

ANNEX 1



Future Provision of Vascular Services in Lanarkshire – Proposal to Move to a Single Site for Inpatient Surgery

SUMMARY

The proposal being developed by NHS Lanarkshire is to concentrate the existing two-site provision of inpatient vascular services to one inpatient centre. The background to this strategic intent was trailed by the NHS Board in 2005/06 as part of a wider range of initiatives contained within “A Picture of Health”. The first phase of the concentration took place in May 2007 when the inpatient service at Monklands Hospital transferred to Hairmyres Hospital. The stakeholder engagement exercise at that time clarified that this was the first step in a phased move towards a single inpatient centre for Lanarkshire.

Since 2007 there has been a change in government policy and the Board is therefore taking the opportunity, with proportionate stakeholder consultation, to obtain views on the strategic intent which continues to have full clinical support.

This paper sets out the current model of care, the evolution of vascular services in recent years and takes account of the service interdependencies; new technology and service developments; requirement to invest in new equipment and professional guidelines relating to the provision of inpatient vascular services.

1. The Current Lanarkshire Vascular Service

1.1 Location and Scope of Current Service

The vascular service in Lanarkshire is primarily delivered in community and hospital clinics: over 1000 patients were assessed and treated in community clinics in 2009 (and this number will increase this year); 4500 patients will attend the outpatient vascular clinics in the three main Lanarkshire hospitals; and 850 patients had treatment in hospital as daycases (this, too, will continue to increase).

NHS Lanarkshire (NHSL) currently provides inpatient vascular surgery at Hairmyres and Wishaw General Hospitals. However, only a small proportion of the service is delivered through inpatient stays in hospital: this totals 500 admissions each year, less than 10% of all patient contacts with the vascular service. Increasingly, surgical interventions will not result in admission to hospital as more treatment is undertaken as day case and outpatient procedure.

The proportion of inpatient and day case contacts will continue to fall as the emphasis moves to increased day case and outpatient procedure. This has been achieved through the considerable expansion of local vascular clinics. In 2007 there were three local clinics on the Monklands area – this has been extended to seven clinics covering all Lanarkshire areas.

Work undertaken by vascular surgeons in respect of renal access is currently performed at Monklands Hospital where the renal unit for Lanarkshire is sited. This arrangement will not change with the proposal outlined in this paper.

Vascular emergencies from the Monklands Hospital area are currently directed to the vascular surgeon on-call for the day and the patient is transferred to their respective site (Hairmyres or Wishaw). In clinical circumstances where a patient cannot be transferred, the vascular surgeon will go to Monklands Hospital to provide care. Clinical staff have advised that this is a rare occasion. These arrangements have been in operation with agreement of clinicians and the Scottish Ambulance Service since May 2007 and have worked well. Clear protocols for management of emergency vascular patients were developed and agreed with all clinicians and the Scottish Ambulance Service.

The service as a whole has a revenue budget of over £2.7m per annum

1.2 Evolution of Vascular Services

Vascular services are required by a wide population of patients across several disease categories. There are 5 main disease categories that account for the majority of the elective and emergency vascular workload: aortic aneurysm disease; carotid artery disease; peripheral vascular disease; renal disease; and venous disease (principally varicose veins).

Historically, vascular surgery was considered a sub-specialty of general surgery with services provided by general surgeons who had an interest in vascular disease and treatments. This arrangement has not occurred for many years and vascular surgery is recognised as a specialty in its own right. Clinicians without vascular training no longer have the necessary skills to intervene on vascular patients and therefore produce demonstrably worse outcomes¹.

In recent years, there has been a technological revolution in vascular surgery with a paradigm shift away from open surgical reconstructive procedures to minimally invasive catheter delivered treatments such as angioplasty and stenting. The delivery of acute and planned vascular surgery interventions is now inextricably linked with Interventional Vascular Radiology (IVR) services, a fact now reflected in the joint training programmes being driven by the Royal Colleges as well as the Vascular Society².

¹ Association of Surgeons of GB & I: *Emergency General Surgery: the Future*. London 2007

² Vascular Society of GB & I: *Provision of Services for patients with Vascular Disease*, London 2009:10

NHSL has an establishment within vascular services of four full time substantive vascular consultant surgeons. IVR within NHSL is currently provided by four full time interventional radiologists. This level of surgical and radiological staffing matches the national benchmark of one of each specialist per 150,000 population²

Interventional radiology services are provided for all Lanarkshire patients predominantly on the Hairmyres site although on a rare occasion the consultant interventional radiologists will travel to the patient if they are too unwell to move.

In addition to the close links to interventional radiology, there is also overlap with cardiology services. Patients with peripheral vascular disease often have concomitant coronary artery disease and vice versa. Many cardiology patients require catheter interventions including angiography and stenting. This regional service is based at Hairmyres Hospital. As a result there is often a need to deal with emergency access vessel complications such as bleeding, false aneurysms, distal embolisation, vessel dissection and occlusion. Vascular surgery and interventional radiology is an important on site safety net for cardiology when complications occur. Cardiology also provides a safety net for vascular surgical patients undergoing major arterial reconstruction where myocardial complications are relatively common post-operatively.

Lanarkshire's renal services are located at Monklands Hospital, and supported by visiting vascular surgeons from the other two sites.

NHSL has a continually evolving vascular service and examples of recent development include:

- Endovascular Aneurysm Repair (EVAR) service, rapidly being accepted as the standard of care for aortic aneurysm and replacing the need for open aneurysm surgery, one of the most major procedures amongst all of the surgical specialties.
- In carotid disease, NHSL has considerable expertise in the technique of carotid artery stenting
- With peripheral vascular interventions the IVRs have embraced new technologies including the Silverhawk catheter which offers a treatment option in patients with severe disease who are not suitable for open vascular reconstruction.
- With regard to varicose veins, NHS Lanarkshire has introduced minimally invasive varicose veins treatments including Endo Venous Laser Treatment (EVLT) and Ultrasound Guided Foam Sclerotherapy. The vast majority of NHSL's varicose veins patients are now treated under local anaesthetic, as day cases and with rapid return to work and minimal side-effects.

2. Improvements to Vascular Surgery

Due to the factors described above, NHS Lanarkshire included the provision of Vascular services as part of 'A Picture of Health' consultation exercise on the delivery of health services in Lanarkshire during 2005/6.

At the conclusion of the consultation exercise in June 2006 the Board of NHS Lanarkshire Board agreed that major inpatient vascular surgery requiring intensive care should be undertaken on one hospital site rather than the 3-site arrangements in place at that time. It was recognised that this change would be implemented through a phased programme over a period of time³.

In May 2007 the first phase of the move towards a single inpatient site was implemented. This established the current 2-site inpatient service at Hairmyres and Wishaw Hospitals. The implementation process followed extensive internal and external stakeholder engagement with patients, General Practitioners, the general public and public representatives. It was indicated in documentation at that time that this was a step towards the Board's strategic intention to provide a single inpatient centre for vascular services.

Since 2007 additional factors have emerged which support the direction of a single inpatient centre for Lanarkshire. These are described below in sections 2.1 – 2.3

2.1 Improved outcomes through concentration of expertise and experience

The optimum outcomes for patients with vascular disease will be realised where the diagnosis, treatment and rehabilitation phases of the care pathway are delivered by clinicians with specific training and experience in this set of diseases². At present, the peri-operative mortality for patients who undergo emergency repair to a ruptured aorta is estimated to be 10%⁴

This represents a much better outcome for patients than was expected even 10 years ago when surgery was largely delivered by general surgeons: at that time some units were experiencing up to 50% mortality⁵. Improvements in clinical outcomes are not solely related to the skills of the team of surgeons: the 4 Lanarkshire vascular surgeons work as a team with their interventional radiological colleagues who provide both diagnostic and perioperative input into the management of the individual patients, both elective and emergency.

As described above, similar synergies exist between the vascular team and the cardiology service.

³ NHS Lanarkshire Board Paper Annex 13, June 2006

⁴ *Two-Year Outcomes after Conventional or Endovascular Repair of Abdominal Aortic Aneurysms*
Jan D. Blankensteijn et al. NEJM 352:2398-2405

⁵ Duncan et al, *Community Mortality after ruptured abdominal aortic aneurysm...*, British Journal of Surgery 2001; 88: 1341

This represents strong evidence that the development of specialist practice and the co-location of these specialists will drive improved service quality and deliver best clinical outcomes for vascular patients.

NHS Lanarkshire continues to support emergency receiving services for all three District General Hospitals in the county.

2.2 Investment in equipment and infrastructure

Vascular procedures are heavily dependent on expensive operative and imaging equipment. These include complex equipment sets in theatre, portable ultrasound machines for theatre and clinic use, laser machines for varicose veins, fixed and portable x-ray imaging equipment and ideally a fully equipped and staffed angiography theatre.

Within Lanarkshire there is a requirement for an extensive replacement programme for diagnostic and vascular imaging equipment. Previous investment in this equipment was made in 2001 when the two new hospitals opened at Wishaw and Hairmyres. It is estimated that a modern suite of interventional radiology equipment with requirement of approximately £1m per hospital site. As future capital allocations are expected to be lower than previous allocations a clear prioritisation exercise will be required to decide where resources should be allocated. NHS Lanarkshire believe that investing in one fully equipped room would be the most efficient use of capital and revenue resources. The overall inpatient activity undertaken within Lanarkshire can be delivered from a properly equipped procedure room on a single site.

2.3 Implementation of AAA screening

In addition to the original drivers for change, in May 2008 the Cabinet Secretary for Health and Wellbeing announced the implementation of a new Scottish screening programme which will detect abdominal aortic aneurysms (AAA) in men aged 65. The implementation of this programme is underway in Lanarkshire, with the goal of starting screening in late 2011.

The clinical model indicated that this will result in both additional referrals to current workload for aortic repair (20-30 EVAR or open repairs per annum)⁶ and also the use of national quality standards across the patient pathway (from referral, through screening to repair and rehabilitation). These standards are currently in development, but are expected to mirror those of the Vascular Society⁷. The goal of these standards will be to significantly improve the peri-operative mortality for patients who need AAA repair to 3.5%.

⁶ National Services Division. *AAA Screening Programme Business Case*, Edinburgh 2008

⁷ Vascular Soc of GB & I, *Framework for Improving the Results of Elective AAA Repair*, www.vascularsociety.org.uk

The steps necessary to see these improved outcomes are dependent on a concentration of skills and experience as described above: these procedures should only be undertaken in hospitals which undertake more than 43 AAA repairs each year⁸. This can only be achieved in Lanarkshire through concentrating vascular activity on one hospital site (Wishaw is currently below this level, and Hairmyres marginally greater).

2.4 Comparison with other NHS Boards and Surgical Specialties

The evolution of the complex inpatient component of surgery towards fewer, larger-volume sites has been reflected across Scotland. This is the case for vascular surgery, where all NHS Boards - bar Lanarkshire and Glasgow & Clyde - have only one inpatient surgical unit (and as part of the NHS GG&C Acute Services Review implementation programme, Glasgow will also move to one site by 2012).

Most other specialist surgical services in NHS Lanarkshire, such as gynaecology, ENT, ophthalmology and maxillofacial surgery are provided as concentrated inpatient services with outpatient and day cases provided as a 'hub and spoke' model. Urology services which were also once a more integral part of general surgery are also provided by this model. Orthopaedic surgery is still undertaken at all three Lanarkshire hospitals: the relatively large volume of orthopaedic admissions and the requirement for dedicated laminar flow theatres has limited the scope for concentration of this service, but the evidence supporting concentrated sub-specialist practice has been reflected by a limited casemix for each surgeon. The trend towards concentration of orthopaedic surgery is reinforced by the conclusions on best value and efficiency contained within the recent Audit Scotland Report⁹.

As such, vascular surgery in NHS Lanarkshire is anomalous as a sub specialist area of practice split across two inpatient sites, and therefore unable to reap the benefits that the other specialist areas have in relation to the developments in clinical excellence that come from a strengthened team

3. Proposal for future provision of vascular services

3.1 Single Site for Inpatient Surgery

In light of the drivers for change identified above, it is proposed that significant benefits to patient care can be achieved through further concentration of vascular surgical intervention to a single unit for NHS Lanarkshire. In addition a single site would avoid the need for duplicated capital investment in equipment at a time of scarce capital resources.

⁸ Holt et al, *Meta-analysis and systematic review of the relationship between volume and outcome in AAA surgery*. British J Surgery 2007;94:970-975

⁹ Audit Scotland, "Review of Orthopaedic Services," March 2010.

There is no evidence that any concentration of outpatient, daycase or community claudication services would improve the quality of patient outcomes and NHS Lanarkshire would wish to maintain the current configuration (and excellent patient access) of these parts of vascular services.

As neither vascular surgery nor interventional radiology is provided at Monklands Hospital, concentrating services and developing new infrastructure there is not a viable option.

This leaves either Hairmyres or Wishaw as the potential single unit of vascular inpatient surgery in Lanarkshire.

Engagement with key stakeholders took place during the Picture of Health forward-planning process from 2005-07. However, it is recognised that time has passed and the clinical planning assumptions require to be assessed again as part of evaluating the proposal to move to only one site. The Scottish Government has adopted a policy of presumption against centralisation of NHS services, and changes must balance any improvements in the quality of patient outcomes against this presumption.

It is proposed that a proportionate stakeholder consultation process be undertaken, as outlined in the appended communications and engagement plan, in line with CEL 4 (2010). As part of this process, internal engagement with approximately 40 staff that would be affected by the proposal would also be undertaken in partnership and in accordance with current human resource procedures.

This consultation will assist the decision making process on whether vascular surgery should be provided at one site: either Hairmyres or Wishaw Hospitals.

This proposal is supported by all of the NHS Lanarkshire vascular surgeons and interventional radiologists with general support from physicians and surgeons across all three sites. The current and proposed arrangements for the management of emergency vascular patients has the full support of the Accident & Emergency Consultants of NHS Lanarkshire.

NHS Lanarkshire will in the meantime ensure that the vascular services currently provided under the aegis of one surgeon at Wishaw will continue, pending a decision of the NHS Board on the future service model. The Board's Medical Director will work closely with the whole vascular team to allow surgery to continue at two sites for the short term.

4. Conclusions

Best available evidence concludes that the continued progression to specialist vascular clinical teams, co-located and supported by dedicated diagnostic infrastructure, will result in improved outcomes for patients with vascular disease in Lanarkshire.

NHS Lanarkshire has the opportunity to progress to a single vascular inpatient centre covering its population. This is driven by recognition of the best service model, the availability of capital investment to replace expensive imaging equipment, and the advent of higher quality standards of care through the patient pathway.

The service change being proposed affects a small proportion of vascular patients and NHS Lanarkshire staff. Around 250 patients would be impacted by this change representing approximately 5% of vascular patient contacts in Lanarkshire. We believe that this does not fall within the definition of “major” service change¹⁰.

Nevertheless, it is recognised that a service change and the location of the future inpatient vascular surgery centre should be carefully considered through targeted and proportionate consultation with staff, clinical teams, patients and the public. This process will enable stakeholder consideration of the options to move towards a single inpatient vascular centre for Lanarkshire. This will inform the NHS Lanarkshire Board’s decision on future configuration.

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¹⁰ Scottish Health Council, “Guidance on Identifying major Service Changes”, February 2010.

ANNEX 2



**‘The Future Provision of NHS Lanarkshire Vascular
Surgery Services’**

NHS Lanarkshire Medical Education Centre Kirklands
Friday 11 June 2010

Report prepared by: Kate Bell
NHS Lanarkshire Change and Innovation Department
23 June 2010

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1. INTRODUCTION

Vascular Surgery inpatient services are currently located on two acute sites in Lanarkshire; at Wishaw District General Hospital and at Hairmyres Hospital. However, NHS Lanarkshire recognises that the current service model is not sustainable on two sites in its current format. The first phase of the concentration of Vascular Surgery inpatient services took place in May 2007 when the service at Monklands Hospital transferred to Hairmyres Hospital. The stakeholder engagement exercise at that time made it clear that this was the first step in a phased move towards a single Vascular Surgery inpatient centre for Lanarkshire.

The current change proposal is to concentrate the existing two-site provision of inpatient vascular services to one inpatient centre on one site. This report provides a description of the stakeholder event held on 11th June 2010 and the work undertaken at that event to reach agreement about a preferred site for the provision of NHS Lanarkshire Vascular Surgery inpatient services.

2. BACKGROUND

The Vascular Surgery specialty and the associated diagnostic specialties in Lanarkshire have responded to an increased level of morbidity through the development of new and improved treatments. This is a continuous process, and NHS Lanarkshire has now reached the stage where there is a need to consider the potential benefits to clinical outcomes that can be achieved through the further concentration of clinical skills, diagnostic infrastructure and quality of care within NHS Lanarkshire.

3. PURPOSE OF THE EVENT

Participants¹¹ were welcomed by Dr Alison Graham, NHS Lanarkshire Medical Director, who described the purpose of the event as engaging with a wide range of stakeholders, through a structured approach, to endorse the one-site model and reaching agreement on the preferred site for the future delivery of Vascular Surgery inpatient services in Lanarkshire.

Dr Graham described the event as an important opportunity to consider the benefits to patient care that could be achieved through further concentration of vascular surgical intervention to a single unit for NHS Lanarkshire, which would be located either at Wishaw District General Hospital or Hairmyres District General Hospital.

4. PRESENTATIONS

4.1 Drivers for Change

Dr Jane Burns, NHS Lanarkshire Interim Medical Director Acute Division, gave a presentation that covered the development of Vascular Surgery service over the past 10 years. She described the current service, recent changes in the consultant establishment and interim arrangements. Dr Burns described the drivers for change as.

- Changes in patient needs - ageing population and increase in diabetes
- Clinical governance – team working and sharing best practice
- Medical workforce pressures – support to consultant workforce
- Improvements in technology – complex hardware and single use items/prosthetics, best value
- Growing synergy with interventional vascular radiology service

¹¹ See Appendix 1 for list of participants

Dr Burns then spoke about interventional vascular radiology and its relationship with vascular surgery. A key consideration in today's deliberations will be the evolving nature of the specialty and its co-dependencies.

4.2 Vascular Services in Lanarkshire now and in the future

Mr Stephen Kettlewell, NHS Lanarkshire Deputy Clinical Director of Vascular Surgery, gave a presentation that detailed the types of vascular conditions. Vascular Surgery services are required by a wide population of patients across several disease categories. He outlined five main disease categories that account for the majority of the elective and emergency vascular workload:

- Aortic aneurysm disease
- Carotid artery disease
- Peripheral vascular disease
- Renal disease
- Venous disease (principally varicose veins)

NHS Lanarkshire has an establishment within Vascular Surgery services of four, full-time substantive vascular consultant surgeons. Interventional radiology within NHS Lanarkshire is currently provided by four full-time interventional radiologists. This level of surgical and radiological staffing matches the national benchmark of one of each specialist per 150,000 population¹². In addition to the close links to interventional radiology, there is also overlap with cardiology services.

Dr Kettlewell noted the provision of Vascular Services necessitates close clinical collaborations with affiliated specialties. Vascular surgery and interventional radiology is an important on-site safety net for cardiology when complications occur. Cardiology also provides a safety net for vascular surgical patients undergoing major arterial reconstruction where myocardial complications are relatively common post-operatively. NHS Lanarkshire has been a region-wide and, in some areas, a national leader in the uptake and delivery of evidence-based, vascular treatments.

A question was asked about what would happen if an emergency occurs on one of the other sites. Dr Kettlewell responded that vascular surgery is currently undertaken at Wishaw General Hospital and Hairmyres Hospital. Vascular outpatient clinics and renal access theatres are held at Monklands Hospital. Vascular emergencies from the Monklands area or hospital are directed to the vascular surgeon on-call for the day and the patient is transferred to their respective site (Wishaw General Hospital or Hairmyres Hospital). In clinical scenarios where a patient cannot be transferred, the vascular surgeon will go to the remote site to provide care.

5. APPROACH AND METHODOLOGY

Following agreement that a stakeholder event was required, a small project team worked together to plan the event programme. The stakeholders for the event were identified by the Acute Operating Division Clinical Divisional Management Team through the Patient Partnership Forums, and the vascular specialty on Wishaw, Monklands and Hairmyres sites. 136 people were invited to attend the event from across a number of key staff groups, as well as patient representatives and individual service users and carers. The Change and Innovation department developed the group work methodology to support stakeholders to reach an outcome i.e. decision on the preferred site of a single Vascular Surgery inpatient unit for NHS Lanarkshire, while ensuring a transparent, rigorous and an auditable process.

¹² Vascular Society of GB & I: Provision of Services for patients with Vascular Disease, London 2009:10

In line with the guidance contained within the short-life, working group report *'Making Difficult Decisions in the NHS in Scotland' (March 2010)*, the challenge was to ensure the decision-making process was reasonable, transparent and justifiable. The report states that *"the reasons for decisions must be based on evidence, reasons and principles that all fair-minded parties (managers, clinicians, patients, and consumers in general) can agree are relevant to deciding how to meet the diverse needs of a population."*

During the morning group work session, each group considered the benefits and disadvantages of Model A (Wishaw) and Model B (Hairmyres), utilising the information that had been set out in the presentations by Dr Kettlewell and Dr Burns.

The areas for consideration in the Benefits Analysis were:

- Benefits
- Disadvantages
- Risks
- How risk may be mitigated
- Challenges to implementation
- Opportunities for further modernisation and improvement

The influencing factors used in the group work session for scoring were suggested by the Change and Innovation department and agreed by the project team. These are aligned to the Institute of Medicine's 'Six Dimensions of Care'¹³, which remain a key foundation of the NHS approach to systems-based, healthcare quality improvement.

Participants were divided into five facilitated groups and asked to assess, in a structured way, the proposed models. This is captured in the tables below.

6. FACILITATED GROUP WORK

This facilitated session captured participants' views about the two proposed models.

6.2 Endorsement of One Site Model

Group members were asked to reflect on the presentations they had heard and the briefing paper circulated in advance of the meeting and consider whether they endorsed the view that inpatient Vascular Services should be provided on a single site.

The outcome of the group work discussion in groups 1 – 4 was a unanimous endorsement of the single site model. Group 5 has two members who did not endorse the single site model. The two people, a member of staff (WGH) and a North Lanarkshire Public Partnership Forum representative in group 5 did not endorse the one site model on the grounds that a) a model C should have been considered to factor in Monklands to the process and that Hairmyres was not central to Lanarkshire and could incur a lot of travel for patients and families from the Monklands area.

6.3 Benefit Analyses

The group work captured a range of views across the six areas for consideration outlined above. These are recorded in the table below.

Table 1: Benefits and disadvantages

BENEFITS	
MODEL A	MODEL B
1. maintain local access to north Lanarkshire people	1. maintain access to patients from south Lanarkshire
2. dedicated vascular expertise and theatre in place	2. concentration of co-located inpatient services on site
3. long standing ethic between clinical	3. team working – vascular, cardiology,

¹³ In 2001, the Institute of Medicine outlined six aims for Improvement for health care in their report, "Crossing the Quality Chasm: a New Health System for the 21st Century."

staff	interventional radiologists which has delivered transformational change in clinical care
4. Specialist Physio on site	4. Interventional Vascular radiology is primarily provided on HDGH
5. Modern site in central Lanarkshire	5. Expansion of integrated service
6. Dedicated vascular operation room	6. Modern hospital with Parking available
7. Continued care at Wishaw	7. Excellent relationship with nursing staff, AHP's and medical staff
8. Experienced vascular surgeon	8. Build on existing radiology service
9. Dedicated staff available for critical emergencies at location.	9. Minimum disruption to existing structure
10. There is already a good model in place for Social Work support (e.g. home care packages) due to the Service Level Agreement between both North & South Lanarkshire Councils	10. New trials artheretomy device
11. Mirrors redesign in other Board areas - NHS Greater Glasgow & Clyde are also centralising their vascular service.	11. No other specialists need displaced
	12. No waiting lists for angio cases
	13. Will improve inpatient care
	14. Cost reduction of equipment being only 1 site
	15. Good MDT working, Only 1 surgeon to move, Medical staffing and recruitment + 4 IR consultants ,Dedicated IR nurses
	16. Existing expertise on site with OT services re-direct, Strong road links with other board areas for impact of AA screening
DISADVANTAGES	
MODEL A	MODEL B
1. Shortage of radiology facilities	1. Patient transfer
2. Lack of team working	2. Travel for visitors
3. Lack of accommodation/offices/existing beds	3. Relocation of staff
4. Bed availability - No bed availability because of high volumes of emergencies	4. Dismantling of vascular services at Wishaw
5. No interventional radiology or interventional radiologists	5. No sterile endovascular operating room
6. Temporary ownership of day case patients from other sites	6. No designated vascular physiotherapy
7. Dis-aggregation at interventional service or need to displace other services to accommodate	7. Temporary ownership of day care patients from other sites
8. Need to provide a service for cardiology	8. No under 65 rehab

9. 3 vascular surgeons on 1 site already	
10. If vascular interventional is split from rest of IR – would need an interventional suite on both sites and interventional theatre	
11. Additional radiography training/personnel required to work it.	
12. No laser equipment at Wishaw	
13. Vascular theatre session at Wishaw is currently under-utilised, e.g. late starts, early finishes	
14. Change to job plans and timetable for Vascular Surgeons would be needed in order to fit in with theatre availability	
15. Loss of Physicians Assistants - who currently work on the Hairmyres site	
16. Increased travel time for patients from Monklands and Hairmyres areas.	

Table 2: Risks associated with models

Model A	
RISKS	MITIGATION SUGGESTIONS
1. Reduction of Primary Care opinion on other sites – access	1. Join up all 3 sites for vascular MDT via tele medicine.
2. Lack of accommodation/offices/existing beds	2. Hub and spoke office on each site
3. Shortage of critical care beds ICU/HD	3. Remodel critical care bed requirements ICU/HDU
4. Bed pressures	4. Vascular level 2 beds
5. Staffing Recruitment & Retention of medical and other staff groups	5. Recruit another vascular consultant/surgeon x 2 + Recruit additional supporting staff – medical
	6. Duplicate radiology equipment
	7. Build a super NHSL hospital on a central site in Lanarkshire
	8. Replicate the Interventional Radiology Service on the Wishaw site
	9. Phased transfer of the service to mitigate any risk to patients during the transitional period
Model B	
RISKS	MITIGATION SUGGESTIONS
1. Lack of rehab beds	1. Improve rehab services post surgery
2. Lack of specialist AHP's	2. Specialist AHP staff
3. Recruitment and retention	3. Appoint specialist vascular physiotherapy
4. No resources to build endovascular operating room	4. Money to build endovascular suite
5. Shortage of ICU/HDU beds	5. Radiology space/equipment
6. Beds clogged with patients for rehab	6. Reinforce and build on existing resources

7. Loss of trained staff at other sites	7. Strengthen links with diabetes/renal/cardiology services
8. Reduce vascular presence at Wishaw	8. PIMs
9. Government will make cuts if service on 1 site	9. Communication
10. Implications on other 2 sites of transferring inpatient amputees.	10. Ensure staff developed detailed job plans, PDP's, succession planning
	11. Team working
	12. Strong AHP service and cross site agreement on rehab
	13. Remodel critical care beds ICU/HDU.

Table 3: Challenges to Implementation

MODEL A	MODEL B
1. Rehab services – 1 site?, 1 + (2) sites?, 3 sites?	1. Increase costs - ↑ equipment and staff required to provide high quality care
2. Repatriation of patients back to own site	2. ↑ in staffing levels to meet consultant levels
3. To ensure the smooth flow of the patient's medical record from home site to the site where the concentrated service is based	3. Repatriation of patients? Stay on 1 site
4. Accommodation not readily available	4. Pressure on beds, high number of bed days
5. Build new facilities with costs involved	5. Perceived loss of services by public (Wishaw area)
6. Movement of large numbers of staff – 3 consultant surgeons, 4 vascular radiologists and nursing and radiography expertise	6. Support accommodation requirement lessened (office space)
7. Relocation of staff move staff required (whatever the site)	7. Continuing improvement of facilities
8. Moving staff – transportation of patients – lack of theatres.	8. Consider flow of patients medical records from home site, to site on which concentrated service is based
	9. Patient transport
	10. Transport of patients
	11. Arrangements for IP transfers
	12. Develop theatre staff expertise
	13. Interventional theatre
	14. Need to resource endovascular operating room
	15. Specialist equipment for dedicated theatre.

Table 4: Opportunities for modernisation and improvement

MODEL A	MODEL B
1. Decant another specialty to a different hospital	1. Specialist team 24/7 for theatres, wards and support in critical care
2. Continued improvement of rehab in/out patient	2. New radiology kit
3. New facilities built to support services	3. Opportunity for single unit including HDU, acute and rehab
4. Co-location of Out Patients services with other specialties	4. ? vascular rehab co-ordinator XO ↑ discharge times and perhaps continue rehab at home
5. Joint clinics with interdependent specialties	5. Joint medical vascular wards
	6. Link up with 1 or 2 named medical consultants staff for joined up care of inpatients
	7. Requires money to build endovascular suite
	8. Progressive development of vascular services in NHSL
	9. 3 site vascular MDT via telemedicine
	10. Equipment concentrated on site
	11. Improve patient care – more expertise
	12. Better use of expensive equipment.
	13.
	14.

There were a number of issues which came up during the discussion which the Group felt were relevant whichever Model was chosen as the preferred option:

- Repatriation of patients post-surgery: the need for an agreed policy/protocol for repatriating patients to their local site following surgery was felt to be a key factor in the concentration of inpatient surgery to one site.
- The need to review the bed complement at whichever site was chosen would also be key in mitigating any impact on beds on that site.
- The impact of the concentration of services on NHS Lanarkshire’s ability to continue to provide emergency general surgical receiving.
- Discharge Planning and links with support services such as Early Supported Discharge, Allied Health Professionals, Social Work Services and Slow Stream Rehabilitation needed to be addressed.
- Consideration of the potential impact on Allied Health Professional Services on both sites – to ensure that they had the necessary skills to deal with these patients – including the increased demand for rehabilitation services.

7. ANALYSES AND SCORING

Kate Bell, Change and Innovation Manager, gave a presentation to explain the approach to ranking the options. The presentation also covered the approach taken by Kate in conjunction with a small group of experts from the service (project team) to determine the influencing factors (see Table 5) and their relationship to delivering safe and sustainable Vascular Surgery services in Lanarkshire.

Each group was invited to consider each of the influencing factors in turn and discuss their importance to the delivery of Vascular Surgery inpatient services.

Individuals were then asked to consider all of the information available to them and proceed to rank the influencing factors for both Model A and Model B, using the rating scale (see Table 6) agreed by the project team.

Table 5: Influencing factors

FACTORS	Weighting	FACTORS	Weighting
Quality and clinical governance	2.0	Patient Centredness	0.8
Specialty structure	1.9	Availability and accessibility	0.6
Standards and measures	1.8	Development and continuous improvement	0.5
Staffing	1.4	Effectiveness and efficiency	0.4
Clinical equipment and technology	1.0	Sustainability	0.2

Table 6: Rating scale

All Groups	Group 1	Group 2	Group 3	Group 4	Group 5	ALL
Model A (Wishaw)	132.1	260.7	207.9	319.7	211.3	1131.7
(%)	(23)	(35)	(35)	(42)	(29)	(33)
Model B (Hairmyres)	433.3	483.4	380.9	445.3	521.4	2264.3
(%)	(77)	(65)	(65)	(58)	(71)	(67)

On the conclusion of the scoring exercise, Kate Bell lead facilitator aggregated the individual and group scores on a Master Scorecard against each of the 10 influencing factors (as shown in Table 5), which had been agreed by the project team.

Table 7 - Aggregated Scores

Headlines

- Out of 62 people who scored only 2 scored Wishaw District General Hospital (WG) highest
- All Wishaw Staff bar one scored Hairmyres District General Hospital (HM) higher
- All participants in 4 out of 5 groups scored HM higher

- Across all of the groups 1 patient (MK) and 1 staff member (WG) scored Wishaw higher

At the planning stage for this event it was agreed that a satisfactory confidence margin would be of no less than 20%. The analysis of scoring at group and overall levels (as set out in Table 7) shows this margin of confidence was realised not only overall (33%), but also across all groups (23% - 42%).

8. CONCLUSION

The conclusion from the scoring exercise was that Vascular Surgery inpatient services should be centralised on one site and that that site should be Hairmyres Hospital.

9. NEXT STEPS

Judith Hope, General Manager Acute Services Surgical Division, brought proceedings to a close by thanking all participants for their views, ideas and suggestions and confirming that the scorings would be further analysed and validated independently by the Change and Innovation department. She confirmed that the recommendation from the stakeholder event will be taken by the Director of Acute Services to the Modernisation Board for approval.

10. EVALUATION

The stakeholder event had a total numbers of 83 attendees, which number excludes facilitators and scribes. Stakeholders included members of the public who were patients, as well as representatives of the Patient Partnership Forums, the Scottish Health Council¹⁴ and staff from a range of NHS Lanarkshire departments and specialties with an interest in Vascular Surgery services. The stakeholders also included one local councillor.

Thirty-nine individuals took the time to complete and return their evaluation forms.

The venue and acoustics were rated very good or good on all returns with only a few rating lunch as poor. The presentations evaluated very good to good across all returns. Overall, the format for the groupwork sessions was well received; (13) individuals rated the format and the opportunity to ask questions as very good or (25) rated these elements as good with one participant rating the format as very poor and other aspects [poor with a good rating for group discussions being understandable. The evaluation forms recognised all presenters made a clear effort, rating them as very good or good, recognising their limited use of jargon and use of plain English to make sense of technical and clinical terminology.

Patient comments included:

“Essentially interesting and instructive, a very convincing case put by the consultants, reflected in my scoring in favour of Hairmyres”.

“Thanks for the opportunity”

Staff comments included:

“Felt all points were taken into account – surprised costing was not presented for each of the options.”

“Not the best way to plan the future of the vascular service.”

“Well organised and efficient, I feel the event met my objectives and expectations of moving the clinical and service model for vascular services forward, hope the next stage does not take months and a the new model is in place for winter period.”

The venue was highly praised; 31 people rated it very good or good for audio and visual capability. Eight individuals commented negatively on the lunch provided; rating it poor (7) or very poor (1).

One further point of learning was that chairs should be made available, especially to patients, at the buffet lunch

¹⁴ Scottish Health Council – role as an observer (did not vote in the process)

APPENDIX Participants

	<i>Name</i>		<i>Title</i>
1.	Allan	Caroline	Pre-Admission Assessment, WG
2.	Angus	Jane	ITU, HM
3.	Bain	Donald	Consultant Vascular Surgeon, HM
4.	Barbour	Margaret	Senior Nurse, Surgical Division, HM
5.	Bell	Kate	Change & Innovation Manager
6.	Brazier	Louise	Occupational Therapy, HM
7.	Burns	Jane	Interim Divisional Medical Director, Acute Services
8.	Campbell	Annemarie	Head of HR, Medicine & Surgery
9.	Clark	Paul	Interim Operational Manager, Orthopaedics & Ophthalmology, HM
10.	Martin	Jim	Head of Physiotherapy, HM
11.	Docherty	Lesley	Clinical Nurse Manager, ICU, HM
12.	Dodd	Frances	Associate Nurse Director, Surgical Division, HM
13.	Dolan	Liz	Directorate Administrator, Surgical Division,
14.	Downey	Martin	Consultant Surgeon, WG
15.	Evans	Gillian	ERC Advisor, HM
16.	Farmer	Betty	Secretary, MK
17.	Forrest	Lorraine	Project Assistant, Change & Innovation
18.	Gorman	Jacquie	Recovery Sister, HM
19.	Graham	Alison	Medical Director, NHSL
20.	Hales	Linda	Vascular Secretary, HM
21.	Hand	Malcolm	Renal Physician, MK
22.	Hannah	Gill	Training Officer
23.	Hodsman	Nadia	Consultant Anaesthetist, WG
24.	Hope	Judith	General Manager, Surgical & Critical Care Division, MK
25.	Houlden	Lorraine	Day Surgery, HM
26.	Johnston	Cathy	Sister, X-Ray, HM
27.	Johnston	Liz	Ward 5, HM
28.	Kettlewell	Stephen	Consultant Vascular Surgeon, HM
29.	Lauder	Colin	Head of Modernisation
30.	Lawson	Caroline	ITU, HM
31.	Lees	Suzanne	Directorate Secretary, WG
32.	Mackintosh	Chris	Associate Med Dir, South CHP
33.	Madden	Georgie	Health Discharge Manager, HM
34.	Malekian	Mehrdad	Associate Medical Director, Emergency & Medicine Division, WG
35.	Mark	Marion	General Manager, Women's & Diagnostics, WG
36.	Marsh	Geraldine	Service Improvement Manager
37.	McCann	Anna	Sister, Vascular Theatre, HM
38.	McConville	Karen	Secretary, Ward 16, WG
39.	McGoldrick	Eddie	Radiology Manager, HM
40.	McGowan	Anne	Bed Manager, MK
41.	McGurn	Brian	Consultant, Care of the Elderly, HM
42.	McLean	Beverley	Bed Manager, HM
43.	McLennan	Tina	Consultant Anaesthetist, HM
44.	McNaughton	Morag	Community Claudication, MK
45.	McTavish	Lynn	Service Improvement Manager
46.	Meek	Margaret	Service Manager, Older Peoples' Services, WG
47.	Miller	Marion	Vascular Secretary, HM
48.	Miller	Peter	Theatres, WG
49.	Mitchell	Andrew	Consultant Anaesthetist, HM
50.	McKay	Craig	Communications Manager
51.	Mukhopadhyaya	Babu	Consultant Physician, HM
52.	Murch	Cliff	Consultant Radiologist, HM

53.	Murray	Sharon	Senior Nurse, Emergency & Medicine Division, HM
54.	O'Brien	Fiona	Theatre Manager, WG
55.	O'Malley	Alison	Clinical Nurse Manager, Theatres, HM
56.	OSuilleabhain	Brian	Public Health Consultant
57.	Ramage	Katie	Pain Control Nurse, HM
58.	Reid	Donald	Consultant Vascular Surgeon, WG
59.	Riddock	Lesley Ann	Staff Nurse, Ward 5, Hairmyres
60.	Scott	Roy	Consultant Vascular Surgeon, HM
61.	Stobie	Jane Marie	Occupational Therapy Mgr, HM
62.	Tennant	Yvonne	Health Records Manager, HM
63.	Tolson	Lorraine	Service Support Manager, Surgical Division, WG
64.	Traynor	Jamie	Renal Physician, MK
65.	Warnock	Pauline	Service Manager, General Surgery, Urology & Endoscopy, WG
66.	Houlden	Lorraine	Day Surgery, HM
67.	Halcrow	Gavin	Service Manager, Anaesthetics & Theatres, MK
68.	Henry	Angela	Waiting List Co-ordinator, WG
69.	Cunningham	Moira	Referral Management Service, HM
70.	O'Brien	Ian	Consultant Diabetologist, WG
71.	Whelan	Louse	Scottish Health Council
72.	Low	Joe	Councillor
73.	McAinsh	Patricia	Patient (Coatbridge)
74.	Muir	William	Patient (East Kilbride)
75.	Scott	Margaret	Patient (Coatbridge)
76.	Law	George	Patient (Uddingston)
77.	Wood	Harry	Patient (Airdrie)
78.	Girdwood	William	Patient (Larkhall)
79.	Lyndsey	Anne	PPF Rep- South CHP (Biggar)
80.	Lyndsey	Mr	PPF Rep- South CHP (Biggar)
81.	Smith	Bob	PPF Rep – North CHP
82.	Ballantyne	Fraser	Patient (came along on day)
83.	Taylor	Alan	Patient (came along on day)

MK – Monklands District Hospital, HM – Hairmyres District Hospital, WG – Wishaw General District Hospital

Group	Leads	Designation
1	Kate Bell	Change and Innovation Manager
2	Lynn McTavish	Service Improvement Manager
3	Geraldine Marsh	Service Improvement Manager
4	Frances Dodd	Associate Nurse Director
5	Jill Hannah	Organisational Development Trainer
Group	Scribes	
1	Lorraine Tolson	Service support Manager
2	Suzanne Lees	Directorate Secretary
3	Betty Farmer	Clinical directorate secretary
4	Liz Dolan	Directorate Administrator
5	Lorraine Forrest	Change and Innovation Project Officer

A special thanks to Lynn McTavish Service Improvement Manager and Lorraine Forrest, Projects Officer Change and Innovation department who worked very hard to co-ordinate the invitations and to copy and disseminate the papers and presentations for the event.

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Copies of this report and the presentations from the event can be accessed at the Change & Innovation Department FirstPort site. Click [here](#) to access.