Australian Hospital Patient Costing Standards

Part 2: Business Rules



Australian Hospital Patient Costing Standards – Part 2: Business Rules – Version 4.2

© Independent Health and Aged Care Pricing Authority 2023

This publication is available for your use under a <u>Creative Commons BY Attribution 3.0 Australia</u> licence, with the exception of the Independent Health and Aged Care Pricing Authority logo, photographs, images, signatures and where otherwise stated. The full license terms are available from <u>the Creative Commons website</u>.



Use of Independent Health and Aged Care Pricing Authority material under a <u>Creative Commons</u> <u>BY Attribution 3.0 Australia</u> license requires you to attribute the work (but not in any way that suggests that the Independent Health and Aged Care Pricing Authority endorses you or your use of the work).

Independent Health and Aged Care Pricing Authority material used 'as supplied'.

Provided you have not modified or transformed Independent Health and Aged Care Pricing Authority material in any way including, for example, by changing Independent Health and Aged Care Pricing Authority text – then the Independent Health and Aged Care Pricing Authority prefers the following attribution:

Source: The Independent Health and Aged Care Pricing Authority

Preface

The Independent Health and Aged Care Pricing Authority (IHACPA) is an independent government agency. We promote efficiency and increase transparency in the delivery and funding of public health and aged care services across Australia.

IHACPA's primary function is to enable activity-based funding for Australian public hospital services. <u>Learn more</u> about the national pricing framework, classifications, costing, data collections and protheses.

IHACPA's organisational values shape the culture of the agency and form the basis for stakeholder engagement to achieve our vision. Our core values are as follows:

- We act with independence, transparency, fairness, respect, accuracy and accountability.
- We value collaboration and demonstrate our values in the way we interact internally, with our stakeholders and broader community.
- Our staff act ethically, support a collaborative culture and take pride in their work.

Australian Hospital Patient Costing Standards – Part 2: Business Rules – Version 4.2

The Business Rules listed in this document are drafted within the Australian context. Costing practitioners may encounter practical limitations within their organisation when seeking to adhere to standards and these rules.

- Costing practitioners are advised to understand the nuances of their hospitals and jurisdictions, understand how these can be applied to the Business Rules and how the costing methodology can be adapted to their local environment.
- Where the costing practitioner is unable to fully adopt the process identified within the rules, this should not be considered as a 'failure to comply' to either the Business Rule or the Standard.
- Importantly, the costing practitioner should document the costing process for transparency purposes and seek to make changes within their hospitals to assist with long term costing, Standards and Business Rules development.

Contents

Preface		3
Content	S	4
Introduc	ction	6
Stage 1:	Identify Relevant Expenses	8
	eneral	
1.1A	Medical Expenses for Private and Public Patients	g
1.1B	Capital Expenses: Asset Recognition	10
1.1C	Capital Expenses: Revaluation of Assets	12
1.1D	Capital Expenses: Useful Life	13
1.1E	Capital Expenses: Classes of Assets	14
1.1F	Commercial Business Units	15
1.1G	Lease Costs	17
1.2 Th	hird-Party Expenses	18
1.2A	Corporate and Shared Services	18
1.2B	Patient Transport	20
1.2C	Insurance	22
1.3 O	ffsets and Recoveries	24
1.3A	Offsets and Recoveries	24
Stage 2:	Create the Cost Ledger	26
2.1 Co	ost Ledger Framework	27
2.1A	Cost Centre Mapping	27
2.1B	Account Code Mapping to Line Items	30
2.1C	Product Fractions	31
2.1D	Non-Patient Products	33
Stage 3:	Create Final Cost Centres	34
3.1 O	verhead Allocations	35
3.1A	Hotel Services	35
3.1B	Depreciation	37
3.1C	Corporate Overhead	40

Stage	4: Identify Products	42
4.1	Product Types	43
4.1	A National Data Sets	43
4.2	Information Requirements	45
4.2	A Overhead Allocation Statistics	45
4.2	B Final Allocation Statistics	47
4.2	C Feeder Data and Matching	48
Stage	5: Assign Expenses to Products	53
5.1	Final Products	54
5.1	A Traceable Charges	54
5.2	Intermediate Product	56
5.2	A Relative Value Units	56
5.2	B Matching Point	62
Stage	6: Review and Reconcile	63
6.0	Review and Reconcile	64
6.0	A Negative Cost	64
Gloss	ary	66

Introduction

The purpose of this document is to practically assist costing practitioners to identify and attain all the relevant information for costing purposes, both within their organisations and their respective jurisdictions, to enable them to adhere to the Australian Hospital Patient Costing Standards (AHPCS) Version 4.2.

Structure

The AHPCS Version 4.2 consists of three parts:

Part 1: Standards (including attachments)

Part 2: Business Rules

Part 3: Costing Guidelines

This document forms the Business Rules.

Part 1: Standards

The Standards are overarching principles to support and inform each step in the process of patient level and product costing. They are designed to inform the recommended approach to the costing process and are not meant to be static. The structure of the Standards is intended to align with the product costing process. The Standards are evolving guidelines that will continue to be updated and improved upon, as processes develop.

Part 2: Business Rules

The Business Rules provide practical or detailed guidance on how a standard can be translated into action. They have been written from a costing practitioner's perspective and consider the practical and operational constraints faced by costing practitioners within their organisations when seeking to address the AHPCS Version 4.2. They provide information requirements, definitions, and more detailed information to assist with the costing of more complex services.

These Business Rules follow the costing process from the general ledger through to the final reconciliation of audited accounts and other information sources used in the costing process, such as feeder systems.

Part 3: Costing Guidelines

The Costing Guidelines have been developed to guide costing practitioners and other relevant stakeholders on how to cost various services within their hospitals. These guidelines demonstrate the practical consolidated steps to be undertaken by a costing practitioner to address the relevant Business Rules within each stage, to best demonstrate adherence to the Standards.

The Costing Guidelines do not purport to include all hospital services but have been developed to demonstrate the practical steps of costing specific services within the Australian context over a 20-year period.

Guide to using this document

Stages

The Standards and Business Rules are grouped under the following costing process stages:

- Stage 1 Identify Relevant Expenses
- Stage 2 Create the Cost Ledger
- Stage 3 Create Final Cost Centres
- Stage 4 Identify Products
- Stage 5 Assign Expenses to Products
- Stage 6 Review and Reconcile

At the beginning of each stage there is a description of what is involved within that stage of the costing process, the applicable Standards, Business Rules and a list of documents referenced within the stage.

Numbering convention

The numbering convention of each Business Rule is in terms of 'X.YZ', where:

- X = number of the costing process stage
- Y = number of the sub process within the costing process stage
- Z = letter of the Business Rule associated with the Standard 'X.Y'

Definitions

The Glossary contains definitions for terms present throughout the Business Rules.

Stage 1: Identify Relevant Expenses

An organisation's general ledger comprises all financial transactions occurring over the life of the organisation; the general ledger will be used to prepare that organisation's financial statements. Within the general ledger, transactions are grouped into cost centres that reflect management responsibilities, point of cost control and accounts that reflect categories of expense. It is expected that all organisations covered by these Standards will be in line with the Australian Accounting Standards

The general ledger is a key input of the cost management process and provides an objective source of information that recognises all expenses incurred by an organisation in producing its products. The cost ledger (as outlined in Stage 2) will incorporate the general ledger as a key input to inform the product costing process.

In some circumstances, additional expenses may be incurred on behalf of the organisation by a third party, directly contributing to the delivery of that organisation's products. Where this is the case, these expenses must be included in the cost ledger for the purpose of full product costing.

Offsetting is defined as the reduction of an expense by income or vice versa, so that only the net amount is reflected in product costing. Offsetting is permitted for the purpose of product costing so that only relevant costs incurred to produce outputs controlled by the local hospital networks are included.

Application

Stage 1 of the Business Rules should be read in conjunction with the following stages in the Standards:

Stage 1: Identify Relevant Expenses

Stage 2: Create the Cost Ledger

Stage 6: Review and Reconcile

List of referenced documents

The following documents are referred to in this stage:

- Duckett, S.J. The Australian Health Care Agreements 2003–2008, 2004, Australia and New Zealand Health Policy,1(5).
- Australian Taxation Office (ATO) Taxation Ruling TR 2016/1.

1.1 General

1.1A Medical Expenses for Private and Public Patients

1.1A.1 Scope

1.1A.1.1 This Business Rule relates to the treatment of medical and other expenses found in Special Purpose Accounts (SPA), which manage Rights of Private Practice (RoPP) arrangements.

1.1A.2 Objective

1.1A.2.1 The objective of this rule is to ensure that all expenses, regardless of their funding source, that contribute to hospital activities, are identified and included in the patient costing process where appropriate.

1.1A.3 Business Rule

- 1.1A.3.1 The Standards state that the hospital's cost of production will include all hospital expenses, found on the hospital's general ledger. Costs contained within SPA that form part of the general ledger (and subsequently the audited financial accounts) are to be included within costing submissions. Where costs / expenses are borne by a Trust Fund, these costs do not form part of the general ledger and are not included in costing submissions.
- 1.1A.3.2 Income generated from RoPP arrangements may be used to purchase goods or services. The costs associated with these purchases are only to be included in costing submissions when RoPP income is contained or distributed to the general ledger / general account, for example, any purchases through Trust Funds are not included.
- 1.1A.3.3 Expenses in SPA need to be reviewed by relevant stakeholders who understand the details involved to understand if they relate to hospital activities.
- 1.1A.3.4 In some instances, medical officers using their RoPP may have their costs fully covered through external sources (for example, MBS or private insurance). Where this occurs and there is no cost incurred by the general ledger for the medical officer, the medical officer will not appear as a cost within the costing submission.
- 1.1A.3.5 Income generated by the hospital as a facility fee should not be used in calculating medical officer costs. The facility fee value is not to be added to a medical officer's salary as a cost proxy.
- 1.1A.3.6 Relevant stakeholders will need to review and understand the purpose of expenses in SPA accounts and the various RoPP agreements to align the appropriate expenses to final cost centres for product costing purposes.
- 1.1A.3.7 Relevant stakeholders should maintain documentation of the salary arrangements and the allocation methods applied as part of the product costing process and review at each costing iteration.

1.1B Capital Expenses: Asset Recognition

1.1B.1 Scope

- 1.1B.1.1 This Business Rule specifies guidelines for identifying the scope and source of expenses related to the reporting of recognised assets.
- 1.1B.1.2 This Business Rule provides a guideline for defining expenses and thresholds for those recognised assets that should be allocated to final products.

1.1B.2 Objective

- 1.1B.2.1 This rule seeks to improve the consistency of asset recognition policies across all jurisdictions to ensure comparability of inputs held within patient level costing data.
- 1.1B.2.2 This rule provides clarification on when to capitalise or expend the amount spent on capital expenses; it defines the asset recognition threshold and specifies the amount for an asset to be considered 'low value' and hence exempt.
- 1.1B.2.3 To ensure the asset acquisition or improvement recognition threshold for all hospital property, plant and equipment is not greater than \$10,000.

1.1B.3 Business Rule

- 1.1B.3.1 Costing practitioners should consult their relevant finance stakeholder to receive advice on how assets are recognised.
- 1.1B.3.2 The decision whether to capitalise or expense the maintenance of an asset is based on whether the maintenance serves only to maintain the asset's original service potential or whether it improves it. The accounting standards provide guidance only and the decision remains subjective.
- 1.1B.3.3 The asset acquisition or improvement recognition threshold for all hospital property, plant and equipment should not be greater than \$10,000. Therefore, any expense on assets greater than \$10,000 will be required to be capitalised.
- 1.1B.3.4 Each subsequent amount over the \$10,000 threshold will need to be considered on a case-by-case basis.
- 1.1B.3.5 It is at the jurisdiction's discretion to set the threshold amount below \$10,000. The nominated threshold amount and the reason for the deviation from the normal threshold amount are usually reported in the published accounts.
- 1.1B.3.6 Expenses that fall below the jurisdiction's asset capitalisation threshold or do not meet asset recognition criteria will be expensed in the general ledger (such as repairs and maintenance and minor equipment accounts). Costing practitioners should consult their finance stakeholder to confirm that these expenses have been correctly grouped and allocated accordingly.
- 1.1B.3.7 Items or components with individual value under \$10,000 may be grouped and capitalised only if the sum of the individual values adds up to more than \$10,000.
- 1.1B.3.8 Hospitals as lessees should recognise right-of-use assets and lease liabilities for all leases with a term of more than 12 months (short-term) unless the underlying asset is of low value (no greater than \$10,000) or the payments are entirely variable.

1.1B.3.9	Where jurisdictions have applied different asset capitalisation thresholds, costing practitioners must seek to understand the deviation and state this when submitting cost data for external use.

1.1C Capital Expenses: Revaluation of Assets

1.1C.1 Scope

- 1.1C.1.1 This Business Rule specifies guidelines for identifying the scope and source of expenses related to the reporting of recognised assets.
- 1.1C.1.2 This rule provides a guideline for defining recognised assets that should be allocated to final products.

1.1C.2 Objective

1.1C.2.1 To ensure that all assets requiring revaluation are on the same valuation cycle and ensure comparability across jurisdictions.

1.1C.3 Business Rule

- 1.1C.3.1 Costing practitioners should consult their relevant finance stakeholder to receive advice on the application of this rule on asset revaluation.
- 1.1C.3.2 Any adjustments to the useful life of individual assets should be made prior to the asset being fully depreciated. Costing practitioners should also consult Business Rule 1.1D Capital Expenses: Useful Life, for guidance on determining the useful life of assets.
- 1.1C.3.3 Revaluation methodology must follow the costing guideline of the relevant jurisdiction.
- 1.1C.3.4 Revaluation increments recorded in the profit and loss of a hospital should be offset against the depreciation for the asset to the related increment, prior to depreciation being costed in respect of that asset.
- 1.1C.3.5 Revaluation of assets should occur as per the revaluation model. The frequency of asset revaluations varies depending upon changes in the asset's fair value for property, plant, and equipment. Revaluation may be necessary every three to five years.
- 1.1C.3.6 The information on revaluation is reported in the published accounts. Costing practitioners should report the revaluation methodology as per Standard 6.2 Reconciliation to Source Data.

1.1D Capital Expenses: Useful Life

1.1D.1 Scope

- 1.1D.1.1 This Business Rule specifies guidelines for identifying the scope and source of expenses related to the useful life of recognised assets.
- 1.1D.1.2 This rule provides a guideline for defining expenses and thresholds for the useful life of recognised assets that should be allocated to final products.

1.1D.2 Objective

1.1D.2.1 This rule seeks to ensure that useful lives used in calculating depreciation or amortisation of recognised assets are relevant and applied consistently among hospitals and from period to period.

1.1D.3 Business Rule

- 1.1D.3.1 The useful life of assets assigned by hospitals should be based on the minimum useful lives provided in Australian Taxation Office (ATO) Taxation Ruling (TR) 2016/1. This ruling specifies the minimum useful life to be assigned to classes of assets that are acquired from 1 July 2011 onwards.
- 1.1D.3.2 The useful life of a leased asset, to be capitalised, should be equivalent to the length of the lease.
- 1.1D.3.3 Hospitals may select a different useful life if this better reflects the service capacity of the asset.
- 1.1D.3.4 Although the useful life has been pre-determined by finance staff, costing practitioners should review this with their relevant finance staff to understand any deviation from the requirement for minimum life to reflect the service capacity of the asset and state this when submitting cost data for external use.
- 1.1D.3.5 Reassessment of useful life is permitted where an asset has serviceability longer than its remaining useful life. A hospital can choose to depreciate an asset's written down value over the adjusted remaining years of serviceability. The reassessment must be performed in accordance with accounting standards.
- 1.1D.3.6 The reassessment of useful life cannot be performed on assets that are fully written down without revaluing all assets in that class.
- 1.1D.3.7 Where hospitals have applied different useful lives from the ATO TR 2016/1, costing practitioners must seek to understand the deviation and state this when submitting cost data for external use.

1.1E Capital Expenses: Classes of Assets

1.1E.1 Scope

- 1.1E.1.1 This Business Rule specifies guidelines for identifying the scope and source of expenses related to the reporting of recognised assets.
- 1.1E.1.2 This rule provides guidelines for grouping of assets into classes that will assist with the allocation of capital-related (depreciation) expenses to final cost centres.

1.1E.2 Objective

1.1E.2.1 To ensure that all depreciation and amortisation incurred in the production of hospital products are grouped, allocated and reported.

1.1E.3 Business Rule

- 1.1E.3.1 For the purposes of cost allocation, assets will be generally categorised into the following classes:
 - buildings and improvements
 - intangibles, consistent with the definition of Intangible Assets as per AASB 138
 - medical equipment
 - plant and non-medical equipment
 - right-of-use, where a lessor agrees to give a lessee the right to use an asset for an agreed period in return for a payment or series of payments.
- 1.1E.3.2 Costing practitioners should consult their relevant finance stakeholder on how assets and depreciation expenses are grouped within the hospital's financial reporting.
- 1.1E.3.3 For costing purposes, regardless of how the assets are grouped and reported in the published accounts, costing practitioners should ensure that assets of a similar nature are grouped as per their use in the hospital.
- 1.1E.3.4 Sub-groups may be created for each of the asset classes listed above if different allocation methodologies or cost drivers can be applied for various sub-groups.

For example, medical equipment in the radiology department is further grouped based on the specific equipment used in different tests/treatment:

- medical equipment X-ray
- medical equipment MRI
- medical equipment CT.
- 1.1E.3.5 Costing practitioners should re-categorise assets to the correct categories if the assets reported in the general ledger are not consistent with costing requirements.

1.1F Commercial Business Units

1.1F.1 Scope

- 1.1F.1.1 This Business Rule provides a guideline to identify expenses associated with commercial business entities.
- 1.1F.1.2 This rule provides practical examples to guide staff on the process of identifying these expenses.

1.1F.2 Objective

- 1.1F.2.1 The objective of this rule is to ensure that all commercial business entity expenses contributing to an organisation's day-to-day production of final products are included in the costing general ledger and used for costing allocation to determine the full cost of production.
- 1.1F.2.2 This rule also aims to provide a resource for staff to assist them in undertaking a patient level costing exercise by providing practical examples of commercial business entities.

1.1F.3 Business Rule

- 1.1F.3.1 Many hospitals commercial business units do not generate products that are used in the production of the hospital's patient products. Examples of commercial business units include the:
 - car parking
 - childcare centres, and leasing of retail (for example, for the operation of on-site cafes)
 - commercial space (for example, for on-site private medical suites)
 - florist shop.
- 1.1F.3.2 Where commercial business units do not generate products that are used in the production of the hospital's patient products and these expenses are held within the hospital's general ledger, these costed entities should be treated as non-patient products.
- 1.1F.3.3 Commercial business units may produce products that are also used in generating patient products, such as:
 - commercial kitchens (for example, bulk food production)
 - commercial linen services
 - diagnostic services (for example, pathology and diagnostic imaging)
 - other non-patient related business units.
- 1.1F.3.4 These expenses must be included in the product costing process and partitioned into commercial (non-patient) and patient related activities. Costing practitioners should meet with the finance department, as owners of the general ledger, to document those cost centres and/or account codes that directly relate to this expense.

- 1.1F.3.5 Practical examples to consider are where:
 - a bulk food production facility attached to a hospital will provide patient meal portions to patient encounters at that hospital
 - commercial agreements to supply patient meal portions to other health services
 - a commercial linen service on the premises of a hospital will provide linen services to the hospital and other non-related hospitals or organisations.
- 1.1F.3.6 After documenting the commercial business unit expenses, costing practitioners should meet with the relevant cost centre managers to discuss any partition that is required between patient products and non-patient products.
- 1.1F.3.7 For reconciliation purposes, costing practitioners should ensure that expenses related to corporate and shared services are specified as per Standard 6.2 Reconciliation to Source Data.

1.1G Lease Costs

1.1G.1 Scope

- 1.1G.1.1 This Business Rule provides a guideline to identify expenses associated with lease costs.
- 1.1G.1.2 This rule provides practical examples to guide staff on the process of identifying these expenses.

1.1G.2 Objective

1.1G.2.1 The objective of this rule is to ensure that all lease costs contributing to an organisation's day-to-day production of final products are included in the costing general ledger and used for costing allocation to determine the full cost of production.

1.1G.3 Business Rule

- 1.1G.3.1 All lease costs are within scope for patient costing purposes.
- 1.1G.3.2 Lease cost expenses include:
 - interest expense arising on lease liabilities
 - expenses related to low value leases not capitalised
 - leases with entirely variable payments
 - short term leases.

These expenses are allocated to the line item called 'lease costs' at the final cost centre level.

- 1.1G.3.3 Costing practitioners should obtain jurisdictional advice regarding the treatment of lease costs (including its scope, where it is reported, and the method adopted) for its own jurisdictional reporting purposes.
- 1.1G.3.4 Costing practitioners should meet with their finance staff to understand how lease costs are handled within the general ledger.
- 1.1G.3.5 Lease costs reported in cost centres should be allocated to final or overhead cost centres (based on an appropriate allocation statistic or actual general ledger cost assigned to the production cost centre through a general ledger transaction, where appropriate).
- 1.1G.3.6 Where lease costs are included in capital cost centres, this expense should be identified, and costing practitioners should transfer these expenses to the appropriate cost centre and lease costs related line items.
- 1.1G.3.7 Costing practitioners should meet with their appropriate finance staff to discuss the most appropriate methods of identifying and allocating lease costs to relevant final cost centres.

1.2 Third-Party Expenses

1.2A Corporate and Shared Services

1.2A.1 Scope

- 1.2A.1.1 This Business Rule provides a guideline to identify those corporate and shared services that may be defined as third-party expenses that should be considered by an organisation in determining the full cost of providing products.
- 1.2A.1.2 This rule also provides practical examples to guide staff on the process of identifying these expenses.

1.2A.2 Objective

- 1.2A.2.1 The objective of this rule is to ensure all corporate and shared services contributing to an organisation's day-to-day production of final products are included in patient costing and in determining the full cost of production.
- 1.2A.2.2 This rule also aims to provide a resource to assist staff in undertaking a patient level costing exercise by providing practical examples of corporate and shared services.

1.2A.3 Business rule

- 1.2A.3.1 A hospital may receive corporate or shared services that are provided by another hospital, health service, government department or parent company. A number of these services may form an integral part of the hospital's day-to-day functions and may be an important input to patient care.
- 1.2A.3.2 Should these services not be provided, the hospital may be obligated to replace these services internally or reduce its scope of services and net outputs. For these reasons, expenses that relate to such services need to be identified and included in the full cost of the hospital's products.
- 1.2A.3.3 To identify such services, the costing practitioners should meet their relevant stakeholder to help determine the appropriate expenses for both corporate and shared services.
- 1.2A.3.4 In the case for corporate services, the responsibility or the details of these service arrangements may be held externally (for example, the Jurisdictional Health Authority). The costing practitioner should identify and meet with relevant suppliers to ascertain these details. The external organisation may also provide the costing practitioner with guidance on how to allocate these expenses in their costing system.
- 1.2A.3.5 In the case of shared services, a hospital may either host the service or be the recipient of the shared service. Where possible the host hospital should provide expense details to the receiving hospital. The host hospital should offset expenses that do not relate to the provision of its own product. Some Jurisdictional Health Authorities will provide guidance on how to account for and allocate expenses associated with shared services. Costing practitioners should seek guidance where appropriate.
- 1.2A.3.6 To ensure that inclusions identified as corporate or shared services are relevant to production of hospital products, the costing practitioner must provide an objective

basis for including these expenses. This is achieved by receiving advice from the service provider:

- on the nature of the services, to ensure that they contribute to the production of hospital outputs and are not associated to general support services or a thirdparty governance structure
- on their total value and whether these expenses can be measured with reasonable precision to ensure the full cost is defendable and free of bias.
- 1.2A.3.7 For reconciliation purposes, costing practitioners should ensure that expenses related to corporate and shared services are specified as per Standard 6.2 Reconciliation to Source Data.

1.2B Patient Transport

1.2B.1 Scope

- 1.2B.1.1 This Business Rule provides a guideline to identify patient transport services. This covers different means of transportation including non-emergency ambulance, aerial retrieval, inter-hospital transfer and different means of public transport such as taxi, bus, and commercial flight.
- 1.2B.1.2 This rule also provides practical examples to guide staff on the process of identifying these expenses.

1.2B.2 Objective

- 1.2B.2.1 The objective of this rule is to ensure patient transport services forming a part of patient care and contributing to an organisation's day-to-day production of final products are included in patient costing and in determining the cost of production.
- 1.2B.2.2 This rule also aims to provide a resource to assist staff in undertaking a patient level costing exercise by providing practical examples of patient transport services.

1.2B.3 Business Rule

- 1.2B.3.1 A hospital may engage or receive patient transport services that are provided by a third-party provider.
- 1.2B.3.2 Ambulance services within each jurisdiction are regulated by jurisdictional legislation and guidelines on the:
 - level of service to be provided
 - payment arrangements for ambulance and patient transport services to facilities.

The exception is where a third-party provider of transport services (for example, kerbside ambulance) bills a patient directly; the associated expenses are deemed out-of-scope and are to be excluded.

- 1.2B.3.3 Costing practitioners should also be aware of other patient transport models within the hospital, such as non-emergency patient transport (NEPTS) and internal patient transport, and identify these expenses for costing purposes.
- 1.2B.3.4 Jurisdictions have various financial assistance schemes to subsidise a portion of the 'out-of-pocket' expenses incurred when patients travel to approved specialist medical services. An example of this is Isolated Patients Travel and Accommodation Assistance Scheme (IPTAAS). These types of expenses are in scope when submitting costing data and should be allocated to non-patient products.
- 1.2B.3.5 Costing practitioners should also be aware of their jurisdictional arrangements regarding the Royal Flying Doctor Service, aerial retrievals and inter-hospital transfers. These expenses are in scope and should be assigned to the 'PatTranother' cost line item, in accordance with Standard A.3.19.
- 1.2B.3.6 To ensure that the inclusion of patient transport services costs is relevant to the production of hospital products, the costing practitioner must provide an objective basis to include these expenses.
- 1.2B.3.7 In the case where a third-party provider of transport services bills a patient directly, the associated expenses are deemed out-of-scope and are to be excluded.

For example, other than clinically necessary inter-hospital transfers, overseas visitors will be billed directly for all expenses by the patient transport provider. Costing practitioners should not impute these expenses.

- 1.2B.3.8 The costs of staff involved in patient transportation are in-scope and should be identified for costing purposes unless these staff costs are billed directly to the patient and not captured within the hospital's general ledger.
- 1.2B.3.9 Jurisdictions may have patient transport costs that are included within a hospital's general ledger but outside the scope of the Addendum and are partially or fully funded through other Commonwealth or State transport related appropriations. The line item 'PatTran' is to be used for costs that are funded through the National Health Reform Agreement (NHRA).
- 1.2B.3.10 The line item 'PatTran-other' is to be used for transportation costs for patients, their carer, and escorts that are outside the scope of funding through the NHRA (for example, transportation costs funded through Nationally Funded Centres). For reconciliation purposes, costing practitioners should ensure that expenses related to patient transport services (including aerial retrieval and Royal Flying Doctor Services) are specified as per Standard 6.2 Reconciliation to Source Data.

1.2C Insurance

1.2C.1 Scope

- 1.2C.1.1 This Business Rule provides a guideline to identify insurance expenses that may be defined as third-party expenses, that should be considered by an organisation in determining the full cost of providing products.
- 1.2C.1.2 This rule also provides practical examples to guide staff on the process of identifying these expenses.

1.2C.2 Objective

- 1.2C.2.1 The objective of this rule is to ensure that all insurance expenses contributing to an organisation's day-to-day production of final products are included in patient costing and in determining the full cost of production.
- 1.2C.2.2 This rule also aims to provide a resource to assist staff in undertaking a patient level costing exercise, by providing practical examples of insurance.

1.2C.3 Business Rule

- 1.2C.3.1 Depending on the type and nature of its business, a hospital may have all or part of its insurance coverage provided by a third-party organisation, such as the Jurisdictional Health Authority.
- 1.2C.3.2 The insurance coverage obtained is generally related to the services that form an integral part of the hospital's day-to-day functions and may be an important input to patient care.
- 1.2C.3.3 The following list includes examples of insurance incurred by third parties that are part of the day-to-day production of hospital outputs and should be included in the costing process:
 - Insurance Building
 - Insurance Equipment
 - Insurance Medical indemnity
 - Insurance Workers' Compensation.
- 1.2C.3.4 Jurisdictions may take responsibility to manage their risk by engaging various forms of insurance and these arrangements may comprise the following:
 - a mix of management depending upon the type of insurance enacted. For example, equipment insurance may be held by the hospital, but medical indemnity insurance is paid by the jurisdiction.
 - insurance premiums charged directly to the jurisdiction where that expense is not included within the hospital general ledger.
 - insurance premiums charged to health services where that expense is included in the hospital general ledger.
- 1.2C.3.5 Costing practitioners should ascertain the types of insurance and the source payer, to identify where expenses are held.

- 1.2C.3.6 Where the insurance premiums are charged directly to the jurisdiction (for example, medical indemnity), costing practitioners should obtain the expense and include it in the general ledger for costing purposes. Where possible, this expense should be divided by hospitals, specialty and any further level that would enable expenses to be mapped to the appropriate cost centre in line with Standards 2.2, 4.1 and 4.2.
- 1.2C.3.7 For reconciliation purposes, costing practitioners should ensure that expenses related to corporate and shared services are specified as per Standard 6.2 Reconciliation to Source Data.
- 1.2C.3.8 To ensure such inclusions remain relevant and objective, the costing practitioner must ensure that the remaining criteria identified in Standard 1.2 Third-Party Expenses are met.

1.3 Offsets and Recoveries

1.3A Offsets and Recoveries

1.3A.1 Scope

- 1.3A.1.1 This Business Rule provides details on the scope of financial information that should be considered as part of the patient costing process.
- 1.3A.1.2 This rule provides a guideline for the treatment of offsets and recoveries.

1.3A.2 Objective

1.3A.2.1 The objective of this rule is to ensure that all expenses contributing to the day-to-day production of final cost objects are identified and included in the patient costing process.

1.3A.3 Business Rule

- 1.3A.3.1 For patient level costing purposes, offsetting revenue with expenses is only permitted where there is evidence to support the compensation effectively and reflects the substance of the transaction.
- 1.3A.3.2 An example of this is errors corrections, where the invoiced purchase price of goods is subsequently reduced by the supplier due to a billing error, and a refund is provided by the supplier. The refund that is recorded as revenue can be offset against the cost of the purchased goods.
- 1.3A.3.3 A further example is where goods and services provided by the hospital are reimbursed by another organisation. The goods and services must not contribute to the hospital's outputs. A practical example includes any payments received by the hospital that relate to a seconded staff member or payments received under WorkCover arrangements.
- 1.3A.3.4 Any other revenue generated from the sale of services and relate to the hospital's outputs will not be offset against expenses incurred.

Examples where revenue is not to be offset include any revenue received from:

- any commercial activities
- any grants or subsidies, including revenue for high cost S100 and Pharmaceutical Benefits Scheme drugs
- facility fees, including consulting rooms
- patient charging, including private, compensable, and ineligible patient.
- 1.3A.3.5 Where permitted, offsetting revenue and expenses should typically not generate negative costs. In the case of cost recoveries, this activity should only reflect a small part of the operation of cost centres, where the principal purpose is to provide goods and services aimed at providing patient services.
- 1.3A.3.6 Where rebates occur, these should not be netted off against expenditures.
- 1.3A.3.7 For cost recoveries, costing practitioners should consider transferring the actual or estimated expense from the cost centre used to generate the products or services, for which the cost recoveries were received, and partition that amount into a non-

patient product cost centre. For example, where outsourced services are provided on-site by an external provider and depending on the contract arrangement, these expenses may be recoverable from those external providers.

- 1.3A.3.8 Where this approach is not possible or practical, the costing practitioner should treat the cost recovery as an estimate of the cost of generating the products and/or services for which the cost recovery is obtained and offset against the expense in that cost centre.
- 1.3A.3.9 Cost recoveries received for expenses that have been incurred and included in prior years' general ledger may be offset against similar expenses in the current financial year. For example, the amount recovered from bad debt, written off in prior years, may be offset against bad debt expenses in the current year.
- 1.3A.3.10 Recovered expenses are in most cases found in contra expenses accounts and appear as 'negative' expenses in the general ledger. A contra expenses account is an account that reduces, or offsets, the amounts reported in other general ledger expense accounts. These accounts have a credit balance rather than the usual debit balance and thus are termed as contra accounts.
- 1.3A.3.11 An example where contra accounts are used can be found in the amounts paid to employees on workers' compensation. The employee salary is recorded as an expense while the corresponding recoveries from the insurer are recorded as a negative expense in the contra account. Costing practitioners are required to offset the negative recoveries amount against the corresponding expenses and will need to ensure that they understand the nature of the contra expense to correct the offset.
- 1.3A.3.12 In any circumstance where offsetting the cost recovery results in a negative cost, the process outlined in Business Rule 6.0A Negative Cost should be followed.

Stage 2: Create the Cost Ledger

The cost ledger transforms the organisation's general ledger to structured financial information that enables product costing. The cost ledger thus provides the framework for relating the organisations expenses to products for the purpose of product costing. The key principle supporting this framework is the concept of matching expenses to intermediate products in a way that emphasises the causal relationship between the expense and the intermediate product.

Expenses can be broadly categorised in following ways depending on their relationship with patient care:

1. Patient related cost / expenses

- Direct production and overhead expenses incurred in the delivery of a patient care product and/or service allocated to a patient using evidence of resource utilisation.
- Indirect production and overhead expenses incurred in the delivery of a patient care
 product and/or service that is allocated using a method to apportion the expense (for
 example, relative value units).
- **2. Overhead**: Overhead expenses refer to expenses of services within the hospital that generally relate to organisational and administrative services. They do not relate to patient care.

Application

These Business Rules should be read in conjunction with the following stages in the Standards:

Stage 2: Create the Cost Ledger

Stage 6: Review and Reconcile.

List of referenced documents

There are no documents referred to in this stage.

2.1 Cost Ledger Framework

2.1A Cost Centre Mapping

2.1A.1 Scope

- 2.1A.1.1 This Business Rule provides a guideline for how to identify all overhead and final cost centres within the general ledger for allocation within the costing process.
- 2.1A.1.2 This rule also provides the minimum required cost centre categories and their definition, which need to be identified for costing and cost data collection reporting purposes.

2.1A.2 Objective

- 2.1A.2.1 Cost centres that have been categorised within the general ledger and the chart of accounts may not be organised at levels appropriate for patient level costing and may not be comparable to categories identified in hospitals across the jurisdiction or nationally.
- 2.1A.2.2 This rule aims to differentiate between the hospital general ledger and the costing general ledger comprising overhead and final cost centres. This distinction is important to ensure that cost centre categories are developed through consultation to reflect the causal relationship between expenses and production.
- 2.1A.2.3 This rule also seeks to provide advice to map overhead and final cost centres to a minimum list of defined final cost centres provided in Attachment C of the Standards (NHCDC Final Cost Centres) to promote national consistency for benchmarking purposes. The defined final cost centres promote alignment of cost categories in hospitals allowing for comparability of costs year-on-year and across different jurisdictions.

2.1A.3 Business Rule

- 2.1A.3.1 Costing practitioners should obtain their general ledger and determine the expenses that need to be classified as overhead or final cost centres. They should also obtain a list of their respective hospital departments, their activities and align their general ledger cost centre list and expenses against each cost centre, ensuring alignment with the production of that department or responsibility of the cost centre.
- 2.1A.3.2 For the purpose of patient level costing, the cost centre structure in the hospital general ledger may not appropriately group expenses in a way that:
 - meaningfully groups those resources (expenses) consumed in producing the organisation's products.
 - enables the costing practitioner to categorise and match expenses to intermediate products in a way that aligns to Standard 2.2 Matching Cost Objects and Expenses.

- 2.1A.3.3 To achieve these objectives, a costing practitioner will need to determine both:
 - a meaningful group of expense categories to report an intermediate product's costs to the target audience.
 - the required categories of expenses that best reflect the causal relationship between expenses and intermediate products.
- 2.1A.3.4 To achieve this, the costing practitioner will need to consult with staff members who:
 - have knowledge of the production process. These staff members can provide insights on the relationships between expenses and products.
 - have responsibility and make operational decisions, such as divisional and line managers. These staff members have a view of what is important for decision making and managing resources.
 - are aware of internal and external reporting requirements, such as finance and reporting personnel. These staff members will ensure final results are consistent and relevant with wider reporting requirements.
- 2.1A.3.5 Following stakeholder consultation, the costing practitioner is likely to establish a cost ledger for costing purposes that organises expenses, and groups those that are common to the intermediate products being produced and can be matched to the appropriate activity using consistent methods.
- 2.1A.3.6 Costing practitioners should note that final cost centres can be distinguished from cost centres found in the hospital's general ledger, as they will generally be mapped to a standard list of cost centres that describe hospital activity as per a specified scope of cost data collection. They may also include aggregated cost centres from the hospital general ledger, consolidated to a final cost centre or created cost centres with greater detail of expenses of specific hospital production that may not be distinguished within the hospital general ledger.
- 2.1A.3.7 For example, final cost centres include expenses from clinical units where doctor salaries are held, wards where nursing salaries and ward supplies are held, pathology departments where pathologist salaries and medical supplies are held and pharmacy where pharmacist salaries and drug expenses are held.
- 2.1A.3.8 Where a hospital department is identified as a production centre but does not have its own cost centre, the costing practitioner will need to determine the most appropriate approach for matching activity and expense. One option is outlined below.
- 2.1A.3.9 Costing practitioners should meet with staff members from that hospital department and finance staff to discuss in-scope expenses for that department. They should also discuss where the expense is reported within other cost centres that are used in the production process for that unit.
- 2.1A.3.10 For example, if the department identified is transplantation and this department is not represented by a cost centre in the hospital general ledger, expenses for surgeons, medical practitioners, transplant coordinators and retrievals should be identified from the other cost centres holding these expenses. For surgeons and other clinicians, these expenses may be held in the departments of general surgery, hepatobiliary and infectious diseases. To enable these expenses to be allocated to the appropriate patient activity, the costing practitioner should create a final transplantation cost centre in the cost ledger.

- 2.1A.3.11 Costing practitioners should then, in conjunction with staff members of that department and finance department, determine the proportion of expense that should be transferred to this 'new' final cost centre, using the most appropriate methodology (see Business Rule 2.1C Product Fractions for further advice).
- 2.1A.3.12 For the purposes of reporting to the National Hospital Cost Data Collection (NHCDC) costing practitioners should refer to the Data Request Specification published by IHACPA and refer to Attachment C of the Standards as a guide to cost centre composition relevant to the particular financial year of the NHCDC.

2.1B Account Code Mapping to Line Items

2.1B.1 Scope

- 2.1B.1.1 This Business Rule provides a costing guideline for how to map account codes to line items for patient level costing.
- 2.1B.1.2 This rule also provides reference to the minimum required line item categories and their definition that are to be identified for costing and cost data collection reporting purposes.

2.1B.2 Objective

- 2.1B.2.1 Account codes used to define expenses within cost centres categorised within the general ledger and the chart of accounts may not be organised at levels appropriate for patient level costing and may not be comparable to categories identified in hospitals across the jurisdiction or nationally.
- 2.1B.2.2 This rule also seeks to provide advice to facilitate the mapping of account codes to line item categories for costing and cost data collection reporting purposes.

2.1B.3 Business Rule

- 2.1B.3.1 Expenses are taken from the general ledger or a third party as per Standard 1.1 General. These expenses are classified in accordance with the organisation's chart of accounts.
- 2.1B.3.2 The organisation's chart of accounts groups all expenses by their purpose and provides the organisation with a consistent way to report its financial information to internal and external audiences.
- 2.1B.3.3 The chart of accounts used by a hospital may be too detailed for the purpose of patient level costing, which seeks to group expenses in a way that meaningfully reports the type of expenses that are consumed in producing the organisation's products.
- 2.1B.3.4 To meaningfully group different types of expenses, a costing practitioner will need to consult with staff members to determine the relevant account codes that are important to group to line items for reporting summary information.
- 2.1B.3.5 Staff members who need to be consulted include those who:
 - have knowledge of the production process, to gain an understanding of the relationships between expense categories and the identified products.
 - make operational decisions such as divisional and line managers, to understand what is important to them.
 - are aware of internal and external reporting requirements such as finance and reporting personnel, to ensure comparability with existing reporting structures.
- 2.1B.3.6 For the purposes of reporting to the NHCDC, costing practitioners should refer to the Data Request Specifications published by IHACPA and refer to Attachment A of the Standards for the list of NHCDC Line Items as a guide for account code and line item composition relevant to the specific financial year of NHCDC.

2.1C Product Fractions

2.1C.1 Scope

- 2.1C.1.1 This Business Rule supports the establishment of the cost ledger as the framework to be used in patient level costing.
- 2.1C.1.2 This rule defines product fraction and provides practical examples on how the product fraction process is used to create the cost ledger to be applied in the costing process.

2.1C.2 Objective

- 2.1C.2.1 The objective of this rule is to provide guidance in creating the cost ledger, as the hospital's general ledger may not be structured at levels appropriate for patient level costing.
- 2.1C.2.2 This rule provides guidance to ensure that all expenses from the general ledger have been correctly included and assigned to corresponding final cost centres to enable more accurate costing of final products.

2.1C.3 Business Rule

- 2.1C.3.1 The process of product fractioning expenses into various output groups should, where possible, be avoided by the costing practitioner as this generally involves some estimated split of expenditures based on the interpretation of activity or staff effort and not the actual expenses assigned to those products. The application of this process may in turn undermine the final costed product.
- 2.1C.3.2 A hospital's general ledger may not be suitable for the purpose of patient level costing, as expenses reported at cost centre level may not adequately reflect the day-to-day operation of the hospital, or the particular services it offers (for example, the service/unit/department level). In this case, the costing practitioner may be required to undertake a product fractioning exercise to ensure that expenditures are assigned to be costed to final products.
- 2.1C.3.3 A cost centre may include expenses associated with various products in aggregate form but may not be reported at the appropriate product level that enables it to be defined for costing purposes.
- 2.1C.3.4 Production cost centres should include expenses that relate to the production of relevant activities.
- 2.1C.3.5 Costing practitioners must consult with relevant staff members to obtain and use the best information available to derive the product fractions, ensuring the product fractions applied are reliable and accurately reflect the cost behaviours.
- 2.1C.3.6 Hospitals contain numerous internal business units where, for example, medical staff work across multiple internal business units, across various patient settings (such as inpatient wards, non-admitted settings and in research). These medical staff are generally paid from a single cost centre to perform these functions.
- 2.1C.3.7 To ensure medical expenditures align with activity for costing purposes, the costing practitioner may be required to apply product fractions to allocate the expense within the medical cost centre. This fraction may be based on:

- the availability of patient level utilisation data
- the percentage of work (inpatient, outpatient, surgery, other) written into the doctor's contract
- the proportion of a patients' length of stay across departments
- the proportion of a doctor's time across departments.
- 2.1C.3.8 When applying the product fractions, costing practitioners should test results with the appropriate stakeholder to verify these and to ensure they are clinically relevant.
- 2.1C.3.9 Some examples of the product fractioning process include:
 - splitting expenses in a medical cost centre to inpatient, outpatient, and emergency department.
 - splitting expenses in an allied health cost centre by product category acute, subacute, mental health, non-admitted and community health.
 - splitting expenses in infectious disease cost centre to overhead cost centre and final cost centre.
- 2.1C.3.10 Costing practitioners should document the source and methodology in deriving these product fractions, after they are reviewed and approved.
- 2.1C.3.11 Costing practitioners must ensure the product fractions are periodically reviewed by staff members who are familiar with the service delivery in the cost centre to ensure that the product fractions are current and reflect actual service delivery.

2.1D Non-Patient Products

2.1D.1 Scope

2.1D.1.1 This Business Rule provides guidelines for identifying and addressing products that are non-patient products.

2.1D.2 Objective

- 2.1D.2.1 To ensure all products provided by an organisation are classified into product categories that sufficiently differentiate between patient and non-patient products.
- 2.1D.2.2 To ensure products that are non-patient related with expenses that have occurred within the reporting period are correctly identified and mapped to non-patient products.

2.1D.3 Business Rule

- 2.1D.3.1 Costing practitioners should seek to identify all non-patient products. Examples of non-patient products include expenses associated with the following:
 - cafeteria
 - car parking
 - florist
 - private consulting suites
 - other non-patient related business units.
- 2.1D.3.2 Costing practitioners should meet the finance department, as owners of the general ledger, to document those cost centres or account codes that directly relate to non-patient product expenses.
- 2.1D.3.3 After documenting non-patient product expenses, costing practitioners should meet with the relevant cost centre managers to discuss the appropriate overhead expenses to allocate to non-patient products. For example, the hospital may provide cleaning services to private consulting suites and security services to the carpark.
- 2.1D.3.4 Most non-patient product expenses will also need to absorb other corporate overheads, such as finance. Costing practitioners should also meet with the cost centre managers to establish how to allocate overheads to these areas.
- 2.1D.3.5 Non-patient products must be accounted for in the costing system to enable financial reconciliation to take place. Costing practitioners will need to move these expenses into a defined product or products and allocate the relevant overhead expense.
- 2.1D.3.6 Costing practitioners should ensure that any offsets or adjustments are specified as per Standard 6.2 Reconciliation to Source Data.

Stage 3: Create Final Cost Centres

The cost ledger framework requires that expenses are classified into overhead and production cost centres. Expenses in the overhead cost centres is allocated to the production cost centres. The sum of these expense items (including overhead cost) is then allocated to the production cost centre intermediate products and final products.

Once the final cost centre is created, expenses are referred to as 'costs' for the remainder of the costing process. Expenses accumulated in final cost centres will establish causality between those expenses and the cost object that will absorb them.

Application

These Business Rules shall be read in conjunction with the following stages in the Standards:

Stage 2: Create the Cost Ledger

Stage 3: Create final Cost Centres

Stage 6: Review and Reconcile

List of referenced documents

There are no documents referred to in this stage.

3.1 Overhead Allocations

3.1A Hotel Services

3.1A.1 Scope

3.1A.1.1 This Business Rule specifies that expenses accumulated in overhead cost centres or hotel services be allocated to final cost centres.

3.1A.2 Objective

- 3.1A.2.1 To ensure that all expenses accumulated in overhead cost centres relating to hotel services are allocated to final cost centres.
- 3.1A.2.2 To ensure that hotel services expenses remain visible after allocation to final cost centres.

3.1A.3 Business Rule

- 3.1A.3.1 Hotel service expenses are generally included in overhead cost centres.
- 3.1A.3.2 Costing practitioners should define and map these cost centres as per Standard 2.1 Cost Ledger Framework.
- 3.1A.3.3 Costing practitioners should discuss with the appropriate staff members the most appropriate allocation statistics to be used in allocating hotel expenses.
- 3.1A.3.4 Costing practitioners should refer to the allocation method noted in Standard 3.2 Allocation of Expenses in Overhead Cost Centres as a guide to allocate the overhead expenses to final cost centres.
- 3.1A.3.5 Where a hospital can identify hotel services that have been consumed directly by activity, they should aim to directly allocate these expenses to final products as per the direct cost centre allocations on utilisation data.
- 3.1A.3.6 For example, if the hospital has a patient food ordering system, the cost of patient meals can be assigned directly to the ward cost centre. Where the patient food ordering system is integrated with the Patient Management System and can report patient level utilisation data, the cost of patient meals should be allocated directly to the patient based on meal type and quantity.
- 3.1A.3.7 Where a hospital includes hotel services as commercial activities, costing practitioners should match the expenses to the activity (for example, by reorganising the expenses or by mapping intermediate products) and ensure that they are included and allocated to the relevant cost products.
- 3.1A.3.8 This can be done by using product fractions. See Business Rule 2.1C Product Fractions.
- 3.1A.3.9 Importantly, for overhead allocation, the costing practitioner should ensure that these activities are not excluded from overhead allocations and that the relevant overheads are absorbed by these activities in the production of their services.
- 3.1A.3.10 Any removal of these services and relevant costs from final costed outputs or studies should include total costs incorporating both overhead and final costs.

- 3.1A.3.11 Costing practitioners should document the allocation statistics used for each hotel overhead cost centre as part of the patient level costing process.
- 3.1A.3.12 Costing practitioners should ensure all hotel service expenses are reported under the hotel line item in the final cost centres, as specified in Standard 2.1 Cost Ledger Framework.
- 3.1A.3.13 For reconciliation purposes, costing practitioners should ensure that expenses related to hotel services are specified as per Standard 6.2 Reconciliation to Source Data.

3.1B Depreciation

3.1B.1 Scope

- 3.1B.1.1 This Business Rule specifies that expenses accumulated in overhead cost centres for depreciation are allocated to final cost centres.
- 3.1B.1.2 This rule specifies the treatment of depreciation costs.

3.1B.2 Objective

- 3.1B.2.1 To ensure that all expenses accumulated in overhead cost centres, relating to depreciation, are allocated to product cost centres to create final cost centres.
- 3.1B.2.2 To ensure that depreciation expenses remain visible after allocation to the relevant target departments.

3.1B.3 Business Rule

- 3.1B.3.1 All depreciation (non-cash) expenses are in scope for patient costing purposes.
- 3.1B.3.2 Depreciation is deemed an overhead expense and will be allocated to the line item called Depreciation at the final cost centre level.
- 3.1B.3.3 Costing practitioners should also map depreciation into the relevant account code line items, such as buildings, equipment, and right-of-use asset.
- 3.1B.3.4 Where depreciation expenses are included in account codes, other than one specially assigned for the purpose, costing practitioners should adjust and recategorise these expenses to account codes that will be mapped to the appropriate depreciation related line items. For example, if corporate cost includes depreciation on a vehicle, or a right-of-use asset relating to leased equipment, these should be adjusted and reclassed to the appropriate depreciation line item. Depreciation expenses that are embedded within a cross-charge or fee for service arrangement, and cannot be feasibly distinguished, are excluded.
- 3.1B.3.5 Costing practitioners should obtain jurisdictional advice with regards to their treatment of depreciation (including its scope, where it is reported, and the method adopted) for their own jurisdictional reporting purposes.
- 3.1B.3.6 Costing practitioners should also be aware of the requirements for other purposes, such as national reporting requirements.
- 3.1B.3.7 Costing practitioners should meet with their finance staff to understand how depreciation is handled within the general ledger.

Stage 1: Allocate depreciation in cost centres to final or overhead cost centres

- 3.1B.3.9 Depreciation reported in cost centres should be allocated to final or overhead cost centres (based on an appropriate allocation statistic or actual general ledger cost assigned to the production cost centre through a general ledger transaction, where appropriate).
- 3.1B.3.10 Where depreciation is included in capital cost centres, this expense should be identified, and costing practitioners should transfer these expenses to the appropriate central cost centre and depreciation related line items.

3.1B.3.11 Once depreciation has been identified and assigned to the appropriate cost centres, costing practitioners should allocate these expenses to overhead or final cost centres using the most suitable allocation statistic or volume driver.

Stage 2: Examples of identifying and allocating depreciation expenses

- 3.1B.3.12 Costing practitioners should meet with their appropriate finance staff to discuss the most appropriate methods of identifying and allocating depreciation expenses to relevant overhead and final cost centres.
- 3.1B.3.13 For example, a hospital wishes to allocate \$45,000 of depreciation expense reported in the finance department cost centre for its three ventilator machines residing in the emergency department (ED) and the intensive care unit (ICU).
- 3.1B.3.14 **Scenario 1:** The location of each machine is known as well as the corresponding depreciation amount.

Ventilator	Depreciation	Location
Ventilator A	\$10,000	ICU
Ventilator B	\$15,000	ICU
Ventilator C	\$20,000	ED

In this scenario, of the \$45,000 reported in the finance cost centre, the ICU will be allocated (or transferred) \$25,000 (= \$10,000 + \$15,000) and the ED will be allocated \$20,000.

3.1B.3.15 **Scenario 2:** The location of each machine is known but not the corresponding depreciation amount.

Location/department	Number of ventilators
ICU	2
ED	1

In this scenario, of the 45,000 reported in the finance cost centre, the ICU will be allocated 30,000 (= 2/3 X 45,000) and the ED will be allocated 15,000.

3.1B.3.16 **Scenario 3:** The location of the machines is known, but not their number.

Occupied bed days (OBD) is used as a proxy to transfer depreciation expenses from the finance cost centres to departmental cost centres.

Location/department	Occupied bed days
ICU	200
ED	200

- 3.1B.3.17 In this scenario, as there are two departments and the number of machines within each location is not known, each department will be allocated \$22,500 (=200/400 X \$45,000).
- 3.1B.3.18 Depending on the accounting practices of the hospital, depreciation may not be treated as an overhead. Where assets are purchased for a specific direct cost centre, the depreciation of such assets can be charged directly to that cost centre. In this situation, costing practitioners do not need to identify and apply alternative allocation methods. For example, ventilators bought specifically for the ICU ward, where expenses are reported in the direct ICU cost centre, should be treated as a direct

cost in the ICU, with depreciation expenses reported to the depreciation line item and allocated to patients as detailed in Stage 4 below.

3.1B.3.19 Costing practitioners must also consider how to align the depreciation of an asset, where it is used across multiple settings.

Stage 3: Allocate depreciation in overhead cost centres to final cost centres

3.1B.3.20 The depreciation attributed to overhead cost centres should be allocated to final cost centres in the same way as all other expenses in that overhead cost centre. This application requires agreement with finance staff. For example, unless otherwise specified, equipment depreciation allocated to the finance department should be allocated the same way as the accountant's salaries and wages, or number of full-time equivalents within the finance department. The underlying principle here is that the greater the use of the asset, the greater the depreciation share of that asset.

Stage 4: Allocate depreciation to final products

- 3.1B.3.21 Depreciation should be allocated to final products. For example, to allocate the depreciation of ventilators allocated to ICU in the above example in Stage 2, costing practitioners can elect to use: ICU ward days, the number of hours of mechanical ventilation (HMV) or ICD coding to identify and allocate cost to patients who used ventilators in ICU.
- 3.1B.3.22 For reconciliation purposes, costing practitioners should ensure that expenses related to depreciation are specified as per Standard 6.2 Reconciliation to Source Data.

3.1C Corporate Overhead

3.1C.1 Scope

3.1C.1.1 This Business Rule defines corporate overheads and specifies that these expenses accumulated in overhead cost centres will be allocated to final cost centres.

3.1C.2 Objective

- 3.1C.2.1 To ensure that all corporate overhead expenses accumulated in overhead cost centres are allocated to production cost centres to create final cost centres, prior to undertaking the patient level costing process.
- 3.1C.2.2 To ensure that the treatment of corporate expenses is consistent across jurisdictions.

3.1C.3 Business Rule

- 3.1C.3.1 Costing practitioners should define the corporate arrangements that exist within their jurisdictions to identify, where relevant, the existence of corporate overhead expenses.
- 3.1C.3.2 Corporate overhead expenses should not be included for more than one level above the management of the hospital. Expenses related to the direct management of the local hospital network (LHN) or corporate management are within scope.
- 3.1C.3.3 The scope should relate to the functions directly associated with the day-to-day management of the hospital, or the function of the hospital that in other models would be provided at the hospital in the creation of final hospital products.
- 3.1C.3.4 Where jurisdictions provide services to their hospitals, those functions should be assessed against the scope noted above, as the same principles should apply.
- 3.1C.3.5 Examples of in-scope expenses at the corporate level include:
 - the LHN chief executive officer (CEO) who engages in the day-to-day management of the hospital making day-to-day operational decisions of that hospital (as would a local or standalone hospital CEO).
 - the centralised finance department providing financial management to each hospital within the LHN to enable its day-to-day functioning.
 - the centralised patient level costing function that is performed for all hospitals within the LHN.
- 3.1C.3.6 Examples of activities deemed out-of-scope include:
 - a LHN CEO managing the corporate organisation functions that do not relate to the direct management of the hospital.
 - a jurisdictional chief executive (or deputy secretary) who is responsible for the hospital system as a whole and not the day-to-day operational functioning of the hospital.
 - any patient level costing function or reporting of patient level costing data by jurisdictional staff for collection or benchmarking purposes.
- 3.1C.3.7 Where there is any ambiguity in determining if expenses at the corporate level are in scope, these matters should be referred directly to the jurisdiction for further clarification.

- 3.1C.3.8 Where corporate services are deemed within scope, it is likely that these expenses will appear on the hospital general ledger. Costing practitioners are advised to meet with appropriate staff members to obtain or determine their share of corporate overheads for the inclusion as part of the operating expenses of the hospital.
- 3.1C.3.9 The corporate overhead can be a:
 - charge to an overhead cost centre of the receiving hospital and included in the hospital general ledger,
 - journal adjustment to the hospital general ledger, or
 - transfer to the costing general ledger during the costing process.
- 3.1C.3.10 All corporate overheads will be mapped to the NHCDC line item corporate cost 'All Other Goods and Services' noting that:
 - where an account code is solely used for the corporate expense, that account code should be mapped to line item 'All Other Goods and Services'.
 - where an account code is not solely used for a corporate expense then advice should be obtained to determine the amount related to the corporate portion. This corporate portion should be isolated to a derived account code and mapped to line item 'All Other Goods and Services'.
 - where a cost centre is purely identified as a corporate overhead cost centre then all the account codes should be mapped to the 'All Other Goods and Services' line items.
- 3.1C.3.11 Some expenses included in the corporate overhead may need to be transferred to other cost centres or line items so that they can be allocated appropriately.
- 3.1C.3.12 Corporate overhead expenses will then be allocated using the usual overhead allocation statistics determined in consultation with the relevant hospital staff.
- 3.1C.3.13 For reconciliation purposes, costing practitioners should ensure that expenses related to corporate overheads are specified as per Standard 6.2 Reconciliation to Source Data.

Stage 4: Identify Products

Measures are identified to count and classify all products provided by the organisation. At a high level, the organisation products will be categorised into patient and non-patient products. Where possible, product subcategories will be identified in a way that is consistent with nationally established rules for classification and counting.

Application

These Business Rules shall be read in conjunction with the following stages in the Standards:

Stage 2: Create the Cost Ledger

Stage 4: Identify Products

Stage 6: Review and Reconcile

List of referenced documents

There are no documents referred to in this stage.

4.1 Product Types

4.1A National Data Sets

4.1A.1 Scope

4.1A.1.1 This business rule provides guidelines for aligning source hospital costing activity to national data sets for national reporting purposes.

4.1A.2 Objective

4.1A.2.1 To ensure that source costing data is aligned to national data sets to enable nationally consistent measures of costed patient products.

4.1A.3 Business Rule

- 4.1A.3.1 Activity data that is extracted from the hospital's local information systems, such as the hospital patient administration system, emergency department admission system and outpatient booking system, is used to measure hospitals' products and for national reporting.
- 4.1A.3.2 Costing practitioners should be aware that the patient activity data used for national reporting purposes is generally coordinated by jurisdictional authorities as part of their national reporting obligations. The total quantum of activity (including costed activity such as those records reported to the National Hospital Cost Data Collection) that a jurisdiction may provide to national agencies to fulfil those obligations can differ from activity data that is available in the hospital's local information systems and supplied by the hospital to the jurisdiction. These differences may occur for several reasons, including the scope and purpose of national reporting and changes made to data after application of validation and quality assurance processes by the jurisdiction.
- 4.1A.3.3 To ensure that the data used is appropriate to inform both local and national reporting obligations, costing practitioners should consult with their:
 - jurisdictional authority, to understand the minimum reporting requirements for which hospital activity data is used at the local and national levels.
 - local health information service providers to ensure that local activity information used for costing purposes is consistent and reconciles to data submitted to the jurisdictional authority for reporting purposes.
- 4.1A.3.4 The primary national datasets that costing practitioners should be aware of include:
 - episode of care, as collected in:
 - Admitted Patient Care National Minimum Data Set (NMDS)
 - Admitted Subacute and Non-Acute Hospital Care National Best Endeavours Data Set (NBEDS)
 - Mental Health Care NBEDS.
 - emergency department stay, as collected in:
 - Non-Admitted Patient Emergency Department Care NMDS
 - Emergency Service Care NBEDS.

- service events, as collected in:
 - o Non-Admitted Patient NBEDS.
- teaching, training, and research activities, as collected in:
 - o Hospital Teaching, Training and Research Activities NBEDS.
- 4.1A.3.5 Costing practitioners should work with jurisdictions to account for and document any differences between costed patient activity and activity information that is provided for national reporting.

4.2 Information Requirements

4.2A Overhead Allocation Statistics

4.2A.1 Scope

4.2A.1.1 This Business Rule provides a guideline for the application of overhead allocation statistics to allocate overhead expense to final cost centres.

4.2A.2 Objective

4.2A.2.1 The objective of this rule is to ensure that costing practitioners apply the most appropriate statistic to allocate overhead expenses to final cost centres. This selection enables the most appropriate allocation/share of overhead expenses to various final cost centres, thereby improving the quality and comparability of the costing results.

4.2A.3 Business Rules

- 4.2A.3.1 All expenses accumulated in overhead cost centres must be allocated to the final cost centres.
- 4.2A.3.2 There are two types of overhead allocation statistics:
 - financial allocation statistics
 - non-financial allocation statistics.
- 4.2A.3.3 Financial allocation statistics generally use data from the general ledger to allocate expenses to final cost centres. For example, the use of nurse salaries to allocate the cost of nursing management overhead costs to all cost centres with nursing staff where nursing management has operational oversight.
- 4.2A.3.4 Non-financial allocation statistics generally refer to using statistics from that overhead organisational area to allocate expenses to final cost centres. For example, the number of meals produced for each ward (for catering expenses) or metres of floor space (for cleaning expenses).
- 4.2A.3.5 Where overheads are traceable, and can be directly allocated to patient activity, costing practitioners should prioritise this allocation approach.
- 4.2A.3.6 Technology advances and better feeder systems in hospitals have improved hospitals' ability to track the type and total amount of resources used by patients. Costing practitioners should assign these overhead expenses directly to patients if this information is available. For example, patient food ordering systems integrated with the Patient Management System enables the hospital to allocate catering expenses directly to the patient.
- 4.2A.3.7 Some expenses in overhead cost centres may need to be moved so that they can be allocated in more than one way. For example, traceable expenses in catering may be allocated directly to patients using utilisation data from a patient ordering system and the non-traceable expenses allocated using full-time equivalents (FTE) (for staff meals).
- 4.2A.3.8 Some overhead organisational services may provide reciprocal support to other overhead organisational services besides supporting the final cost centres. Costing

practitioners should consult their finance staff to identify and recognise all overhead cost centres and their services in the hospital.

- 4.2A.3.9 Once overhead cost centres are identified, costing practitioners should review all the available data and decide on the most appropriate allocation statistics to allocate overhead expenses to relevant cost centres.
- 4.2A.3.10 When allocating overheads to other cost centres, one option is to use the actual cost as the allocation statistic. For example, using the details provided within internal or external billing for overhead organisational services, such as external transport billing.
- 4.2A.3.11 Where the actual costs are unknown, Standard 2.2 Matching Cost Objects and Expenses provides the costing practitioner an alternate order of allocation statistics for application.
- 4.2A.3.12 Whilst the detail in Standard 2.2 Matching Cost Objects and Expenses, provides a suggested order of allocation statistics, costing practitioners should not choose the allocation statistics purely based on that order of preference.
- 4.2A.3.13 When choosing an allocation statistic to apply, the costing practitioner should consider the:
 - cause and effect the overhead expenses should be allocated with consideration to the cause and effect with products or services they produce.
 - quality of the allocation statistics available the allocation statistics available should be accurate, reliable, consistent, and complete. They should be available and updated regularly to reflect any changes in operations.
 - economically feasibility some of the allocation statistics are time-consuming and expensive to obtain or manage. Costing practitioners should consider whether the benefits of precise or more reliable cost information justify the additional expense incurred in obtaining accurate and detailed information.
- 4.2A.3.14 Costing practitioners should also review the organisational data provided by overhead organisational units and examine if they cannot be further refined for more detailed and robust allocations. For example, metres of floor space may be used as the allocation statistic for distributing cleaning expenses, and under this scenario would provide greater overhead costs to general wards than the ICU as the former may be larger. This may be incorrect from a cost perspective, as this statistic does not consider cleaning frequency.

An ICU may be cleaned three times more per day than a general ward. In this case a weighted floor space (weight multiplied by floor space) might be the preferred allocation statistic to demonstrate the activity of cleaners and the distribution of overhead cleaning expenses to final cost centres (general ward and ICU).

4.2A.3.15 Costing practitioners should document the allocation statistics used for each overhead cost centre as part of the patient level costing process.

4.2B Final Allocation Statistics

4.2B.1 Scope

4.2B.1.1 This Business Rule provides guidelines with a hierarchy for allocating costs to patient products.

4.2B.2 Objective

4.2B.2.1 The objective of this rule is to ensure that costing practitioners apply a consistent approach when allocating costs to patient products. The hierarchy of allocation enables the most appropriate statistic to be used and reflects the availability of information.

4.2B.3 Business Rules

- 4.2B.3.1 The allocation of costs from final cost centres to patients should be considered and reflect the patient setting, such as admitted, emergency department and non-admitted patients.
- 4.2B.3.2 Approach to allocation statistics will differ depending on the availability of utilisation data. Where the actual cost is not known, costs may be attributed using utilisation of the delivery setting. For example, occupied bed day for medical salaries and wages, or procedure code for theatres.
- 4.2B.3.3 The hierarchy of allocation methods in order of preference are:
 - actual cost allocation or actual time with patients
 - planned or rostered time with patients
 - actual utilisation with internally derived relative value units (RVU) that measure relative costs of intermediate products or services
 - actual utilisation with externally derived RVUs that measure relative costs of intermediate products or services
 - internally derived service weights
 - externally derived service weights.
- 4.2B.3.4 When actual cost or time with a patient is not available then it is necessary to identify a unit for allocating costs which reflects the type of resource to be costed. For example, in wards it could be occupied bed day, in theatres it could be procedure.
- 4.2B.3.5 When determining what allocation methods need to be used to cost a particular service, additional emphasis needs to be placed on what sub-components of the costing should be recognised. For example, it would be considered less reliable to have a single RVU for all of imaging, when it is possible to have an RVU for each imaging service.
- 4.2B.3.6 The allocation of costs may also be a hybrid of alternatives depending on the available data. Costs associated with a theatre procedure may be divided into the actual procedure time where utilisation of staff time may be known and the use of an RVU to allocate costs associated with the set up or clean up of a procedure.

4.2C Feeder Data and Matching

4.2C.1 Scope

4.2C.1.1 This Business Rule provides guidelines for identifying relevant resource level activity from local hospital information (or service area or department) systems known as feeders and matching these to source hospital costing activity and products.

4.2C.2 Objective

- 4.2C.2.1 To ensure that costed products are derived from expenses and activity that have been matched using feeder data from local activity information systems.
- 4.2C.2.2 To ensure that intermediate products described in feeder data are matched to the appropriate patient activity and final product.

4.2C.3 Business Rule

Information requirements and local feeder data

- 4.2C.3.1 Feeder data can be described in two parts for costing purposes:
 - hospital service area or department data
 - product data.

Product data

- 4.2C.3.2 Activity data is extracted from local information systems such as the hospital Patient Administration System, Emergency Department Admission System and Outpatient Booking System. These information systems provide the activity to be matched and allocated against expenses. Some jurisdictions may provide hospitals with finalised activity information that has been submitted by hospitals and validated by jurisdictions for both national reporting and costing purposes.
- 4.2C.3.3 Costing practitioners should make every reasonable effort to obtain activity data from third-party providers to enable the matching of activities to patients and final products. This might involve adding requirements within service agreements for the provision of activity data and/or breakdown of costs.
- 4.2C.3.4 For activity information, costing practitioners should consult with their health information services staff to validate all activity extracts for duplication, merges, and deletions prior to undertaking any matching of expenses to cost objects.
- 4.2C.3.5 Where any discrepancies exist in the validation process, costing practitioners should consult their health information services staff in the first instance to verify these differences.

Hospital service area or department data

- 4.2C.3.6 This data involves the collection of information from various hospital department systems used by hospital staff to record patient level information or clinical data. Examples include clinical observations, clinical procedures and clinical outcomes or the resources required by patients from those hospital service areas as part of the care process.
- 4.2C.3.7 There are no minimum requirements nationally for the number of feeders required for costing purposes and costing practitioners should consult their jurisdictional authority

to understand if there are any general requirements for a minimum number of feeders required to populate the costing system. This may be required to ensure that the costs reported at a minimum represent general patient resource consumption. The quantity of information is more significant than the number of feeders.

- 4.2C.3.8 Costing practitioners should, at the very least, seek to obtain extracts (the feeders) from the main hospital service areas that describe the patient journey. Some examples include:
 - allied health
 - emergency
 - imaging
 - operating suites
 - pathology
 - pharmacy
 - special procedure suites
 - wards
 - ward movements
 - units or clinical specialty.
- 4.2C.3.9 Costing practitioners should be aware that the greater the number of feeders and detail within them and the degree of alignment of these against expenses; the greater the likelihood of robustness in describing patient resource consumption or intermediate product creation and the allocation of product costs.
- 4.2C.3.10 Costing practitioners should consider obtaining feeder data from third-party providers to enhance the allocation of costs.
- 4.2C.3.11 Additional feeders include, but are not limited to:
 - anaesthesia (start, end, type)
 - computed tomography scan (CT scan)
 - dietetics
 - general imaging
 - general pharmacy
 - imaging
 - interpreter services
 - magnetic resonance imaging (MRI)
 - occupational therapy
 - operating theatres
 - operation time (skin-to-skin time)
 - pharmacy
 - prostheses (type)
 - recovery (start, end)
 - speech pathology
 - surgical team/s
 - theatre pre operation time
 - theatre goods and services type
 - pharmacy classification (flags for high-cost pharmacy or Pharmaceutical Benefits Scheme drug type)
 - chemotherapy pharmacy.

- 4.2C.3.12 The costing practitioner should meet with staff members of these service areas to define how best to populate the feeder. Ideally to enable the resources (later to become intermediate products through the costing process) to be defined within each feeder and matched to each patient episode or encounter, the following information should populate the feeder:
 - date and time of service
 - descriptor of the type of service or resource (which is the basis for the intermediate product)
 - patient or encounter unique episode number
 - point of order code (where available)
 - provider code (where available)
 - volume related to type of service (for example, time, quantity of unit, actual charge or price of unit).
- 4.2C.3.13 The primary purpose of these hospital service area systems is to support patient care. The use of this data for costing is a secondary purpose. Therefore, the costing practitioner should perform a series of quality assurance checks on the data within the feeder to ensure it meets the needs for costing. The checks should be tailored to each feeder. Some checks may include:
 - checking date or time of service for error date format, if dates are within the study period
 - checking that start and end times are populated and correct, to ensure durations can be calculated correctly
 - ensure duplicate records are removed
 - once the matching is complete, checking the proportion of unmatched records to activity and addressing those specific issues related to matching.
- 4.2C.3.14 Costing practitioners should advise the feeder staff members of the outcomes of the error checks to enable changes to be made in source systems.

Matching rules

- 4.2C.3.15 Once feeders are defined, costing practitioners should establish a series of matching rules within the costing system to match intermediate products defined in each feeder to the appropriate activity and final product.
- 4.2C.3.16 Intermediate products should be matched to the patient or encounter level for which they have been ordered as this match defines the resources consumed and the associated costs for care.
- 4.2C.3.17 Costing practitioners may wish to consider the following matching criteria, in this order of preference, for activity and feeder data in a coordinated way:
 - Admitted patients match intermediate products by date and time of service
 within the admission and discharge. For example, where nursing acuity systems
 are in use and dispensing on discharge, date and time stamps need to be plus or
 minus 24 hours of admission or discharge or these related activities may not be
 matched.
 - Emergency encounters match intermediate products by date and time of service within the admission and discharge for emergency. For example, where a planned return to ED is occurring, diagnostic tests may be provided within 48 hours of that planned return to ED, the costing practitioner should consider

- increasing the ED matching to plus or minus 48 hours from presentation or discharge but only for this class of patient.
- Outpatient encounters match intermediate products by date of service 30 days before and 30 days after outpatient clinic attendance.
- 4.2C.3.18 Costing practitioners will need to develop and apply rules that fit with their local service models, placing coordinated 'time windows' (such as match between admission or discharge date and time for admitted patents, then look two days back for emergency encounters) around admitted, emergency department and non-admitted patient activity. Intermediate products that are ordered or delivered within these time windows are then considered to match to the appropriate activity for costing purposes.
- 4.2C.3.19 Reliable dates of service within each feeder reduce the likelihood of 'false positive matches' where intermediate products are matched to incorrect activity.
- 4.2C.3.20 Whilst the costing process seeks to match intermediate products to activity; the costing practitioner should be aware that some intermediate products are final products in their own right. For example, if a patient's contact with the hospital is for a nuclear medicine scan (the process of ordering the scan and interpreting the result is done in medical specialist rooms outside the hospital), then in this case the final product is a non-admitted patient service event classified to the National Hospital Cost Data Collection Tier 2 Clinic 30.04 Nuclear Medicine. Matching this intermediate product to other patient activity would create a false positive.
- 4.2C.3.21 Costing practitioners must also gather an understanding of clinical practice (or changes in clinical practice) within their local model to inform matching criteria. For example, it may be assumed that chemotherapy matching for admitted records should use admission and discharge date/time as the best criteria for matching the drugs patients consume, as chemotherapy is generally a same-day admission.
- 4.2C.3.22 However, different hospitals may adopt different local chemotherapy models. In some hospitals, patients are dispensed chemotherapy drugs prior to admission. In these cases, where there is only a pharmacy feeder, the costing practitioner should examine if a chemotherapy pharmacy feeder can be established to firstly identify the relevant chemotherapy drugs and patient cohort, and secondly enable a set of matching criteria relevant to this feeder.
- 4.2C.3.23 It may be the case that to enable matching under this model, the costing practitioner will need to establish matching criteria based on the difference in duration between dispense dates to admission dates (for example, match 2 days prior to the admission date) as this provides a more accurate reflection of hospital process and establishes a more reliable intermediate product match.
- 4.2C.3.24 The costing practitioner should trial a series of matching criteria to establish the best match.
- 4.2C.3.25 Once a reliable match has been found, costing practitioners should examine residual nonmatching records and decipher how these should be handled. For example, where the patient is dispensed several drugs for multiple admissions, the costing practitioner may need to work with their pharmacy stakeholder to alter the feeder and tailor it for reliable matching, prior to matching being undertaken.

- 4.2C.3.26 In some instances, there will be a proportion of intermediate products unable to be matched without a high risk of false positives (these may be deemed unmatched intermediate products). These should be reviewed for data matching purposes.
- 4.2C.3.27 Costing practitioners should undertake matching criteria checks against final products and note significant differences in matching patterns against prior costing iterations to understand if any variation is due to improved or poor matching.
- 4.2C.3.28 The costing practitioner should, where possible and with relevant staff members, test a series of final product output by intermediate product to validate the completeness of the costed record or any false positive matches. This review should inform future matching criteria.
- 4.2C.3.29 Costing practitioners should, for matching activity and feeder data, specify those criteria as per Standard 6.2 Reconciliation to Source Data.

Stage 5: Assign Expenses to Products

All expenses accumulated in final cost centres in the cost ledger will be matched to an organisation's final products on a basis which emphasises causality and which is credible to stakeholders who understand the production process of that organisation.

Intermediate products, such as imaging and pathology tests, will accumulate expenses from final cost centres before they are linked to the final product that they helped produce.

To ensure the full cost of products are represented, expenses that are assigned to final products will include the value of any related intermediate products that occurred prior to the start of the period.

Application

These Business Rules should be read in conjunction with the following stages in the Standards:

Stage 2: Create the Cost Ledger

Stage 5: Assign Expenses to Products

Stage 6: Review and Reconcile

List of referenced documents

There are no documents referred to in this stage.

5.1 Final Products

5.1A Traceable Charges

5.1A.1 Scope

5.1A.1.1 This Business Rule provides a guideline for using traceable charges to assign expenses to final product costs.

5.1A.2 Objective

5.1A.2.1 To ensure that all expenses are allocated to final products using the most appropriate cost driver.

5.1A.3 Business Rule

- 5.1A.3.1 Costing practitioners should identify all traceable charges available in hospital feeder systems or from external sources. These are costs of services or resources where the actual costs are known and traceable to the patients who received the services or consumed the resources.
- 5.1A.3.2 Examples of these services or consumables include, but are not limited to:
 - dispensed and high-cost drugs
 - high-cost consumables
 - prosthetics
 - outsourced diagnostic services.
- 5.1A.3.3 Costing practitioners should note that the use of a traceable charge does not necessarily mean that the cost of the intermediate product, after the costing process, should demonstrate the same result of the traceable charge. Generally, the traceable charge demonstrates the purchase price of the good and it does not consider the additional costs required by the hospital to finish the good, hence additional costs should be considered. For example, whilst a drug may be purchased for a traceable \$100, this is the price of the good or drug in its semi-finished state. There are additional costs incurred by the hospital to handle, store and dispense that drug to enable it to be a finished product.
- 5.1A.3.4 When developing feeders with various hospital service area staff members, costing practitioners should discuss if traceable charges can be included in the feeder and assigned to various activities. Ideally these traceable charges can be directly matched to the activities, intermediate products, or cost object products within the feeder.
- 5.1A.3.5 Some cost centres or cost items may include both traceable and non-traceable charges. As such, costing practitioners may need to move the cost accordingly so that different cost drivers may be used to allocate these costs.
- 5.1A.3.6 For example, drugs may be split between imprest (non-traceable) and dispensed drugs (traceable) where the actual charge is matched to each dispensed drug in the pharmacy feeder.

If the expenses are all in the same cost centre, costing practitioners may have to move the total dispensed drug expenses so that they can be allocated to patients directly using the actual cost as the cost drivers.

- 5.1A.3.7 The traceable charges recorded from the feeder system may differ from the amount recorded in the finance system.
- 5.1A.3.8 For example, the total cost of the imaging extracts obtained from the outside provider is different from the amount in the general ledger. If it can be confirmed that there are no abnormalities in the data, the actual cost can be used as an RVU to allocate the imaging cost.
- 5.1A.3.9 Where the actual charge is used as a traceable charge in the costing process at intermediate product level and the results show a cost per intermediate product below the actual cost, costing practitioners should seek advice from their finance stakeholder.
- Using traceable charges may sometimes result in negative costs in other final cost centres. This may be due to the timing of invoices or unit costs not being updated in service area systems. In this case, an agreed percentage of expenses may be moved as a traceable charge (instead of the total actual amount defined in the feeder) and the actual costs in the feeder system may then be used as an RVU to allocate the cost to the cost products.

5.2 Intermediate Product

5.2A Relative Value Units

5.2A.1 Scope

- 5.2A.1.1 This Business Rule provides a guideline on how expenses accumulated in final cost centres are to be matched to final cost objects.
- 5.2A.1.2 This rule gives costing guidelines for the use of relative value units (RVU) allocations at the intermediate product level.

5.2A.2 Objective

5.2A.2.1 To assist costing practitioners in the development, identification and use of RVUs to inform the cost allocation process.

5.2A.3 Business Rule

- 5.2A.3.1 Costing practitioners should be aware that RVUs are generally applied in the cost allocation process to demonstrate the relative effort in producing one cost object against another.
- 5.2A.3.2 The process of developing RVUs is similar across several service areas (final cost centres) within a hospital, such as wards, nursing, imaging, pathology, pharmacy, and prosthesis. The difference between them generally is the description of effort or value that is used to define the RVU per service area.
- 5.2A.3.3 The determination of effort, or value, is generally dependent on the area being costed and the intermediate products produced from that area. Examples of effort include:
 - acuity (or patient classification or dependency) for wards
 - work effort (time based and resource classification based) for imaging and pathology
 - actual prices (paid by the hospital) for prosthesis and pharmaceuticals.
- 5.2A.3.4 Costing practitioners should note that where expenses are allocated to an intermediate product using an RVU for expense distribution in the costing process, the following hierarchy should be considered:
 - the actual cost of each intermediate product where this is provided via feeder data from an external provider or business unit, and that cost represents the actual charge to the facility for the full provision of that product or the full part of the provision of that service by the external provider.
 - the use of local RVUs that are derived from an organisation's own historical information and accurately reflect the organisation's operational behaviours.
 - the use of RVUs that are derived from external information, such as an industry standard (for example, the Medical Benefits Schedule) or benchmark.
 - the use of national Diagnostic Related Group (DRG) service weights.
- 5.2A.3.5 For the purposes of these business rules, the distinction made for an RVU and service weight is as follows:
 - An RVU is a weighted unit that reflects the comparative costs of production of one product or service against another, across the full range of products or

- services produced within the same department. Ideally, they are based on local data such as a work value unit for effort in conducting one pathology test against another or say the actual charge of a drug. In some instances, they may be externally referenced data at the unit level such as the actual reimbursement of a single or group of pathology tests.
- A service weight is a series of weightings by specified categories (for example, DRG) and by cost bucket which are a relative measure of resource use within a category. In the case of service weights, a weighting is applied at the classification level and it assumes that on average, the relative consumption of resources for episodes within that classification is on average similar.
- 5.2A.3.6 In the absence of data on the actual costs incurred by patients through their consumption of intermediate products, developing local RVUs should be the highest priority for costing practitioners, as the cost will be more reflective of resource consumption and work effort within the hospital, than relying on external price lists or service weights. Furthermore, locally developed RVUs need to be reviewed periodically to ensure they are still relevant.
- 5.2A.3.7 For example, a significant majority of expenses are associated to labour, and in the absence of any data collection describing the workflow of nursing staff per patient per shift, it would be feasible for the costing practitioner to work with area staff, such as nurse unit managers, to derive a series of local RVUs which best reflect the nursing intensity required per ward via a determined patient classification.
- 5.2A.3.8 Costing practitioners should be mindful, however, that in some circumstances, developing local RVUs would be neither feasible nor desirable. For example, pathology services, can include many hundreds of tests (and as many combinations of tests again) and yet from a materiality perspective, pathology services may only account for less than five per cent of the hospitals operational cost.
- 5.2A.3.9 Determining local labour and materials resource relativities for each test, or combination of tests, may be time consuming and not supported by the pathology services manager. In this case the costing practitioner may seek the approval of the pathology services manager to use the Medicare Benefits Schedule (MBS) price list, together with local pricing schedules, for non-MBS items as a proxy to allocate pathology costs.
- 5.2A.3.10 Some jurisdictions require their health services to use established service weights as RVUs to allocate certain costs. Service weights need to reflect contemporary resource utilisation where they are used. Service weights that were developed several decades ago are unlikely to be reflective of contemporary clinical practice. Costing practitioners should also be aware that the use of service weights may compromise the integrity of the intermediate products produced within the clinical costing system for business intelligence and reporting purposes, as they are derived at an aggregated DRG level and not the intermediate product level (such as pathology test level as extracted from the feeder system).
- 5.2A.3.11 The following steps describe the process of developing or using existing RVUs and provide examples for costing practitioners.

Step 1 – Meet relevant staff members

- 5.2A.3.12 Prior to developing local RVUs or an approach to use a proxy RVU, the costing practitioner should meet with relevant staff members to understand the activity, and how expenses relate to the activity. The purpose of the meeting is to obtain an agreed method for determining the relative value of resource consumption for the intermediate products associated with the activity.
- 5.2A.3.13 Costing practitioners need to be conscious that from a materiality perspective, around 70 per cent of expenses will relate to labour. The RVUs developed will need to differentiate between labour costs and the labour effort involved in producing intermediate products, and the effort or cost associated with the material used to produce intermediate products.

Step 2 - Develop relative value units

- 5.2A.3.14 The starting point for developing RVUs is to obtain the relevant activity data for a previous period (for example, the previous financial year), and sort this by the volume of activity that has taken place. Consideration should be given to those cost objects that are new in the current year. For example, if MRI is a discrete cost centre, and MRI tests are identifiable from the imaging feeder extract, these MRI tests should be sorted according to the volume of tests. The top 20 tests by volume may account for a significant proportion of all tests. The costing practitioner then needs to break down the expenses in the MRI cost centre by labour and non-labour categories (for example, medical, nursing, radiographer, or materials).
- 5.2A.3.15 When meeting with the area stakeholder, the costing practitioner will need to discuss how to allocate a relative value of resource consumption to each intermediate product for the labour and non-labour categories. The costing practitioner should seek to obtain information regarding the average time taken and number of staff involved for each intermediate product. An example template for populating the results of this discussion can be seen in the table below:

Table 1: Imaging Feeder Example – Staff Time and Materials

Test	Tests	Medical time	Medical staff	Nursing time	Nursing staff	Radiographer time	Radiographer staff	Materials
MDL4	500		Stair		Starr		Stair	_
MRI 1	500	30	2	40	1	40	1	5
MRI 2	400	10	1	20	1	30	1	2
MRI 3	300	20	1	30	2	40	2	10
MRI n								

5.2A.3.16 After compiling this information, the costing practitioner can then create RVUs to incorporate into the cost allocation process. For the labour related RVUs the calculation is a multiplication of the time and the staff involved. An example is provided in the table below:

Table 2: Imaging Feeder Example - Staff Time × Number of Staff

Test	Medical RVU	Nursing RVU	Radiographer RVU	Materials RVU
MRI 1	$30 \times 2 = 60$	$40 \times 1 = 40$	$40 \times 1 = 40$	5
MRI 2	$10 \times 1 = 10$	$20 \times 1 = 20$	$30 \times 1 = 30$	2
MRI 3	$20 \times 1 = 20$	$30 \times 2 = 60$	$40 \times 2 = 80$	10
MRI n				

5.2A.3.17 A further example is provided for the allocation of nursing on an inpatient ward. This is presented in the table below:

Table 3: Nursing and Ward Example

Method	Service or cost area	Episode number	Intermediate product volume driver	Utilisation (mins)	RVU
Bed day	General medical ward A	IP1234-1	Gen_Med_A_Bed_day	1	1
Actual time	General medical ward A	IP1234-1	Gen_Med_A_Actual_Time	1440	4
Acuity measure with actual time	General medical ward A	IP1234-1	Gen_Med_A_Morning_Acuity_ High_Dependency	480	8
Acuity measure with actual time	General medical ward A	IP1234-1	Gen_Med_A_Afternoon_Acuity _Stable	480	4
Acuity measure with actual time	General medical ward A	IP1234-1	Gen_Med_A_Acuity_Night_ Independent	480	1

- 5.2A.3.18 Table 3 presents various costing scenarios which impact upon the build of the intermediate product and the volume driver. The change in cost is driven by a combination of the volume driver (such as time or bed day), utilisation statistic and the RVU.
- 5.2A.3.19 In the example above, differences in approach are demonstrated when comparing a bed day approach, to an actual time approach, to an acuity measure approach with actual time as the utilisation statistic.
- 5.2A.3.20 Under the acuity measure and actual time approach, the time the patient resides within the ward is split by shift and an assessment is made on the level of care required by the patient (for example, high dependency, stable and independent as a de facto measure of patient complexity). An RVU is then assigned according to the complexity assessment to reflect the nature (or volume) of nursing resource intensity required by the patient.
- In this example, where the patient has not left the ward in the morning (where utilisation is 480 minutes) and the complexity assessment is high dependency; the RVU assigned seeks to demonstrate that this patient will consume on average eight times the nursing resource than where the patient becomes independent in the evening shift. As the RVU assigned is one, so for the morning shift, the patient will have eight times more nursing costs allocated to this intermediate product than the intermediate product for the night shift.
- In the case of the bed day approach, this does not provide the specificity of the acuity measure and actual time approach as the time the patient resides on the ward is rolled up to either a whole or part day and the RVU assigned reflects the complexity of the patient at day's end, which in this example is deemed to be one (or independent), and relative nursing expenditures are allocated accordingly.
- 5.2A.3.23 For the actual time approach, actual minutes on the ward are used as the utilisation measure. This increases the specificity of cost allocation as any movement, or

transfer in and out of the ward, is captured and costs can be allocated based on this time. In this example, the patient resides a full day on the ward (described as 1,440 minutes), but the RVU assigned is based on an assessment of the patient's overall complexity for the day, in this case a four (or stable) and relative nursing expenditures are allocated accordingly.

Step 3 – Use existing relative value units

- 5.2A.3.24 Costing practitioners should be aware that their jurisdictions may provide advice that service weights are to be used to allocate certain expenses. Ideally, these service weights will reflect contemporary clinical practice.
- 5.2A.3.25 In other instances, discussions with service managers may lead to external references and other references being used as RVUs. Some examples are shown in the table below:

Table 4: RVU Examples by hospital service department, service area, final cost centre

Service or cost area	Intermediate product volume driver	RVU / Weighting
Allied Health	Service Minutes	Equal weight of 1
Blood Products	Number of tests	Derived estimate of Blood Price
Cardiology	Number of tests	MBS code matched to test
Catheterisation Laboratory	Number of consumables	Actual charge from in house system
Catheterisation Laboratory	Number of prostheses	Actual charge from in house system
Chemotherapy	Number of drugs dispensed	Actual charge from in house system
Emergency	Total minutes by ED location and Diagnosis	ED medical weight using ED Location and Diagnosis
Emergency	Total minutes by ED location and Diagnosis	ED medical weight using ED location and Diagnosis
ICU	Minutes	ICU patient classification
Imaging	Number of tests	MBS code matched to test
Interpreters	Service minutes	Actual charge
Mental Health	Service minutes	Equal Weight of 1
Mental Health	Dependency by shift	Dependency weight
Outpatients	Minutes	Clinic weight for new or Review
Pathology	Number of tests	MBS code matched to test
Pharmacy	Number of drugs dispensed	Actual charge from in house system or time spent dispensing drugs
Prosthesis	Number of prostheses implanted	Actual price of prosthesis from in house system
Theatre	Minutes	In-hours / after-hours Weighting

- An example of a price list is the MBS which lists a set of fees for health service provisions and the fees can be used to match each pathology intermediate product. This can be used with many pathology services where the extremely high volume (and combinations) of tests can make it impractical to measure or estimate the labour and non-labour contribution to the production of the tests, or combination of tests.
- 5.2A.3.27 The costing practitioner should be aware that the build of the intermediate product and the application of the appropriate RVU to that intermediate product should best reflect the setting in which the resource is created and/or applied.

- 5.2A.3.28 For example, ward nursing intermediate products based on patient classification (or acuity scores) for patients within that ward with a corresponding patient classification RVU, represent the nursing staff workflow for that ward, and will be representative of that ward setting only.
- 5.2A.3.29 For intermediate products such as pathology tests, imaging tests or drugs dispensed from pharmacy, the intermediate product created and the RVU assigned to that intermediate product should not discriminate for the classification of that patient (such as acute inpatient wards or outpatient settings).
- 5.2A.3.30 The effort to generate these intermediate products is the same irrespective of setting. For example, a full blood evaluation pathology test consumed by the patient will have the same relative cost irrespective of where the patient has consumed it (for example, as either an inpatient on an acute ward or as an outpatient), as the effort to create the test, relative to other pathology tests, sits within pathology and not where the patient resides or is classified.
- 5.2A.3.31 Costing practitioners should ensure that stakeholder service managers sign off on the application of the RVU for the allocation of intermediate product costs.
- 5.2A.3.32 Costing practitioners should review their approach to RVUs with their relevant staff members as per their costing cycle or on an annual basis for relevance and quality control.
- 5.2A.3.33 Consideration should be given to how RVUs are assigned within wards where there is a clear distinction between staffing, resourcing requirements or beds, such as in a ward comprising of both high dependency unit (HDU) and ICU beds, which have different nurse to patient ratios. In this instance, the ward has a clear split in resourcing, the electronic medical record (EMR) should be leveraged or updated to enable a distinction in resourcing. This can be achieved through:
 - virtual wards
 - additional locations / wards being added to the eMR; or
 - dedicated beds.

5.2B Matching Point

5.2B.1 Scope

- 5.2B.1.1 This Business Rule provides a guideline to ensure that all expenses accumulated in final cost centres are matched to products.
- 5.2B.1.2 This rule provides examples for identifying the service point as the preferred matching method for intermediate products or services.

5.2B.2 Objective

5.2B.2.1 The objective of this rule is to ensure that all intermediate products contributing to an organisation's day-to-day production are appropriately matched in patient costing to final products to determine the full cost of the production of that product.

5.2B.3 Business Rule

- 5.2B.3.1 The following examples describe how to identify the service point. Identifying the service point is contingent on the source data systems available in the hospital.
- 5.2B.3.2 Costing practitioners should (where relevant) examine the hospital's electronic medical record (EMR). In some EMRs, the intermediate products will be listed and the details of where the product was ordered will be provided. This enables a direct match of intermediate products or services to patient encounters and final products. In these cases, the service point will be known with a high degree of certainty.
- 5.2B.3.3 Where hospitals have disparate feeder and patient administration systems, costing practitioners should assess if the source system feeder files include a field or fields that identify the service point (for example, wards, outpatients, emergency departments) of the patient encounter. Where this is the case, these fields can be used by the costing system to match to the correct patient service event.
- 5.2B.3.4 Costing practitioners should assess if feeder systems include patient encounter or episode numbers. These can be used to directly match to the patient episode numbers from the patient administration system. The patient administration system data will need to identify episodes by their episode type (that is, admitted, non-admitted, emergency). Where episode numbers can be matched between the feeder system and the patient administration system, these matches should be used to identify the service point.
- 5.2B.3.5 Where feeder systems do not include patient encounter numbers that match to the patient administration system, or include fields that map to patient service events, costing practitioners should seek to use the date and time stamp from the source feeder file to identify the service point. The date and time of the intermediate product or service should fall within the date and time range of the patient service event.
- 5.2B.3.6 As service point is the preferred method for matching, order request point should be considered as a matching method when service point matching is not feasible.

Stage 6: Review and Reconcile

A process of review is necessary to support and validate reported costs. Reconciliation of financial and non-financial information to source systems also helps to avoid errors and ensure integrity and transparency in the results.

Application

These Business Rules should be read in conjunction with the following stages in the Standards:

Stage 2: Create the Cost Ledger

Stage 6: Review and Reconcile.

List of referenced documents

There are no documents referred to in this stage.

6.0 Review and Reconcile

6.0A Negative Cost

6.0A.1 Scope

- 6.0A.1.1 This Business Rule provides guidelines for identifying negative allocations to a cost object that is important for decision-making.
- 6.0A.1.2 This Business Rule provides a guideline to address where negative expenses are allocated to products as negative costs.

6.0A.2 Objective

- 6.0A.2.1 To identify expenses that may relate to production costs, which occurred outside of the costing period and do not affect the period's production cost but are reported in the current period.
- 6.0A.2.2 To ensure that where negative expenses have occurred within the period, they have been correctly offset and assigned to the corresponding final cost centre.

6.0A.3 Business rule

- 6.0A.3.1 Negative costs may limit compliance to cost data submission rules (such as, the annual cost data return), as cost collections deem that cost objects or final product costs cannot be negative.
- 6.0A.3.2 Negative costs are seen as an error in the costing process as it is generally accepted that there cannot be negative costs in the cost of production.
- 6.0A.3.3 Some examples of common scenarios that are responsible for the appearance of negative costs in a costed output file:
 - internal or external transfers of staff may result in negative staff expenses in some cost departments.
 - the sum of expenses for a particular line item in a cost centre may be negative. For example, a cost centre where the sum of all oncosts is negative due to a large amount of accrued annual leave.
 - there may be negative values associated with resources consumed by patients (note: this may be an error).
- 6.0A.3.4 Costing practitioners should try to identify the cause of all negative expense components of the cost ledger. Expense components refer to expense items within a line item of a final cost centre. As the organisation's general ledger is the primary source of expense information, negative expenses are commonly identified by sorting the general ledger by the amount of expense by direct cost centre.
- 6.0A.3.5 Costing practitioners should also undertake preliminary data quality checks on their feeder system files. This can be achieved by sorting feeder system files (for example, pharmacy) by the fields associated with the cost calculation process (for example, quantity and price). This process can identify data issues such as negative values that are resulting in negative costs at cost object and product level.

- 6.0A.3.6 Alternatively, costing practitioners can address negative costs by completing a full cost allocation process to identify cost objects and activity and final products that have resulted in negative costs.
- 6.0A.3.7 Costing practitioners are advised to engage the finance department to understand the nature of the negative expense and how it should be treated. Negative costs may be a legitimate facet of the accrual accounting process such as the accrual of annual leave liabilities. Where the sum of expenses for individual line items within cost centres is negative (for example, on costs), the costing practitioner should discuss this issue with their finance stakeholder to obtain their advice on how and where to offset these expenses in the costing system for overhead or final cost centres.
- 6.0A.3.8 Where unusual values are found in feeder files that result in negatively costed outputs, these should be identified and discussed with the manager of the feeder system data. Ideally, the source feeder system manager should make any required changes to the feeder file and resubmit the file, cleansed of errors, to the costing practitioner.
- 6.0A.3.9 If this approach will cause unreasonable delays, the costing practitioner should seek the approval of the source feeder system manager before making any necessary changes to the file for costing purposes.
- 6.0A.3.10 Costing practitioners should ensure that any offsets are specified as per Standard 6.2 Reconciliation to Source Data.

Glossary

Term	Description
Account code	An account code is a unique record for each type of asset, liability, equity, revenue, and expense.
Admitted patient products	Admitted patient products are the services provided to patients who undergo an admission process, where the process of admission is defined in METEOR ID: 327206.
Allocation methodology	Allocation methodology is the process selected to allocate the identified cost to the cost objects.
Allocation statistics	Types of cost allocation bases that use financial or non-financial data to allocate costs aggregated in an overhead cost centre to relevant production cost centres.
	These values measure the relative consumption of products or services produced by those organisational units that are not directly involved in patient care.
Ambulance services	Ambulance services refer to organisations primarily engaged in providing transportation of patients by ground or air, along with health (or medical) care. These services are often provided during a medical emergency but are not restricted to emergencies. The vehicles are equipped with lifesaving equipment and are operated by medically trained personnel. It includes organisations providing public ambulance services or flying doctor services, such as the Royal Flying Doctor Service and Care Flight, and support programs to assist isolated patients with travel to obtain specialised health care.
Asset recognition threshold	Asset recognition threshold is the amount selected as appropriate for recognising assets, taking into consideration materiality and practicalities of maintaining the asset on an asset register. Amounts below this threshold are expensed at the time of purchase. Those above must be capitalised.
Australian asset recognition threshold	Australian asset recognition threshold: for all hospital property, plant, and equipment the amount should be no greater than \$10,000.
Building depreciation	Building depreciation includes fixtures such as items fitted to the building such as lights.
Causal relationship (causality)	Causal relationship (causality) implies that costs matched to a cost object have originated as a direct result of the production of that cost object. This may arise via:
	 a physical relationship between expenses and products, for example, the price paid by the organisation for a given pharmaceutical that is dispensed to a patient. In this instance, producing more units requires more resources, resulting in a higher total cost a contractual arrangement of a department with an external provider, for example, the amount charged by an external pathology provider to undertake a requested test.
Chart of accounts	Chart of accounts refers to a numbered list of all the accounts in the hospital's general ledger.

Term	Description
Commercial business units	Commercial business units are organisational units within a hospital that generate non-patient products for which revenue is obtained from third parties, including but not limited to hospital patients and staff.
Consultation (or clinical) liaison	Consultation (or clinical) liaison refers to the process where a patient who is under the care of one clinician (who holds the medical governance or bed card) is consulted by another clinician or team or is provided a liaison (or advisory) service to that treating clinician or team providing care to the patient.
	Examples include a 'second opinion', advice on a particular problem, a case review, a one-off assessment, or therapy session.
Contractual arrangement	A contractual arrangement is an enforceable agreement between two or more parties that requires something to be done by one or both. For the purposes of these standards, these agreed actions may provide a basis to measure an activity that drives total costs.
Corporate overheads	Corporate overheads refer to expenses related to the management of hospital bodies where expenses are reported outside of the hospital cost centre structure. In some instances, these expenses relate to management bodies of a body of hospitals, such as Boards at the local health network level in the public sector, or head office (or organisational body) expenses of bodies operating multiple hospitals in the private sector.
Cost ledger	The cost ledger provides the framework to be used in product costing. It generally follows the hospital general ledger but is arranged according to a series of cost centres and account codes for costing purposes.
Cost object	Cost accounting requires an organisation to measure the cost of its outputs. In this context, the output that is being measured is important and will vary depending on an organisation's business decision-making needs.
Cost output	Cost outputs are the items that an organisation has identified as important to measure for its own business decision-making needs. As an example, it can vary from measurements of expenses for such things as the hospital, a department, unit, service, program, activity, task, tangible good, patient, patient event, or a patient day. Cost outputs may be either intermediate products (for example a pathology test) or final products (for example an admitted episode).
Cross-charge/fee for service arrangements	Cross-charge/fee for service arrangements refer to charges made between hospitals and other health services or providers, including regional or statewide support agencies for the provision of products or services.
Critical care unit	Critical care unit refers to a separate and self-contained area of a hospital dedicated to the management of patients with life-threatening illnesses, injuries, and complications, and monitoring of potentially life-threatening conditions. It provides special expertise and facilities for support of vital functions and uses the skills of medical, nursing, and other personnel experienced in the management of these problems. (Source: College of Intensive Care Medicine).
Depreciation	Depreciation refers to the reduction in value of an asset over its useful life. This reduction in value occurs, for example, due to age and wear and tear. Depreciation includes building depreciation, equipment depreciation and right-of-use asset depreciation for leased assets.
Direct costs/expenses	Production and overhead expenses incurred in the delivery of a patient care product and/or service allocated to a patient using evidence of resource utilisation. Non-clinical examples of these expenses may include:

Term	Description
	interpreters
	patient food.
Economic feasibility	Economic feasibility refers to acting with reasonableness when determining the effort required to directly allocate costs to cost objects with accuracy against the additional resource cost and effort required to do so. Economic feasibility will be influenced by several factors, such as the:
	 availability of (costing) information or (costing) information systems design of operations that allows for exclusive use of a particular expense by a particular cost object.
Emergency department (ED)	An ED provides triage, assessment, treatment, care and/or treatment for patients suffering from medical condition/s and/or injury. (METEOR ID: 745042and definition of ED services, IHACPA). These include both urgent and non-urgent conditions for a broad spectrum of diseases and illnesses, some of which may be life threatening and require immediate attention. It also includes provision for resuscitation.
Emergency department products	Emergency department patient products are emergency services providing triage, assessment, care and/or treatment for patients suffering from medical condition/s and/or injury, as defined in METEOR ID: 745039.
Equipment depreciation	Equipment depreciation includes non-fixed building fit-out such as theatre tables, moveable furniture, and chemotherapy chairs.
Expenses	Expenses are decreases in economic benefits during the accounting period in the form of outflows or depletions of assets or incurrences of liabilities that result in decreases in equity, other than those relating to distributions to equity participants (AASB CF, 70 (b)).
	The definition of expenses encompasses those expenses that arise during the ordinary activities of the organisation including losses, for example, wages and depreciation. They usually take the form of an outflow or depletion of assets such as cash and cash equivalents, inventory, property, plant, and equipment (AASB CF, 78).
Feeder data	Feeder data refers to the collection of information from various hospital departmental systems used in the day-to-day operations of a hospital, generally for patient care purposes. These systems are used by hospital staff to record patient level information, or the resources required by patients from those hospital service areas as part of the care process. The term 'feeder' is generally used to describe the extract taken from these systems which is reviewed and 'fed into the costing system' for costing purposes.
Final cost centre	A final cost centre is a collection of costs, allocated from both production and overhead cost centres which are applicable to the delivery of the final product.
Final cost object	Final cost objects are outputs of a production cost centre that are not consumed by another production cost centre and are not intermediate products.
Financial or non-financial allocation statistics	Financial or non-financial allocation statistics are types of cost allocation bases that use financial or non-financial data respectively to allocate expenses aggregated in an overhead cost centre to relevant production cost centres.
Full cost	Full cost includes the costs of goods and services consumed by an organisation, including costs that are not included in the general ledger, that meet the criteria of the AHPCS Standards 1.1.3 and 1.2.3.

Term	Description
General ledger	The general ledger holds a set of accounts that summarise all transactions occurring within an organisation and is used to create its financial statements.
High dependency unit (HDU)	An HDU is a dedicated area that provides high dependency nursing care and is an area of observation for patients of higher needs than general. An HDU may be specialty specific under critical care, for example, cardiac surgery HDU, and may exist as an attachment to or step down from either ICU or coronary care unit (CCU). An HDU may be non-critical in nature and may reside within a medical or a surgical clinical ward for the purposes of close observation and provision of high levels of nursing care.
Hotel services	Hotel services refer to services that provide domestic services within the hospital and are not directly related to patient care and include:
	 cleaning products and services linen and laundry services food services (patients) general hotel services.
Imaging services	Imaging services use techniques and processes of creating visual representations of the interior of a body for clinical analysis and diagnosis (METEOR ID: 525782). The techniques include invasive radiology, non-invasive radiology, and nuclear medicine.
	Imaging is a function that is not restricted to a particular location in a hospital, even if there is a dedicated department within a hospital. Often the services are mobile between various locations in a hospital to provide services to patients that are not mobile.
Indirect costs/expenses	Production and overhead expenses incurred in the delivery of a patient care product and/or service that is allocated using a method to apportion the expense (for example, RVUs). Examples may include:
	patient equipment and associated maintenancesterilisation.
Insurance	Insurance refers to the coverage by contract by which one party (generally an insurance provider) agrees to indemnify or reimburse another party for loss that occurs under the terms of the contract.
	Several areas such as staff and their clinical practice and buildings within the hospital are generally insured. The insurance contract generally specifies the financial premium or amount that is paid. This payment is an expense deemed within scope.
Intangible asset	An intangible asset refers to an identifiable, non-monetary asset without physical substance with a life span of greater than one year. For example, software.
Intensive care unit (ICU)	An ICU (METEOR ID: 327234) provides special expertise and facilities for the support of vital functions and utilises the skills of medical, nursing, and other staff trained and experienced in the management of these problems.
Intermediate products	Intermediate products are outputs of a production centre that are further refined or provided to another production centre to contribute to the production of an organisation's final products, for example, pathology testing to support diagnosis by the clinician within a non-admitted episode.
Internal patient transport	Internal patient transport is non-emergency road transport between campuses or facilities within a health service in a vehicle owned and operated by the health service.

Term	Description
Interpreter services	Interpreter services refer to professional service providers being used to facilitate communication between people. It includes verbal language such as languages other than English. It also includes non-verbal communication such persons requiring interpreter services for any form of sign language.
Knowledge of operations	Knowledge of operations is both explicit and tacit knowledge held by staff in the organisation that allows them to undertake activities, implement processes or manage resources to produce the organisation's products effectively.
Labour cost	The definition of labour costs is adapted from ABS Labour Statistics: Concepts, Sources and Methods Cat: 6102.0.055.001 - Employee Remuneration, and is based on the concept of cost to the employer in the employment of labour. In this context labour cost relates to:
	 employee salaries and wage contributions by employers, on behalf of their employees, to social security all other costs borne by employers in the employment of labour such as costs of training, welfare services to employees, and payroll taxes.
Lease	A lease is a contract, or part of a contract, that conveys the right to use an asset (the underlying asset) for a period in return for a payment or series of payments.
Lease term	The non-cancellable period for which a lessee has the right to use an underlying asset.
Lessee	An entity that obtains the right to use an underlying asset for a period in exchange for a payment or series of payments.
Line items	A series of mapped account codes. See attachments to Part 1: Standards.
Matching	Matching is a general term in product costing that covers both:
	 matching expenses to a cost object directly when the expense can be easily identified as having a direct causal relationship. That is, the cost was generated as a direct result of the use of the cost object in the delivery of the hospital service, for example, the price paid for a given pharmaceutical prescribed to a patient matching expenses by means of allocation where they cannot be directly matched to the cost object, for example, the cost of nursing staff on a given ward being allocated to the patients receiving care on that ward.
Matching point	Matching point refers to the matching of costs with services incurred based on a point in time, event, or data point.
Materiality	Omissions or misstatements of items are material if they could, individually or collectively, influence the economic decisions of users taken based on the financial statements. Materiality depends on the size and nature of the omission or misstatement judged in the surrounding circumstances. The size or nature of the item, or a combination of both, could be the determining factor (refer to AASB 1031).
National data collection/National datasets	The term national data collection refers to any National Minimum Data Set or National Best Endeavours Data Set.
Negative Costs	Negative costs refer to less than zero dollar amounts which appear following the costing process for costed products at the individual account line item and cost centre level.

Term	Description
Non admitted clinic/ non-admitted patient service units	Non-admitted clinic or non-admitted patient service units are a recognised clinical team of one or more healthcare providers within a hospital, multipurpose service or community health service that provides non-admitted patient services and/or non-admitted patient support activities.
Non-admitted patient	Non-admitted patient means services as provided as defined in METEOR ID: 652530.
Non-emergency patient transport (NEPT)	NEPT refers to non-emergency road transportation to or from a health or diagnostic facility, inter-hospital transfers and transport to or from non-acute health services such as residential aged care and community health services. NEPT only refers to road transport and must always be requested by a clinician.
Non-patient products	Non-patient products are all goods and service that the organisation may provide other than patient products.
Offsetting	Offsetting means the reduction of an expense by income, or vice versa, so that only the net amount is reflected in product costing.
	Income and expenses should only be offset where offsetting reflects the substance of the transaction.
Operating room	Operating room refers to a designated area of a hospital where significant surgical procedures are carried out under surgical conditions with the supervision of qualified medical practitioners. The operating room must be equipped to deliver general anaesthesia and conform to the College of Anaesthetists and the Faculty of Intensive Care standards (METEOR ID 584569).
Order request point	Order request point refers to the area within the hospital that orders or prescribes an intermediate product or service.
Other non-patient products	Other non-patient products are not further sub-divided and may include, but are not limited to, commercial services.
Overhead cost centre	An overhead cost centre is a collection of costs that are not related directly to the delivery of products, but are required for the delivery of the service and therefore need to be allocated to final cost centres.
Overhead expenses	Overhead expenses refer to expenses within the hospital that generally relate to organisational and administrative functions. They do not relate to patient care and include finance, human resources, general maintenance, and utility expenses.
Pathology services	Pathology services are goods and services used in the provision of a pathology service and consumables (such as, reagents, stains, and calibration products), or the actual cost as billed by a provider. Pathology functions are generally spread across three functional areas, including diagnostic, blood products, and management of adverse drug reactions. Whilst most pathology functions are performed within a centralised laboratory setting, there may be mobile resources which attend to a given patient as required in any setting. Hence, the functions may not be restricted to a particular location or setting.
Patient products	Patient products are either:
	 health services provided for the purpose of: assessing, recording, maintaining, or improving the physical, mental, or emotional health, comfort, or wellbeing of the service user diagnosing or treating an illness, disability, disorder, or condition of the service use

_	
Term	Description
	 services provided by health professionals and non-professionals under their supervision to a patient.
Pharmaceuticals	Pharmacy costs are goods and services used in the provision of a pharmaceutical service and consumables, or the actual cost as billed by a provider. They include the purchase, production, distribution, supply, and storage of drug products and clinical pharmacy services of both Pharmaceutical Benefits Scheme (PBS) reimbursed pharmaceuticals and PBS non-reimbursed pharmaceuticals.
Private patient	Private patient refers to a person who elects to be treated as a private patient and elects to be responsible for paying fees for the type referred to in clause 49 of the Australian Health Care Agreements (2003–2008) (METEOR: 566080).
	Clause 49 states that:
	 private patients, compensable patients and ineligible persons may be charged an amount for public hospital services as determined by the state or territory all patients in private hospitals (other than those receiving public hospital services and electing to be treated as a public patient) are private patients
	This includes all patients who are charged (regardless of the level of the charge) or for whom a charge is raised for a third-party payer (for example, Department of Veterans' Affairs and compensable patients). This also includes patients who are Medicare ineligible and receive public hospital services free of charge at the discretion of the hospital, and prisoners, who are Medicare ineligible while incarcerated.
Product	For the purposes of these standards, products provided by an organisation are categorised into patient and non-patient products.
Product cost	Product cost refers to the sum of all expenses assigned to a product.
Production cost centre	A production cost centre (production centre) is a collection of costs within the cost ledger that relate to a department or production unit, which creates a range of related products. For patient products, these relate to the delivery of patient care.
Program fractions/product fraction	Program fractions are ratios applied to production cost centres that relate to the various product categories associated with patient or non-patient products. These include, but are not limited to, admitted, non-admitted, emergency, teaching, and training.
Prostheses	An artificial substitute or replacement of a part of the body.
Recovery	Recovery refers to an amount recovered for the provision of a product or service by a hospital to a third party (that is, not a hospital patient or staff member).
Revaluation method	Revaluation method: after recognition as an asset, an item of property, plant and equipment whose fair value can be measured reliably shall be carried at a re-valued amount, being its fair value at the date of the revaluation less any subsequent accumulated depreciation and subsequent accumulated impairment losses.
Rights of private practice	Rights of private practice (RoPP) in public hospitals, refers to a formal agreement entered between the hospital and the medical practitioner that allows the medical practitioner to treat and bill private patients.

Description

Approaches adopted across the nation vary but generally range from arrangements in which:

- doctors are paid a private practice allowance as a proportion of their salary, while hospitals receive any monies generated from private patients
- doctors pay their revenue from private practice, or a portion thereof, into a special purpose account (SPA) for use in the hospital.

For the purposes of this rule, three types of arrangements are defined, although other arrangements may exist:

- 100 per cent donation model under this model, all funds generated through Medicare Benefits Schedule (MBS) billing of private patients are 'donated' to the hospital. In exchange, the hospital gives the specialist access to the staff, facilities, and equipment to support the treatment of private patients. Specialists may also negotiate additional salary or 'fee-for-service' to compensate for the foregone MBS income.
- Income donated to the hospital under this model, revenue is held in an SPA according to the specialist's craft group. Funds in these SPAs are used by the hospital on activities of its choice, although the individual specialist may negotiate particular types of expenditure allowed from the account.
- 100 per cent retention model under this model, the medical specialist retains all income derived through MBS billing of private outpatients. In exchange for use of the hospital facilities and access to its staff, the specialist provides the hospital with a facility fee.
- Shared model under this model, the hospital and specialist agree to share the revenue derived from MBS billed services. The hospital provides administrative support, access to staff, facilities, and equipment for a portion of the Medicare benefit assigned by the patient.
- The hospital may be authorised to act as an agent in claiming MBS, which it then places in an SPA. Individual accounts are maintained for each specialist from where proceeds are distributed or shared with the specialist according to the agreement terms.

Right-of-use asset

An asset that represents a lessee's right to use an underlying asset for an agreed period (lease term) in return for a payment or series of payments.

Right-of-use asset depreciation

Right-of-use asset depreciation represents the reduction in a lessee's right to use an underlying leased asset over the lease term.

Royal Flying Doctor Service The Royal Flying Doctor Service is an organisation that provides aerial emergency medical and primary health care services to rural and remote Australia.

Service point

Service point refers to the area within the hospital that an intermediate product/service is performed.

Service weight

A service weight is a series of weightings by specified categories (for example, AR-DRGs) and by cost bucket which are a relative measure of the resources use within a category. In the case of service weights, a weighting is applied at the classification level, and it assumes that on average the relative consumption of resources for episodes within that classification is on average similar.

Term	Description
Shared services	Shared services refer to centralised services provided by an organisation to one or more hospitals as a measure of efficiency of scale and scope. Examples may include scenarios where some hospitals will share a common ICT platform, human resource's function, procurement, food services, or pharmacy services. The hospital may either host the service or be the recipient of the service.
Special purpose account	SPAs fall into two major categories:
	 Those which hold monies that the hospitals have some level of control to use on hospital activities. Monies in these accounts may include sources other than RoPP and contain monies from donations and bequests, grants, fees and charges, and/or funds received for a specific purpose.
	These monies may be subject to external restrictions so that they can only be used by the hospital for a specific purpose and may include things such as research purposes, identified business activities, clinical trials, travel, educational, and other specific purposes.
	2) Trust accounts that hold money on behalf of third parties, such as voluntary organisations attached to the hospitals and patients' private cash. These are true trusts as the hospitals have no legal rights to this money and cannot use these funds for hospital activities.
	Monies in SPA, irrespective of their funding source, are subject to the same accountability standards that apply to all public funds.
Specialised procedure suites	Specialised procedure suites (SPS) refer to a designated area of a hospital where surgical and non-surgical procedures are performed by an appropriately qualified clinician (including medical scientists).
Teaching and training	Teaching and training refers to the activities provided by or on behalf of a public health service to facilitate the acquisition of knowledge, or development of skills. These activities are required for an individual to:
	 attain the necessary qualifications or recognised professional body registration to practice acquire sufficient clinical competence upon entering the workforce for practicing their discipline undertake specialist or advanced practice in medicine, dentistry, nursing, midwifery, or allied health.
	Several activities can be identified as teaching and training within a health service. These include:
	 Direct activities – distinct and separable activities that occur outside an episode of care but are directed towards skills and knowledge development (in the case of teaching and training). Direct activities may include lectures, tutorials, simulations, and workshops. Overhead activities – those 'back office' administrative and coordination activities undertaken by a health service that are essential to facilitate teaching and training activities. These activities may include the coordination of pre-entry student

conjunction with patient care.

these activities within health services.

placements, rotations, educational program development or negotiation with higher education providers. The medical, nursing, and allied health administration departments usually coordinate

Embedded activities – where teaching and training occurs in

Term	Description
Third party expenses	Third party expenses are expenses relating to goods and services delivered by a third party on behalf of the organisation. Third party expenses should be captured within the general ledger through invoicing arrangements, ideally linked to the patient's episode of care. Should a third-party expense relate to a cost funded through the NHRA, this cost must be included in costing submissions and expense values imputed if invoicing data does not exist. Where third party expenses are raised to the Local Health Networks and Districts, these should be appropriately distributed to the applicable hospital. Examples of third-party expenses may include:
	 pathology and imaging services provided by a central or external agency public private partnerships whereby private patients in public hospitals are transferred and treated in nearby facilities support services provided by jurisdictions, such as IT, linen by a state provider, a public private partnership, shared services provided by a jurisdiction's entity. Third party expenses may or may not be reflected within the hospital general ledger blood products tissue typing.
	The inclusion of these and other third-party expenses in costing submissions will depend on: (1) the cost being in the general ledger and (2) relevance to the NHRA funding. Third party expenses for private patients that do not result in a cost to the hospital general ledger sit outside of this requirement and do not require imputation.
Traceable costs	Traceable costs are costs that are incurred solely for activities or to particular cost objects. They are usually the actual cost (such as the price paid to obtain the resource) and can be matched (traced) to the activity, intermediate product, or patient activity.
Useful life	Useful life refers to the period over which an asset is expected to be available for use by an entity.
Variable lease payments	The portion of payments made by a lessee for the right to use an underlying asset during the lease term that varies because of changes in facts or circumstances occurring after the commencement date, other than the passage of time. For example, payment driven by performance (payment based on percentage of sales) or usage of an underlying asset (payment based on the number of units produced).
Visiting medical officers (VMOs)	VMOs are defined as medical practitioners appointed by the hospital to provide medical services for hospital (public) patients in an honorary, sessional paid or 'fee-for-service' basis. VMOs are entitled to on-call and call-back allowance and public holiday allowance on top of their 'contracted' services payments.
Wages and salaries	Wages and salaries are the remuneration, in cash or in kind, payable to a person counted on the payroll and paid in return for work done during the accounting period.

for work done, including:

These include payments or in-kind benefits received by a person in return

Description

- all salary sacrificed (including associated taxes such as fringe benefits tax and superannuation contribution tax)
- attendance fees
- bonuses or incentive payments
- ex gratia payments
- gratuities, commissions, and tips
- lodging, transport, or cost-of-living
- ordinary time and overtime payments
- payments by results
- payments under profit sharing schemes
- severance payments
- taxable allowances.



Independent Health and Aged Care Pricing Authority

Level 12, 1 Oxford Street Sydney NSW 2000

Phone 02 8215 1100 Email enquiries@ihacpa.gov.au Twitter @IHACPAnews

www.ihacpa.gov.au