

## BUSINESS CASE FOR ADDITIONAL MSK TRAUMA LISTS AND ORTHOGERIATRICIANS

MSK & Medicine Centres

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### TITLE OF PAPER:

**Business Case for Additional Trauma Lists and Orthogeriatricians**

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## OUTLINE OF THE CASE FOR CHANGE

### INTRODUCTION

This business case has been developed to expand the current provision of Orthopaedic Trauma Services on both Hospital sites in the Trust. It is required to support and sustain the high quality provision of trauma services within the county and surrounding catchment areas. It will also support fully achieving the National Best Practice Tariff (BPT) for Hip Fragility Fractures via an integrated service model in collaboration with the Care of the Elderly Team.

### Background

SaTH has to date never attracted the additional BPT payment for Hip Fractures (equating to £629k lost revenue per annum).

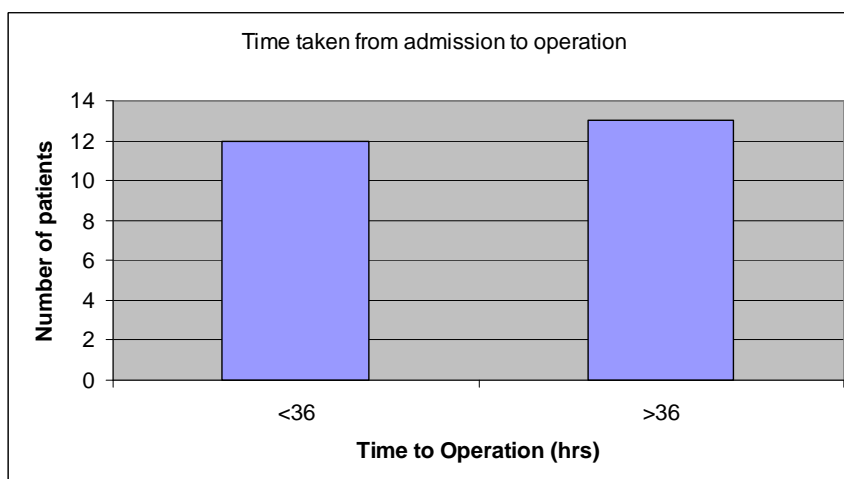
The key inhibitory factors for achieving full BPT for the last 3 years have been:

- Lack of funded trauma operating lists pushing the Trust outside of NICE Guidance with respect to operating within 48 hours of admission.
- Lack of Orthogeriatrician input to effectively manage co-morbidities and quickly and safely optimise patients for theatre
- Lack of Trauma Nurse Specialist input to effectively case manage patients through the care episode and optimise compliance with the Neck of Femur Care Pathway.

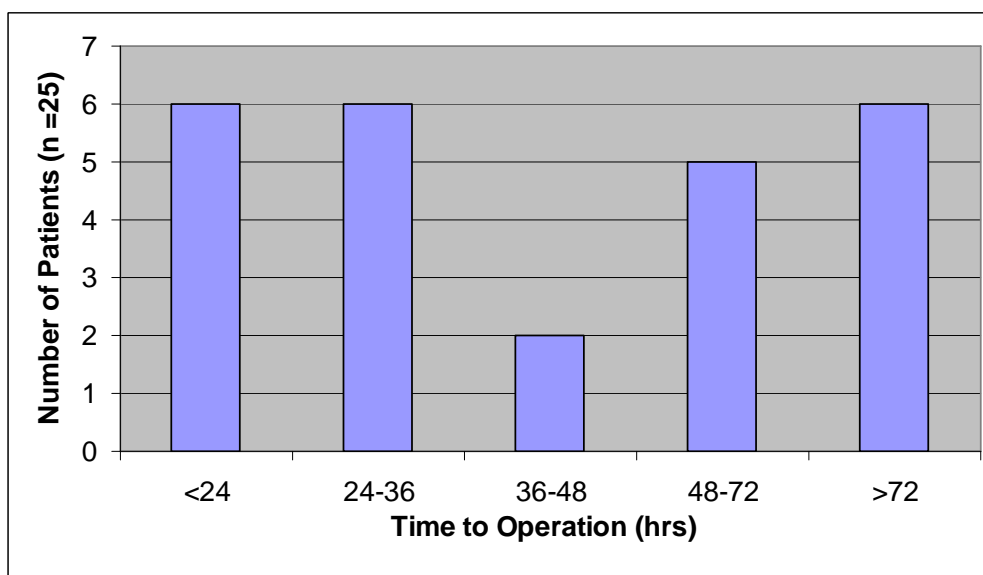
Current Department of Health Guidance states that “For patients with a fragility hip fracture, care needs to be quickly and carefully organised to ensure the most positive outcomes are achieved. Six clinical characteristics of best practice reported through the National Hip Fracture Database have been identified. The BPT consists of a base tariff, with an additional payment if these characteristics of best practice have been met.”

The Additional BPT for meeting all 7 criteria has increased from £890 per patient to £1335 with effect from 1<sup>st</sup> April 2012, thus making the timing of increasing service provision to fully attract this tariff optimal. The costs of increased provision are more than offset by the increase in tariff (as detailed in Appendix A), with this business case showing a 6.4% contribution.

An audit of cases in the MSK Centre at PRH in May 2011 showed:



Time taken from admission to surgery was as follows:



In terms of comparing the performance at PRH to the regional/national picture:

Bluebook Times	Local	SHA	National
Last 12 months			

Avg Time to ward (hrs)	4.10	9.16	9.57
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Avg Time to Theatre (hrs)	45.37	36.61	36.14
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Avg length of stay (days)	20.91	22.16	20.38
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It can be seen that the time from admission to theatre is significantly higher than both the rest of the Strategic Health Authority and the national figures.

A repeat audit in October 2011 showed a worsening situation in terms of patients not operated on within National Guidelines - 65% in the October audit compared to 52% in the May 2011 audit NOT meeting guidelines.

The October audit also showed that the reasons why patients were cancelled for surgery differed from the previous May audit in that more patients were documented as cancelled due to being unfit for surgery. It showed that patients with NOF had been listed as first on the list more often than the previous audit however despite this, the average time to theatre was worse.

The audit concluded that the MSK Centre and Trust needed to consider steps to better optimise patients for surgery and that routine OrthoGeriatrician assessment was needed, along with the addition of more Trauma theatre lists. These conclusions were endorsed by the MSK Clinical Governance Committee and a decision was made to progress the case jointly with the Medicine Centre in order to promote the case for appointment of a Consultant Orthogeriatrician.

There are also additional benefits arising from approval of this business case:

- Optimised enablement of MSK trauma rehabilitation in patient pathways and services, which supports RSH being granted Regional Trauma Unit (TU) status in 2012 with regard to Emergency Services. This is at no additional cost which is important given that no additional resources were funded for TU status.
- Improved co-morbidity management and case management which will contribute to a reduced > 14 day LOS for patients, especially where conservatively managed. The provision of enhanced case management by a Trauma Nurse Specialist will optimise complex discharge assessment, planning and management.

NICE Guidance (124, June 2011) clearly states that early and appropriate surgery for hip fractures is the most effective form of pain relief, potentially quickening the rehabilitation and reducing complications.

### Expected demand

The numbers of patients admitted with fractured neck of femur is consistent. Numerically this is detailed in Appendix B (average 471 per annum).

The regional population continues to age with increasing levels of Dementia-associated illnesses. This will in turn contribute to sustaining levels of falls and hip fracture.

### Summary

The Musculo-Skeletal Centre at SaTH has been noted as an outlier nationally in 2011 in terms of compliance with NICE Guidance around Hip Fragility Fractures. The Orthopaedic Trauma service now requires urgent expansion to operate efficiently and effectively, and enable the Trust to meet National Guidance and avoid associated adverse publicity. The Care of the Elderly Team has for some time provided a partial outreach service for orthogeriatric cases on the RSH site – this has been achieved with sessional commitment from one of the COE consultant team who has expertise and interest in orthogeriatrics and has a 4 PA contract with Robert Jones and Agnes Hunt. This service has not provided daily input however and without the specialist nurse support the service has not come close to meeting the criteria for best practice tariff. This has however been better than the provision on the PRH site where no such, even partial service has been provided due to lack of capacity and skill mix.

Provision of a full service as described on the PRH site will be achieved by appointment of the consultant orthogeriatrician – the post will be funded by tariff increase from within the MSK Centre but the post holder will function and operate within the team of Care of the Elderly

Physicians with a job plan that provides designated sessional commitment and close working alongside the Orthopaedic team. Full service provision will be achieved on the RSH site by radical job planning adjustments such that a daily sessional commitment of orthogeriatrician time will be provided for outreach. This sits well with broader COE plans in progress for the Medicine Centre which include backfill of a funded consultant post which will provide additional capacity for this and for the Frailty Pathway which aims to support Frail Elders admitted to SaTH to achieve quality experience with reduced length of stay and in some cases admission avoidance. These key initiatives will be provided to better manage the significant cohort of elderly frail patients of which the fractured NOFs form part – the natural effect will be an enhanced quality experience for patients and will deliver a shorter length of stay with targeted quality support at the right time.

- The current service is not sustainable without additional investment.
- The service has seen a £629k loss year on year in terms of failing to attract full National BPT.
- To fully achieve BPT and deliver a safe and nationally-compliant service the following areas require additional investment: Orthogeriatrician Consultant, Trauma Nurse Specialists (opportunities exist to internally develop 2 existing B6 nurses, one for each site), Theatre sessions, and therapies (physio/OT).

However discussions with therapies have indicated that they already provide a very good quality service for elderly trauma patients – what will be important for the therapies team, rather than specific investment in additional posts to enable this case, is Trust support to recruit to their existing vacancies and enabling them, as per their own Centre plan to move to 7 day working.

The additional resources identified as being required within this business case are fundamental to delivering safe and effective patient pathways for patients admitted with Fractured Neck of Femur. They will enable better forward planning and more effective use of available theatre capacity. There will be less reliance on surge methodology and service delivery that then impinge on elective surgical activity.

#### OPTIONS

The following options have been identified for consideration:

1.	Do Nothing
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2.	Invest as follows
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<u>Grade</u>	<u>WTE</u>
Consultant OrthoGeriatrician	1.00
Advanced nurse practitioner band 7 (upgrade from B6)	2.00
Administrator (NHFD) band 4	0.5
<u>Theatre sessions</u>	
Saturday session RSH	1
Sunday Session PRH	1
Extra hour evening PRH working day	1

**The costs of the above are offset by full achievement of BPT, leaving a margin of 29.6%, as detailed in supporting financials.**

#### KEY RISKS

- Conservative medical management of hip fractures where patients are deemed unfit for surgery, although the above infrastructure will help to clinically optimise more patients for surgery and those patients not fit for surgery will be optimally supported via the Frailty Pathway Model.
- 7 day working is not introduced in support services eg radiology, theatres, therapies – unlikely as work already underway and approval of this business case enables additional required resources to be deployed to meet service need.

#### SUMMARY

The MSK centre is requesting support for option 2.

#### **RECOMENDATIONS TO TRUST BOARD**

The Trust Board is therefore asked to **APPROVE** the business case

## Appendix A – Supporting financial analysis

	<b>BUSINESS CASE TOTALS</b>	
	<b>wte</b>	<b>£</b>
Income (BPT Premium Payment)	0.00	597,346
<b>Total Income</b>	<b>0.00</b>	<b>597,346</b>
Consultant OrthoGeriatricians	1.00	(114,825)
Advanced Trauma nurse practitioner	0.00	(15,039)
Administrator (NHFD)	0.50	(12,873)
<b>Total Direct Pay</b>	<b>1.50</b>	<b>(142,737)</b>
<b>Support costs</b>		
Theatre leads team/scrub	0.00	(37,019)
Theatre second scrub	0.00	(29,911)
Theatre anaesthetics	0.00	(29,911)
Theatre recovery	0.00	(29,911)
Theatre circulator	0.00	(21,668)
Theatre First Assistant	0.00	(37,019)
Anaesthetist	0.00	(53,275)
Anaesthetics Admin secretary	0.00	(4,248)
<b>Sub Total Theatres</b>	<b>0.00</b>	<b>(242,962)</b>
Consumables and theatre equipment	0.00	(13,600)
<b>Total non pay support costs</b>	<b>0.00</b>	<b>(13,600)</b>
<b>Total support costs</b>	<b>0.00</b>	<b>(256,562)</b>
<b>Total contribution/(cost) to Trust</b>	<b>1.50</b>	<b>198,047</b>

### Notes:

Advanced Trauma Nurse Practitioner posts assume development of existing internal staff from Orthopaedic Ward(s) with no backfill requirement at Ward level.

Radiology capacity and support assumed to be delivered from MSK Centre reducing current demand on Radiology thus releasing capacity to absorb this work

Therapies support assumed to be delivered from development of 7 day working within Therapies thus creating capacity, management assumption is that development of 7 day working will be within existing resources and consequently no cost growth for this service

	<b>Summary £000</b>
Income (BPT Premium Payment)	628.8
Income Risk	(31.5)
<b>Total Income</b>	<b>597.3</b>
Consultant OrthoGeriatricians	(114.8)
Advanced Trauma nurse practitioner	(15.0)
Administrator (NHFD)	(12.9)
<b>Total Direct Pay</b>	<b>(142.7)</b>
<b>Support costs</b>	
Theatres:	
PRH Sun : 1 session	(49.4)
PRH Sun : 1 session : Anaesthetist	(10.5)
PRH BH : 2 sessions	(15.2)
PRH BH : 2 sessions : Anaesthetist	(3.2)
PRH W'day Extended Hours	(65.9)
PRH W'day Extended Hours : Anaesthetist	(25.6)
<b>PRH Sub-Total</b>	<b>(169.8)</b>
RSH Sat : 1 session	(40.0)
RSH Sat : 1 session : Anaesthetist	(10.5)
RSH BH : 2 sessions	(15.2)
RSH BH : 2 sessions : Anaesthetist	(3.2)
<b>RSH Sub-Total</b>	<b>(68.9)</b>
Theatre Admin Support	(4.2)
<b>Sub Total Theatres</b>	<b>(242.9)</b>
Consumables and theatre equipment	(13.6)
<b>Total non pay support costs</b>	<b>(13.6)</b>
<b>Total support costs</b>	<b>(256.5)</b>
<b>Total contribution/(cost) to Trust</b>	<b>198.1</b>

SLR Summary	T&O 11/12 £000s	Pain Mgt 11/12 £000s	Rheum 11/12 £000s	Centre 11/12 £000s	T&O BPT BC £000s	T&O Post BPT BC £000s	Pain Mgt Post BPT BC £000s	Rheum Post BPT BC £000s	Centre Post BPT BC £000s
Income	28,648	1,432	217	30,297	597	29,245	1,432	217	30,894
Direct Pay	(10,958)	(227)	(71)	(11,256)	(143)	(11,101)	(227)	(71)	(11,399)
Direct Non Pay	(1,917)	(32)	(20)	(1,969)	0	(1,917)	(32)	(20)	(1,969)
<b>Total Direct Costs</b>	<b>(12,875)</b>	<b>(259)</b>	<b>(91)</b>	<b>(13,225)</b>	<b>(143)</b>	<b>(13,018)</b>	<b>(259)</b>	<b>(91)</b>	<b>(13,368)</b>
Indirect Costs	(11,119)	(558)	(74)	(11,751)	(257)	(11,376)	(558)	(74)	(12,008)
<b>Total Direct &amp; Indirect Costs</b>	<b>(23,994)</b>	<b>(817)</b>	<b>(165)</b>	<b>(24,976)</b>	<b>(400)</b>	<b>(24,394)</b>	<b>(817)</b>	<b>(165)</b>	<b>(25,376)</b>
<b>Contribution</b>	<b>4,654</b>	<b>615</b>	<b>52</b>	<b>5,321</b>	<b>197</b>	<b>4,851</b>	<b>615</b>	<b>52</b>	<b>5,518</b>
<b>Contribution %</b>	<b>16.2%</b>	<b>42.9%</b>	<b>24.0%</b>	<b>17.6%</b>	<b>33.0%</b>	<b>16.6%</b>	<b>42.9%</b>	<b>24.0%</b>	<b>17.9%</b>
Overheads & Finance Costs	(5,478)	(407)	(47)	(5,932)	(20)	(5,498)	(407)	(47)	(5,952)
<b>Total Costs</b>	<b>(29,472)</b>	<b>(1,224)</b>	<b>(212)</b>	<b>(30,908)</b>	<b>(420)</b>	<b>(29,892)</b>	<b>(1,224)</b>	<b>(212)</b>	<b>(31,328)</b>
<b>Profit/(Loss)</b>	<b>(824)</b>	<b>208</b>	<b>5</b>	<b>(611)</b>	<b>177</b>	<b>(647)</b>	<b>208</b>	<b>5</b>	<b>(434)</b>
<b>Profit/(Loss) %</b>	<b>-2.9%</b>	<b>14.5%</b>	<b>2.3%</b>	<b>-2.0%</b>	<b>29.6%</b>	<b>-2.2%</b>	<b>14.5%</b>	<b>2.3%</b>	<b>-1.4%</b>

## Appendix B – References

- National Clinical Guideline Centre, (2011) [The Management of Hip Fracture in Adults]. London: National Clinical Guideline Centre. Available from: [www.ncgc.ac.uk](http://www.ncgc.ac.uk)
- National Hip Fracture Database <https://websrv03.ncasp.org.uk/010/hipfracture.nsf/>
- BOA guidance – The care of patients with fragility fracture. Published September 2007