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Health Board



<b>Meeting Date</b>	<b>26 January 2023</b>	<b>Agenda Item</b>	<b>3.1</b>
<b>Report Title</b>	<b>Critical Care Expansion and Burns Relocation</b>		
<b>Report Author</b>	<b>Patricia Jones, Senior Project Manager, Strategy</b> <b>Kate Hannam, Morriston Service Group Director</b>		
<b>Report Sponsor</b>	<b>Kate Hannam, Morriston Service Group Director</b>		
<b>Presented by</b>	<b>Darren Griffiths, Director of Finance &amp; Performance</b>		
<b>Freedom of Information</b>	Open		
<b>Purpose of the Report</b>	<p>This report updates the Health Board on the position in relation to the co-location of Burns Intensive Care Unit (ICU) with General ICU and expansion of critical care services.</p> <p>The Board is asked to approve the final Business Justification Case (BJC) for submission to Welsh Government (WG).</p>		
<b>Key Issues</b>	<p>The South-West Burns Care Operational Delivery Network is one of four specialised burns care networks covering England and Wales. Morriston Hospital is the Welsh Centre for Burns and Plastic Surgery and provides specialist care for patients of all ages from both Wales and Southwest England.</p> <p>With the development of Intensive Care Medicine as an increasingly specialised area coupled with changes in the Anaesthetic training, the ability for the current Burns Anaesthetic team to maintain cover for the standalone Burns ICU and to recruit into the service has been significantly challenging over several years. This has resulted in a number of issues arising:</p> <ul style="list-style-type: none"> <li>• Temporary closure of the burns service in October 2021 due to the inability to provide adequate anaesthetic cover to the standalone unit – some patients transferred to other burns care network;</li> <li>• Requirement for a temporary rota to be put in place with the general anaesthetists supported by burns specialists to enable the service to re-open whilst a more sustainable operating model was developed;</li> <li>• External review by the Burns network recommended opportunities for new ways of working between burns and General Intensive Care Unit (GICU) to support the</li> </ul>		

	<p>development of a workforce model which would support sustainability of the service for the future;</p> <ul style="list-style-type: none"> <li>• Recognition that the standalone burns service was not a sustainable model for the future and the need to co-locate within the GICU with the required capital development to support this was shared with Welsh Government (May 2022).</li> </ul> <p>The requirement to expand the critical care service has also been acknowledged following the increase in tertiary/specialist services into Swansea Bay University Health Board (SBUHB) over the past few years.</p> <p>This proposal therefore co-locates the three Burns Intensive Care beds within the General Intensive Care footprint to address the above issues as a first stage (along with the relocation of the burns theatre to the main theatre suite) prior to the further modernisation of critical care services more broadly for the Board. These are described as Phases 1 and 2 in the report.</p> <p>The financial analysis for Phase 1 identifies a capital requirement of £7.3m and assessed as revenue neutral.</p>			
<b>Specific Action Required</b> <i>(Please choose one only)</i>	<b>Information</b>	<b>Discussion</b>	<b>Assurance</b>	<b>Approval</b>
	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<b>Recommendations</b>	<p>Members are asked to:</p> <ul style="list-style-type: none"> <li>• <b>NOTE</b> the work which has been undertaken to develop the expansion of Critical Care Services and co-location of Burns cubicles in GICU.</li> <li>• <b>NOTE</b> the risk register for the project and note the mitigating actions being taken.</li> <li>• <b>NOTE</b> the BJC has been endorsed by the Critical Care Expansion and Burns Relocation Project Board on 14<sup>th</sup> December 2022 and the Health Board's Management Board on 18<sup>th</sup> January 2023.</li> <li>• <b>AGREE</b> the strategic and capital investment of £7.3m to be funded by WG.</li> <li>• <b>APPROVE</b> the BJC and subsequent submission to Welsh Government for consideration against the All-Wales Capital Programme.</li> </ul>			

## **Critical Care Expansion and Burns Relocation**

### **1. INTRODUCTION**

This report updates the Health Board on the position in relation to the Expansion of Critical Care Services and co-location of Burns Intensive Care Unit and General ICU (GICU) and expansion of critical care services, seeks approval of the Business Justification Case (BJC) for onward submission to Welsh Government.

### **2. BACKGROUND**

The South-West Burns Care Operational Delivery Network is one of four specialised burns care networks covering England and Wales. Morriston Hospital is the Welsh Centre for Burns and Plastic Surgery and provides specialist care for patients of all ages from both Wales and Southwest England.

With the development of Intensive Care Medicine as an increasingly specialised area coupled with changes in the Anaesthetic training, the ability for the current Burns Anaesthetic team to maintain cover for the Burns ICU and to recruit to the service has been significantly challenging over several years. During a period of temporary closure in October 2021, adults who required Centre level critical care within South/Mid Wales following stabilisation at Morriston Hospital had to be transferred to another burns care network.

In November 2021, the Southwest Burns Care Operational Delivery Network commissioned an external peer review visit at Swansea Bay University Health Board (SBUHB) which focused on the lack of consultant burns anaesthetists/intensivists. This review was also seen as an opportunity to develop new ways of working between burns and GICU, to forge a more sustainable workforce model in preparation for the planned development of a dedicated Emergency and Critical Care centre on the Morriston Hospital site.

A multi-stakeholder clinical group was established during 2021/22 to consider the options for a future sustainable model and the proposed outcome of this was to create a co-located burns/critical care service in a phased approach in recognition of the urgency required of the programme. The phases of the programme are outlined below:

#### **Phase 1 will:**

- Move the current isolated Burns ICU service into Morriston's main GICU, thereby improving the sustainability of the service from a workforce perspective;
- Move the current isolated burns theatre into the main theatre suite to ensure standards are met with regards to proximity of the burns theatre to the burns ICU area;
- Re-provide the reduced GICU capacity within the theatre recovery area on a temporary basis.

### **Future phases (essential for the sustainability of SBUHB ability to support critical care activity associated with regional/tertiary and specialist services)**

- Re-provide the lost GICU capacity resulting from the co-location of burns through adapting an existing medical ward and expanding GICU capacity
- Relocate the medical ward into a decant facility;
- Refurbish current burns ICU unit to accommodate dedicated burns ward with co-located theatres for patients not requiring ICU admission

A scoping meeting was held with Welsh Government on 17<sup>th</sup> May 2022 to share the outline of the proposed case, including the phased approach. It was advised at this meeting that a single stage business case would be required for Phase 1 of the proposal, and this was to describe the phasing of the proposal, indicative costs and scope of the programme.

The following outlines the phased approach identified as part of the in recognition of the urgency required of the programme.

### **3. GOVERNANCE AND RISK ISSUES**

Attached as **Appendix A** is the risk register for the Critical Care Expansion and Burns Relocation Project which has been discussed and agreed at Project Board. The most significant risk relates to the current viability of the anaesthetic rota:

- Risk (294) workforce plans for burns and critical care and essential resources are not in place to deliver the current service and to support this project
- Mitigations:
  - (1) Workforce Task and Finish Group to drive forward organisational posts.
  - (2) Hybrid arrangements in place since February 2022.
  - (3) Anaesthetists and Intensivists working and filling any identified gaps. Close working relationships with Burns teams to ensure any gaps are covered.
- Risk mitigation score: (risk impact 5), (risk likelihood 4) = 20

### **4. PROGRESS TO DATE:**

A Project Board with associated work streams was established during 2021/22 and has focused on identifying the options associated with the provision of the burns ICU service and options for expanding GICU capacity. Focus has been on both the capital and clinical model development associated with the proposal in order to inform the initial proposal to Welsh Government scoping meeting.

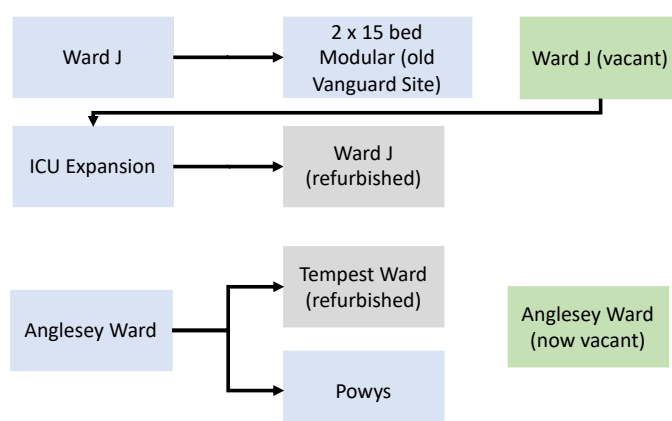
Further workshops have since been held to further consider the options with the appropriate stakeholders and the following progress with regards to the capital development and clinical models has been made:

- Phase 1 - Confirmation of the option to co-locate Burns ICU into ICU North and utilise theatre recovery on a temporary basis for lost GICU capacity (4 beds).
- Phase 1 – Finalisation of the designs for ICU North and Theatre 7 - Design meetings have been held with the burns and critical care clinical teams and Stride Treglown Design Team which has resulted in the development of agreed designs for both Theatre 7 (S2P15 Appendix B) and ICU North (S2P18 Appendix C). These designs were endorsed by the Critical Care Expansion and Burns Relocation Project Board on 7<sup>th</sup> October 2022.
- Future Phases - Identification of the options associated with the future phases of the programme requiring the lost GICU capacity to be re-provided; expansion of the critical care capacity and creation of a dedicated burns unit (see Table below for the options)

	Option 2.1	Option 2.2	Option 2.3	Option 2.4
Phase 1	Business as Usual – all services remain within their current locations (baseline required for comparison purposes)	Convert ICU North (currently 6 GICU bed) to incorporate 3 burns cubicles plus 2 GICU cubicles (resulting in the loss of 4 GICU beds)	Convert ICU North (currently 6 GICU bed) to incorporate 3 burns cubicles plus 2 GICU cubicles (resulting in the loss of 4 GICU beds)	Convert ICU North (currently 6 GICU bed) to incorporate 3 burns cubicles plus 2 GICU cubicles (resulting in the loss of 4 GICU beds)
		Convert Theatre 7 to ensure suitability for burns patients	Convert Theatre 7 to ensure suitability for burns patients	Convert Theatre 7 to ensure suitability for burns patients
Future Phase(s)		Creation of new build Modular Unit with 2 x 15 bed wards	Creation of new build Modular Unit with 2 x 15 bed wards	Creation of new build Modular Unit with 2 x 15 bed wards
		Ward J → Modular Unit	Ward S → Modular Unit Ward J → Ward S	Anglesey Ward → Modular Unit Ward J → Refurbished Anglesey Ward
		Convert Ward J to critical care facility, a net increase of 4 beds	Convert Ward J to critical care facility, a net increase of 4 beds	Convert Ward J to critical care facility, a net increase of 4 beds
		Refurbish Tempest Ward retaining the theatres and converting the remaining space to provide 14 single bedrooms	Refurbish Tempest Ward retaining the theatres and converting the remaining space to provide 14 single bedrooms	Refurbish Tempest Ward retaining the theatres and converting the remaining space to provide 14 single bedrooms
		Anglesey Ward → Powys Ward → Refurbished Tempest Ward (Anglesey Ward is Vacant)	Anglesey Ward → Powys Ward → Refurbished Tempest Ward (Anglesey Ward is Vacant)	Anglesey Ward (from Modular Unit) → Powys Ward → Refurbished Tempest Ward (Modular Unit is Vacant)

- Future Phases – Option 2 selected as the preferred option for future phases with the proposed changes indicated in Diagram 1 below:

Diagram 1:



- Production of indicative capital and revenue requirements of each shortlisted option with the preferred solutions being:
  - Phase 1 - £7.3m capital with no revenue consequences;
  - Future Phases (Option 2) - £37.7m capital with £4.3m revenue (includes expansion of critical care bed base which will require WHSCC funding).

## 5. FINANCIAL IMPLICATIONS.

The indicative finances associated with this business case are as follows:

### Capital:

Table 1: capital costs – Phase 1: All options

	ICU North	Theatre 7	Total
Works Cost	£2,835,426	£2,586,780	£5,422,206
Fees	£573,193	£527,548	£1,100,741
Non-Works Costs	£105,360	£119,160	£224,520
Equipment Costs	£360,060	£235,770	£595,830
Contingency	£193,315	£173,116	£366,431
<b>Total</b>	<b>£4,067,353</b>	<b>£3,642,374</b>	<b>£7,709,727</b>
Less Recoverable VAT	(£190,046)	(£174,151)	(£364,197)
<b>Grand Total</b>	<b>£3,877,307</b>	<b>£3,468,223</b>	<b>£7,345,530</b>

Table 2 shows the indicative capital costs for each option relating to the future phases

	Option 2	Option 3	Option 4
Works Cost	£30,837,359	£33,417,359	£33,403,917
Fees	£6,355,734	£6,868,804	£6,866,125
Non-Works Costs	£150,600	£150,600	£150,600
Equipment Costs	£600,000	£600,000	£600,000
Contingency	£1,893,390	£2,047,734	£2,046,930
<b>Total</b>	<b>£39,837,083</b>	<b>£43,084,498</b>	<b>£43,067,572</b>
Less Recoverable VAT	(£2,087,201)	(£2,258,713)	(£2,257,818)
<b>Grand Total</b>	<b>£37,749,882</b>	<b>£40,825,785</b>	<b>£40,809,754</b>

The key assumptions underlying the development of the capital costs are:

- Capital Cost includes works, non-works, abnormal allowances, equipment costs and risk contingency, which is assessed at 5% for ICU North and Theatre 7;
- The BIS PUBSEC indices at this stage is 296 for Q4 2022. The Business Case Reporting Index will be the standard one for Wales of 0.97;
- This BJC for Phase 1 excludes a Comprehensive Investment Appraisal (CIA) Model as agreed with Welsh Government given this project has limited options

The key assumptions underlying the development of the revenue costs are:

- Phase 1 will be revenue neutral as it is the refurbishment of existing areas and requires no additional revenue from a clinical service perspective. The Health Board are confident that they can continue to meet demand (based on the modelling) for both burns and GICU patients with some flexible use of existing space. The ability to deliver the commissioned service remains intact based on known current demand.
- Staffing levels will need to be maintained to provide safe care in this environment, due to locational factors there is risk of some additional unplanned costs being incurred which have been flagged for internal management.
- Future phases will have additional revenue cost implications above baseline funding, which will be considered in detail as part of the individual business case for each future phase of works. In the future cases, funding options will be explored for these changes. However, progression to future phases in particular the decant of Ward J to allow the original GICU bed numbers to be reinstated is essential to allow continuation of a safe and sustainable service.
- To fully utilise the expanded footprint of Ward J, it will also result in an increase of four GICU beds. Indicative additional revenue costs to expand ICU beds into the Ward J footprint and safely staff a split level demountable for Ward J to decant into is c£4.3m at current prices. A simple split of these additional costs is shown in the below table 3, costs are shown as those that are directly linked to increasing the GICU bed numbers by four (expanded bed base), and those that are due to the change in layout/ footprint alongside the use of the demountable facility.

Category	Existing Base £'000	Bed	Expanded Base £'000	Bed	Total £'000
ICU Clinical Staff (medical, nursing, AHP)	162		2,573		2,735
Ward Staffing (J move to 2 x 15 bed space)	574		0		574

Category	Existing Base £'000	Bed	Expanded Base £'000	Bed	Total £'000
Non-Clinical Support Staff	174		120		294
Non-Pay (including Utilities & Diagnostics)	156		570		726
<b>Total</b>	<b>£1,066</b>		<b>£3,263</b>		<b>£4,329</b>

- This does not include any consideration of staffing the additional ward footprint that will be available at the end of all phases (Anglesey/ Tempest) or any changes in theatre utilisation as a full work up of how that space will be used is yet to be complete. The indicative costs for this are likely to be in the region of £2.5m but could vary significantly depending on use/ staff configuration. Full costing will be undertaken for future phase business cases. This will be included within the Health Board's financial plan at the appropriate point in time and could allow for a transitional approach to opening the additional beds based upon the ability to recruit to the additional team.

Table 4 shows the impact on beds from the ward reconfiguration. It can be seen that in the future phases there will be an additional 4 ICU beds which are currently not commissioned.

Areas		Ward Configuration - Beds		
		Current	After Phase 1	Future Phase
Critical Care/Burns	GICU (North)	6	2	2
	GICU (Other)	22	22	22
	GICU (J)	0	0	8
	GICU Theatre Recovery	0	4**	0
	Burns (Tempest)	3*	0	0
	Burns (ICU North)	0	3	3
<b>Total ICU/Burns Beds Available</b>		<b>31</b>	<b>31</b>	<b>35</b>
Respiratory	Respiratory – Ward J	30	30	0
	Respiratory – Modular	0	0	30

\* The Burns Service is also commissioned to provide a L2 (HDU) bed. It is intended that the funding associated with this be utilised to provide appropriate staffing levels to provide enhanced burns care within the Burns Ward. This will enable the service to facilitate an earlier and smoother stepdown of burns patients from ICU to the Ward and will also prevent some burns patients ever needing to be admitted to ICU, for example those patients who do not need organ support but need enhanced care that can be provided through additional nursing ratios.

\*\* These beds will be temporarily in theatre recovery and are not suitable for high acuity patients or long term use.

The BJC Executive Summary (attached as **Appendix D**), BJC (attached as **Appendix D1**) and appendices (attached as **Appendix D2**) was endorsed at the Critical Care Expansion and Burns Relocation Project Board on 14<sup>th</sup> December 2022, and then the Health Board's Management Board on 18<sup>th</sup> January 2023.

## 6. RECOMMENDATIONS

Health Board is asked to:

- **NOTE** the work which has been undertaken to develop the expansion of Critical Care Services and co-location of Burns cubicles in GICU.

- **NOTE** the risk register for the project and note the mitigating actions being taken.
- **NOTE** the BJC has been endorsed by the Critical Care Expansion and Burns Relocation Project Board on 14<sup>th</sup> December 2022 and the Health Board's Management Board on 18<sup>th</sup> January 2023.
- **AGREE** the strategic and capital investment of £7.3m to be funded by Welsh Government.
- **APPROVE** the BJC and subsequent submission to Welsh Government for consideration against the All-Wales Capital Programme.

<b>Governance and Assurance</b>		
<b>Link to Enabling Objectives</b> (Please choose)	<b>Supporting better health and wellbeing by actively promoting and empowering people to live well in resilient communities</b>	
	Partnerships for Improving Health and Wellbeing	<input checked="" type="checkbox"/>
	Co-Production and Health Literacy	<input type="checkbox"/>
	Digitally Enabled Health and Wellbeing	<input type="checkbox"/>
	<b>Deliver better care through excellent health and care services achieving the outcomes that matter most to people</b>	
	Best Value Outcomes and High-Quality Care	<input checked="" type="checkbox"/>
	Partnerships for Care	<input checked="" type="checkbox"/>
	Excellent Staff	<input checked="" type="checkbox"/>
	Digitally Enabled Care	<input checked="" type="checkbox"/>
	Outstanding Research, Innovation, Education and Learning	<input type="checkbox"/>
<b>Health and Care Standards</b>		
(Please choose)	Staying Healthy	<input type="checkbox"/>
	Safe Care	<input checked="" type="checkbox"/>
	Effective Care	<input checked="" type="checkbox"/>
	Dignified Care	<input checked="" type="checkbox"/>
	Timely Care	<input checked="" type="checkbox"/>
	Individual Care	<input checked="" type="checkbox"/>
	Staff and Resources	<input checked="" type="checkbox"/>
<b>Quality, Safety and Patient Experience</b>		
<p>The Expansion of Critical Care Services and co-location of Burns cubicles in General Intensive Care Unit (GICU) will enable Morriston Hospital to continue to provide excellent specialist burns care, improve the sustainability of Morriston Hospital's Burns Critical care services, to provide a fit for purpose and unique physical Burns and GICU infrastructure, improve the efficiency and effectiveness of Morriston Hospital's specialised burn care and improve the economy of Morriston Hospital's specialised burn care. - is this relating to phase 1 as this also is increasing capacity deficit in ICU provision for the population served by the Health Board</p>		
<b>Financial Implications</b>		
Any business cases associated with this service change will be considered through the SBUHB IMTP / Annual Planning / Business Case and WHSSC processes as appropriate.		
<b>Legal Implications (including equality and diversity assessment)</b>		
N/A		
<b>Staffing Implications</b>		
There are no additional staffing implications anticipated with Phase 1 of the programme. There will be a requirement for additional staff with the increased capacity of the ICU – this includes medical, nursing, therapy and ancillary staff.		
<b>Long Term Implications (including the impact of the Well-being of Future Generations (Wales) Act 2015)</b>		
N/A		
<b>Report History</b>	Previous updates have been provided to the board.	
<b>Appendices</b>	Appendix A	Critical Care Expansion and Burns Relocation Project Risk Register
	Appendix B	Theatre 7 design (S2P15)

	Appendix C	ICU North (S2P18)
	Appendix D	Executive Summary, Business Justification Case
	Appendix D1	Business Justification Case
	Appendix D2	Business Justification Case Appendices



**[Project]**

## Lessons Log

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#### Asbestos Warning

Potential asbestos contamination in external walls, including sub floors and structural soffits. Full extent of asbestos contamination to be confirmed prior to start on site. Necessary precautions to be taken to ensure qualified professionals are working with any asbestos material.



Unaffected Area during this Phase

#### General Notes:

- All information taken from record drawings and are subject to site survey. For information only, not dimensionally accurate. All dimensions TBC on site.
- Above ground drainage TBC by MEP Engineer.
- All information subject to client and end user sign-off.
- Fire integrity and insulation TBC on site.
- All fire sealing & protection to be done by 3rd party accreditation and tagged on site.
- As soon as ceilings are removed, walls are to be reviewed/checked on if they appropriate fire sealing has been done.
- Power and data as per M&E drawings.
- Pendock pipe boxing to be used to cover all types of pipework and electrical wiring.

S2	P18	07/10/22	Minor amendment to Female Change shower area.
S2	P14	22/09/22	Issued for Information/Approval.
S2	P12	30/08/22	Clog Wash and Clean Clog change facilities indicated. Equipment layout shown indicatively. Circulation double doors between existing and new space omitted.
S2	P10	15/08/22	(Theatre 7) extension remit amended. Call outs and section lines indicated. (ITU North) Additional screen added, Pharmacy and Dirty Utility remit included.
S2	P09	03/08/22	ITU North, Theatre 7 and Revit model issue.
STATUS	REV	DATE	DESCRIPTION

CLIENT

SBUHB, Morriston Hospital

REVISED BY

SM

CHECKED BY

AP

ORIGINATOR NO

155247

CONSULTANT

**STRIDE TREGLOWN**

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PROJECT

Ward J, Theatre 7, CCU North  
Morriston Hospital, Swansea

DRAWING TITLE

Theatre 7 - GA Plan

SUITABILITY STATUS

**S2 : Suitable for information**

SCALE

1 : 100@A3

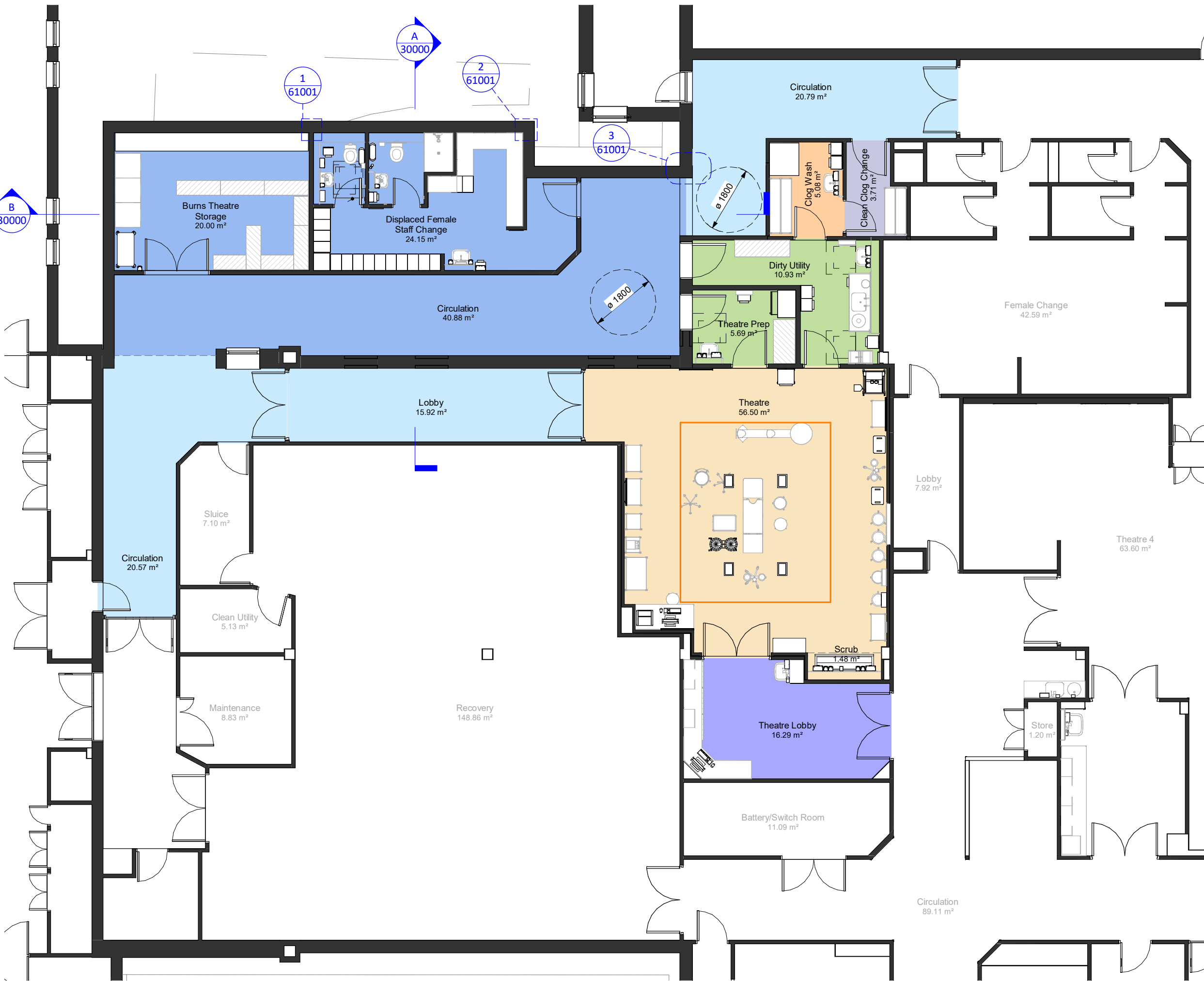
DRAWING USAGE:

PROJECT - ORIGINATOR - VOLUME - LEVEL - TYPE - ROLE - CLASS - NUMBER

155247-STL-XX-01-DR-A-ZZZZ-10001

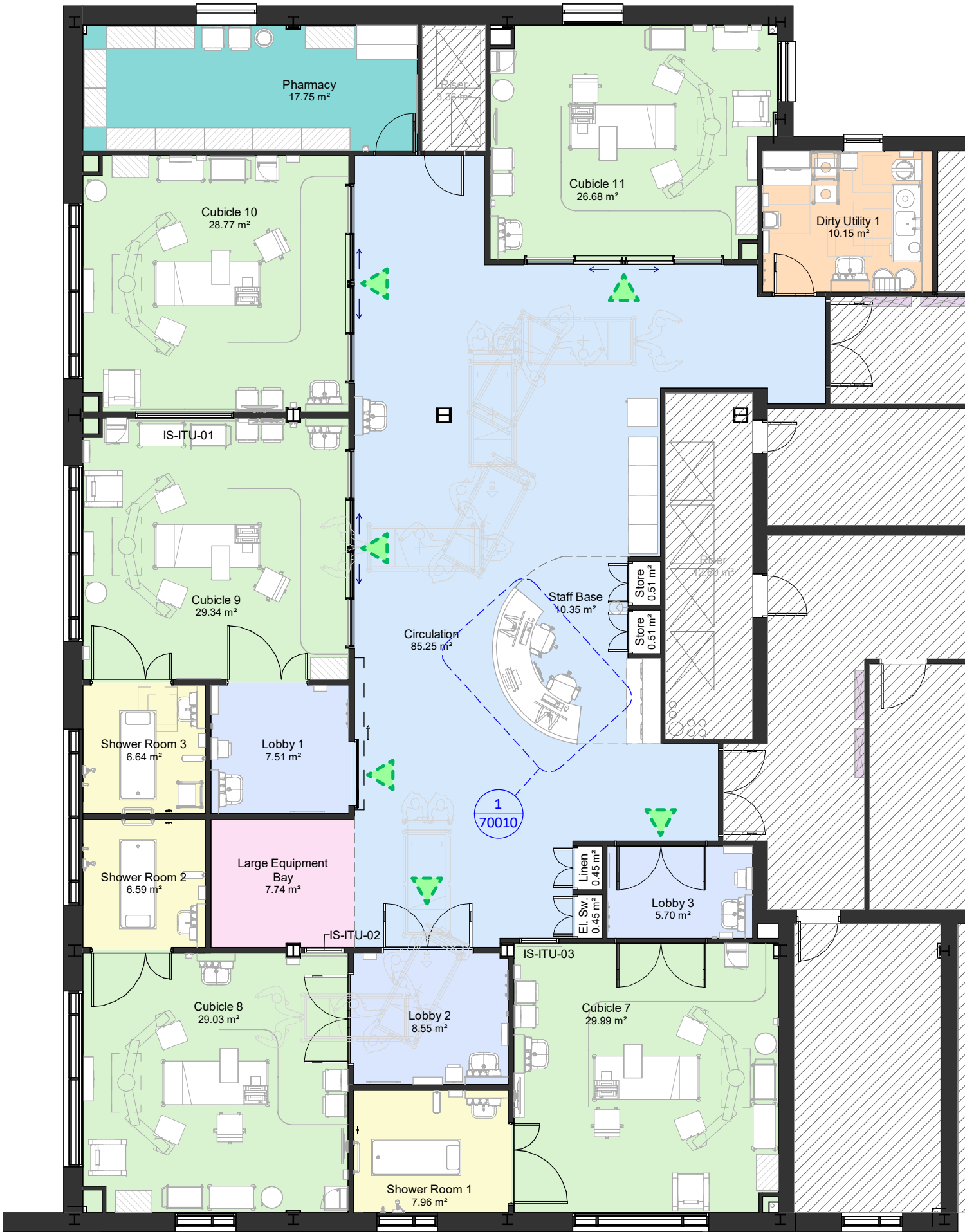
STATUS\_REVISION

S2\_P18



Theatre 7 - GA Plan

1 : 100



ITU North - GA Plan  
1 : 100

Responsibility is not accepted for errors made by others in scaling from this drawing.  
All construction information should be taken from figured dimensions only.



**Asbestos Warning**

Potential asbestos contamination in external walls, including sub floors and structural soffits. Full extent of asbestos contamination to be confirmed prior to start on site. Necessary precautions to be taken to ensure qualified professionals are working with any asbestos material.



Unaffected Area during this Phase

**General Notes:**

- All information taken from record drawings and are subject to site survey. For information only, not dimensionally accurate. All dimensions TBC on site.
- Above ground drainage TBC by MEP Engineer.
- All information subject to client and end user sign-off.
- Fire integrity and insulation TBC on site.
- All fire sealing & protection to be done by 3rd party accreditation and tagged on site.
- As soon as ceilings are removed, walls are to be reviewed/checked on if they appropriate fire sealing has been done.
- Power and data as per M&E drawings.
- Pendock pipe boxing to be used to cover all types of pipework and electrical wiring.

S2	P15	26/09/22	Issued for Information/Approval.
S2	P12	30/08/22	Omnicell unit re-introduced. Storage cupboards to back of nurses station omitted. WHB location to Cubicles 7 and 8 amended. WHBN shown to Circulation. Equipment layout to Dirty Utility indicated.
S2	P10	15/08/22	(Theatre 7) extension remit amended. Call outs and section lines indicated. (ITU North) Additional screen added, Pharmacy and Dirty Utility remit included.
S2	P09	03/08/22	ITU North, Theatre 7 and Revit model issue.
STATUS	REV	DATE	DESCRIPTION

CLIENT	REVISED BY
SBUHB, Morriston Hospital	SM
	CHECKED BY
	AP
	ORIGINATOR NO
	155247

CONSULTANT  
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PROJECT

Ward J, Theatre 7, CCU North  
Morriston Hospital, Swansea

DRAWING TITLE  
ITU North - GA Plan

SUITABILITY STATUS  
**S2 : Suitable for information** SCALE  
1 : 100@A3

DRAWING USAGE:	
PROJECT - ORIGINATOR - VOLUME - LEVEL - TYPE - ROLE - CLASS - NUMBER	STATUS_REVISION
155247-STL-XX-01-DR-A-ZZZZ-10000	S2_P15

# **Business Justification Case (BJC): Volume 1 – Executive Summary**

## **Morrison Hospital Burns / ICU**



VFinal

## Document control sheet

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Contact details			
Main point of contact	Telephone number	Email address	Postal address
Heather Edwards	01792 286119	<a href="mailto:heather.edwards2@wales.nhs.uk">heather.edwards2@wales.nhs.uk</a>	

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## 1 Introduction

### 1.1 Overview and Introduction

This Business Justification Case (BJC) seeks support from Welsh Government (WGov) of £7.346m (including recoverable VAT and excluding Optimism Bias) for strategic capital investment to enable Swansea Bay University Health Board to implement the first phase of the burns/critical care expansion strategy which supports the development of a sustainable model for delivering the Burns Service for Wales and South West England.

A multi-stakeholder clinical group was established during 2021/22 to consider the options for a sustainable model and the outcome of this was to create a co-located burns/critical care service in a phased approach in recognition of the urgency required of the programme.

Phase 1 will:

- Move the current isolated Burns ICU service into Morriston's main Intensive Care Unit (ICU), thereby improving the sustainability of the service from a workforce perspective
- Move the current isolated burns theatre into the main theatre suite to ensure standards are met with regards to proximity of the burns theatre to the burns ICU area
- Reprovide the reduced GICU capacity to theatre recovery area on a temporary basis

Future phases are referenced within the document as key interdependencies to phase 1. These phases re-provide the lost ICU capacity resulting from the co-location of burns through adapting an existing medical ward which will be reprovided. Further work within the vacated burns unit is also required to support the creation of a dedicated burns ward with co-located theatres for patients not requiring ICU admission.

This document reflects the outcome of the scoping meeting held with WG in May 2022 and letter dated 18th May 2022 and, as agreed with WGov, it is a single stage business case regarding the urgent phase 1 works as described above, and sufficient detail around the preferred future phases, including the business needs, describing the scope of works and indicative costs.

## 2 The Strategic Case

Morriston Hospital is a regional and specialist centre for South West Wales, providing complex and highly specialist care for the regional population. Its General ICU provides 'DGH' critical care services to its local population, in addition to supporting the regional and specialised services for which Morriston is commissioned.

Wales has a very low ICU bed provision compared to the UK as a whole. Service changes or the increasing number of patients within a clinical pathway, have not been linked historically to a corresponding increase in ICU capacity.

Morriston Hospital is the Welsh Centre for Burns and Plastic Surgery and provides specialist care for patients of all ages from both Wales and South West England. It covers a population of 10 million from Aberystwyth in the far west of Wales to Oxford and Plymouth in the south of England. It treats around 1,000 burns patients a year.

Morriston's Burns Critical Care Unit (Tempest Ward) provides a comprehensive multidisciplinary team (MDT) of Consultant Burns and Plastic Surgeons, Specialist Nurses, Therapists, Consultant Clinical Psychologist and Consultant Anaesthetists who support the service.

With the development of Intensive Care Medicine as an increasingly specialised area coupled with changes in Anaesthetic training, the ability for the current Burns Anaesthetic team to maintain cover for the Burns ICU and to recruit to the service have been significantly challenged over a number of years.

## **Part A - The Strategic Context**

Swansea Bay UHB covers a population of around 390,000 in the Neath Port Talbot and Swansea areas and we have a budget of around £1bn. The health board employs approximately 12,500 staff.

It has three major hospitals providing a range of services: Morriston and Singleton in Swansea, and Neath Port Talbot Hospital in Baglan, Port Talbot.

The Welsh Centre for Burns and Plastic Surgery at Morriston Hospital covers not only south and mid Wales, but the South West of England for the most serious level burns ('Centre level'). Morriston also delivers one of two cardiac surgery services in Wales and has recently secure major trauma centre status.

Other specialist services provided by the Health Board include cleft lip and palate, renal, fertility and bariatric (obesity).

The Health Board is part of 'A Regional Collaboration for Health' (ARCH), which is a partnership with Hywel Dda University Health Board (HDUHB) and Swansea University. ARCH is a unique collaboration project aimed at improving the health, wealth and wellbeing of South West Wales.

### **2.1 Intensive Care Service**

Morriston General ICU currently has 28 beds (14 Level 3 and 14 Level 2). All patients requiring critical care are admitted onto the Unit, with the exception of peri-operative cardio-thoracic surgical cases. The service is made up of 5 separate pods with 5 or 6 beds in each pod. The Morriston General ICU has 2 cubicles as part of its 28 beds, which equates to 7%.

### **2.2 Burns Service**

The Swansea Bay University Health Board Burns Service is the Adult Burns Centre provider for the South West Burns Network and the designated Paediatric Burn Unit for South Wales. The service is compliant with UK Burn Care Standards and sees over 1000 cases per annum with around 10 to 15 of these being Centre level cases which are the most severe burn cases.

### **2.3 Business Strategies**

This project has considered relevant national, regional and local strategies and will support the delivery of these by:

- Supporting the strategic direction for critical care services in Wales, and the recommendations of the nationally directed programme for critical care by improving the infrastructure through creating an additional 6 cubicle spaces with 3 being suitable for acute major burns patients
- Supporting Guidelines for the Provision of Intensive Care Services (GPICS) with regard to the need for consultant intensivists to lead the service and make more efficient use of medical/nursing and allied health professional (AHP) workforce by co-locating the services by ensuring maximum flexibility of the pool of staff and ensuring regular exposure to critically ill patients
- Improving compliance with section D of the National Standards for Provision and Outcomes in Adult and Paediatric Burn Case: Facilities, Resources and the Environment. This section describes the facilities, resources and the environment necessary to provide specialised burn care and addresses the following:
  - The type of and availability or access to an appropriately resourced burn bed
  - Access to an appropriately designed and resourced operating theatre and the availability of specialist resources such as skin products, and
  - The provision of telemedicine and rehabilitation services

## 2.4 Emerging estate priorities

The review of the Health Board's Recovery and Sustainability Plan shows that significant investment in key capital schemes is required to ensure that the priorities for the recovery and the clinical service plans (CSPs) can be delivered. This is to reduce the risk of delivering patient care from increasingly old estate and to ensure the future sustainability of our services.

The Wales capital programme requirements for Swansea have been prioritised for a number of reasons including:

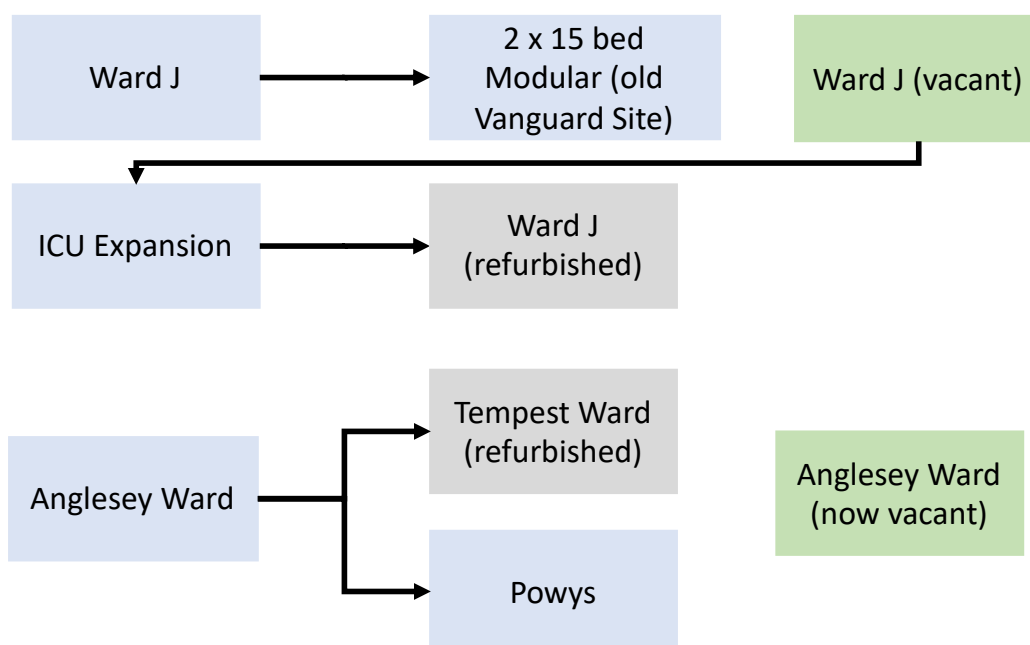
- Significant backlog maintenance requirement
- To address the major risks in the estate, and support reduction in the overall Health Board risk register
- Meet national and local quality and safety priorities
- Support the long-term sustainability of the Health Board from a revenue perspective
- Build capacity for recovery

Based on the principles stated, top 10 local priorities within the Health Board which will require All Wales Capital support have been agreed, with the Refurbishment of Burns / ICU as top priority to meet quality priorities, sustainability and support recovery.

## 2.5 Key Interdependent Projects

The co-location of burns with GICU and creation of a burns theatre within the main complex of the theatre suite represents phase 1 of the programme.

Future phases are essential to re-provide the lost ICU capacity resulting from the co-location of burns (repurposing a respiratory ward (ward J)) and increase the critical care capacity for the health board, in addition to creating a dedicated burns ward with co-located theatres for patients not requiring ICU admission (Patients within Anglesey ward (currently burns and plastics) moving to Tempest (burns) and Powys (plastics) releasing Anglesey to support future decant. A modular unit will be erected on the old Vanguard site to relocate the displaced 30 respiratory beds. These future phases are outlined in the following diagram.



**Executive Summary Figure 1: Future Phases**

## Part B - The Case for Change

The South West Burns Care Operational Delivery Network (ODN) is one of four specialised burn care networks covering England and Wales.

There are five Specialised Burn Services within the network, each of which has a Clinical Service Lead that links to the ODN Management Team.

Designated Remit	Hospital	Trust
South West Paediatric Burns Centre	Bristol Royal Hospital for Children	University Hospitals Bristol NHS Foundation Trust
The Welsh Centre for Burns and Plastic Surgery	Morrison Hospital	Swansea Bay University Health Board
Bristol Adult Burns Unit	Southmead Hospital	North Bristol NHS Trust
Salisbury Burns Unit	Salisbury District Hospital	Salisbury NHS Foundation Trust
Plymouth Burns Facility	Derriford Hospital	University Hospitals Plymouth NHS Trust

**Executive Summary Table 1: South West Burns Care ODN**

The Swansea Bay University Health Board Burns Service is the Adult Burns Centre provider for the South West and Wales Burn Network and the designated Paediatric Burn Unit for South Wales. The service, barring issues with ICU cover, is compliant with UK Burn Care Standards and sees over 1,000 cases per annum with around 10 to 15 of these being centre level cases which are the most severe burn cases.

The Burns Critical Care Unit (Tempest Ward) is located in a purpose-built facility including 2 theatres. The Ward is also co-located next to the adult Burns low dependency ward (Powys ward). The service is commissioned for three level 3 Burns beds and one Level 2 Burns bed. The Unit was opened in 1994 with the transfer of Burns and Plastic Surgery from Chepstow. The requirement in the next few years of a major refurbishment of this infrastructure and facilities needs to be considered in the context of any co-location requirements.

24/7 cover for the Burns Critical Care service is provided by Burns anaesthetists who also support theatre activity both scheduled and emergency for the service.

The sustainability of the service is threatened due to challenges in supporting the anaesthetic burns rota as staff have left the rota through retirements, change in roles and sickness. Despite proactive recruitment attempts, it has proven impossible to recruit to the Burns Anaesthetic-Intensivist rota (driven by changes in training of anaesthetists, increasing specialisation in Intensive Care Medicine and critical illness and throughput lower than required to maintain professional skills and make it an attractive unit to work in), which led to temporary closure of the Burns ICU service for several months earlier in the year for safety concerns. A temporary hybrid support model has been deployed in the short term with an agreement that the longer-term solution needs to come through co-locating the unit into the main ICU.

It is essential that the service is maintained as the centre is the only burns service in Wales and provides a service as part of the South West UK Burns Network, covering a population of 10 million from Aberystwyth in the far west of Wales to Oxford and Plymouth in the South West of England.

The table below shows the activity for the 2016 – 2019 period:

	Number of Admissions	Mean Length of Stay	Bed days
2016	52	9.7	1.4
2017	42	15.8	1.8
2018	56	8.3	1.3
2019	51	14.6	2

**Executive Summary Table 2: Activity – 2016 – 2019 period**

The South West Burn Care Operational Delivery Network commissioned an external Peer Review visit at Swansea Bay UHB on 24th November 2021. The report following the visit noted:



## 2.6 Scope, Objectives and Benefits

A review of options to co-locate Burns ICU within the General ICU and expand critical care facilities and improve patient pathways has been explored with multi-stakeholder involvement. A three-phase plan has been outlined to mitigate recruitment issues in the short to medium/longer term.

With regards to phase 1 of this plan to which this business case relates, there is only one scope that is possible in order to deliver the spending objectives and that is to convert Morriston Hospital's Intensive Care Unit (ICU) North (currently 6 General ICU (GICU)) beds to incorporate 3 Burns beds / cubicles and 2 general beds/cubicles and convert Theatre 7 in Main Theatres to accommodate Burns' theatres space. In order to manage capacity peaks the non-burns cubicles could be used to provide flexibility for lower acuity burns patients during spikes and the burns cubicles could be used for general ICU patients if not required for burns.

The scope of the BJC will provide the burns services with essential short term co-location with Morriston General ICU infrastructure and ICU workforce and improve the burns service's clinical workforce sustainability in the short term (i.e. next 1-3 years).

Spend Objective	Main Benefits
Spend Objective 1: Quality and Safety of Services	Sustainable Burns Intensive Care and Anesthetic workforce
	Co-location with general ICU will maximise staff's critical care experience and reduce redeployment
	Maintain continuity of services and at the same time develop further its reputation as a centre of excellence
	Strategic fit with National, Regional and local planning processes and outputs
Spend Objective 2: Provide a high-quality physical environment	Modernisation of Burns ICU facilities (inclusion of wet rooms for each cubicle, improved ventilation system and improved lighting)
	Improved staff morale and retention
	Remove various short life expectancy and inefficient plant
	Realise revenue benefits of new efficient M&E plant
Spend Objective 3: Access	Ensuring the future sustainability of burns ICU will enable patients to access the service in a safe and timely manner
	Provide suitable services and facilities sized to meet demand to ensure improved and optimised treatment pathways
Spend Objective 4: Effective use of Resources	Utilising existing accommodation as much as possible and ensuring new buildings are created only where absolutely necessary
	Co-location allows more effective service delivery through coordinated services
Spend Objective 5: Sustainability	Staff recruitment and retention will improve as investment in new facilities will help attract and retain high quality professional staff
	Services continue to be provided to meet patients' needs
	Maximise flexibility of facilities through co-location of burns ICU and general ICU and the creation of generic, flexible rooms

**Executive Summary Table 3: Spending Objectives and Main Benefits**

With regards to phase 1 of the project (i.e. this BJC) there is one potential dis-benefit in that it reduces the number of ICU beds in the short term (this will be managed under the Theatre Recovery Plan).

### 3 The Economic Case

#### 3.1 The Long List

A review of the available options for progressing Phase 1 of the three-phase plan with the multi-stakeholders to mitigate recruitment issues has determined there are limited technical solutions available in the short term, which this case supports, therefore a full appraisal has not taken place. **However, a framework options appraisal process has been undertaken for the full scheme (including all phases).**

Critical Success Factors (CSFs) were also identified. These CSFs were used alongside the spending objectives for the project to evaluate the long list of possible options for future phases.

The long list of options for this investment was generated within the following key categories of choice:

- **Potential Service Scope Options** – what is the potential coverage of the service to be delivered (the ‘what’)
- **Potential Technical Solution Options** – the potential technical (i.e. estates) options for delivering the preferred service solution option (the ‘where’)
- **Potential Implementation Options** – the potential timescales options for delivering the preferred service scope, preferred service solution, preferred technical solution options (the ‘when’)
- **Potential Service Delivery Options** – who will deliver the preferred service scope, preferred service solution, preferred technical solution, preferred implementation options (the ‘who’)
- **Potential Finance Options** – the potential funding and affordability options for delivering the preferred service scope, preferred service solution, preferred technical solution, preferred delivery options

The table below provides a summary of the assessment of each of these:

Framework Options	Business As Usual	Do Minimum	Intermediate	Do Maximum
Potential Service Scope Options – as outlined in the strategic case	1.1 - BAU All services remain as existing	1.2 – Burns ICU Services	1.3 – Burns and General ICU Services	1.4 – Burns, General and Cardiac ICU Services
	Discounted	Discounted	Preferred Way Forward	Discounted
Potential Service Solution Options – in relation to the preferred scope	2.1: Business as Usual modular ward	2.2: Existing ward J (Respiratory) to move to new modular ward move to new	2.3: Existing ward J (Respiratory) to move to Ward S and current Ward S patients move to new modular ward	2.4: Existing ward J (Respiratory) to move to Anglesey Ward and current Anglesey Ward patients
	Discounted (retained for comparative purposes)	Preferred Way Forward	Carried Forward	Carried Forward
Potential Service Delivery Options - in relation to preferred scope and solution	3.1 - In-house		3.2 - Outsource	3.3 – Strategic Partnership
	Preferred Way Forward		Discounted	Discounted
Potential Implementation Options – in relation to preferred scope, solution and method of service delivery		4.1 - Big Bang (single phase)		4.2 - Phased
		Discounted		Preferred Way Forward
Potential Funding Options – in relation to preferred scope, solution, method of service delivery and implementation	Public Funding			

**Executive Summary Table 4: Summary of Options Framework**

## 3.2 The Short List

The short list is as follows:

- Option 1: Business as Usual (retained for comparative purposes) (previously option 2.1)
- Option 2: Convert ICU North and Theatre 7, move existing ward J (Respiratory) to move to new modular ward, convert ward J to critical care, refurbish Tempest ward for burns patients (previously option 2.2)
- Option 3: Convert ICU North and Theatre 7, move existing ward J (Respiratory) to move to Ward S (Infectious Diseases) and current Ward S patients move to new modular ward, convert ward J to critical care, refurbish Tempest ward for burns patients (previously option 2.3)
- Option 4: Convert ICU North and Theatre 7, move existing ward J (Respiratory) to move to Anglesey Ward (Burns and Plastics) and current Anglesey Ward patients move to new modular ward, convert ward J to critical care, refurbish Tempest ward for burns patients (previously option 2.4)

## 3.3 Indicative Capital and Revenue Costs of each Short Listed Option

### Capital Costs

The project's cost advisor, AECOM, has prepared fully tendered capital costs for phase 1 (see **Appendix A**) as follows:

	ICU North	Theatre 7	Total
Works Cost	£2,835,426	£2,586,780	£5,422,206
Fees	£573,193	£527,548	£1,100,741
Non-Works Costs	£105,360	£119,160	£224,520
Equipment Costs	£360,060	£235,770	£595,830
Contingency	£193,315	£173,116	£366,431
<b>Total</b>	<b>£4,067,353</b>	<b>£3,642,374</b>	<b>£7,709,727</b>
Less Recoverable VAT	(£190,046)	(£174,151)	(£364,197)
<b>Grand Total</b>	<b>£3,877,307</b>	<b>£3,468,223</b>	<b>£7,345,530</b>

**Executive Summary Table 5: Capital Costs - Phase 1: All Options**

The following table shows the indicative capital costs for each option relating to the future phases:

	Option 2	Option 3	Option 4
Works Cost	£30,837,359	£33,417,359	£33,403,917
Fees	£6,355,734	£6,868,804	£6,866,125
Non-Works Costs	£150,600	£150,600	£150,600
Equipment Costs	£600,000	£600,000	£600,000
Contingency	£1,893,390	£2,047,734	£2,046,930
<b>Total</b>	<b>£39,837,083</b>	<b>£43,084,498</b>	<b>£43,067,572</b>
Less Recoverable VAT	(£2,087,201)	(£2,258,713)	(£2,257,818)
<b>Grand Total</b>	<b>£37,749,882</b>	<b>£40,825,785</b>	<b>£40,809,754</b>

**Executive Summary Table 6: Indicative Capital Costs – Future Phases**

The key assumptions underlying the development of the capital costs are:

- Capital Cost includes works, non-works, abnormal allowances, equipment costs and risk contingency, which is assessed at 5% for ICU North and Theatre 7
- The BIS PUBSEC indices at this stage is 296 for Q4 2022. The Business Case reporting Index will be the standard one for Wales of 0.97
- This BJC for Phase 1 excludes a Comprehensive Investment Appraisal (CIA) Model as agreed with WGov given this project has limited options

## Revenue Costs

Phase 1 will be revenue neutral as it is the refurbishment of existing areas and requires no additional revenue from a clinical service perspective. The Health Board are confident that they can continue to meet demand (based on the modelling) for both Burns and GICU patients with some flexible use of existing space. The ability to deliver the commissioned service remains intact based on known current demand.

Staffing levels will need to be maintained to provide safe care in this environment, due to locational factors there is risk of some additional unplanned costs being incurred which have been flagged for internal management.

Future phases will have additional revenue cost implications above baseline funding, which will be considered in detail as part of the individual business case for each future phase of works. In the future cases funding options will be explored for these changes. However, progression to future phases in particular the decant of ward J to allow the original GICU bed numbers to be reinstated is essential to allow continuation of a safe and sustainable service.

To fully utilise the expanded footprint of ward J will also result in an increase of four GICU beds. Indicative additional revenue costs to expand ICU beds into the Ward J footprint and safely staff a split level demountable for Ward J to decant into is c£4.3m at current prices. A simple split of these additional costs is shown in the below table, costs are shown as those that are directly linked to increasing the GICU bed numbers by four (expanded bed base), and those that are due to the change in layout/ footprint alongside the use of the demountable facility.

Category	Existing Bed Base £'000	Expanded Base £'000	Bed	Total £'000
ICU Clinical Staff (medical, nursing, AHP)	162	2,573		2,735
Ward Staffing (J move to 2 x 15 bed space)	574	0		574
Non Clinical Support Staff	174	120		294
Non Pay (including Utilities & Diagnostics)	156	570		726
<b>Total</b>	<b>£1,066</b>	<b>£3,263</b>		<b>£4,329</b>

**Executive Summary Table 7: Future Phases Indicative Revenue Implications**

This does not include any consideration of staffing the additional ward footprint that will be available at the end of all phases (Anglesey/ Tempest) or any changes in theatre utilisation as a full work up of how that space will be used is yet to be complete. The indicative costs for this are likely to be in the region of £2.5m but could vary significantly depending on use/ staff configuration. Full costing will be undertaken for future phase business cases. This will be included within the Health Board's financial plan at the appropriate point in time and could allow for a transitional approach to opening the additional beds based upon the ability to recruit to the additional team.

### 3.4 The Preferred Option

The preferred option is Option 2.2:

Phase 1:

- Convert ICU North (currently 6 GICU bed) to incorporate 3 burns cubicles plus 2 GICU cubicles
- Convert Theatre 7 to ensure suitability for burns patients

Future Phases:

- The existing ward J (Respiratory) to move to new modular ward
- Convert Ward J to critical care facility, a net increase of 7 beds
- Refurbish Tempest Ward retaining the theatres and converting the remaining space to provide 14 single bedrooms

- Anglesey Ward then moves to Powys Ward which in turn moves to a Refurbished Tempest Ward
- Anglesey Ward is vacant to use for winter pressures and/or as a decant facility

The following table shows the impact on beds from the ward reconfigurations – it can be seen that in the future phase there will be an additional 4 ICU beds which are currently **not commissioned**:

Areas		Ward Configuration - Beds		
		Current	After Phase 1	Future Phase
Critical Care/Burns	GICU (North)	6	2	2
	GICU (Other)	22	22	22
	GICU (J)	0	0	8
	GICU Theatre Recovery	0	4**	0
	Burns (Tempest)	3*	0	0
	Burns (ICU North)	0	3	3
<b>Total ICU/Burns Beds Available</b>		<b>31</b>	<b>31</b>	<b>35</b>
Respiratory	Respiratory – Ward J	30	30	0
	Respiratory – Modular	0	0	30

**Executive Summary Table 8: Impact on Bed Numbers**

\* The Burns Service is also commissioned to provide a L2 (HDU) bed. It is intended that the funding associated with this be utilised to provide appropriate staffing levels to provide enhanced burns care within the Burns Ward. This will enable the service to facilitate an earlier and smoother stepdown of burns patients from ICU to the Ward and will also prevent some burns patients ever needing to be admitted to ICU, for example those patients who do not need organ support but need enhanced care that can be provided through additional nursing ratios.

\*\* These beds will be temporarily in theatre recovery and are not suitable for high acuity patients or long term use.

## 4 The Commercial Case

### 4.1 Required Services

Provision of the following:

- Development of a refurbished and fully compliant Intensive Care Unit (ICU) North facility to accommodate 3 Burns beds / cubicles
- Development of a re-modelled and fully compliant Theatre 7 (in the Main Theatres nucleus) to accommodate Burns' theatres' space
- Enabling works, and
- The technical and clinical commissioning of the refurbished and re-modelled facilities to realise the benefits of Phase.

### 4.2 Key Appointments & Contract Arrangements

The following key appointments will be made via WGov's Building for Wales Framework procurement route to ensure delivery of this project:

- Supply Chain Partner construction services are to be provided by TR Jones & Sons Ltd
- Health Board Project Manager (HBPM) services are to be confirmed
- Health Board Cost Advisor (HBCA) services are to be provided by AECOM
- Architectural services are to be supplied by Stride Treglown.
- Structural Engineering services are to be supplied by PHG Consulting
- Supervisor services are to be provided by the Health Board
- Other technical services are to be being provided by the Health Board

The contract is the NEC Engineering and Construction Contract 4 with main option clause A (fixed cost).

### 4.3 Potential for Risk Management

A risk register has been compiled and costed relative to risks that apply over the whole of the project lifecycle at this stage). The planning contingency has been assessed by an independent cost advisor. The planning contingency includes non-recoverable VAT and excludes OB. This assessment of risk and complies with NHS Wales Shared Services Partnership – Specialist Estates Services (NHSWSSP-SES) guidance at this planning stage.

### 4.4 Indicative Timescales

The indicative milestones are set out below:

Activity	Due Date
Health Board approved BJC	January 2023
WGov approves BJC	April 2023
Mobilise and commence works	May 2023
Completed	January 2024
Commissioning	February 2024
Fully operational	February 2024
Technical Project Evaluation (approx. 3 months post new build handover)	May 2024
Benefits Realisation (12 months post operational)	February 2025

*Executive Summary Table 9: Key Indicative Milestones*

## 5 Funding and Affordability

This section relates to the capital requirements for phase 1 only.

### 5.1 Capital

The fully tendered capital cost assessment were undertaken by AECOM, Cost Advisors. These are as follows, including recoverable VAT £000s and excluding Optimism Bias above baseline:

	ICU North	Theatre 7	Total
Works Cost	£2,835,426	£2,586,780	£5,422,206
Fees	£573,193	£527,548	£1,100,741
Non-Works Costs	£105,360	£119,160	£224,520
Equipment Costs	£360,060	£235,770	£595,830
Contingency	£193,315	£173,116	£366,431
<b>Total</b>	<b>£4,067,353</b>	<b>£3,642,374</b>	<b>£7,709,727</b>
Less Recoverable VAT	(£190,046)	(£174,151)	(£364,197)
<b>Grand Total</b>	<b>£3,877,307</b>	<b>£3,468,223</b>	<b>£7,345,530</b>

*Executive Summary Table 10: Capital Costs*

The key assumptions underlying the development of the capital costs are:

- Capital Cost includes works, non-works, abnormal allowances, equipment costs and risk contingency, which is assessed at 5%.
- Given the volatility of current market conditions, as affected by the Ukraine war, high and rising energy costs and other supply chain issues, and in line with current experience elsewhere within Wales, we allowed for recovery of 'abnormal' inflation over and above levels of inflation known and anticipated.
- The BIS PUBSEC indices at this stage is 296 for Q4 2022. The Business Case reporting Index will be the standard one for Wales of 0.97.
- This BJC excludes a Comprehensive Investment Appraisal (CIA) Model as agreed with WGov given this project has limited options.
- VAT is at 20% except for the professional fee and other vat recoverable elements

000's	Prior Years	2022/23	2023/24	2024/25	Total
Capital Costs	£18	£439	£6,889		£7,346
Capital Funding		£457	£6,889		£7,346

**Executive Summary Table 11: Capital Expenditure £000's (incl of non-recoverable VAT & excl Optimism Bias)**

## 5.2 Revenue Costs

Phase 1 will be revenue neutral as it is the refurbishment of existing areas and requires no additional revenue from a clinical service perspective. The Health Board are confident that they can continue to meet demand (based on the modelling) for both Burns and GICU patients with some flexible use of existing space. The ability to deliver the commissioned service remains intact based on known current demand.

Staffing levels will need to be maintained to provide safe care in this environment, due to locational factors there is risk of some additional unplanned costs being incurred which have been flagged for internal management.

## 5.3 Overall Affordability and Impact on the Balance Sheet

000's	2022/23	2023/24	2024/25	2025/26	2026/27	2028/29
Depreciation	-	-	£197	£197	£197	£197
Impairment (AME) Initial Valuation		£3,425				

**Executive Summary Table 12: Revenue Expenditure above baseline (£000s)**

The Health Board will engage the services of the District Valuer to provide a valuation of the scheme following completion. This scheme would result in an estimated AME Impairment of £3,425k on the initial valuation of the unit and this will need to be taken through the Health Board's SOCNE in 2023/24. The Health Board would require funding from WGov and this will be included in the AME impairment funding submission to WGov in 2023/24.

The Health Board will require additional recurring depreciation of £197k from 2024/25. The project requests capital investment of £7.346m (including VAT and excl Optimism Bias) to be allocated by the WGov. The Health Board requests AME Impairment funding of £3.425m in 2023/24 and funding to support recurrent depreciation costs of £0.197m from 2024/25.

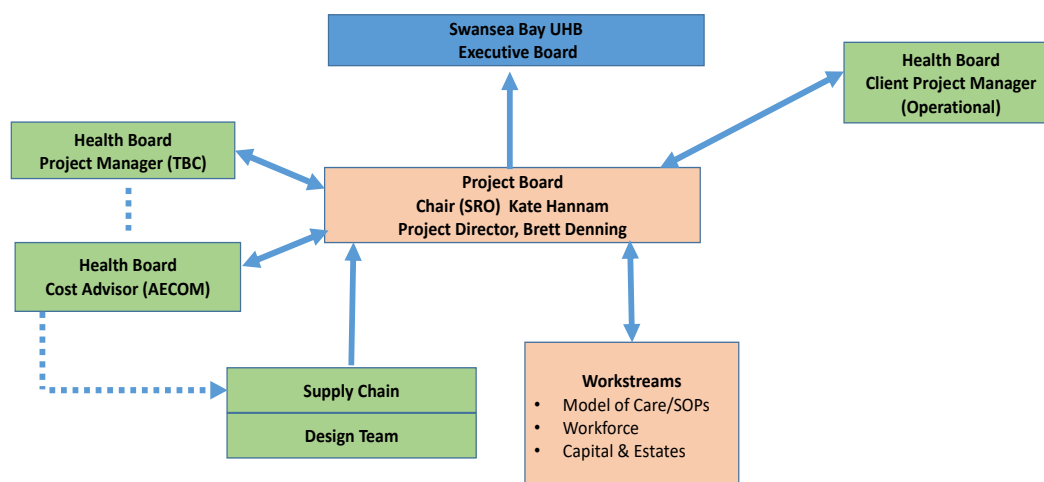
# 6 The Management Case

## 6.1 Project Management Arrangements

The Health Board's experience of developing and delivering complex projects in a Prince2 environment ensures diligent management and thorough clinical involvement throughout all parts of the development:

- The Senior Responsible Owner (SRO) is Ms Kate Hannam, Morriston Service Group Director, Hospital Management Team, SBUHB
- The Project Director is Brett Denning, Associate Service Director, Specialist Surgical Services, SBUHB who has the authority and responsibility to manage delivery of the project on behalf of the key stakeholders. The Project Director reports via the Project Board to the Project SRO
- Clinical Leads are Matthew Challis, Clinical Director General Intensive Care Unit, SBUHB and Jeremy Yarrow, Burns Consultant, SBUHB

A summary project management structure diagram is shown below for the Morriston Hospital site:



**Executive Summary Figure 3: Project Management Structure**

## 6.2 Benefits Realisation Plan (BRP) & Risk Management

Benefits are anticipated when a change is conceived and there are measurable improvements that result from the outcome which is perceived as an advantage by the organisation and/or stakeholders. Benefit management and realisation therefore aims to identify, define, track, realise and optimise benefits within and beyond the programme. A benefits register has been established during the development of this BJC that provides a framework for this aim and is overseen by the Project Board.

The register outlines the key objectives, benefits and measures, which will be used to evaluate the project, it also shows who has the accountability for its realisation. This is in order that a meaningful assessment can be made of the benefits yielded by the project and to benchmark the assessment criteria themselves so that lessons learned can be fed back into future projects. It ensures that the project is designed and managed in the right way to deliver quality and value benefits to patients, staff and local communities. Timescales for the achievement of these benefits have been identified and included in the register.

A risk framework has also been established which outlines the process for managing risk associated with developing this project, including a structure for identifying and mitigating operational and construction related risks. The risk register would use qualitative and quantitative measures to calculate the overall level of risk according to likelihood of any risk occurrence multiplied by the potential impact. The Project Board will formally review the risk register at key stages of the project.

## 6.3 Post Evaluation Arrangements / Lessons Learned

Post Evaluation and lessons learned will be undertaken as appropriate to this investment and in accordance with best practice and NHS guidance.

## 6.4 NHS Wales Gateway Review (Stage 3 – Investment Decision)

A Risk Potential Assessments (RPA) has been carried out for this project.

## 6.5 Recommendation

The BJC presents a compelling case for change and is recommended that the Welsh Government support the investment proposals set out in the business case. It will provide phase 1 of the Burns/ICU overall programme and will provide three Burns beds / cubicles within Morriston Hospital's Intensive Care Unit (ICU) North and a theatre suitable for burns patients within close proximity.

The project will provide the burns services with essential co-location with Morriston Hospital's ICU's Intensivists and wider multidisciplinary team and improve the burns service's clinical workforce sustainability.

## Document Abbreviations

AME	Annually Managed Expenditure
ARCH	A Regional Collaboration for Health
BAU	Business as Usual
BIS PUBSEC	Business Innovation and Skills (Firm Price Index) Tender Price Index of Public Sector Building Non-Housing
BJC	Business Justification Case
BRP	Benefits Realisation Plan
CIA	Comprehensive Investment Appraisal
CSF	Critical Success Factor
CSP	Clinical Service Plan
DGH	District General Hospital
HBCA	Health Board Cost Adviser
HBPM	Health Board Project Manager
HUHB	Hywel Dda University Health Board
ICM	Intensive Care Medicine
ICU	Intensive Care Unit

M&E	Mechanical & Electrical
MDT	Multi-Disciplinary Team
NEC	New Engineering Contract
NHS	National Health Service
NWSSP- SES	NHS Wales Shared Services Partnership – Specialist Estates Services
ODN	Operational Delivery Network
RPA	Risk Potential Assessment
SBUHB	Swansea Bay University Health Board
SRO	Senior Responsible Owner
UHB	University Health Board
VAT	Value Added Tax
WGov	Welsh Government