

Developing Health and Health Care
A Strategy for Shropshire, Telford and Wrekin

Report to Joint HOSCs

30th October 2009

	<u>Page</u>
1. INTRODUCTION	1
2. IMMEDIATE PLAN	
2.1 Accident and Emergency	2
2.2 General Surgery and Vascular Surgery	2
2.3 Paediatrics	7
2.4 Monitoring and Contingency Arrangements	7
3. INTERIM ARRANGEMENTS ('2012/13')	
3.1 Work Since September Board Meeting	9
3.2 When Should the Interim '2012/13' Configuration be In Operation?	9
4. '2020' SINGLE SITE	11
5. CONSULTATION	
5.1 Immediate Plan	11
5.2 Interim '2012/13' Configuration	11
5.3 '2020' Single Site	11
6. CONCLUSIONS AND RECOMMENDATIONS	12

Appendices

1. Clinical Linkages and Outcomes	13
2. Proposals From SaTH: Challenges facing Hospital Services	16
3. External Advice on SaTH Proposals	19
4. Capital Costs of 2012/13 Interim Configuration Options: Supplementary Report	21

1. INTRODUCTION

In September the Boards of Shropshire County PCT, NHS Telford and Wrekin and Shrewsbury and Telford Hospitals NHS Trust received the findings of a number of technical, financial and social studies into the clinical options for providing sustainable and accessible acute hospital care for patients and approved a number of recommendations^a. The Boards also asked for further work to be done on:

- immediate steps that could be taken to mitigate the risks, particularly with regard to emergency services as agreed under Recommendation 4:

Recommendation 4: Plans for implementing immediate measures to mitigate risks to providing sustainable and safe services should be presented to the Board at a special Board meeting before the end of October. The plans should be presented together with an external assessment of the plans detailing clinical quality, deliverability and sustainability over a five year period, affordability and monitoring and contingency arrangements,

- the timing of consultation on (i) 2012/13 options and (ii) the establishment of a single site for acute hospital services as reflected in Recommendation 12. Recommendation 12 was agreed by Shropshire County PCT with NHS Telford and Wrekin and SaTH at their meetings later in the week proposing changes shown in blue^b:

Recommendation 12: To APPROVE consultation on the following basis:

- 12.1 *If the immediate measures proposed to mitigate risks and sustain services are judged to be robust and are affordable (Recommendation 4) then proposals for both 2012/13, delayed until 2014/15, and a single site should be consulted upon in 2011.*
- 12.2 *If the immediate measures proposed to mitigate risks and sustain services are judged not to be robust or affordable (Recommendation 4) then 2012/13 Option 1 and 2 should be consulted on in late 2009 together with the principle of a single site. Specific proposals for a single site should be consulted upon in 2011.*

The Boards also agreed recommendations to assure themselves that the assessment of the 2012/13 options were robust and in particular:

Recommendation 7: To AGREE that capital costs of ~~the preferred~~ 2012/13 options 1 and 2 should be reviewed to ensure that ~~it~~ they provides facilities which are fit for purpose at the lowest possible cost.

This report presents the conclusions of the further work and makes recommendations as to the next steps in taking the clinical strategy forward. The further work has included:

- discussions with key clinicians;

^a Executive summaries of the reports and the full reports are available from the programme website www.ournhsinshropshireandtelford.nhs.uk.

^b SCPCT met first and approve the recommendations. Subsequently NHS T & W and SaTH approved the modifications in blue which the Chief Executive, SC PCT agreed to bring these to the attention of the SC PCT Board at the meeting in October.

- obtaining external advice through the West Midlands SHA from the Royal College of Surgeons (RCS);
- an initial review of the capital costs of options 1 and 2.

A number of proposals and ideas have also been received from members of the public. These have also been reviewed and assessed.

2. IMMEDIATE PLAN

2.1 Accident and Emergency Services

A number of measures have already been agreed and are being implemented to improve the services for patients by enhancing the clinical capacity and safety of A and E services in the two departments. These include:

- the appointment of four more A and E consultants, so doubling the number of consultants across the two A and E departments. This will allow a more comprehensive consultant presence and out of hours cover particularly into the evenings;
- a defined role for middle grade surgical and medical staff to support A and E, particularly junior medical staff in A and E when there is limited consultant and middle grade cover;
- increasing the nursing establishment in A and E and reducing the reliance on agency staff;
- Hospital at Night which aims to redesign how medical cover is provided out of hours and to deliver effective clinical care through one or more multi professional teams with the full range of skills and competencies to meet patients' immediate needs.

The costs of the investments in A and E are given in Table 1. These costs including those of the consultants will be met by SaTH within the nationally set tariff paid for the service.

Table 1: Investment in A and E

	wte	Salary Cost £'000s f.y.e.
A and E Consultants	4	£400,000
Nursing	Costs to be met within tariff for A and E services	
Hospital at Night		

2.2 General Surgery and Vascular Surgery

The Case for Change

The emergence of vascular surgery^c as a sub specialty has been developing in the United Kingdom for the last ten years and many hospitals have developed and implemented surgical staffing arrangements for emergency vascular surgery which are

^c Vascular surgery is a specialty of surgery in which diseases of the vascular system, or arteries and veins, are managed by medical therapy, interventional radiology or surgery.

separate from the surgical staffing arrangements for emergency general surgery. Within the West Midlands SHA proposals are being discussed to develop vascular networks for populations of around 800,000 except in rural areas such as Shropshire, Telford and Wrekin where a network serving a lower population would be acceptable. Emergency and major vascular surgery would be concentrated on one site within each of the networks with day case vascular surgery and outpatients done at the other site(s).

The main reasons for this approach at a national and regional level are:

- patient outcome measures reinforce the need to develop a focus for vascular surgery. For instance:
 - higher volume surgeons achieve better results for aortic aneurysms, carotid surgery and critical ischemia;
 - higher volume hospitals achieve better results for elective aortic aneurysms and carotid surgery;
 - higher levels of vascular surgery correlate with lower amputation rates;
- higher mortality rates at hospitals doing fewer operations;
- variations in practice which are not explained by the needs of the population;
- higher mortality rates in the United Kingdom than in other European countries;
- national policy, training and professional issues where new consultant surgeons have not been trained to provide acute general surgery;
- multi disciplinary teams which are essential for higher outcomes.

Further details on patient outcomes are provided in Appendix 1.

What is Proposed

The Clinical Leaders Forum recommended that the national and regional strategies for vascular surgery be implemented in Shropshire, Telford and Wrekin. In September 2009, Shrewsbury and Telford Hospitals NHS Trust made specific proposals that would enable a bespoke emergency vascular surgery service to be established whilst continuing to provide emergency general surgery on both sites. In summary, the Trust proposed that four additional consultant surgeons be appointed to enable a separate rota for emergency and major vascular surgery to be established at the RSH whilst retaining emergency general surgery on both the PRH and RSH sites.

Advice on the proposals for vascular and general surgery was sought from the Royal College of Surgeons. This is given in full in Appendix 3. The main conclusions of this were that:

- it would be inappropriate to continue to provide elective and emergency major arterial interventions at both RSH and PRH and the Trust should establish a vascular unit (hub) at one of these sites. Day case surgery and clinics should continue to be provided at the other site (spoke) to allow access close to where people live;
- it is essential that vascular emergencies are dealt with by surgeons who have an elective arterial practice and the vascular on call rota must be arranged as a matter of urgency;
- it would be appropriate for the current vascular and breast surgeons to continue to contribute to emergency general surgery if they feel able and disposed to do so but

this must be time limited and should not continue for more than 3 more years (i.e. end of 2012).

- it is appropriate to continue to provide emergency general surgery at both PRH and RSH in the short term but it will be necessary to develop a single on call emergency general surgery service over the next 5 years or so.

Based on this advice and further discussion between the PCTs and SaTH, It proposed that:

1. emergency vascular and major vascular surgery should be consolidated onto the RSH site with day case operations and outpatients provided on both sites. The proposal that emergency and major vascular surgery should be based at the RSH is:
 - that vascular disease mainly affects people over 50 with incidence peaking when people are in their 60s and 70s^d. There are more than 2.5 times as many people over 65 in Shropshire County than in Telford and Wrekin;
 - because the change from the present position would be less with some 80% of major vascular surgery already carried out at RSH as summarised in Table 2. As a result the additional demands on theatres, critical care, interventional radiology and other clinical and diagnostic support services will be proportionately less;
 - the change for patients will be less than if services were consolidated at the PRH. On average one to two vascular surgery patients and two patients having interventional radiology a week will have their procedure at Shrewsbury rather than Telford. If the services were to be consolidated at Telford the number would be four times this.

Table 2: Vascular Surgery Activity

	Vascular Surgery		Interventional Radiology
	RSH	PRH	
Emergency Aorta	12	3	
Elective Aorta*	55	25	
Femoral	50	20	221
Carotid	45	30	1
Visceral/Iliac			110
Renal Access	150		
Total	315	78	332 of which at least two thirds at RSH

* Endovascular repairs account for 25 of the 55 Elective Aortic repairs.

2. the vascular surgeons would continue to participate in the emergency general surgery rota, providing a 50% contribution so enabling emergency general surgery to be provided on both sites. In order to facilitate this it is proposed to appoint:

^d Abdominal Aortic Aneurysms – mainly people over 55 and are most common in 70-80 years old. Ischemic Stroke - 75% strokes in people over 65, incidence doubles every 10 years. Peripheral Arterial Disease - 1 in 20 people over 55, more common as age increases.

- i. a sixth vascular surgeon. It is recognised that this is contrary to the advice from the RCS. However this advice was based on what was appropriate for a completely separate vascular surgery service. Until the interim '2012/13' arrangements are in place the vascular surgeons will be doing a considerable amount of general surgery and a sixth vascular surgeon will be needed to provide acceptable out of hours cover arrangements. The appointment will be a proleptic appointment^e and the need for a sixth surgeon will be reviewed when the first of the vascular surgeons retires in approximately two years time;
- ii. two additional colorectal/upper GI surgeons. These appointments are needed to backfill the reduction in the commitment of the vascular surgeons to emergency general surgery. One of the appointments will be proleptic and will be reviewed when the first colorectal/Upper GI surgeon retires within the next 5 years;
- iii. surgical fellows^f to support emergency general surgery out of hours (at night and weekends).

When Should a Single Emergency and Major Vascular Service be Established?

Given the very strong case for change including the opportunity to improve clinical quality and the evidence from international and national studies that a bespoke emergency and major vascular surgery service provides better outcomes for patients and the external advice that has been received, it is proposed that all emergency vascular and major vascular surgery should be consolidated onto the RSH as soon as possible.

Further, given the very small number of patients who would then have their treatment at the RSH as opposed to the PRH, it is proposed to consult with the Shropshire, Telford and Wrekin Joint OSC with a view to consolidating vascular surgery whilst retaining emergency general surgery on both sites as soon as is practically possible and without further consultation. It is proposed to put this to the Joint OSC at their meeting on 30th October 2009.

For How Long Will the Immediate Plan for General Surgery and Vascular Surgery be Robust?

Consideration has also been given as to how long the immediate plan will be robust. A number of factors have been considered in assessing this, including:

- advice from the RCS that the vascular and breast surgeons should not participate in emergency general surgery on call arrangements after 2012/13 (Appendix 3);
- retirement of some of the vascular and breast surgeons over the next 2-5 years and the fact that applicants will have less training in general surgical training and will not be able to participate in emergency general surgery. This will mean that additional

^e An appointment in anticipation of the retirement of an individual and made before the individual retires.

^f Surgical fellows are posts which provide clinical experience at Specialist Trainee level with research or undergraduate teaching of medical students. These posts are not usually educationally approved and cannot be counted towards either core or higher surgical training.

- colorectal/upper GI surgeons will need to be appointed to support emergency general surgery in addition to replacing the vascular/breast surgeons;
- on going risks around middle grade medical staffing – the number of surgical trainees have been, and are continuing to be reduced nationally and recruitment of non training middle grades is difficult. Trainees are less clinically-experienced than previously, requiring consultants to take on a greater role and provide closer supervision.

The use of locums to extend the period of the immediate plan beyond three years by supporting emergency general surgery following the retirement of the vascular and breast surgeons has been considered. Whilst this is possible there are a number of problems with this including (i) difficulty in recruiting and retaining quality locums just to provide out of hours cover, (ii) the extra costs as locums will cost more than a consultant, (iii) the use of locums to cover retirements would still leave the current vascular and breast surgeons doing emergency surgery which is contrary to the advice from the RCS. Given these factors and the importance of acute surgery, heavy reliance on locums would carry risks for patients and sustaining emergency general surgery on both sites.

Developing a strategic alliance with another provider was also considered as a way of retaining emergency general surgery on both RSH and PRH. Given the national and regional vascular strategy, the hospitals in Telford and Shrewsbury would become part of a wider vascular network with the 'hub' in either Wolverhampton or Stoke. This would then require backfilling of the emergency general surgery on call arrangements following the vascular surgeons withdrawing from providing emergency general surgery in line with the advice from the RCS. The result would be the need to consolidate emergency surgery onto one site.

In summary, the longer emergency general surgery continues on both sites, the greater the delay to improving outcomes and risks to sustaining services for patients. Specifically maintaining emergency general surgery service on both sites for more than three years would carry substantial risks and be contrary to the advice of the Royal College of Surgeons.

Costs of Changes

Costs have been estimated on the basis that the volume of surgical work will not be increased. SaTH will agree revised job plans with the surgeons to ensure that the jobs are attractive and at the same time take the opportunity to reduce the workload or Programmed Activities (PAs) of the existing surgeons to a standard job plan of ten PAs.

The costs of implementing these changes are estimated in Table 3 under a range of assumptions about the length of time that emergency surgery is provided at both the RSH and PRH. The table shows that the cost of sustaining emergency general surgery on both sites increases with time. Secondly this increased cost will result in a greater 'overinvestment' in the medical workforce following consolidation of emergency general surgery onto one site.

Conclusion

In conclusion, the longer the immediate plan to retain emergency general surgery on both sites is in operation, the greater the issues of robustness and affordability. In particular:

- the longer the period that the immediate plan is required to be in operation, the greater the investment in additional surgeons;
- extending the immediate plan beyond three years results in an overinvestment in consultants when emergency general surgery is consolidated into one site. This will remain the case for at least the next ten years, given the retirement profile of the upper GI/colorectal consultants;
- retaining emergency general surgery on two sites for more than three years would require another eight consultants if the advice of the Royal College of Surgeons is accepted. This reflects the implications of reducing exposure to the range of general surgical conditions and interventions over a period of time of vascular surgeons as a result of their reduced commitment to emergency general surgery;
- as the number of upper GI/colorectal consultants increases the attractiveness of the jobs and the ability to recruit high quality people will decrease as there are no plans to increase the elective work with the appointment of the additional surgeons;
- the cost of the additional surgeons would carry a high opportunity cost at a time when the NHS like the rest of the public sector is facing a much tighter financial outlook.

Table 3: Number of Surgeons Required

	Vascular	Breast	Upper GI/Colorectal	Total	Additional Cost (Staff Cost Only)
Current Surgical Consultants	5	3	6	14	
Emergency Vascular Surgery on RSH and Emergency General Surgery on RSH and PRH for:					
3 years with Current Vascular Surgeons Contributing to Emergency General Surgery a/	6	3	8	17	£300,000
5 years with Current Vascular & Breast Surgeons Contributing to Emergency General Surgery b/	6	3	10	19	£500,000
5 years with Current Vascular & Breast Surgeons withdrawing from Emergency General Surgery after 3 years c/	5	3	14	22	£800,000
'2012/13' d/	5	3	7	15	£100,000

a/ Appointment of two colorectal/upper GI surgeons to replace the 50% reduction from the vascular surgeons in emergency general surgery and one additional vascular surgeon to give acceptable out of hours on call arrangements.

b/ Appointment of two additional colorectal/upper GI surgeons to replace loss of commitment to emergency general surgery following retirement and replacement in the next 2 to 5 years of one vascular and one breast surgeon.

c/ Vascular and breast surgeons stop doing emergency general surgery after 2013 in line with the RCS advice.

d/ Emergency general surgery consolidated onto one site.

2.3 Paediatrics

The Children's Pathway Development Group and the Clinical Leaders Forum concluded that children's services should be strengthened through the introduction of hospital at home services for children and strengthening of the paediatric assessment services at both the RSH and the PRH. The clinical strategy also identified significant concerns regarding maintaining inpatient paediatric services at both sites including increasing difficulty in providing out of hours medical staff cover and constraints to developing better and more specialist services for children^g.

The clinical strategy also recommended that hospital at home and paediatric assessment services should be developed before in patient paediatrics services are consolidated onto one site.

At the September board meetings the three boards approved recommendation 8 *that detailed plans for children's hospital at home and the development of the paediatric assessment services at RSH and PRH should be drawn up by SaTH and the PCTs and commissioned.*

Providing that the ongoing risks to the sustainability of children's in patient services can be managed, it is proposed that the in patient services should not be consolidated onto one site until the hospital at home and paediatric assessment services have been developed at both sites and until emergency general surgery, which was identified as a critical clinical linkage, is consolidated onto a single site^h.

2.4 Monitoring and Contingency Arrangements

Progress reports on implementation of the immediate plan will be presented to the SaTH and the two PCT Boards on a quarterly basis and to the joint OSC on a six monthly basis. In addition to progress, the report will cover costs and activity, the latter to ensure that the appointment of the additional consultants to support emergency vascular and general surgery does not result in higher than planned activity levels.

A number of current and ongoing risks were identified including risks around middle grade medical staff and cover out of hours across a range of clinical services. It has been agreed that SaTH would prepare a risk management and contingency plan to mitigate these risks. The plan would be subject to external review and advice from the postgraduate deanⁱ. The risk management and contingency plan will be presented to the Boards in January 2010 and to the Joint OSC early in the 2010. Progress reports will be provided to the Boards and the Joint OSC every six months.

^g Children's Pathway Development Group reports, May and November 2008.

^h At the Board meetings in September 2009 it was agreed not to consider further options 3 and 4, reflecting the conclusions of the National Clinical Advisory team that *'Whilst it may be possible to split the acute inpatient paediatric service from acute surgery, we think overall it would be best to co-locate these services. Similarly acute surgery is best close to the obstetric and gynaecology services, and there are considerable advantages to bringing together neonatology and paediatrics. Thus while there may be political reasons to separate these services, this does not make any clinical sense'*, NCAT Final Report 12th February 2009.

ⁱ The Deanery's role is to ensure the supply of well trained medical professionals to the NHS through training and continuous professional development programmes.

3. INTERIM '2012/13' ARRANGEMENTS

3.1 Work Since September 2009 Board Meeting

The PCT and SaTH Boards received the option appraisal of the interim '2012/13' options to address the risks faced by the challenged services including A and E, acute surgery and paediatrics. Based on the option appraisal the Board agreed that *on the basis of the 2012/13 Option Appraisal, Option 1 ranks the highest on both a financial and non-financial basis* (Recommendation 6).

The option appraisal was carried out by consultants with considerable experience in such work and involved patients and the public through the Citizens Panel advising on the non financial criteria used in assessing the options.

The costs of options 1 and 2 are given in Table 4. The main drivers of the differences in the capital costs are the need to increase surgical capacity at PRH and to relocate the obstetrics and neonatal intensive care unit to PRH under Option 2. The option appraisal also concluded from the sensitivity analysis that while there may be some scope to reduce the costs in options 1 and 2, the ranking of the two options would not change.

Notwithstanding the above and following questions from the public, the Council and some NHS Telford and Wrekin board members as to the validity of the difference between the capital costs of Options 1 and 2, it was agreed to seek a review of these costs. The purpose of this review is to validate the difference in costs since this is the one factor which distinguishes in a material sense between options 1 and 2. An initial supplementary report is given at Appendix 4 and concludes that using existing facilities for services transferring from the RSH under option 2 'could cost considerable more than the new build extension, and it is unlikely to be significantly cheaper'.^j (Appendix 4, page 3). Further detailed work has been commissioned on the following cost elements: paediatric beds (Option 1), surgical beds, obstetrics (Option 2) and optimism bias/planning contingency (Options 1 and 2).

3.2 When Should the Interim '2012/13' Configuration be In Operation?

Section 2.3 concluded that the immediate plan was robust for three years but after this there would be increasing costs and risks to sustaining emergency general surgery on two sites. There would also be ongoing risks to sustaining in patient paediatric services on both sites. It is therefore proposed that the '2012/13' arrangements should be in place within three years (late 2012/early 2013).

^j This is because the refurbishment cost of the vacated space is likely to be in the region of 70% of new build costs and facilities would also need to be provided for any displaced services.

Table 4: Cost Breakdown by Service, 2012/13 Options 1 and 2 (£m)

	Option 1		Option 2
	<u>RSH</u>	<u>PRH</u>	<u>PRH</u>
A and E	1.81		1.42
Surgical Beds			7.80
Critical Care	2.96		2.23
Paediatrics Beds	5.51		3.16
Obstetrics			17.26
Urology		1.74	
Paediatrics OPD		0.73	
Clinical Support		0.04	
Support Accommodation			0.90
Road Alignment/Car Parking			0.81
Part L (+2%) ^k		0.22	0.54
BREEAM excellent (+3%) ^l		<u>0.33</u>	<u>0.81</u>
Baseline Cost (MIPS baseline cost) ^m		13.34	34.93
Projected Costs		18.27	47.28
Ratio Option 2: Option 1			2.6

^k Part L - Conservation of fuel and power is part of the Building Regulations requirements.

^l The Building Research Establishment Environmental Assessment Method (BREEAM) is a voluntary measurement rating for green buildings that was established in the UK. BREEAM may be valued engineered out in a cost cutting exercise.

^m MIPS is a comparator for NHS procured buildings and with an adjustment factor gives a guideline of the total cost that the NHS expects in a Business Case. The baseline indices is 390 and the reporting and projected indices is 530.

4. '2020' SINGLE SITE

The PCT and SaTH boards approved the following recommendations at their September 2009 Board meetings:

Recommendation 9: To AGREE that a full option appraisal should be carried out on all three options for a single site within the context of the wider health and healthcare strategy across Shropshire, Telford and Wrekin.

A specification and procurement strategy for the option appraisal is currently being developed and will be considered by the Programme Board at its meeting in November 2009. Advice has been sought as to how long the option appraisal will take and the clear advice is that given that sites still have to be identified for the option of a new hospital between Shrewsbury and Telford, this is likely to take at least 18 months and is unlikely to be completed before mid 2011.

5. CONSULTATION

5.1 Immediate Plan

As was discussed in Section 2, it is proposed to consult with the Joint OSC with a view to consolidating vascular surgery onto the RSH whilst retaining acute surgery on both sites without further consultation. This is based on the very strong case for change including the opportunity to improve clinical quality and outcomes for patients together with the very small number of patients who would then have their treatment at the RSH as opposed to the PRH.

5.2 Interim '2012/13' Configuration

Section 2 concluded that there were increasing risks to patients, difficulties in sustaining emergency general surgery on both sites and rising costs after two to three years. Consultation in mid 2010 with a final decision by the end of 2010 would:

- allow two to two and a half years for implementation of the interim ('2012/13') arrangements. This is the implementation time estimated in the option appraisal;
- enable the review of the difference in costs to be fully explored before a final decision is taken on the preferred option, recognising that *on the basis of the 2012/13 Option Appraisal, Option 1 ranks the highest on both a financial and non-financial basisⁿ*;
- allow a wider and more informed debate than would be the case if consultation was carried out in late 2009 as originally planned.

5.3 '2020' Single Site

The completion of a full option appraisal of a single site will take at least 18 months. Therefore it is proposed to consult on the principle of a single site at the same time as consultation of the interim '2012/13' options is carried out (mid 2010) and to consult on a single site in late 2011/early 2012 following completion of the option appraisal.

ⁿ September 2009 Chief Executives' Report to Boards, Recommendation 6

6. CONCLUSIONS AND RECOMMENDATIONS

The following recommendations are being presented to the PCT and SaTH Boards on 27th and 29th October::

Recommendation 1: To NOTE the investments being made in Accident and Emergency Services to improve the services for patients by enhancing the clinical capacity and safety of A and E services in the two departments (Section 2.1).

Recommendation 2: To APPROVE the Immediate Plan to consolidate emergency vascular and major vascular surgery onto the RSH site whilst retaining emergency general surgery on both the RSH and the PRH for three years (Section 2.2).

Recommendation 3: To AGREE to consult with the Joint OSC in respect of emergency vascular and major vascular surgery services being consolidated onto the RSH whilst retaining emergency general surgery on both the RSH and the PRH for three years. Vascular surgery outpatients and day cases will continue to be provided on both sites (Section 2.2 and Section 5).

Recommendation 4: To NOTE that the costs of the appointments in the two A and E departments and the surgical fellows will be covered within the nationally set tariffs for clinical services. To CHARGE the Chief Executives with submitting to the Boards in January 2010 the financial arrangements for the three consultant surgeon appointments – one vascular and two colorectal/upper GI surgeons (Section 2.2).

Recommendation 5: To ASK the Chief Executive, SaTH to provide quarterly progress reports on implementation of the immediate plan for vascular and general surgery to the NHS Boards and six monthly reports to the Joint OSC (Section 2.4).

Recommendation 6: To ASK Chief Executive, SaTH to prepare a risk management and contingency plan regarding middle grade medical staff out of hours cover and to SEEK external advice from the Postgraduate Dean. Further to SUBMIT this plan to the three Boards for approval in January 2010 and, once approved, to the Joint OSC for information (Section 2.4).

Recommendation 7: To AGREE to consult in mid 2010 on Interim '2012/13' Options 1 and 2 together with the principle of a single site with a view to having a final decision by the end of 2010 at the latest. Further, to CONCLUDE the financial and non-financial ranking of the interim '2012/13' Options when the detailed review of the capital costs of Options 1 and 2 has been completed (Sections 2.3, 3 and 5). This will be presented to all three Boards by March 2010.

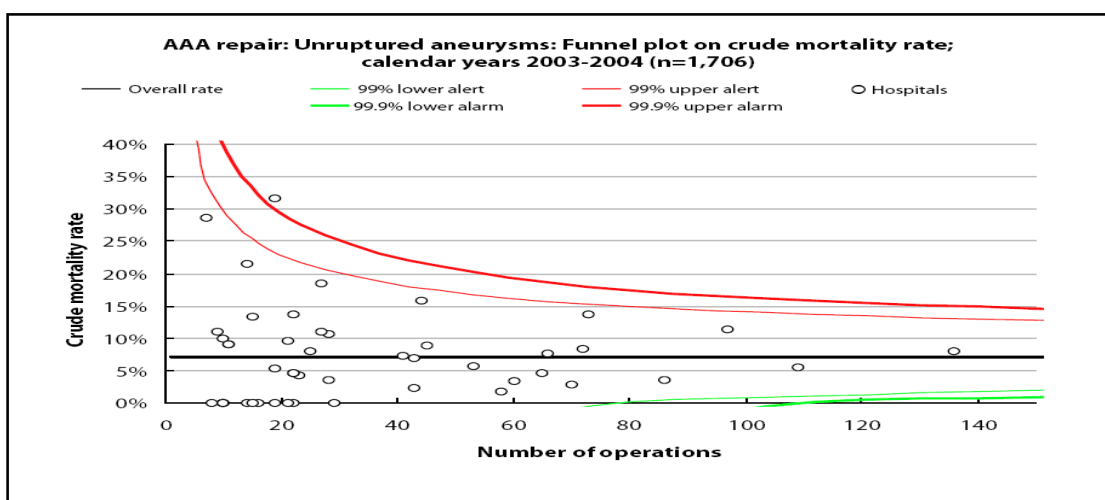
Recommendation 8: To AGREE to consult on an option for a single site no later than the first half of 2012 (Sections 4 and 5).

Appendix 1 Clinical Linkages and Outcomes

This appendix summarise the conclusions of work that has been done at a national and regional level of outcomes in vascular surgery and underpins the national and regional strategy to develop vascular surgery networks based on populations of around 800,000. The data on variations in practice and outcomes is from presentations and papers by Professor Jonathon Michaels, Sheffield Vascular Institute, University of Sheffield.

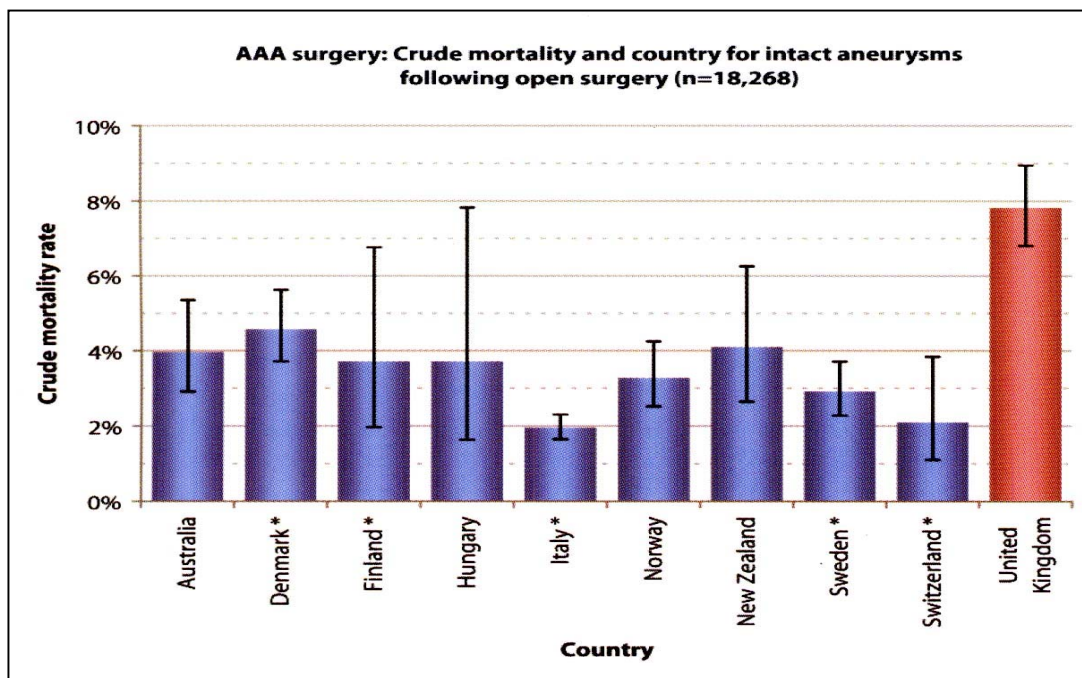
The development of vascular surgery has been developing as a sub specialty in the United Kingdom for the last ten years and many hospitals have developed and implemented emergency vascular surgery rotas separate from those for general acute surgery^o. The main reasons for this are:

- higher mortality rates at hospitals doing fewer operations^p:

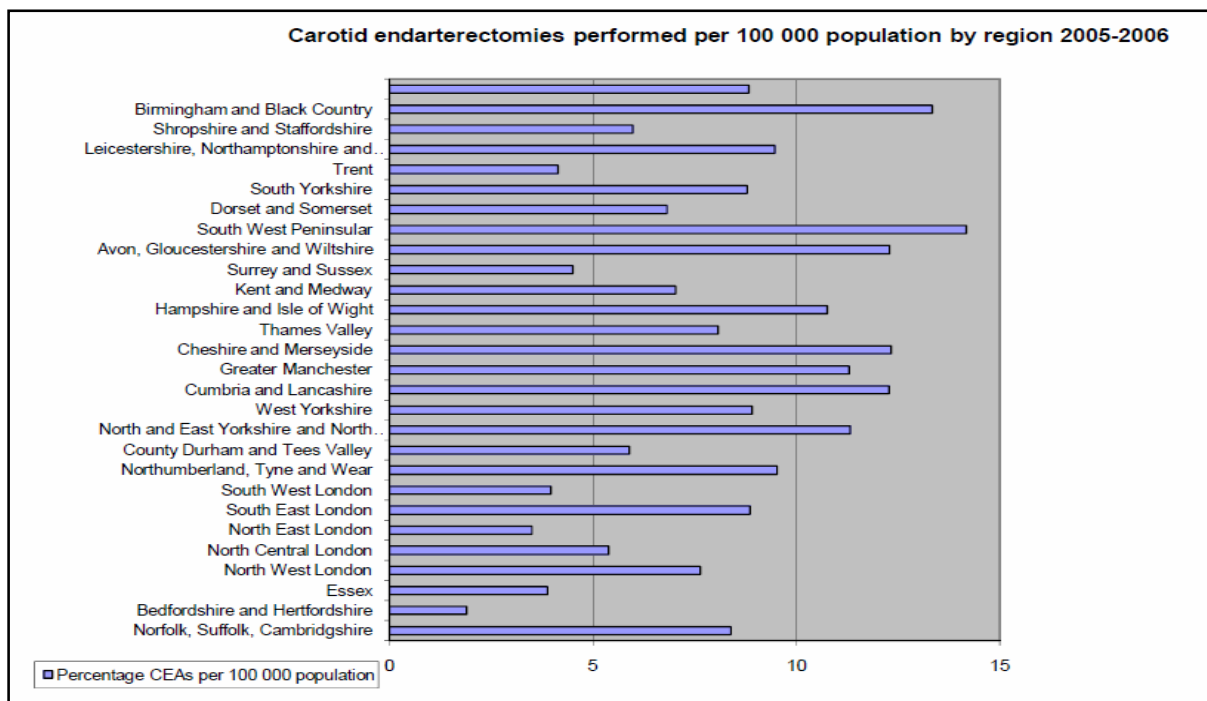


^p AAA Abdominal Aortic Aneurysm

- higher mortality rates in the United Kingdom than in other European countries:



- variations in practice which are not explained by the needs of the population:



- other outcomes measures also reinforce the need to develop a focus for vascular surgery:
 - higher volume surgeons get better results (for AAA, carotid surgery and critical ischaemia);
 - higher volume hospitals get better results (for elective AAA and carotid surgery);
 - higher levels of vascular surgery correlate with lower amputation rates;

- national policy, training and professional issues:
 - new consultant surgeons only have done vascular surgery training, not general surgery training;
 - AAA screening based on populations of 800,000;
 - new technologies and availability of expert teams will improve outcomes for stroke victims;
 - multi disciplinary teams essential for higher outcomes;
 - clinical governance;
 - increasing litigation if outcomes are lower than elsewhere.

- regional policy and approach following meeting of all vascular surgeons and with the SHA in February 2009. The key conclusions of this were:
 - vascular networks should be established for populations of around 800,000 supported by 8-10 surgeons;
 - in rural areas population of around 600,000 would be acceptable, supported by 6-8 consultants, Shropshire, Telford and Wrekin would be one of the networks;
 - major aortic surgery should be concentrated on one site in each of the networks with minor, day case surgery and outpatients done in smaller units.

Appendix 2
Proposals From SaTH, September 2009

THE SHREWSBURY & TELFORD HOSPITAL NHS TRUST

CHALLENGES FACING HOSPITAL SERVICES

The Clinical Leaders Forum were asked '*to make recommendations for the future pattern of clinically safe general hospital services, serving the populations of Shropshire, Telford & Wrekin, and the catchments of the provider organisations*'. Their conclusions and options to address the challenges facing the hospitals in Shropshire, Telford and Wrekin have been considered by Trust Boards during 2008 and 2009.

In summary, the Clinical Leaders Forum identified three main challenges to the provision of clinically safe and sustainable services

- There were some services where the current configuration of hospital services limited the scope to improve the quality of services. Specifically providing in-patient paediatrics and vascular surgery services across two sites did not enable comprehensive services and/or restricted the ability to develop local specialised services;
- There were risks in sustaining some services on two sites due to workforce and training issues including the impact of the European Working Time Directive, the requirements to provide high quality training and the need to recruit high quality clinical staff;
- The impact of sub specialisation and the development of higher quality and more specialised services. This is leading to a smaller group of doctors to provide 24 hour general surgery care out of hours.

The Clinical Leaders Forum concluded that while services were at present not unsafe, there were areas where the quality of services could be improved. Secondly the difficulty of sustaining services across two sites would increase in the future and there is the potential that this would present increasing risks for patients and pressures on clinical staff.

From a quality of care perspective it should be remembered that SaTH currently has the lowest Hospital Standardised Mortality Ratio of any non specialist hospital in the West Midlands and is significantly lower than the average for England, our Readmission Rates within 28 days of discharge are significantly lower than the average for England in all four quarters of the last year, we have maintained a "fully met" status in our Standards for Better Health declaration, have achieved level 3 in CNST for Maternity and have been assessed at Level 2 on the new more demanding CNST level for General Medical Services, 93% of patients who use our services would recommend the Trust to a friend and 90% of inpatients rate our service good or excellent.

In the wake of the Mid Staffordshire Trust Review a Strategic Health Authority Assurance Review has been undertaken. The Trust has developed an Action Plan to deal with these issues which has been accepted by the Boards of the Trusts in the county and NHS West Midlands.

As part of that Action Plan SaTH has undertaken a recruitment drive for Nurses and Health care Assistants to enable us to reduce our reliance on Agency and overtime working and thereby improve the quality of care. We have also agreed to double the number of A&E Consultants to eight (without additional external financial investment) and are also on target with its implementation plan for Hospital at Night to facilitate the maintenance of A&E at both hospitals as recommended by the Clinical Leaders Forum.

SaTH also agreed to develop proposals to mitigate potential risks to patient care in relation to the absence of a specific vascular rota and the ability to maintain acute surgical activity on both sites. It is agreed that if these proposals are considered to be robust and affordable then proposals for 2012/13 and the 2020 single site solution could be the subject of a single Public Consultation to enable the public to see the whole picture of how services can be reconfigured over the coming years with an agreement from all parties that the longer term future must be based on a single hospital solution.

The following proposals have been developed in conjunction with the General Surgeons at SaTH recognising that over the last five years the change towards a consultant led and run acute service has improved patient outcomes and this situation should not be reversed. This is supported by early definitive subspecialty management of emergency cases.

All breast surgeons agreed that they were trained general surgeons and that they were happy to continue with the general acute take until a long-term solution had been finalised. They have discussed this with the Royal College of Surgeons who are supportive of this view.

There was unanimous agreement that the best solution would be to formulate a cross county single vascular rota with the appointment of a sixth vascular surgeon. The vascular surgeons would continue with general surgery but with a proportional reduction to 50% of their current commitment. Assuming the sixth vascular surgeon was based on the RSH site, two general surgical slots would be covered by these four surgeons and one general surgical slot on the PRH site.

In order to maintain the current rotas and meet quality standards in cancer treatment and the growing volume of colorectal activity, the appointment of two additional colorectal surgeons on the RSH site and an additional upper gastrointestinal surgeon on the PRH site, would be required. On this basis all consultants agreed to create an immediate cross county vascular rota and to support and maintain acute general surgery in both hospitals.

The PRH solution, with the appointment of a new upper gastrointestinal surgeon, would be supported by some movement of elective biliary activity towards PRH. This would also require commissioner support for bariatric expansion at PRH and a review of this service is already underway.

We are already aware of Job Plans elsewhere based on the above principals which the Royal Colleges have approved so approval for these post should not be a problem and it is considered of both the surgeons and the Executive Team at SaTH that these post will

attract high quality candidates which will further enhance the quality of clinical care provided to our population.

All the General Surgeons supported the above proposal but emphasised the ongoing problem in the provision of high quality middle grades for the acute rotas by the West Midlands Deanery resulting in problems for the Trust.

Discussion are ongoing with representatives from the higher training panel within the Deanery, to move forward appointments of surgical fellow^q jobs within upper GI, colorectal and vascular surgery then SaTH would be less reliant on the Deanery filling these positions. The requirement to maintain 17 middle grades in post across SaTH is paramount to sustaining safe services. The costs of these posts will be absorbed by SaTH and again quality of care will be improved by employing permanent staff and not having to rely on locums to fill the vacancies created insufficient post being allocated or filled.

With regard to paediatric services it is agreed that the current inpatient services on both sites are safe and can be sustained in the medium term whilst recognizing that the longer term solution must move to a single paediatric inpatient facility with high quality assessment units on both sites and the development of Hospital at Home services. Indeed all three Boards agreed on the 22nd and 24th September to Recommendation 8 in the "*Chief Executives report to PCT Boards and the SaTH Board*" prepared by John Macdonald that detailed plans for children's hospital at home services and the development of paediatric assessment services at RSH and PRH should be drawn up and commissioned. These services do not present an immediate risk which requires further mitigation other than the actions already approved.

Conclusion

The proposals outlined above mitigate risks to patients, are robust and affordable to the whole health economy with support required to fund four additional consultant posts which will enable the creation of the first ever cross county vascular rota which will significantly increase the quality of care for patients and also enable acute surgical rotas to be operated at both sites until at least 2014/15 enabling a single public consultation to be undertaken on both the 2012/13 and 2020 single site options.

The additional cost to each PCT of the four additional posts would be limited to £250k per PCT with SaTH absorbing the cost of the four additional A&E consultants, and the Middle Grades required to move to European Working Time Directive compliant rotas.

^q Surgical fellows are posts which combine clinical experience at Specialist Trainee level with research or undergraduate teaching of medical students. These posts are not usually educationally approved and cannot be counted towards either core or higher surgical training.

Appendix 3

External Advice on SaTH Proposals: Challenges Facing Hospital Services

Thanks very much for asking me to comment on behalf of RCS England on proposals made by Shrewsbury and Telford Hospital NHS Trust (SaTH) regarding General Surgery services including Vascular Surgery.

These comments are based on documents you have provided to me ("Challenges facing Hospital services; Various documents under the banner Developing Health and Health Care, a Strategy for Shropshire, Telford and Wrekin: Report from the Clinical Leaders forum November 2008; Technical papers 2 and 3 and Clinical Linkages and Outcomes) and discussions with you and John MacDonald regarding the context. Furthermore I have received feedback from Professor Jonathan Michaels who has also seen these documents. Any facts regarding caseload, populations etc are gleaned from these documents or from HES data supplied by the WM SHA. Due to the short deadline I present my views in note form.

The population served by SaTH is approximately 460,000. There are 2 acute hospitals both with an A/E unit the combined effective catchment being 416,000 (ref technical paper 1 : Access). The Royal Shrewsbury (RSH) and Princess Royal Hospital (PRH) are 18.1 miles apart, journey time 25 minutes (Ref TheAA.com)

It has been estimated that a population of 100-150K people will provide enough work for 1 WTE Vascular surgeon (ref The Provision of Services for Patients with Vascular Disease 2009). Vascular and breast surgery are now being recognised as specialities distinct from general surgery and whilst the requirement to be "emergency safe" in the generality of surgery is still a requirement for the CCT in general surgery, over 80% of current trainees in vascular surgery have expressed the view that they have no intention of doing the acute general surgery on call when appointed as consultant. It is likely that breast trainees feel the same. It is not appropriate to undertake to provide emergency on call cover in a speciality which is not practiced day to day.

Whilst current vascular and breast surgeons (by dint of their "classical" surgical training) may feel able to contribute to a general surgery on call rota, without an ongoing elective gastrointestinal/abdominal surgical practice this position is not sustainable. Furthermore new appointees in vascular and breast surgery, having had a far narrower training, will be unable to do this at all.

There is good evidence that outcomes in vascular surgery are related to the size and throughput of the whole unit as well as the individual consultants. This is due to the contribution that all members of the vascular multidisciplinary team make to the patients' care, therefore fragmentation of service into multiple small units adversely affects patient safety.

The national AAA screening programme to be rolled out through 2012/13 will be based on units serving populations of around 800,000. Furthermore screening and service centres will be coterminous. Traditional patient flows will be preserved as much as possible.

HES data show that in 2004-5, 2005-6 and 2007-8 SaTH undertook respectively 61,68, and 40 AAA repairs ; 54,48, and 43 carotid endarterectomies; and 80, 69, and 72 infrainguinal revascularisations, this between all the surgeons. Over these 3 years there were on average 17 emergency AAA repairs per year in the whole Trust i.e. 1 every 3 weeks or so.

SaTH have proposed in their document to continue to provide elective and emergency general and vascular surgery both at RSH and PRH and to appoint a 6th vascular surgeon, and 3 General surgeons to facilitate this. Furthermore their document discusses the appointment of "surgical fellows" to bolster the junior doctor's rota in view of the reduction in surgical trainee numbers predicted. I presume that this term refers to non consultant career grade doctors (nccg).

They propose that vascular and breast surgeons contribute to the general surgery on call, but that there is also a separate vascular on call rota.

My opinion is that it would be inappropriate to continue to provide elective and emergency major arterial interventions at both RSH and PRH and the Trust should establish a vascular unit (hub) at one of these sites; day case surgery and clinics must continue to be provided at the other site (spoke) to allow access close to where people live. This model of service has been shown to be safe in many parts of the country and would allow the development of improved services. In my view due to the size of the catchment population and volume of work it would also be inappropriate to appoint a 6th vascular surgeon as there would be insufficient clinical material to maintain proficiency in complex procedures. It is essential that vascular emergencies are dealt with by surgeons who have an elective arterial practice and the vascular on call rota must be arranged as a matter of urgency.

It would be appropriate for the current vascular and breast surgeons to continue to contribute to the general surgery on call rota if they feel able and disposed to do so but for the reasons described above this must be clearly time limited and should not continue for more than 3 more years (i.e. end of 2012).

It is appropriate to continue to provide acute general surgery on call at both PRH and RSH in the short term but it will be necessary to develop a single on call service over the next 5 years or so.

The Trust may need to reallocate surgeons and appoint the 3 general surgeons mentioned in their document to facilitate the development of the vascular hub and spoke service.

The Trust needs to be aware that new appointees in vascular and breast surgery will not undertake the acute general surgery on call and must plan accordingly.

Regarding the appointment of non consultant career grade (NCCG) doctors to bolster the rotas, the Trust needs to be aware that these may not be attractive posts. Preference will have to be given to the Deanery trainees for daytime on call slots for them to be exposed to the best training opportunities which will leave the nights and possibly week ends to be covered by the NCCGs.

I've copied this to the President of the College and Professor Alderson who is the Regional Council member in case they have any further comments.

S H Silverman MD FRCS
Director for Professional Affairs
1st October 2009