Dear Colleagues,

We are delighted to introduce this QuARC newsletter. The aim is to update you on current and future projects which are centrally co-ordinated by the NIAA Health Services Research Centre (www.niaa-hsrc.org.uk) and led locally by the Quality Audit and Research Coordinators, NAP local leads and SNAP leads.

In this edition, we are able to highlight a number of high profile projects which you have made possible. A key milestone was the publication of the first patient report of the National Emergency Laparotomy Audit in June 2015. (www.nela.org.uk/article.php?newsid=1461). The heroic efforts of local teams on data collection have led to an important report which received a great deal of press coverage and highlighted both the magnitude of harm associated with this high risk procedure (national inpatient 30-day mortality 11%) and the variation between hospitals in the delivery of processes associated with high quality care. We have an update from the Research and Audit Federation of Trainees about the work of the Trainee Research Networks. We report publication plans for SNAP-1 and work which has begun towards delivering SNAP-2 which will focus on the use of critical care after surgery.

In addition we have a number of important announcements and can share with you some exciting plans for the future. A Director for the new Clinical Trials Network has been appointed. NAP6 will be launched in November and will focus on perioperative anaphylaxis. We are in the process of setting up a national perioperative quality improvement programme (PQIP) and are still open for sites to register interest in participating. We have the dates for your diaries for next year’s QuARC event and the annual quality improvement training day. Finally, we are pleased to promote a new website which is being launched which has been developed by trainees and consultants in anaesthesia and perioperative care and will support QI training for trainees, consultants and allied health professionals, according to the RCoA curriculum.

We hope to produce this newsletter quarterly, and are keen to hear your feedback on the style and content. In addition, further to a suggestion made at this year’s QuARC day in March, we are keen to facilitate the sharing of locally driven ideas for QI and challenges or successes you may have had. Please do get in touch as we want to support the QuARCs being an effective and active national network, and are reliant on you to help us understand how we can best support you.

Many thanks for your support and do keep in touch.

Mike Grocott
Ramani Moonesinghe

www.niaa-hsrc.org.uk
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HSRC News

**Director appointed for UK Perioperative Clinical Trials Network**

Professor Rupert Pearse has been successfully appointed as Director of the UK Perioperative Medicine Clinical Trials Network for the National Institute of Academic Anaesthesia (NIAA).

The establishment of the Clinical Trials Network sees the NIAA entering an exciting new phase of its development. Under the supervision of Professor Pearse, the Network will seek to identify, develop, support and coordinate the efficient delivery of large-scale clinical trials in order to improve the health outcomes of patients receiving perioperative care in the UK.

Professor Pearse is currently Professor of Intensive Care Medicine at the William Harvey Research Institute, Queen Mary University of London and at the Adult Critical Care Unit, Royal London Hospital, Barts Health NHS Trust. His research interests lie in the development of perioperative medicine in order to improve clinical outcomes following major surgery. He has considerable experience of a range of research methodologies, in particular multicentre trials, cluster trials, and large epidemiological studies, but also health services research and translational research.

The NIAA is delighted to be able to appoint Professor Pearse to this challenging and important role. Further details about the activities of the Network will be shared via the NIAA website and mailing list over the coming months.

The project group are currently putting the structures of the Network together and hope to invite investigators to join by spring 2016. It is planned that the CTN will officially launch at an NIAA event planned for Thursday, 14 April 2016 – please put this date in your diaries! More information and a full programme will be circulated in due course.

**A thank you from the Patient Blood Management Audit**

Dr Kate Pendry, Consultant Haematologist and Clinical Director for Patient Blood Management NHSBt at the Manchester Blood Centre would like to say a big thank you to all of the QuARCs that helped with the Patient Blood Management audit. She reported that they recruited nearly 4,000 patients into the audit and credited much of this to the help of anaesthetists in the >160 Trusts that participated.

Many thanks all!

**Training in quality improvement – PRISM online resource available now**

We are working on a number of resources to support training and development in QI. We are aware that many QuARCs and consultants in general, do not feel confident in QI methodology and are finding it challenging when trainees need support and supervision in QI projects.

The London Academy of Anaesthesia has recently funded a new website (PRISM – PeRioperative Improvement Science and Management) which is aimed at disseminating information and learning opportunities regarding improvement work. Within it is a QI training module which is based on the RCoA Annex G Improvement Science curriculum. The resource has been developed by an enthusiastic bunch of trainee and consultant anaesthetists, led by Dr Maria Chazapis, who has spent the last year working as a Darzi fellow with the NIAA-HSRC and the UCLH Surgical Outcomes Research Centre.

The PRISM resource can be found at [www.prism-ed.com](http://www.prism-ed.com) and the learning module can be accessed from the home page. Do let us know what you think!
Diary dates
– book your leave now!
Again, next year, the QuARC annual meeting will dovetail with an Improvement Science training day and we look forward to welcome you to both events which will be held on 24-25 February 2016.

NHS England/Health Foundation Q Initiative

The RCoA are delighted that several anaesthetists have been appointed to the Founding Cohort of the NHS England/Health Foundation Q initiative.

The Q initiative has been developed in response to the recommendations of the Berwick report of the lessons to be learned in the wake of the Mid Staffs crisis. The aspiration is to create 5,000 fellows (to be appointed in stages over the next five years) who will lead and spread adoption of improvement and safety initiatives across the NHS. Q fellows have been recruited from the full range of stakeholders across the NHS – nurses, doctors, managers and other allied health professionals. The founding cohort will help shape the future plans for the Q fellows and so it is fantastic that anaesthesia is so well-represented.

More information about Q can be found here.

New NIAA Annual Scientific Meeting and Award for Researchers

The NIAA will be launching a new, gold standard award at the inaugural NIAA Annual Scientific Meeting on Thursday 14 April 2016. Developed by Professor Fang Gao Smith, the award will be open to all research active investigators of anaesthesia, critical care, perioperative medicine and pain within the UK who are engaged in a higher degree programme. Applicants will be asked to submit an abstract based on a clear, evidence based research question, and shortlisted applicants will then be invited to present at the meeting.

The meeting will also focus on the launch of the UK Perioperative Medicine Clinical Trials Network and provide an opportunity for those wishing to participate in the network to discuss the art and craft of clinical trials.

Further details will be advertised on the NIAA website shortly.
NAP update

NAP6
The main thrust of NAP activity is currently on NAP6 (peri-operative anaphylaxis) for which the clinical Lead is Professor Nigel Harper. The launch date is 5 November 2015. The project will require close collaboration between anaesthetists and their allergist/immunologist colleagues. When you read this regulatory approvals will have been signed off and the most pressing item is ensuring that as for NAP3–5 we have a local Co-ordinator for all hospitals. If your hospital does not have an LC please do work out who is going to take on this role and contact nap6@rcoa.ac.uk to let us know.

NAP5 was a rather complicated project and as a result several additional projects were added midway through it. For NAP6 we have a clear vision of the phases

» Phase 1 (November 2015) – a baseline survey of anaesthetists (and separately of allergist/immunologists), similar to the NAP5 baseline survey, to examine knowledge and preparedness before NAP5.

» Phase 2 (November 2015–November 2016) – a year-long registry of all cases of severe peri-operative anaphylaxis.

» Phase 3 (provisionally April 2016) – a two day snapshot activity survey of peri-operative allergen exposure. Similar to that carried out in NAP5 – but collecting new information rather than duplicating the 2014 survey.

Look out for updates in the near future and please do ensure your department is already ‘signed-up’.

NAP3–5
The previous NAPs continue to generate discussion, inform practice and drive quality improvement. When the topic of awareness during general anaesthesia entered the popular news in the late summer the knowledge gained from NAP5 was very useful in clarifying misunderstandings and providing accurate reassuring information to the press and public. There is still much work to do on national efforts to implement the NAP5 recommendations (I hope local efforts are in full swing) and you will hear more on this in the near future.

Many of you will have participated in the 2013 survey that explored changes in practice following from NAP4. The results and in and were presented to DAS in 2014. The author needs to find time to write these up and by the time you see this I will have submitted the paper.

One of the initial aims of NAP3 was to produce a document to guide local practice and aid risk reduction when using peri-operative epidurals. This was delayed for a number of reasons but later this year the NAP3 pathway will be out for consultation. Lying somewhere between an aide memoire and a nursing pathway for use with every patient the challenge is to create something that is acceptable, practical and does not fall between the two stools. Your feedback will be of great value in completing this project.

And finally...
NAP6 will be my last NAP. I currently fill the newly devised ‘Director of NAPs’ role and this will become vacant in Autumn 2016. For those with interest and ambitions look out for the advert – and feel free to contact me to discuss the role.

Tim Cook, Director of NAPs
tcook@rcoa.ac.uk
First NELA Patient Report – publication and launch

After months of data analysis and multidisciplinary collaboration the audit’s Project Team was absolutely thrilled to launch the first NELA Patient Report on Tuesday, 30 June. The report generated significant interest from the press and was well received by an international audience at the 15th EBPOM Congress in Evidence Based Perioperative Medicine where it was launched. The Report is available via the Reports page of the NELA website, here.

This document reports the findings of the first year of data collection of the NELA patient audit, which ran from January 2014 to November 2014. Also included in the Report are real examples of best practice across the NHS and several recommendations, made by the multidisciplinary Project Team.

As with other National Audits and the NELA first Organisational Audit Report, the delivery of several key processes of care is reported for every hospital in England and Wales that participated.

There was wide variation in processes across the country, with particular areas which should be focuses for future improvement efforts – these include:

» The clinicians’ opinion of the risk of death after surgery was documented in only just over half of patients. This may mean that patients and family were not fully informed about the risks of surgery, or that high risk patients were not allocated the appropriate resources.

» One in six patients did not arrive in the operating theatre within the recommended timeframes, despite the urgent nature of the surgery.

» A stark contrast with planned surgery was evident in admission rates to critical care after surgery (where higher levels of nursing care, monitoring and life-supporting treatment can all be provided). Only 60% of emergency laparotomy patients were admitted to critical care directly

This Report is testament to the countless hours of hard work put in by NELA Leads and participants across England and Wales, who have worked tirelessly to ensure that accurate and thorough patient information is captured and fed back to the NELA team.

Without the incredible help received by hospital staff who have embraced and carried out the audit this Report would not be possible. It is for this reason that the NELA team once again expresses their deepest gratitude towards everyone involved in the Audit.

The second year of patient data collection is well underway and the next rounds of analysis are anticipated to include hospital-level patient outcomes.
Sprint National Anaesthesia Projects (SNAP)

SNAP-1 update
We are so grateful to the QuARCs, trainees and all local investigators who made SNAP-1 such a success. Data were collected on over 15,000 patients in two days, in over 90% of NHS acute Trusts. This is undoubtedly the most comprehensive exercise in measuring patient-reported outcome in anaesthesia which has been undertaken in the UK and worldwide. Our methods paper has been published and all local investigators named as collaborators.

What is happening about SNAP-1 now?
The central study team are on the verge of being able to submit the main results paper to a peer-reviewed journal. While it seems a long time since the study ended, there was much work to do on cleaning and analysing the database, and we are grateful for your patience. We hope that several manuscripts will be accepted for publication and look forward to providing you with updates as we receive feedback from peer reviewers. The peer review process usually takes about six months from manuscript submission to acceptance for publication, so we hope (fingers crossed) to have good news for you around Christmas.

As well as the publications, our ambition is to use the data which was generated to update and improve the quality of patient information leaflets which are provided prior to surgery and anaesthesia. We have data on hundreds of patients undergoing different types of surgery using different types of anaesthesia technique, which will enable us to provide estimates of the risk of various adverse outcomes such as pain, thirst, drowsiness etc, and therefore help improve patient expectation of their procedure and its short-term outcomes.

Furthermore, once the manuscripts are published, we will re-open the database to enable anaesthetists to collect and enter their patient-reported outcome data so that they can compare outcomes for their patients against the national benchmark. We hope that this will be a useful resource for anaesthesia departments and individual anaesthetists and look forward to updating you on progress with this in due course.

SNAP-2: EPIdemiology of Critical Care after Surgery (EPICCS)
We are delighted to be able to update you on plans for SNAP-2. This study will be jointly funded by the AAGBI (via an NIAA awarded project grant) and the RCoA, and will focus on trying to address the issues around admitting high risk patients to critical care after surgery. We know from big epidemiology studies over many years, that there appears to be a problem with admitting high risk patients to postoperative critical care, but we don’t have data explaining why this is the case.

Broadly, the options may be that we are poor at predicting risk preoperatively, that we don’t believe that some high risk patients will benefit from critical care postoperatively, or that we lack the necessary resources to triage patients to these beds. We will try to address this uncertainty in SNAP-2.

Furthermore, we also have some uncertainty over which patients might benefit from postoperative critical care. For example, RCS guidelines, NELA and NCEPOD (all indicate we should try to admit patients with predicted risk of 30-day mortality >5% to postop critical care, and that this should be mandated if
the predicted risk of 30-day mortality is >10%. However, are these the right thresholds? Furthermore, what risk prediction tools should we be using to define these mortality risks and how accurate are they in the modern era? We hope to address these issues using some sophisticated statistical methods, including instrumental variable analysis and propensity score matching. It would be great if these methods could help us answer the question of whether postoperative critical care does improve outcome, but even if we don’t get an answer to that, we will have moved a long way forward in determining what the barriers to postop critical care admission might be.

As you might surmise, SNAP-2 is going to be a bit more complicated than SNAP-1! Thus, we are planning for the study to take place in Autumn/Winter 2016, but are already working away at the preparations. We are delighted to have been able to appoint a new SNAP fellow, Dr Danny Wong, to be the trainee lead for the study. He will start in February 2016, but in the meantime, he and the other members of the central study team are working on refining our methods and protocol. We are being joined for statistical support by Dr Mizan Khondoker, who is a statistician working part-time with the HSRC, and Dr Steve Harris who is an NIHR clinical lecturer in anaesthesia and was the chief investigator for the SPOT-light and SPOT-ID studies in critical care/outreach medicine.

SNAPs and the networks
SNAP-1 was a success only through the hard work of the QuARCs and trainees and consultants across the UK. Since SNAP-1, the trainee research networks have become more established in many regions and the UK RAFT initiative which links the trainee networks is also flourishing. We look forward to working with the QuARC and trainee networks on delivering SNAP-2.

SNAPs – the future
Ramani Moonesinghe will again be the chief investigator for SNAP-2, but we are looking towards trying to appoint new chief investigators for SNAP-3 and beyond. We have not yet established how this will work – including how funding will be provided for the CI – but are committed to developing the SNAPs further, with our aspiration of supporting high quality research led by research active NHS clinicians and trainees. In the meantime, if you want to give us your thoughts about SNAPs or anything related please email us at snap1@rcoa.ac.uk.
QuARCs are invited to volunteer their hospitals to take part in the pilot programme for a new patient-centred quality improvement initiative being led by the RCoA and the NIAA-HSRC, with support from the Health Foundation (www.health.org.uk).

PQIP will collect risk-adjusted process and outcome data on patient having major inpatient surgery in selected hospitals, with the aim of improving complications, mortality and patient reported outcome. Sites taking part in the pilot will have the opportunity to be trail-blazers in this initiative, shaping the dataset and the methods we will use to support quality improvement at local level.

To date, approximately 35 NHS hospitals across all four devolved nations have expressed an interest in being pilot sites. We have support from the Royal College of Surgeons, the critical care community (FICM and ICS) and a variety of surgical specialist societies.

More information about PQIP can be found here and in a recent article in the College Bulletin.

If you are interested in being a pilot site, please contact us at pqip@rcoa.ac.uk.

The Health Foundation is supporting a ‘bolt-on’ research project which will develop and test interventions which are aimed at helping clinicians to use data for improvement. In a sub-set of pilot hospitals, we will also be conducting an in-depth look at what the barriers and enablers to QI are on the ‘shop-floor’ – this ethnographic study will provide important learning for both participating hospitals and more widely, which should hopefully help support improvement initiatives in the future.
Background
The Research and Audit Federation of Trainees (RAFT) was established in 2013 to provide support for trainee research networks (TRNs) and to co-ordinate national projects. It is a successful and growing collaboration with 16 regional member groups covering the majority of the United Kingdom. RAFT aims to liaise and work with the QuARC network to promote and engage trainees in meaningful research and audit. Refer to www.RAFTrainees.com for further information on network growth.

2014–2015
This year RAFT delivered its first project, the Cardiac Output Monitor Survey (COMS), across 67 hospital sites in 11 regions. The project investigated the impact of NICE guidance and CQUINS on the purchasing and use of cardiac output monitors in anaesthetic departments. This project also piloted the use of ‘bring your own device’ technology to capture data. The results were presented at the Anaesthetic Research Society Meeting in April. RAFT also encouraged its members to participate in data collection for the SNAP 1.

The future
GAT (Group of Anaesthetists in Training) hosted RAFT’s first Project Development Meeting at its yearly Annual Scientific Meeting. Regional groups were invited to submit project proposals for selection to run as our second national project. The selected project, IHypE, was developed by the London TRN (PLAN), and aims to investigate the management of intraoperative hypotension in the elderly.

It is anticipated that all regions within the RAFT network will be involved in this project and that data collection will be ready to commence in early 2016. Our aim is to achieve near complete UK trust coverage for this project, so if you work at a non-TRN trust and would like to recruit to IHypE then please get in touch (or encourage your trainees to do so! www.raftrainees.com/contact-us.html).

We need consultants to support our projects and in many hospitals this is already the QuARC. Please liaise with your local TRN if you are interested in helping or developing projects through our network – contacts for your region can be found at: www.raftrainees.com.

Dr Harriet Wordsworth,
Co Vice-Chair of RAFT
Developing the QuARC network – what can we do to support you?

We are keen to develop and maintain the QuARC network as actively as possible. Your support with big projects such as SNAPs, NAPs and NELA is hugely appreciated. However, we know from the discussions at the annual QuARC meeting that there are areas where we can provide better support to you.

We will be inviting you to take part in a survey which will be sent out in the spring. This will seek your feedback on how we can support you better, and also what you would like to see covered at next year’s QuARC event.

In the meantime we would like to hear from you about your local successes and challenges. We are inviting brief vignettes (250 words) on what you are doing locally to support research and improvement. Examples might include how your department is trying to implement NAP recommendations, support trainee networks or measure and improve patient outcomes.

Please send your vignettes to quarcs@rcoa.ac.uk; you are welcome to submit anytime, but if you would like your vignette to be considered for the next QuARC Newsletter, please send it to us before 1 April 2016.

Quality Improvement and Patient Safety: Improvement Science in Anaesthesia Training

24 February 2016
at The Royal College of Anaesthetists
Free (for QuARCs)
CPD Points: 10

A one day meeting to support the introduction of Quality Improvement and Improvement Science to the Anaesthesia training curriculum organised by Dr John Colvin and Professor Carol Peden.

The aim of the day is to build knowledge, insight, enthusiasm, reassurance and confidence amongst the training community to support the introduction and spread of systematic Quality Improvement using proven Improvement Science methodology.

This event is primarily suitable for QuARCS, Consultant Anaesthetists particularly RAs, DRAs, College Tutors and Senior Trainees, however all are welcome.

To book your place please use this link: https://eventsonlineservices.rcoa.ac.uk

QuARC Day 2016
(Quality Audit and Research Co-ordinator)

25 February 2016
at The Royal College of Anaesthetists
Free (for QuARCs)
CPD Points: 5

» Updates from the HSRC and NIAA
» Open discussions sessions
» QuARC led initiatives from across the UK
» To book your place please use this link: https://eventsonlineservices.rcoa.ac.uk