

JANUARY 2020

Bulletin

The magazine for members of the Royal College of Anaesthetists

Greener Anaesthesia
and Sustainability Project

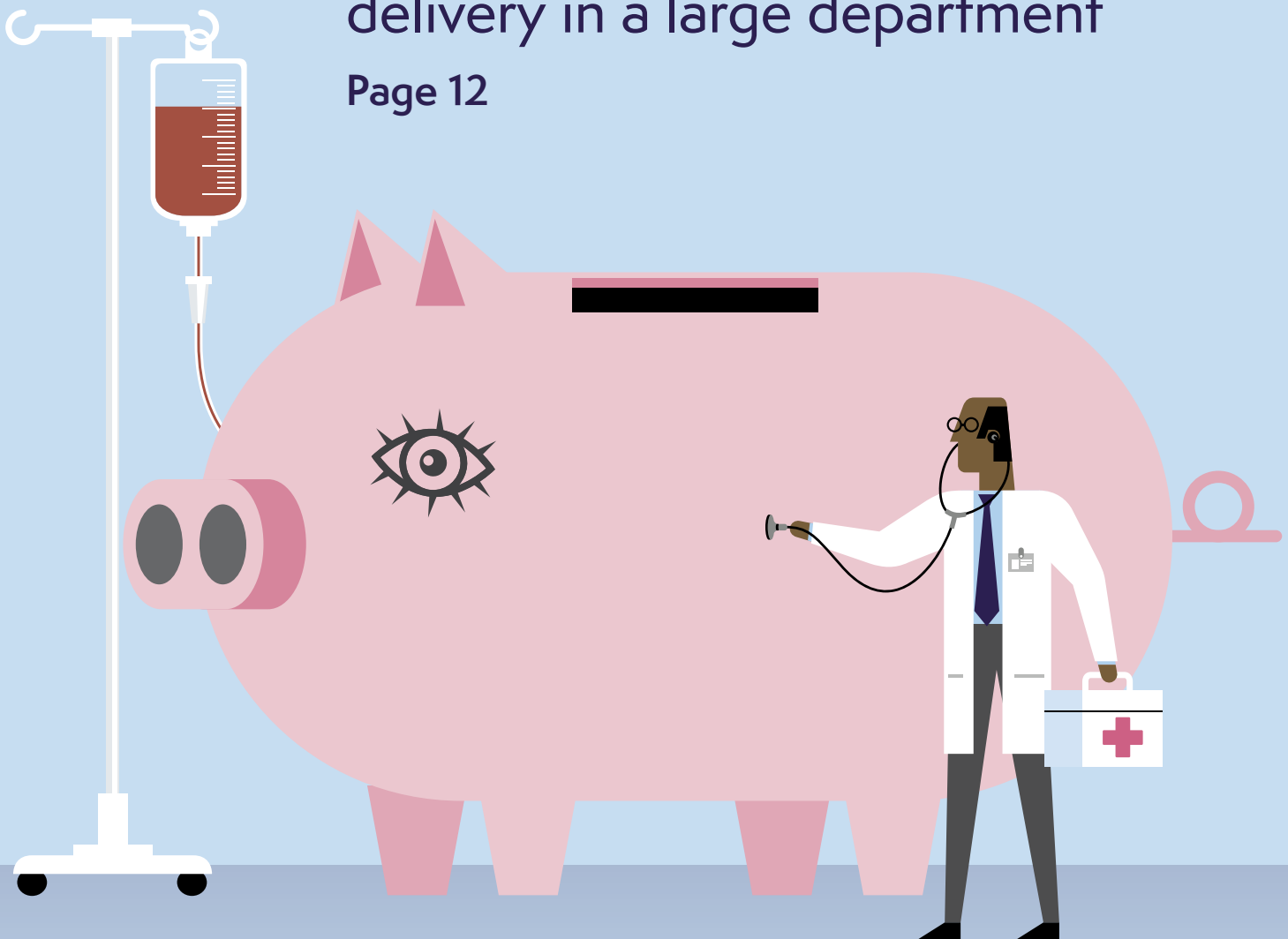
How standards are changing
the future of care

The Quality Improvement
Compendium – coming soon!

‘Winter has come’

Assessing the impact of pensions
tax on workforce and service
delivery in a large department

Page 12



Intensive Care Society: Education

Find our more information about our education days on our website.

www.ICS.ac.uk
@ics_updates
Info@ics.ac.uk

Liver and Nutrition

19 February, 2020
ICS London

Follow Up and Rehab

12 March, 2020
ICS London

The Perfect ICU

(GPICS 2 - 1 Year On)

13 May, 2020
ICS London

Legal and Ethical

17 June, 2020
The Studio, Birmingham

ICU Neuro and Trauma

22 July, 2020
The Stidion, Birmingham

Medicine for Intensivists

17 September, 2020
ICS London

Surgery for Intensivists

29 October, 2020
ICS London

Advanced Ventilation (ECMO/ARDS/Proning)

12 November, 2020
Cambridge

State of the Art

7 - 9 December, 2020
QE2 Conference Centre,
London



RCOA
Royal College of Anaesthetists

Co-badged with:
CAI
College of Anaesthesiologists of Ireland

ANAESTHESIA 2020

Confirmed topics

- Perioperative medicine.
- Anaesthesia and the brain.
- Tracheostomy QI toolkit.
- Global anaesthesia.
- Anaesthesia new frontiers.

Full programme available online.

18–20 May 2020

Old Trafford, the Home of
Manchester United

SAVE 10%

Limited early bird
places available until
31 January 2020 –
quote **EARLY10**
when booking

Discounts available for all Intensive Care Society Members

Group bookings of 10 or also more receive a 10% discount

**intensive care
society**
care when it matters

Book your place at:
**www.rcoa.ac.uk/events/
anaesthesia-2020**

Contents



Guest editorial

‘Winter has come’

Assessing the impact of pensions tax on workforce and service delivery in a large department

Page 12

The President’s View

The College launches its Medical Workforce Census 2020 and welcomes your input

Page 4

The milk of human kindness

The importance of supporting each other in the workplace

Page 24

‘Bath tea trolley’ training (Part 1)

A novel method of providing multidisciplinary team training in the workplace

Page 28

Exam preparation: myths and tips

Helping trainees plan a successful journey as they prepare for the exam

Page 38

The President’s View	4
News in brief	8
Guest Editorial	12
Faculty of Pain Medicine (FPM)	14
Faculty of Intensive Care Medicine (FICM)	15
SAS and Specialty Doctors	16
Revalidation for anaesthetists	18
Patient perspective	20
Reducing drug errors in total intravenous anaesthesia	22
Perioperative cardiopulmonary exercise testing in the South West	26
‘Yes, your honour...’	30
Greener Anaesthesia and Sustainability Project	32
A call to arms	34
How standards are changing the future of care	36
In praise of obstetric anaesthetists	40
Perioperative Journal Watch	43
Integrate... and get the best of both worlds!	44
The Quality Improvement Compendium – coming soon!	46
Adjusting to life in the UK: a first-person experience	48
Supervision of safe clinical care	50
New website. New look. Better service	52
An insider’s view: being a CPD Assessor	54
As we were...	56
New to the College	58
Notices	60
Letters to the editor	63
Advertisements	64
College Events	68



Dr David Bogod

From the editor

Welcome to the January *Bulletin*.

Editing the *Bulletin* is an honour and a pleasure, but sometimes the long lead-in time between submission and publication can be frustrating, and never more so than in relation to our lead article, by Dr du Plessis and Professor Pandit, on the impact of the pensions crisis arising from the legislation on the tapered annual allowance. As I write this comment at the tail-end of November, I really have no idea what the pensions picture will be when you, gentle reader, eagerly open this issue. Will trusts have taken up the added tax burden? Will variable contributions from PAYE have mitigated the risk? Will a Conservative Government have kept their promise to compensate doctors on retirement for huge tax bills incurred when taking on extra sessions? Will we have a Conservative Government? Will we have a Government? As the writers point out, Jaideep Pandit accurately predicted all this way back in 2016, and I only wish I had access to his crystal ball.

We could all do with a little more love, frankly, and so I must commend Oliver Boney’s article. An ST7 from London, Oliver urges us to undertake ‘small acts of kindness’ to our colleagues and our patients and points out that simply being nice is one of the best ways to improve morale and reduce stress and burnout. It is a message that is worth emphasising. I often end a talk on litigation with the anecdotal observation that, all else being equal, nice doctors are less likely to run into medicolegal problems than nasty doctors. More recently, and less cynically perhaps, I have discovered that one of the great secrets to a happy work environment is simple – Malteser tiffin. Found on the BBC Good Food website ([bit.ly/2OtB2ys](https://www.bbc.com/food/recipes/malteser_tiffin_10248)), it takes 20 minutes to make, even for a total cooking duffer like me. Refrigerate overnight, cut up into small squares and deposit in coffee room with a little note. The effect, especially on a busy maternity unit, is not unlike one of those shark feeding frenzies you see on wildlife programmes, and suddenly everyone loves you. A word of warning: DO NOT, under any circumstances, look at the site which comes up when you google ‘Malteser tiffin calories’.

‘Keeping midwives happy’ is not one of the non-technical skills that Professor William Harrop-Griffiths considers in his latest Soapbox article on obstetric anaesthetists, but it probably should be. Members of the OAA should watch their blood pressures while taking a pinch of salt (mutually exclusive?) when reading his firmly tongue-in-cheek article. I’m hoping that he’ll have a crack at the difficult airway brigade next, so watch this space.

Finally, in this issue, we say goodbye to two long-standing members of the Lay Committee, Elspeth Evans and Stuart Burgess. They have been advising the College for six years, and their wisdom, good sense and humour will be greatly missed. The Lay Committee work hard for the membership and our patients, often behind the scenes, and members are encouraged to find out more about their role by visiting their page on the website (www.rcoa.ac.uk/lay-committee).

Happy 2020 to all our readers!

David Bogod



Professor Ravi Mahajan
President
president@rcoa.ac.uk

The President's View

YOUR WORKFORCE DATA MATTERS

Looking to the future, the College will keep workforce as a key priority. We will continue to be a strong voice in supporting our fellows and members in their positions to not only help deliver the best healthcare system possible, but to look at how we can make the NHS a better place to work.

In recent years workforce has been placed at the front and centre of the NHS agenda and at the College. A shortage of staff, an ageing population and changes to pension taxation, have all contributed to the challenging times we work in and we have also had to adapt to workforce issues within the political landscape. However during these difficult times, we have seen positive news such as the announcement of the GMC as the named regulator for Anaesthesia Associates (AAs). Properly regulated, AAs under appropriate supervision, will become important members of perioperative care teams across the NHS. We also welcomed the news of the Government's approval of the Migration Advisory Committees recommendation for all medical practitioners to be added to the National Shortage Occupation list. In addition, the College has previously called for significant investment into training so that the UK can become 'self-sufficient' in training doctors by 2025. However, growing a domestic workforce requires time to develop and therefore in the interim, it is essential that the NHS is able to recruit talent from abroad to fill rota gaps and maintain adequate staffing levels for the safety of both the workforce and patients.

The College continues to ensure its voice is heard through the presentation of accurate facts and figures to help recommend genuine and realistic actions on workforce and recruitment to national health bodies and high-level organisations. To do this an evidence base approach is important, and this month the College is pleased to have launched its Medical Workforce Census 2020. Our robust data and information enables us to actively engage with Health Education England and national health bodies in England and the devolved nations on workforce discussions, and respond to a wide range of consultations. To date this has included the College's response to the NHS Interim People Plan (bit.ly/2QT3VRa), in which the College welcomed the themes and ambitions set out in the plan. It is encouraging to see a focus on cultural changes within the NHS, and a commitment to engage with doctors and other front-line healthcare workers in order to become a more compassionate and fair employer. At the time of writing, the Final NHS People Plan is expected to be published this month and we look forward to responding. By continuing the conversation and the need for an evidence base approach, we have consulted on the development of a College workforce strategy by asking our fellows and members what they think should be the priorities of the strategy aligned to the key themes identified in the NHS Interim People

The Census 2020 is no different, if anything it is more important than ever to collect complete data and we need your help with this

Plan. We thank you for your responses, which helped shape an additional document to NHS Improvement around the People Plan, which presents the views from the frontline (bit.ly/RCoASurvey) and we look forward to presenting the workforce strategy this year.

The College has been collating data over the years which has seen the delivery of the Medical Workforce Census Report 2015 and the Workforce Data Packs 2016 and 2018 (www.rcoa.ac.uk/workforce). To this day the information is comprehensive and is used alongside the data packs to help inform policy makers and national bodies about the pressures facing anaesthesia as well as our position on the state of anaesthesia UK wide.

A survey completed by the National Clinical Director network in 2018, reported complete data from 86% of trusts in the UK. They were asked about consultant and SAS doctor gaps and difficulties recruiting. The survey showed that there was a total of 411 unfilled consultant posts across our sample, which represented a consultant gap of 6.9%. This is an increase from the College 2015 census where the gap was reported as 4.4% and in the 2017 Clinical Director survey where the gap had increased to 5.2%. The situation is similar for SAS doctor posts. In 2018 there were 276 unfilled SAS posts, representing a gap of 18.9%.

In terms of recruitment, 48% of trusts have advertised a consultant post but had been unable to fill it. The most common reasons why departments could not fill posts were reported as a lack of applicants (34%) or a lack of qualified applicants (35%).

The overall picture from these data suggests that the anaesthetic workforce is under-producing new anaesthetists to meet the increasing demand, which is leading to an increasing workforce shortfall.

A common theme from responses to the consultation on the development of a College workforce strategy was the appetite for credible data and intelligence through our surveys. The College recognises that without robust data we have no credible voice to argue our workforce position. This month the College's Medical Workforce Census 2020 was sent to our National Clinical Directors Network and College tutors to complete. We are making a call for action for all to get involved and engage in supporting your clinical directors and College tutors in providing the data requested. This data is essential in monitoring the evolving gap in order to make official bodies aware of the anaesthetic workforce crisis, and to ensure our workforce position is based on robust information.

The Census 2015 achieved a 100% response rate, which is a significant testament to the willingness and professionalism of the anaesthetic community, and recognition of the importance attached to this aspect of college activity. The Census 2020 is no different, if anything it is more important than ever to collect complete data and we need your help with this. Please encourage your department to complete the census and raise awareness of this important task. The census closes in early February and we urge every single anaesthetic department to contribute.

The College plays an important role in shaping healthcare policy and practice by campaigning for change and working collaboratively with key partners and national governments. The data from the Census 2020 will also help us to identify key issues, such as how a shortfall in the anaesthetic workforce can impact on surgery waiting lists, for example cancellations of lists and NHS waiting times. Reliable and up to date data will help raise our concerns further, and ensure that what the College says is evidence-led, authoritative and, importantly, independent.

Where are the gaps in staffing of anaesthetic services?

Data collected in 2018 from clinical directors across 86% of anaesthetic departments in the UK found that;



1 Overall, **75%** of anaesthetic departments across the UK have at least one unfilled consultant post.



2 Around half (**48%**) of departments have advertised a consultant post that they have been unable to fill.



3 The most common reasons for anaesthetic departments reporting that they could not fill consultant posts were a lack of applicants (**34%**) and a lack of qualified applicants (**35%**).



4 There is a consultant anaesthetist gap of **7%** in England.



5 There is an SAS anaesthetist gap of **19.8%** in England.

6 The percentage of consultant anaesthetists employed as locums is **4.5%** in England.

Bulletin

of the Royal College of Anaesthetists

Churchill House, 35 Red Lion Square, London WC1R 4SG
020 7092 1500

www.rcoa.ac.uk/bulletin | bulletin@rcoa.ac.uk

[@RCoANews](https://twitter.com/RCoANews)

[f /RoyalCollegeofAnaesthetists](https://www.facebook.com/RoyalCollegeofAnaesthetists)

Registered Charity No 1013887
Registered Charity in Scotland No SC037737
VAT Registration No GB 927 2364 18

President	Hugo Hunton
Ravi Mahajan	Lead College Tutor
Vice-Presidents	Emma Stiby
Fiona Donald and	SAS Member
Mike Grocott	Katie Samuel
Editorial Board	Anaesthetists in Training
David Bogod, Editor	Committee
Helgi Johannsson, Editor Elect	Carol Pellowe
Jaideep Pandit	Lay Committee
Council Member	Gavin Dallas
Krish Ramachandran	Head of Communications
Council Member	Mandie Kelly
Duncan Parkhouse	Website & Publications Officer
Lead Regional Advisor	Anamika Trivedi
Anaesthesia	Website & Publications Officer

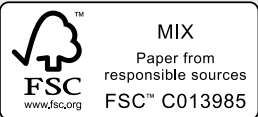
Articles for submission, together with any declaration of interest, should be sent to the Editor via email to bulletin@rcoa.ac.uk

All contributions will receive an acknowledgement and the Editor reserves the right to edit articles for reasons of space or clarity.

The views and opinions expressed in the Bulletin are solely those of the individual authors. Adverts imply no form of endorsement and neither do they represent the view of the Royal College of Anaesthetists.

© 2020 Bulletin of the Royal College of Anaesthetists
All Rights Reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form or by any other means, electronic, mechanical, photocopying, recording, or otherwise, without prior permission, in writing, of the Royal College of Anaesthetists.

ISSN (print): 2040-8846
ISSN (online): 2040-8854



NEWS IN BRIEF

News and information from around the College

BOOK
NOW!



Anaesthetic updates

MEET | LEARN | DISCUSS

Introducing new Anaesthetic updates

Every year the College runs four Updates in Anaesthesia, Critical Care and Pain Management events and six CPD Study Days. The main noticeable difference for these events is the length, but essentially they are both run to provide an opportunity to connect with specialty experts and peers, and bring back ideas that will improve your own practice.

Due to their similar structure and function, we have decided to re-brand these popular events and combine them into a series called Anaesthetic updates. This series launches this month and varies in length from a one to three-day programme. Book your place now at one of our Anaesthetic updates:

31 January 2020 **25–27 February 2020** **17–18 March 2020**
Nottingham **London** **London**

www.rcoa.ac.uk/events

Annual College award nominations

The College is now inviting nominations for the College annual awards. Fellows or members are invited to suggest nominations for consideration on behalf of Council by the Nominations Committee.

The process for nomination allows for any fellow or member to put forward nominations to be considered by the College Nominations Committee. This Committee is chaired by Dr Kirstin May and includes the President, Professor Ravi Mahajan, and Vice Presidents, Dr Fiona Donald and Professor Mike Grocott.

Past recipients are listed on the College website and can be used as a good starting point when considering for what award a nomination should be submitted. More information can be found on the website at: www.rcoa.ac.uk/honours-awards-prizes. Nominations should be proposed using the form available at the bottom of the webpage.

Completed forms should be submitted to: awards@rcoa.ac.uk by Tuesday 31 March 2020.



A Manifesto for a 21st century National Health Service

In our 2019 General Election manifesto, the College called on the next Government to address the critical issues preventing the delivery of a 21st century national health service. Focusing on staff wellbeing and integrated care is what's needed to create a sustainable NHS, not a total restructure.

With the General Election now over, and a new Government in place, we will continue to:

- take a whole-person approach
- care for the people who care for us
- ensure a future doctor and nursing 'pipeline'
- safeguard a sustainable NHS
- remove the culture of blame to maintain patient safety
- deliver 21st century care
- integrate health and care
- take a population health approach
- support multi-disciplinary working.

Read our full manifesto here:
bit.ly/RCoAManifesto19

GOING GREENER

How to opt out of your printed BJA and BJA Education journals



Whilst the content of our academic journals, *British Journal of Anaesthesia* (BJA) and *BJA Education* is second to none, the College has had a growing number of requests from fellows and members who would like to opt out of receiving the printed copies. Whether it's for ease of reading, personal preference, or for environmental reasons, opting out of print copies is easy to set up. Simply email membership@rcoa.ac.uk with your name and College reference number and your request. You will still retain full access to the journals online, and *Bulletin* will continue to be posted to you.

The College is committed to embedding sustainability in everything we do. Through the work of our President's Environmental Advisor, Dr Tom Pierce, the College aligns itself with relevant national and international initiatives related to anaesthesia and the wider NHS, aimed at mitigating further global temperature rise and climate change. This includes being a founder member of the UK Health Alliance on Climate Change, working jointly with the Association of Anaesthetists, and there is also a College Council lead for sustainability, Dr Lucy Williams. Two articles exploring the environment and anaesthesia can be found on pages 32 and 34 of this issue.

More information on environment and sustainability, including our Sustainability Strategy 2019–2022, can be found on the College website at: www.rcoa.ac.uk/environment-sustainability



Three new websites... with much more to come

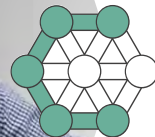
rcoa.ac.uk | fpm.ac.uk | cpoc.org.uk

More details on page 52



NEWS IN BRIEF

News and information from around the College



UK PERIOPERATIVE MEDICINE
**CLINICAL TRIALS
NETWORK**

Visit
the POMCTN
website to apply:
[bit.ly/
2KMHDwP](https://bit.ly/2KMHDwP)

POMCTN recruiting future Chief Investigators

The UK Perioperative Medicine Clinical Trials Network (POMCTN) is running a fresh round of recruitment to its Chief Investigator Scheme.

The Scheme is intended to provide training and mentorship for a small number of talented individuals who wish to lead their own perioperative clinical trials.

Applicants can be from any clinical background relevant to perioperative medicine, with a proven track record of recruitment to trials, ideally with experience of a complete research cycle as a grant co-applicant.

Deadline for applications is Monday 27 January 2020.



SNAP3 Commissioning Brief released

The Health Services Research Centre (HSRC) has released the commissioning brief for a Chief Investigator for the third Sprint National Anaesthesia Project (SNAP3), based on frailty and delirium.

Our thanks to all who proposed topics for SNAP3. The selection panel, which included representatives of the RCoA Council, the HSRC Board, RAFT, the two previous SNAP trainee leads and a layperson, felt that frailty and delirium presented opportunities for large scale SNAP-style research within a single project.

The successful candidate will be selected based on their credibility to lead SNAP3, clarity of their ideas for the research questions and methods, ability to work in a high-pressure environment and their ability to work with and supervise the trainee lead.

The post is supported by 1PA salary backfill. **Deadline for applications is 5.00pm on Friday 7 February 2020.**

Visit the HSRC website for more details: bit.ly/SNAP3Brief



Find out more
about the ACSA
scheme here:
[www.rcoa.ac.uk/
acsa](https://www.rcoa.ac.uk/acsa)

Norfolk and Norwich University Hospital anaesthetists rewarded for high quality patient care

Anaesthetists at Norfolk and Norwich University Hospital (NNUH) have been recognised for providing the highest quality care to their patients. The prestigious Anaesthesia Clinical Services Accreditation (ACSA) from the College was presented at a ceremony on 15 November.

ACSA is the College's peer-reviewed scheme that promotes quality improvement and the highest standards of anaesthetic service. To receive accreditation, departments are expected to demonstrate high standards in areas such as patient experience, patient safety and clinical leadership.

During the accreditation process NNUH have demonstrated a strong commitment to delivering high quality anaesthetic care, a clear focus on patient safety and a desire to continue to develop the services they provide. The anaesthetic department has shown excellence in a number of areas but in particular with their approach to innovation in the delivery of patient centred care.



Views from the frontline of anaesthesia – supporting the development of the People Plan

The College welcomed the themes and ambitions set out in the Interim NHS People Plan in spring 2019 and we look forward to the detailed proposals to ensure the NHS is the most supportive and progressive healthcare provider to work for.

Views from the frontline of anaesthesia presents our members' views on what they feel should be the priorities for the College as we work towards developing a 2020 anaesthesia workforce strategy. Between August and September 2019, the RCoA surveyed the views of a number of stakeholders, including frontline anaesthetists, Clinical Directors, Training Programme Directors and Heads of Schools. This paper captures their perspectives. We are pleased to now offer this further document in support of the People Plan.

The College's workforce strategy will closely align with the People Plan's five themes; making the NHS the best place to work, improving the leadership culture, tackling workforce shortages, delivering 21st century care and a future workforce. We look forward to collaborating with NHS Improvement, Health Education England and wider partners in delivering the plan's aims.

Read the full report here: bit.ly/RCoAsurvey



Patient Safety in Perioperative Practice

There is still time to join this one-day meeting to discuss patient safety, including the barriers to delivering safe perioperative care, and strategies on how to overcome them. It will be held at the College on **13 February 2020**.

Our aims are to build upon knowledge and practice to make systems, processes and organisations safer. Through an understanding of the science of patient safety, different perspectives and approaches, coupled with collaboration, education and quality improvement programmes we hope to inspire delegates to make safety the golden thread of patient care.

Book your place today and earn 5 CPD points: bit.ly/PatSafFeb20

We will make a
£5 donation to
Lifebox for every
delegate attending
this event.



Dr Hanlie du Plessis
Consultant Anaesthetist,
Oxford University Hospitals
NHS Foundation Trust



Professor Jaideep J Pandit*
Consultant Anaesthetist,
Oxford University Hospitals
NHS Foundation Trust

Guest Editorial

'WINTER HAS COME'

Assessing the impact of pensions tax on workforce and service delivery in a large department

In April 2016, the government introduced the 'tapered annual allowance', a final part of a sequence of changes to taxes on public sector pension schemes. In August of the same year, an article in the journal *Anaesthesia* predicted certain consequences of these pension changes.¹

The article predicted firstly that senior doctors would face tax bills of tens of thousands of pounds, and secondly that mitigating this risk would result in a reduction of approximately 20–30% in the NHS workforce, as these doctors reduced their NHS sessions.

Three years later, media articles have highlighted the rise in waiting lists as doctors have – as predicted – dropped NHS sessions. Personal stories tell of doctors facing thousands of pounds of extra tax simply for undertaking an extra list to try and help their trust meet waiting targets. Trusts are reporting cancellations of lists and difficulty in staffing A&E shifts.

We surveyed our department (more than 120 consultants) to identify how any impact of the pensions tax changes might be affecting behaviour.

Results

There were 99 respondents. The largest single age group was of those aged 51–60, the group most likely to have been affected by any changes

to pension tax. Although 97% of respondents were aware of the tax, the single largest source of knowledge was that of conversation with colleagues (Figure 1) rather than resources like the 2016 paper.¹ Of 99 respondents, 33 (33%) stated that they had received a tax demand, of whom 28 were prepared to indicate its size. The median (interquartile range [range]) size of bill was £10,000 (5,000–20,000 [1,500–55,000]), making a total of £360,000, all of which had been paid. Three respondents declared an anticipated lifetime allowance charge of £20,000, £70,000 and £150,000, making a total of £240,000). In addition to the 33 who had already received a tax demand, 30 respondents declared that they were expecting a charge but were awaiting details. Thus, 63 out of 99 (63%) senior doctors in one department found themselves in the 'pension tax trap'.

Most worrying for clinical services was that 75 out of 99 (75%) respondents had reduced their workload. Figure 2

shows that the majority were reducing extra NHS lists, reducing regular sessions in their job plan, or taking early retirement (this last one being a particular concern given the age demography). Other mitigations included reducing managerial and teaching commitments and not applying for clinical excellence awards. A minority were also reducing their private-practice income (which may have been a strategy coupled with other measures, since this question allowed multiple answers).

Conclusions

We believe these results to be representative, coming as they do from one of the largest UK departments. The predictions of the 2016 paper seem to have come to pass.¹ In 2010, when the department's size was 66 full-time equivalents (FTEs), an analysis showed there was then a shortfall of about 27 FTEs on the number needed to achieve a fully consultant-delivered service.² With the department's size now more than 120 FTEs, this shortfall remains the

same at an estimated level of about 31 FTEs.³ One of the consequences of this is that extra paid sessions for managing the ever-rising demand in activity are the norm for trusts generally, and it is predominantly these that are being cancelled (Figure 2). Coupled with consultants reducing their workload (Figure 2), this represents a projected shortfall of 20 to 30% – precisely as predicted by the 2016 paper.¹

Local negotiating committees and trusts are considering a range of options to try to reverse the trend of cancelled lists, and some of these are shown in Table 1. However, option A is only meaningful (for service) if coupled to additional (paid) work, option B may not be legal, and other options are unprecedented or untested. The pension tax changes inevitably mean that each proposed solution will affect individuals differently, and there will be no universal panacea.¹ Reducing contributions to save pension tax, as suggested by the government's recent consultation, will mean a lower overall pension, so the only real solution is, of course, to reverse the pensions tax changes. This seems unlikely. For many readers, it is probably worth dusting off the old 2016 paper¹ and reading it quickly.

*Corresponding author:
jaideep.pandit@sjc.ox.ac.uk

Figure 1 Source of knowledge of pension tax (the last two columns relate to the 2016 article¹ and the British Medical Association); n=99

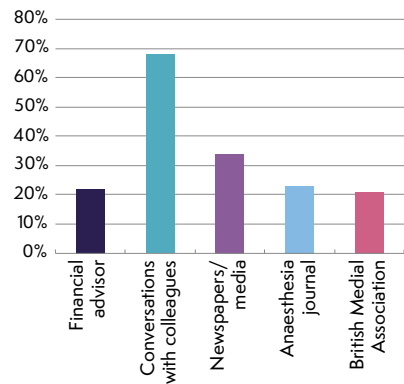


Figure 2 Mitigating strategies being employed to reduce pension tax bills (PA = programmed activity in job plan; private = private practice); n =99

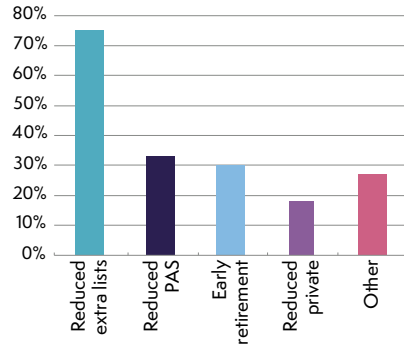


Table 1 Some measures discussed locally which might reduce impact of the pensions tax (none are finalised)

*At the time of going to press, the government appears to have gone forward on this proposal (see: www.bbc.co.uk/news/health-50467400)

A: pay employer contributions over to employee if individual leaves NHS Pension Scheme.
B: pay monies for paid extra lists into individual's or group limited companies.
C: enhance study leave or other allowances and broaden scope of these payments.
D: enhance non-pensionable local clinical excellence awards.
E: employer pays pension tax on behalf of employee.*
F: government allows flexibility in pension contributions.
G: offer additional annual leave in lieu of doing extra sessions.

References

- Pandit JJ. Pensions, tax and the anaesthetist: significant implications for workforce planning. *Anaesth* 2016;**71**:883–891.
- Pandit JJ, Tavare AN, Millard P. Why are there local shortfalls in anaesthesia consultant staffing? A case study of operational workforce planning. *J Health Organ Manag* 2010;**24**:4–21.
- Pandit JJ. Practical Operating Theatre Management. CUP, 2019.



Dr John Hughes
Dean, Faculty of Pain Medicine
contact@fpm.ac.uk



Faculty of Pain Medicine (FPM)

Pain medicine going forward

This is my first article as Dean, and I am honoured to be taking over from Dr Barry Miller, who has carefully steered the Faculty through an interesting three years with significant success.

We thank him for his dedication and are delighted that he is going to lead our new Medicines Advisory Group, responsible for the 'Opioids Aware' resource.

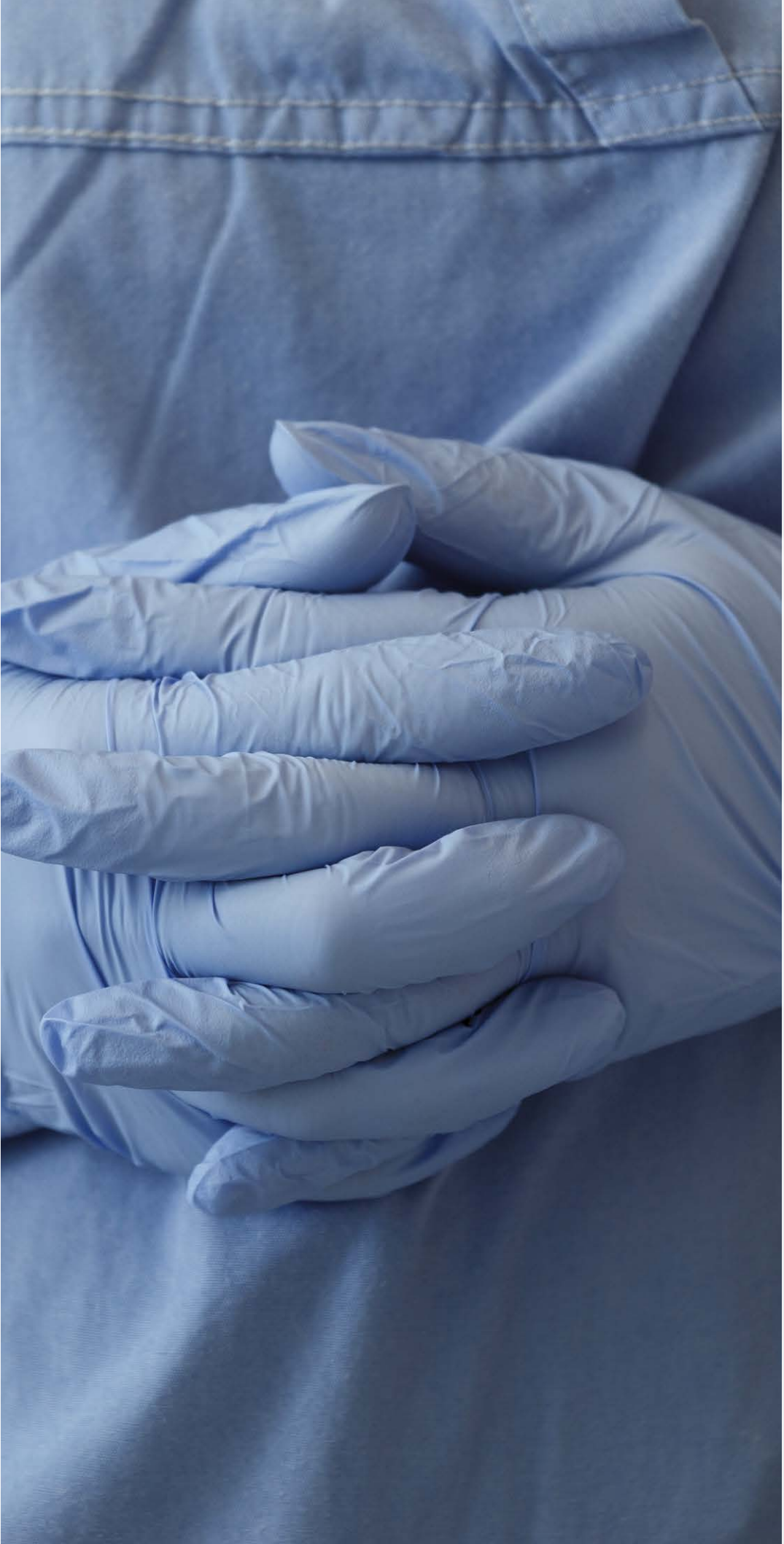
The Faculty has grown over the last 12 years since its inception, looking at pain training and professional standards for pain medicine specialists from an anaesthetic background. This expanded to the development of curricula, assessment, the exam, and our multi-organisationally endorsed core standards document (currently being updated).

The Faculty now interacts with many external organisations (General Medical Council, NHS England, National Institute for Health and Care Excellence, the Royal College of General Practitioners, and others), recognising the broadening remit of pain and its impact outside anaesthesia. There is also a role for the Faculty to play in the changing environment for commissioning, de-commissioning, and the use of medications. With this growth in activity, the Faculty is reviewing its strategic aims.

This exercise has clarified that, although our fellows and members with a focus on inpatient and acute pain have not been forgotten, they have not been at the forefront of some of these developments. This has not gone unnoticed, and we are ensuring that these areas are integrated into our workstreams and that active board representation continues. For example, the Faculty is actively engaged with the anaesthetic curriculum review, the Centre for Perioperative Care project, preoperative Getting It Right First Time (GIRFT), and the FPM/College opioid prescribing working group. It is clear that there are opportunities here that can have a significant benefit for patient care.

The broad strategic areas for the Faculty going forward include:

- getting the best services for our patients (across all clinical settings)
- ensuring the best use of therapeutic interventions
- building an attractive and sustainable specialty
- educating the healthcare system about pain.



Dr Alison Pittard
Dean, Faculty of Intensive Care Medicine
contact@ficm.ac.uk

Faculty of Intensive Care Medicine (FICM)

Invest to save

By the time you read this I will have been Dean of the Faculty of Intensive Care Medicine for almost three months, and I suspect my feet haven't touched the ground.

Over the last two years I have chaired an Enhanced Care Working Party (Recommendation 4 of our 'Critical Futures' initiative), and the guidance coming out of this is about to be published. This collaborative document impacts on many specialties, improving the patient experience and the safety and quality of care they receive. Enhanced care bridges the gap between the ward (Level 0/1) and critical care (Level 2/3), and we describe a set of key principles, based around the patient pathway, to ensure an overarching governance structure is in place.

The case mix of patients receiving Level 2 care has changed over the last 20 years, and many now require a higher level of monitoring and interventions rather than organ support. This additional demand needs an increase in capacity. However it is important to invest wisely, keeping the patient as the focus. Redesigning the service may better serve the needs of a larger number of patients,

releasing critical care capacity and improving flow. Those delivering enhanced care must be trained to do so, and thus education will be the key. Training in intensive care medicine will equip them with the necessary competence to ensure that the right treatment is delivered by the right people, in the right place and at the right time. Although enhanced care will not normally be delivered by critical care staff, they will be integral to development and support for the service, providing guidance and training in this education-rich environment. Our guidance provides examples of good practice and successful implementation where there is absence of evidence. We hope that this will be supportive for those services already established, and will also provide a structure to facilitate new initiatives.

SAS and Specialty Doctors

With a little help from our friends...



Dr Kirstin May

RCoA SAS Member of Council, Banbury

sas@rcoa.ac.uk

The Academy of Medical Royal Colleges (AoMRC) is the coordinating body for the 24 Medical Royal Colleges and Faculties in the UK and Ireland. It sets standards for the way doctors are trained, educated and monitored. It also gives a cross-specialty perspective to policy makers and regulators.

SAS doctors are represented at the AoMRC through its SAS Committee, comprising the SAS leads of each specialty. This group meets face-to-face twice per year; other work is carried out electronically. Since joining RCoA Council in 2015 I have represented the SAS anaesthetists at the AoMRC, and acted as the AoMRC SAS Committee chair from summer 2016 until summer 2019.

When I first joined the AoMRC SAS Committee it was not well attended, and few Colleges had SAS representatives. The AoMRC SAS chair is offered a co-opted seat at Academy Council, which brings together all the College and Faculty presidents to discuss Academy business. Most of this relates to wider

healthcare politics and has no direct SAS theme, but of course it does nevertheless impact upon the professional life of SAS doctors. It is therefore very important that an SAS perspective is offered to discussions, and a reminder of the vast contribution made by SAS doctors can be required. Sitting in a room with 24 presidents is certainly an interesting – and intimidating – experience, and one I had never expected to have!

Achievements since 2016

We have revitalised the SAS voice at the AoMRC and I am delighted to have handed over an expanded and active committee to the SAS lead of the Royal College of Physicians (RCP). We have given a regular SAS voice to Academy business in many areas. A successful cross-specialty SAS conference was held in spring 2018. We have lobbied the government to support the reopening of the Associate Specialist grade in the interest of SAS doctors' professional development and wellbeing. Multi-agency work has been carried out with Health Education England and

others to innovate in SAS recruitment and retention,¹ SAS development,² and SAS support.³

It has been helpful to exchange good practice, ideas and data with other SAS leads. Running similar surveys of members has achieved spookily similar results.

We do well at the College, with two full SAS Council Members and representation at all committees and every level of College work. It is now up to Dr Lucy Williams to represent SAS anaesthetists and to the new Academy SAS chair Dr Waleed Arshad from the RCP to represent SAS doctors across the Academy. Good luck!

References

- 1 SAS development and retention programme. Toolkit for implementation. HEE, 2018 (bit.ly/2wwRBLr).
- 2 SAS doctor development. Summary of resources and further work. NHS Confederation, 2017 (bit.ly/2oWBG8Y).
- 3 Maximising the Potential: essential measures to support SAS doctors. Published by Health Education England and NHS Improvement, 2019 (bit.ly/2Zqzmab).

'Coming together is a beginning, keeping together is progress, working together is a success'

Henry Ford



Dr Lucy Williams

RCoA SAS Member of Council, Swindon

sas@rcoa.ac.uk

The SAS tutor

Since I seem to be a person unable to say 'no', last year I took up the post of SAS tutor within my hospital. We have 56 SAS doctors across most specialties, some full-time and others very part-time as part of a portfolio career.

My primary role is to be a point of contact for any career development queries and to administer the SAS development fund which comes from Health Education England. This is used to fund generic courses of interest to all and to top up study-leave budgets for individual applications.

Last year, my predecessor ran an off-site day, and had excellent feedback. People really enjoyed getting out of the hospital and spending time with colleagues from other departments whom they don't normally see during work. This year, I have a programme on leadership for SAS doctors and there has been great demand for places.

Regular newsletters update everyone on local and national issues. Although we often feel left out, there is a lot of work at Health Education England, the General Medical Council and within individual colleges focusing on our group as workforce pressures really bite. SAS doctors are recognised as key staff to develop for senior clinical and non-clinical roles.

This is where my role at the College meshes really well with the SAS tutor role. As chair of the College's SAS Committee, I attend the SAS Committee of the Academy of Medical Royal Colleges. At our recent meeting we discussed proposed General Medical Council changes to the Certificate of Eligibility for Specialist Registration (CESR), SAS doctors as clinical and educational supervisors, as well as leadership training for SAS doctors.

The tutor role has brought me in to the medical education sphere. To help myself in supporting my colleagues I have attended a deanery coaching course and the National Association of

Clinical Tutors SAS Tutors Development Day. SAS tutors from all over the UK (except Northern Ireland) were present to share successes and some frustrations.

Hopefully, your hospital has an SAS tutor. They can signpost funding from bursaries or postgraduate medical education funds, depending on what you want to do. They can help you fill in application forms – sometimes two heads are definitely better than one. They are there to help you consider options for career progression, whether that is CESR, application for associate specialist grade (if available in your trust), or gaining postgraduate qualifications. They should be able to act as mentor or coach, or find someone else who can.

If you don't have an SAS tutor, consider offering yourself – it is a great personal development opportunity.

Revalidation for anaesthetists

Enhanced functionality for event providers

Chris Kennedy

RCoA CPD and Revalidation Coordinator

cpd@rcoa.ac.uk

The revalidation article in the previous edition of the *Bulletin* (Issue 118, September 2019) described some of the CPD enhancements which have been introduced into the Lifelong Learning Platform, including the ability to add 'realtime reflection' during attendance at CPD-accredited events. This long-requested development has been particularly well received, as has the new functionality that allows assignment of more than one personal activity to accredited events.

Event providers seeking CPD accreditation had commented that the old application form was extremely long to complete and was not intuitive. It had been spread over three separate screens, and there had been cases where the form had timed out and all of the information populated had been lost.

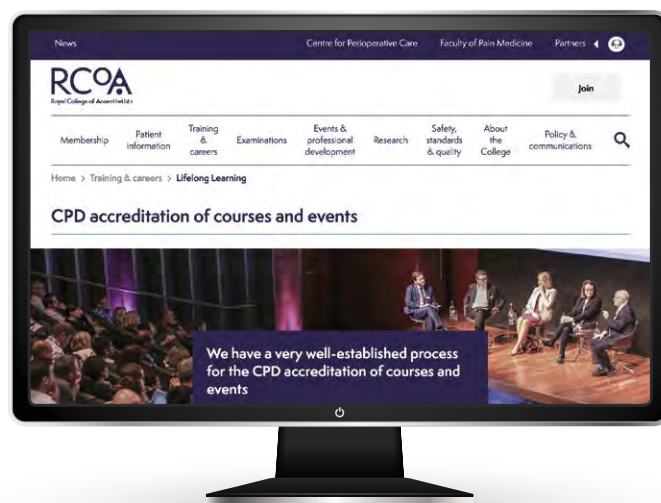
In response to this feedback, the process for applying for CPD accreditation via the Lifelong Learning Platform has been enhanced and made much more user-friendly for event providers so that:

- the application form appears on one screen
- it is now possible to add the details of two nominated contacts rather than one

- mapping to CPD Skills (what was previously the CPD Matrix) is entirely optional
- there is the option of mapping to the Good Medical Practice domains and also to the Domains for Medical Educators, with the potential to increase visibility of your event to the clinician users of the Lifelong Learning Platform
- there is a more streamlined payment process for commercial event providers.
- Other changes based on stakeholder feedback include a free-text 'Other' option that can be selected for the teaching methods that are selected in the application form, instantaneous uploading of the supporting documents, and a more intuitive way of warning of any error made during the submission.

We would like to encourage event providers to apply for CPD accreditation at least six weeks in advance of the event. Consideration cannot be given to applications received less than two weeks before the event date, or to applications for retrospective approval. Where a regular event was last accredited more than 12 months ago, the accreditation does not roll over, and a new application will need to be made.

We would also like to remind all users of the existing CPD Online Diary that this will be decommissioned during 2020, and so we would encourage everyone to transfer over to the Lifelong Learning Platform as soon as possible.



Further information is available on our website: www.rcoa.ac.uk/cpd-accreditation or via cpd@rcoa.ac.uk

RCoA
Royal College of Anaesthetists



Fitter Better Sooner

Endorsed by



Royal College of General Practitioners



Royal College of Surgeons
ADVANCING SURGICAL CARE

The Royal College of Anaesthetists has developed a toolkit that offers patients the information they need to prepare for surgery, including the important steps they can take to improve health and speed up recovery after an operation.

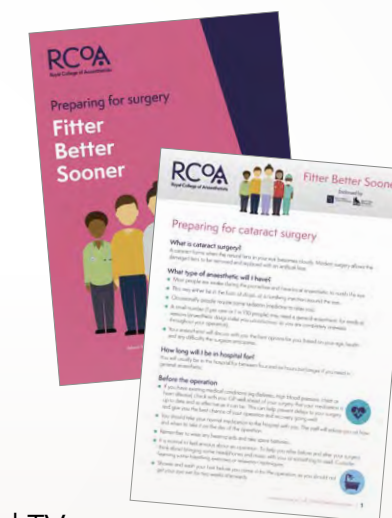
The Fitter Better Sooner toolkit consists of:

- one main leaflet on preparing for surgery
- six specific leaflets on preparing for some of the most common surgical procedures
- an animation which can be shown on tablets, smart phones, laptops and TVs.

You can view the toolkit here: www.rcoa.ac.uk/fitterbettersooner

We have also created printable posters, flyers and stickers to help you signpost patients to the toolkit. The animation can be shown on TVs in waiting areas. You can find all these additional resources and instructions on how to download the animation in MP4 format (or request a version in PowerPoint) on our website here: www.rcoa.ac.uk/patientinfo/healthcare-professionals

Please share this toolkit with colleagues in both primary and secondary care settings.



It has been shown that people who improve their lifestyle in the run up to surgery are much more likely to keep up these changes after surgery.

Patient perspective

A LAY VIEW: the past six years

Dr Stuart Burgess and Elspeth Evans joined the Patient Liaison Group, as it was then named, in 2014 as part of a cohort of four recruits. They end their term of office early this year, and reflect in this article on their contributions as part of the College's Lay Committee.



Elspeth Evans
Member, Lay Committee,
Buckinghamshire
laycomm@rcoa.ac.uk

Having worked in administration for two other Medical Royal Colleges, I felt my application was strong and was delighted to be recruited. My heart sank when a change of committee name appeared on an agenda for discussion, but I soon understood that the reason for the name change was that some applicants mistakenly thought they would be dealing with and speaking to patients. It took us about ten minutes to decide on 'the Lay Committee'. I am the lay representative on the Education and Professional Development Committee, the Public Sector Equality and Diversity Compliance Group, the Quality Improvement Working Group, the Communications and External Affairs Board and, until it was disbanded in 2019, the Revalidation Committee. Last year, I contributed to the revision of the Audit Recipe Book and joined the Patient Improvement Group, which is highly regarded within the College. This has given me a good overview of College activities and an appreciation of the enormous changes introduced in recent years – the five-year strategy, rebranding, and the reorganisation of staff directorates.

I was invited to join the 25th Anniversary organising committee set up to make plans for celebrating the College's 25th year of holding its Royal Charter. I was very flattered to be asked to join the judging panel for the essay competition inviting foresights of the position of

anaesthesia in 25 years' time, which was aimed at medical students, anaesthetists in training, and foundation year doctors. This meant reading 47 entries in total. My favourite statement was that a celebrity chef was now Minister of Health. I also went to the Barbican to see the film *Green for Danger* (first released in 1946), which featured a dastardly anaesthetist, and I marvelled at how people smoked in hospital premises in those days.

The late president, J-P van Besouw, referred to us as the 'Scrutiny Committee'. I think this was fair because our remit is to put the view of the patient and the public, and this often means suggesting plain-English explanations for medical terms.

I was privileged to attend the 2018 Summer Reception and be introduced to Her Royal Highness, The Princess Royal.

My legacy? Naming the 'ARIES' talks (bit.ly/RCoA-ARIES). Aware that we couldn't keep referring to these as 'TED-style talks', as we did when they were first suggested, I sat down with a piece of blank paper and tried to think of a suitable acronym. 'Anaesthetics' or 'anaesthesia' had to be the provider of the first letter, and the rest followed from there. The committee loved it, although it changed one or two of the words. My second suggestion? 'Red Lion talks' although I admit that does sound a bit like a pub quiz.

It has been a privilege to be part of the Lay Committee, and hopefully I have been able to make a small contribution

Dr Stuart Burgess



Dr Stuart Burgess
Member, Lay Committee,
London
laycomm@rcoa.ac.uk

I was delighted to join the PLG in 2014. The committee has changed over the years, not only in name but also in the contribution it makes. I think it has become more focused and engaged with the issues. I have served as the lay representative on the Professional Standards Committee and on the Faculty of Pain Medicine (FPM). The FPM would, I imagine, be an independent College if it had a larger membership. It took me a while to get used to its agenda and its way of working. In most committees I am used to working through the agenda quite quickly. I learned that on FPM agendas many items were really discussion issues. Two fascinating issues have been the use of cannabis and opiates, and both are hot topics. On the medical use of cannabis, the FPM board has taken, quite rightly in my opinion, a conservative approach, as there are so many unknowns and indeed side effects. However, any discussion has to be aware of the shifting of public opinion, both in this country and beyond. A number of countries have legalised the medical use of cannabis, and two countries have legalised the consumption of recreational cannabis.

'Opioids Aware' has been another hot topic. Although I rarely suffer pain, many of my friends have to endure severe pain. Opioids are often used to help particular people in a carefully prescribed way. However, it seems to me that it is possible that the professionals, ie the FPM, could be sidelined in the ongoing discussion. The media have picked up this topic in a big way, and recently *The Times* had a full-page article describing how easy it is to obtain the drugs and also gave examples of the dangers that are there in terms of dependency.

My hope would be that the professional voice can be heard.

I have thoroughly enjoyed taking part in the Anaesthesia Clinical Services Accreditation (ACSA) visits. It has been good to be part of a team and to be well supported by our hard-working administrative colleagues.



Dr Hugh Cutler
ST6 Anaesthesia, Royal Hampshire
County Hospital, Winchester



Dr Tom Peck*
Consultant Anaesthetist, Royal
Hampshire County Hospital,
Winchester

Reducing drug errors in total intravenous anaesthesia

For as long as healthcare professionals have been administering drugs to patients they have been making errors. Numerous systems have been developed to reduce the frequency of such errors, from the universal syringe-labelling system to the more sophisticated barcode systems.¹ In addition, a more open culture of learning, double-checking and standardisation have all been advocated for the prevention of errors.²

Total intravenous anaesthesia (TIVA) is most commonly administered using sophisticated algorithms to drive syringe pumps, a system described as target-controlled infusion (TCI). The Diprifusor TCI system was the first such available system, and could only administer Diprivan-branded propofol syringes by means of a computer chip in the syringe flange. In this form, it was only able to administer the intended drug at the intended concentration. The downsides

were the cost of branded propofol and the (perceived) restriction to a single algorithm.

In 2002, generic propofol entered the market, followed closely by a second generation of more agile TCI pumps (open TCI systems) that were programmed with additional algorithms for a range of drugs and with targeting options. Progress indeed, but at a time when there is rightly an increasing spotlight on medical error, these 'open TCI systems' have opened the door to

'wrong drug' and 'wrong concentration' errors that were previously not possible.

Following two such errors at our hospital, and hearing of other experienced anaesthetists (within Wessex and beyond) who had also made similar errors, we set out to assess the scale of the problem and review any themes by means of a survey sent to all anaesthetists in Wessex, having first trialled it at the Wessex TIVA Training Day.

Methods

An email containing a link (bit.ly/2n2taUM) to an online questionnaire was sent to all the anaesthetists (n=525) at eight hospitals in the Wessex deanery. The questions related to incorrect pump programming, drug concentrations, and errors when mixing opioid with propofol – with an opportunity to add free text.

Results

We received 186 responses – a response rate of 35%. While this appears low, in the context of the UK rate for TIVA at approximately 10% of all anaesthetics, this represents a good return. Indeed 89% of responders considered their TIVA experience level to be moderate or confident, while less than 3% considered themselves TIVA novices.

Wrong drug errors, ie remifentanyl syringe programmed as propofol or vice versa – 26% (48) of responders had observed this, of whom 17% (eight) indicated that this had occurred within the previous year and 60% (29) that it had been recognised after induction. Two cases had immediate adverse physiological changes.

Wrong concentration errors – 17% (31) had observed this, of whom 58% (18) indicated that this had occurred within the previous year and 61% (19) that it had been recognised after induction. Four cases reported immediate adverse physiological changes.

Wrong propofol/opioid mixing error – 5% (nine) indicated that they delivered TIVA exclusively with a propofol/opioid mixture, while 47% (87) reported that they never use drug mixtures. Overall, seven individuals had experienced errors associated with the mixing of drugs, with three recognising this after induction and three reporting it to have occurred in the previous year. This type of error did not lead to any adverse physiological consequences.

The free-text themes are summarised below.

Human factors:

- distractions while programming
- time pressures
- fatigue
- haste
- miscommunication between anaesthetists
- unfamiliar technique.

Drug factors:

- different drug concentrations used within and between trusts
- incorrect propofol concentration
- incorrect remifentanyl concentration (including 0 ng/ml)
- lack of double-checking during drug preparation
- lack of familiarity with dilutions for drug regime.

Equipment factors:

- different arrangement of syringes
- deviation from normal process, eg different consumables
- different pump default remifentanyl concentration between hospitals
- unfamiliar TCI pump.

Discussion

This survey demonstrates that drug errors associated with TIVA are common and occur despite seniority and experience. The free-text responses reveal the human factors, variability and equipment issues involved. History teaches us that education and tighter operating policies are only partially effective in reducing medical error, so that, as TIVA use increases, associated programming errors will also increase unless other factors, such as pump design, are improved. Although the 'chipped' Diprivan syringe is largely consigned

to history, there are other means of ensuring that only the intended drug at the intended concentration is delivered to the patient, and we call on TIVA pump manufacturers to prioritise safety, in addition to flexibility, in their design.

This could include:

- different screen appearances for propofol and opiate infusions (this could be as simple as inverting the whole screen colour)
- a drug-specific, whole-screen prompt, confirming each drug immediately prior to the start of infusion
- a drug-specific auditory prompt confirming each drug immediately prior to the start of infusion
- a connection (wired or wireless) preventing the same drug being selected in adjacent pumps
- ultimately, 'smart' detection of propofol and non-propofol containing syringes, more akin to the 'key-fill' system used in vaporisers.

Conflict of interest declaration

Courses run by Dr Tom Peck have been sponsored by Carefusion.

References

- 1 Jelacic S et al. A System for Anesthesia Drug Administration Using Barcode Technology: The Codonics Safe Label System and Smart Anesthesia Manager.™ *Anesth Analg* 2015;**121**(2):410–421.
- 2 Nimmo et al. Guidelines for the safe practice of total intravenous anaesthesia (TIVA). *Anaesth* 2018;**74**(2):211–224.

*Corresponding author:
tom.peck@nhs.net



Authors' example of different coloured screens, acting as visual prompt

THE MILK OF HUMAN KINDNESS: the importance of supporting each other in the workplace



Dr Oliver Boney
ST7 Anaesthesia,
Royal London
Hospital
oliverboney@hotmail.com

As a junior trainee, the majority of my 'bandwidth' was consumed with trying to meet the clinical challenges of my job, and to disguise the frequent moments when my knowledge was insufficient, my clinical skills inadequate, or my previous experience too meagre, to manage the immediate scenario I faced.

Moreover, my perceived shortcomings were compounded on the not infrequent occasions I found myself in theatres with another trainee whose knowledge was superior, whose clinical skills were slicker, and who asked more intelligent questions than I did.

However, as this sense of inadequacy gradually became my default workplace state of mind, I reminded myself that I was still at an early stage of training, and generally tried to knuckle down, do my best, and seek help or advice from those with more wisdom and experience than me. And whenever I failed to hit cerebrospinal fluid with my spinal needle, or struggled with a tricky arterial line, I'd console myself with the thought that once I'd passed my exams and seen everything that anaesthetic training had to throw at me, I too might achieve Anaesthetic Nirvana.

Three years later, I took a break from training to try my hand at health services research. A year's perioperative research fellowship mushroomed into three years, and when I finally re-entered the training programme, having long forgotten anything from FRCA and (or so it felt) most of the anaesthetic know-how I'd previously

picked up, I experienced the same feelings of clinical inadequacy as before. Only this time, my ID badge said 'ST6' instead of 'CT2', which must have made my ignorance and apparent anaesthetic ineptitude all the more perplexing to the consultants who had the pleasure of my company in theatres.

Now in my final year of training, I'm starting to realise two things. First, the 'mastery' of anaesthesia which I had hoped to attain by now (and which is so frequently referred to in the advanced training curriculum) has proved extremely elusive, and will, I fear, remain so until I (hopefully) settle down to a consultant post doing the same lists regularly over several years. Second, almost everyone apart from the pathologically self-confident, or the so-irredeemably-inept-they-don't-even-notice-their-own-failings, often feels this way. It's one manifestation of imposter syndrome, and sometimes there's a healthy stimulus in wanting to improve yourself and being inspired by your colleagues, as long as your perceived failings don't crush your self-esteem and push you into a downward spiral of burnout.



But in the current climate of unprecedented NHS workforce pressures and belated recognition of the prevalence of burnout and low morale among junior doctors, I am actively trying not only to remedy my ongoing (alas) clinical shortcomings and knowledge deficits, but also to focus on what I can offer as a supportive team member. While I may not yet inspire my colleagues as a clinically brilliant anaesthetist, I certainly can do more to support them in lots of simple but important ways. Seemingly small acts of kindness and minor efforts to oil the wheels of human interaction can make the difference between someone having a good or bad day, between a team that works well and one that doesn't, and – ultimately – colleagues who enjoy coming to work and those that don't.

The same philosophy applies to patient care as well. While I strive to provide safe, high-quality clinical care, I also try

to remind myself that patients appreciate a doctor who's nice to them, smiles and gives them the time of day far more than they appreciate a cardiovascularly stable anaesthetic induction or a first-attempt intubation using the C-MAC. Patients quite rightly expect to receive good quality clinical care, but they also want to be treated as human beings, with kindness, compassion and empathy – buzzwords which you'll find in many an NHS trust's 'values', but which need to be delivered by a friendly face, not by an institution.

So – although my efforts to earn the respect of colleagues for my clinical acumen continue undiminished – I'm also trying to remember the importance of the little things in my interactions with colleagues and patients alike: smiling more; being quicker to offer praise, encouragement or reassurance; bringing in cakes when I'm on call (not for the patients, of course); lending a hand or

giving a break to anyone stuck in theatre by themselves; asking about people's holiday plans, and so on. I even try to be nice to the surgeons sometimes (though not too often: where I work, that can be fatal...).

In a nutshell, I'm trying to remember that a doctor is judged not just on their clinical finesse, but also for spreading love in the workplace. In a world of information overload and ever-changing best evidence, maybe I'd prefer to be remembered simply as a nice colleague rather than as a brilliant clinician. And while I can't quote you the latest evidence on the subject, I'd hazard a guess that a little more kindness and a little less clinical governance would do wonders for workforce morale.

Seemingly small acts of kindness can
make the difference between someone
having a good or bad day



Dr Tim Warrener*
ST7 Anaesthesia, Royal Devon and Exeter Hospital

Dr Anne-Marie Bougeard, RCoA Perioperative Medicine Fellow and ST7 Anaesthesia, University Hospitals Plymouth

Dr Mike Swart, RCoA Perioperative Medicine National Clinical Lead and Consultant in Anaesthesia and Perioperative Medicine, Torbay Hospital

Perioperative cardiopulmonary exercise testing in the South West

European¹ and American² guidelines advise assessment of preoperative cardiopulmonary fitness, or functional capacity, to help estimate a patient's individual risk for major morbidity or mortality after surgery. In the UK, there has been an expansion of cardiopulmonary exercise testing to do this objectively.

The recent METS (Measurement of Exercise Tolerance before Surgery) study concluded: 'Preoperative subjective assessment neither accurately identified patients with poor cardiopulmonary fitness nor predicted postoperative morbidity and mortality.' However, a more formal assessment of cardiopulmonary fitness, specifically peak oxygen consumption during cardiopulmonary exercise testing (CPET), improved prediction of moderate or severe postoperative complications.³

In 2016, the Perioperative Exercise Testing and Training Society (POETTS) was developed to promote standardised practice, training and education in perioperative CPET. In early 2018, the

society published their consensus clinical guidelines on indications, organisation, conduct, and physiological interpretation of perioperative CPET.⁴ The guidelines represent best practice by expert consensus and set a standard for all those who perform perioperative CPET.

In the South West, we decided to benchmark our practice with the aim of helping departments achieve compliance if this was thought to be of benefit to patients and medical staff. If the POETTS standards were found to be unachievable, we would highlight this.

We initially benchmarked practice at Torbay Hospital, one of the first centres in the UK to regularly perform perioperative CPET, and later extended a survey out across the south-west peninsula. This included six different trusts, four of which currently have a perioperative CPET service, and two that do not.

The survey included six different sections:

- perioperative CPET service structure and supervision
- preparation for the exercise test
- conduct of the exercise test
- indications for stopping the test
- interpretation of the exercise test
- the perioperative CPET report.

It was sent to the lead clinician for perioperative medicine in each trust to complete.

Results

Of the four trusts which currently offer a perioperative CPET service in the south-west peninsula, compliance with the POETTS consensus guidelines ranged from 66 per cent to 93 per cent. Three trusts achieved at least 85 per cent compliance, and one 66 per cent.

The results demonstrated several patterns of 'non-compliance':

- in one trust, non-compliance with regard to service structure and supervision appeared to stem from non-clinicians performing CPET. There was no quality control in place for test implementation and supervision was from designated consultants working in a nearby, but separate, theatre complex. This supervision was not necessarily always achieved
- the survey also revealed that appropriate resuscitation equipment was not always immediately available
- two sites indicated that they do not routinely measure non-invasive blood pressure, with one commenting that due to artefact the value of this was felt to be low
- no site was fully compliant with the performance of gas-exchange algorithms – two sites performed regular biological control, but this had yet to be formalised; one site used a dynamic torque meter annually; one site was unsure of specific details
- no sites were regularly recording the Borg score to evaluate subjective effort.

In summary, overall compliance with the POETTS guidelines is high, and non-compliance appears to be clustered around a few specific domains. This could reflect a deficit in process at individual sites or a need for more pragmatic guidance. In terms of suggested action

CPET testing setup at Torbay Hospital



from this regional survey, one example is to develop a protocol for regular biological control testing.

We feel that this exercise has demonstrated that the POETTS guidelines are achievable. Results have subsequently been disseminated to individual departments with one trust already starting to look at how they might improve their service.

This has been a useful exercise for us in the South West.

Our next step is to review the survey questionnaire with a broader group who perform CPET. Then we will extend the survey to all UK sites that perform perioperative CPET. This can then lead to a review of the POETTS guidelines.

References

- 1 Kristensen SD et al. Guidelines on non-cardiac surgery: cardiovascular assessment and management: the Joint Task Force on non-cardiac surgery: cardiovascular assessment and management of the European Society of Cardiology (ESC) and the European Society of Anaesthesiology (ESA). *Eur Heart J* 2014;**35**:2383–2431.
- 2 Fleisher LA et al. Guideline on perioperative cardiovascular evaluation and management of patients undergoing noncardiac surgery: a report of the American College of Cardiology/American Heart Association Task Force on Practice Guidelines. *Circulation* 2014;**130**:e278–333.
- 3 Wijeyesundera DN et al. Assessment of functional capacity before major non-cardiac surgery: an international, prospective cohort study. *Lancet* 2018;**391**:2631–2640.
- 4 Levett DZH et al. Perioperative cardiopulmonary exercise testing (CPET): consensus clinical guidelines on indications, organization, conduct, and physiological interpretation. *Br J Anaesth* 2018;**120**(3):484–500.

*Corresponding author:
timothy.warrener@nhs.net

'BATH TEA TROLLEY' TRAINING *part one*



Dr Lucy Corbett
Clinical Fellow, Royal United Hospitals
(RUH) Bath NHS Foundation Trust



Dr Amelia Davies
Clinical Fellow, Royal United Hospitals
(RUH) Bath NHS Foundation Trust

Dr Melanie McDonald, Dr Fiona Kelly* and
Dr Lesley Jordan, Consultant Anaesthetists, Royal United
Hospitals (RUH) Bath NHS Foundation Trust

'Bath tea trolley' training is a novel method of providing multidisciplinary team training in the workplace. Short, succinct 'bite-sized' teaching sessions are brought to staff during their normal working day, optimising educational opportunities and allowing them to train together as a team during their shifts.

How did it start?

The idea came to one consultant anaesthetist during a busy theatre list back in 2014: by 3.00 pm, the last patient on her list was anaesthetised and stable on the operating table and she was desperate for a 'nice cup of tea in the anaesthetic room'. She then imagined two colleagues arriving in her anaesthetic room, providing a five-minute teaching session and refreshments for her and her anaesthetic assistant, and told two anaesthetic trainees about this idea later that afternoon. The three of them piloted the idea the following week, teaching emergency front of neck airway techniques to anaesthetists and anaesthetic assistants.¹ It was a huge success and the idea has snowballed since.²

How does it work?

A team of anaesthetic trainers travel around the theatre suite armed with a trolley with educational materials on the top and a pot of tea and homemade cakes on the bottom. One trainer looks after the patient in theatre for 15 minutes, enabling the listed anaesthetist to attend a short teaching session in their anaesthetic room delivered by a second trainer, followed by refreshments!² There is a film on the RUH website that shows us in action: bit.ly/310kegy

Projects to date

The method works well for practical skills, protocols and guidelines and has been used in theatres, intensive care units, delivery suites and wards (see our full article online: bit.ly/Bath-Part1).^{1,2,3}

Advantages

'Bath tea trolley' training compliments and reinforces existing training sessions and workshops, giving staff the opportunity to practise infrequently used skills and preventing 'skill decay'. It allows rapid dissemination of new guidelines and techniques to the whole team and an opportunity to refresh knowledge of existing ones. This method of training is quick and easy to organise with minimal associated cost: all the equipment is already present in the department, there are no course fees, no need for study leave and all the cakes are homemade!

Training members of staff in this way has many educational benefits: it is a non-threatening teaching method, and teaching can be adjusted to suit different learning styles and levels of knowledge

– it works well for student nurses and professors alike. Handouts allow for reflective learning. We have consistently seen improvements in both participants' self-rated confidence scores following training³ and in knowledge test scores one month later.³ Improved patient safety results were seen following maternal sepsis teaching, with the percentage of mothers screened for sepsis rising from 40 per cent to 100 per cent and the percentage of mothers receiving antibiotics within an hour rising from 50 per cent to 100 per cent.

Maybe the biggest advantage is that it is fun! By training together as a team, we have seen real benefits for morale, communication, teamwork and hierarchy-flattening within the theatre

team. Trainees who have planned and delivered training programmes have enjoyed the process of teaching. Trainer satisfaction is high, the clinical skills of many have improved as a result of training others, and many trainees have been inspired to run similar teaching programmes in other hospitals.

In Bath, we have run 38 tea trolley programmes to date, with more than 100 staff members involved in the teaching and more than 1,800 staff 'mini training episodes' taking place. This teaching method has been used in more than 24 other UK hospitals that we know of, as well as hospitals in France, Canada and Australia. Our team won the Association of Anaesthetists/ Medical Protection Society Patient Safety

Prize 2014, was highly commended in the BMJ Awards 2018 (Education and Training category), and was a finalist in the Health Education England Healthcare Education and Training 'Inspiring Educator' Award 2019.

References

- 1 O'Farrell G, McDonald M, Kelly FE. 'Tea trolley' difficult airway training. *Anaesth* 2014;**70**:104.
- 2 Bassher et al. Never too busy to learn. RCP, 2018 (bit.ly/2MrDOWP).
- 3 Kerton MCS et al. Paediatric anaphylaxis management: training staff to actually draw up the correct dose of adrenaline. *Br J Anaesth* 2018;**120**:881–882.

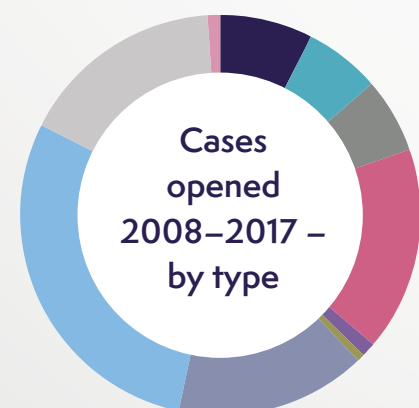
*Corresponding author:
fiona.kelly@doctors.org.uk
@fionafionakel
#bathteatrolley #teatrolleytraining



'YES, YOUR HONOUR...'



In our previous article we outlined the Medical Protection Society's (MPS) analysis of their involvement in more than 3,000 anaesthetic-related cases between 2008 and 2017 (RCoA *Bulletin* 116, July 2019), and we focused on negligence claims. In this second article, we will delve into medical report writing, complaints, local investigations, regulatory (GMC) investigations, and inquests.



Common complaints

Complaints covering the whole spectrum of anaesthesia, in the NHS and private sector, accounted for 16.5 per cent of the anaesthetic cases analysed by the MPS.

Anaesthesia

Non-clinical themes included poor manner and attitude, rudeness, and inappropriate comments to patients both at preoperative assessment and in the anaesthetic room. Complaints were also made by colleagues relating to the clinician's attitude towards co-workers.

Clinical complaints arose from insufficient postoperative analgesia, and painful and/or repeated cannulation attempts. Inadequate anaesthesia, post-dural-puncture headache, haematoma, infection, and neural damage were

involved when neuraxial blockade featured. Other themes included inadequate sedation, cancellation of surgery, post-anaesthesia-aspiration pneumonia, and failure to obtain informed consent for a procedure, for example, nerve block.

Critical care medicine

In Intensive Care, there were allegations of poor communication with relatives, including some with respect to treatment withdrawal.

Pain medicine

Complaints in this field centred around lack of empathy shown during consultations, including inappropriate comments by the anaesthetist. There were alleged delays in providing treatment, of misdiagnosis of the source of pain, and of persistent post-treatment pain.



Dr Naomi Freeman*
ST5 Anaesthetist, East Midlands
School of Anaesthesia



Dr David Bogod
RCoA Council Member and
Consultant Anaesthetist,
Nottingham University Hospitals

Regulatory (GMC) and disciplinary cases

The MPS supported members in both clinical and non-clinical concerns. These were raised by patients and relatives, and by both junior and senior colleagues. Some related to more than one concern or to a series of clinical incidents.

Common themes were:

- **performance** – poor technical skills (including airway management), clinical judgement and communication
- **probity** – leaving anaesthetised patients unattended; not reviewing patients prior to a theatre list; prescribing for family members, colleagues or self; being unavailable when on call or refusing to attend when requested; conducting private practice when on NHS time; false information on job applications forms or appraisals
- **health** – alcohol or drug misuse, theft of drugs from hospitals
- **behaviour** – inappropriate comments made to patients, bullying and harassment of colleagues
- **delegation** – leaving inexperienced juniors alone
- **non-clinical** – assault, drink-driving, shoplifting.

Inquests

An inquest is held to ascertain the who, when, what, where, and how of a death. It is a fact-finding procedure conducted by a coroner, sometimes in front of a jury. The MPS identified the following recurring scenarios from their experience of providing assistance at inquests:

- failure or disconnection of anaesthetic equipment
- delayed or failed intubation

- aspiration
- anaphylaxis
- hypotension and/or hypoxaemia following induction of anaesthesia
- chest-drain complications
- placement of nasogastric tube in the bronchial tree.

Perioperative deaths involved haemorrhage (including postpartum haemorrhage), sepsis, stroke, pulmonary embolism, and myocardial infarction.

The anaesthetist can also be the subject of claims when they are not the primary clinician involved. For example, claims relating to resuscitation techniques throughout the hospital, CT scanning rooms and emergency departments. In some cases, statements were requested by the coroner months or even years after the event, highlighting the importance of good record keeping.

Minimising risk

The analysis from the MPS highlights some common topics of complaint, all of which are grounded in the foundations of good medical practice. The majority of doctors have the patient at the centre of their endeavours, but in a busy specialty it can sometimes be easy to forget, however transiently, that these are fellow humans putting their trust (and lives) in our hands. We should try to understand our patients' concerns and expectations and address any queries they may have. This is particularly pertinent to pain medicine, where a patient may have an unrealistic belief as to the outcome that can be achieved. Risk assessment should be personalised – discuss and explain frequent and serious complications, how these could impact upon that individual patient, and how they would be managed.

Some complaints brought by patients or relatives arise from dissatisfaction with the manner and attitude of their anaesthetist. We must be aware of how we may be perceived during discussions, and ensure that time is taken to offer suitable explanations and answer any questions. We should strive to demonstrate empathy and show our patients that they are the focus of our attention.

In private practice, patients should be given clear information about any costs involved and what their rights are to refunds/return of deposits if they change their mind.

These are not 'rocket science' revelations. They are based on common sense, courtesy, respect and communication. Unfortunately, the best-laid plans and most beneficent of intentions can sometimes be misconstrued: so please ensure you take out full indemnity cover to undertake the entire range of your practice in the UK.

And here's hoping you'll never need it.

Further reading

- More information regarding medicolegal aspects of our practice can be found at: www.medicalprotection.org
- RCoA safety, standards and quality: www.rcoa.ac.uk/safety-standards-quality
- Jolly J, Mounsey H. Learning from UK Anaesthetic cases – an analysis of Medical Protection data. From a letter to the Royal College of Anaesthetists, 2019.

*Corresponding author:
naomifreeman3@gmail.com

Please see the College environment and sustainability pages online at:

www.rcoa.ac.uk/environment-sustainability



Dr Jonny Groome
ST5 Anaesthetist, Barts Health NHS Trust and
Co-founder of the Greener Anaesthesia and
Sustainability Project (GASP)



Greener Anaesthesia and Sustainability Project

Our climate is changing fast,¹ and it will be healthcare workers who are going to be on the front line, dealing with the increased disease burden and socioeconomic consequences.² While our planet is febrile and in need of urgent treatment, we are not at the point of withdrawing care. We are in fact at a crucial point where time matters.

The exciting news is, that within our professional lives we can make simple changes to the way we work that will have significant effects on reducing the environmental impact of healthcare. It is important that we go back to basics.

‘Primum non nocere’ (first, do no harm)

The principle of non-maleficence is not a relic from the time of Hippocrates but an ever-present principle of bioethics. In modern-day practice it is essential that we expand the scope of potential harm from the end of our needle to the wider populace. In September 2019, the international Non-Governmental Organisation, Health Care Without Harm, published their first green paper looking at how the global health sector contributes to the climate crisis. It found that healthcare’s climate footprint is equivalent to 4.4 per cent of global net emissions, while in the UK the NHS is responsible for 5.4 per cent of total net emissions (the equivalent to the greenhouse gas emissions from 11 coal-fired power stations). If the global health sector were a country, it would be the fifth-largest emitting country on the plane.³

In the UK, anaesthetic gases make up 1.7 per cent of NHS total CO₂ emissions (5 per cent of acute hospital emissions).⁴ In looking at their impact we need to take into account two factors: their ability as greenhouse gases to trap heat, and the time they remain in the troposphere. Warming comparisons are made using ‘Global Warming Potential 100’ (GWP 100), which compares agents’ energy absorption to that of CO₂ over 100 years. By definition, CO₂ has a GWP 100 of 1.

It is clear, some agents have significantly less environmental impact than others, and life-cycle analyses suggest that TIVA is better still.⁷ The exciting fact is that low-hanging fruit is

Table 1 Global warming effects of anaesthetic gases^{5,6}

Agent	GWP 100 years	Tropospheric Lifetime (years)	CO ₂ /kg/hour equivalent at low flow (1 L/hr)	Distance/hour in a petrol car (km)	Cost (£)
Sevoflurane	130	1.1	1.3	8	£1.81
Isoflurane	510	3.2	3.5	22	£0.19
Desflurane	2,540	14	61.1	382	£6.43
Nitrous Oxide	290	110	16 (N ₂ O/O ₂ 0.5/0.5 mix)	100	£0.07

abundant when it comes to reducing our carbon footprint in theatre: turning off the anaesthetic-gas-scavenging system (AGSS) when not in use (this is equivalent to more than half the average anaesthesia-related energy consumption), switching from convective to conductive patient warming systems, reducing product use (one yankauer sucker per patient), improving recycling... The list goes on. We can and must do more.

With these incredible opportunities in mind and the strong desire to implement change, in 2018 we set up GASP – the Greener Anaesthesia and Sustainability Project. We are a grass-roots, non-profit, multidisciplinary organisation with one mission: to take immediate collective action to reduce the environmental impact of healthcare in the UK and beyond. We do this through education, improvement, influencing, and knowledge sharing. Working alongside the College, the Association of Anaesthetists and the Centre for Sustainable Healthcare, we want to help people set up and run projects based around our mission statement. We aid the continuation and promotion of sustainability projects for trainees moving through the programme, and reach out to medical schools, allied health professionals and other specialties, providing them with easily accessible information and

support, be it with setting up projects, education, or tackling industry.

We have a duty of care to patients, and in order to do that justice we need to acknowledge that we have a duty of care to our planet as well. It’s time we cleaned up our practice, and we want to help you do it. Join our movement and get involved in this incredible opportunity to implement effective, essential and meaningful change.

www.gaspanaesthesia.com
gaspanaesthesia@gmail.com
@GASPanaesthesia

References

- 1 Masson-Delmotte et al. IPCC 2018: Summary for Policymakers. In: Global Warming of 1.5°C ([bit.ly/2q3tRyo](https://www.ipcc.ch/report/sr15/)).
- 2 Vardoulakis S, Heaviside C. Health effects of climate change in the UK 2012 – current evidence, recommendations, and research gaps. HPA, 2012 ([bit.ly/2BWwC09](https://www.hpa.gov.uk/about-us/publications/health-effects-of-climate-change-in-the-uk-2012)).
- 3 Karliner J et al. Health Care’s Climate Footprint. How the health sector contributes to the global climate crisis and opportunities for action. ARUP, 2019 ([bit.ly/2BTwrjJ](https://www.arup.com/resources/publications/health-care-climate-footprint)).
- 4 Carbon Footprint from Anaesthetic Gases. Sustainable Development Unit, 2013 ([bit.ly/2CICbkF](https://www.sdu.ac.uk/research/carbon-footprint-from-anaesthetic-gases)).
- 5 Campbell M, Pierce TJM. Atmospheric science, anaesthesia, and the Environment. CEACCP 2015;15(4):173–179.
- 6 Pierce TJM. The Anaesthetic Impact Calculator ([bit.ly/AnaesCalc](https://www.anaesthesiaimpactcalculator.com/)).
- 7 Sherman J et al. Life Cycle Greenhouse Gas Emissions of Anesthetic Drugs. Anesth Analg 2012;114(5):1086–1090.



Dr Tom Pierce
RCoA Environmental Advisor
to the President



Dr Cathy Lawson*
Association of Anaesthetists and
Centre for Sustainable Healthcare
Fellow in Environmentally
Sustainable Anaesthesia,
Newcastle

A CALL TO ARMS

Over the last 10 years concern for the environment and increasing evidence for climate change have moved, quite rightly, from fringe thinking to everyday discussion. In many ways our own specialty has been able to reflect this sea change of opinion, driven by both the Association of Anaesthetists and the College in their strategies and guidelines for practice. Add in Greta Thunberg, Extinction Rebellion, and school strikes and the mood has changed from what could be done to what can I do to minimise the environmental impact of my anaesthetic practice?

The 2020 College curriculum for training is in its final stages of preparation. It has been written as a series of learning outcomes, and it importantly includes domains that incorporate sustainable practice, efficient use of healthcare resources and the environmental impact of healthcare delivery. Such subjects are not currently included in any of the standard textbooks on anaesthesia, nor will they be for the foreseeable future.

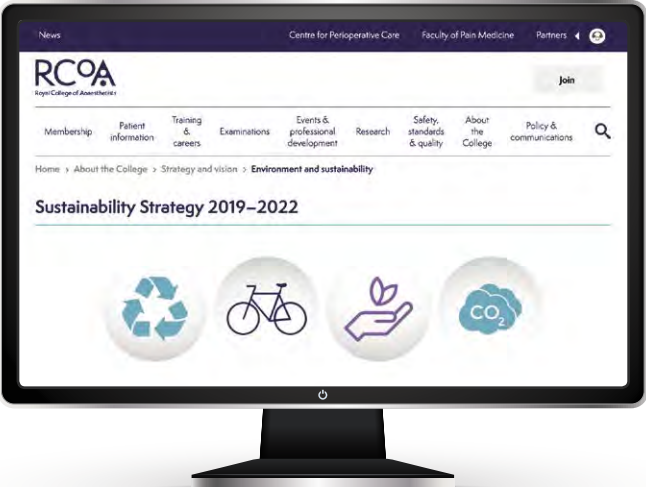
The e-learning platform not only presents us with the opportunity to populate the learning outcomes scientifically, but it also has a dynamism that permits a wider, faster dissemination. Furthermore, this format allows changes to be made in the light of new data. We propose to use this platform to respond to both the need and the desire to publish a series on environmentally sustainable anaesthetic practice.

We could, of course, sit down and write all the material ourselves, but this, we feel, might be construed as imposing top-down demands. We all

recognise that to meet any form of climate change obligations requires a fundamental shift in almost all areas of life. To embed the need for change, we feel that anaesthetists need to own it and be responsible for it. And so, we are searching for volunteers to take on the authorship and a team of editors who will work with the authors to format it. We propose that none of the sections will be too large an undertaking or too daunting, and help will be on hand throughout the process. We have included a brief outline of the modules and their associated learning outcomes in the table opposite.

If you are keen and enthusiastic to join us on our journey to a more sustainable specialty and healthcare system, then please email envirofellow@anaesthetists.org, and let us know which module you'd like to write. If you feel that a whole module is too much for you, then team up with a friend and co-write. This is a truly fantastic opportunity that will allow you to help change the direction of anaesthetic training and learning. We look forward to hearing from you soon.

*Corresponding author:
envirofellow@anaesthetists.org



Please see the College's Sustainability Strategy online at:
www.rcoa.ac.uk/sustainability-strategy-2019-2022

Module title	Learning outcomes
Background science	Atmospheric structure and science. Intergovernmental Panel on Climate Change (IPCC). World Meteorological Organisation (WMO). Climate change summits (COP). Climate change and global warming – definitions of carbon dioxide equivalents (CO ₂ e), global warming potential (GWP), ozone depleting potential (ODP), radiative forcing.
Health and climate change	Health implications of climate change and global warming. Air pollution and cardiorespiratory disease. The role of public health and population-based health. Social sustainability, social inequalities, and civility in healthcare. Healthcare within the agreements below.
International agreements	Montreal, Kyoto, Kigali, Paris, Osaka, Glasgow 2020. Healthcare without harm. Greenhouse gas protocol. Climate Change Act. Other government Acts and policies, as well as UK and global strategies for climate change.
Sustainable healthcare	Definitions (sustainability and sustainable healthcare). Value in healthcare – triple bottom line. Proportion of CO ₂ e attributable to healthcare (UK and worldwide). Targets for emissions reduction and UK wide organisations (Sustainable Development Unit and Centre for Sustainable Healthcare Principles of sustainable quality improvement).
Procurement and carbon costing	Overview of procurement process and NHS supply chain. Scope 1, 2 and 3 emissions (see the Greenhouse Gas protocol). Carbon analyses – life cycle, cradle-to-gate and cradle-to-grave. Whole-life-cycle costing. Current supply chain and procurement models vs ideal sustainable system.
Medical gases	Greenhouse gas effect and CO ₂ e. Main areas of use and Control of Substances Hazardous to Health Regulations (COSHH). Actions to mitigate their environmental impact, including innovations such as capture (volatiles) and cracking (N ₂ O). Lower-carbon alternatives to their use. National strategies and initiatives to measure and audit medical gas use and their environmental impact.
Intravenous and local anaesthetic agents	Carbon emissions – inhalational vs intravenous vs regional (CO ₂ e). Pharmaceutical water course contamination – implications and strategies to minimise. Limitations of current evidence base and areas that future research should focus on. Role and responsibility that industry has to play in sustainable healthcare.
Processes, pathways and journeys	Increasing efficiencies and minimising waste (Muda principles, and SUSQI – the Centre for Sustainable Healthcare's 'Sustainability in Quality Improvement' framework). Cutting waste in clinical care (lean patient pathways) and choosing wisely. Healthcare related transport – contribution to climate change and chronic disease. Active transport, low-carbon transport and positive health benefits for patients, relatives and staff.
Energy use and water consumption	Carbon intensities of electricity – grid vs combined heat and power (CHP). Reduction of carbon intensity – renewable sources, grid decarbonisation. Operating theatre and ICU as high-intensity energy areas – initiatives to reduce waste and increase efficiency. Water consumption – areas of high use and potential waste. Water-reuse management and how pharmaceutical pollution may impact on this.
Waste – what happens to it?	Waste regulations summarised, including specifics for pharmaceuticals disposal. Department for Environment, Food and Rural Affairs' waste hierarchy. Waste streams, including specialist recycling. Waste segregation (benefits and pitfalls). How we can reduce our waste.
The anaesthetist as an educator	Education and promotion on a departmental level, including embedding SUSQI. Wider opportunities extending beyond the operating theatre. Patient engagement and health promotion, making environmentally preferable choices. Sustainable Development Management Plan – what is it, and how does it relate to anaesthesia? National promotion of sustainability – College, Association, General Medical Council, and other professional bodies.

HOW STANDARDS ARE CHANGING THE FUTURE OF CARE

Professor Maureen Baker CBE

Chair, Professional Record Standards Body (PRSB)

info@theprsb.org

The College's ground-breaking Centre for Perioperative Care is an exciting initiative that promises not only to improve care and outcomes for patients but also to drive closer collaboration between health and care professionals and their patients.



The key to improving cross-specialty working is better information sharing between members of the healthcare team, and for the 10 million patients who undergo surgery every year there is an equally powerful opportunity to communicate more effectively and to empower people to take greater control of their health and wellbeing.

For anaesthetists, having access to high-quality digital patient records is the key to delivery of safe and effective clinical care. Before surgery, good information sharing supports treatment planning and helps the patient and clinical team optimise the chances of a good recovery. Following surgery, it can ensure that a person gets exactly the right follow-up care, improving their recovery in the community and reducing the chances of re-admission and wastage of medications.

The PRSB is working closely with health and care professionals and patients to develop clinical standards for patient care records. Once implemented, these standards will allow health and care professionals to share and access information digitally between different services. As part of our work, we have delivered a series of standards to support transfers of care, which will make sure that people in different services have access to the information they need at the right time. For example, our eDischarge Summary Standard (bit.ly/32dvmqV) is already being implemented across the UK, and is leading to improvements in care. In Wales, community pharmacies have been receiving key information about medication from discharge



The PRSB is working closely with health and care professionals and patients to develop clinical standards for patient care records

summaries, which is helping them to offer continued support services to patients. In addition to gaining positive feedback from patients, the service has led to better medications compliance and waste reduction. If a person has been discharged after surgery, they will have the support they need to better manage their own aftercare.

By joining up just two cogwheels, we have already seen the benefits. However, we are aware that there is further work to be done so that different services are more easily able to work together in order to provide the best personalised care for patients. As part of this, PRSB is currently spearheading a collaboration with local health and care record programmes to drive adoption of the new standard for shared care records (bit.ly/2rgvI95). This will support the sharing of vital information about a person between health and care systems so that care is safer, timely, and more effective. The standard includes a wide range of information from different services, including GPs, hospitals, social care services, and mental health services among others. It will incorporate an 'About me' section, which outlines what people want professionals to know about their care, as well as other crucial information such as allergies, medications and alerts. Once implemented, it will mean that everyone

involved in a person's care, including the patient, carer, and guardian, will have access to relevant data. As a result, people won't have to repeatedly restate their care history and services will be able to deliver tailored, personalised care. It also means that patients will be able to take better control of their own health, which will be important for those who are preparing for surgery or receiving postoperative care. For anaesthetists and other professionals, this information will be invaluable, increasing efficiency and allowing them to better support patients.

We are exploring a number of new ideas to ensure that the standard can be put into practice, including that of a working group to support different regions to get started. The first regions that have been selected to pilot the standard are Greater Manchester, Thames Valley and Surrey, Wessex, One London, and Yorkshire and Humber. Earlier this year we published a core-information standard (bit.ly/2rgvI95), which determines the information that should appear in a shared care record.

At the same time, we are working on standards in new areas of emerging research which will have an impact on the future of care. By autumn 2019, the amount of genomic information available will increase significantly. Currently, data shows that there are findings of practical significance in up to 85% of genomic

records that could help to improve care. The PRSB has been asked to develop guidance on what information should be shared and with whom, and when to support prescribing. One of the key areas of focus will be pain medication and how to alert clinicians to relevant genetic information that could affect this. For anaesthetists who manage pain control, these alerts will better support them in managing care. If this information could be shared digitally between different care providers, it will better enable doctors and other professionals to tailor medical care to individual needs.

In the past, standardisation has been considered a compliance issue, but in reality information is the backbone of safe and effective care. The driving of innovation, and the maintenance of accurate digital records that can be shared between care providers are the key to activating real cultural change across health and care. By directly engaging clinicians and patients with the process, we can create a digital system that works for all and leads to more efficient services.

The PRSB is seeking the support of anaesthetists, among other professionals, to both develop and implement standards. To get involved with our work or for more information, please contact info@theprsb.org



Dr Hilary Swales*
Consultant Anaesthetist,
University Hospital
Southampton NHS Foundation
Trust and Lead for Exam
Support HEE Wessex



Dr Poppy Mackie
Consultant Anaesthetist,
University Hospital
Southampton NHS Foundation
Trust and Lead for Exam
Support HEE Wessex

EXAM PREPARATION

Myths and tips

Over the last three years we have identified some common themes from our work for the Wessex Deanery Professional Support Unit, where we coach trainees from all specialties struggling with postgraduate exams. We felt it would be useful to share some of these points, as it may help trainees plan a successful journey as they prepare for the exam.

Exams are costly in terms of physical and emotional energy, as well as time, relationships and finances. It is worth considering your plan from the outset of your revision.

When at school and university, your *raison d'être* was to pass exams. You had the luxury of being able to indulge your full focus on exams and not worry about too much else. Postgraduate exams are challenging because you are now working; you have rota duties to fulfil and are often commuting to work, and you also have other personal commitments. Sadly, there are no shortcuts, but there are certainly ways to make the best use of the time you have.

Be prepared! We have heard from many trainees who attempted their exams on at least one occasion without proper preparation 'just to see what it was like'. This is a costly approach for many reasons – don't underestimate the potential effect of failure on your morale. There is a maximum number of attempts you are allowed and also a degree of time pressure within the training programmes, so planning ahead

is important. It is worth considering what other events are going on in your life – if you are rebuilding your house, getting married and having a baby, this may not be the time to attempt the exam!

We have identified the following key areas to consider when planning your approach to the exam.

Study skills

Reflect on your learning style. What study methods worked well for you in the past? You will have refined your revision techniques significantly over the years, but go back and review your previous good habits.

There are no short cuts, and relying purely on practising multiple choice questions (MCQs) is not going to give you the firm knowledge base you require for the FRCA, although this is a common myth passed down through generations of trainees. Reading is the key, and ensuring you are actively engaged with your reading and challenging yourself in the process to check your ability to recall the knowledge. Writing notes can help, and there are a range of other methods you can use

to aid your memory, such as the use of mind-maps and mnemonics, adding colour to your notes, labelling lists and drawing diagrams, and the use of Post-it Notes (especially by sticking them in strategic places!). Podcasts can be a help to those with long commutes. All these will help you to build your knowledge and understanding, organise your ideas and build a lasting memory of the knowledge required for the exam (and beyond!).

Time management

You are relatively time poor, so make every revision session count – short, focused sessions are likely to be more productive. The optimum concentration time period is, on average, about 40 minutes. Test your recall of the topic at the end of the session and plan ahead to future sessions. Balance reading sessions with practice-question sessions, making sure the emphasis is on learning from the books and testing your recall with the questions. You will undoubtedly add further knowledge through answering the questions, particularly with the helpful model answers, but use this to supplement your understanding rather

than making it your primary resource. Plan out a timetable by dividing the time you have available into the number of syllabus areas you have to cover. Concentrate on those areas you find tricky, as well as areas that come up more frequently.

Motivation

This is a key ingredient of good revision. You can boost your motivation by setting yourself achievable goals and targets and giving yourself rewards (such as a coffee with friends, time with your children) for achieving these. Peer support has been shown to make a tremendous difference to revision, and will certainly help boost motivation. Keeping a positive mind-set towards the exam and feeling in control of your plan will help.

Wellbeing

Wellbeing is also an essential ingredient for maintaining motivation. Exercise can really help boost your wellbeing

during the weeks and months of revision, and there is nothing like a boost of endorphins to make you feel better. Sleep is another essential consideration. You continue to lay down memory while asleep and learning requires good sleep, so beware of burning too much of the midnight oil and of too much caffeine, and switch off your screen an hour before bed.

Spending time with family and friends can help you relax and take your mind off the exam. Obviously, this has to be balanced with work and revision, but it is helpful to factor small doses of all of these things into your plan to help you keep feeling positive. Exam nerves can sometimes get the better of candidates. It is worth considering in advance how you may best manage this. There are some very helpful mindfulness exercises that you can practise for this. It is worth trying these out in advance of the exam.

Exam technique

Practice questions for all parts of the exam are an essential part of preparation. As mentioned before, it is a helpful way of testing your recall but you also need to refine your techniques. Practice is the key to this. Answering MCQs is very different to giving answers in a structured oral exam, and each requires a different set of skills which require practice. If you are finding yourself struggling to finish exams because you read slowly, consider whether you could have dyslexia. Doctors are bright and develop many coping strategies, so it's worth checking it out. Likewise, seek support if your communication skills (verbal and non-verbal) are letting you down.

So...good luck! But remember... the better your preparation, the luckier you will be!

*Corresponding author:
h.swales@nhs.net



Please see the College website for exam resources for candidates:

www.rcoa.ac.uk/examinations

and our revision courses:

www.rcoa.ac.uk/events



Professor William Harrop-Griffiths
RCoA Council Member and Professor of Practice
(Anaesthesia), Imperial College Healthcare NHS Trust, London
awhg@mac.com

ANAESTHETIC SOAPBOX #4

In praise of obstetric anaesthetists

In four decades of regular obstetric anaesthetic practice, I have inserted thousands of epidurals and spinals for pain relief in labour and for caesarean section. However, I would never call myself an 'obstetric anaesthetist'. Rather, I self-identify as 'an anaesthetist who does obstetric anaesthesia'.

The difference is not immediately evident, so I will explain. My realisation that obstetric anaesthetists are a separate species started in 1982 when I was told by one that 'pregnant women can be difficult to intubate because their breasts are enlarged and can obstruct the laryngoscope handle'. I pointed out to my teacher that, even in pregnant women, breasts tend not to be midline structures, whereas the handle of a laryngoscope tends always to be in the midline. He was displeased, for I had not accepted as sacred truth the wisdom of the obstetric anaesthetic community.

Such devotion to outmoded tenets still exists. There are some obstetric anaesthetists who hold on to the unshakable view that the ideal induction agents for caesarean section under general anaesthesia are two 'museum' drugs called thiopental and suxamethonium. Why a trainee who has only ever known propofol and rocuronium should be obliged to use two unfamiliar drugs for an urgent section is a mystery to me and a nightmare for the trainee. One can only hope that the obstetric anaesthetic community will ease itself into the pharmacological 21st century some time soon.

However, that which makes the obstetric anaesthetist 'special' (as in Nemo's fin) goes deeper than this, manifesting itself as bizarre rituals that permeate the rite of neuraxial block insertion:

- Injection of lidocaine into the back with an orange (25G) needle that is replaced by a green (21G) needle for further injection. This is both illogical and a waste of time. Although there are parts of the body that can differentiate between these two needles (think homunculus), the skin over the lumbar spine is not one of them. If you do not believe this, try it at home with a friend.

- The insertion of a CSE with the patient in the sitting position followed by lying them onto their side before the epidural is secured. This too is illogical. The argument advanced is that the intrathecal heavy bupivacaine will spread better if the patient is lying down. So why not lie her down for the whole CSE and thereby avoid the manoeuvring? I have spent 37 years inserting spinals and epidurals into women in the lateral position, and my success rates are no worse than anyone else. The argument that 'it is easier to identify the midline in the sitting patient' holds increasingly less water in an age in which ultrasound machines are both widely available and easily capable of identifying the dura mater itself, let alone the midline.

- An insistence on overcomplicating block height testing. At first it was just the cold sensation provided by ethyl chloride. Then it was the differentiation between touch and cold. Now, obstetric anaesthetists ask their patients to 'touch yourself and tell me whether you can feel yourself touching yourself', a concept that few native English speakers can fully grasp and which leaves others completely befuddled. The latest in my list of strange block-testing rituals was added recently when my trainee asked our patient whether she could 'feel herself clenching her pelvic floor'. Our non-native English speaking patient was nonplussed and I was reduced to giggles.

I could go on, but as I suspect that by now I have already alienated all obstetric anaesthetists, let me redress the situation by offering a compliment. Obstetric anaesthetists number among the finest anaesthetists with whom I have ever worked. However, they should never try to convince themselves (or indeed anyone else) that their mastery of the technical complexity of obstetric anaesthesia is what sets them apart from

others. It is almost always incredibly simple to insert spinals, epidurals, or a combination of the two, into women of child-bearing age. The great skill of the obstetric anaesthetist is not in performing these tasks but in doing so in a human-factors environment that can only, on occasion, be described as mind-bogglingly hideous. When things go wrong in obstetrics you quickly become the main focus of the intense anxiety of all those around you – obstetricians, midwives, paediatricians, patients, partners, and anyone else in theatre. To perform a faultless neuraxial block in those circumstances and to do so reliably, swiftly, cheerfully and with an air of competent and almost nonchalant professionalism, is something that is very, very special indeed.

Obstetric anaesthetists, I call on you to celebrate your remarkable skills. In setting myself apart from you by calling myself an 'anaesthetist who does obstetric anaesthesia', I seek not to alienate you but to point out to you that although almost all of what you do is absolutely wonderful, some of it is just downright potty.

I'll get my coat...

A RESPONSE FROM THE EDITOR

Dr David Bogod, Proud Obstetric Anaesthetist, Nottingham

I have the greatest respect for William Harrop-Griffiths. We have been through the fires of academic and political anaesthesia together, and have come out stronger and wiser for it (well, I have, anyway). His clinical skill is second to none; if I were having a caesarean section, he is the man I would choose to stab me in the back, or in the neck for a rotator-cuff repair.

But he has always had a bit of a downer on obstetric anaesthesia, so his diatribe does not surprise me. Sometimes I wonder if it's jealousy, frankly. In any event, I don't want to spoil the fun by being too anal, but let's just look at the midline breasts question, seeing as how he brings it up. Here's what actually happens. The presence of the breasts means that the arm applying cricoid pressure has to be disposed much more vertically than in the flat-chested male. The handle of the laryngoscope, pointing sharply down towards the neck as the blade is manipulated over the tongue, impacts the cricoid arm and, voila! There are ways around this, of course, but they are only known to the cognoscenti...

Will's other arguments can be disposed of by similar application of common sense and nit-picking, or alternatively by gently pointing out that some of the stuff he sees is not just London-centric but also London-eccentric. Lying patients down after a CSE before the catheter is secured? Asking patients if they can feel themselves touching themselves? As for being in touch with your pelvic floor – in Nottingham you could be arrested for that sort of thing.

What we do agree on, though, is the pre-eminent importance of the non-technical stuff, the communications skills, the human factors, the steadiness of nerve that lets you keep your head when all around are losing theirs. Of course it's not the ability to cleanly and elegantly put in an epidural when a woman is writhing in pain that separates us from the common herd – it's the ability to calm and reassure her and her partner in that very tense environment. But the same point applies to any subspecialty in our field. Ophthalmic anaesthetists get very good at sticking needles behind the eye, cardiac anaesthetists at pushing

a large probe down the oesophagus, upper-limb anaesthetists at directing ever-smaller doses of local anaesthetic ever closer to a large bundle of nerves. All of these are highly technical skills, but all can be learnt by any intelligent and well motivated non-medical individual with a couple of days of intensive training.

Obstetrics is challenging because of its unpredictability, the non-serial nature of the workload, the need for excellent teamwork with a very disparate group of professionals, the intensity of the emotions surrounding childbirth, the politics, the ethical dilemmas – and the occasional total mayhem. Obstetric anaesthetists are a very special breed. Plus, we've got the second-biggest specialist society, so there!

PS The difficult-airway bunch are bigger, but that's another story...



PERIOPERATIVE JOURNAL WATCH

Dr Katie Samuel, ST7 and Dr Chris Sadler, Clinical Fellow, Bristol School of Anaesthesia

Perioperative Journal Watch is written by TRIPOM (trainees with an interest in perioperative medicine – www.tripom.org), and is a brief distillation of recent important papers and articles on perioperative medicine from across the spectrum of medical publications.

Screening for delirium after surgery: validation of the four A's test (4AT) in the post-anaesthesia care unit

Saller et al. *Anaesth* 2019;**74**:1260–1266.

This German study evaluated the accuracy of a common postoperative delirium screening tool, the four A's test (4AT), in tertiary post-anaesthesia care units. This tool uses Alertness, Abbreviated Mental Test 4 (AMT4), Attention, and Acute Change parameters to assess delirium, and was compared with standard assessment by experienced psychiatric clinicians.

543 patients were examined, and of the 4.1 per cent that were deemed to have delirium, the 4AT and the standard assessment had a sensitivity and specificity of 95.5 per cent and 99.2 per cent respectively. The authors therefore encourage the use of the 4AT as an easy-to-use and robust tool for the detection of delirium in the postoperative period.

A randomised trial of non-invasive cardiac output monitoring to guide haemodynamic optimisation in high-risk patients undergoing urgent surgical repair of proximal femoral fractures

Davies et al. *Periop Med* 2019;**8**:8.

This blinded randomised control trial studied high-risk hip-fracture patients (Nottingham Hip Fracture Score ≥ 5) to see whether optimised intraoperative blood pressure and fluid management reduced postoperative complications.

240 patients received either standard care or specific fluid and vasopressor management based on an algorithm using non-invasive technology. There was no significant difference in complication rate, and only a very modest reduction in hospital length of stay in the intervention group.

The authors suggest that the lack of difference could be due to confounders of co-morbidities and poor cardiac function within the population of the study.

Effects of depth of neuromuscular block on postoperative pain during laparoscopic gastrectomy

Choi et al. *Euro J Anaesthesiol* 2019;**36**(11):863–870.

Few studies have investigated deep neuromuscular blockade (NMB) and its influence on postoperative pain. This randomised trial from South Korea studied the effect of depth of NMB on pain after laparoscopic gastrectomy.

100 patients received deep (post-tetanic count 1–2) or moderate (train of four count 1–2) levels of NMB and were asked to rate their pain in recovery postoperatively. All received oxycodone until adequate pain control was achieved, so allowing the minimum effective analgesia dose to be ascertained.

Although this was an interesting attempt to suggest a way to improve postoperative pain, there was no causal relationship described between either group in the endpoints measured. The use of simpler analgesic adjuncts was encouraged instead.

Warming strategies for preventing hypothermia and shivering during caesarean section: a systematic review with network meta-analysis of randomised clinical trials

Chen et al. *Intern J Surg* 2019;**71**:21–28.

Shivering and hypothermia are very common and often upsetting complications that occur during caesarean section. This meta-analysis reviewed randomised control trials with primary outcomes relating to warming strategies.

1,953 women undergoing caesarean section from 18 trials were included, with 11 active warming methods considered. Quantitative synthesis was performed, and suggested a combination of a warmed gown, fluids and forced air as the optimal method to reduce shivering, although without significance. Conduction mattress warming or a combination of conduction mattress and fluids warming were found to be the best in reducing hypothermia.

INTEGRATE... AND GET THE BEST OF BOTH WORLDS!

Trying to get my head around a system I did not understand, I was observing a consultant on my very first day working in the NHS.

'What would you want to dream about when you are asleep?' the consultant asked the patient who was about to be anaesthetised. 'Having a big fry up!' the patient answered with a big grin.

*Corresponding author:
desilvaruwanmali@yahoo.com



Dr Ruwanmali De Silva*
Consultant Anaesthetist
and Member, RCoA MTI
Leadership Group, Medway
Maritime NHS Foundation Trust



Dr Manisha Shah
Consultant Anaesthetist and
Simulation Lead, Medway
Maritime NHS Foundation Trust

I was left scratching my head, trying to figure out what on earth these words had meant, to have them explained to me later on by a giggling consultant. She had never imagined that I would not understand such a simple comment but, having just arrived from Sri Lanka, the 'lingo' was beyond me – despite having passed the IELTS (International English Language Testing System) at my first attempt!

In 2005, I arrived in the UK as an overseas doctor to complete postgraduate training. As a senior registrar, I was very confident of my clinical skills but still completely unfamiliar with the UK's NHS systems. I have now progressed far enough to be selected as a College Final FRCA examiner, but I have never forgotten how I felt back then, or how my skills were doubted simply because I stood back awaiting orders from the consultant because that was how I had been expected to practise in Sri Lanka.

Support and understanding in the integration of overseas doctors provides the most effective way to ease them into a new and unfamiliar working environment and build up their confidence. The generic trust inductions are not tailored for International Medical Graduates' (IMGs) needs.¹ Experiential learning simulation can be an invaluable help for the alignment of their existing skills with an unfamiliar environment and for supporting them and developing their confidence.²

Our simulation faculty led a very successful five-day simulation-based induction at Medway Maritime NHS

Foundation Trust (MMFT) to support IMGs in internal medicine. This was in response to a realisation that IMGs were lacking the confidence to step up to registrar posts for the underfilled medical rota. The programme included a resilience workshop featuring a consultant psychiatrist, one-to-one skills training and two days of high-fidelity simulation training. This was followed by a second resilience workshop to tie up any loose ends. The pre- and post-course questionnaire showed improvements in competence and confidence; it also highlighted those areas in which trainees needed further support.

The financial cost of the course was offset by about 50 per cent as a result of the reduction in the cost of agency cover. The avoidable cardiac arrest calls were reduced by 53 per cent, GMC survey was positive for workload and the improvements were reflected in the Care Quality Commission visit report.

The programme was highly commended in the British Medical Journal Awards for 2019 and shortlisted for the Health Service Journal Value Awards.

Having the privilege and honour to be a member of the College's Medical Training Initiative (MTI) Leadership Group, and having worked closely to facilitate MTI training with our brilliant Global Partnerships team, we have introduced such a programme for participants across the UK. The aim of this is to have a uniform two-day simulation programme exclusively for MTI doctors, held twice a year in four selected UK centres with a geographical coverage that will make it accessible

for all MTI doctors. The first pilot programme will be in December 2019 at the Medway Maritime Foundation Trust in Kent.

As already noted, integration of IMG doctors into the NHS comes with unique challenges which need a tailored approach. We have used our existing knowledge and skills as a simulation faculty, as well as experience from other training courses, to develop this induction programme for MTI trainees, making it widely available and sustainable. The cost savings by cutting down the use of agency staff make it financially viable, and patient safety is improved by enhancing continuity of care. Such training for MTI doctors at the commencement of their placement speeds up their integration and enhances the experience provided by placements in the NHS. As a result, it is expected to have a positive impact on the healthcare systems of the doctors' native countries when they return and share the lessons.

Acknowledgements

David Calderon-Prada in the College's Global Partnerships team for invaluable help and coordination for all MTI activity. Gemma Wrighton, Simulation Centre Manager at MMFT, for facilitating the course. Garry Knowels for technical support.

References

- 1 Bhat M, Ajaz A, Zaman N. Difficulties for international medical graduates working in the NHS. *BMJ* 2014;**348**:g3120.
- 2 Victor J et al. Effects of an experiential learning simulation design on clinical nursing judgment development. *Nurse Educator* 2015;**40**(5):228–232.

The Quality Improvement Compendium

COMING SOON!



Dr Maria Cheresheva*, Dr Carolyn Johnston, Professor Carol Peden and Dr John Colvin, Editors of the RCoA Quality Improvement Compendium

The new edition of *Raising the standard: a compendium of audit recipes* is currently with our proofreaders and is being prepared for publication. We want to take this opportunity to tell you a little bit about what to expect in the new edition.

We are confident that this edition will be the 'go-to' resource for all the quality improvement (QI) needs of trainees, trainers and others who want to undertake improvement work within anaesthesia, intensive care and perioperative medicine.

The new edition will be similar to the previous edition, and will contain two sections. Section A is dedicated to the background of QI methodology and resources; section B will contain chapters covering a whole spectrum of anaesthesia and the provision of perioperative medicine, intensive care and pain medicine, including a new chapter on cardiothoracic anaesthesia.

The titles of the recipes for each chapter in section B were decided with the help of experts in their topic area such as specialist societies, the Faculty of Intensive Care Medicine, Guidelines for the Provision of Anaesthetic Services (GPAS) chapter editors and perioperative leads, and include wider national health priorities. Each recipe is written to a template that describes why this project should be done, provides background information, and identifies where the standards in that recipe come from, and the best-practice publications relating to that subject. The last section of each recipe is the QI section, where suggestions are put forward as to how improvements may be achieved and some steps that can be taken. The authors of the recipes include subject

experts, committee members of specialist societies, GPAS contributors, and trainees.

As well as the individual authors who wrote the recipes, each chapter has an editor who is responsible for the clinical content. The chapter editors are current or previous GPAS contributors for that particular subject area. This ensures that content is up to date. Each chapter also has a QI editor. The QI editors are a new addition to the editorial team for this edition of the Compendium, and their role is to ensure that each recipe offers suitable QI methodology or 'real life' examples that will be 'workable' for anaesthetists aiming to make improvements. The overall editorial responsibility lies with the main editors,

who continuously support the writers and the other editors to ensure that high-quality content is being delivered.

It is the intended purpose of this QI Compendium to facilitate and strengthen delivery of continuous improvement and safety programmes that are aligned with College professional standards and accreditation. It is aimed at supporting departments in the making of continuous improvement in a way that provides opportunities for trainees and consultants to participate and to learn QI methodology. Each recipe is linked to the relevant GPAS and Anaesthesia Clinical Services Accreditation (ACSA) standards, and these are listed alongside the recipe. For trainees in particular, each recipe will link with the relevant QI and safety training requirements in the new anaesthesia curriculum. The Compendium will therefore provide a unique link between training, clinical standards and delivery of care to guide anaesthetic departments in a practical way in the development of their QI strategies.

This edition places more emphasis on QI, and we in the editorial team have aimed to make sure that QI methodology, habits and values were clearly visible and accessible to anyone interested in practising this at their institution. Easy-to-follow recipes and 'real life' examples should make it easier both to start your improvement project and to continue the introduction of improvements.

The draft Compendium has been reviewed by a range of interested parties to ensure it will meet the needs of all our readers. We have consulted with the trainee committees of the College and the Association of Anaesthetists, and with the Safe Anaesthesia Liaison Group, the College's Lay Committee and Professional Standards Advisory Group and the Health Services Research Centre to ensure that the Compendium's content is in line with our brief.



We have been very impressed and profoundly grateful for the contributions of our fellow anaesthetists to this project – giving their time freely to produce content that will hopefully be of benefit to our specialty for years to come. We hope you will find it a useful resource.

*Corresponding author:
mchereshneva@rcoa.ac.uk

We will be formally launching the fourth edition of the Compendium at Anaesthesia 2020 in May

Adjusting to life in the UK

A FIRST-PERSON EXPERIENCE



Coming towards the end of my training programme in my home country, Nigeria, I had started to question the scope of my anaesthetic practice and yearn for something more – more satisfaction in making a positive difference in the patient's experience of anaesthesia and improving the statistics.

It was about this point that I learned about the Medical Training Initiative (MTI) scheme and decided to apply for the opportunity to gain experience of working in the NHS.

After successfully obtaining an MTI post and concluding most of my travel arrangements, I was faced with the stark reality of an abrupt change in environment, weather, etc, and separation from family and friends. I had so many questions in my head – 'What if this doesn't work?', 'What if this is some huge mistake?', 'Will I fit in?', etc. Fortunately, I had a small network of friends who were living in the UK and

who helped with advice and information on some of what to expect and how to prepare for the change.

I arrived in Bangor on 4 November 2018 and was greeted by the winter chill. Thanks to the support of a very dear friend and a warm and welcoming anaesthetic department, I started to gradually settle in and adjust to the rigours and demands of my new role in the NHS.

Anaesthetic practice is quite similar in most parts of the world, so it was fairly easy settling into the routine of clinical work. The most difficult

part of the adjustment process was the 'paperwork' (filling out forms, GP and National Insurance Number registration, induction, writing postoperative orders, documenting cases and completing the initial assessment of competencies, understanding the appraisal and revalidation system, reflections, etc) and it took a while getting used to this. Having worked at a more senior level back at home, adjusting to initially being treated as an SHO and having to 'shadow' the first-on-call before going on the rota took some getting used to. However, I accepted this as just a phase and did my best to 'go with the flow', and



Dr John E Osakue

MTI/Clinical Fellow, Ysbyty Gwynedd, Bangor, North Wales

osakuejohn@yahoo.com

before long I was being entrusted with more responsibilities and trust by my consultants and colleagues.

In contrast to the largely hierarchical system (with 'bosses' who call all the shots and dictate the daily course of events) where I had been trained and schooled all my life prior to taking up my MTI post, the NHS is a largely egalitarian system where everyone chips in their bit and participates actively in making decisions and carrying out plans. This stark contrast was a rude shock to me (and I must confess still catches me off guard regularly) and took quite some getting used to. Learning to address consultants and colleagues by their first names, adjusting to the several 'dialects' of English as well as a totally foreign language (Welsh), the very 'open' and frank conversations with virtually everyone, the new food/diet, learning to drive on the 'other' side of the road, the keen sense of adventure among trainees, the very friendly banter in theatres and camaraderie among staff, the regular coffee breaks, etc, all constituted part of the 'culture shock' that I was faced with and needed to adjust to.

While making my application for the MTI scheme, I had covertly hoped to get a post at one of the large hospitals in one of the popular large cities that I had read and heard about for years. So I was sort of disappointed when I secured a post in some seemingly obscure district general hospital in a 'little-known' place. Fast-forward a few months, and after comparing notes and experiences with fellow 'more fortunate' MTIs in those

large hospitals that I had secretly hoped for, I became acutely aware of how fortunate I was to have started off in the NHS at such a 'small' hospital, because I had integrated faster (and with more ease) into the system than many of those colleagues.

If I had to advise prospective or new MTIs, I would urge them (in the face of the new challenges they are about to face while adjusting to the NHS) to never discountenance or take for granted the clinical experience they have gained over the years, because this is usually what sets them apart from other UK trainees. They should also at the same time be open to gaining new experiences and embracing the learning opportunities that abound in the NHS.

Be open to gaining new experiences and embracing the learning opportunities that abound in the NHS

Be aware that others have trodden this path before you, so you can learn from their experiences as well. Never hesitate to ask for clarifications or to request assistance, nor to ask for what you think is your due but which may have been overlooked. There will be 'good' and 'bad' moments and experiences, but it always gets better with time, so be patient and allow yourself some time to learn/adjust.

Medical Training Initiative

A government authorised scheme allowing doctors from low- and middle-income countries to undertake anaesthesia training within the NHS for a maximum of 24 months. For more information, please see our website:

www.rcoa.ac.uk/medical-training-initiative



Dr Claire Mallinson
Consultant Anaesthetist,
Guy's and St Thomas'
NHS Foundation Trust,
London and RCoA
Council Member

Dr Roopa McCrossan
ST7 Anaesthesia,
Northern School
of Anaesthesia and
Honorary Secretary,
Association of
Anaesthetists Trainee
Committee

Russell Ampofo*
RCoA Director of
Education, Training and
Examinations

*Corresponding author:
rampfofo@rcoa.ac.uk

Supervision of safe clinical care

As the professional bodies responsible for the development and promotion of standards in anaesthesia in the UK and Ireland, the College and the Association of Anaesthetists jointly recognise the importance of good clinical supervision in the workplace to maintain safe clinical care.

To ensure patient safety, clinical work by trainees needs to be carefully supervised by experienced and competent clinical staff, who are trained for the role and who recognise and discharge their responsibility to trainees. This should improve quality of patient care and reduce clinical risk.

Both organisations agreed to develop a set of principles to this effect and to develop a resource that signposts to the various existing documents and standards. Both organisations agree that setting out policies and procedures will be helpful to guide departments in their clinical supervision of trainees, enabling anaesthetists to provide safe clinical care to their patients. While trainees are the initial focus of the guidance, the principles throughout are applicable for good supervision for any healthcare professional.

The General Medical Council (GMC) defines a trainer as one who: 'provides supervision appropriate to the competence and experience of the student or trainee and training environment. He or she is involved in and contributes to the learning culture and environment, provides feedback for learning and may have specific responsibility for

appraisal and/or assessment'. All trainees should have access to supervision at all times, with the degree of supervision tailored to their competence, confidence and experience. Within a given training placement, and for each trainee, such arrangements may be the responsibility of a named 'clinical supervisor'.

The GMC also defines a named clinical supervisor as '...a trainer who is responsible for overseeing a specified trainee's clinical work for a placement in a clinical environment and is appropriately trained to do so. He or she will provide constructive feedback during that placement and inform the decision about whether the trainee should progress to the next stage of their training at the end of that placement and/or series of placements.'

Supervision of safe clinical care in practice: principles

Medical care in the NHS is consultant directed. All trainees work under supervision. This supervision may be immediate (supervisor in the room), local (supervisor in the hospital), or distant.

- Trainers and experienced, competent clinical staff have a role in ensuring that patients are safe and treated according to best practice.
- Trainees will vary in their need for ongoing supervision of their clinical care depending on their seniority, experience and individual circumstances.
- There is a duty on trainees to seek appropriate ongoing clinical supervision, especially when they approach the limits of their clinical skills and competence.
- The level of clinical supervision is ultimately decided by the consultant and not the trainee.

- Trainees and trainers should work within the parameters relating to these activities outlined in the GMC's Good Medical Practice (bit.ly/2p8GWq3). Trainees will have increasing autonomy as they advance through training, from full clinical supervision of all practice at entry to foundation training, up to independent practice at completion of training. However, it is a fundamental principle that all trainees working in all situations will receive an appropriate level of supervision from a consultant or specifically approved SAS doctor.
- The profile of 'safe supervision of clinical care' will change from close and proximate supervision (for example, for core trainees), through clinical supervision by staff within the same hospital (for specialty trainees), to remote clinical supervision by staff outside the trust (for example, from consultants elsewhere for more senior trainees).

A clear description of the agreed standards for supervision can be found on the College (www.rcoa.ac.uk/safety-standards-quality/guidance-resources) and Association websites.

Monitoring

A mechanism to monitor these standards should be developed and maintained by all departments. Lapses or failures in clinical supervision should be identified and addressed promptly and clearly. Records should be kept.

Monitoring of departmental performance, including adherence to the principles and practice of clinical supervision, should occur (approximately) monthly. Feedback on problems should be given to trainees and trainers.

The Cappuccini test: an audit of supervision

The College has produced an audit tool (www.rcoa.ac.uk/cappuccini-test) to pick up issues in relation to the supervision of trainees and non-consultant, career-grade doctors (NASG) who do not fit the description in Guidelines for the provision of anaesthesia services (GPAS) (www.rcoa.ac.uk/gpas). We would recommend using this simple audit tool in your department to monitor levels of clinical supervision.

Further reading

Job roles and descriptions: Education and Clinical Supervisor

- Educational Supervisor; NACT.²
- Recognition and approval of Trainers; GMC.³
- Named Clinical Supervisor; NACT.⁴

Further guidance

- Proposed best practice guidance for supervision of safe clinical care. NACT.⁵
- Recognition and approval of trainers: implementation plan. GMC.¹
- Multisource feedback for Educational Supervisors. London Deanery.⁶

References

- 1 Recognising and approving trainers: the implementation plan. GMC, 2012 (bit.ly/34znz8m).
- 2 Job description for Educational Supervisor. NACT, 2018 (bit.ly/36lYqdk).
- 3 Recognition and approval of trainers. GMC, 2012 (bit.ly/2lO16wn).
- 4 Roles and Responsibilities of a Named Clinical Supervisor. NACT, 2018 (bit.ly/2PN09eI).
- 5 Proposed Best Practice Guidance for Ongoing Clinical Supervision. NACT, 2012 (bit.ly/2PKXfEl).
- 6 Multisource Feedback for Supervisors. The London Deanery, 2012 (bit.ly/2Cfxfce).

New website. New look. Better service



Gavin Dallas
RCoA Head of Communications
comms@rcoa.ac.uk

The College launched its new website¹ in November 2019 following two years of close work with members, staff, external suppliers and the public. Not only do we now have a great new website, but are working to further develop the content and integrate additional member services and benefits.

Borne out of the College's Technology Strategy Programme (TSP), the project (led by the College's Communication and External Affairs Directorate) has successfully delivered not one, not two, but three brand new websites for the College, the Faculty of Pain Medicine² and the Centre for Perioperative Care.³

In line with the aims of the TSP, the development of these three new websites is just one step towards improving the College's online technology offering to fellows, members and external stakeholders.

Background

In late 2017, the College hired the digital agency Manifesto⁴ to undertake a review of our website at that time. Known as the discovery phase, this included scrutinising our website technology, design, content and accessibility. Manifesto also held workshops to understand what was needed from our new website in terms of navigation, content, technology and system integrations.

In May 2018, and making use of the discovery phase report, the College issued a public request for proposal for design and was pleased to receive responses from digital agencies across the UK. Four agencies, including Manifesto, were shortlisted.

After a rigorous interview process, Manifesto was chosen to move the project forward into the design and build phase. This work commenced in October 2018.

Design and content

After securing the project and through multiple workshops with College members, staff and Lay Committee representatives, Manifesto began the detailed task of identifying what our website needed to address, solve, represent and look like. Working with Manifesto through the identification and development of audience personas and related content types, brainstorming proposed navigation and discussing

how our brand should be reflected through the design, the College was involved in every step of the process.

In addition to developing a visually attractive and more advanced platform, the College was also keen to ensure the content of the new website was optimised. Enter Wardour,⁵ a London-based specialist marketing and content agency. Their content specialists had the unenviable task of undertaking a content audit of the thousands of pages on our old website, reporting detailed analytics for each.

While the College's Communications Team knew certain pages performed consistently well in terms of page visits, results from the content audit confirmed that visitors to those pages were not moving to other areas of the website. With this issue not isolated to these two areas of the website, it was important for web content editors across the College to know where content improvements should be made. To address this,

a content strategy was developed, audiences identified, tone of voice guidelines produced, writing and style guidelines communicated and numerous editor workshops held.

Benefits and future enhancements

Through a streamlined content strategy and improved design and layout, members will find it easier to search for, find and read information sought. The different formats of how content is displayed across the site has enabled content editors to extract information from cumbersome PDFs and present this as web page content, making it easier for searched content to be displayed.

Developing our three new websites to be mobile and tablet-friendly, was another crucially important task for the College as we know our members predominantly visit our sites on their mobile devices.

Work within the TSP to implement a new customer relationship management (CRM) software this year will again provide significant enhancements to the website. Through the CRM/website

integration, the College plans to provide members a self-service member portal on the website. Here you will be able to update personal details, specify communication preferences, subscribe to specific e-newsletters, collate website content around categories and, if you're in training, review past examination results and see what exams you have coming up.

Another membership benefit being worked on is single sign-on across our academic publications and College IT systems. Once logged into the member portal, the plan is to be able to link directly to the BJA, BJAEd, events booking and the Lifelong Learning Platform without the need to log in repeatedly.

Access to our website content is key and therefore reading support through the industry standard Browsealoud system has been provided. This assistive technology software adds text-to-speech functionality for those hard-of-hearing and highlights and magnifies sections of text for visitors who are hard-of-sight.

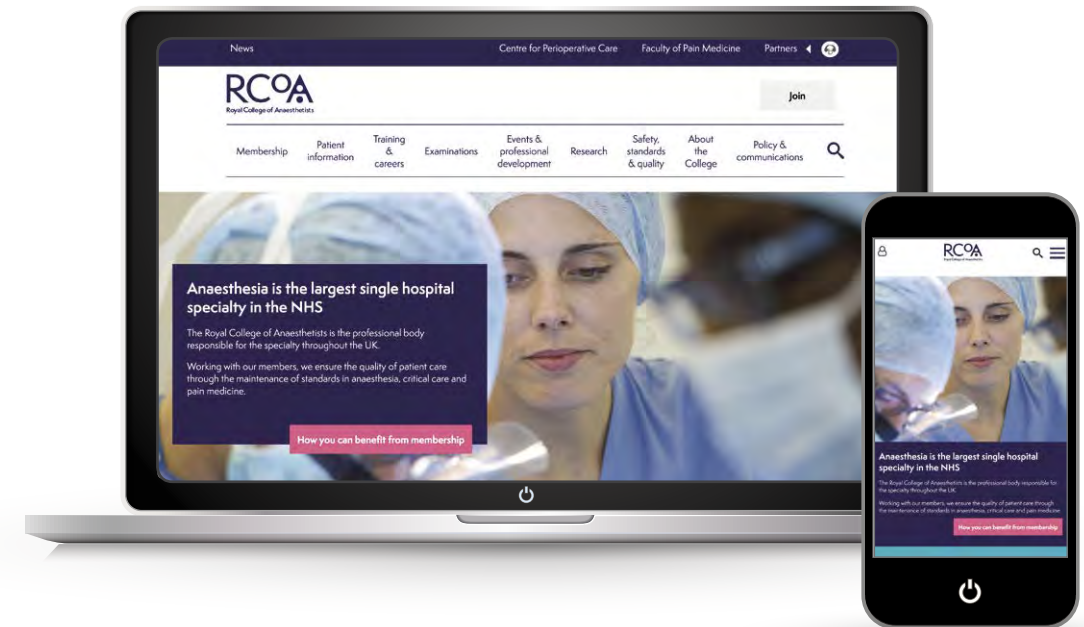
I'd like to thank the College staff, members Council and Lay Committee for working with us over the past two years and for the valued input which has led to us launching these three sites under budget. That's a great thing to be able to say and is testament to the hard work from teams across the College and the financial diligence of our TSP team.

Let us know what you think

If you like our three new websites as much as we do, or if you have comments or suggestions on how we can make improvements, please use the website feedback form⁶ at the base of the homepage of the College website. We'd love to hear what you think.

References

- www.rcoa.ac.uk.
- www.fpm.ac.uk.
- www.cpop.org.uk.
- www.manifesto.co.uk.
- www.wardour.co.uk.
- bit.ly/RCoAWebFeedback.





AN INSIDER'S VIEW

Being a CPD Assessor

More than 1,700 of our fellows and members selflessly contribute their time, energy and skills enthusiastically to the work of the College, through roles ranging from examiners and committee members, to Anaesthesia Clinical Services Accreditation (ACSA) leads and Advisory Appointments Committee (AAC) Assessors.

Our 2018 membership survey results showed that many more of our fellows and members would also like to get involved in the work the College undertakes. To highlight these roles further and to provide you with a true taste of what they involve, we started regular 'Insider's View' interviews for the *Bulletin* last year.

This year's first interview from the series is with Dr Janet Barrie, one of the College's CPD Assessors. The College welcomes applications from doctors interested in acting as a CPD Assessor. Full support is provided by the College CPD team, and the team also sends each CPD Assessor an annual report detailing the event reviews they have completed for use in their own CPD portfolios. We would like to thank Dr Barrie for her participation in this interview.



Dr Janet Barrie

Consultant Anaesthetist, Pennine Acute NHS Trust

cpd@rcoa.ac.uk

Tell us a bit about yourself. Did you have any assessor experience before you started?

I have been a district general hospital consultant anaesthetist for more than 20 years and have always had an interest in anaesthetic education. I am the immediate past president of the Society for Education in Anaesthesia UK (SEAUK). I am interested in teaching and learning ('What happens when people learn?' 'How can we help encourage that to happen?') and how we can use learning theories to help make teaching events better for the learners. I had no experience in course assessment as such but have been responsible for putting together a number of study days and workshops and reflecting/acting on feedback.

Why did you put yourself forward for a role as a CPD Assessor at the College?

In my role with SEAUK I had to submit details of our Annual Scientific Meeting to the College for CPD approval, and I wondered what happened to these applications behind the scenes and the process by which they were assessed. I understood that the College was wishing to recruit CPD Assessors and saw this as an opportunity to contribute.

Can you share any experiences, professional and personal learning, or skill sets that you have gained through your work with the College?

I hope that seeing the assessment process from the other side has helped me design or deliver courses locally. It has sharpened my focus in ensuring the teaching methods are suitable for the learning objectives and that these are delivered by suitable people. The College provides training for new assessors to help with this and an assessors' day when particular issues are discussed.

It has also led to invitations to consider participating in other aspects of the College's work, particularly the new CPD wing of the Lifelong Learning Platform, for which many CPD Assessors also acted as road testers.

What are the important qualities a CPD Assessor should have?

Timewise, the role isn't onerous. Most assessors look at one or two events per month and each takes about 30 minutes with a two-week turnaround time. Assessors can specify the subspecialties they are comfortable working within. Having a wide range of assessors enables the College to choose an assessor with an appropriate interest, so that it is very rare to be asked to assess outside the assessor's areas of interest.

The most important attributes of an assessor are to be dispassionate in applying the assessment criteria, irrespective of the prestige or reputation of the requesting team, and to be honest in the assessment returns in describing reasons for refusing recognition. The College feed these back to the requesting team, and courses are modified in the light of assessors' feedback. Hopefully this leads to better experiences for the learners.

Can you share your most interesting experience from your time as a CPD Assessor so far?

The most interesting was refusing to grant recognition to an event sponsored by a national body until some substantial changes were made to the content. Such discussions are conducted through a third party. The assessor knows the identity of the course organisers and faculty (to help consider whether the faculty have the experience and credibility to deliver the course against the learning objectives) but the organisers don't know the identity of the assessor.

If you could give one piece of advice to someone thinking about becoming a CPD Assessor what would it be?

Contact Chris Kennedy at the College (cpd@rcoa.ac.uk) to discuss further if you have any questions. Alternatively give it a go!

If you would like to find out more about being a CPD Assessor, or to see what other possible involvement you can have with the College, please go to 'Get involved' pages on our website.



www.rcoa.ac.uk/your-membership/get-involved



Dr William F S Sellers
Locum Anaesthetist, University Hospital Coventry and Warwickshire
archives@rcoa.ac.uk

AS WE WERE...

The obstetric flying squad

Professor Michael Rosen in Cardiff did not like 'chair' dental general anaesthetics or small isolated obstetric units. The latter used to be attended by emergency obstetric services (flying squads), as proposed by Professor E Farquar Murray in 1929 and started in Bellshill, Lanarkshire by H J Tomson in 1933.

These flying squad attended home deliveries in which the patients' complications made them 'so desperately ill that removal to hospital might have fatal results'. The enterprise was so successful that almost every maternity hospital introduced a flying squad capable of bringing to patients' homes obstetric aid and resuscitation by means of blood transfusion. Dr Dame Hilda Nora Lloyd was the first female president of the Royal College of Obstetricians and Gynaecologists, and in her time the squad consisted of an obstetrician, a nurse and a medical student. Equipment carried comprised a hold-all containing blankets and hot water bottles, three leather bags each containing two sterile drums of instruments, two boxes of blood, an oxygen cylinder, a light source and a tin of biscuits for personnel – the last of these because '...frequently attendance is required for long periods'.¹ A 'defence' to retain a West Berkshire service in 1977

revealed that an anaesthetist was taken on 32 (89 per cent) general practice calls and 26 (58 per cent) home calls. A paediatrician went on only two calls, both from GP units. Patient home calls were mostly for antepartum haemorrhage, and in GP units they were mostly for retained placenta.² Suggestions began to be made that emergency obstetric patients would fare better if they were brought immediately to hospital rather than waiting for the arrival of the flying squad. Anaesthetists Dr Chris Callendar and Professor Peter Hutton reviewed the demand on Bristol's flying squad from 1971 to 1984 and noted a reduction in anaesthetics in general practice units from 41 in 1974 to zero in 1983/1984, with only one or two at patients' homes. Retained placenta was at 84 per cent the commonest reason for a general anaesthetic.³ The death knell of obstetric flying squads was sounded by their Royal College which in 1991 suggested

replacement by a paramedical ambulance team with extended training. A commentary was written by Geoffrey Chamberlain and Malcolm Pearce.⁴ Our *Bulletin* editor may wish to comment on whether they should be believed.[†]

Case report

Stroud Maternity hospital called our Gloucester flying squad to a case of obstructed labour with fetal distress. In the wee small hours, we assembled inside the ambulance but the paediatrician didn't turn up. Our competent Egyptian obstetric registrar asked if I could resuscitate; I'd done an obstetric job, had sucked out plenty of meconium through a Cole⁵ tube (do wear a surgical face mask), and had done all these when an anaesthetic SHO and registrar. Newborns are extremely slippery. I arrived in Stroud a tad nauseous; the decision was made to perform emergency section for fetal

If any fellow or member has an interest in the history of anaesthesia and the College, the College's Heritage and Archives Committee welcome any expressions of interest for new committee members.

Please contact
archives@rcoa.ac.uk
for more information

distress. I checked their ancient Boyle's machine, found only trichloroethylene and filled the Boyle's bottle. I had used a Boyle's and Trilene when I started in Cambridge, where I discovered that it has little anaesthetic efficacy if passed through a circle absorber to the patient (it also produces the nerve poison dichloroacetylene). To check the oxygen, I opened both cylinders and twiddled the white knob, but the bobbin got stuck sideways at the top above the five-litre mark and wouldn't drop down even with me thumping it. I had suxamethonium and thiopentone with me. The midwife who had come with us did the cricoid pressure, and after intubation I thought I'd better put the nitrous oxide at maximum (10 litres plus?) to give approximately a 50:50 mixture

and added the Trilene. The Manley ventilator was going bananas with the high flows, so I used the Mapleson A reservoir bag to ventilate. Baby came out pdq (pretty damn quick), flat as a pancake so the midwife took it to the resuscitation table and I went to have a look. As I was completing intubation the registrar and the scrub midwife shouted for my attention. The patient was sitting up and the surgeon was shoving escaping bowel back. The midwife took over baby ventilation, I gave more suxamethonium and thiopentone and gently returned the patient to supine. Phew! The high flows had made the nitrous run out, the Trilene in the Boyle's bottle had vanished. Stability returned, we returned to Gloucester with everyone fine. I remembered that John Farman in

Cambridge had told me Trilene was a great amnesic, so I, my patient, Jenson Button,⁶ Patrick Viera, Trinny Woodall and Richard Hammond if gassed by this agent, hopefully forgot everything. Flying squad and Professor Rosen; RIP.

References

- Lloyd HN. Emergency obstetric service (flying squad). Dame Hilda's Flying squad letter (bit.ly/2nTKQln).
- James DK. Obstetric flying squad service – a defence. *BMJ* 1977;1:217–219.
- Callander CC, Hutton P. The anaesthetist and the obstetric flying squad. *Anaesth* 1986;41:721–725.
- Chamberlain G, Pearce JM. The flying squad. *Br J Obs Gynae* 1991;98:1067–1069.
- Cole F. A new endotracheal tube for infants. *Anesthesiol* 1945;6:87–88 and 627–628.
- Sellers WFS. Was Button gassed? *Br J Anaes* 2016;116:559 (doi:10.1093/bja/aew040).

[†]The Editor well remembers the events leading up to the disgrace of Malcolm Pearce and the collateral damage suffered – some might say thoroughly deserved – by Geoffrey Chamberlain. Interested readers are directed to the BMJ News article at the time: bit.ly/2oQTnGX





NEW TO THE COLLEGE

The following appointments/re-appointments were approved (re-appointments marked with an asterisk).

Regional Advisors Anaesthesia

- East of England**
Dr Emily Simpson in succession to Dr Nicola Barber
- Northern**
Dr Kathryn Bell in succession to Dr Michael Tremlett
- Oxford**
Dr Stephen Snyders in succession to Dr Anne Gregg

College Tutors

- Northern Ireland**
Dr A Jane Turner in succession to Dr Esther Davis
- Scotland**
 - South East Scotland**
Dr Rachel Harvey (Borders General Hospital) in succession to Dr Sweyn Garrioch
 - West of Scotland**
 - *Dr Ross Junkin (University Hospital Crosshouse)
 - *Dr Kenneth Kerr (University Hospital Ayr)
 - *Dr Stephen Wilson (Dumfries & Galloway Royal Infirmary)

- Wales**
Dr Susmita Oomman (Withybush General Hospital) in succession to Dr Ilona Schmidt

- England**
 - East Midlands**
Dr Elaine M Hart (Leicester General Hospital) in succession to Dr Aditi Kelkar
 - *Dr Bridget Cagney (Leicester Royal Infirmary)

- West Midlands**
 - Warwickshire**
Dr Carol Downs (George Eliot Hospital) in succession to Dr Das Gupta
 - Dr Llewellyn Fenton-May (Heartlands Hospital) in succession to Dr Nicky Osborn
- Yorkshire and the Humber**
 - South Yorkshire**
*Dr James Stevenson (Scarborough General Hospital)
 - *Dr Madhuvanti Achawal (Hull University Teaching Hospitals Trust)
- Certificate of Completion of Training**
To note recommendations made to the GMC for approval, that CCTs/CESR (CP)s be awarded to those set out below, who have satisfactorily completed the full period of higher specialist training in Anaesthesia, or Anaesthesia with Intensive Care Medicine or Pre-Hospital Emergency Medicine where highlighted.
- August 2019**
 - Barts & The London**
Louise Frost
Dassen Ragavan ^{Dual ICM}
Amieth Yogarajah
 - Birmingham**
Mohammed Arshad ^{Dual ICM}
Colette Augre ^{Pre-Hospital Emergency Medicine}
James Huddell ^{Pre-Hospital Emergency Medicine}
Sarah Milton-White ^{Dual ICM}
Harsha Mistry
Claire Moody
Philip Pemberton
 - East Midlands**
Juneenath Karattuparambil
Rishie Sinha
Lail U Mah Zaheer
 - Imperial**
Thomas Carter
 - Kent, Surrey & Sussex**
Olubukola Akindele
Jenny Cheung
Merle Cohen
Robert Guy
 - Mersey**
Angela Deeley
Sarah Fadden ^{Pre-Hospital Emergency Medicine}
David Whitmore ^{Dual ICM}
 - North Central London**
Saba Al Sulttan
Claire Frith-Keyes
Paavan Gorur
David Inglis
Asher Lewinsohn
Anna Poon
Tom Salih
Andrew Wood ^{Pre-Hospital Emergency Medicine}
 - North West**
Archana Awsare
Carla Gould
Lorna Sissons
Nicholas Truman ^{Dual ICM}
Mei Yeoh
 - Northern**
David Buckley
Robert Lyons
Iain Walker
 - Oxford**
Timothy Davies
Henry Jefferson
Anika Sud
 - Peninsula**
Carlen Reed-Poysden
 - Severn**
Samuel Howell

- South East**
Andrew Al-Rais
Oliver Keane
Shital Patel
- South East Scotland**
Laura Armstrong
Thomas Bloomfield
Sadia Ghaffar
Samantha Warnakulasuriya
- South Yorkshire**
Joel Perfitt
- Wales**
Anthony Byford-Brooks
Thomas Kitchen
- Warwickshire**
Sunita Balla
- Wessex**
Honor Hinxman ^{Joint ICM}
Alexander Stewart ^{Dual ICM}
Christopher Watts
- West Yorkshire**
Muhammad Laklounk
Craig Montgomery



BRITISH OXYGEN COMPANY CHAIR OF ANAESTHESIA Research Grant 2020

In 1958, the British Oxygen Company (BOC), made a charitable donation in support of anaesthesia research. The BOC Chair of Anaesthesia Fund was created using this donation and is a subsidiary charity of the Royal College of Anaesthetists. The object of the charity is the endowment of a research fellowship in a department of anaesthesia. On behalf of the Royal College of Anaesthetists, the National Institute of Academic Anaesthesia (NIAA) is inviting applications for this grant.

The College is utilising these funds in support of those working towards a senior fellowship or developing a credible application for a Chair in Anaesthesia (or related specialties) within the next five years. Applications are welcomed from clinicians and from basic scientists with a similar ambition.

Funding of £80,000 per annum is available. This can support the costs of research sessions, projects or infrastructure. The grant is available for four years (reviewed after two years), and annual progress reports must be submitted to the NIAA.

Applicants must demonstrate an existing research record, the support of a senior mentor/supervisor, a credible research proposal and evidence of a supportive research environment.

The application form is available to download from the NIAA website (bit.ly/2WNexSU).

Applications should be submitted to the NIAA Coordinator Ms Pamela Hines via email to: info@niaa.org.uk by the deadline of 5.00pm on Friday 31 January 2020.



GLOBAL ANAESTHESIA: Towards Health Equity 24 March 2020

We will be running our next Global Anaesthesia themed event in partnership with the World Anaesthesia Society on Tuesday 24 March 2020.

Global Anaesthesia: Towards Health Equity will cover a number of key topics affecting the delivery of equitable anaesthesia healthcare across the world, and will include sessions on climate change, inequality in healthcare access and its effects on migrant population health and corruption and its impact on health equity.

Confirmed speakers include:

- Dr Jannicke Mellin-Olsen
- Professor Farai Madzimbamuto
- Dr Vatshalan Santhriapala
- Professor Sir Any Haines.

For more
information and to
book your place,
please go to
bit.ly/RCoAGA
Conf2020

APPOINTMENT OF MEMBERS, ASSOCIATE MEMBERS AND ASSOCIATE FELLOWS

August 2019

Associate Members

Dr Weththimuni Damith Tharanga Silva
Dr Golam Ferdous Alam
Dr Ilona Ladd
Dr Alizeh Haider
Dr Amr Mohamed Soliman Hassan Elmosalamy
Dr Vjeran Leventic
Dr Benjamin Edward John Perkins
Dr Victoria Van Der Schyff
Dr David James Ritchie
Dr Mehul Mange
Dr Pei Jean Ong
Dr Isuru Viraja Bandara Vidana Arachchige Edirisinghe
Dr Piotr Krzysztof Sadowski
Dr Maeve Elizabeth Henry
Dr Christine Biela
Dr Prajwal Shetty
Dr Ana C Hipólito De Borba Monteiro
Dr Dale Wesley Thorne
Dr Grace Elizabeth Illingworth
Dr Paul Bernard Traynor
Dr Mark Peter Oakey
Dr Belal Yahia Mohammed Yasin
Dr Naomi Rose Cynthia Adey
Dr Abhishek Kumar Sharma
Dr Rafiu Alade Adedayo Ojo

September/October 2019

Associate Fellow

Dr Andras Victor Kelecsenyi

Associate Members

Dr Ella Mirielle Quintela
Dr Nitya Lizbeth George
Dr Manekar Avinash
Dr Tharuka Kalhari Sikuradipathi
Dr Zakiya Maryam
Dr Snigdha Sunil Paddalwar
Dr Eyad Talal Mhamad Abdeljawad
Dr Muditha Chathuranganie Dhanapala Mawathage
Dr Caroline Lalramnghaki
Dr Nishita Shah
Dr Mohammed Hasan Mohammed Ahmed Shaimaa
Dr Pawan Kumar Jain
Dr Basil Okechukwu Ezenkwel
Dr Niranjala Sanjeevani Abeyratne Wickramasinghe
Dr Rashi Sardana
Dr Eleanor Amanda Ganpatsingh
Dr Mahmoud E M A Nassar
Dr Manu Kumar
Dr Rajeev Kumar Sharma
Dr Muhamed Samir Bassiony Wanas
Dr Rishabh Sethi
Dr Ritu Bansal
Dr Deborah Roxanne Douglas
Dr Alexander Lee Pereira De Lima
Dr Atef Kamel Salama Salem
Dr Sarah Olohijie Beckley
Dr Priyadarshini Nagaraj
Dr Darshana Sawant Dhaka
Dr Gregory Thomas
Dr Mohamed Khalaf Mady Morsy
Dr Ahmed Mohamed Ibrahim Ahemd
Dr Mostafa Kamal Abdellatif Asr
Dr Motsim Sheraz
Dr Piermauro Castino
Dr Amal Gouda Elsayed Gouda Safan
Dr Declean Corr
Dr Vikas Kumar
Dr Robyn Anne Lee

Dr Mohammed Hassan Eid Abdelmonem
Dr Tarique Aziz Qureshi
Dr Zahid Furqan
Dr Harriet Emily Kent
Dr Lynda Marcelle Abengue
Dr Eleanor Stanger
Dr Mina Amirhom Khella Amirhom
Dr Nairita Das
Dr Ahmed A A M Metwally Alkhatip
Dr Kugan Kishur Xavier Rajan
Dr Ahmed Mohamed Mohamed Aboughazy
Dr Kavisha Premasinghe Dissanayake
Dr Emad Azer Ibrahim Iskander
Dr Mubeen Salik
Dr Edward Peter Andree Wiltens
Dr Magde Kayed Sa'de AlBarade
Dr Robin Mathew Michael
Dr Nithin Jayan
Dr George Mathew
Dr Tara Dilini Kachchakaduge Fernando
Dr Priyanka Ramakrishnan
Dr Parag Jyoti Duarah
Dr Sangeet Tanwar
Dr Shilpee Kumari
Dr Swapnil Ganesh Aswar
Dr Bintang Pramodana
Dr Ahmed Nahed Aly Elsaid Aiyad
Dr Ruwaida Khan
Dr Ahmed Mohamed A A Yousef
Dr Deepa Sannakki
Dr Pavithra Ramamurthi
Dr Eyad Ibrahim Abdulsalam Ali
Dr Javear Kimberley Williams
Dr Neha Sharma
Dr Chandrakanth Koganti

Affiliates

Ms Emma Molyneux (Anaesthesia Associate)
Ms Katie Hubbard (Anaesthesia Associate)

CONSULTATIONS

The following is a list of consultations which the College has responded to in the last two months.

Originator	Consultation
Professional Record Standards Body (PRSB)	Core information standard
Association of Anaesthetists	Suicide amongst anaesthetists
UK Clinical Pharmacy Association	Syntocinon and syntometrine advisory paper
Academy of Medical Royal Colleges	High level principles remote prescribing
National Institute for Health and Care Excellence	Consultation on a proposed Service Specification for specialist oesophageal and gastric cancer services for Welsh residents
Public Health England	Adult Critical Care Influenza guidance 2019
Association of Anaesthetists	Management of glucocorticoids during the perioperative period for patients with adrenal insufficiency

DEATHS

With regret, we record the death of those listed below.

Dr William J Glover, London
Dr Annabel J M Mason, Suffolk
Dr David A Nightingale, Somerset
Dr Joseph C Stoddart, Newcastle
Professor Sir Keith Sykes, Devon
Dr John R Stoneham, Godalming

Please submit obituaries of no more than 500 words to: archives@rcoa.ac.uk

Obituaries will be published on the College website.

APPOINTMENT OF FELLOWS TO CONSULTANT AND SIMILAR POSTS

The College congratulates the following fellows on their consultant appointments:

Dr Mark Children, Blackpool Teaching Hospitals
Dr Robert Hart, Queen Elizabeth University Hospital, Glasgow
Dr Siobhane Holden, Royal Preston Hospital
Dr Carol Kenyon, Liverpool Women’s Hospital and The Royal Liverpool University Hospital (joint post)
Dr Stuart Knowles, Stockport NHS Foundation Trust
Dr Julia Niewiarowski, Oxford University Hospitals
Dr Kieran Oglesby, University Hospitals Bristol NHS Foundation Trust
Dr Rita Saha, East Surrey Hospital
Dr Shiny Sivanandan, Peterborough City Hospital
Dr Andrew Wood, Royal London Hospital

LETTERS TO THE EDITOR

If you would like to submit a letter to the editor please email bulletin@rcoa.ac.uk



Dr David Bogod

Sir,

Problems ventilating? Remember the valve

During a challenging trauma thoracotomy the patient began to desaturate so lung recruitment manouvers were employed. The resevoir bag however would not remain inflated despite increasing flows, applying higher pressure to the APL (adjustable pressure-limiting) valve and oxygen saturations continued to drop. The bag was changed suspecting a hole however this didn’t help and so patient was quickly changed onto a Water’s circuit and recruited while anaesthesia was maintained intravenously. The patient was then transferred back onto the ventilator and remained stable.

The eagle-eyed operating department practitioner discovered the problem; the carbon dioxide sampling line had become caught under the APL valve, so that although the valve appeared to be displaying 20 cm H₂O, it was actually completely open, causing the ventilated oxygen to escape via the open valve.



Dr Hannah Mulgrew
Clinical Fellow in Anaesthesia, Merseyside

THE ELISA FAMILY
The future of intensive care ventilation.



Elisa 800 with Integrated EIT



JOYCEclinic FF



HOSPITAL HOMECARE DIAGNOSTICS

Löwenstein Medical UK Ltd
1 E-Centre, Easthampstead Road,
Bracknell RG12 1NF
T: 01344 830023
E: info@loewensteinmedical.co.uk
W: loewensteinmedical.co.uk



NHS
University Hospitals
Coventry and Warwickshire
NHS Trust

**Human Factors and Patient Safety
in Airway Management**

14 MAY 2020 1 OCTOBER 2020
at University Hospital, Coventry

SMART a one-day course for anaesthetists-ODP teams is a unique blend of expert teachings and insights based on well-backed scientific evidence that can help you recognise, prevent and overcome human limitations and fallibilities. It involves interactive team training, simulation, airway-technical skills, Error Avoidance strategy, Human Factors in crisis management and Practical briefing and debriefing skills.

**Course fee: Consultant Anaesthetist: £150
SAS/Trainee Anaesthetist: £120**

One ODP/ Nurse can accompany free as a team from same hospital. Individual anaesthetists and theatre team members are welcome to apply (ODP/ Nurse Course fee £75)

PLACES ARE LIMITED SO PLEASE APPLY EARLY

For further details please contact Rachel on 024 7696 8722
E-mail: courses@mededcoventry.com
or visit www.mededcoventry.com

CPD MATRIX CODES
(1102, 1103, 1B02, 1C02, 2A01)

NHS
University Hospitals
Coventry and Warwickshire
NHS Trust

**COVENTRY PRIMARY
FRCA MCQ/SBA COURSE**

20 - 22 January 2020 6 - 8 July 2020

- An intensive three day MCQ/SBA Practice sessions
- Physiology Pharmacology Physics and Clinical Measurement covered on each day
- Over 350 MCQs and 180 SBAs will be discussed and analysed.
- A three hour test paper on the final day under strict exam conditions
- Candidates will receive daily feedback on their performance in the practice sessions including the test paper on the final day.
- Turning Point facilitated interactive sessions for SBAs
- Access to Pre Course material and Past MCQs from 6 weeks before the start of the course.
- Access to the presentations on the course till the date of the FRCA Primary examination

PLACES ARE LIMITED SO PLEASE APPLY EARLY
Registration fee: £290 includes a copy of SBA – Basic Sciences book, breakfast, lunch and refreshments
For further details please contact Rachel:
courses@mededcoventry.com or telephone 024 7696 8722

**Trainee
Conference 2020**
(formerly GAT ASM)

**8-10 July 2020, St James' Park,
Newcastle Football Club, Newcastle**


**Abstracts
are open**

Raise your profile and submit by the
deadline **Wednesday, 5 February 2020**

anaesthetists.org/TraineeConference

 Association
of Anaesthetists **#TC2020**

SEAUK
The Society for Education in Anaesthesia



SEA(UK) is a UK based society focused on promoting and developing medical education specific to anaesthesia
We are open to all those involved in anaesthesia education
We offer a range of educational resources including our long-standing Annual Scientific Meeting, Workshops, Newsletters and Website

Come and join us for our 2020 ASM

21st Annual Scientific Meeting
Monday 23rd of March 2020
Hilton Warwick/
Stratford-upon-Avon

Book the ASM via the QR code above, tweet us @SEATWEETUK plus get full details & join our membership at www.seauk.org

NHS
University Hospitals
Coventry and Warwickshire
NHS Trust

**COVENTRY AIRWAY
MANAGEMENT COURSE**

19 MARCH 2020 21 OCTOBER 2020

- ORSIM Bronchoscopy Simulator
- Oral & Nasal Fiberoptic Intubation
- Fiberoptic Intubation through LMA/Igel
- Videolaryngoscopes
- HFNO
- Lung Isolation Techniques
- Ultrasound Imaging of Airway
- Front of Neck Access
- Difficult Airway Scenarios
- Awake Tracheal Intubation

PLACES ARE LIMITED SO PLEASE APPLY EARLY
Registration fee: £110 includes refreshments and lunch
For further details please contact Rachel on 024 7696 8722 or e-mail: courses@mededcoventry.com or visit www.mededcoventry.com



NHS
University Hospitals
Coventry and Warwickshire
NHS Trust

FINAL FRCA MCQ/SAQ COURSE

27 - 29 JANUARY 2020 13 - 15 JULY 2020


- MCQ practice in medicine, surgery, clinical measurement, intensive care medicine, anaesthesia and pain management under strict exam conditions. SBA practice in clinical anaesthesia, pain and intensive care medicine.
- SAQ practice in intensive care medicine, neuroanaesthesia, chronic pain, cardiac anaesthesia, paediatric anaesthesia and trauma.
- Mock exam in SAQ and MCQ/SBA.
- Interactive discussion of Single Best Answer questions using Turning Point technology.
- Pre-course SAQ practice and feedback starts two months prior to the course.

Registration fee: £300
Includes breakfast, lunch and refreshments

For further details please contact Rachel
courses@mededcoventry.com or telephone 024 7696 8722

www.mededcoventry.com

**brighton and sussex
medical school**



MSc Anaesthesia and Perioperative Medicine

Stand-alone study opportunities

The Anaesthesia and Perioperative Medicine course is based on areas of clinical practice and professional skills that are relevant to all anaesthetic trainees. These clinical modules are now available for study on a stand-alone basis:

- Assessment and Optimisation
- High Risk Anaesthesia
- Emergency Care

Tuition takes place at Haywards Heath with easy transport links from London

Email: dme@bsms.ac.uk
BSMS Department of Medical Education

bsms.ac.uk/pg-single-modules

**CAI ANNUAL CONGRESS
OF ANAESTHESIOLOGY**

MAY 2020 VENUE: O'REILLY HALL, UNIVERSITY COLLEGE DUBLIN


21-22 MAY 2020

EARLY BIRD DISCOUNT BOOK BY 27th MARCH 2020
INTERNATIONAL DELEGATES 50% DISCOUNT
EARLY BIRD DISCOUNT OF 50%
FELLOWS RES 30% DISCOUNT

This two day meeting is the highlight of the College's academic calendar
The programme covers a broad spectrum of topical issues

IT WILL FEATURE:

- Key-note addresses from National and International experts
- Regional Anaesthesia Workshop
- Free papers and E-posters
- Annual Gala Dinner


College of Anaesthesiologists of Ireland
Patron: Michael D. Higgins
President of Ireland

**Further details on
www.anaesthesia.ie**



Mersey School of Anaesthesia

"If you feed the children with a spoon, they will never learn to use the chopsticks."

FINAL FRCA WRITTEN CRQ E-CLUB

With the Introduction of CRQs into the Final FRCA Written Examination we appreciate that opportunities to Exercise & Practice New Question Formats and Techniques are limited

Therefore;

The MSA is offering Final Trainees membership to our CRQ E-Club

This will involve;

- Drafting Questions/Answer Guidance from Hot Topic Articles
- Anonymously Completing CRQ Questions under Timed Conditions
- Anonymously Marking CRQ Answers for Fellow Members

Benefits Include;

- Timed & Disciplined Practice
- Acquisition of useful Answer Guidances from Other Members
- Valuable Motivation towards Sustained Revision

Requirements;

- Commitment & Discipline
- Competencies in I.T. Features & Formatting

Candidates are urged to join before April 2020 for the September 2020 Examination to gain Maximum Benefit

Please register your interest by emailing: e-club@msoa.org.uk

Courses for the Royal College of Anaesthetists Examinations

Courses	Dates 2019/20		Capacity
Primary SBA/MCQ	31 January – 6 February	July 2020	100
Primary OSCE Weekend	10 – 12 January	17 – 19 April	48
Primary Viva Weekend	3 – 5 January	24 – 26 April	72
Primary OSCE/Orals	17 – 24 January	8 – 15 May	48
Final Written 'Booker'	9 – 13 February	August 2020	90
Final SBA/MCQ	14 – 20 February	August 2020	100
Final Viva Revision	1 – 6 May	October/November 2020	100
Final Viva Weekend	12 – 14 June	November 2020	100

Please Note;

Trainees planning on attending MSA Courses must appreciate before they attend, that the MSA Courses are designed for Exam Preparation only, and include;

- Exposure to Exam Style Questions
- Opportunities to Practice
- Learn & Fine Tune Exam Techniques

The advice to Trainees is that they should only attend MSA Courses when they consider themselves adequately Prepared for the Imminent Examinations.

To see Details of all of our Courses please visit: www.msoa.org.uk
'Like' Mersey School of Anaesthesia on Facebook for News and Updates



June 30th - July 2nd, 2020

EBPOM 2020

London Peri-Operative Medicine Congress

Register at: www.ebpom.org

EBPOM
Evidence Based Peri-Operative Medicine

London, UK



September 11th - 13th, 2020

EBPOM-USA

Chicago Masters Course
A Perioperative Care Practicum

Register at: www.ebpom.org

EBPOM
Evidence Based Perioperative Medicine
EBPOM USA

Chicago, USA



October 5th - 9th, 2020

Dingle 2020

22nd Current Controversies in Anaesthesia & Peri-Operative Medicine with the South of Ireland Association of Anaesthetists

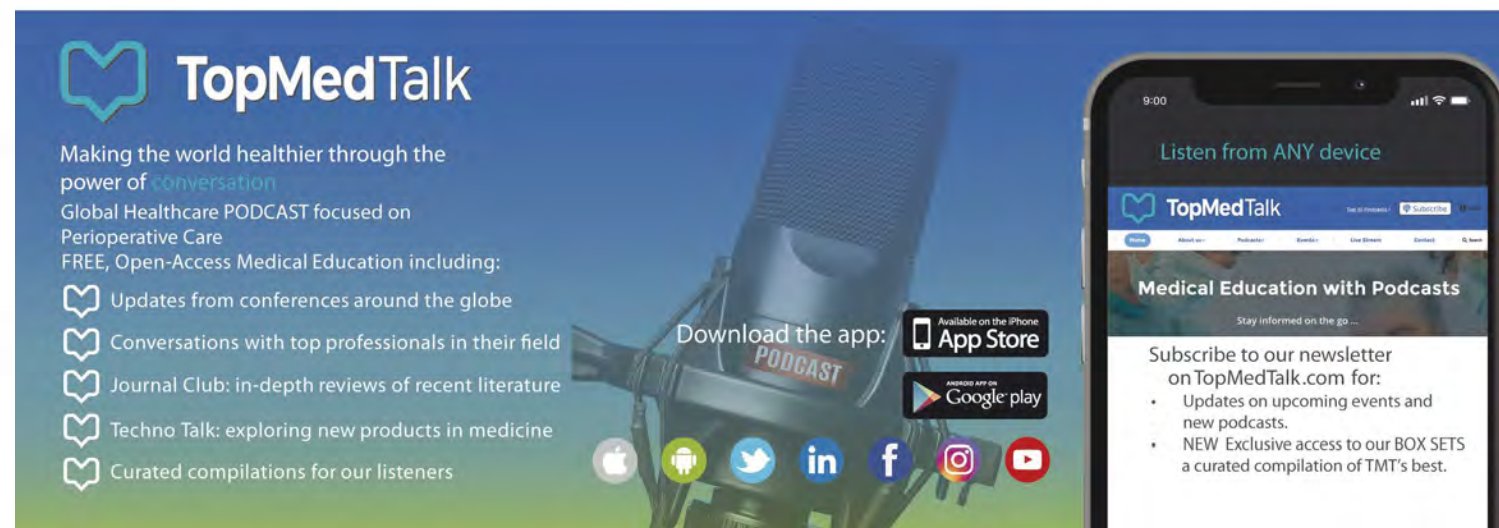
More information : www.ebpom.org/dingle

Dingle 22

Dingle Skellig Hotel, Ireland

UCL **Southampton**

EBPOM
Dingle Congress



TopMedTalk

Making the world healthier through the power of conversation

Global Healthcare PODCAST focused on Perioperative Care

FREE, Open-Access Medical Education including:

- Updates from conferences around the globe
- Conversations with top professionals in their field
- Journal Club: in-depth reviews of recent literature
- Techno Talk: exploring new products in medicine
- Curated compilations for our listeners

Download the app:

Available on the iPhone **App Store**

ANDROID APP ON **Google play**

Listen from ANY device

TopMedTalk

Medical Education with Podcasts

Stay informed on the go ...

Subscribe to our newsletter on TopMedTalk.com for:

- Updates on upcoming events and new podcasts.
- NEW Exclusive access to our BOX SETS a curated compilation of TMT's best.

RCoA Events

www.rcoa.ac.uk/events
events@rcoa.ac.uk

[@RCoANews](https://twitter.com/RCoANews)

JANUARY 2020

Tracheostomy Masterclass
 10 January 2020
 RCoA, London

Primary FRCA Revision Course
 14–17 January 2020
 RCoA, London

GASagain (Giving Anaesthesia Safely Again)
 15 January 2020
 Bradford Royal Infirmary

Final FRCA Revision Course
 20–24 January 2020
 RCoA, London

Anaesthetists as Educators: Advanced Educational Supervision
 28 January 2020
 The Studio, Leeds

Anaesthetic Updates
 31 January 2020
 Nottingham

FEBRUARY

FPM Study days: Acute/ in-hospital Pain Management – Hot Topics and Updates
 3–4 February 2020
 RCoA, London

Airway Workshop
 4 February 2020
 RCoA, London

Anaesthetists as Educators: Teaching and Training in the Workplace
 10–11 February 2020
 RCoA, London

Patient Safety in Perioperative Practice
 13 February 2020
 RCoA, London

Anaesthetic Updates
 25–27 February 2020
 RCoA, London

MARCH

Introduction to Leadership and Management: The Essentials
 3–4 March 2020
 Mercure Sheffield, St Paul's Hotel

Airway Leads
 5 March 2020
 RCoA, London

Ethics and Law
 11 March 2020
 RCoA, London

Ultrasound Workshop
 13 March 2020
 RCoA, London

Anaesthetic Updates
 17–18 March 2020
 RCoA, London

Leadership and Management: Personal Effectiveness
 19 March 2020
 RCoA, London

Developing World Anaesthesia
 23 March 2020
 RCoA, London

Global Anaesthesia
 24 March 2020
 RCoA, London

APRIL

Anaesthetists as Educators: Teaching and Training in the Workplace
 2–3 April 2020
 Edinburgh

After the final FRCA: Making the most of training years 5 to 7
 3 April 2020
 The Studio, Birmingham

Cardiac Symposium
 23–24 April 2020
 RCoA, London

UK Training in Emergency Airway Management (TEAM)
 23–24 April 2020
 Wrexham

Clinical Directors
 27 April 2020
 Birmingham

Anaesthetists as Educators: Anaesthetists' Non-Technical Skills (ANTS)
 27 April 2020
 RCoA, London

GASagain (Giving anaesthesia safely again)
 29 April 2020
 RCoA, London

MAY

Introduction to Leadership and Management: The Essentials
 5–6 May 2020
 RCoA, London

Airway workshop
 13 May 2020
 Brighton

Anaesthesia 2020
 18–20 May 2020
 Old Trafford, Manchester

JUNE 2020

Anaesthetists as Educators: Introduction
 3 June 2020
 RCoA, London

UK Training in Emergency Airway Management (TEAM)
 4–5 June 2020
 Bath

Airway Workshop
 9 June 2020
 RCoA, London

Anaesthetic Updates
 9 June 2020
 Bristol

Airway Train the Trainer
 12 June 2020
 RCoA, London

GASagain (Giving Anaesthesia Safely Again)
 24 June 2020
 Bournemouth

Primary FRCA Revision Course
 30 June to 3 July 2020
 RCoA, London

JULY

Final FRCA Revision Course
 6–10 July 2020
 RCoA, London

Ultrasound Workshop
 13 March 2020 RCoA, London

www.rcoa.ac.uk/events

Co-badged with:



ANAESTHESIA 2020

18–20 May 2020

Old Trafford, the Home of Manchester United

SAVE 10%

Limited early bird places available until 31 January 2020 – quote **EARLY10** when booking

BOOK YOUR PLACE AT:

www.rcoa.ac.uk/events/anaesthesia-2020

Discounts may be available for RCoA-registered Senior Fellows and Members, Anaesthetists in Training, Foundation Year Doctors and Medical Students. See our website for details.

Discounts may be available for RCoA-registered Senior Fellows and Members, Anaesthetists in Training, Foundation Year Doctors and Medical Students. See our website for details.



Anaesthetic updates

MEET | LEARN | DISCUSS

**BOOK
NOW!**

31 January 2020

Nottingham



Topics include

- Awake airway management.
- Anaesthesia for pheochromocytoma.
- Anaesthesia and anaphylaxis.

25–27 February 2020

London

Topics include

- Regional anaesthesia.
- Hot topics in chronic pain.
- Obstetric anaesthesia.

17–18 March 2020

London

Topics include

- Paediatric anaesthesia.
- Difficult airway.
- Burnout and resilience in anaesthesia and intensive care.

www.rcoa.ac.uk/events


Leadership and Management Courses

An Introduction: The Essentials
3–4 March 2020
Sheffield

5–6 May 2020
London

Personal effectiveness
19 March 2020
London

BOOK EARLY TO AVOID DISAPPOINTMENT

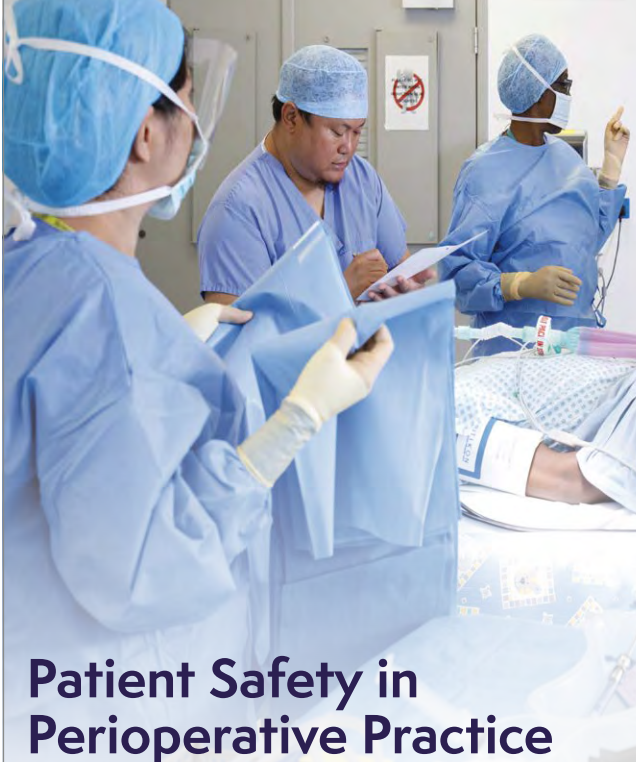


Cardiac Disease and Anaesthesia Symposium

23–24 April 2020 RCoA, London



BOOK EARLY TO AVOID DISAPPOINTMENT



Patient Safety in Perioperative Practice

13 February 2020 RCoA, London



Discounts may be available for RCoA-registered Senior Fellows and Members, Anaesthetists in Training, Foundation Year Doctors and Medical Students. See our website for details.



Discounts may be available for RCoA-registered Senior Fellows and Members, Anaesthetists in Training, Foundation Year Doctors and Medical Students. See our website for details.

Online Training for Carestation™ 650

SIMPLE. SMART. AGILE.

***Additional Anaesthesia courses available**

**GE Healthcare
Online Education**



Limited offer - First 30 users
(Free of charge)

2.5 CPD points per course
(Certificate issued)



For log in access please contact:
GEHealthcare.EducationLeader@ge.com

Your portal to access GE Healthcare
product training and education.



VISIT US

Stands 8 & 9
Association of
Anaesthetists WSM
London
8-10 January

ClearLite™ anaesthetic face masks

A clear vision for
the future

The ClearLite anaesthetic face mask available in seven sizes, provides a superior seal with a flexible non-inflatable cuff. It is non-PVC, phthalate free and available without a hook ring reducing waste.



A clear choice to reduce your
impact on the environment

For further information please visit:
[www.intersurgical.co.uk/products/anaesthesia/
clearlite-anaesthetic-face-masks](http://www.intersurgical.co.uk/products/anaesthesia/clearlite-anaesthetic-face-masks)



Quality, innovation and choice

Interact with us



www.intersurgical.co.uk