NATIONAL RETRIEVAL GROUP

Report on Vanguard Project from Workforce Transformation Board

1. Status – Commercial in confidence

2. Executive Summary

This report is to inform the ODT Senior Management Team (SMT) of the background to the report, basic data analysis and findings with recommendations for future steps.

The NORS review recommended implementing a single scrub practitioner at all retrievals instead of the cardiothoracic and abdominal teams each bringing their own practitioner. To ensure this model was safe and practical, it was piloted with limited NORS teams (Vanguard Project) between May and December 2017.

The Vanguards are complete, but the final report will not be available until September 2018.

CPB approved the recommendations below.

3. Recommendations

SMT is asked to approve the following recommendations:

1. The National Organ Retrieval Service (NORS) Teams remain in standard configuration until the impact of novel technologies and recommendations for donor management are implemented.
2. The potential for the shared scrub practitioner to be revisited in the future.
3. To communicate findings and recommendations from this report to the wider retrieval community.

4. Background

The National Organ Retrieval Service (NORS) Review published in May 2015 recommended a reconfiguration of NORS team structure in line with other organ procurement organisations. The recommendation was to introduce a single Scrub Practitioner who would assist both the abdominal and cardiothoracic teams during multi organ retrieval, instead of each team providing a Scrub Practitioner.
At the Clinical Retrieval Forum (CRF) in December 2015 this recommendation was discussed in detail. Because of safety concerns raised by the retrieval community the introduction of the Shared Scrub practitioner was suspended to allow for a structured plan for testing and, if clinically safe, gradual implementation.

Although the model had been safely proven in Donation following Brain Death (DBD) retrievals (the Scottish Multi-Organ Team have been supported by a single scrub practitioner for some years), the UK organ retrieval community wanted reassurance that this model would be safe to support Donation following Circulatory Death (DCD) retrievals. Therefore, simulated retrievals were held in June and November 2016 to test the validity of the single scrub practitioner. Representation was invited from all NORS teams to participate, view and comment and the simulations were well attended. Results confirmed this model was safe for DBD but there were genuine concerns highlighted by the DCD simulation regarding safety, team stress levels and maintenance of the sterile field.

The Vanguard Project Board was therefore established with the intention to safely test the introduction of the Shared Scrub Practitioner role within the live setting whilst having the ongoing support of the cardiac scrub practitioner. The project was supported by robust methodology for managing change and the research aimed to inform the project by investigating the effects of team reconfigurations on NORS staff from a performance psychology perspective. In addition to team performance evaluation, the data collected via observation aim to establish how the proposed team reconfiguration is perceived by the wider operative community.

The Human Performance Science research group from the University of Edinburgh was engaged to carry out the research project to explore the effects of team reconfiguration on individual and team performance; to formulate data collection forms and to subsequently analyse this data.

It should be noted that this was the first behavioural research project ever undertaken within the UK organ retrieval service, which is a major innovation. The data were collected using paper based questionnaire forms completed by team members and observation by either the Specialist Nurse in Organ Donation (SNOD) or donor hospital staff.

Full data analysis is ongoing and a final report will be available by the end of September 2018.

5. Criteria

The vanguard project took place from 29 May 2017 to 31 December 2017, and the following NORS teams were chosen based on previous experience and geographical proximity to achieve maximum results.
Abdominal

Edinburgh
Newcastle
Addenbrookes

Cardiothoracic

Newcastle
Papworth

The Vanguard Project included all standard multiorgan retrievals from DBD and DCD donors.

A Standard Operating Procedure (SOP) was designed for use when one of the above abdominal teams attended a multiorgan retrieval along with one of the above cardiothoracic teams in any combination.

6. Initial Findings

At the time of writing this interim report, full statistical analysis is not available. However, the initial statistics provided by Edinburgh University are included in Appendix One.

Preliminary data analysis suggests that out of the 33 opportunities for shared scrub practitioner to be utilised only 9 were undertaken.

Initial findings combined with verbal feedback received at Vanguard meetings found the reasons for missed opportunities were:

- a full Cardiothoracic Team did not attend some retrievals, meaning that the Cardiac Scrub Practitioner was required to fulfil the first assistant role simultaneously. The utilisation of the Cardiothoracic Scrub Practitioner as first assistant was cited as a reason not to undertake Vanguard.
- a reluctance or lack of commitment from some NORS teams to participate in Vanguard
- a lack of experience/confidence of the scrub practitioners involved
- a lack of clarity within the Standard Operating Policy (SOP) causing confusion

The NORS Workforce Transformation Project Board members agreed many positive aspects had emerged from this research, such as the need for standardised instrumentation and protocols, improved collaboration and closer team working, recognition of human factors, as well as experiential opportunities for the abdominal scrub practitioner.

All NORS Teams can learn from this collaborative approach to training and working and should be encouraged to do so in the future.

More training for team participates, in particular abdominal scrub practitioners prior to the commencement of the study potentially would have increased commitment, with the realisation that monitoring feedback received would have improved the ability to undertake the task. This insight will inevitably inform us on how to implement recommendations in the future.
The University of Edinburgh will continue to research adaptive expertise and the effects of change to organ retrieval practice on team and individual performance with the exploratory study (commencing February 2018) which is interview based and most likely will include links and references to the Vanguard project.

7. Recommendations

Since the NORS Review Recommendations were published in May 2015, there has been a significant increase in use of these novel technologies by NORS teams which would not have been apparent to the Review Board.

This was recognised at the NORS Workforce Transformation Project Board meeting in November 2017 where it was noted that the introduction of novel technologies may have impact on the safe implementation of the Shared Scrub Practitioner role.

There is potential for the Shared Scrub Practitioner role to be revisited in the future, when the impact on the role of novel technologies is known, and recommendations for implementation of donor management (the scout service) are clear.

All lessons learnt from Vanguard will help inform NHSBT on future decision making and support the process for management/implementation of change within NORS.

The cadaveric simulation video can be utilised in the future to enhance teaching and training of the multidisciplinary organ retrieval teams.

Therefore, the recommendation is that the NORS team configuration will remain as it is. This will allow for assessment of new roles and novel technologies to be tested and introduced as routine retrieval practice.

8. Next Steps

The final report will be available in September 2018 with a recommendation that the NORS Workforce Transformation Project Board meet to discuss the findings. An engagement event will then be held with the wider retrieval community to disseminate the findings of the report.

As an interim measure a recommendation that communication to the NORS community regarding maintenance of standard team configuration is shared.

Author
Cecelia McIntyre RGN
Retrieval and Transplant Project Lead Specialist
March 2018

Responsible Director
Karen Quinn
AD for UK Commissioning
APPENDIX ONE

Results

At the time of writing this interim report full statistical analysis is not available. What follows is an overview of the types of data collected and some descriptive statistics.

During the Vanguard period 336 multiorgan retrievals were undertaken in the UK of which 186 (55%) were attended by at least one of the Vanguard participating teams.

Standard Configuration:

A total of 136 retrievals classified as standard configuration (1 participating team and 1 non-participating)
74 occasions when a participating Cardiothoracic Team retrieved with a non-participating Abdominal Team
62 occasions when a participating Abdominal Team retrieved with a non-participating Cardiothoracic Team

Vanguard Configuration: (both teams participating in study)

50 occasions when both participating teams attended together
Of these 33 (66%) both teams proceeded
3 occasions (6%) when neither team proceeded
During this seven-month research project data were collected on 95 multiorgan retrievals (51% of all multiorgan retrievals attended by the participating teams)

The team members indicated that the Shared Scrub Practitioner will be attempted before the procedure has started in 24% of vanguard opportunities (n=12);

An observer reported at the end of the procedure that a Shared Scrub was utilised on 9 occasions (27% of all proceeded vanguard opportunities).

Some of the comments from participants suggest that more training for all involved is necessary for the new role to work successfully.