and non-acute care increased from about 243,000 to almost 380,000 separations, an average increase of 11.9% per year. The average rate of increase was higher in private hospitals (17.9%) than in public hospitals (5.8%). In particular, *Rehabilitation care* in private hospitals doubled, increasing by an average of 20.1% per year between 2006–07 and 2010–11 (Figure A1 in Appendix A).

Service users

Persons aged 60 and over accounted for more than 80% of all subacute and non-acute separations in 2010–11. Females accounted for more than half (56.4%) of subacute and non-acute separations (Figure A3 in Appendix A) and there were more separations for females than for males in the age groups 35 and over.

Additional data

Appendix A contains further data and analyses on subacute and non-acute admitted patient activity in Australia in 2010–11, including analyses on care type by jurisdiction and hospital sector, change in activity over time, service use by age and sex, common diagnoses by care type and patterns of care type change.

1.5 Structure of this report

This report has 4 sections:

Section 1 is this introduction.

Section 2 sets out the method for the project.

Section 3 details the outcomes of the project.

Section 4 makes recommendations for further work.

Supplementary material is presented in the appendices:

Appendix A presents data and analyses on admitted patient subacute and non-acute care activity in 2010–11.

Appendix B is a summary of key literature from Australia and internationally.

Appendix C details the current (at the start of this project) standard Hospital service—care type, code N[N].N (Metadata Online Registry (METeOR) id 270174).

Appendix D is the agreed revised data element Hospital service—care type, code N[N] (METeOR id 491557).

2 Method

The project involved three information-gathering processes: a review of the literature from Australia and internationally, analysis of data on admitted patient subacute and non-acute care services, and consultation with relevant stakeholders.

2.1 Data on subacute and non-acute services

Data for this project was sourced from *Australian Hospital Statistics 2010–11* and from the National Hospital Morbidity Database. Unpublished analyses used the following variables from the National Hospital Morbidity Database:

- Record identifier (METeOR ID 290046)
- State (METeOR ID 286919)
- Establishment Sector (METeOR ID 269977)
- Age group
- Care type (METeOR ID 270174)
- Admission mode (METeOR ID 269976)
- Separation mode (METeOR ID 270094)
- Total psychiatric care days (METeOR ID 270300)
- Principal diagnosis (METeOR ID 391326).

Subacute care data were extracted using values 2.0–5.0 of the care type data element. Non-acute care data were extracted using value 6.0 of the care type data element.

Data have been suppressed where publication might breach patient confidentiality or, for rates and average length of stay, where the data are too small to be reliable. This is in accordance with the reporting of hospital statistics in *Australian Hospital Statistics*. Where additional suppression has been applied at the request of a jurisdiction (tables A13–A16), it is noted in the footnotes of the table. Consequential suppression was applied as appropriate.

The data analysis undertaken for this project is at Appendix A.

2.2 Review of literature

A scan of the literature relevant to the specific subacute and non-acute classifications in use nationally and internationally was undertaken using the Google search engine. This literature search involved searching clinical and management journals, government policies, procedures and guidelines and project reports from studies both in Australia and internationally. The search methodology is described in Table 2.1.

Table 2.1: Literature review search methodology

Search Terms	Subacute care/non-acute care/rehabilitation/geriatric evaluation and management/psychiatric care/maintenance care/palliative care AND hospital/admitted patient AND Admission criteria OR Selection criteria OR Patient dependent criteria OR Services OR Service Capability Framework OR USA/Canada/United Kingdom.
	GEM model of care
	Hospital dementia services
	Hospital Services Dementia Project
	Geriatric assessment
	Specialist mental health services for older people
	Stroke rehabilitation

A summary of key literature identified through this search is at Appendix B.

2.3 Consultation

Consultation with key stakeholders took place between September and December 2012. It was primarily undertaken via a one-day consultation workshop with a broad range of stakeholders, a meeting with the Centre for Health Service Development at the University of Wollongong (including staff from the Australasian Rehabilitation Outcomes Centre and the Palliative Care Outcomes Collaboration) and meetings of the SCWG and NHISSC.

Considerable consultation was undertaken on the topic of subacute care and care type definitions by the National Partnership Agreement Implementation Steering Committee Subacute Care Measurement Working Group in 2009, and more recently by PwC in 2012 as part of a project undertaken for the IHPA to investigate cost drivers and classification systems for subacute care. The results of these consultations also informed this project.

The data element revised in this project, Hospital service—care type, code N[N].N, is implemented in three NMDSs —the Admitted Patient Care NMDS, the Admitted Patient Palliative Care NMDS and the Admitted Patient Mental Health Care NMDS. While there was not sufficient time to consult with all relevant information committees and other stakeholders for the Admitted Patient Palliative Care and Admitted Patient Mental Health Care NMDSs, the membership of the SCWG includes stakeholders with links to palliative care and mental health service providers. In addition, AIHW staff working with palliative care and mental health stakeholders provided advice during the course of the project.

2.4 Overarching principles

The following overarching principles were taken into consideration while drafting the revised data element.

1. Any agreed definitions should reflect clinical practice and do not restrict jurisdictions' and/or clinicians' ability to deliver emerging models of care and up-to-date best practice. The final agreed definitions should support flexible clinical practice.

2. Only one care type can be assigned at a time. There will be cases when a patient is receiving multiple types of care; in these cases it is the primary care type that is of most interest.
3. Under the NHRA, jurisdictions agreed to support the concept of 'single provision, multiple use' of information to maximise the efficiency of data provision and validation, where practical (clause B86). National metadata on care type is used for multiple purposes (as outlined above) and thus agreed definitions must be fit for multiple purposes.
4. The definitions must be implementable and not create additional data burden (where possible) as changes are costly and time-consuming. Any changes must be considered in the context of multiple administrative data collections and information technology systems.

3 Revised definitions and guidelines

The outcome of this project was a revised data element, Hospital service—care type, code N[N], that provides a more rigorous definition of subacute and non-acute care and care types, removes the concept of 'setting' and is also suitable for the purposes of ABF. The final agreed data element is at Appendix D.

Anticipated benefits of the revised data element are that it will:

- address the inconsistencies across and within jurisdictional data collections
- improve national data quality
- make available better data for statistical and performance reporting on hospital activity
- support the development of the long-term subacute and non-acute care ABF classifications
- support IHPA in its role of determining the national efficient price for ABF of public hospital health care services
- support ABF for subacute and non-acute admitted patients.

Under the NHRA, jurisdictions agreed to support the concept of 'single provision, multiple use' of information to maximise the efficiency of data provision and validation, where practical (clause B86). Updating the definitions of subacute and non-acute care and care types within the relevant NMDSs to also suit the purposes of ABF allows data collected using the 'care type' data element to be used in many ways (for example, reporting in *Australian Hospital Statistics*, reporting against performance indicators in the National Healthcare Agreement, as well as ABF) and fulfils this principle.

The final agreed definitions were based on the outcomes of the consultation process, and input from the SCWG and the NHISSC. There was a range of views expressed during the consultation, which the AIHW has taken into account while revising the 'care type' data element.

It must be noted that the IHPA Mental Health Working Group is in the process of considering a mental health classification system which may result in the development of a care type for mental health. This may, in turn, require the care type definitions to be further revised.

3.1 Subacute care definition

Subacute care is defined in the NHDD 16th edition as:

> rehabilitation, palliative care, geriatric evaluation and management, and psychogeriatric care (METeOR ID: 408718) (AIHW 2012c).

It was agreed that a more descriptive definition of subacute care could provide a framework within which the subacute care type definitions could sit. There was strong support for the notion that all subacute care must be multidisciplinary in nature.

The definition was agreed as:

> Subacute care is specialised multidisciplinary care in which the primary need for care is optimisation of the patient's functioning and quality of life. A person's functioning may relate to their whole body or a body part, the whole person, or the whole person in a

social context, and to impairment of a body function or structure, activity limitation and/or participation restriction.

Subacute care comprises the defined care types of rehabilitation, palliative care, geriatric evaluation and management and psychogeriatric care.

This definition has been included in the Guide for use of the 'care type' data element (Appendix D).

3.2 Non-acute care definition

Stakeholders agreed that 'maintenance care' is equivalent to 'non-acute care'. It has been clarified in the definition of maintenance care that these terms are synonymous.

3.3 Care types

During the consultations, stakeholders discussed a range of issues about the proposed definitions of the subacute care types. The AIHW has formulated the revised care type definitions drawing on these views. The following points cover amendments made to all subacute care type definitions.

Stakeholders agreed that the current definitions of the subacute care types are not sufficiently rigorous to support classification for the purposes of ABF. There was strong support across the consultation that care where '[care type] is the principal clinical intent' alone should not be considered subacute care. There was also strong support for the minimum requirement of care classified as subacute to be care delivered through a specialised program, described as care delivered by specialist staff. The care type definitions have been revised to include the concept that subacute care is always

> 'delivered under the management of or informed by a clinician with specialised expertise in [care type]'.

There was support in the consultation for the definitions to reflect the characteristics of the patients receiving subacute care, not simply the discipline of the treating clinician. The revised care type definitions therefore focus on the care needs of the patient as well as the types of care provided to meet those needs. The definitions have been restructured so that the first paragraph refers to the patient characteristics (that is, the paragraph is patient-centric) and the dot points refer to the characteristics of the service.

There was strong support to include guidance in the care type definitions on the need for documented evidence of care delivery and care type assignment. This aligns with IHPA's stated requirements that this project define 'clearly specified auditable documentation requirements'. The definitions have been revised to include the concept that subacute care is always

> 'evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record'.

The following definition of multidisciplinary management plan was agreed:

> 'A multidisciplinary management plan comprises a series of documented and agreed initiatives or treatments (specifying program goals, actions and timeframes) which has been established through multidisciplinary consultation and consultation with the patient and/or carers.'

There was strong support for the subacute care type definitions to include the need for assessment, the results of which should be documented in the patient's multidisciplinary management plan.

There was also strong support for the subacute care type definitions to use consistent, contemporary language. In line with the majority of the feedback from stakeholders, the revised definitions use language from the International Classification of Functioning, Disability and Health (WHO 2001), for example impairment, activity limitation and participation restriction.

The terms 'multidisciplinary' and 'interdisciplinary' are used interchangeably within the current care type definition. Stakeholders suggested using the term 'multidisciplinary' in all subacute care type definitions, for consistency.

Definitions of care types

Rehabilitation

Stakeholders noted a range of views on rehabilitation during consultation, including that the patient's treatment goal should be improvement in their functioning and that the patient should be capable of actively participating in rehabilitation. Stakeholders agreed not to explicitly include or exclude psychiatric rehabilitation from the *Rehabilitation care* type but noted that should a new mental health classification be developed for ABF purposes, mental health patients may be categorised under a purpose developed mental health care type.

In line with the outcomes of the consultation process, the definition of *Rehabilitation care* was agreed as:

> 'Rehabilitation care is care in which the primary clinical purpose or treatment goal is improvement in the functioning of a patient with an impairment, activity limitation or participation restriction due to a health condition. The patient will be capable of actively participating.
>
> Rehabilitation care is always:
>
> - delivered under the management of or informed by a clinician with specialised expertise in rehabilitation, and
> - evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record, that includes negotiated goals within specified time frames and formal assessment of functional ability.'

Palliative care

In line with the outcomes of the consultation process, the definition of *Palliative care* was agreed as:

> 'Palliative care is care in which the primary clinical purpose or treatment goal is optimisation of the quality of life of a patient with an active and advanced life-limiting illness. The patient will have complex physical, psychosocial and/or spiritual needs.
>
> Palliative care is always:
>
> - delivered under the management of or informed by a clinician with specialised expertise in palliative care, and
> - evidenced by an individualised multidisciplinary assessment and management plan, which is documented in the patient's medical record, that covers the

physical, psychological, emotional, social and spiritual needs of the patient and negotiated goals.'

Stakeholder feedback was that palliative care can also include grief and bereavement support to be provided to the family and carers of the patient. However, the availability or provision of such services was recognised as not directly relevant to the assignment of care. In line with this feedback, the following statement has been included in the guide for use for the data element:

> 'Palliative care episodes can include grief and bereavement support for the family and carers of the patient where it is documented in the patient's medical record.'

Geriatric evaluation and management

During consultation, clinician representatives noted that patients with a care type of GEM usually require the active management of medical problems and that this should be reflected within the GEM definition. Clinicians were opposed to 'slow-stream rehabilitation', both as a term and for differentiating between *Rehabilitation care* and *Geriatric evaluation and management.* Stakeholders also agreed that a specific age should not be the basis of an exclusion criterion.

In line with the outcomes of the consultation process, the definition of *Geriatric evaluation and management* was agreed as:

> 'Geriatric evaluation and management is care in which the primary clinical purpose or treatment goal is improvement in the functioning of a patient with multi-dimensional needs associated with medical conditions related to ageing, such as tendency to fall, incontinence, reduced mobility and cognitive impairment. The patient may also have complex psychosocial problems.
>
> Geriatric evaluation and management is always:
>
> - delivered under the management of or informed by a clinician with specialised expertise in geriatric evaluation and management, and
> - evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record that covers the physical, psychological, emotional and social needs of the patient and includes negotiated goals within indicative time frames and formal assessment of functional ability.'

Psychogeriatric care

Stakeholders noted the mental health classification work being undertaken by IHPA and that care provided to patients with a mental health disorder, for example *Psychogeriatric care*, could be included under a proposed mental health care type. Consequently, it was agreed that only minor changes should be made to the *Psychogeriatric care* definition to bring it in line with the other subacute care definitions.

It was suggested that *Psychogeriatric care* is not applicable if the primary focus of care is acute symptom control.

In line with the outcomes of the consultation process, the definition of *Psychogeriatric care* was agreed as:

> 'Psychogeriatric care is care in which the primary clinical purpose or treatment goal is improvement in the functional status, behaviour and/or quality of life for an older

patient with significant psychiatric or behavioural disturbance, caused by mental illness, an age-related organic brain impairment or a physical condition.

Psychogeriatric care is always:

- delivered under the management of or informed by a clinician with specialised expertise in psychogeriatric care, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record, that covers the physical, psychological, emotional and social needs of the patient and includes negotiated goals within indicative time frames and formal assessment of functional ability.

Psychogeriatric care is not applicable if the primary focus of care is acute symptom control.'

Maintenance care

In line with the outcomes of the consultation process, the definition of *Maintenance care* was agreed as:

'Maintenance (or non-acute) care is care in which the primary clinical purpose or treatment goal is support for a patient with impairment, activity limitation or participation restriction due to a health condition. Following assessment or treatment the patient does not require further complex assessment or stabilisation. Patients with a care type of maintenance care often require care over an indefinite period.'

3.4 Guidelines for care type assignment

There are variations in operational practices between and within jurisdictions in relation to assignment of care type and conditions under which a patient should change care type. There is currently no guidance on when a care type change can occur in national metadata. Guidance on care type changing (that is specifications on who, how often and what triggers a change being recorded) will assist consistency in care type changing practices.

Assignment of care type

Clinicians will assign care type based on their clinical judgement. In line with the outcomes of the consultation process, the final agreed business rule for care type assignment is:

'The care type is assigned by the clinician responsible for the management of the care, based on clinical judgements as to the primary clinical purpose of the care to be provided and, for subacute care types, the specialised expertise of the clinician who will be responsible for the management of the care. At the time of subacute care type assignment, a multidisciplinary management plan may not be in place but the intention to prepare one should be known to the clinician assigning the care type.'

The IHPA project brief included the need to provide guidelines on care type changes. Stakeholders requested guidelines around situations where the patient may change care type, including where they continue to be under the management of the same clinician. The following guidance has been included in the guide for use:

'Where the primary clinical purpose or treatment goal of the patient changes, the care type is assigned by the clinician who is taking over responsibility for the management of the care of the patient at the time of transfer. Note, in some circumstances the patient

may continue to be under the management of the same clinician. Evidence of care type change (including the date of handover, if applicable) should be clearly documented in the patient's medical record.'

Stakeholders also requested that guidance related to models of care where the clinician responsible for care is not at the same location as the patient (for example, hub and spoke models) be developed. Taking into account the views of the consultation, the following guidance has been included in the guide for use:

'The clinician responsible for the management of care may not necessarily be located in the same facility as the patient. In these circumstances, a clinician at the patient's location may also have a role in the care of the patient; the expertise of this clinician does not affect the assignment of care type.'

While there was some support for the addition of rules restricting the number of care type changes that can take place within a day, in practice there are some situations in which more than one care type change may be appropriate. For example, a patient who moves from acute care to subacute care, whose condition then quickly deteriorates, may require acute care again. In recognition of this fact, the guide for use includes the following guidance:

'It is highly unlikely that, for care type changes involving subacute care types, more than one change in care type will take place within a 24-hour period. Changes involving subacute care types are unlikely to occur on the date of formal separation.'

Retrospective care type changes

There was considerable discussion on the circumstances in which it is appropriate to change the care type of a patient retrospectively. There was strong support amongst stakeholders for a robust, clearly documented process to be included in the guidelines.

Stakeholders agreed that both patient care and patient information management practices support care type assignment being made at the time of change in care occurring. However, stakeholders agreed that in some exceptional circumstances there may be a need for a retrospective correction to the care type originally assigned.

In line with the outcomes of the consultation process, the business rule for retrospective care type changes was agreed as:

'The care type should not be retrospectively changed unless it is:

- for the correction of a data recording error, or
- the reason for change is clearly documented in the patient's medical record and it has been approved by the hospital's director of clinical services.'

Acute short-term interventions for subacute and non-acute care patients

In line with the outcomes of the consultation process, the business rule for acute short-term intervention for patients undergoing subacute care was agreed as:

'Patients who receive acute same-day intervention(s) during the course of a subacute episode of care do not change care type. Instead, procedure codes for the acute same-day intervention(s) and an additional diagnosis (if relevant) should be added to the record of the subacute episode of care. '

3.5 Related data definitions

In addition to data definitions and guidelines for the care types, the scope of the project included investigating the need for some ancillary definitions. As part of the consultation process, the AIHW canvassed stakeholders on the need for an additional data element describing the 'setting of care' for admitted patients receiving subacute and non-acute care. The AIHW also investigated the utility of definitions for 'designated' and 'non-designated' subacute and non-acute programs, units and hospitals.

As the data development process progressed, stakeholders indicated that there was no need to develop these data definitions.

Setting of care

Stakeholders noted the merit of a setting of care data element in the non-admitted setting but agreed there was no identified need for setting of care in the admitted patient data collection. It was noted that the only distinction that may be of importance for clinical costing purposes is hospital-in-the-home, for which data are already collected under the data item: Episode of admitted patient care—number of days of hospital-in-the-home care, total {N[NN]}.

In line with the outcomes of the consultation, a data element for setting of care was not developed.

Designated units

As stated above, stakeholders strongly supported the inclusion of criteria defining a specialised program into the subacute care type definitions. The incorporation of these criteria tightens the definitions to exclude care where '[care type] is the principal clinical intent]' alone and to specify that the specialised program is associated with specialised clinician expertise and multidisciplinary management plans documented in the patient's medical record.

Members of the SCWG were asked whether, given the tightening of the care type definitions, it was necessary to collect additional information on care delivered through designated units, that is, through units defined by physical characterisations and/or jurisdictional designation. Stakeholders were of the view that there is not sufficient difference between care provided within a designated unit and care provided outside a designated unit to warrant collection of this aspect of care delivery.

In line with the outcomes of the consultation, an additional data element and national definitions were not developed for designated units.

4 Future work

4.1 Feedback of comparative care type information

The revised definitions for care type are expected to lead to the improved identification of subacute and non-acute services. However, they are largely based on clinical decision-making as to the clinical purpose of the care to be provided and the expertise of the clinician under whose management the care is to be provided.

To aid standardisation of care type assignment, there may be value in feeding comparative information on the use of the care types back to clinicians and managers, as is often the practice in other areas of clinical practice. Arrangements could be established to provide information about comparative use of the care types in a way that is designed to inform improvements of consistency, for example, data for hospitals or Local Hospital Networks could be presented in comparison with state/territory or national data.

4.2 Non-admitted patients

The scope of this project was admitted patients. However, subacute care is delivered in a variety of other settings, including to non-admitted patients. The AIHW therefore recommends that consideration be given to introducing these agreed definitions into the non-admitted patient data collections in the future.

Appendix A Admitted patient subacute and non-acute care in Australian hospitals

This appendix presents data and analyses on subacute and non-acute admitted patient activity in Australia in 2010–11, including analyses on care type by jurisdiction and hospital sector, change in activity over time, service use by age and sex, common diagnoses by care type and patterns of care type change.

Data source and definitions

All admitted patient data collected through the Admitted patient care NMDS is held by the AIHW in the NHMD. For 2010–11, the NHMD included all public hospitals except for a small mothercraft hospital in the Australian Capital Territory. Private hospital data were not provided for private free-standing day hospital facilities in the Australian Capital Territory and the Northern Territory, and for one private free-standing day facility in Tasmania.

Each record in the NHMD is based on a single episode of care for an admitted patient. The overall nature of the clinical service provided during an episode of care is described by the data element Hospital service–care type, code N[N].N, also referred to as 'care type' in this appendix.

Separation is a term used to refer to the episode of admitted patient care, which can be a total hospital stay (from admission to discharge, transfer or death) or a portion of a hospital stay beginning or ending in a change of type of care (for example, from acute care to rehabilitation). Separation also means the process by which an admitted patient completes an episode of care by being discharged, dying, transferring to another hospital or changing type of care (AIHW 2012a).

Statistics on admitted patients are compiled when an admitted patient (a patient who undergoes a hospital's formal admission process) completes an episode of admitted patient care and 'separates' from the hospital. This is because most of the data on the use of hospitals by admitted patients are based on information provided at the end of the patient's episode of care, rather than at the beginning. The length of stay and the procedures carried out are then known and the diagnostic information is more accurate (AIHW 2012a).

It is not always the case that the length of a separation equates to the total length of time that a patient was hospitalised during a particular stay. When an admitted patient receives only one type of care during a hospital stay (such as only acute care or only palliative care), the length of stay for that separation is equal to the total length of time they spent in hospital during that stay. However, some patients receive two or more types of care during one hospital stay. For example, a patient may be admitted for active cancer treatment but later be reclassified as a palliative care patient. In such a case, the first episode of care would be completed by a *statistical separation: type change*, and a new episode of care would be started through a *statistical admission: care type change*. Thus, for such a patient, two episodes of care, or separations, would be recorded during the one hospital stay, with each separation having a different 'care type'.

Patient day means the occupancy of a hospital bed (or chair in the case of some same-day patients) by an admitted patient for all or part of a day. The **length of stay** for an overnight patient is calculated by subtracting the date the patient is admitted from the date of

separation and deducting days the patient was on leave. A same-day patient is allocated a length of stay of 1 day.

Admitted patient subacute and non-acute care activity in 2010–11

In 2010–11, there were almost 380,000 hospital separations for subacute and non-acute care, which was 4.5% of all hospital separations for the year (Table A1). The proportion of separations for subacute and non-acute care varied, ranging from 2.2% of all separations in Western Australia to 7.2% in New South Wales.

The proportion of admitted subacute services delivered in the public and private sectors also varied by jurisdiction (Table A1). The majority of admitted subacute and non-acute care in New South Wales was delivered by private hospitals (69%). This was largely driven by the high number of *Rehabilitation care* separations in private hospitals, which made up 68% of all subacute and non-acute episodes of care in New South Wales. By contrast, 71% of subacute and non-acute care in Western Australia was delivered by public hospitals.

Separation rates per 1,000 population varied from 8.4 in Western Australia to 21.8 in New South Wales (Table A1). Rates varied more widely for separations from public hospitals (3.1–17.4) than for private hospitals (2.5–15.0). Comparison of rates for states and territories should take into consideration cross-border flows, particularly in the Australian Capital Territory. There may also be differences between states and territories in the delivery of subacute care which should be considered when interpreting these data.

There were 4,283,041 subacute and non-acute patient days overall in 2010–11 (Table A2). This represented 16% of all patient days in 2010–11. Subacute and non-acute patients utilised 17% of patient days in public hospitals and 13% of patient days in private hospitals.

Overall, the average length of stay of subacute and non-acute care was much higher than the average length of stay for acute care. In 2010–11, the average length of stay in public hospitals was 3.0 days for acute care and 19.2 days for sub- and non-acute care (AIHW 2012b). In private hospitals, the average length of stay was 2.2 days for acute care and 5.2 days for sub- and non-acute care (AIHW 2012b). It was higher in public hospitals than in private hospitals (Table A2) for all care types except *Palliative care*. For example, the average length of stay for *Rehabilitation care* was 17.4 days in public hospitals, compared with 4.8 days in private hospitals.

Rehabilitation care represented the highest proportion of subacute care for both separations (76%) (Table A1) and patient days (58%) (Table A2). *Palliative care* (9%) was the second most common subacute care type recorded in 2010–11 in terms of separations, but *Maintenance care* was second highest in terms of patient days (18%). *Rehabilitation care* was the most common type of care in both public (53%) and private sectors (93%) (Table A3).

Table A1: Subacute and non-acute separations, by care type and hospital sector, states and territories, 2010–11

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
Public hospitals									
Rehabilitation	30,832	14,776	19,385	9,496	7,664	1,114	2,718	441	86,426
Palliative care	10,919	6,659	6,599	1,234	1,678	217	629	320	28,255
Geriatric evaluation and management	5,624	15,293	2,172	804	1,701	141	707	42	26,484
Psychogeriatric care	808	0	596	730	288	1	21	1	2,445
Maintenance care	7,919	621	5,863	1,384	2,803	437	1,570	292	20,889
Public hospitals total	*56,102*	*37,349*	*34,615*	*13,648*	*14,134*	*1,910*	*5,645*	*1,096*	*164,499*
Proportion of all public hospital separations	*3.4*	*2.4*	*3.5*	*2.4*	*3.5*	*1.9*	*5.8*	*1.0*	*3.0*
Separations per 1,000 population	*6.7*	*5.9*	*7.5*	*6.0*	*6.9*	*3.1*	*17.4*	*8.0*	*6.7*
Private hospitals									
Rehabilitation	122,431	17,453	30,929	2,241	22,185	n.p.	n.p.	n.p.	200,808
Palliative care	475	617	1,715	2,317	264	n.p.	n.p.	n.p.	5,507
Geriatric evaluation and management	0	0	22	2	49	n.p.	n.p.	n.p.	77
Psychogeriatric care	0	5,339	3	992	0	n.p.	n.p.	n.p.	6,336
Maintenance care	139	38	2,231	126	12	n.p.	n.p.	n.p.	2,665
Private hospitals total	*123,045*	*23,447*	*34,990*	*5,678*	*22,510*	*n.p.*	*n.p.*	*n.p.*	*215,393*
Proportion of all private hospital separations	*12.0*	*2.7*	*4.0*	*1.3*	*7.9*	*n.p.*	*n.p.*	*n.p.*	*6.0*
Separations per 1,000 population	*15.0*	*3.8*	*7.6*	*2.5*	*11.3*	*n.p*	*n.p.*	*n.p.*	*8.8*
Total separations	**179,147**	**60,796**	**69,605**	**19,326**	**36,644**	**n.p.**	**n.p.**	**n.p.**	**379,892**
Proportion of all separations	**7.2**	**2.6**	**3.9**	**2.2**	**5.6**	**n.p.**	**n.p.**	**n.p.**	**4.5**
Total separations per 1,000 population	**21.8**	**9.7**	**15.1**	**8.4**	**18.1**	**n.p.**	**n.p.**	**n.p.**	**15.5**

n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

Source: AIHW 2012a, National Hospital Morbidity Database 2010–11 unpublished data.

Table A2: Patient days and average length of stay for subacute and non-acute separations, by care type and hospital sector, 2010–11

	Public hospitals		Private hospitals		Total	
Care type	Patient days	Average length of stay	Patient days	Average length of stay	Patient days	Average length of stay
Rehabilitation	1,501,869	17.4	964,215	4.8	2,466,084	8.6
Palliative care	319,659	11.3	67,142	12.2	386,801	11.5
Geriatric evaluation and management	507,556	19.2	575	7.5	508,131	19.1
Psychogeriatric care	120,869	49.4	43,758	6.9	164,627	18.7
Maintenance care	711,297	34.1	46,101	17.3	757,398	32.2
Total	**3,161,250**	**19.2**	**1,121,791**	**5.2**	**4,283,041**	**11.3**

Source: AIHW 2012a.

The type of care delivered by hospital sectors (public and private) in 2010–11 varied considerably between jurisdictions (Table A3). For example, in Western Australia, 70% of subacute episodes of care in public hospitals had a care type of *Rehabilitation care*, compared with 40% in Victoria and the Northern Territory. *Geriatric evaluation and management* was most commonly reported in Victoria (41% of subacute episodes of care) compared with between 4% and 13% in other states and territories. For *Maintenance care,* the Australian Capital Territory and the Northern Territory recorded the highest proportion of episodes (28% and 27% respectively) compared with just 2% in Victoria and between 10% and 23% in the other states.

In private hospitals, almost all of the subacute episodes of care provided in New South Wales were *Rehabilitation care* (99%). In Western Australia, *Rehabilitation care* and *Palliative care* each accounted for around 40% of subacute care episodes. *Psychogeriatric care* represented 23% of subacute care in Victoria and 17% in Western Australia.

Table A3: Subacute and non-acute separations, by care type and hospital sector, states and territories, 2010–11 (per cent)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
Public hospitals									
Rehabilitation	55.0	39.6	56.0	69.6	54.2	58.3	48.1	40.2	52.5
Palliative care	19.5	17.8	19.1	9.0	11.9	11.4	11.1	29.2	17.2
Geriatric evaluation and management	10.0	40.9	6.3	5.9	12.0	7.4	12.5	3.8	16.1
Psychogeriatric care	1.4	0.0	1.7	5.3	2.0	0.1	0.4	0.1	1.5
Maintenance care	14.1	1.7	16.9	10.1	19.8	22.9	27.8	26.6	12.7
Public hospital total	*100.0*	*100.0*	*100.0*	*100.0*	*100.0*	*100.0*	*100.0*	*100.0*	*100.0*
Private hospitals									
Rehabilitation	99.5	74.4	88.4	39.5	98.6	n.p.	n.p.	n.p.	93.2
Palliative care	0.4	2.6	4.9	40.8	1.2	n.p.	n.p.	n.p.	2.6
Geriatric evaluation and management	0.0	0.0	0.1	0.0	0.2	n.p.	n.p.	n.p.	0.0
Psychogeriatric care	0.0	22.8	0.0	17.5	0.0	n.p.	n.p.	n.p.	2.9
Maintenance care	0.1	0.2	6.6	2.2	0.1	n.p.	n.p.	n.p.	1.2
Private hospital total	*100.0*	*100.0*	*100.0*	*100.0*	*100.0*	*n.p.*	*n.p.*	*n.p.*	*100.0*

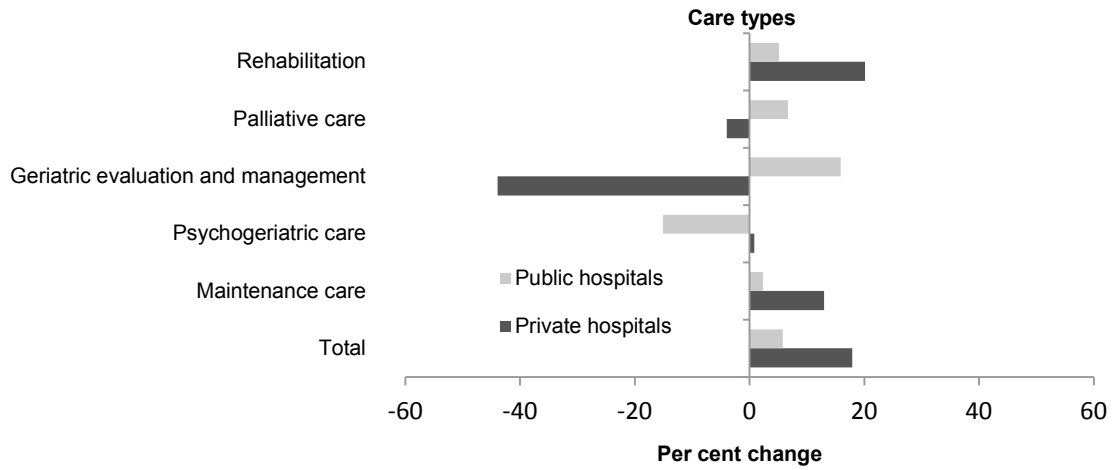
n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

Source: AIHW 2012a.

How has activity changed over time?

Between 2006–07 and 2010–11, the number of separations for subacute and non-acute care increased from about 243,000 to almost 380,000, an average increase of 12% per year. Over this period, the average rate of increase was higher in private hospitals (18%) than in public hospitals (6%). In particular, *Rehabilitation care* in private hospitals doubled, increasing by an average of 20% per year between 2006–07 and 2010–11 (Figure A1).

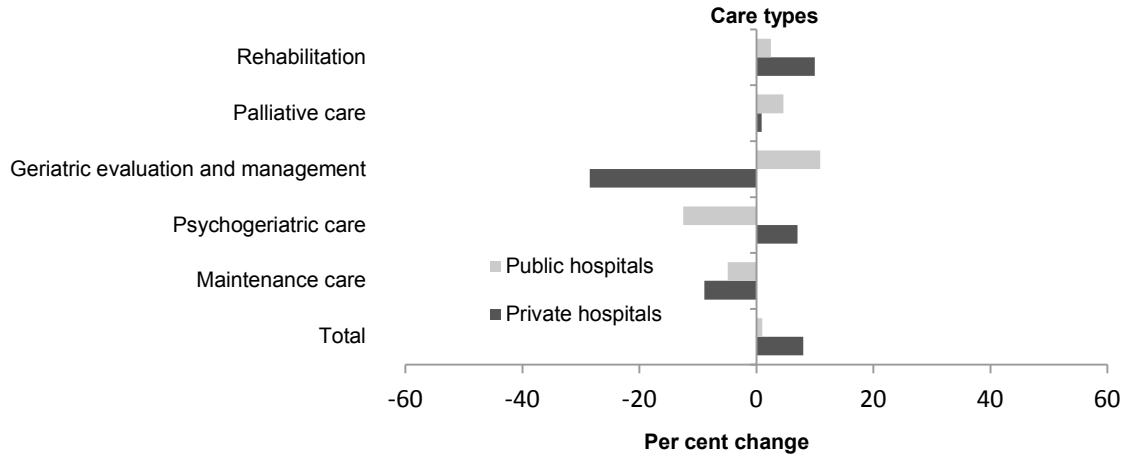
The number of *Geriatric evaluation and management* separations in public hospitals increased by 16% while private hospital separations decreased by 44% between 2006–07 and 2010–11. Over the same period *Psychogeriatric care* separations in public hospitals decreased by 15%.



Source: AIHW 2012b.

Figure A1: Average annual change in the number of separations for subacute and non-acute care, by hospital sector, 2006–07 to 2010–11

Between 2006–07 and 2010–11, number of patient days increased by an average of 1% each year, 1% in public hospitals and 8% in private hospitals (Figure A2). The greatest change in number of patient days was in *Geriatric evaluation and management*, which increased by 11% on average each year in public hospitals and decreased by 29% in private hospitals.



Source: National Hospital Morbidity Database 2010–11 unpublished data.

Figure A2: Average annual change in the number of patient days for subacute and non-acute care, by hospital sector, 2006–07 to 2010–11

The average rates of increases for subacute and non-acute care separations in public and private hospitals also varied between jurisdictions between 2006–07 and 2010–11 (Table A4). Over the period, the average rate of increase for subacute and non-acute care in public hospitals was highest in the Australian Capital Territory (11%). For Tasmania, the number of subacute and non-acute care separations in public hospitals decreased by 3%.

There was considerably more variation in rates of increase for private hospitals where the average rate of increase per year was highest for South Australia (44%) and New South Wales (21%) (Table A4).

Table A4: Subacute and non-acute separations[(a)], by hospital sector, states and territories, 2006–07 to 2010–11

						Change (per cent)	
	2006–07	2007–08	2008–09	2009–10	2010–11	Average since 2006–07	Since 2009–10
New South Wales							
Public hospitals	41,864	43,105	45,153	50,960	56,102	7.6	10.1
Private hospitals	57,719	68,585	82,567	100,130	123,045	20.8	22.9
Victoria							
Public hospitals	33,901	32,431	32,651	35,065	37,349	2.5	6.5
Private hospitals	19,886	21,069	20,538	24,022	23,447	4.2	–2.4
Queensland							
Public hospitals	25,594	27,604	30,439	32,104	34,615	7.8	7.8
Private hospitals	23,249	28,743	28,805	33,487	34,990	10.8	4.5
Western Australia							
Public hospitals	12,226	13,372	13,487	12,601	13,648	2.8	8.3
Private hospitals	3,793	3,579	4,043	4,867	5,678	10.6	16.7
South Australia							
Public hospitals	10,472	11,073	11,614	12,518	14,134	7.8	12.9
Private hospitals	5,269	6,755	12,763	18,052	22,510	43.8	24.7
Tasmania							
Public hospitals	2,168	2,051	2,145	2,230	1,910	–3.1	–14.3
Private hospitals	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Australian Capital Territory							
Public hospitals	3,770	4,665	5,956	5,749	5,645	10.6	–1.8
Private hospitals	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Northern Territory							
Public hospitals	1,070	1,261	1,155	1,351	1,096	0.6	–18.9
Private hospitals	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.
Total public hospitals	**131,065**	**135,562**	**142,600**	**152,578**	**164,499**	**5.8**	**7.8**
Total private hospitals	**111,443**	**130,068**	**151,923**	**184,461**	**215,393**	**17.9**	**16.8**
Total	**242, 508**	**265,630**	**294,523**	**337,892**	**379,892**	**11.9**	**12.7**

(a) Annual average change, not adjusted for changes in coverage and re-categorisation of hospitals as public or private.

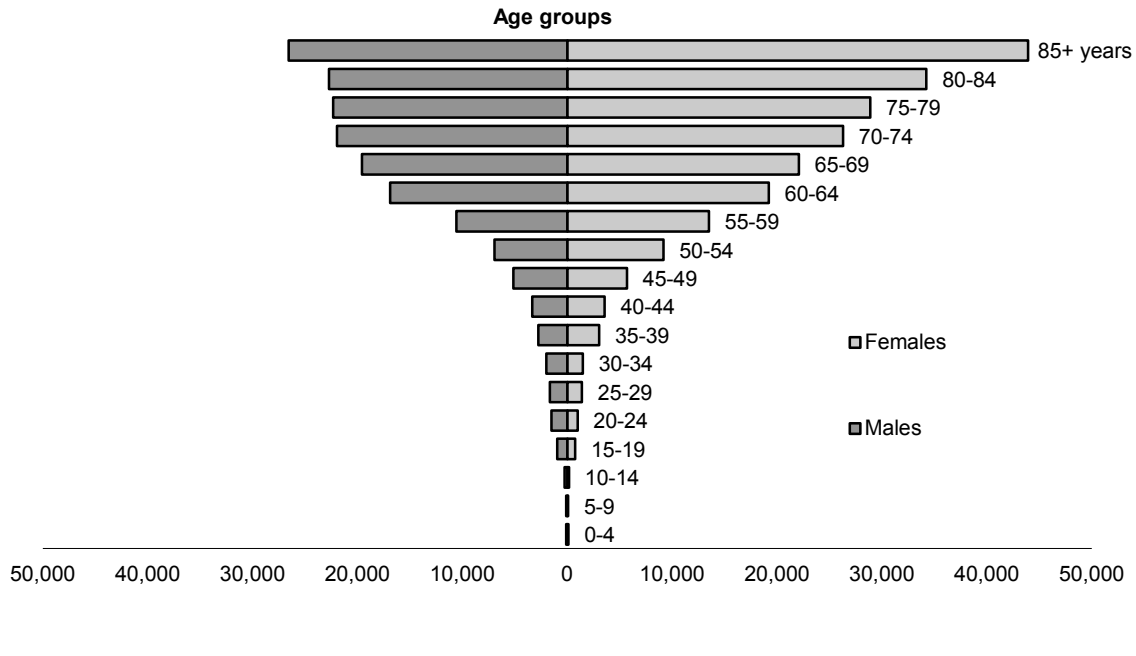
n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

Source: AIHW 2012a.

Who uses these services?

Females accounted for more than half (56%) of subacute and non-acute separations and there were more separations for females than for males in the age groups 35 and over in 2010–11

(Figure A3). Persons aged 65 and over accounted for the majority (71%) of all subacute and non-acute separations in public and private hospitals. This compares with 20% of all subacute and non-acute separations for patients aged 50 to 64 and 9% under 50.



Source: AIHW 2012a.

Figure A3: Subacute and non-acute separations by sex and age group, all hospitals, 2010–11

For public hospitals, the separation rate for subacute care for persons aged 65 or over ranged from 13 per 1,000 population in Tasmania to 72 per 1,000 in the Australian Capital Territory (Table A5). For private hospitals, the separation rate for persons aged 65 or over varied from 16 per 1,000 population in Western Australia to 79 per 1,000 in New South Wales.

Comparison of rates for states and territories should take into consideration cross-border flows, particularly in the Australian Capital Territory. There may also be differences between states and territories in the delivery of subacute care which should be considered when interpreting these data. There may also be differences in how care types are assigned.

Table A5: Separations for persons aged 65 or over receiving subacute services, by hospital sector, states and territories, 2010–11

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
Public hospitals									
Separations	37,095	29,669	17,942	9,451	7,633	1,034	2,678	299	105,801
Separation rate (per 1,000 population)	35.0	37.2	31.9	33.8	28.2	13.0	71.9	26.7	34.2
Private hospitals									
Separations	81,576	19,621	20,279	4,598	14,180	n.p	n.p	n.p	143,952
Separation rate (per 1,000 population)	79.2	25.0	36.0	16.3	54.8	n.p	n.p	n.p	47.3
Total									
Separations	**118,671**	**49,290**	**38,221**	**14,049**	**21,813**	**n.p**	**n.p**	**n.p**	**249,753**
Separation rate (per 1,000 population)	**114.1**	**62.2**	**67.9**	**50.0**	**83.0**	**n.p**	**n.p**	**n.p**	**81.4**

n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

Source: AIHW 2012a.

Why did people receive the care?

The reason that a patient received admitted patient care can be described in terms of the principal diagnosis. The **principal diagnosis** is the diagnosis established after study to be chiefly responsible for occasioning the episode of admitted patient care. An **additional diagnosis** is a condition or complaint that either coexists with the principal diagnosis or arises during the episode of care. Additional diagnoses are reported if the conditions affect patient management. This section details the most common reasons for care using principal and additional diagnoses in 3-character ICD-10-AM groupings for each subacute care type.

Care involving use of rehabilitation procedures accounted for 76% of principal diagnoses reported for all subacute and non-acute separations (at the 3-character level) in 2010–11 (AIHW 2012a). This diagnosis is required to be reported as the principal diagnosis for *Rehabilitation care.* Because of this requirement, the first additional diagnosis is usually the reason for care for *Rehabilitation care.* The 10 most common first additional diagnoses reported for *Rehabilitation care* separations included 7 musculoskeletal conditions and injuries (Table A6). More than half of rehabilitation separations in private hospitals and about one-quarter of rehabilitation separations in public hospitals reported these 10 first additional diagnoses.

Table A6: Separations for the top 10 first additional diagnoses in 3-character ICD-10-AM groupings for Rehabilitation care separations, by hospital sector, 2010–11

First additional diagnosis		Public hospitals	Private hospitals	Total
M17	Gonarthrosis [arthrosis of knee]	3,915	44,461	48,376
M16	Coxarthrosis [arthrosis of hip]	2,078	18,362	20,440
S72	Fracture of femur	8,037	8,168	16,205
I63	Cerebral infarction	5,806	4,218	10,024
M54	Dorsalgia	1,111	7,531	8,642
M25	Other joint disorders, not elsewhere classified	1,554	4,900	6,454
Z96	Presence of other functional implants	393	6,054	6,447
S32	Fracture of lumbar spine and pelvis	2,256	4,048	6,304
M48	Other spondylopathies	678	5,234	5,912
T84	Complications of internal orthopaedic prosthetic devices, implants and grafts	897	3,979	4,876
	Other	59,701	93,853	153,554
Total Rehabilitation separations		**86,426**	**200,808**	**287,234**

Source: AIHW 2012a.

For *Palliative care*, 9 of the top 10 principal diagnoses were for malignant neoplasms, and these accounted for 47% of principal diagnoses for *Palliative care* separations. The top 5 neoplasm-related principal diagnoses are presented in Table A7, as are the top 5 non-neoplasm related principal diagnoses.

Table A7: Separations for the top 5 neoplasm related and other principal diagnoses in 3-character ICD-10-AM groupings for Palliative care separations, by hospital sector, 2010–11

Principal diagnosis		Public hospitals	Private hospitals	Total
Neoplasm-related				
C34	Malignant neoplasm of bronchus and lung	3,322	643	3,965
C79	Secondary malignant neoplasm of other and unspecified sites	2,237	606	2,843
C78	Secondary malignant neoplasm of respiratory and digestive organs	1,630	511	2,141
C61	Malignant neoplasm of prostate	1,019	192	1,211
C25	Malignant neoplasm of pancreas	1,001	205	1,206
Other				
I50	Heart failure	691	145	836
J44	Other chronic obstructive pulmonary disease	595	95	690
J18	Pneumonia, organism unspecified	477	76	553
G12	Spinal muscular atrophy and related syndromes	343	81	424
I63	Cerebral infarction	394	19	413
	Other (includes neoplasm-related not listed above)	16,546	2,934	19,480
Total Palliative care separations		**28,255**	**5,507**	**33,762**

Source: AIHW 2012a.

For *Geriatric evaluation and management*, the top 10 principal diagnoses made up 39% of all separations within this care type. *Care involving use of rehabilitation procedures* accounted for 12% of separations. Acute conditions (such as pneumonia and fractures of the femur, lumbar spine and pelvis) and chronic conditions (such as heart failure and chronic obstructive pulmonary disease) were common for this care type (Table A8).

Table A8: Separations for the top 10 principal diagnoses in 3-character ICD-10-AM groupings for Geriatric evaluation and management separations, by hospital sector, 2010–11

Principal diagnosis		Public hospitals	Private hospitals	Total
Z50	Care involving use of rehabilitation procedures	3,147	0	3,147
S72	Fracture of femur	1,414	1	1,415
I50	Heart failure	901	1	902
F05	Delirium, not induced by alcohol and other psychoactive substances	796	1	797
J18	Pneumonia, organism unspecified	758	4	762
N39	Other disorders of urinary system	732	0	732
S32	Fracture of lumbar spine and pelvis	726	0	726
J44	Other chronic obstructive pulmonary disease	702	0	702
Z75	Problems related to medical facilities and other health care	631	0	631
I63	Cerebral infarction	557	0	557
	Other	16,120	70	16,190
Total Geriatric evaluation and management separations		**26,484**	**77**	**26,561**

Source: AIHW 2012a.

For *Psychogeriatric care*, the top 10 principal diagnoses accounted for 79% of all separations within this care type (Table A9). In public hospitals about 29% of *Psychogeriatric care* separations had a principal diagnosis of depressive disorder, followed by 13% separations with Alzheimer's disease and 12% separations with dementia (vascular dementia and unspecified dementia).

Table A9: Separations for the top 10 principal diagnoses in 3-character ICD-10-AM groupings for Psychogeriatric care separations, by hospital sector, 2010–11

Principal diagnosis		Public hospitals	Private hospitals	Total
F33	Recurrent depressive disorder	243	1,754	1,997
F32	Depressive episode	461	877	1,338
G30	Alzheimer's disease	324	775	1,099
F41	Other anxiety disorders	54	502	556
F31	Bipolar affective disorder	195	357	552
F10	Mental and behavioural disorders due to use of alcohol	39	434	473
F20	Schizophrenia	170	130	300
F01	Vascular dementia	123	92	215
F03	Unspecified dementia	178	12	190
F43	Reaction to severe stress, and adjustment disorders	48	129	177
	Other	610	1,274	1,884
Total Psychogeriatric care separations		**2,445**	**6,336**	**8,781**

Source: AIHW 2012a.

For *Maintenance care*, the top 10 principal diagnoses made up almost 91% of all separations within this care type (Table A10). Some patients receive *Maintenance care* in hospitals due to unavailability of non-hospital care such as in residential aged care facilities. In such cases, a code from the category Z75 *Problems related to medical facilities and other health care* is assigned as the principal diagnosis. In public hospitals, *Problems related to medical facilities and other health care* accounted for 78% of principal diagnoses in this care type.

Table A10: Separations for the top 10 principal diagnoses in 3-character ICD-10-AM groupings for Maintenance care separations, public and private hospitals, 2010–11

Principal diagnosis		Public hospitals	Private hospitals	Total
Z75	Problems related to medical facilities and other health care	16,232	992	17,224
Z54	Convalescence	919	539	1,458
Z74	Problems related to care-provider dependency	1,342	3	1,345
F33	Recurrent depressive disorder	5	842	847
F20	Schizophrenia	166	0	166
J44	Other chronic obstructive pulmonary disease	77	4	81
F03	Unspecified dementia	70	3	73
Z48	Other surgical follow-up care	67	6	73
Z59	Problems related to housing and economic circumstances	69	0	69
Z76	Persons encountering health services in other circumstances	31	26	57
	Other	1,911	250	2,161
Total Maintenance care separations		**20,889**	**2,665**	**23,554**

Source: AIHW 2012a.

How did people access these services?

The **mode of admission** records the mechanism by which an admitted patient begins an episode of care. More than half of all subacute and non-acute separations had a mode of admission of 'Other', the term used to refer to all planned and unplanned admissions except transfers from other hospitals and statistical admissions (Table A11).

Table A11: Subacute and non-acute separations, by mode of admission and hospital sector, 2010–11

	Public hospitals	Private hospitals	Total
Admitted patient transferred from another hospital	49,726	39,032	88,758
Statistical admission: care type change	72,126	13,906	86,032
Other	42,497	162,002	204,499
Not reported	150	453	603
Total	**164,499**	**215,393**	**379,892**

Source: AIHW 2012a.

Statistical admission: care type change was the most common admission mode for subacute and non-acute separations in public hospitals (Table A11). This indicates that the clinical intent of the patient's care had changed during their stay in hospital. Public hospitals recorded higher proportions of admitted patients transferred from another hospital than private hospitals.

How was care completed?

The **mode of separation** records the status of the patient at the time of separation and, for some categories, the place to which the person was discharged or transferred. In 2010–11, the most common mode of separation for subacute and non-acute separations was *Other* (78%), which includes discharge to usual residence/own accommodation/welfare institution (Table A12). Almost 5% of separations ended with *Discharged or transferred to a residential aged care*

service and a further 5% were transferred to another hospital. In public hospitals, 10% of subacute and non-acute separations ended with a *statistical discharge: type change*.

Table A12: Subacute and non-acute separations, by mode of separation, by hospital sector, 2010–11

Separation mode	Public hospitals	Private hospitals	Total
Discharge/transfer to an(other) acute hospital	15,591	3,310	18,901
Discharge/transfer to residential aged care service[(a)]	16,260	1,763	18,023
Discharge/transfer to an(other) psychiatric hospital	178	5	183
Discharge/transfer to other health-care accommodation	3,485	1,448	4,933
Statistical discharge: type change	16,662	2,290	18,952
Left against medical advice/discharge at own risk	1,114	178	1,292
Statistical discharge from leave	1,113	20	1,133
Died	18,400	3,527	21,927
Other[(b)]	91,692	202,852	294,544
Not reported	4	0	4
Total	**164,499**	**215,393**	**379,892**

(a) The separation mode Discharge/transfer to residential aged care service excludes where this was the usual place of residence.

(b) The separation mode Other includes discharge to usual residence/own accommodation/welfare institution (including prisons, hostels and group homes *providing primarily welfare services)*.

Source: AIHW 2012a.

Patterns of change of care type

An analysis of the admission and separation modes of episodes of care gives an indication of the patterns of subacute and non-acute care delivery. That is, it shows what types of care are delivered when a patient is first admitted, after the patient has received another type of care (for example, acute care) or where care is delivered as the final type of care before discharge from the hospital. Tables A13 to A16 show the patterns of care type delivery for acute, subacute and non-acute care by jurisdiction. Analyses were done for public hospitals only, as these are the hospitals to be funded under ABF arrangements, and exclude public psychiatric hospitals, which are shown separately in Table A17.

Table A13 shows separations where the admission mode was not *statistical admission: care type change* and the separation mode was *statistical discharge: type change*. That is, they are separations where the patient has been admitted to the hospital, received care and then changed care type without leaving the hospital.

Table A14 shows separations where the admission mode was *statistical admission: care type change* and the separation mode was *statistical discharge: type change*. Separations in this table are for patients who have previously received a different type of care in the hospital without having left. At the end of these separations, patients again changed care type without leaving the hospital.

Table A15 shows separations where the admission mode was *statistical admission: care type change* and the separation mode was not *statistical discharge: type change.* That is, for these separations, patients had previously received a different type of care during their hospital stay and this is the last type of care the patient received before leaving the hospital.

Table A16 shows separations where the admission mode was not *statistical admission: care type change* and the separation mode was not *statistical discharge: type change*. That is, for these separations, patients were separated having received only one type of care.

Patterns of subacute care delivery

Analysis of these tables in combination shows that overall in 2010–11 subacute care was most commonly delivered to patients who received only one type of care during their hospital stay (Table A16). For patients who received two or more types of care during their hospital stay (Tables A13–A15), subacute care was most likely to be delivered as the last care type before the patient left the hospital (Table A15). Comparatively little subacute care was delivered to patients as the first of multiple care types during a hospital stay (Table A13).

There was some variation between jurisdictions and between care types in 2010–11. In South Australia, most (90%) *Rehabilitation care* was delivered to patients who received only one type of care (Table A16). In comparison, only 10% of *Rehabilitation care* was delivered to patients who received only one care type in Tasmania. Instead, the majority of *Rehabilitation care* in Tasmania was delivered to patients as the last type care in their hospital stay (61%) (Table A15), after they had received another type of care.

The proportion of *Palliative care* delivered to patients with only one care type varied less between jurisdictions in 2010–11; from 44% in Queensland to 84% in the Victoria. Where *Palliative care* was delivered to patients with multiple types of care, it was overwhelmingly delivered as the last care type before the end of the hospital stay for all jurisdictions (Table A15).

Patterns of non-acute care delivery

The majority of *Maintenance care* was delivered to patients with multiple types of care in their hospital stay in all jurisdictions, except Western Australia (Tables A13–A15). Maintenance care was predominately delivered to patients as their last type of care before the end of the hospital stay (Table A15) in all jurisdictions except the Northern Territory, where it was predominantly delivered to patients in the middle of the hospital stay (Table A14). In Western Australia, care was equally delivered as the last of multiple care types (Table A15) and to patients with only one type of care (47% in both categories) (Table A16).

Average lengths of stay

Average lengths of stay (ALOS) varied by jurisdiction and care type in all tables. Notably, the ALOS for patients receiving *Acute care* who had only one care type during their stay (Table A16) was much lower than for patients who had two or more care types during their stay (Tables A13–A15) (2.8 days for one care type compared with 7.0–13.2 days for two or more care types).

Overall, ALOS for *Rehabilitation care* was longest for patients who received *Rehabilitation care* as the first of multiple care types (26.6 days) (Table A12). Similarly, for *Psychogeriatric care* ALOS stay was longest for patients who received *Psychogeriatric care* as the first of multiple care types.

Table A13: Number and average length of stay for separations with an admission mode other than statistical admission: care type change and a separation mode of statistical discharge: type change, public hospitals[a], by care type[b], states and territories, 2010–11

	NSW		Vic		Qld		WA		SA		Tas		ACT		NT[c]		Total	
Care type	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**
Acute care	21,076	12.5	11,172	9.5	13,614	13.0	6,152	11.4	4,275	14.8	1,738	14.6	3,432	8.9	904	13.6	62,363	12.0
Rehabilitation	882	27.0	463	23.8	. .	. .	322	19.3	157	46.5	n.p.	n.p.	. .	. .	n.p.	n.p.	1,859	26.6
—Designated unit	. .	. .	. .	. .	144	28.0	. .	. .	. .	. .	. .	. .	27	27.7	. .	. .	171	27.9
—Designated program	. .	. .	. .	. .	34	129.9	. .	. .	. .	. .	. .	. .	8	n.p.	. .	. .	42	111.0
—Principal clinical intent	. .	. .	. .	. .	n.p.	26.8	. .	. .	. .	. .	. .	. .	n.p.	n.p.	. .	. .	137	26.5
Palliative care	65	18.8	47	29.7	. .	. .	n.p.	n.p.	15	18.3	n.p.	n.p.	. .	. .	. .	. .	146	22.6
—Designated unit	. .	. .	. .	. .	90	15.8	. .	. .	. .	. .	. .	. .	. .	. .	18	19.9	108	16.5
—Designated program	. .	. .	. .	. .	132	4.1	. .	. .	. .	. .	. .	. .	. .	. .	. .	. .	132	4.1
—Principal clinical intent	. .	. .	. .	. .	n.p.	8.5	. .	. .	. .	. .	. .	. .	n.p.	n.p.	. .	. .	47	8.2
Geriatric evaluation and management	395	22.6	345	25.3	30	26.0	n.p.	n.p.	73	19.9	n.p.	n.p.	25	22.5	. .	. .	873	23.6
Psychogeriatric care	31	23.2	. .	. .	20	48.9	58	78.0	40	49.4	. .	. .	. .	. .	. .	. .	149	55.0
Maintenance care	101	36.2	16	297.3	55	43.3	28	25.0	15	330.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.	229	73.3
Total	**22,550**	**13.4**	**12,043**	**11.0**	**14,298**	**13.7**	**6,580**	**12.5**	**4,575**	**17.3**	**1,779**	**14.9**	**3,498**	**9.2**	**933**	**14.0**	**66,256**	**13.0**

(a) Excludes public psychiatric hospitals.

(b) Excludes separations for *Newborns* (without qualified days) and records for *Hospital boarders* and *Posthumous organ procurement*.

(c) Counts less than 10 are suppressed for Northern Territory.

. . not applicable

n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

ALOS average length of stay.

Source: National Hospital Morbidity Database 2010–11, unpublished data.

Table A14: Number and average length of stay for separations with an admission mode of statistical admission: care type change and separation mode of statistical discharge: type change, public hospitals[a], by care type[b], states and territories, 2010–11

	NSW		Vic		Qld		WA		SA		Tas		ACT		NT[c]		Total	
Care type	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**
Acute care	1,286	8.7	758	9.5	2,717	5.0	705	4.7	253	10.2	214	7.0	308	10.6	38	37.1	6,279	7.0
Rehabilitation	1,718	19.6	315	19.0	. .	. .	729	12.3	63	16.5	282	18.8	. .	. .	158	28.4	3,265	18.2
—Designated unit	. .	. .	. .	. .	1,643	17.7	. .	. .	. .	. .	. .	. .	18	19.0	. .	. .	1,661	17.7
—Designated program	. .	. .	. .	. .	205	55.8	. .	. .	. .	. .	. .	. .	70	44.1	. .	. .	275	52.9
—Principal clinical intent	. .	. .	. .	. .	1,618	10.0	. .	. .	. .	. .	. .	. .	380	14.3	. .	. .	1,998	10.8
Palliative care	65	13.9	18	20.9	. .	. .	12	24.3	7	n.p.	n.p.	n.p.	. .	. .	n.p.	n.p.	104	17.6
—Designated unit	. .	. .	. .	. .	85	11.0	. .	. .	. .	. .	. .	. .	. .	. .	15	18.6	100	12.2
—Designated program	. .	. .	. .	. .	75	3.4	. .	. .	. .	. .	. .	. .	. .	. .	. .	. .	75	3.4
—Principal clinical intent	. .	. .	. .	. .	118	8.5	. .	. .	. .	. .	. .	. .	10	13.0	. .	. .	128	8.8
Geriatric evaluation and management	894	8.3	385	17.5	805	19.0	223	7.9	206	20.2	34	30.4	248	13.6	n.p.	n.p.	2,803	14.3
Psychogeriatric care	85	13.0	. .	. .	272	11.5	20	36.0	19	34.1	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.	400	14.1
Maintenance care	495	19.8	38	58.7	589	37.6	50	43.8	230	68.4	37	23.1	328	14.5	167	29.6	1,934	32.4
Total	**4,543**	**14.1**	**1,514**	**14.9**	**8,127**	**13.9**	**1,739**	**9.9**	**778**	**31.3**	**569**	**15.4**	**1,366**	**15.0**	**386**	**29.3**	**19,022**	**14.8**

(a) Excludes public psychiatric hospitals.

(b) Excludes separations for *Newborns* (without qualified days) and records for *Hospital boarders* and *Posthumous organ procurement*.

(c) Counts less than 10 are suppressed for Northern Territory.

. . not applicable

n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

ALOS average length of stay.

Source: National Hospital Morbidity Database 2010–11, unpublished data.

Table A15: Number and average length of stay for separations with an admission mode of statistical admission: care type change and a separation mode other than statistical discharge: type change, public hospitals[a], by care type[b], states and territories, 2010–11

	NSW		Vic		Qld		WA		SA		Tas		ACT		NT[c]		Total	
Care type	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**
Acute care	933	12.3	2,559	16.2	510	12.7	814	6.5	190	13.0	125	11.3	279	9.8	553	13.6	5,963	13.2
Rehabilitation	10,344	17.6	2,755	18.1	. .	. .	4,091	16.6	563	13.8	685	24.9	. .	. .	165	23.8	18,603	17.7
—Designated unit	. .	. .	. .	. .	2,926	28.3	. .	. .	. .	. .	. .	.	77	24.7	. .	. .	3,003	28.2
—Designated program	. .	. .	. .	. .	211	99.9	. .	. .	. .	. .	. .	.	60	47.4	. .	. .	271	88.2
—Principal clinical intent	. .	. .	. .	. .	2,392	10.9	. .	. .	. .	. .	. .	.	1,277	6.5	. .	. .	3,669	9.4
Palliative care	3,049	8.4	1,019	9.0	. .	. .	376	7.5	320	12.6	n.p.	12.4	. .	. .	n.p.	n.p.	4,854	8.8
—Designated unit	. .	. .	. .	. .	1,356	8.7	. .	. .	. .	. .	. .	.	n.p.	n.p.	n.p.	8.1	1,465	8.7
—Designated program	. .	. .	. .	. .	129	8.2	. .	. .	. .	. .	. .	.	. .	. .	. .	. .	129	8.2
—Principal clinical intent	. .	. .	. .	. .	1,671	6.4	. .	. .	. .	. .	. .	. .	259	7.0	. .	. .	1,930	6.5
Geriatric evaluation and management	2,362	7.6	4,662	18.0	1,302	20.0	566	7.7	1,075	14.8	98	35.8	342	8.2	33	26.7	10,440	14.9
Psychogeriatric care	253	15.3	. .	. .	143	25.2	107	40.4	32	34.6	n.p.	n.p.	n.p.	n.p.	n.p.	n.p.	541	24.0
Maintenance care	5,679	16.0	446	62.4	3,552	28.0	651	51.1	2,394	35.9	327	26.2	1,218	9.9	62	25.0	14,329	25.1
Total	**22,620**	**14.7**	**11,441**	**18.6**	**14,192**	**20.4**	**6,605**	**17.9**	**4,574**	**25.6**	**1,324**	**23.9**	**3,518**	**9.3**	**923**	**16.0**	**65,197**	**17.6**

(a) Excludes public psychiatric hospitals.

(b) Excludes separations for *Newborns* (without qualified days) and records for *Hospital boarders* and *Posthumous organ procurement*.

(c) Counts less than 10 are suppressed for Northern Territory.

. . not applicable

n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

ALOS average length of stay.

Source: National Hospital Morbidity Database 2010–11, unpublished data.

Table A16: Number and average length of stay for separations with an admission mode other than statistical admission: care type change and a separation mode other than statistical discharge: type change, public hospitals[a], by care type[b], states and territories, 2010–11

	NSW		Vic		Qld		WA		SA		Tas		ACT		NT[c]		Total	
Care type	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**	**No.**	**ALOS**
Acute care	1,482,597	3.2	1,431,326	2.5	902,755	2.6	520,619	2.5	365,651	3.0	93,832	3.1	82,809	2.4	100,845	2.3	4,980,434	2.8
Rehabilitation	17,224	13.1	11,243	21.2	. .	. .	4,351	21.0	6,785	11.5	116	23.7	. .	. .	114	1.9	39,833	16.0
—Designated unit	. .	. .	. .	. .	7,934	3.8	. .	. .	. .	. .	. .	. .	769	7.9	. .	. .	8,703	4.1
—Designated program	. .	. .	. .	. .	1,054	9.4	. .	. .	. .	. .	. .	. .	n.p.	n.p.	n.p.	n.p.	1,058	9.5
—Principal clinical intent	. .	. .	. .	. .	895	15.7	. .	. .	. .	. .	. .	. .	25	7.7	. .	. .	920	15.5
Palliative care	7,740	12.3	5,575	14.5	. .	. .	830	11.8	1,336	11.0	n.p.	26.9	. .	. .	n.p.	n.p.	15,613	13.1
—Designated unit	. .	. .	. .	. .	1,628	9.4	. .	. .	. .	. .	. .	. .	353	16.0	169	11.3	2,150	10.7
—Designated program	. .	. .	. .	. .	347	13.0	. .	. .	. .	. .	. .	. .	. .	. .	. .	. .	347	13.0
—Principal clinical intent	. .	. .	. .	. .	923	9.7	. .	. .	. .	. .	. .	. .	n.p.	n.p.	n.p.	n.p.	927	9.7
Geriatric evaluation and management	1,973	18.4	9,901	25.0	35	17.2	11	4.3	347	15.0	n.p.	n.p.	92	23.8	n.p.	n.p.	12,368	23.6
Psycho-geriatric care	284	42.5	. .	. .	161	9.0	545	49.7	163	37.6	n.p.	6.0	12	54.8	n.p.	n.p.	1,166	40.7
Maintenance care	1,613	31.7	121	239.7	1,540	20.5	655	17.8	134	220.0	67	25.2	23	21.4	56	12.5	4,209	37.0
Total	**1,511,431**	**3.4**	**1,458,166**	**2.9**	**917,272**	**2.6**	**527,011**	**2.8**	**374,416**	**3.3**	**94,147**	**3.1**	**84,091**	**2.6**	**101,194**	**2.4**	**5,067,728**	**3.0**

(a) Excludes public psychiatric hospitals.

(b) Excludes separations for *Newborns* (without qualified days) and records for *Hospital boarders* and *Posthumous organ procurement*.

(c) Counts less than 10 are suppressed for Northern Territory.

. . not applicable

n.p. not published due to small numbers,

ALOS average length of stay.

Source: National Hospital Morbidity Database 2010–11, unpublished data.

Public psychiatric hospitals

There were also variations between jurisdictions in the use of care types for patients in public psychiatric hospitals. Table A17 shows the number of separations in public psychiatric hospitals in 2010–11 by care type and jurisdiction. Some jurisdictions record patients in these hospitals exclusively (Victoria and Tasmania) or predominately (New South Wales, Western Australia and South Australia) as receiving *Acute care*. In contrast, the majority of care delivered in public psychiatric hospitals in Queensland was recorded as *Rehabilitation care* or *Maintenance care*. To some extent, these differences may reflect differences in the nature of the public psychiatric hospitals among the jurisdictions.

Table A17: Separations by care type[(a)], public psychiatric hospitals, states and territories, 2010–11

Care type	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
					Separations				
Acute care	5,088	486	n.p.	1,484	1,511	n.p.	. .	. .	8,786
Rehabilitation care	664	0	n.p.	n.p.	96	n.p.	. .	. .	958
Psychogeriatric care	155	0	0	n.p.	34	n.p.	. .	. .	189
Maintenance care	31	0	127	0	30	0	. .	. .	188
Total	**5,938**	**486**	**324**	**1,487**	**1,671**	**215**	**. .**	**. .**	**10,121**
					Proportion (%)				
Acute care	86	100	n.p.	100	90	n.p.	. .	. .	87
Rehabilitation care	11	0	n.p.	n.p.	6	n.p.	. .	. .	9
Psychogeriatric care	3	0	0	n.p.	2	n.p.	. .	. .	2
Maintenance care	1	0	39	0	2	0	. .	. .	2
Total	**100**	**100**	**100**	**100**	**100**	**100**	**. .**	**. .**	**100**

(a) Excludes separations for *Newborns* (without qualified days) and records for *Hospital boarders* and *Posthumous organ procurement*.

. . not applicable,

n.p not published because of small numbers, confidentiality or other concerns about the quality of the data

Source: National Hospital Morbidity Database 2010–11, unpublished data.

Psychiatric care days

Table A18 shows separations for admitted patients whose episode of care included psychiatric care days in public and private hospitals in 2010–11. This table also illustrates variations in practice both between jurisdictions and between public and private hospitals. Most separations including psychiatric care days were recorded as *Acute care* in 2010–11. A small proportion of separations with psychiatric care days in public hospitals were recorded as *Rehabilitation* in New South Wales (2.9%), Queensland (2.2%), Western Australia (1.0%) and South Australia (1.1%).

Virtually all separations with psychiatric care days in private hospitals were recorded as *Acute care*, except for Victoria, where 16% of these separations were recorded as *Psychogeriatric care,* and Queensland, where 2.4% of these separations were recorded as *Maintenance care*.

Table A18: Separations for admitted patients with psychiatric care days, public and private hospitals, 2010–11

Care type	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
Public hospitals									
Acute care	33,922	20,130	21,101	9,443	8,037	2,172	1,334	861	97,000
Rehabilitation	1,030	0	497	103	96	0	0	0	1,229
Palliative care	0	0	n.p.	n.p.	n.p.	0	0	0	2
Geriatric evaluation and management	6	0	n.p.	n.p.	n.p.	0	n.p.	0	14
Psychogeriatric care	385	0	380	712	281	0	n.p.	n.p.	1,767
Maintenance care	92	136	313	53	93	0	n.p.	n.p.	689
Total	**35,435**	**20,266**	**22,296**	**10,312**	**8,510**	**2,172**	**1,345**	**863**	**101,199**
Private hospitals									
Acute care	49,011	26,404	34,040	8,207	1,860	n.p.	n.p.	n.p.	123,793
Rehabilitation	0	0	n.p.	n.p.	0	n.p.	n.p.	n.p.	n.p.
Palliative care	0	0	0	0	0	n.p.	n.p.	n.p.	n.p.
Geriatric evaluation and management	0	0	0	0	0	n.p.	n.p.	n.p.	0
Psychogeriatric care	0	5,339	n.p.	n.p.	0	n.p.	n.p.	n.p.	5,401
Maintenance care	0	0	856	0	0	n.p.	n.p.	n.p.	856
Total	**49,011**	**31,743**	**34,935**	**8,269**	**1,860**	**3,156**	**1,117**	**n.p.**	**130,091**

n.p. not published because of small numbers, confidentiality or other concerns about the quality of the data

Source: National Hospital Morbidity Database 2010–11, unpublished data.

Appendix B Summary of key literature

In order to develop nationally consistent definitions for subacute and non-acute care and care types, a review of key literature from Australia and internationally was undertaken early in the project as part of the information gathering process. The review focussed on identifying:

- definitions of subacute and non-acute care and care types used across Australia and internationally
- services, policies and guidelines relating to subacute care and non-acute care types
- variations in models of care across Australia.

This section presents an overview of the key literature reviewed.

Definitions of subacute and non-acute care

Definitions of Australian subacute care and care types are specified in the AIHW's Metadata Online Registry, METeOR. While Australian jurisdictions adopt these definitions for the purposes of reporting against key performance indicators in the NPA on HHWR, and for reporting national data to the AIHW on episodes of care for admitted patients, variation exists in terms of local definitions for subacute care and the range of services and care types that are included within its scope.

Subacute care

The term subacute was first used in Australia in 1992 to describe patients whose use of hospital services was better predicted by their functionality than by their principal medical diagnosis (Poulos & Eagar 2007).

The NHDD does not provide a definition of subacute care for national data collection purposes. Subacute care is currently defined in the Non-admitted patient Data set specification as:

> 'rehabilitation, palliative care, geriatric evaluation and management, and psychogeriatric care' (METeOR identifier 408718).

This is also the definition of subacute care used in the NPA on HHWR.

In 2009, the then Subacute Care Management Working Group recommended that, for the purposes of the NPA on HHWR, the following definition of subacute care be adopted:

> 'Subacute care is interdisciplinary care in which the need for care is driven primarily by the patient's functional status and quality of life rather than the underlying medical diagnosis. It may include care for patients who have multiple diagnoses, none of which is a principal diagnosis. Subacute care may be provided in any setting' (Eagar et al. 2009).

The *A Healthier Future for All Australians – Final Report June 2009 (*National Health and Hospitals Reform Commission) defined subacute services as:

> 'Includes rehabilitation and geriatric evaluation and management care. Some subacute care is colloquially referred to as 'low dependency' or 'step up' and 'step down' care, meaning that it can either precede (and potentially avoid) a hospital admission or follow an acute hospital admission. Subacute services also include care provided under the new

> Transition Care program. Most subacute services can be provided on either an inpatient or ambulatory basis'.

States and territories exhibit some variation in terms of local definitions for subacute care and the range of services and care types that are included within its scope. KPMG, a professional services company, noted, for example, a study into the demand for and supply of subacute services in Queensland, which defined subacute services as including the four care types included in the NHDD definition, as well as maintenance care (KPMG 2010b). Transition care, while not included in the scope of the study, was also thought to be part of the subacute space. Transition care was described as:

> 'Care which aims to help people leaving hospital to improve their independence and confidence by providing services including low intensity therapy and personal and/or nursing care to assist with continued recovery after hospitalisation' (KPMG 2010b).

In contrast, services defined as subacute care in Victoria include: admitted rehabilitation and geriatric evaluation and management; and subacute ambulatory care services which aims to:

> 'help people who have a physical disability, are frail, chronically ill or recovering from traumatic injury or illness to regain and/or maintain optimal function, and to allow people to maximise their independence and return to, or remain in, their usual place of residence' (Vic DoH 2011).

In Australia, some states use service capability frameworks to specify the minimum service requirements, staffing, support services and risk considerations for subacute services. For example, the capability and access planning framework for Victoria's subacute service system provides service profile expectations for admitted rehabilitation and GEM services (Vic DoH 2009); while the *Clinical services capability framework for public and licensed private health facilities* outlines the service requirements for rehabilitation and palliative care services in Queensland (Queensland Health 2012).

The term 'subacute' is also used in international jurisdictions including the United Kingdom (UK), Norway, United States of America (USA) and Canada. Canada, for example, has defined subacute care as:

> 'A discrete level of service for patients who do not require acute services but who do require separate and distinct goal-oriented inpatient services, such as skilled therapy or nursing care, on a short-term basis, to regain function and return home' (HSRC 1997).

In the USA, the American Health Care Association, the Joint Commission on Accreditation of Healthcare Organizations, and the Association of Hospital-based Skilled Nursing Facilities all define subacute care as:

> 'Comprehensive inpatient care designed for someone who has an acute illness, injury, or exacerbation of a disease process. It is goal-oriented treatment rendered immediately after, or instead of, acute hospitalization to treat one or more specific active complex medical conditions or to administer one or more technically complex treatments, in the context of a person's underlying long-term conditions and overall situation' (American Health Care Association 1996).

Non-acute care

There is currently no nationally agreed definition of non-acute care in Australia. Non-acute as a term is used in multiple ways. Queensland's Hospital Activity Data monthly reports, for example, use non-acute to refer to all episodes of care that do not meet the definitions of

acute care (that is, it includes subacute, maintenance care, other admitted care and unqualified newborns). Lee et al. (1998) define non-acute care as maintenance care, which includes nursing home, convalescent and planned respite care. The AIHW refers to maintenance care as non-acute care (AIHW 2012a).

The goals of non-acute care and subacute care are different. In non-acute care, the predominant treatment goals have been described as maintenance of, or the prevention of deterioration in, a patient's current health and functional status, whereas in subacute care the goals are enhancement of quality of life and/or improvement in functional status (Lee et al. 1998).

Non-acute care was defined by Eagar et al. (2009) as:

> 'Non-acute or maintenance care is care in which the clinical intent or treatment goal is prevention of deterioration in the functional and current health status of a patient with a disability of severe level of functional impairment. Following assessment or treatment the patient does not require further complex assessment or stabilisation. This care includes that provided to a patient who would normally receive care in another setting e.g. at home, or in a residential aged care service, by a relative or carer, that is unavailable in the short term'.

A recent information paper from the Centre for Health Service Development at the University of Wollongong (2010) notes that:

> 'Non-acute care is care for a patient (typically, but not always a frail older person) who does not actually need to be in hospital but could, instead, be cared for at home or in a residential aged care home. Non-acute care is usually provided in a hospital while patients are waiting for placement in residential care, waiting for their homes to be modified or the services that they will need at home to be organised or when their carer needs a break (respite care)'.

Definition of care type

The concept of 'care type' is defined in the NHDD 16th edition as:

> 'The overall nature of a clinical service provided to an admitted patient during an episode of care (admitted care), or the type of service provided by the hospital for boarders or posthumous organ procurement (other care)' (METeOR identifier 270174) (AIHW 2012c).

The current national definitions for the subacute and non-acute care types: rehabilitation, palliative care, GEM, psychogeriatric care and maintenance care, are specified in the *Hospital service – care type, code N[N].N* data element (METeOR identifier 270174) at Appendix C.

The following section includes information on services, policies and guidelines relating to subacute care and non-acute care types: rehabilitation, GEM, psychogeriatric care, palliative care and maintenance care. Information on subacute care services in Canada, the UK and the USA is also presented.

Rehabilitation

Rehabilitation services can be delivered in a number of settings such as admitted patient care, outpatient care, and domiciliary and community based rehabilitation services (AFRM 2008).

Models of care

The KPMG report noted that rehabilitation often starts before the acute episode is completed because an early start to rehabilitation can result in a shorter length of stay in hospital (KPMG 2010a). Similarly, when rehabilitation begins earlier, the quality of patient outcomes is generally higher. Patients undergoing rehabilitation will often remain classified as acute for the duration of the episode of care (KPMG 2010a).

The Australian Rehabilitation Alliance (2011) suggests there is a need for

> '[n]ational agreement on models of care that provide for the early commencement of rehabilitation where appropriate, allowing rehabilitation to begin before medical stability is achieved. This… [means allowing] for rehabilitation teams to provide coordinated multidisciplinary rehabilitation within the acute care setting before medical stability is achieved, and/or by defining minimum numbers of rehabilitation beds within an acute hospital or acute hospital campus, rather than in standalone facilities'.

The Australian Rehabilitation Alliance (2011) also propose that higher intensity therapy has also been associated with improved patient outcomes and service efficiency, however due to a lack of national standards, outcomes in Australia are behind those in the USA.

> 'In the USA, Federal Medicare legislation requires that at least three hours of allied health therapy per day is provided for a minimum of five days per week. [In comparison] Private Health Insurers in Australia require 10 hours per week before they will pay for a rehabilitation program. However, in NSW (as an example) data suggests even relatively well resourced public units provide only some 3.5 hours per week' (ARA 2011).

Rehabilitation services standards

In 2011, there were approximately 180 admitted patient rehabilitation units in Australia, comprising 100 public sector and 80 private sector units (ARA 2011). The Australasian Faculty of Rehabilitation Medicine publishes standards for the operation of specialist Rehabilitation Medicine units (AFRM 2011). The Standards cover the following aspects of service provision: governance; staffing; facilities and equipment; policies and procedures; quality management activities; education and research (AFRM 2011). The Consultative Committee on Private Rehabilitation (CCPR 2009) has also released *Guidelines for Recognition of Private Hospital-Based Rehabilitation Service,* which provide guidance in determining private health insurance benefits for private hospital-based rehabilitation care.

International

In the USA, many hospitals have formal criteria for admitting a patient to a rehabilitation hospital or unit (referred to as an Inpatient Rehabilitation Facility by the Medicare program). The American Academy of Physical Medicine and Rehabilitation's *Standards for assessing medical appropriateness criteria for admitting patients to rehabilitation hospitals or units*, provide guidelines for physicians admitting patients to, or discharging patients from rehabilitation hospitals (MIRCTF 2011). Rehabilitation hospitals and units provide medical, nursing and rehabilitation therapies on an intensive basis. Under US Medicare rules, rehabilitation hospitals and units must provide 24-hour, 7-day-a-week availability of physicians and nurses with specialised training or experience in medical rehabilitation. Intensive therapy and regularly scheduled weekly team conferences are also required (DHHS CMMS 2011; MIRCTF 2011).

The British Society of Rehabilitation Medicine (BSRM 2009) recommends that the minimum size of inpatient specialist rehabilitation unit in the UK be around 20 beds, with these beds being co-located with therapy facilities. The Society also suggest that:

- rehabilitation be a 24-hour process
- rehabilitation be carried out by an inter-disciplinary team supported by dedicated sessions from a consultant specialist in rehabilitation medicine
- rehabilitation units be adequately staffed to provide rehabilitation at an intensity that matches the needs of the patients
- the individual and/or their family participates in the development and review of goals
- a designated member of the team is responsible for overseeing and co-ordinating the individual's programme
- discharge planning begins as early as possible during the rehabilitation programme (BSRM 2009).

Palliative care

In Australia, palliative care is delivered in a range of health-care settings, including hospitals (some of which include hospices), residential aged care facilities, the home and other community settings, with the exact model of care provision differing from one jurisdiction to another (DoHA 2005). Available data suggests that a substantial proportion of palliative care provided in Australia occurs within the admitted patient setting (PCOC 2010). Palliative care in the admitted patient setting may be provided in a hospice, in a dedicated palliative care ward or in beds distributed throughout a hospital.

Although the term 'palliative care' has been used since the mid-1970s, much has been written in the literature about the fact that there is no consensus on the definition of the term and, consequently, a variety of definitions are used (AIHW 2012a; PCOC 2009; SA Health 2009). To complicate matters further, other terms—such as 'hospice', 'end-of-life care' and 'specialist palliative care'—are at times used interchangeably with the term 'palliative care'.

While recognising this diversity, the National Palliative Care Working Group (formerly the Palliative Care Intergovernmental Forum) has adopted the definition put forward by the WHO (see Box B1) as the national definition of palliative care (DoHA 2010). Some jurisdictions also refer to this definition in their palliative care strategies (for example, ACT Health 2007; NSW Health 2010).

While the WHO definition outlines the basic principles for the delivery of palliative care in all health-care settings (WPCA 2009), a more specific definition of palliative care is used in the Admitted patient data NMDS for Australian hospitals. This definition, which is included in the 'care type' data element at Appendix C, allows for the standard collection of data pertaining to palliative care in clinical settings.

The level of resourcing and expected capabilities of palliative care services are also outlined in Palliative Care Australia's *A Guide to Palliative Care Service Development: A population based approach* (PCA 2005a); *Standards for providing quality palliative care for all Australians* (PCA 2005b) and *Palliative care service provision in Australia: A planning guide* (PCA 2003).

Box B1: The World Health Organization (2012) definition of palliative care

Palliative care is an approach that improves the quality of life of patients and their families facing the problem associated with life-threatening illness, through the prevention and relief of suffering by means of early identification and impeccable assessment and treatment of pain and other problems, physical, psychosocial and spiritual.

Palliative care:

- provides relief from pain and other distressing symptoms
- affirms life and regards dying as a normal process
- intends neither to hasten or postpone death
- integrates the psychological and spiritual aspects of patient care
- offers a support system to help patients live as actively as possible until death
- offers a support system to help the family cope during the patients illness and in their own bereavement
- uses a team approach to address the needs of patients and their families, including bereavement counselling, if indicated
- will enhance quality of life, and may also positively influence the course of illness
- is applicable early in the course of illness, in conjunction with other therapies that are intended to prolong life, such as chemotherapy or radiation therapy, and includes those investigations needed to better understand and manage distressing clinical complications.

International

In the USA, palliative and hospice care in the inpatient setting includes care provided in acute or rehabilitation hospitals, dedicated hospice and/or palliative care units in a hospital (including general medical care beds located throughout the hospital) and freestanding hospice and/or palliative care units (National Quality Forum 2006). Typically, hospital palliative care programs are delivered by an interdisciplinary consultation team working with the patient's primary physician (Meier 2008).

Inpatient palliative care services in the UK consist of palliative care units and hospital support services (or palliative care consultation teams as they are referred to in the USA). Palliative care services are also provided in the acute care setting through specialist palliative care teams. Specialist palliative care teams provide specialist palliative care to patients and carers, by advising on pain and symptom control, facilitating spiritual and social support and providing psychological and bereavement care (Directorate of Palliative Care 2010).

Palliative care phases

Palliative care is sometimes described as existing as several phases of care. The palliative care phase describes the stage of the patient's illness within an episode and provides a clinical indication of the level of care required.

Australia's Palliative Care Outcomes Collaboration (PCOC) describes five palliative care phases: stable, unstable, deteriorating, terminal and bereavement (Box B2). Phases are not sequential and a patient may move back and forth between phases (PCOC 2011).

Data on palliative care phase are being collected as part of the Admitted sub-acute and non-acute care activity based funding Data set specification, implemented from 1 July 2012. The type of phase will be recorded at the start of the episode and for every subsequent change in

phase thereafter during the same episode. The palliative care provider reviews the patient daily (or at each visit) and records phase changes if and when they occur during the episode.

Box B2: Palliative care phases

The five palliative care phases described by PCOC are:

Phase 1: Stable

All patients not classified as unstable, deteriorating, or terminal.

The patient symptoms are adequately controlled by established management. Further interventions to maintain symptom control and quality of life have been planned. The situation of the family/carers is relatively stable and no new issues are apparent. Any needs are met by the established plan of care.

Phase 2: Unstable

The patient experiences the development of a new unexpected problem or a rapid increase in the severity of existing problems, either of which requires an urgent change in management or emergency treatment.

The family/carers experience a sudden change in their situation requiring urgent intervention by members of the multidisciplinary team.

Phase 3: Deteriorating

The patient experiences a gradual worsening of existing symptoms or the development of new but expected problems. These require the application of specific plans of care and regular review but not urgent or emergency treatment.

The family/carers experience gradually worsening distress and other difficulties, including social and practical difficulties, as a result of the illness of the person. This requires a planned support program and counselling as necessary.

Phase 4: Terminal

Death is likely in a matter of days and no acute intervention is planned or required. The typical features of a person in this phase may include: profoundly weak; essentially bed bound; drowsy for extended periods; disoriented for time and has a severely limited attention span; increasingly disinterested in food and drink and finding it difficult to swallow medication.

This requires the use of frequent, usually daily, interventions aimed at physical, emotional and spiritual issues.

The family/carers recognise that death is imminent and care is focussed on emotional and spiritual issues as a prelude to bereavement.

Phase 5: Bereavement/post death support

Death of the patient has occurred and the carers are grieving. A planned bereavement support program is available including referral for counselling as necessary (PCOC 2009).

Geriatric evaluation and management

Models of care

There is lack of consistency in GEM care models around Australia. Victoria and Western Australia have large admitted patient GEM programs, while New South Wales provides GEM primarily in outpatient settings. The Australian Capital Territory has a mix of admitted patient and outpatient GEM services, such as the community based Rapid

Assessment of the Deteriorating Aged at Risk program, while the Northern Territory and Tasmania have limited or no GEM dedicated care (KPMG 2010b).

The admitted patient GEM model of care has been found to be effective in reducing hospital costs through reduced length of stay, reduced hospital readmissions and improved quality of life of older persons, as GEM promotes independence and self-management (WA DoH 2008).

The Australian and New Zealand Society for Geriatric Medicine (ANZSGM) Position statement on Geriatric services in general hospitals states that:

> 'Older people presenting to hospital with primarily functional issues or difficulties in activities in daily living and no major acute illness require direct admission to a geriatric assessment unit, where they can receive comprehensive assessment and restorative care in an appropriate environment' (ANZSGM 2008).

International

In the USA, the goal of GEM programs is to identify, assess and address in an interdisciplinary manner, the biopsychosocial status of severely disabled and frail older persons at risk of further decline and institutional placement, with the intention of optimising their health, function and ability to live with the greatest degree of independence suitable for their situations. Some inpatient GEM programs accept patients with ongoing acute illness but many prefer to transfer these patients to the inpatient GEM unit only after acute problems have been addressed. Depending on the mix of the population served, the bed section of the inpatient GEM unit may be in acute care, psychiatric care, community living centre or rehabilitation (VA 2010).

In Canada, geriatric units include geriatric assessment and treatment units and geriatric rehabilitation units. Geriatric assessment and treatment units are typically short-stay, non-acute care units specifically designed to meet the needs of older adults and are managed by multidisciplinary specialised geriatric teams, with patients staying from 4 to 6 weeks up to three months. In contrast, geriatric rehabilitation units care for older frail persons who require the expertise of a geriatric team and an individualised assessment and rehabilitation program in order to regain or maximize function and independence. The client is typically admitted for a period of one to three months (Reed 2011).

GEM services standards

A United States description of GEM (Agostini et al. 2001) notes that an inpatient care of elderly people with multiple co-morbidities requires close attention to the special needs and geriatric syndromes that arise in this population. A GEM unit provides care by a multidisciplinary team which:

> 'provides comprehensive geriatric assessment, detailed treatment plans, and attention to the rehabilitative needs of older patients. A typical team is composed of a geriatrician, clinical nurse specialist, social worker, and specialists from such fields as occupational and physical therapy, nutrition, pharmacy, audiology, and psychology. GEM units are typically separate hospital wards that have been redesigned to facilitate care of the geriatric patient. Multidisciplinary team rounds and patient-centred team conferences are hallmarks of care on these units' (Agostini et al. 2001).

Psychogeriatric care

Psychogeriatric disorders that are grouped under the umbrella of psychiatry of old age, include psychiatric conditions that predate the ageing process and mental disorders that develop for the first time in later life–for example dementia, late onset schizophrenia, or depression (DoHA 2008; RANZCP 2010).

Models of care

There is a lack of consistency in psychogeriatric care models around Australia. Models of care include community based mental health services and acute and subacute admitted patient services in hospitals and stand-alone facilities. There is also a lack of clarity about the extent to which admitted patient 'psychogeriatric care' is subacute and boundary issues with acute care, aged care and mental health (KPMG 2010b; PwC forthcoming).

Most jurisdictions provide some form of admitted patient psychogeriatric care but this is usually considered to be a form of acute care with patients classified as acute. The lengths of stay and ward set-ups are indicative of subacute care, but the intensity of care, staffing ratios and the treatment goal of stabilisation is generally considered to be acute rather than subacute (KPMG 2010b).

In their review of subacute care for IHPA, the PwC (forthcoming) recommended that the classification that applies to a patient should be the same regardless of whether they are a subacute psychogeriatric patient or a mental health patient. That is, the subacute psychogeriatric classification and the mental health classification need to be integrated, using the same underlying cost drivers, to produce the same classification.

Special expertise is needed in assessing mental disorders in the elderly and in understanding the interacting psychological, physiological and social effects of ageing (RANZCP 2009). The Royal Australian and New Zealand College of Psychiatrists (RANZCP) and the ANZSGM position statement regarding the relationships between geriatric and psychogeriatric services recognises the need for old age psychiatry and geriatric medical services to work closely together to ensure the best treatment and care of older patients. It is the position of both professional bodies that:

> 'Old age psychiatry and geriatric medical services should be available in health care areas with more than 50,000 inhabitants. Where old age psychiatrists are not readily available, arrangements should be made for visits by specialists and/or telephone or video conferences. Where no such arrangements are possible, it is expected that geriatric medical services, adult mental health services, private psychiatrists and general practitioners will liaise to provide a substitute service' (RANZCP & ANZSGM 2009).

Psychogeriatric services

As a group, older people with a mental disorder are in the care of a broad range of services including: general practitioners; residential aged care facilities; community health care; acute hospitals; respite; old age mental health services; adult mental health services (particularly in rural Australia); Commonwealth-funded Dementia Behavioural Management Advisory Services; private psychiatrists and private psychiatric hospitals; and geriatric services including aged care programs. Psychogeriatric care forms a larger proportion of the services delivered in the non-admitted setting than in the admitted setting, with a substantial proportion of psychogeriatric services delivered though the mental health sector.

Hospital dementia services

The Hospital Dementia Services Project, funded by a National Health and Medical Research Council Dementia Research Grant and conducted by researchers from the AIHW, University of Canberra and University of New South Wales, examined aged care and dementia-specific services in hospitals in NSW in 2006–07 in order to describe key operational aspects of different hospital-based service models for patients with dementia (AIHW 2011). The project found that many of the general hospitals had limited access to aged care and dementia specific services, and that identification of dementia and delirium was an area of concern affecting patient care (Pham 2011).

International

In the UK, there is wide variation in the provision of inpatient services for older people with mental health problems. Inpatient services for this group fall broadly into assessment beds and longer-term care beds. Inpatient assessment may occur in organic/dementia wards, functional wards, mixed dementia and functional wards or on adult mental health wards. Longer-term care, traditionally provided in continuing care wards, has moved to independent sector nursing homes with National Health Service trust beds now focusing on older people with very challenging behaviour that independent homes are not fully equipped to manage (The Faculty of the Psychiatry of Old Age 2011).

In Ontario, Canada, the core components of an inpatient psychogeriatric service include acute geriatric mental health units and tertiary-level geriatric mental health services. Tertiary-level geriatric mental health services are provided at a psychiatric hospital and include assessment, diagnosis and short-term treatment intervention for older adults with late-onset mental illness, cognitive disorders and/or behavioural disturbances or individuals with long-standing psychiatric disorders with age-related decline in physical or mental health. Patients in these units may stay for three to six months (Reed 2011).

Maintenance care

In this project, maintenance care has been defined as care which provides support for patients with a severe level of impairment, activity limitation or participation restriction due to a health condition. Following assessment or treatment the patient does not require further complex assessment or stabilisation. These patients often require care over an indefinite period.

In Western Australia, for example, types of maintenance care as defined in their *Admission, readmission, discharge and transfer policy for WA Health Services* (2011) include:

- nursing home type patients—patients who have been in hospital for a continuous period of more than 35 days and do not have a current acute care certificate
- care awaiting placement —patients who have been assessed by an Aged Care Assessment Team or clinician as requiring more intensive day-to-day care needs than what can be supported in their home environment and are awaiting placement in a nursing home or hostel and do not yet meet the qualification of the 35-day rule
- respite care—patients with chronic conditions who are usually managed at home but due to factors in the home environment (physical, social or psychological) require hospital admission. The care given is for functional maintenance only
- other non-acute patients—patients with a care type of Maintenance Care who do not fit the definition of nursing home type patient, care awaiting placement, or respite care, and who would not normally require hospital treatment but factors in the home environment

make it inappropriate for the person to be discharged to home in the short term (WA DoH 2011).

Patient dependent criteria

PwC (forthcoming) suggested in their review that there was a need for patient dependent criteria to support the allocation of a patient to a subacute care type. There is a paucity of literature on patient criteria for subacute care (Poulos & Eagar 2007), with much relating to rehabilitation following a stroke, or for orthopaedic conditions, and patient factors that predict a good rehabilitation outcome (McGilton et al. 2012; Pollack & Disler 2002; Putman et al. 2007; Unsworth 2001; Wade 2003).

Studies relating to the selection criteria for rehabilitation following stroke found the following criteria to be associated with selection for rehabilitation: age, premorbid conditions, pre-stroke functional level/cognition and functional level following stroke, the presence of social support, consciousness level, the absence of behavioural problems and the likelihood of discharge home (Hakkennes et al. 2010; Putman et al. 2007).

Care type assignment hierarchies

The PwC (forthcoming) report recommended that there be a clear hierarchy amongst the subacute care types. For example, if a geriatric patient with dementia presents requiring restorative care, objective rules would specify the hierarchy of a choice between rehabilitation, GEM and psychogeriatric care types. PwC suggested that a decision tree approach, such as that used in the Australian National Subacute and Non-acute Patient Classification (AN-SNAP) study, could lead to improved consistency in care-type assignment within and between jurisdictions.

In the AN-SNAP study patients were assigned to a case type using the order reflected in the SNAP decision tree (Figure B1). If a patient met the criteria for more than one care type, the episode was to be allocated to the first care type in the decision tree (Eagar et al. 1997).

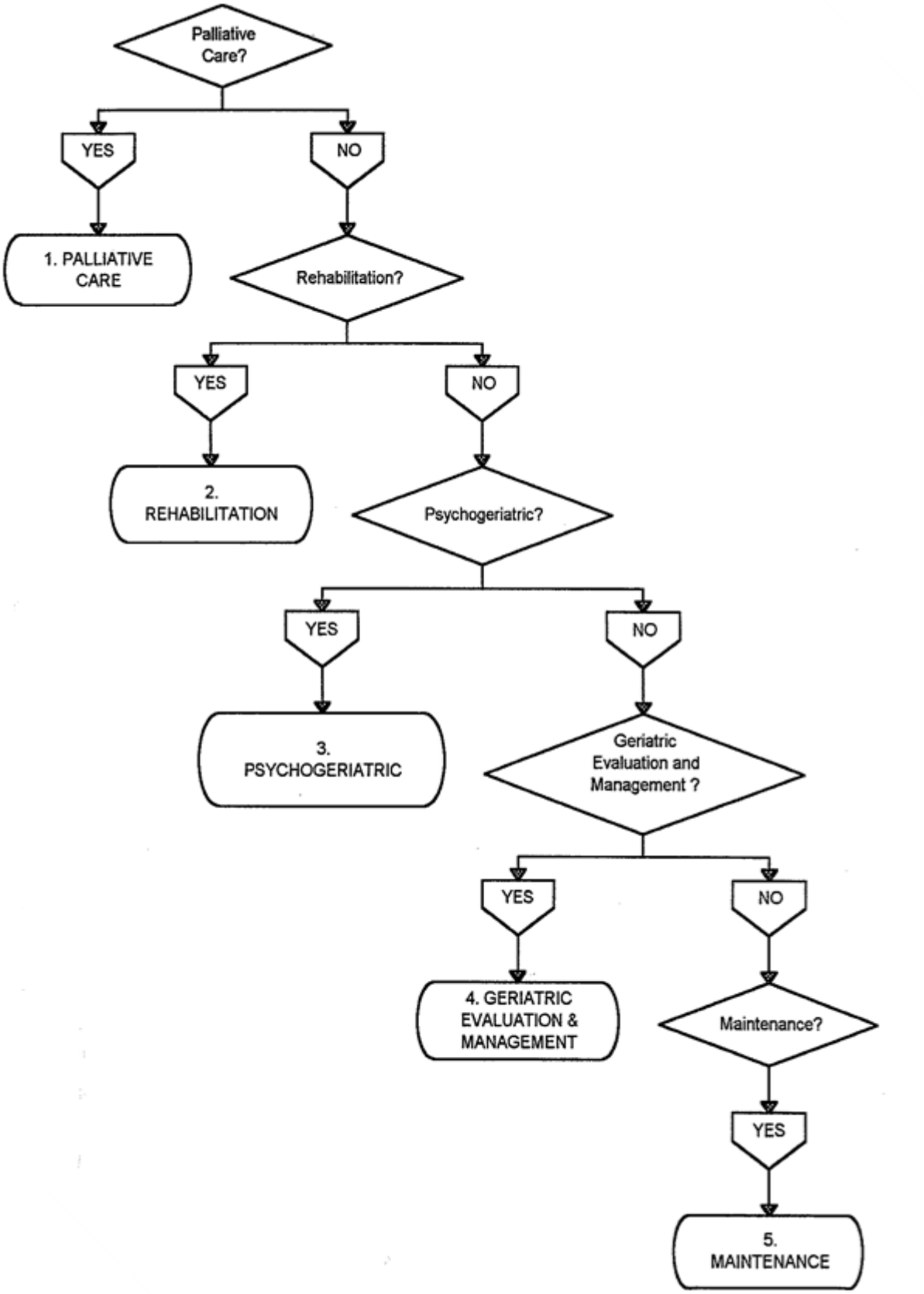


Figure B1: Algorithm for assignment of AN-SNAP care types

Appendix C Former definition: Hospital service—care type, code N[N].N

Hospital service—care type, code N[N].N

Identifying and definitional attributes

Metadata item type:	Data Element
Short name:	Care type
METeOR identifier:	270174
Registration status:	Health, Standard 01/03/2005
Definition:	The overall nature of a clinical service provided to an admitted patient during an episode of care (admitted care), or the type of service provided by the hospital for boarders or **posthumous organ procurement** (other care), as represented by a code.

Data element concept attributes

Identifying and definitional attributes

Data element concept:	Hospital service—care type
METeOR identifier:	269641
Registration status:	Health, Standard 01/03/2005
Definition:	The overall nature of a clinical service provided to an admitted patient during an episode of care (admitted care), or the type of service provided by the hospital for boarders or **posthumous organ procurement** (other care).
Context:	Admitted patient care and hospital activity: For admitted patients, the type of care received will determine the appropriate casemix classification employed to classify the episode of care.
Object class:	Hospital service
Property:	Care type

Value domain attributes

Identifying and definitional attributes

Value domain:	Hospital care type code N[N].N
METeOR identifier:	270751
Registration status:	Health, Standard 22/11/2012
Definition:	A code set representing the overall nature of a service provided by a hospital.

Representational attributes

Representation class:	Code
Data type:	Number
Format:	N[N].N
Maximum character length:	3

Permissible values:

Value	Meaning
1.0	Acute care (Admitted care)
2.0	Rehabilitation care (Admitted care)

2.1	Rehabilitation care delivered in a designated unit (optional)
2.2	Rehabilitation care according to a designated program (optional)
2.3	Rehabilitation care is the principal clinical intent (optional)
3.0	Palliative care
3.1	Palliative care delivered in a designated unit (optional)
3.2	Palliative care according to a designated program (optional)
3.3	Palliative care is the principal clinical intent (optional)
4.0	Geriatric evaluation and management
5.0	Psychogeriatric care
6.0	Maintenance care
7.0	Newborn care
8.0	Other admitted patient care
9.0	Organ procurement - posthumous (Other care)
10.0	Hospital boarder (Other care)

Collection and usage attributes

Guide for use:

Persons with mental illness may receive any one of the care types (except newborn and organ procurement). Classification depends on the principal clinical intent of the care received.

Admitted care can be one of the following:

CODE 1.0 Acute care (Admitted care)

Acute care is care in which the clinical intent or treatment goal is to:

- manage labour (obstetric)
- cure illness or provide definitive treatment of injury
- perform surgery
- relieve symptoms of illness or injury (excluding palliative care)
- reduce severity of an illness or injury
- protect against exacerbation and/or complication of an illness and/or injury which could threaten life or normal function
- perform diagnostic or therapeutic procedures.

CODE 2.0 Rehabilitation care (Admitted care)

Rehabilitation care is care in which the clinical intent or treatment goal is to improve the functional status of a patient with an impairment, disability or handicap. It is usually evidenced by a multi-disciplinary rehabilitation plan comprising negotiated goals and indicative time frames which are evaluated by a periodic assessment using a recognised functional assessment measure. It includes care provided:

- in a designated rehabilitation unit (code 2.1), or
- in a designated rehabilitation program, or in a psychiatric rehabilitation program as designated by the state health authority for public patients in a recognised hospital, for private patients in a public or private hospital as approved by a registered health benefits organisation (code 2.2), or

- under the principal clinical management of a rehabilitation physician or, in the opinion of the treating doctor, when the principal clinical intent of care is rehabilitation (code 2.3).

Optional:

CODE 2.1 Rehabilitation care delivered in a designated unit (optional)

A designated rehabilitation care unit is a dedicated ward or unit (and can be a stand-alone unit) that receives identified funding for rehabilitation care and/or primarily delivers rehabilitation care.

CODE 2.2 Rehabilitation care according to a designated program (optional)

In a designated rehabilitation care program, care is delivered by a specialised team of staff who provide rehabilitation care to patients in beds that may or may not be dedicated to rehabilitation care. The program may, or may not be funded through identified rehabilitation care funding. Code 2.1 should be used instead of code 2.2 if care is being delivered in a designated rehabilitation care program and a designated rehabilitation care unit.

CODE 2.3 Rehabilitation care is the principal clinical intent (optional)

Rehabilitation as principal clinical intent (code 2.3) occurs when the patient is primarily managed by a medical practitioner who is a specialist in rehabilitation care or when, in the opinion of the treating medical practitioner, the care provided is rehabilitation care even if the doctor is not a rehabilitation care specialist. The exception to this is when the medical practitioner is providing care within a designated unit or a designated program, in which case code 2.1 or 2.2 should be used, respectively.

Code 3.0 Palliative care

Palliative care is care in which the clinical intent or treatment goal is primarily quality of life for a patient with an active, progressive disease with little or no prospect of cure. It is usually evidenced by an interdisciplinary assessment and/or management of the physical, psychological, emotional and spiritual needs of the patient; and a grief and bereavement support service for the patient and their carers/family. It includes care provided:

- in a palliative care unit (code 3.1) or
- in a designated palliative care program (code 3.2) or
- under the principal clinical management of a palliative care physician or, in the opinion of the treating doctor, when the principal clinical intent of care is palliation (code 3.3).

Optional:

CODE 3.1 Palliative care delivered in a designated unit (optional)

A designated palliative care unit is a dedicated ward or unit (and can be a stand-alone unit) that receives identified funding for palliative care and/or primarily delivers palliative care.

CODE 3.2 Palliative care according to a designated program (optional)

In a designated palliative care program, care is delivered by a specialised team of staff who provide palliative care to patients in beds that may or may not be dedicated to palliative care. The

program may, or may not be funded through identified palliative care funding. Code 3.1 should be used instead of code 3.2 if care is being delivered in a designated palliative care program and a designated palliative care unit.

CODE 3.3 Palliative care is the principal clinical intent (optional)

Palliative care as principal clinical intent occurs when the patient is primarily managed by a medical practitioner who is a specialist in palliative care or when, in the opinion of the treating medical practitioner, the care provided is palliative care even if the doctor is not a palliative care specialist. The exception to this is when the medical practitioner is providing care within a designated unit or a designated program, in which case code 3.1 or 3.2 should be used, respectively. For example, code 3.3 would apply to a patient dying of cancer who was being treated in a geriatric ward without specialist input by palliative care staff.

CODE 4.0 Geriatric evaluation and management

Geriatric evaluation and management is care in which the clinical intent or treatment goal is to maximise health status and/or optimise the living arrangements for a patient with multi-dimensional medical conditions associated with disabilities and psychosocial problems, who is usually (but not always) an older patient. This may also include younger adults with clinical conditions generally associated with old age. This care is usually evidenced by multi-disciplinary management and regular assessments against a management plan that is working towards negotiated goals within indicative time frames. Geriatric evaluation and management includes care provided:

- in a geriatric evaluation and management unit or
- in a designated geriatric evaluation and management program or
- under the principal clinical management of a geriatric evaluation and management physician or,
- in the opinion of the treating doctor, when the principal clinical intent of care is geriatric evaluation and management.

CODE 5.0 Psychogeriatric care

Psychogeriatric care is care in which the clinical intent or treatment goal is improvement in health, modification of symptoms and enhancement in function, behaviour and/or quality of life for a patient with an age-related organic brain impairment with significant behavioural or late onset psychiatric disturbance or a physical condition accompanied by severe psychiatric or behavioural disturbance. The care is usually evidenced by multi-disciplinary management and regular assessments against a management plan that is working towards negotiated goals within indicative time frames. It includes care provided:

- in a psychogeriatic care unit;
- in a designated psychogeriatic care program or
- under the principal clinical management of a psychogeriatic physician or,
- in the opinion of the treating doctor, when the principal clinical intent of care is psychogeriatic care.

CODE 6.0 Maintenance care

Maintenance care is care in which the clinical intent or treatment goal is prevention of deterioration in the functional and current health status of a patient with a disability or severe level of functional impairment. Following assessment or treatment the patient does not require further complex assessment or stabilisation, and requires care over an indefinite period. This care includes that provided to a patient who would normally receive care in another setting, e.g. at home, or in a residential aged care service, by a relative or carer, that is unavailable in the short term.

CODE 7.0 Newborn care

Newborn care is initiated when the patient is born in hospital or is nine days old or less at the time of admission. Newborn care continues until the care type changes or the patient is separated:

- patients who turn 10 days of age and do not require clinical care are separated and, if they remain in the hospital, are designated as boarders
- patients who turn 10 days of age and require clinical care continue in a newborn episode of care until separated
- patients aged less than 10 days and not admitted at birth (e.g. transferred from another hospital) are admitted with newborn care type
- patients aged greater than 9 days not previously admitted (e.g. transferred from another hospital) are either boarders or admitted with an acute care type
- within a newborn episode of care, until the baby turns 10 days of age, each day is either a qualified or unqualified day
- a newborn is qualified when it meets at least one of the criteria detailed in **Newborn qualification status**.

Within a newborn episode of care, each day after the baby turns 10 days of age is counted as a qualified patient day. Newborn qualified days are equivalent to acute days and may be denoted as such.

CODE 8.0 Other admitted patient care

Other admitted patient care is care where the principal clinical intent does meet the criteria for any of the above.

Other care can be one of the following:

CODE 9.0 Organ procurement - posthumous (Other care)

Organ procurement - posthumous is the procurement of human tissue for the purpose of transplantation from a donor who has been declared brain dead.

Diagnoses and procedures undertaken during this activity, including mechanical ventilation and tissue procurement, should be recorded in accordance with the relevant ICD-10-AM Australian Coding Standards. These patients are not admitted to the hospital but are registered by the hospital.

CODE 10.0 Hospital boarder (Other care)

Hospital boarder is a person who is receiving food and/or accommodation but for whom the hospital does not accept responsibility for treatment and/or care.

Hospital boarders are not admitted to the hospital. However, a hospital may register a boarder. Babies in hospital at age 9 days of less cannot be boarders. They are admitted patients with each

day of stay deemed to be either qualified or unqualified.

Comments: Unqualified newborn days (and separations consisting entirely of unqualified newborn days) are not to be counted under the Australian Health Care Agreements, and they are ineligible for health insurance benefit purposes.

Data element attributes

Source and reference attributes

Origin: National Health Data Committee

Relational attributes

Related metadata references: Supersedes Care type, version 4, DE, NHDD, NHIMG, Superseded 01/03/2005.pdf (33.1 KB)
Is used in the formation of Episode of care—number of psychiatric care days, total N[NNNN] Health, Standard 01/03/2005
Has been superseded by Hospital service—care type, code N[N] Health, Standardisation pending 28/11/2012

Implementation in Data Set Specifications: Admitted patient care NMDS 2012-2013 Health, Standard 11/04/2012
Implementation start date: 01/07/2012
Implementation end date: 30/06/2013
Admitted patient mental health care NMDS 2012-2013 Health, Standard 07/12/2011
Implementation start date: 01/07/2012
Implementation end date: 30/06/2013
Admitted patient palliative care NMDS 2012-13 Health, Standard 07/03/2012
Implementation start date: 01/07/2012
Implementation end date: 30/06/2013

Appendix D Revised definition: Hospital service—care type, code N[N]

Hospital service—care type, code N[N]

Identifying and definitional attributes

Metadata item type:	Data Element
Short name:	Care type
METeOR identifier:	491557
Registration status:	Health, Standardisation pending 28/11/2012
Definition:	The overall nature of a clinical service provided to an admitted patient during an episode of care (admitted care), or the type of service provided by the hospital for boarders or **posthumous organ procurement** (care other than admitted care), as represented by a code.
Context:	Admitted patient care and hospital activity: For admitted patients, the type of care received will determine the appropriate casemix classification employed to classify the episode of care.

Data element concept attributes

Identifying and definitional attributes

Data element concept:	Hospital service—care type
METeOR identifier:	510083
Registration status:	Health, Standardisation pending 19/12/2012
Definition:	The overall nature of a clinical service provided to an admitted patient during an episode of care (admitted care), or the type of service provided by the hospital for boarders or **posthumous organ procurement** (care other than admitted care).
Context:	Admitted patient care and hospital activity: For admitted patients, the type of care received will determine the appropriate casemix classification employed to classify the episode of care.
Object class:	Hospital service
Property:	Care type

Value domain attributes

Identifying and definitional attributes

Value domain:	Hospital care type code N[N]
METeOR identifier:	391539
Registration status:	Health, Standardisation pending 28/11/2012
Definition:	A code set representing the overall nature of a service provided by a hospital.

Representational attributes

Representation class:	Code
Data type:	Number

Format: N[N]

Maximum character length: 2

Permissible values:

Value	Meaning
Admitted care	
1	Acute care
2	Rehabilitation care
3	Palliative care
4	Geriatric evaluation and management
5	Psychogeriatric care
6	Maintenance care
7	Newborn care
8	Other admitted patient care
Care other than admitted care	
9	Organ procurement—posthumous
10	Hospital boarder

Collection and usage attributes

Guide for use:

Admitted care can be one of the following:

CODE 1 Acute care

Acute care is care in which the primary clinical purpose or treatment goal is to:

- manage labour (obstetric)
- cure illness or provide definitive treatment of injury
- perform surgery
- relieve symptoms of illness or injury (excluding palliative care)
- reduce severity of an illness or injury
- protect against exacerbation and/or complication of an illness and/or injury which could threaten life or normal function
- perform diagnostic or therapeutic procedures.

CODE 2 Rehabilitation care

Rehabilitation care is care in which the primary clinical purpose or treatment goal is improvement in the functioning of a patient with an impairment, activity limitation or participation restriction due to a health condition. The patient will be capable of actively participating.

Rehabilitation care is always:

- delivered under the management of or informed by a clinician with specialised expertise in rehabilitation, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record, that includes negotiated goals within specified time frames and formal assessment of functional ability.

CODE 3 Palliative care

Palliative care is care in which the primary clinical purpose or treatment goal is optimisation of the quality of life of a patient

with an active and advanced life-limiting illness. The patient will have complex physical, psychosocial and/or spiritual needs.
Palliative care is always:

- delivered under the management of or informed by a clinician with specialised expertise in palliative care, and
- evidenced by an individualised multidisciplinary assessment and management plan, which is documented in the patient's medical record, that covers the physical, psychological, emotional, social and spiritual needs of the patient and negotiated goals.

CODE 4 Geriatric evaluation and management
Geriatric evaluation and management is care in which the primary clinical purpose or treatment goal is improvement in the functioning of a patient with multi-dimensional needs associated with medical conditions related to ageing, such as tendency to fall, incontinence, reduced mobility and cognitive impairment. The patient may also have complex psychosocial problems.
Geriatric evaluation and management is always:

- delivered under the management of or informed by a clinician with specialised expertise in geriatric evaluation and management, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record that covers the physical, psychological, emotional and social needs of the patient and includes negotiated goals within indicative time frames and formal assessment of functional ability.

CODE 5 Psychogeriatric care
Psychogeriatric care is care in which the primary clinical purpose or treatment goal is improvement in the functional status, behaviour and/or quality of life for an older patient with significant psychiatric or behavioural disturbance, caused by mental illness, an age-related organic brain impairment or a physical condition.
Psychogeriatric care is always:

- delivered under the management of or informed by a clinician with specialised expertise in psychogeriatric care, and
- evidenced by an individualised multidisciplinary management plan, which is documented in the patient's medical record, that covers the physical, psychological, emotional and social needs of the patient and includes negotiated goals within indicative time frames and formal assessment of functional ability.

Psychogeriatric care is not applicable if the primary focus of care is acute symptom control.
CODE 6 Maintenance care
Maintenance (or non-acute) care is care in which the primary clinical purpose or treatment goal is support for a patient with impairment, activity limitation or participation restriction due to a health condition. Following assessment or treatment the patient does not require further complex assessment or stabilisation. Patients with a care type of maintenance care often require care over an indefinite period.

CODE 7 Newborn care
Newborn care is initiated when the patient is born in hospital or is nine days old or less at the time of admission. Newborn care continues until the care type changes or the patient is separated:

- patients who turn 10 days of age and do not require clinical care are separated and, if they remain in the hospital, are designated as boarders
- patients who turn 10 days of age and require clinical care continue in a newborn episode of care until separated
- patients aged less than 10 days and not admitted at birth (for example, transferred from another hospital) are admitted with a newborn care type
- patients aged greater than 9 days not previously admitted (for example, transferred from another hospital) are either boarders or admitted with an acute care type
- within a newborn episode of care, until the baby turns 10 days of age, each day is either a qualified or unqualified day
- a newborn is qualified when it meets at least one of the criteria detailed in **Newborn qualification status**.

Within a newborn episode of care, each day after the baby turns 10 days of age is counted as a qualified patient day. Newborn qualified days are equivalent to acute days and may be denoted as such.
CODE 8 Other admitted patient care
Other admitted patient care is care that does not meet the definitions above.

Care other than admitted care can be one of the following:
CODE 9 Organ procurement—posthumous
Organ procurement—posthumous is the procurement of human tissue for the purpose of transplantation from a donor who has been declared brain dead.
Diagnoses and procedures undertaken during this activity, including mechanical ventilation and tissue procurement, should be recorded in accordance with the relevant ICD-10-AM Australian Coding Standards. These patients are not admitted to the hospital but are registered by the hospital.
CODE 10 Hospital boarder
A hospital boarder is a person who is receiving food and/or accommodation at the hospital but for whom the hospital does not accept responsibility for treatment and/or care.
Hospital boarders are not admitted to the hospital. However, a hospital may register a boarder. Babies in hospital at age 9 days or less cannot be boarders. They are admitted patients with each day of stay deemed to be either qualified or unqualified.

Comments: Unqualified newborn days (and separations consisting entirely of unqualified newborn days) are not to be counted for all purposes, and they are ineligible for health insurance benefit purposes.

Source and reference attributes

Submitting organisation: Australian Institute of Health and Welfare
Steward: Australian Institute of Health and Welfare

Data element attributes

Collection and usage attributes

Guide for use:

Only one type of care can be assigned at a time. In cases when a patient is receiving multiple types of care, the care type that best describes the primary clinical purpose or treatment goal should be assigned.

The care type is assigned by the clinician responsible for the management of the care, based on clinical judgements as to the primary clinical purpose of the care to be provided and, for subacute care types, the specialised expertise of the clinician who will be responsible for the management of the care. At the time of subacute care type assignment, a multidisciplinary management plan may not be in place but the intention to prepare one should be known to the clinician assigning the care type.

Where the primary clinical purpose or treatment goal of the patient changes, the care type is assigned by the clinician who is taking over responsibility for the management of the care of the patient at the time of transfer. Note, in some circumstances the patient may continue to be under the management of the same clinician. Evidence of care type change (including the date of handover, if applicable) should be clearly documented in the patient's medical record.

The clinician responsible for the management of care may not necessarily be located in the same facility as the patient. In these circumstances, a clinician at the patient's location may also have a role in the care of the patient; the expertise of this clinician does not affect the assignment of care type.

The care type should not be retrospectively changed unless it is:

- for the correction of a data recording error, or
- the reason for change is clearly documented in the patient's medical record and it has been approved by the hospital's director of clinical services.

Subacute care is specialised multidisciplinary care in which the primary need for care is optimisation of the patient's functioning and quality of life. A person's functioning may relate to their whole body or a body part, the whole person, or the whole person in a social context, and to impairment of a body function or structure, activity limitation and/or participation restriction. Subacute care comprises the defined care types of rehabilitation, palliative care, geriatric evaluation and management and psychogeriatric care.

A multidisciplinary management plan comprises a series of documented and agreed initiatives or treatments (specifying program goals, actions and timeframes) which has been established through multidisciplinary consultation and consultation with the patient and/or carers.

It is highly unlikely that, for care type changes involving subacute care types, more than one change in care type will take place within a 24 hour period. Changes involving subacute care types are unlikely to occur on the date of formal separation.

Patients who receive acute same-day intervention(s) during the course of a subacute episode of care do not change care type. Instead, procedure codes for the acute same-day intervention(s) and an additional diagnosis (if relevant) should be added to the record of the subacute episode of care.
Palliative care episodes can include grief and bereavement support for the family and carers of the patient where it is documented in the patient's medical record.

Source and reference attributes

Submitting organisation: Australian Institute of Health and Welfare

Relational attributes

Related metadata references: See also Activity based funding: Admitted sub-acute and non-acute hospital care DSS 2013-2014 Independent Hospital Pricing Authority, Candidate 29/10/2012
Supersedes Hospital service—care type, code N[N].N Health, Standard 01/03/2005

Implementation in Data Set Specifications: Admitted patient care NMDS 2013-14 Health, Standardisation pending 14/12/2012
Implementation start date: 01/07/2013
Implementation end date: 30/06/2014
Admitted patient mental health care NMDS 2013-2014 Health, Standardisation pending 22/11/2012
Implementation start date: 01/07/2013
Implementation end date: 30/06/2014
Admitted patient palliative care NMDS 2013-14 Health, Standardisation pending 22/11/2012
Implementation start date: 01/07/2013
Implementation end date: 30/06/2014

Glossary

activity based funding (ABF): In Australia, this refers to systems for funding hospital services provided to individual patients. National arrangements for activity based funding for public hospitals use national classifications, cost weights and nationally efficient prices developed by the Independent Hospital Pricing Authority.

admitted patient: A person who undergoes a hospital's formal admission process to receive treatment and/or care. Such treatment or care is provided over a period of time and can occur in hospital and/or in the person's home (as a 'hospital-in-the-home' patient) (METeOR identifier 268957).

average length of stay: The average number of patient days for admitted patient episodes. Patients admitted and separated on the same day are allocated a length of stay of 1 day.

consultation liaison: Where the patient is under the care of a clinician/team and another clinician/team provides a consultation service for the patient. This includes a second opinion, advice on a particular problem, case review, patient/carer education and/or therapy. Applies to the admitted patient episodes only (Eagar et al. 2009).

data set specification (DSS): Metadata sets that are not mandated for collection but are recommended as best practice.

episode of care: The period of admitted patient care between a formal or statistical admission and a formal or statistical discharge, characterised by only one care type (METeOR identifier 268956) (Also see *Care type*, *Separation* and *Statistical discharge*).

hospital: A health-care facility established under Commonwealth, state or territory legislation as a hospital or a free-standing day procedure unit and authorised to provide treatment and/or care to patients (METeOR identifier 268971).

International Statistical Classification of Diseases and Related Health Problems (ICD): The World Health Organization's internationally accepted classification of diseases and related health conditions. The Australian Modification of the tenth revision of the ICD (namely, ICD-10-AM) has been used in all Australian jurisdictions for the coding of admitted patient data since 1999–00.

metadata: Provides the underlying definition or structured description of the content, quality, condition or other characteristics of data.

METeOR (Metadata Online Registry): AIHW's electronically accessible up-to-date source of data standards for national data standards across the health, community services and housing assistance sectors in Australia. It integrates and presents information about the National Health Data Dictionary, the National Community Services Data Dictionary, the National Housing Assistance Data Dictionary, NMDSs and DSSs.

mode of admission: The mechanism by which a person begins an episode of admitted patient care (METeOR identifier 269976).

mode of separation: Status at separation of person (discharge, transfer or death) and place to which person is released (where applicable) (METeOR identifier 270094).

national minimum data set (NMDS): A minimum set of data elements agreed for mandatory collection and reporting at a national level. It may include data elements that are also included in other national minimum data sets. An NMDS is contingent upon a national agreement to collect uniform data and to supply it as part of the national collection, but does

not preclude agencies and service providers from collecting additional data to meet their own needs.

palliative care phase: The stage of the patient's illness within an episode of care. It provides a clinical indication of the level of care required.

patient days: The total number of days for patients who were admitted for an episode of care and who separated during a specified reference period. A patient who is admitted and separated on the same day is allocated 1 patient day (METeOR identifier 270045).

principal diagnosis: The diagnosis established after study to be chiefly responsible for occasioning an episode of admitted patient care (METeOR identifier 333838).

private hospital: A privately owned and operated institution, catering for patients who are treated by a doctor of their choice. Patients are charged fees for accommodation and other services provided by the hospital and relevant medical and paramedical practitioners. Acute care and psychiatric hospitals are included, as are private free-standing day hospital facilities.

public hospital: A hospital controlled by a state or territory health authority. Public hospitals offer free diagnostic services, treatment, care and accommodation to all eligible patients.

separation: The term used to refer to the episode of admitted patient care, which can be a total hospital stay (from admission to discharge, transfer or death) or a portion of a hospital stay beginning or ending in a change of type of care (for example, from acute care to rehabilitation). 'Separation' also means the process by which an admitted patient completes an episode of care by being discharged, dying, transferring to another hospital or changing type of care.

statistical admission: An administrative process that begins an admitted patient episode of care when there was a change in the clinical intent of treatment (for example, from acute care to palliative care).

statistical discharge: An administrative process that completes an admitted patient episode of care when there is a change in the clinical intent of treatment (for example, from acute care to palliative care). For each statistical discharge, there should be a corresponding statistical admission.

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In August 2012, the Independent Hospital Pricing Authority engaged the Australian Institute of Health and Welfare to develop nationally consistent definitions and business rules for subacute and non-acute admitted patient care and care types for implementation in national hospital datasets.

The data element for 'care type' was revised to include a definition of subacute care. It also clarified that subacute care:

- is delivered under the management of or informed by a clinician with specialised expertise in the care type
- be evidenced by an individualised multidisciplinary management plan that is documented in the patient's medical record
- reflect both the characteristics of the patient and the expertise of the treating clinician.