Special human factors issue

Why anaesthesia patient safety has lagged behind aviation safety

There is no risk without people

Zero harm
A target for error management in anaesthesia

Advancing patient safety
Summaries of citations delivered at the Diplomates Ceremony on Wednesday, 7 May 2008.

**Gold Medal**

**Professor Tony Wildsmith**

As the Foundation Professor of Anaesthesia in Dundee, Tony Wildsmith has given outstanding service to the specialty as a whole and particularly through his activities for the College. First serving as a Fellowship examiner for 11 years, he was then elected as College Council member where he served with distinction for a further ten years. Throughout his career Tony has published prolifically. He is best known for his book ‘Principles and Practice of Regional Anaesthesia’, now in its third edition, but is also the author of 26 other chapters, 73 research papers and numerous editorials and reports. In his career he has raised over £2 million for research for his long-standing interest in the pharmacology of local anaesthetic drugs and their clinical use.

Tony’s leadership and skills in bringing together disparate views are nowhere better exemplified than through his chairmanship of several important Intercollegiate working parties, of which an important example is that related to guidance on dental anaesthesia and to conscious sedation. Tony has also been associated with the *British Journal of Anaesthesia* in editorial roles for over 20 years.

Professor Wildsmith is a thoroughly deserving recipient of the College Gold Medal.

Dr G M Cooper

**College Medal**

**Dr Neville Goodman**

Dr Goodman qualified from Oxford having already obtained a D Phil in Physiology from the same University. He trained in anaesthesia in Oxford and Bristol. Having started as a Senior Lecturer in 1986 at the Bristol Royal Infirmary, he moved into an NHS consultant post at the Southmead in Bristol in 1996, a post from which he retired recently.

Neville, although a very serious researcher, enjoys teaching more than anything else and it is in that role that he has done a lot for the Royal College of Anaesthetists. He has the depth of knowledge and the patience to explain the most fundamental things. Neville’s lectures on many courses for the FRCA were always rated highly. He was a College examiner and the structured examination system used in the Fellowship examination was refined by him.

Apart from being good with statistics, Dr Goodman is a great advocate of writing and speaking the English language correctly and has written a book on medical English, now in its third edition. His expressions provoke thought and discussion.

**Professor R K Mirakhur**

**College Medal**

**Mrs Gaynor Wybrow**

Gaynor Wybrow was born in Abergavenny and on leaving school continued her education at Wall Hall College and Chiswick Polytechnic. In 1993 Gaynor joined the College as a receptionist but was soon promoted to be the Training Administrative Assistant and in 2002 became the Senior Training Administrator.

Gaynor’s appointment coincided with the illness of the then Training Director who, on her return, reported that Gaynor had carried out her duties without troubling the Medical Secretary and was keen to take on additional responsibilities. The strengths Gaynor brought to the College were her meticulous attention to detail and her warmth and understanding. Her role was managing trainee records, providing career advice and tactfully advising the medical secretaries of the decisions they should be making. The STA audited 10% of her work and never found a mistake.

In 2007 Gaynor and her husband retired to Abergavenny to be near their grandchildren. The fact that the Training Department has continued to function efficiently since Gaynor’s departure is a testament to the procedures she put in place and the staff she appointed. All these achievements make Gaynor Wybrow a worthy recipient of the College Medal.

Mr D Bowman

**Honorary Fellowship**

**Mr David Bowman**

On 7 May 2008 David Bowman accepted Honorary Fellowship, offered in recognition of his faithful, outstanding service to the College.

Born in 1944, David was schooled at Sir Joseph Williamson’s Mathematical School in Rochester. Days after arriving at Glasgow University in 1962 to read Naval Architecture and to be apprenticed at John Brown’s shipyard, he began his association with the army, territorial and regular, retiring as Lieutenant Colonel in 1999. That year, he became our Training and Examinations Director and, in 2001, Deputy College Secretary. He applied common sense and organised thinking, coping with the quirky attitudes of younger official bodies with qualified reservation. Many of us learnt from David that attention to detail matters and that hasty ideas often have undesirable, unintended consequences; perhaps this explains why it took five years for him to persuade the College’s examiners to alter marking systems.

David Bowman, our distinguished officer, has robustly protected our training scheme from influences that conspire to lower standards. We are grateful to him for his expertise, fierce loyalty to the cause, hard work, being our patient advocate and part of our corporate memory, and to Hilary his wife and to his family for lending him to us.

Dr J P Curran
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The views and opinions expressed in the Bulletin are solely those of the individual authors, and do not necessarily represent the view of The Royal College of Anaesthetists.

Don’t forget to visit the College website (www.rcoa.ac.uk/news) for the latest news items. You can also download the current and previous issues of the Bulletin from: www.rcoa.ac.uk/bulletin.

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Editor’s choice

Airline pilot Martin Bromiley’s remarkable and moving account of the events leading to the death of his wife Elaine in the March Bulletin elicited such a positive response from readers that we have devoted this issue to the topic of human factors.

What really matters is to find ways to see this does not happen to anyone else, and this issue contains a wealth of practical suggestions to help make anaesthesia safer. In a guest editorial, David Gaba points out how far we still have to go, even if anaesthesia is ahead of other medical specialties in exploring this vital area. Professor Harry Owen explains why our abilities to respond appropriately in emergencies can sometimes be degraded, leading us up a blind alley, and trainee Sarah Hammond emphasises the importance of training in both technical and non-technical skills throughout our careers.

When it comes to emergencies, being in too much of a hurry can affect our performance, and so, in the ‘10-seconds-for-10 minutes’ principle, Marcus Rall and his colleagues urge us to sit on our hands for a moment or two when the chips are down.

It’s not just people but systems that keep patients safe, and two important ones are portrayed within. Firstly, Les Gemmell and Ravi Mahajan summarise developments in incident reporting and in reducing IV medication errors, in a project led by the RCoA in collaboration with the AAGBI and the National Patient Safety Agency (NPSA). And celebrating its 20th anniversary, the grandfather of all medical safety enquiries, NCEPOD, continues to review and identify patient safety issues, as described by David Mason.

To cap it all, Tim Cook and Nick Woodall outline a new RCoA National Audit Project on the major complications of airway management, to be carried out jointly with the Difficult Airway Society and the NPSA. The College takes safety very seriously indeed.

Editor
The NHS at 60

Dr Judith Hulf, President

It seems that Modenising Medical Careers (MMC) and the Medical Training Application Service (MTAS) in 2007 have ruined August for good; or is it just that life looks better through the ‘retrospectoscope’? Although in 2008 there has been far less media hype and I pray less angst for young doctors and their families, the grindingly hard work done by an enormous army of consultants to get the recruitment process completed has certainly not been less. I would like to take the opportunity to thank all of you who undertook this work, much of it in your own time, and your colleagues who kept the service going whilst you did it. Just because it wasn’t plastered all over the front pages of the newspapers this year please don’t think that it went unnoticed by those who rely on you.

Future recruitment and the burden on departments

I spend quite a lot of my time at the MMC Programme Board for England and at a group looking at recruitment for 2009. One of our highest priorities must be to reduce the burden of short-listing. That was a clear message given to us, if we didn’t realise already, by the College Tutors and Regional Advisers at their annual meeting in June. We will continue to work with these groups and in the College to try to achieve this.

Because of the change in the pattern of recruitment created by MMC, many departments will be welcoming an abnormally large number of novice anaesthetists in August. This is because of the high calibre of applicants for the first year of anaesthetic training and a pragmatic view that we should seize these young people for our specialty while they are available. In many cases, the alternative was a large number of unoccupied training posts. Nonetheless, it will be very onerous for those of you who train, manage and provide the service and will

The approach of 1 August was once a time of relief; the children were on holiday from school (no packed lunches or missing games kit), the traffic was lighter, most people managed at least some holiday, email traffic reduced and, joy of joys, Council did not meet; the ‘silly season’ as the media term it. Such light-heartedness seems a thing of the dim and distant past. It is July as I write and everywhere I go people from all disciplines of medicine and all parts of the UK are wringing their hands about the possibility of low levels of staffing from August this year, whilst August 2009 and the European Working Time Directive (EWTD) are looming – again!
strain entire departments for many weeks to come. I applaud your actions in agreeing to undertake this task. High calibre doctors in training are the future of our specialty and I am quite certain that they will be loyal to those who captured their enthusiasm and skills at the start of their careers.

60th anniversary of the NHS

Early July saw the widely publicised celebrations of the 60th anniversary of the founding of the National Health Service (NHS). I suppose that I have to confess myself initially less than wholehearted in my enthusiasm for these celebrations, but I did attend one event which altered my view. In early June, at the Association of Cardiothoracic Anaesthetists (ACTA), I listened to Professor Sir Bruce Keogh, Medical Director of the NHS, delivering a lecture entitled ‘The NHS at 60 – crisis or cure?’ Bruce is a former colleague of mine and an excellent speaker. The review that he delivered of the changing nature of the health of the nation in the 60 years of the NHS was striking. It wasn’t just the dramatic difference between 1948 and 2008 but the continuing process of improvement. We (and I include myself) spend quite a lot of time bemoaning our lot as doctors and the increase in bureaucracy at the expense of clinical contact, etc, and we sometimes forget how much more patients can expect now in the way of good health and technical expertise. Our predecessors may not think much of the peri-operative ‘patient pathway’, but while occasionally it is far from ideal in human terms it is technically far safer today. Certainly my rather jaundiced view was altered and I think we are correct to celebrate – but not for too long as there remains much that needs improvement.

The College’s Advisory Boards

Over the last year we have reviewed the existing RCoA Advisory Boards for Scotland and Northern Ireland. We have also set in place an Advisory Board for Wales and I’m delighted to tell you that I attended its inaugural meeting last week in Newport. The Board is chaired by Hywel Jones, a member of Council, and has elected and co-opted members representing consultants, SAS doctors and trainees. I’d like to offer the Board our best wishes for the future. I cannot over emphasise the importance of the three Advisory Boards to the College. If there is no elected Council member from one of the three UK countries outside England then the chairman of the Board is co-opted onto the Council of the College, as the chairman of the Advisory Board for Scotland is at present.

The four nations

The UK now has four distinct Departments of Health who do not necessarily act in synergy over all matters. It is vital for the College, as the standard setting body for our specialty across the UK that we have regular feedback from our Fellows and Members in all four administrations in order to maintain consistent high standards for training and revalidation, to name but two issues. I’m always very grateful to those anaesthetists who sit on these Boards for their active participation. Some of you may ask ‘What about a Board for England?’ I suppose that there is an assumption, rightly or wrongly, that since the College sits physically in England, we go from England to the other administrations. If there is one thing that I have learnt through the work I do for revalidation on behalf of the Academy of Medical Royal Colleges, it is that the four countries ignore the differing needs of each other at their peril. For the sake of our patients we can’t afford not to work together. This College will continue to endeavour to harmonise activity across the borders.

College Tutors

To that end, in June, the College Tutors invited themselves to Edinburgh at the time traditionally set for a meeting of Scottish College Tutors. I must say that Scotland, the College Tutors and the Events Department of the College did us proud. It was an excellent meeting in the splendid surroundings of the Assembly Halls and has, I hope, set the pattern for future meetings when we will all be together at a mutually convenient time; although I’m not sure that anyone will be able to trump John McClure who managed to take over an entire, vast, Indian restaurant. It was a terrific gastronomic and social evening enjoyed by all.

High quality patient care is not just about the organisation of services and patient choice but depends upon us reviewing what we do, acting upon our findings and then researching the gaps.
The Darzi Report
At the end of June Lord Darzi’s NHS Next Stage Review reports – *High Quality Care for All* and *A High Quality Workforce* were published. I placed an interim statement on the website about these documents at the beginning of July. However, I hope that by the time this Bulletin is published we will have received more detailed and specific responses to some of the recommendations and we will share these with you through the College website. Some of you may well have contributed to the nine regional reviews or the London review published earlier and your comments would be welcome.

The high principles enshrined in the main document cannot be denied but there is precious little detail or resource set out for delivery. The emphasis throughout both documents on clinical leadership and quality is welcome. We must take heed and find ways of gathering evidence to demonstrate high quality care and to identify areas for improvement.

The workforce document describes a vision for the delivery of postgraduate medical education and training, in addition to general workforce and para medical training. There are a number of issues highlighted that I feel the College needs to address as a matter of urgency. Some of these are already in hand but we will be talking to Regional Advisers and College Tutors over the coming weeks to identify how we can give better professional support to them as well as to the many Educational Supervisors in anaesthesia, intensive care medicine and pain medicine who advise on the training of anaesthetists

The National Institute for Academic Anaesthesia (NIAA)
All of you will all have received a request from the NIAA Research Council for your views on the most important research questions for anaesthesia. I hope that by now most of you will have returned your questionnaire. This is an opportunity for all anaesthetists to highlight the areas where they think research will enhance the *High Quality Care for All* that Lord Darzi demands. High quality patient care is not just about the organisation of services and patient choice, but depends upon us reviewing what we do, acting upon our findings and then researching the gaps. Please send back your questionnaire; there is no such thing as too late. This is your personal opportunity to contribute to this unique and important venture for British anaesthesia – don’t miss it!

ELECTION TO COUNCIL 2009
Details of Council vacancies will be available on the College website from 1 September 2008 when nominations for candidates will be requested.

Please see the College website at: [www.rcoa.ac.uk/election](http://www.rcoa.ac.uk/election) for further details and to download the appropriate forms.

An education session for those considering standing for Council will take place at the College on Tuesday, 16 September 2008 from 4.00 pm to 6.00 pm. Please could those wishing to attend, contact Mrs Mandie Kelly via email at: mkelly@rcoa.ac.uk.

[www.rcoa.ac.uk/election](http://www.rcoa.ac.uk/election)
I can hardly believe it’s now three years since I wrote my introductory editorial. Punctuality is the thief of time, as Oscar Wilde wrote! But as this is now my last issue as Editor of the Bulletin, I thought I’d look back at what my hopes for the journal were back in 2005.

We were in black-and-white in those days, and I made a case for what I wanted the journal to be: relevant, informative, interesting, educational, inclusive, entertaining, but above all, readable. For this we needed help, and I made a plea for contributions. Whether or not we actually achieved it is for you, the readers, to decide.

The issues at that time included a whole host of matters such as dealing with change, working with new team members like physicians’ assistants, determining who would ‘mind the shop’ after hours, developing training to match new patterns of healthcare delivery, and the old chestnuts appraisal and revalidation. So not too much change there, you might think!

Fortunately I resisted trying to predict future matters of concern, or indeed predict anything, realising, like Niels Bohr, that prediction is very difficult, especially about the future. But I did invite controversy, pointing out that there was not much point in writing if you couldn’t annoy somebody. Invited or not, criticism certainly arrived in good measure, which at least meant that the Bulletin was being read and not simply ignored.

Like Douglas Adams, I love deadlines – I love the ‘whooshing’ sound they make as they fly by. Despite this, the unflappable Editorial team, Mandie Kelly and Edwina Jones, have coped with patience and skill, and it’s been great fun and a privilege to work with them.

Presidents Peter Simpson and Judith Hulf have respected editorial freedom though it must have been tempting to do otherwise. The members of the Editorial Board and Council have been unstinting with their help and advice, and have been most generous in providing copy, sometimes without a lot of notice. Alan McGlennan, as editor of Trainees’ Topics, has been most successful in encouraging the high quality articles that we have enjoyed. Elspeth Lee’s eagle eye as proof reader, has consistently raised our standards as a journal, as well as spotting the odd misprint. David Zuck has continued to contribute his carefully chosen and fascinating historical perspectives in ‘As we were’. And there are the many that have written or reviewed articles for the Bulletin; without you it just wouldn’t happen. I am most grateful to all.

But, most importantly, a big thank you to you, the readers, who ‘tell it like it is’ with honest feedback. Like Oscar, I can take any amount of criticism as long as it’s unadulterated praise, but where would we be without it?

Time now to hand over the reins to the capable hands of Peter Venn. So long – and thanks for all the fish.
First let me say that no amount of analysis can reduce the human tragedy of this case, and my heart – as well as that of all readers – goes out to this man and his family. We also recognise the inevitable suffering of the clinicians involved who no doubt were horrified and saddened by what had transpired ‘on their watch.’ Indeed, as an anaesthetist myself I have known the terror of ‘unable to intubate; hard to ventilate’ and perhaps only good fortune (and a bit of good crisis management if I may say) kept me from experiencing the ultimate horror described in Mrs Bromiley’s case. However, as Mr Bromiley recognises, what matters is to find ways to see that this does not happen again to anyone else, or at the hands of any other clinicians.

Learning from mistakes
In this regard the situation for both anaesthesia as a specialty, and indeed for healthcare in general, is a mixed picture. In the academic literature and in some professional circles the relevant aspects of human factors and logistics for patient safety have now been delineated for nearly 25 years (the work by Jeffrey Cooper, PhD was a seminal starting point). In fact, of all medical specialties anaesthesia has been the recognised leader at least in beginning to come to grips with the issue of patient safety in anaesthetic practice, the human factors and technological underpinnings in the chain of accident evolution and the means to interrupt it.

My own scholarly work has focused on exactly these issues, largely drawing parallels between the cognitive psychology of dynamic domains of healthcare (e.g. anaesthesia, intensive care) and various high hazard industries including aviation, nuclear power production, spaceflight and the military. Based on this, and as pointed out in the articles in this issue of the Bulletin by Dr Hammond and

Professor D M Gaba MD, Associate Dean for Immersive and Simulation-based Learning, and Professor of Anesthesia, Stanford University School of Medicine; and Staff Anesthesiologist, Veterans Affairs Palo Alto Healthcare System
Guest Editorial

The annual number of ‘departures’ of scheduled airlines in the US is the same order of magnitude as the number of surgical procedures under anaesthesia.

Both aviation and anaesthesia are highly decentralised activities taking place in many different and somewhat disparate venues. The annual number of ‘departures’ of scheduled airlines in the US is the same order of magnitude as the number of surgical procedures under anaesthesia. However, whereas >95% of the passenger traffic is in the hands of about ten to 12 airlines, surgical procedures are done at probably more than 4,000 hospitals and an equivalent number of stand-alone surgicentres, not to mention the procedures done in the office of the surgeon. Although there are some multi-centre networks, the number of ‘firms’ is probably several thousand. Without even considering external regulation, the small number of airlines enables a good idea to be adopted by convincing only a small number of decision makers in aviation; conversely, thousands of decision makers in healthcare would need to be convinced. Moreover, the aviation firm exerts very strong control over its processes which are enacted in tightly enforced standard operating procedures and practices. When a pilot flies for, say, United Airlines, they fly the ‘United way’ regardless of the magnitude of their previous experience. This is not so in healthcare; even large integrated healthcare systems (like the US Veterans hospital system in which I do my clinical work) do not impose anything like that level of control.

Furthermore, even in the most free-market, deregulated of nations, we do impose strong governmental regulation on structures and processes of aviation even down to the level of every day real-time practices. In the US, physicians feel that they are very regulated, but the truth is that, while there is heavy governmental involvement in payment for care, there is virtually no regulation of the actual patient-by-patient practices and processes of care. In the US system there is no national agency that regulates ‘the practice of medicine’ which is in the purview of the 50 states (and the several direct federal healthcare entities like the Veterans Health system, the Department of Defense system, and the Indian Health Service). Thus, although there is a national Food and Drug Administration to regulate pharmaceuticals and devices, it does not regulate the use of those products by physicians. Many interventions and decisions are left to individual hospitals under accreditation guidelines and through processes of ‘provider credentialling.’ The end result is an extremely

Professor Owen, there are a number of threads of activity concerning the application of human factors and team-based approaches to patient care in anaesthesia by which we can in fact say that the ‘glass is half full’. Dr Hammond calls attention to activities of direct relevance to the readers of the Bulletin; Professor Owen addresses a broader set of issues of checklists, pre-checks, and the details of what we subsume under the crisis resource management principle of ‘anticipation and planning.’

Anaesthetists around the world should justly be proud of these activities and the degree to which we are the leaders for all of healthcare. However, sadly, all of these efforts are ‘too little too late’, not only for Mrs Bromiley, but also (we suspect) for many other patients. The truth is that while there is now considerable literature on human factors in anaesthesia, with some programmes in place, the penetration of these programmes into the everyday fabric of healthcare is still minimal, and will likely remain so for some time to come. On the one hand, like the personal efforts of Martin Bromiley to educate clinicians, all of us should use the story of Mrs Bromiley as a galvanising force to speed up the adoption of human factors approaches and interventions in anaesthesia. However, on the other hand, we should ask the question ‘Why is adoption (apparently) so much slower in healthcare than in aviation?’

Different industries and weak governance

It turns out that, while there are indeed many cognitive parallels between aviation and anaesthesia at the level of the cockpit, there are significant differences when we look more broadly at the structure and processes of the two industries of healthcare and aviation. My own analysis is aimed at the US system and the situation might be different (better or worse) in other countries. Nonetheless, the big picture is probably similar wherever in the world we are.
decentralised system with very weak process controls. Thus, for this and many other reasons, it should be no surprise that even for interventions or practices that are uniformly accepted as valuable, the penetration and adoption rate is low and slow.

It is true that patients are not aeroplanes. We do not design or build them and, in fact, we don’t even receive the instruction manual. Thus, medical care is intrinsically more complex than aviation. On the other hand, to make significant progress in patient safety we do not need to have the ‘pendulum’ all the way to one side, as in aviation or nuclear power. The optimum for healthcare is likely to occur with the pendulum in the middle, taking advantage of standard operating procedures and system safety where possible, while remaining flexible, resilient and sensitive to the needs of our human patients.

Thus, the eternal vigilance that is the hallmark of anaesthesia needs to play out not only for each individual patient in each operating theatre, but also at the higher levels of governance of hospitals, healthcare systems and government. Only by addressing these issues on a system-wide basis will we be able to head toward the enviable safety record of commercial aviation and the stated vision of the Anesthesia Patient Safety Foundation: ‘That no patient be harmed by anesthesia’.

References
’Locum’ – the term could have a different meaning depending on one’s perspective. This is what the Oxford dictionary had to offer: a doctor or cleric standing in for another who is temporarily away. It derives its origin from the Latin words ‘locum tenen’, meaning ‘one holding a place’. The term ‘moonlighting’ has also been used in this context.

My view (for whatever its worth…)
I used to look down on locum anaesthetists as for some reason their competency always seemed to be under scrutiny, and people seemed to be in a rush to point fingers at them when things went wrong. I was initially reluctant to do locums due to the risks involved, but my outlook has now changed considerably and has actually prompted me to write this up.

Extent of locum work
It is difficult to get an exact figure as data are scarce. To give an approximate idea, the following were the figures in a large DGH over a year. There were nearly 5,000 hours of locum work, ranging from 170–600 hours per month with an average of 400 hours. Data from an agency which exclusively recruits anaesthetists reveal a figure of around 2,000 jobs per year;¹ this includes periods of employment ranging from hours to months.

Risks involved
- An unfamiliar working environment: equipment, location of drugs, physical geography.
- Mutual ignorance of competence.
- Being unaware of local policies and practices.

These factors can lead to some apprehension and anxiety on both sides and turn it into a potentially stressful and unsafe working environment. The fact that they might be suffering from the déjà vu of a horrifying experience with the last locum does not help either.

It is hard enough getting up in the middle of the night (that is, of course, if you have managed to get into bed) to run to a cardiac arrest in your own hospital. Imagine the plight if you are in a hospital for the first time! Believe me, I have been there and it’s not a nice feeling. The only consolation was my occasional jog, which kept me fit enough to get there first to await the arrival of the local doctors so that I could at least follow them in!

So in spite of all these risks why do we allow so many locums? Is it legal

Dr R Jaganathan,
Specialist Registrar, Royal Liverpool Children’s Hospital

¹ Unfortunately, I could not find any further details on this figure.
to do locum work in the light of the European Working Time Directive (EWTD)?

Need for locum work

The individual

Remove all the sugar coating and we are left with two reasons – you either do not have a job or you need some extra cash!

With the introduction of the EWTD, junior doctors have seen a reduction in the number of working hours.

The system

With the introduction of the EWTD, junior doctors have seen a reduction in the number of working hours. A consultant may be absent up to 15% of their working time due to leave and continuing medical education. There should be provision for doctors to acquire new skills, which is best done by organising sabbaticals of reasonable time. It is not always possible to fill these gaps internally and hence the need for locums.

Possible benefits of doing locum work

Looking at the brighter side of things, locum work offers more clinical experience in more stressful situations. Additionally, sometimes it is a bonus for the hospital to have an SpR doing an SHO locum. Should this experience be counted towards competencies? Why not? The problem would be the time frame and the fact that most locum work tends to be independent and out-of-hours in the first place. However, I think there is certainly an arguable case with long-term locums. The experience is certainly worthwhile, especially in the current climate where trainees do not get enough clinical exposure. In some ways, it is a challenge to adapt to a new set of staff, equipment and environment, win their confidence and work together as a team. All this often has to happen in the first few hours, especially if you are only there for a short time. I find it difficult not to appreciate the skills of a good locum. I agree that this is not always the case and that is when Pandora’s box is opened.

Can we make it safer?

The only way to eliminate totally the risk is to avoid locums altogether or recruit people who have already worked in the given hospital. In the real world the former is unrealistic, but the latter is difficult though not impossible. The truth is, locums have become indispensable so we had better start looking for ways to make them safer.

The AAGBI has recommendations in place regarding the registration of locum agencies, and recommends feedback of any concerns on locums. Although the AAGBI has guidelines on the induction of locum doctors, it is not always practically possible, especially for short-term locums. I personally believe that the onus lies with the doctor to take the initiative. It is not unfair to equate a locum post with the first working day of a substantive post in a new hospital.

Would it be totally unreasonable to add another half an hour to the shift to overlap with the handover in order to familiarise with the set up? We could all do our bit to make it safer. When we hand over to a locum, take the effort to make sure that he/she is comfortable with the set up. This has certainly been my experience at most places, although I have been to sites where I have been dumped with the bleep and the colleague vanished before I could ask anything!

With the introduction of PACS (Picture Archiving and Communication Systems), computerised pharmacy and swipe card entry systems in most hospitals, locums should be provided with appropriate information to access them. Ideally, each trust should consider having a designated password which could be used by a locum, or the shift leader should be able to
access these systems for the doctor. Presently, it seems to be restricted to the generosity of the doctor handing over to give his/her swipe card or password, which is less than ideal.

Last but not the least, a word about the agencies. They do send out feedback forms for locums, but due to the very nature of locum work the return rate is poor, and therefore it is usually down to informal feedback from the hospital. If there are specific concerns then the matter is dealt with officially and they are obliged to report it to the GMC.

To conclude

Locum work may not be a very smooth sail, but it is certainly not as horrible as I thought. I have made a lot of friends and the varied clinical exposure has been great (I did my first epidural blood patch as a locum). I am not asking all of you to jump into it but, if you have been sceptical, it is certainly worth a try. Maybe we all should look at the locum with a bit (or a lot!) more respect, although a certain level of caution is definitely warranted. On the whole try and work with him/her to make an environment that is safe for the patient and as stress free as possible for the staff.

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AS WE WERE...

At the corner of Bedford Street is now the publishing office of the Lancet. This journal was established in 1823 by Mr Thomas Wakley, who, we learn from the ‘Autobiographical Recollections of JF Clarke, MRCS,’ and many years on the staff of the Lancet, was the son of a village farmer in Devonshire… He was apprenticed to an apothecary in Taunton, but finished his indentures with two other gentlemen… He became a student at the united hospitals of Guy’s and St Thomas’s, where Sir Astley Cooper was then the popular lecturer on surgery. He passed the College of Surgeons in 1817, and from thence till 1823 he kept a shop in the Strand, at the corner of Norfolk Street. His old schoofellow, Mr Collard – the venerable head of the firm of piano manufacturers of that name – assisted him in the first seven or eight numbers of his new journal. After a time the Lancet was printed at the office of Mills, Jowett and Mills, in Bolt Court, Fleet Street. [Bolt Court was the home also of the Medical Society of London]. Cobbett’s Register was printed at the same establishment, and Wakley, to some extent, made the style of Cobbett his model. At this time it was no uncommon occurrence for four persons to meet in a little room in Mills’s office. Three of them made themselves famous – William Cobbett, William Lawrence, and Thomas Wakley; the fourth was a barrister of the name of Keen, who used to join the party on printing nights, probably with a view of determining whether the productions which were about to appear were libellous. The sanctum was seldom violated. The printer’s boy was the only person admitted, and he in after life described the room as the scene of the utmost merriment. He could hear as he ascended the stairs the boisterous laugh of Cobbett above the rest; the loud, cheerful, good-humoured ring of Wakley; and on entering the room, could see the quiet, sneering smile of Lawrence, and hear the suppressed giggle of the lawyer. …The Lancet soon got into hot water, and the insertion of an account of a defective operation for the stone, by Mr Bransby Cooper, the nephew of Sir Astley, led to the latter bringing an action against it for libel, which created a great sensation at the time. In addition to the report, leading articles of an exciting kind, and squibs and epigrams – some in the worst taste – were inserted. The following is given as a specimen:

‘When Cooper’s ‘nevvy’ cut for stone,
His toils were long and heavy;
The patient quicker parts has shown,
He soon cut Cooper’s ‘nevvy’.

Mr Wakley defended himself on his trial, and the verdict for the plaintiff, £100 damages, was considered to be in his favour. Outside Westminster Hall there was a large crowd who cheered him vociferously, and The Sun newspaper kept up its type till twelve o’clock at night in order to record the verdict. The reporter of the case, the late Mr Lambert, was expelled the hospitals, and a board was placed in the hall of Guy’s, cautioning all students against reporting for the Lancet. This restriction, however, is no longer in force, and the bitterness of the contest is almost forgotten.


Dr David Zuck
The History of Anaesthesia Society
The Patient Liaison Group Debates

Continuity during the long haul in critical care – a relative’s view

Mrs Anne Murray, Chairman

It is human instinct to rescue one another and, setting aside anecdotes about dolphins guiding exhausted swimmers to shore, we are possibly the only mammals wired to rescue non-members of our own family or tribe. In a healthcare setting, this is demonstrated daily, and having recently spent a lot of time during an eight-week period when my husband (H) was in a large critical care unit, I have observed the intensity of this instinct in a highly skilled team. My observations are, of course, extremely subjective, and reflect the fact that, like patients and their relatives, medical and nursing staff are all different, and the human dynamics will change depending upon the mix of personalities.

A relay of consultants
During the first 20 days I met and talked with six consultants, five of whom communicated well and sensitively, whether breaking the news by telephone that H was critically unwell, reviewing his situation or talking me through my concern that once a tracheostomy tube was in situ it would be extremely difficult for staff to let H ‘go gently’ if the outcome was not to be one that he would find acceptable. Suffice it to say that I did not interact well with the sixth, who appeared one weekend from his main base at another hospital and in my view was rather arrogant and ‘gung ho’ – I had no confidence in him whatsoever.

Notwithstanding the admirable qualities of the Famous Five, what added to my anxiety in the first weeks was having to begin again as the baton passed from doctor to doctor every three to four days. What may work well for both doctors and relatives during a critical care sprint perhaps doesn’t for a marathon. If the EWTD prevents continuity in communication with relatives, is there a case for a named consultant who has an overview of a particular patient?

While I cannot speak too highly about their humanity and expertise in recovering patients from the brink of death, they cannot be universal experts. Twice I asked that an opinion be obtained from outside the unit, the second time when I noticed that H’s haemoglobin was much lower than that tolerated by his referring consultant haematologist. When told that this was recommended by ‘a large Canadian study’, I wondered how many of that cohort of patients had a combination of chronic lymphatic leukaemia, pancytopaenia and Hodgkin’s lymphoma. My request to ‘phone a friend’ was received with good humour, and after liaison H received a unit of blood.

A merry-go-round of nurses
The nurses were kind and dedicated, but again I found the lack of continuity difficult – I realise that juggling skill mix is complex, and that it would not be good for a nurse to care for one patient for too long, but there was a noticeable difference when H was cared for by the same person for two consecutive days. He was more settled on day two, and the nurse found it easier to communicate with him at whatever level his situation would permit. While the more senior and experienced had the confidence which allowed them not to react to every squeak from the monitor, but instead to closely observe H to see whether he was able to regain equilibrium without intervention, their junior colleagues needed to intervene at once – at times it seemed like ‘adjusting the legs of the table’. Twice, at night, I felt that a nurse (I think from an agency) was too quick to sedate H, so that the progress achieved by an excellent practitioner during the day was to some extent lost. (I accept that this may be grossly
If the EWTD prevents continuity in communication with relatives, is there a case for a named consultant who has an overview of a particular patient?

In the early stages, the well-intentioned efforts of a couple of the female nurses to empathise did not work (for either of us). I was baffled to be offered a hug by someone I had never met before, and recoiled from the suggestion that I might like to be involved in H’s care by washing his feet. This was not something I was in the habit of doing, and a conscious H would have absolutely hated the idea. What the nurses meant by ‘involvement in H’s care’ was washing feet, combing hair and putting on aqueous cream, whereas to me it meant providing the continuity of personal knowledge about H (for instance his claustrophobia). I found that they did not always pass on such information at handover – probably because they did not think it was important.

Task fixated?

In the last furlong, there was a ‘spot of bovver’. Sensing that I was being held in reception for much longer than usual without the usual words of explanation, I asked what was happening, and was told that there was difficulty in re-inserting the nasogastric tube that H kept removing. I suggested that I might be able to help by talking to him and holding his hands, and after some hesitation I was admitted, to witness two further failed attempts. At this point I asked the two nurses why they were doing this, and was told that it was needed for medication and nutrition. I pointed out that H was now capable of swallowing fluid from a syringe or cup, and was not likely to die from malnutrition. I asked them not to try again until they had taken senior medical advice about whether it was necessary. Understandably, they were not comfortable with this, but I thought that we had reached an understanding, so when I learned that there had been subsequent attempts overnight, I was distraught, and at 9.00 am I took a ‘human rights’ type letter in to the unit, outlining my concerns and asking whether the team was becoming ‘task fixated’ instead of patient oriented.

Although the team did a superb job, I’d like to think that, when persisting with a task which the patient clearly finds distressing, nurses consider why they are doing it, and if it is essential to that person’s management. If they are not convinced, then there should be a team discussion.

What did I learn about myself?

I’ve always regarded myself as being tactful, not ‘pushy’, and able to read situations and pick up on nuances. I discovered that when tired and anxious I can be none of these things, and can latch on to a word like ‘optimistic’ completely out of context.* On a number of occasions I pushed the patience of the nurses to the limit.

My need to ask lots of questions and get involved did not make me any happier than another lady in a similar situation. She was deferential and less articulate than I, and was greatly comforted by reassurances that I would have found bland. The experience really underlined the skill needed to switch between our different expectations, and to communicate with both of us at the level we required individually.

The finishing line – was it a race worth winning?

Perhaps mercifully, H has no memory of his ordeal, including the tracheostomy. At times I wondered whether H was being swept along on the intensity of the collective human instinct to rescue, and when he emerged alive, but confused, bedfast, incontinent and oxygen dependent I regretted that I had not been a stronger advocate for his values and best interests at crucial points along the route. Happily, his referring consultant, who knew the person within, did not give up on him, and H has since been accepted by a neurologist specialising in rehabilitation following brain injury. H has a chance of regaining some quality of life for as long as the Hodgkin’s disease is in remission, and I have summoned up the energy to write a sincere letter of appreciation on his behalf to the team responsible for his survival. H is meanwhile in positive mood, and wondering how soon he will be able to come home, drive, garden and play bridge. Help!

*After which, that particular doctor started saying ‘less pessimistic’!

The Patient Liaison Group Debates

unfair or plain wrong, but this is how I felt, picking up on small clues and attitudes).

The Patient Liaison Group Debates

Although the team did a superb job, I’d like to think that, when persisting with a task which the patient clearly finds distressing, nurses consider why they are doing it, and if it is essential to that person’s management. If they are not convinced, then there should be a team discussion.
The Fellowship revisited
We all hate being examined don’t we?

As highly educated professionals we have all had to become accustomed to being examined on our paths through school, college and university. We then discover that acquisition of a primary medical qualification is only the beginning of a medical career – there are more specialist exams to come.

The past few years have seen our training programme change from an apprentice model to a competency-based one. The acquisition of knowledge underpins our specialist practice and there has always been a need to demonstrate that such knowledge has been acquired and understood. With the focus increasingly turning to quality assurance this is becoming ever more important.

Passing a test of knowledge enhances career progression, commands respect and helps direct self-learning. It can also aid quality assurance and reassures the public that we are competent doctors and are ‘fit for purpose’. The College has a two-part Fellowship exam which is highly respected nationally and internationally. It has been undergoing a number of changes to ensure that it fits better with the new style competency-based training programme.

Out with the old
Memories of waiting anxiously in the toilet area at Queen’s Square to hear the results from a white coated porter only to be left standing feeling like flotsam, when my number was not called out, affected me deeply and they are still firmly etched into my brain. Much has changed since then to make the Fellowship a more relevant and fairer exam.

The Primary is aimed at a much earlier stage in a trainees’ career and can be passed after the first two years’ experience. Its structure has changed so that it is now taken in two parts with the MCQ section becoming ‘stand-alone’. An unlimited number of attempts are allowed and a pass in this section is valid for three years (two years from August 2009) so one no longer has to pass the multiple choice questionnaire (MCQ), objective structured clinical examination (OSCE) and structured oral examination (SOE) sections all in the same sitting. There have also been changes in the marking process. The SOE is completely structured with predefined questions and a clear marking scheme that has less potential for bias.

In with the new
Council has been considering further changes to both the Primary and Final exam so as to comply with the Postgraduate Medical Education and Training Board’s conditions for the approval of the College’s Certificate of Completion of Training (CCT) assessment systems and also to introduce current best practice in assessment. As of September 2008, negative marking will be removed from the MCQ sections and a list of the other changes under consideration is available on the web.

Both Andy Lim and I, together with Chris Rowlands before me, have worked hard to ensure that SAS doctors
remains eligible with realistic opportunities to sit these examinations, and indeed this opportunity remains. The latest regulations are available on the website (www.rcoa.ac.uk/regulations).

Interesting statistics
David Bowman, the Director of Training and Examinations, analysed results from the recent sitting of the Final which had some interesting findings, and I reproduce these here with his kind permission.

<table>
<thead>
<tr>
<th>Grade</th>
<th>Number sitting exam</th>
<th>Proceeded to SOEs</th>
<th>% Pass rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>SpR</td>
<td>390</td>
<td>307</td>
<td>79</td>
</tr>
<tr>
<td>LAT</td>
<td>47</td>
<td>29</td>
<td>62</td>
</tr>
<tr>
<td>Former Trainee*</td>
<td>25</td>
<td>15</td>
<td>60</td>
</tr>
<tr>
<td>FTSTA</td>
<td>40</td>
<td>23</td>
<td>57</td>
</tr>
<tr>
<td>Trust Grade**</td>
<td>6</td>
<td>3</td>
<td>50</td>
</tr>
<tr>
<td>SAS Grade***</td>
<td>66</td>
<td>18</td>
<td>27</td>
</tr>
</tbody>
</table>

*These will include SAS grades who left training <5 years ago.
**These will have left training <5 years ago.
***These will have left training more than >5 years ago.

The overall success rate for the 574 candidates was 68.8%.

As can be seen, the success rate for those of us who have been outside formal training for more than five years is almost three times lower than that for SpR’s. The figures also show that the overall success rate is high and, despite the lower figure, around one quarter of those SAS doctors who sit the Final do succeed. Does this reflect the possibility that SAS doctors may have greater difficulty finding the necessary time to study, are less well prepared, and/or have less ‘current knowledge’ or are there less tangible factors about which it is difficult to be clear? As for any exam, the three Ps are vital – preparation, preparation and preparation.

I prefer to look at these figures more positively. For those SAS and Trust Grade doctors who have made the effort to study and take the Final Fellowship examination despite these possible hurdles, this is a fantastic achievement and needs real praise. I would also like to commend all those who tried but did not succeed this time. From personal experience, I know that finding the time to study is a struggle and family commitments can often conflict.

It could be you
Andy Lim published an article in the Bulletin (Bulletin 45; September 2007:2287) detailing one of our recent achievements through Council. Any SAS doctor who has passed the Final and is able to show an aptitude for teaching can apply to the Examinations Committee to become an examiner. This is a role that until last year was solely the domain of our consultant colleagues. It represents forward thinking and demonstrates real support for SAS doctors by our College. Being an examiner is undoubtedly hard work, but it is also a superb and enjoyable opportunity. It is a role which commands great respect and is a fantastic way to enhance our careers.

Before applying, it is recommended that you attend the Primary examination as a visitor and, although this can seem somewhat voyeuristic, it is good experience which at the very least can enhance your ability to teach trainees. Not only is it a good day out at the College but you also acquire CPD points too!

Both Andy Lim and I urge all of you who meet the basic criteria to consider applying to become an examiner – someone has to be the first SAS anaesthetist examiner and it could be you!
There is no risk without people

Dr S Hammond,
SpR in Anaesthesia, Epsom and St Helier’s NHS Trust

‘Blaming individuals is emotionally more satisfying than targeting institutions and also legally more convenient, at least in Britain.’ This statement comes from an article published in the BMJ in 2000 by Professor J Reason on Human Error. In 2008 are we any better at managing human fallibility? I suggest not much but that help is at hand in the form of human factors.

I found the article written by Mr Bromiley in the March issue of the Bulletin deeply moving and thought provoking and feel very strongly that we should publicly acknowledge the good work he is now striving to achieve in educating the healthcare profession about the role of human factors.

The human factors in any situation may be defined as those things that make humans different from logical, completely predictable machines.

Human factors are currently high profile featuring in three separate anaesthetic journals in March this year.

Error not blame

The Health and Safety Executive state: ‘Up to 80% of accidents can be attributed to human error and it is often easy to blame the individual who was most directly involved. However, this is too simplistic and a human factors approach makes it clear that there are often a number of factors which have contributed to the accident.’

As Mr Bromiley implies, the aviation industry acknowledges there is no risk without people, and as complex and erratic beings, humans interacting with and working as part of a technological, organisational and psychosocial system will inevitably produce variability, risk and sometimes error.

I believe Mr Bromiley is absolutely correct in his declaration that the healthcare industry needs to accept that at times patients will come to harm but that error should not be blamed on poor performance or weaknesses of individuals. Further, I feel strongly that anaesthesia should embrace the concept of human factors and non-technical skills as
fundamental to our working lives by making the concept a compulsory component of training, as the case is already for foundation doctors in South London.

Training in human factors
In anaesthesia we recognise that good communication and team work are crucial in ensuring efficient, safe and rewarding practice. However, do we go far enough in evaluating this during training? Good communication comes more naturally to some than others, as does working within a team, listening to others and admitting mistakes.

Presently, the resources available in the training of human factors include:

- Clinical Human Factors Group (CHFG) website founded by Mr Bromiley, a group of clinicians and experts in the field of human factors
- Anaesthesia Crisis Resource Management Simulation Courses
- Compulsory medical simulation training for foundation doctors in South London, Kent, Surrey and Sussex at St George’s Hospital
- Publication of the independent review of the Elaine Bromiley case.

The CHFG ‘aim to enhance the knowledge of all healthcare professionals about human factors and how to more successfully manage human error. The Group will have no political or policy agenda other than to define and encourage best practice.’

Cricothyroidotomy controversy
Tragically, Mr Bromiley’s wife died as a result of delayed management of a can’t intubate can’t ventilate (CICV) scenario and a failure to perform a cricothyroidotomy. I would suggest that cricothyroidotomy is a core skill for anaesthetists. There was some debate when the Difficult Airway Society (DAS) pronounced cricothyroidotomy a core anaesthetic skill and I think that some controversy remains.

Establishment of an emergency airway in anaesthesia is a rare situation and consequently we are never going to feel completely comfortable about having to perform a cricothyroidotomy. An RCoA airway course I attended verified this. When the members of our group were asked to assemble the jet ventilation equipment and attach it to the catheter in the cricothyroid membrane there was anxiety and apprehension leading to a significant delay. However, we should be expected to know the DAS algorithm and perform appropriately in an emergency situation.

In conclusion I would like to suggest that we emulate the aviation industry by providing formal training in both technical and non-technical skills throughout our careers to enable us to improve our performances at times of stress and to acknowledge mistakes will happen and not to resort to blame.

Reference
1  www.hse.gov.uk/humanfactors
Zero harm
A target for error management in anaesthesia

In a recent Bulletin, Martin Bromiley described the events that led to the death of his wife from hypoxic brain injury and outlined how the industry he works in (commercial aviation) manages ‘human factors’. We can’t stop mistakes being made in anaesthesia but we can develop systems to trap them before they harm patients.

Background
‘A significant time lapsed in terms of adequate ventilation before lack of appropriate intubation was established. An emergency was called while the anaesthetist attempted to continue intubation efforts.’

Coroner

The need for oxygen in circulating blood is the foundation of anaesthesia education and the means of achieving this are a major part of training. Why then do apparently well-trained anaesthetists in well-equipped hospitals struggle with an airway for so long that the patient dies from hypoxia? Aviation had an analogous problem, controlled flight into terrain (CFIT), in which an apparently well-trained pilot flies a fully operational aircraft into the ground. Crash investigations have led to procedures to catch and limit the consequences of human error so flying on a scheduled service has become very safe. In contrast, being admitted to hospital in 2008 for even a simple elective procedure still includes significant risk of harm from medical care.

Human factors and problem behaviours
‘They were good people doing a good job who had the technical skills to deal with what happened. But by behaving as normal humans do, and not having the benefit of the training and development available to other industries, found themselves following a blind alley.’

Martin Bromiley

Human factors are the perceptual, cognitive and motor components of the way we respond to events in our increasingly complex work environment. Our behaviour in these settings, sometimes called heuristics, is quite predictable. Unfortunately, some of the character traits that have contributed to our success as a species are now psychological baggage that degrades our ability to respond appropriately to emergencies.
There is a lead time to react to a sudden, unexpected event and there is always delay in developing a plan from scratch.

The slow development of an abnormal event leads to delayed recognition that there is a problem unless limits have been set.

We have an innate tendency to want to avoid an intervention that may have serious side effects or consequences and this leads to delay in potentially life-saving treatment.

Time pressure reduces information processing ability and this can give rise to perceptual narrowing (AKA tunnel vision) and lead to errors.

A long track record of satisfactory task completion leads to complacency and over-confidence and accepting reduced safety margins.

Working memory is very limited in size so a high cognitive load, such as a rapidly changing situation or multiple sources of information, slows time perception and impairs decision making.

We have a wish for ‘task accomplishment’, particularly part way through a task and this can lead to persistence with unsuccessful actions.

Prospective memory (remembering to do something in the future) is very unreliable so triggers or prompts are needed.

Conflicting objectives can affect risk acceptance and prioritising tasks so we may accept a lower level of care in the interest of work ‘efficiency’.

The sense of belonging to a group is a fundamental human need so we readily subscribe to ‘groupthink’ and are more likely to propagate error.

When we have made a decision we try to make ambiguous information and/or misleading sequence of signs fit our expectations and miss opportunities to take corrective action.

We need predetermined plans and team training because these factors are embedded in the psyche so that the education and training of the individual cannot be relied upon. Although standard operating procedures (SOPs) are routinely used in aviation they’re only beginning to permeate medical practice. Treatment protocols for cardiac arrest and trauma management have been accepted internationally and there are guidelines for management of the difficult airway. Most anaesthetists are novices or advanced beginners when suddenly presented with a life-threatening airway crisis and some need help to compensate for the human factors that degrade decision-making ability. Prospective memory cannot be relied on and there are many missed executions (memory lapses) when dealing with emergencies. Clearly, we need a solution to this dilemma.

Flight planning for induction of anaesthesia
We can learn from aviation and plan and run induction of anaesthesia and airway management like a take-off using a checklist to prompt correct action at every step.

Pre-anaesthetic checklist

- All members of the anaesthetic team briefed on plan and procedures.
- All members of the anaesthetic team are trained to respond to an emergency (knowledge and equipment) and are empowered to contribute.
- The boundaries for declaring an emergency (e.g. SpO2 less than 90% and/or two good attempts to intubate have been unsuccessful, etc) are determined and the anaesthetic team is briefed on these.
- The normal and abnormal checklists for difficult airway management are confirmed appropriate for this case.
- Potential emergency resources (human and equipment) are identified and located.
- Full tanks check – induction of anaesthesia can only commence when the patient has been pre-oxygenated by a predetermined protocol.
- No extraneous communication by the anaesthetic team until the airway is secured.
- During induction and airway management key events and items are ‘checked out’ by the team, e.g. anaesthesia induced, muscle relaxant ‘in’, good view of cords (or not) etc.
- Consistent, standardised confirmation of intubation is always used.
- When the airway has been secured, control over progress of the case is handed over to the surgical team.
Pilots do not make arbitrary decisions about what they will check and what they will do and neither should we. It is not always easy to model good behaviour, e.g. standardised confirmation of intubation, but if this isn’t undertaken with every intubation, can we expect it to be performed by a trainee with a difficult case?

Most anaesthetists are novices or advanced beginners when suddenly presented with a life-threatening airway crisis...

Setting the limits
Before taking off, the SOP for that phase requires flight crew to calculate ‘go’/‘no go’/‘abort’/‘must continue’ take-off boundaries. In the same way, in anaesthesia we need defences to catch the memory lapses and rule violations that can lead to death from airway (mis)management. For example, by estimating the patient’s oxygen reserve and oxygen consumption as shown in Table 1 (below) we can determine how much time there is to attempt intubation and when we must establish oxygenation using a surgical airway when we can’t ventilate and can’t intubate. The actual values may be debated (e.g. I have not included the contribution from oxygen already in the blood but have calculated the time to oxygen exhaustion and assumed a one-minute buffer is adequate), but the time advantage that can be obtained from actual pre-oxygenation confirmed by measurement of end-tidal oxygen fraction is indicative of the additional safety margin this creates.

Eliminating delay in calling for help
‘Tragically at the stage when it was clear that the deceased was not able to be ventilated the time available to achieve effective resuscitation was limited…’

Coroner

Anaesthetists, whether they are early trainees or experienced and knowledgeable about difficult airway management, often delay calling for help when they encounter difficulties. In the interests of patient safety there should be an action point (trigger) in the difficult airway algorithm (SOP) that mandates calling for help. Multiple attempts at intubation are associated with reduced likelihood of success and increased complications. Anaesthesia assistants could be given a bigger role in managing the difficult airway and call out minutes since last oxygenation, offer to make a warning call when difficulty with intubation is experienced etc. Seeking assistance with a difficult airway is too important a task to be an arbitrary decision. Perhaps after three attempts at intubation the assistant should offer a recommended rescue airway aid even if it has not been asked for. If satisfactory oxygenation has not been established by the time oxygen reserve is less than, for example, two minutes, then the assistant should begin to prepare for emergency cricothyroidotomy.

It is important that the local culture attaches no blame or fault to calls for help. A survey of an emergency department in Australia identified inappropriate delays in responding to abnormal vital signs due to issues with documentation, the ability to seek advice from appropriate staff, ineffective communication and fear of reprimand. Many studies of error reporting have noted that fear of disciplinary action leads staff to hide mistakes if they can. Absence of blaming is an essential part of improving patient safety.

Can we achieve zero harm from medical error?
‘We cannot solve our problems with the same thinking we used when we created them.’

Albert Einstein

**Table 1** Comparison of the effect of supplementa oxygen and pre-oxygenation on available oxygen. To avoid harm, oxygenation must be achieved at least one minute before oxygen exhaustion

<table>
<thead>
<tr>
<th>Weight (kg)</th>
<th>O$_2$ consumption (3 ml/kg/min)*</th>
<th>Fractional End tidal O2</th>
<th>O$_2$ available** FRC ~2200 ml</th>
<th>Time to oxygen exhaustion (min)</th>
</tr>
</thead>
<tbody>
<tr>
<td>a 85</td>
<td>85 x 3 = 255</td>
<td>0.17</td>
<td>0.17 x 2200 = 374</td>
<td>374/255 = 1.5 min</td>
</tr>
<tr>
<td>b 85</td>
<td>85 x 3 = 255</td>
<td>0.45</td>
<td>0.45 x 2200 = 990</td>
<td>990/255 = 3.9 min</td>
</tr>
<tr>
<td>c 85</td>
<td>85 x 3 = 255</td>
<td>0.80</td>
<td>0.80 x 2200 = 1760</td>
<td>1760/255 = 6.9 min</td>
</tr>
</tbody>
</table>

*For a healthy adult. Additional oxygen consumption factors should be included for sepsis and pregnancy and in children. **Allowance should be made for gender, size, smoking, lung disease etc.
Pilots and anaesthetists make mistakes but pilots (possibly helped by a desire for self-preservation) have accepted human failings and developed systems to catch errors and prevent their consequences. In his studies on ‘quality’ Edwards Deming established that only ten to 15% of a worker’s performance is determined by individual effort and 85–90% comes from the systems in which the work takes place. This means that to eliminate harm from mistakes and errors in the workplace requires more than training of the individual; it requires major change in our way of working as well. Anaesthesia has already borrowed incident reporting and simulation-based training from aviation. Now we should adopt procedures used in aviation (and all ‘high reliability’ industries) to create a system that is truly patient-safety focused. We can’t make Martin Bromiley’s family whole again but we can make Elaine the last person to be killed by airway management error.

FRCA Examinerships 2009–2010

The College invites applications for vacancies to the Board of Examiners in the Fellowship of the Royal College of Anaesthetists, from the academic year 2009–2010. Examiners will normally be recruited to the Primary examination in the first instance. Precise numbers of vacancies are not known at the time of going to press but we envisage making approximately 14 appointments.

Applicants shall be assessed against the following person specification:

Essential
1. Shall normally be a Fellow by Examination, but a Fellow ad eundem, or a Fellow by election of the Royal College of Anaesthetists will also be considered.
2. Shall be in good standing with the College.
3. Applicants must be able to demonstrate that they have the competence, confidence and credibility to assess the next generation of consultants.
4. Shall currently be active in clinical practice in the NHS or a comparable post.
5. On 1 September 2008 shall have the expectation of completing ten years as an examiner whilst filling a Specialty Doctor/SAS grade or Consultant appointment in the NHS, or a comparable post.
6. Can demonstrate active involvement in the training and assessment of trainees.
7. Good written and verbal communication skills.
8. Ability to work as part of a team.
9. Documentary evidence of satisfactory completion of Equal Opportunities training in the last five years.
10. Able to commit to long-term and active involvement in examiner duties including the ability to devote a minimum of 15 days per academic year to the role. This includes both the delivery and development of the examinations.

Desirable
1. Shall demonstrate a special interest(s) directly relevant to the balance of expertise required in the Board of Examiners.
2. Within the past five years shall have visited a Primary or Final FRCA examination.

Application forms and information for applicants can be downloaded from the examinations section of the College website (www.rcoa.ac.uk/examinations), or can be obtained from Miss Chloe Scrivener by tel: 020 7092 1525 or email: cscrivener@rcoa.ac.uk.

THE CLOSING DATE FOR RECEIPT OF COMPLETED APPLICATION FORMS IS 17 OCTOBER 2008.
The ‘10-seconds-for-10-minutes principle’

Why things go wrong and stopping them getting worse

Dr M Rall MD,
Center for Patient Safety and Simulation (TuPASS), University Hospital Tuebingen

Dr R J Glavin MPhil FRCA,
Educational Director, Scottish Clinical Simulation Centre

Professor R Flin,
Industrial Psychology Research Centre, School of Psychology, University of Aberdeen

‘We are too fast’ in critical situations
What at first sounds paradoxical might turn into a milestone in promoting safer patient care. The ‘10-seconds-for-10-minutes principle’ has emerged from more than ten years experience in trying to enhance patient safety in acute care settings, especially in ‘realistic simulation team training’ for professional healthcare providers.

The problem
For the last ten years the instructors at TuPASS (Tuebingen Center for Patient Safety and Simulation) have been running realistic simulation sessions for all kinds of acute care teams from intensive care, anaesthesia in the operating theatre, pre-hospital care, air rescue (fixed wing and helicopters) and resuscitation. The instructors have frequently observed scenarios where ‘good’ professional teams make errors, forget important steps or even exhibit signs of high stress levels. They have thought a lot about why such highly qualified and experienced teams make errors or forget things – mistakes or errors that the team members themselves recognise only a few minutes after the scenario has ended. The question is: ‘Why do competent teams in emergency situations perform below their expected standard – sometimes resulting in severe errors?’

The cause
After observing this phenomenon, it is apparent that the team members feel themselves to be under considerable time pressure during these emergency scenarios (‘It’s an emergency! – Quick! The patient’s dying!’) contributing to the team’s poor performance. This doesn’t always happen – some teams are fast and effective, managing the clinical problem quickly and without errors. So our hypothesis is that whilst some teams perform well, others work so quickly that they make errors and so compromise safety. This trade off is seen in other domains; if you increase your speed of performance, you increase the risk of deterioration in other areas of the system such as safety or high reliability. Psychologists call this a speed/accuracy trade off and it has been associated with unsafe outcomes in
other professions. In a NASA study of safety reports, the association between perceived time pressure (e.g. pilots rushing to meet schedule deadlines) and error was so strong that the researchers labelled the problem ‘The hurry-up syndrome’.

The solution
We further hypothesised that, ‘If the team would slow down just a little, they would be better able to apply all their knowledge to the benefit of the patient.’ In fact, models of expert decision making (e.g. Orasanu’s work with airline pilots) show that an initial assessment of the situation improves decision making as judged by selection of the correct actions executed in the correct order. Successful management relies not only on identification of the problem, but also on accurate assessment of the level of risk and time available. Experienced decision makers undergo this process (albeit often subconsciously) when selecting a decision-making strategy, i.e. ‘Do I have to apply a rule immediately or do I have time to think a little more about this problem?’ On the other hand, novices characteristically underestimate the time available to think and often act too quickly, perhaps because of task anxiety. This concept is captured neatly in the words of a consultant surgeon to his trainee, ‘Don’t just do something, stand there’. Similarly, experienced airline pilots teach the phrase: ‘When you get an abnormal alarm, sit on your hands first’ to discourage novice pilots from making a swift, but possibly inappropriate, response.

The need to slow down appears to be greatest at the beginning of the treatment planning (‘Diagnosis’ in Figure 1) or in situations where the team has problems and the initial treatment is not working (‘Feel stuck’).

So we propose the ‘10-seconds-for-10-minutes principle’, presented here for the first time. The 10-for-10 principle states: ‘When you see a patient in a critical condition, take your time, do not make a diagnosis and start treatment within a fraction of a second, but take a deep breath and then a formal team time-out’ (‘the 10 seconds’ part). Then work through the lower right-hand section of Figure 1.

Problem?
Ask yourself and all of your team members, ‘What is the biggest problem right now?’ – ‘What is the most dangerous aspect of the problem?’ (‘What outcome would I like to have least?’).

Opinions?
Clarify the above with all available team members.

Facts?
Gather available information.

Plan?
Using input from the team, make a treatment plan. This includes the plan as well as the sequence of actions. On many occasions we observed team leaders giving orders as ideas came to mind, not necessarily in order of priority.

Distribute?
Distribute the workload by assigning tasks and responsibilities. This may include such activities as reporting on thresholds, e.g. Keep an eye on the oxygen saturation and let me know if it falls below 94%.’

Figure 1 The ‘10-seconds-for-10 minutes’ principle
Check!
Before diving into work, involve all team members again to encourage them to raise any further concerns or suggestions for improvement or refinement.

The above list seems very long and one that would take a lot of time before initiating treatment. However, the first tests in the simulator at TuPASS using the 10-for-10-principle have shown:

a that the above mentioned tasks can be undertaken very quickly, especially when the team knows and supports the principle
b that any time lost using the 10-for-10-principle is often compensated by much more effective team action after the time-out.

That is the idea of the principle and why it is so named. Spend 10 seconds more in data gathering, diagnosing and team planning, and save time and improve safety for the next 10 minutes. Of course, the 10 seconds and the 10 minutes are symbolic – the 10 second time-out may save the patient from suffering for the next 10 years.

The potential of the ‘10-seconds-for-10-minutes principle’
The first applications of the 10-for-10 principle in simulation training have shown very promising outcomes. Some teams who perform the 10-for-10-principle come up with a whole array of improved human factor behaviours (Crisis Resource Management or Non-Technical Skills) making patient care so much safer.

In the view of the authors, no patient will suffer from a 10-second delay in treatment – in this sense medicine is usually a slow speed domain, where negative outcomes and harm need to develop. In contrast, many patients have and will suffer from errors or omissions by teams who are stressed or act in an inappropriately rapid manner.

Finally, when patients suffer from preventable errors, healthcare professionals can suffer as ‘second victims’, especially in situations where they know that they have performed below their usual level and have made mistakes. We think that training teams responsible for the management of emergencies to use this principle effectively may help improve the safety of patients with critical conditions. Of course, this is a hypothesis that will need to be subjected to proper scientific study, but we are sufficiently impressed with our early results to share the concept and receive feedback from trials by others.

Reference
SEPTMBER

- 8–19 September 2008 (code: A79)
  **FINAL FRCA COURSE**
  The Royal College of Anaesthetists, London
  Registration fee: £560
  See page 2619 for details

- 12 September 2008 (code: D09)
  **ULTRASOUND AND REGIONAL GUIDED ANAESTHESIA WORKSHOP**
  The Royal College of Anaesthetists, London
  Registration fee: £210
  (£165 for registered trainees)

- 22–23 September 2008 (code: A37)
  **TEACHING METHODS WORKSHOP**
  The Royal College of Anaesthetists, London
  Registration fee: £365
  (£310 for registered trainees)
  See page 2620 for details

- 24 September 2008 (code: D43)
  **ADVANCED AIRWAY WORKSHOP**
  The Royal College of Anaesthetists, London
  Registration fee: £250

- 24 September 2008 (code: C97)
  **CORE TOPICS DAY – BELFAST**
  A joint meeting with the RCSI
  Waterfront Hall, Belfast
  Registration fee: £145
  (£105 for registered trainees)
  See page 2619 for details

- 25 September 2008 (code: C63)
  **CORE TOPIC MEETING – FLUID MANAGEMENT**
  The Royal College of Anaesthetists, London
  Registration fee: £230
  (£175 for registered trainees)
  See page 2620 for details

- 30 September 2008 (code: C79)
  **CORE TOPICS DAY**
  The Royal College of Anaesthetists, London
  Registration fee: £175
  (£150 for registered trainees)
  See page 2620 for details

OCTOBER

- 16 October 2008 (code: A78)
  **FACULTY OF PAIN MEDICINE – STUDY DAY FOR ADVANCED TRAINEES IN PAIN MEDICINE**
  The Royal College of Anaesthetists, London
  Registration fee: £95
  See page 2620 for details

- 31 October 2008 (code: C40)
  **AIRWAY WORKSHOP – GLASGOW**
  University of Glasgow
  Registration fee: £230
  (£175 for registered trainees)
  See page 2619 for details

NOVEMBER

- 4 November 2008 (code: C49)
  **A CAREER IN ANAESTHESIA**
  The Royal College of Anaesthetists, London
  Registration fee: £20
  See page 2619 for details

- 6–7 November (code: B05)
  **CURRENT CONCEPTS SYMPOSIUM – ADVANCES IN PHARMACOLOGY AND THERAPEUTICS**
  The Royal College of Anaesthetists, London
  Registration fee: £390
  (£275 for registered trainees)
  See page 2623 for details

- 8 November 2008 (code: A76)
  **CME DAY**
  **A joint meeting with the AAGBI**
  The Royal College of Anaesthetists, London
  Registration fee: £210
  See page 2621 for details

**NEW EVENT IDEAS**
Would you like to organise an event with the RCoA? If so, please visit our website and click on the new event ideas link on the Meetings and Events page to complete a proposal form.

**REGISTER**
for programmes, prices and event codes by submitting a registration form. This can be found when clicking on individual event pages on our website.

www.rcoa.ac.uk/events
11 November 2008 (code: C43)  
**RESEARCH METHODOLOGY WORKSHOP**  
A joint workshop with the BJA  
The Royal College of Anaesthetists, London  
Registration fee: £125  
(limited spaces)

17 November 2008 (code: A12)  
**INTRODUCTION TO TEACHING**  
The Royal College of Anaesthetists, London  
Registration fee: £190  
(£125 for registered trainees)  
See page 2618 for details

19 November 2008 (code: C65)  
**AIRWAY WORKSHOP**  
The Royal College of Anaesthetists, London  
Registration fee: £230  
(£175 for registered trainees)

20–21 November 2008 (code: C22)  
**SCOTTISH WINTER MEETING – ABERDEEN**  
A joint meeting with the Scottish Society of Anaesthetists  
Mercure Ardoe House Hotel, Aberdeen  
Registration fee: £250 (two days)  
Registration fee: £150 (one day)  
(£75 per day for registered trainees)  
See page 2622 for details

26–28 November 2008 (code: C11)  
**CURRENT TOPICS – YORK**  
The Yorkshire Museum, York  
Registration fee: £430 (three days)  
Wednesday, 26 November: £160  
Thursday, 27 November: £155  
Friday, 28 November: £150  
See page 2622 for details

1–2 December 2008 (code: C80)  
**TEACHING METHODS WORKSHOP**  
The Royal College of Anaesthetists, London  
Registration fee: £365  
(£310 for registered trainees)  
See page 2620 for details

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**JANUARY**

8 January 2009 (code: D36)  
**SIMULATION TRAINING IN ANAESTHESIA AND CRITICAL CARE**  
The Royal College of Anaesthetists, London  
Registration fee: £260

9 January 2009 (code: A71)  
**SIMULATION TRAINING IN ANAESTHESIA AND CRITICAL CARE**  
The Royal College of Anaesthetists, London  
Registration fee: £260

22 January 2009 (code: C73)  
**AIRWAY WORKSHOP – EDINBURGH**  
Holyrood MacDonald Hotel, Edinburgh  
Registration fee: £230  
(£175 for registered trainees)

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**FEBRUARY**

4 February 2009 (code: B53)  
**AIRWAY WORKSHOP**  
The Royal College of Anaesthetists, London  
Registration fee: £230  
(£175 for registered trainees)

5 February 2009 (code: D31)  
**CORE TOPICS DAY – BATH**  
Venue in Bath to be confirmed  
Registration fee: £230  
(£175 for registered trainees)  
Please register for details on our website

5–6 February 2009 (code: C67)  
**CHILDREN IN THE DISTRICT HOSPITAL – ESSENTIAL KNOWLEDGE**  
The Royal College of Anaesthetists, London  
This meeting is for consultant and senior trainee anaesthetists and surgeons who work together as a team in the District Hospital. The meeting will use lectures, discussion groups and workshops to address essential knowledge such as standards of care, child protection and consent, also the management of common conditions in childhood and the immediate management of the critically ill child.  
Registration fee: £390  
(£275 for registered trainees)

16–27 February 2009 (code: A82)  
**FINAL FRCA COURSE**  
The Royal College of Anaesthetists, London  
Registration fee: £560  
See page 2619 for details

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**INTRODUCTION TO TEACHING**

17 November 2008 (code: A12)  
The Royal College of Anaesthetists, London  
Registration fee: £190 (£125 for registered trainees)  
APPROVED FOR 5 CPD POINTS

A one day meeting for consultants, SAS grades and SpRs. The meeting allows those considering a career in training to gain an insight into the skills needed, with the advice given by highly experienced faculty. Topics to be covered:

- Introduction to teaching adults
- Teaching for small groups and tutorials
- Teaching and assessing in theatre
- Teaching practical skills
- Educational supervisors
- How to give a lecture
- Using PowerPoint effectively
The lectures run throughout the day, Monday to Friday and will be delivered by experienced lecturers and examiners.

Participants will be entitled to attend four tutorials. These will run in the first week of the course from 4.15 pm to 5.45 pm.

The programme covers various subjects and will include topics such as:

- Applied pharmacology in anaesthesia
- Management of trauma
- Respiratory failure and ventilatory support
- Paediatric Anaesthesia
- Thoracic anaesthesia
- Difficult airway

**FINAL FRCA COURSE**

8–19 September 2008 (code: A79)
16–27 February 2008 (code: A82)
The Royal College of Anaesthetists, London

Registration fee: £560
**APPROVED FOR 15 CPD POINTS**

**CORE TOPICS DAY – BELFAST**

24 September 2008 (code: C97)
Waterfront Hall, Belfast

Registration fee: £145 (£105 for registered trainees)
**APPROVED FOR 5 CPD POINTS**

- Fatigue in anaesthetists
  Professor C Dodds, Middlesbrough
- Coronary stents, antiplatelet agents and the surgical patient
  Dr L Kevin, Galway
- Current and emerging pharmacological treatments for acute lung injury
  Dr D McAuley, Belfast
- Management of severe sepsis – four years on
  Dr A McCluskey, Stockport
- Recent advances in simulation technology – what can dummies teach us?
  Dr J Murray, Belfast
- Regional anaesthesia – is it better for our patients?
  Dr D Breslin, Dublin
- Magnesium – the Once and Future Ion
  Professor M James, South Africa

**CONCLUDING REMARKS**
Dr J McAdoo, President, College of Anaesthetists RCSI

**AIRWAY WORKSHOP – GLASGOW**

31 October 2008 (Code C40)
University of Glasgow

Registration fee: £230 (£175 for registered trainees)
**APPROVED FOR 5 CPD POINTS**

With a focus on clinical scenario, group discussion and hands-on skill practice. The airway workshop will cover a number of topics using experienced small group teachers.

**A CAREER IN ANAESTHESIA**

4 November 2008 (Code C49)
The Royal College of Anaesthetists, London

Registration fee: £20
**APPROVED FOR 2 CPD POINTS**

The Royal College of Anaesthetists are holding two informal sessions for Foundation Year Two Trainees who are considering a career in anaesthesia. The day is not intended to provide personal career guidance, but instead will focus on the general aspects of the specialty. Trainees are invited to the College (Churchill House) on 4 November to attend either a morning (10.00–12.30) or afternoon session (14.00–16.30). The day will provide an insight into life as a trainee and consultant anaesthetist. There will also be plenty of time for questions. Topics will include:

- Why I became an anaesthetist
- Selection, assessment and supervision of training
- Real life as an anaesthetist – training and what we do
- Training, examinations, travel and the difficulties we may face
- The future in the specialty

**A JOINT MEETING WITH THE RCSi**

**A CAREER  IN ANAESTHESIA**

4 November 2008 (Code C49)
The Royal College of Anaesthetists, London

Registration fee: £20
**APPROVED FOR 2 CPD POINTS**
Events programme

**FLUID MANAGEMENT**

**CORE TOPIC DAY**

25 September 2008 (code: C63)
The Royal College of Anaesthetists, London

Registration fee: £230 (£175 for registered trainees)

**APPROVED FOR 5 CPD POINTS**

- Anti Coagulation and surgery
  - Dr B Hunt, London
- Managing perioperative bleeding
  - Dr F Matthey, London
- Indications for and monitoring of red cell transfusion
  - Dr M Grover, Middlesex
- Pre-op assessment for major surgery
  - Dr M Hamilton, London
- Fluids and neurosurgery
  - Dr B Riley, Nottingham
- Fluids and major trauma
  - Dr I Nesbitt, Newcastle
- Peri–operative monitoring of the surgical patient
  - Dr T Wigmore, London
- Wet or dry in ITU
  - Dr M Kuper, London
- Acidosis and fluids
  - Dr J Handy, London
- Oxygen, how valuable is it?
  - Dr A Vercueil, London

**CORE TOPICS DAY**

30 September 2008 (code: C79)
The Royal College of Anaesthetists, London

Registration fee: £175 (£150 for registered trainees)

**APPROVED FOR 5 CPD POINTS**

The concept of the Core Topics Day is based on the need for a list of topics that would be sufficient to ensure a core knowledge base for all qualified anaesthetists. The knowledge contained within the Core Topics programme would allow any anaesthetist to manage a typical range of clinical situations that could be encountered undertaking emergency cover for a hospital.

- Risk evaluation for major surgery
  - Dr J Down, London
- Newer methods of drug delivery
  - Dr J Hall, Cardiff
- Managing post-operative pain in children
  - Dr M Tremlett, Middlesbrough
- Subarachnoid haemorrhage and implications for anaesthetists
  - Professor A Cunningham, Dublin
- Neuromuscular block and monitoring
  - Dr K McCourt, Belfast
- Managing obese obstetric patients
  - Dr M Dresner, Leeds

**FACULTY OF PAIN MEDICINE – STUDY DAY FOR ADVANCED TRAINEES IN PAIN MEDICINE**

16 October 2008 (code: A78)
The Royal College of Anaesthetists, London

Registration fee: £95

**APPROVED FOR 5 CPD POINTS**

This course is intended for trainees who are currently undertaking or who intend to undertake advanced training in pain medicine. Topics covered will include pain management services in the NHS, medico-legal issues in pain, chronic pain in children and an analysis of the consultation for pain patients.

- Pain Services in the NHS
  - Dr K Milligan, Middlesbrough
- Medico-Legal Issues in Pain
  - Lecturer to be confirmed
- Chronic Pain in Children
  - Dr J Goddard, Sheffield

Course organisers: Dr D M Justins and Professor D J Rowbotham

**TEACHING METHODS WORKSHOP**

22–23 September 2008 (code: A37)
1–2 December 2008 (code: C80)
The Royal College of Anaesthetists, London

Registration fee: £365 (£310 for registered trainees)

**APPROVED FOR 10 CPD POINTS**

An intensive two day workshop for all grades of anaesthetists, about the teaching techniques that are useful for anaesthetists who plan and participate in education programmes for medical students, anaesthetic trainees and consultants.

- Basic principles of education
- Workplace based teaching
- Teaching practical skills
- Non technical skills
- Assessment of professionals
- Giving feedback
- Small group teaching
- Preparing and delivering a lecture
- Making effective use of AV aids
- Discussions/breakout group work sessions

www.rcoa.ac.uk/events
**CME DAY**

8 November 2008 (code: A76)
The Royal College of Anaesthetists, London

Registration fee: £210

**APPROVED FOR 5 CPD POINTS**

<table>
<thead>
<tr>
<th>LECTURE THEATRE</th>
<th>REGISTRATION</th>
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<tr>
<td>0900–0930</td>
<td>CHAIR: DR D BOGD</td>
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<tr>
<td>0930–1015</td>
<td>CHAIR: PROFESSOR C KUMAR</td>
</tr>
<tr>
<td>1020–1105</td>
<td>CHAIR: DR V BYTHELL</td>
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| 1105–1130        | CHAIR: TO BE CONFIRMED |

| 1130–1215        | CHAIR: DR T CLUTTON-BROCK |
| 1220–1305        | CHAIR: PROFESSOR P HUTTON |
| 1305–1400        | CHAIR: PROFESSOR J R SNEYD |
| 1400–1445        | CHAIRMAN: DR T CLUTTON-BROCK |
| 1450–1535        | CHAIR: PROFESSOR P HUTTON |

| 1535             | TEA AND DEPART |

**ANNIVERSARY MEETING**

**OBSTETRIC ANAESTHESIA – CURRENT CHALLENGES**

18–19 March 2009 (code: A03) Royal Institute of British Architects, London

Registration fee: £390 (£275 for registered trainees)

**APPROVED FOR 10 CPD POINTS**

**Session 1: Topical issues**
- The big issue of obesity in obstetrics
- Are epidurals more or less dangerous in obstetrics than general anaesthetic practice?
- Where we are with foetal surgery

**FREDERIC HEWITT LECTURE**
**ANNUAL GENERAL MEETING**
- Investigating a maternal death
- Mini-play: A real life approach and discussion
- Is the Confidential Enquiry into Maternal Deaths worthwhile?

**Session 2: Haemorrhage and other matters**
- Update from UKOSS
- Recombinant Factor VII: an update

**Session 3: When women get sick**
- Early warning scores and outreach
- Why have an HDU on the delivery suite?

**Session 4: Looking back and looking forward**
- Tales from an obstetrician
- How do we staff obstetric units?

Drinks reception for all participants
## CURRENT TOPICS MEETING – YORK

### 26–28 November 2008 (code: C11) Yorkshire Museum, York

Registration fee: £430 (three days), 26 November: £160, 27 November: £155, 28 November £150

**APPROVED FOR 15 CPD POINTS**

### 26 NOVEMBER
- **RCOA matters**
  - Professor C Dodds, Middlesbrough
- **Nitrous oxide – anyone still laughing?**
  - Professor P Hopkins, Leeds
- **Enhanced recovery from colo-rectal surgery**
  - Dr C Snowden, Newcastle
- **Ultrasound and the intensivist**
  - Dr A Bodenham, Leeds
- **Trauma resuscitation**
  - Dr R Pearse, London
- **Ultrasound and the upper limb**
  - Dr A Wilson, Leeds
- **Intensive care – who benefits?**
  - Dr S Ridley, Llandudno

### 27 NOVEMBER
- **Local Anaesthetics: potencies, probabilities and possibilities**
  - Dr M Columb, Manchester
- **Challenges in acute pain relief**
  - Dr T Madej, York
- **Management of phaeochromocytoma**
  - Professor C Reilly, Sheffield
- **Peri-operative beta-blockade and statin therapy**
  - Dr J Mullenheim, Middlesbrough
- **Stabilisation of the critically ill child**
  - Dr M Darowski, Leeds
- **Peri-operative fluid therapy**
  - Professor M Mythen, London
- **Recent advances in anaesthesia for vascular surgery**
  - Dr S Howell, Leeds

### 28 NOVEMBER
- **Anaesthesia, outcomes and the GMC**
  - Dr I Woods, York
- **Awareness in anaesthesia**
  - Dr I Russell, Hull
- **Day surgery anaesthesia**
  - Dr I Jackson, York
- **Pre-operative cardiac interventions**
  - Professor P Foëx, Oxford
- **CPX testing**
  - Dr J Wilson, York
- **The obese patient**
  - Lecturer to be confirmed
- **Obstetrics – managing major haemorrhage**
  - Dr A Vipond, York

## SCOTTISH WINTER MEETING 2008

### 20–21 November 2008 (code: C22)
The Mercure Ardoe House Hotel and Spa, Aberdeen

Registration fee: £250 (two days), £150 (one day) **APPROVED FOR 5 CPD POINTS**

### 20 NOVEMBER
- **Scottish patient safety project: where are we now?**
  - Dr H Burns, Glasgow
- **Patient safety research**
  - Dr T Reader, Aberdeen
- **What every anaesthetist should know about:**
  - (i) The dialysis dependent patient on their list
    - Dr C Brunton, Aberdeen
  - (ii) The post operative use of non conventional analgesics
    - Dr B Stickle, Aberdeen
  - (iii) When to wriggle their TOE’s in theatre
    - Dr A Ronald, Aberdeen

**DEBATES:**
- Elective patients should be extubated awake
  - Dr H McFarlane, Aberdeen/ Speaker to be confirmed
- Anaesthetists should be part of the cardiac arrest team
  - Dr E Jack, Stirling/Dr B Randalls, Aberdeen
- Gillies Memorial Lecture
  - Dr B Cowan, Glasgow

### 21 NOVEMBER
- **Setting up a project**
  - Professor A Chambers, Aberdeen
- **Searching the literature**
  - Professor N Webster, Aberdeen
- **Chronic heart failure**
  - Dr A Hannah, Aberdeen
- **Obstructive lung disease**
  - Dr G Christie, Aberdeen
- **General anaesthesia for caesarean section – current controversies**
  - Dr D Levy, Nottingham
- **Anaesthesia for hip and knee arthroplasty**
  - Dr M Checketts, Dundee
- **Nerve damage in regional anaesthesia**
  - Dr W Harrop-Griffiths, London

The Scottish Society of Anaesthetists will be hosting a dinner to be held on Thursday, 20 November (at a cost of £50 per head). Places for the dinner are limited therefore early booking is recommended. For further details please contact Dr A Harvey, Consultant Anaesthetist, Aberdeen Royal Infirmary (email: amr.harvey@nhs.net).
Session 1: Pharmacological approaches to organ protection
Chair: Dr J-P van Besouw
- Xenon and cerebral protection
  Professor M Maze, London
- Myocardial ischaemia/reperfusion injury
  Professor W Schlack, Amsterdam
- Statins for all – the new premed?
  Professor C Reilly, Sheffield

Session 2: Pharmacology in intensive care
Chair: Dr P Nightingale
- New approaches to sedation in ICU
  Dr G Park, Cambridge
- Immunological therapies in critical care
  Professor N R Webster, Aberdeen
- Pharmacological optimisation of tissue perfusion
  Professor M Singer, London

Session 3: Neuromuscular blockade
Chair: Professor R K Mirakhur
- Advances in neuromuscular transmission
  Professor L Eriksson, Stockholm
- A new approach to reversal
  Professor J M Hunter, Liverpool

Drinks reception for all participants

Session 4: Pharmacology in the bioinformatics era
Chair: To be confirmed
- Pharmacogenomic variability
  Professor P Hopkins, Leeds
- What makes a molecule an anaesthetic?
  Professor J Sear, Oxford

Session 5: New methods of drug delivery
Chair: Professor D Rowbotham
- Iontophoresis and transdermal preparations
  Professor I Power, Edinburgh
- Developments in drug infusion technology
  Professor T Absalom, Cambridge

Session 6: The Rank Lecture
Chair: Dr J Hulf
- Models of drug behaviour
  Dr S Shafer, California, USA
- Presentation of The Jubilee Medal and The Humphry Davy Award

Session 7: Postoperative nausea and vomiting
Chair: Professor P Hopkins
- Neurokinin-1 antagonists
  Dr P Diemunsch, Strasbourg
- Antiemetic combinations
  Professor D J Rowbotham, Leicester
Our events are open to all grades of anaesthetists, unless specifically stated otherwise. When an event is full, this will be publicised on the website. To be put on a waiting list, please contact the Events Department on 020 7092 1670. We will then contact you as soon as a place becomes available.

All of our events have CPD approval of five points for a full day and three points for a half day, with the exception of FRCA revision courses, which carry a maximum of 15 points, for non-trainees only.

Lunch is included in the registration fee unless otherwise indicated.

This generic application form is to be used for all events. Further copies of the form are available from the College website.

Booking and payment

- Bookings will be accepted on a first come first served basis.
- Bookings will not be accepted unless the appropriate fee and application form are received together. Please also ensure that the application form shows the event code, title and date.
- Please note that places are not reserved until payment is received.
- Confirmation of a place will be sent to you within 14 days of payment being received. If you do not receive this, please contact the Events Department.

Cancellation policy

- Notice of cancellation must be given in writing to the Events Department or by email to: events@rcoa.ac.uk at least ten working days prior to the event to qualify for a refund.
- All refunds are made at the discretion of the College and are subject to the deduction of an administration fee.
- Delegates cancelling less than ten days before the event will not be entitled to a refund.
- The College will accept name changes for attendees, please inform the Events Department at least seven days prior to the event.

How did you hear about this event?

- Our events are open to all grades of anaesthetists, unless specifically stated otherwise.
- When an event is full, this will be publicised on the website. To be put on a waiting list, please contact the Events Department on 020 7092 1670. We will then contact you as soon as a place becomes available.
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**Payment details**

- By cheque. A cheque for £ is enclosed (Sterling cheques should be made payable to ‘The Royal College of Anaesthetists’).
- By credit/debit card. Please debit my card by £ (tick appropriate box): [ ]
- Card number: [ ]
- Valid from: [ ]
- Expiry Date: [ ]
- Issue number (if applicable): [ ]
- Security Code: [ ]

Please ensure you complete your full postal address.

**Your details**

Full name: [ ]

College Reference Number (CRN): [ ]

GMC Number: [ ]

Postcode: [ ]

Telephone: [ ]

Fax: [ ]

Email: [ ]

This address is (tick one only): [ ] Temporary [ ] Permanent

Date of Birth: [ ]

Present appointment and hospital: [ ]

**Event details**

Date: [ ]

Event Title: [ ]

Registration fee: £ [ ]

Code: [ ]

How did you hear about this event?

Please use BLOCK CAPITALS.

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Advancing patient safety

‘Patient safety’ has become a policy priority in the UK. Following the principles of Human Factors, patient safety includes the implementation of proactive error management systems that can ‘learn’ about the threats to safety, matched by practices to ‘understand’ their underlying causes. In the UK, this has involved the creation of the National Patient Safety Agency (NPSA) and the introduction of the National Reporting and Learning System (NRLS) throughout the National Health Service (NHS) in England and Wales. This system requires all healthcare providers to establish incident reporting procedures to enable local organisational learning and also to inform national learning.

Anaesthesia has developed over the years to become a very safe specialty, but adverse and ‘near miss’ incidents still occur, and these often involve human factors. Anaesthesia needs to continue its proud record and work towards improved systems for patient safety by learning from these adverse events. In 2007 the NPSA announced a programme of work to improve safety in anaesthetic services. The agency has embarked on four collaborative projects with differing Royal Colleges to improve patient safety in the relevant specialties. ‘Anaesthesia: Improvement through Partnership’ is a collaborative two-year project led by the Royal College of Anaesthetists (RCoA) with the support of the National Patient Safety Agency (NPSA). The project is overseen by an Expert Consultative Group which includes representatives from the RCoA, Association of Anaesthetists of Great Britain and Ireland (AAGBI), the Association for Perioperative Practice (AfPP) and the College of Operating Department Practitioners (CODP). This group has developed the safety themes for the two year collaborative project.

The Expert Consultative Group decided on the following work streams:

- developing a specialty based reporting system to improve critical incident reporting by providing a single point of entry for data submission
- patient safety incidents arising from errors during the administration of injectable drugs
- the management of throat packs and in particular their retention following surgery.

**Specialty-specific incident reporting**

For several years the RCoA has been very interested in developing a national critical incident reporting system which allows for shared
learning in anaesthesia based on completion of standardised critical incident report forms. The RCoA issued guidance and templates for critical incident reporting in the anaesthesia environment in 2001; this was designed for local hospital use. To date, although some local reporting is taking place, the opportunity has not been available for this to develop fully into a national repository for safety information. Recently, the RCoA and AAGBI have expressed interest in developing a reporting system, to improve patient safety in anaesthesia, which integrates the information required by anaesthetists with the NRLS and allows the RCoA and AAGBI access to the data to enable expert analysis and subsequent dissemination of patient safety advice to the specialty.

This initiative now provides the NPSA with the opportunity to meet the requirements of the RCoA and AAGBI and also to develop a template for specialty-based reporting which may be transferable to other specialties. The system development has included the following key principles:

- user friendly
- specialty-specific
- sensitive to the confidentiality of the reporter
- complimentary to the local reporting systems of the trusts
- responsive, i.e. each reported incident should generate an appropriate response to improve patient safety.

If the piloting of this initiative proves successful then patient safety will be enhanced by:

- allowing the RCoA and the AAGBI to provide rapid feedback on previously unknown incidents
- providing reminders on severe incidents that occur rarely but are known
- permitting peer comparison through benchmarking
- learning from near misses
- engaging anaesthetists in reporting patient safety incidents.

**IV medication errors**

Several published surveys have suggested that most practising anaesthetists have experienced at least one drug error. The Expert Consultative Group decided that before making firm recommendations on how to prevent drug errors during anaesthesia, workplace evaluations will take place regarding two different methods proposed to reduce drug errors.

**Second-person double checking**

Second-person double checking is an established method of minimising errors during blood transfusion. An editorial in *Anaesthesia* supported the use of double-checking during anaesthetic practice. The objectives of the workplace evaluations will be:

1. Will this practice be accepted by anaesthetists and other allied professionals?
2. What may be the practical and/or cultural challenges or barriers in its introduction?

**Electronic double checking using bar-code methodology**

In New Zealand, Merry has developed a new drug administration and documentation system designed to reduce drug administration errors during anaesthesia. The system utilises bar-coding technology to provide double checking prior to drug administration. Its effectiveness has been demonstrated outside the UK. Workplace evaluation will be used to determine:

1. Can this system be introduced successfully into NHS hospitals?
2. What may be the practical and/or cultural challenges or barriers with introducing this practice?

The results and recommendations from the above projects will be widely publicised. Further patient safety projects will be developed by the Expert Consultative Group over the two-year period; any suggestions would be welcomed by the Group and can be made via the AAGBI, RCoA or NPSA.

**References**

In this article I will take the opportunity to review the historical beginnings of NCEPOD, describe its objectives and modus operandi, discuss some of the recommendations that have changed practice and look into what the future holds for the organisation.

NCEPOD’s remit
Following publication of ‘A Confidential Enquiry into Perioperative Deaths’ in 1987, NCEPOD was established to examine the quality of the delivery of care for surgical and anaesthetic patients. At that time there was considerable opposition to such an enquiry by many of the medical profession but, following the adage that ‘surgery, like cricket, is only interesting if you keep the score’, it was eventually accepted and even championed by its former critics.

The original aims of NCEPOD were to undertake independent reviews of clinical practice and identify remediable factors in the practice of anaesthesia and surgery. The Enquiry has always considered the quality of the delivery of care and not specifically causation of death. NCEPOD unashamedly uses a qualitative peer review process to review the multitude of processes involved in healthcare. In April 2002, NCEPOD extended its remit to include medical patients and near misses, with a change of name to the ‘National Confidential Enquiry into Patient Outcome and Death’.

The organisation is independent, and is governed by a board of trustees and a wider steering group with representation from relevant medical Royal Colleges, specialist associations and patient groups. Clinical input is provided by clinical co-ordinators who are practising consultants seconded from their NHS hospital trusts. Study topics are selected from submissions by healthcare individuals and professional healthcare organisations, and, once selected, an expert group of healthcare professions is formed to...
establish specific aims and objectives. Questionnaires are disseminated using a network of trust NCEPOD local reporters, and, appreciating that completion of the questionnaires is time consuming for clinicians, NCEPOD limits where possible the number of questionnaires that each clinician needs to complete. We also encourage clinicians to keep a record of this activity in their appraisal portfolio as evidence of continuous professional development. However, it must be remembered that participation in NCEPOD studies is a mandatory requirement for trusts and clinicians under NHS guidance and General Medical Council (GMC) rules.\textsuperscript{2,3}

The original aims of NCEPOD were to undertake independent reviews of clinical practice and identify remediable factors in the practice of anaesthesia and surgery.

also encourage clinicians to keep a record of this activity in their appraisal portfolio as evidence of continuous professional development. However, it must be remembered that participation in NCEPOD studies is a mandatory requirement for trusts and clinicians under NHS guidance and General Medical Council (GMC) rules.\textsuperscript{2,3}

The questionnaires and relevant casenotes are returned to NCEPOD for analysis. These documents are painstakingly anonymised to remove patient, clinician and hospital identifiers and then confidentially peer reviewed by an advisory group of multidisciplinary healthcare professionals who reflect the clinical specialty mix for each study. Invariably, themes emerge from the advisors’ meetings which form part of the qualitative analysis. NCEPOD has been much criticised over the years for an ‘unscientific’ approach to its reports, and the lack of the use of denominators or statistics has led some commentators to diminish the value of the findings. However, medicine is a complex system which cannot be described by quantitative analysis alone.

NCEPOD reports and recommendations

Over the last 20 years, NCEPOD has published in excess of 20 reports looking at various aspects of clinical care. These have included children’s surgery, surgery in the over 90s, surgery that has resulted in death within the first three days of the post-operative period, medical admissions into intensive care and specific procedures such as therapeutic endoscopy and surgical repair of abdominal aortic aneurysms. More recently, reviews of the quality of coronial autopsy reports, emergency admissions to hospital, care of seriously injured patients, deaths from sickle cell disease and thalassaemia and first time coronary artery bypass grafting have been conducted. The latter four reports have been launched in the last ten months which have been a highly productive period for NCEPOD.

Many recommendations have been made by NCEPOD, several of which have shaped the way we practise healthcare in the UK (Table 1). The recommendation that has been mostly widely accepted is that ‘the availability of staffed emergency operating theatres on a 24-hour basis is essential’ (1993). In many hospitals this has been achieved by the introduction of ‘NCEPOD lists’. Furthermore, the recommendation that ‘only emergency and urgent cases should be performed out of hours’ (1990) is probably the most quoted and the most misquoted. It is often thought that NCEPOD says that ‘there should be no operating at night’. It must be remembered that consultants have ultimate responsibility for all cases undertaken out-of-hours and may be required to attend; the majority do not work in shifts and will frequently have an active clinical day following a night on-call. Thus, it would be unacceptable for hospitals to undertake elective out-of-hours surgery unless all the necessary facilities and staff are available, including fully rested supervising consultant trainers. Despite increasing pressure to undertake elective activity out-of-hours, NCEPOD still stands by this recommendation.

More recently, NCEPOD’s attention has been drawn to medical care and has recommended the introduction of robust ‘track and trigger’ systems to monitor and review patients. Both the National Patient Safety Agency (NPSA) and the National Institute for Health and Clinical Excellence (NICE) have subsequently produced guidelines based on NCEPOD’s recommendations.\textsuperscript{4,5}

The dissemination of NCEPOD recommendations is aimed to capture the widest possible audience. Each report is launched at a conference with active media engagement and key healthcare professionals receive copies of the reports, with paper and electronic copies available via the NCEPOD website. A self-assessment checklist, that can be used by hospitals to assess whether they comply with the recommendations, is also provided. NCEPOD has links to many healthcare organisations – including the NPSA, NICE, the GMC and the Healthcare Commission – and NCEPOD has a reputation for authority and weight to persuade...
individuals and organisations to change how they deliver healthcare.

The future of NCEPOD
So what does the future hold for NCEPOD? While NCEPOD holds an unique position in qualitative investigation and has much to celebrate for the achievements of the last 20 years, there are still many challenges ahead for the organisation as it extends its investigations into the wider healthcare environment. Attracting, and then keeping, the attention of clinicians, nurses, hospital managers and those responsible for strategic planning of healthcare is a challenge. However, the appetite for qualitative analysis using peer review is as powerful as ever, and NCEPOD has many studies underway. The next report launch will be in November and is a study of deaths following systemic anti-cancer therapy.

Other studies underway include deaths within four days of admission to hospital, peri-operative deaths in the elderly, deaths from acute kidney injury, morbidity associated with parenteral nutrition and complications from cosmetic surgery. The first two of these will actively engage with all anaesthetists and will provide an opportunity to identify any changes in practice from earlier NCEPOD studies, hence closing the audit loop. So watch out – there may be an NCEPOD anaesthetic questionnaire heading your way soon!

References
3 Section 14 (g) Good Medical Practice, GMC, 2006.

<table>
<thead>
<tr>
<th>Year</th>
<th>Recommendation</th>
</tr>
</thead>
<tbody>
<tr>
<td>1989</td>
<td>Local audit meetings are essential to good clinical practice and all consultants should participate. Surgeons and anaesthetists should not undertake occasional paediatric practice.</td>
</tr>
<tr>
<td>1991</td>
<td>Surgeons, gynaecologists and anaesthetists must have immediate access to essential services (recovery rooms, high dependency and intensive care units) if their patients are to survive. The previous reports have emphasised the need to have emergency operating and recovery rooms available 24 hours a day. Only emergency and urgent cases should be performed out-of-hours.</td>
</tr>
<tr>
<td>1992</td>
<td>Practitioners must recognise their own limitations and not hesitate to consult a more appropriate colleague when managing conditions outside their immediate expertise. The skills of the surgeon and anaesthetist should always be appropriate for the physiological and pathological status of the patient.</td>
</tr>
<tr>
<td>1993</td>
<td>Consultation, collaboration and teamwork between anaesthetists, surgeons and physicians should be encouraged and should be the usual practice.</td>
</tr>
<tr>
<td>2004</td>
<td>Clear protocols for the administration of sedation should be available and implemented. All those responsible for the administration of sedation should have received formal training (‘Scoping our practice’).</td>
</tr>
<tr>
<td>2005</td>
<td>Training must be provided for junior doctors in the recognition of critical illness and the immediate management of fluid and oxygen therapy in these patients (‘An acute problem?’).</td>
</tr>
<tr>
<td>2006</td>
<td>There should be nationally uniform criteria and standards for investigation of reported deaths. This includes the diagnostic level of investigation at autopsy and the definition of what a postmortem examination comprises (‘The coroner’s autopsy: do we deserve better?’).</td>
</tr>
<tr>
<td>2007</td>
<td>Patients admitted as an emergency should be seen by a consultant at the earliest opportunity. Ideally, this should be within 12 hours and should not be longer than 24 hours. Compliance with this standard will inevitably vary with case complexity. Hospitals which admit patients as an emergency must have access to both conventional radiology and CT scanning 24 hours a day, with immediate reporting (‘Emergency admissions: a journey in the right direction?’). Airway management in trauma patients is often challenging. The pre-hospital response for these patients should include someone with the skill to secure the airway (including the use of rapid sequence intubation), and maintain adequate ventilation. Trusts should ensure that a trauma team is available 24 hours a day, seven days a week. This is an essential part of an organised trauma response system (‘Trauma: who cares?’).</td>
</tr>
</tbody>
</table>
Why?
Airway management is a cornerstone of safe anaesthetic practice. Major complications occur infrequently but when they do their impact is devastating. Their incidence is unknown in the UK. The opportunity to learn from a detailed analysis of a cohort of such cases has never existed before.

What and when?
The 4th National Audit Project (NAP4) is an ambitious project being conducted jointly by the Royal College of Anaesthetists (RCoA) and the Difficult Airway Society (DAS) in co-operation with the National Patient Safety Agency (NPSA) with the aim of discovering the incidence of serious airway complications and examining each reported case for common themes and learning points.

This project closely follows, and, we hope, builds on, the model used for the successful NAP3 audit of central neuraxial blockade which is due to be reported in November of this year.

Starting on 1 September 2008 and running for one year, this audit will determine the incidence of major complications of airway management in the UK. To achieve this it will be necessary to undertake a snapshot of current airway management practice, providing the denominator, followed by a year-long data collection of major complications to provide a numerator.

There is good evidence that major complications of airway management are not restricted to routine anaesthesia and that many of the most difficult airway challenges occur in the emergency department (ED) and the intensive care unit (ICU).

This is a collaborative audit with the College of Emergency Medicine (CEM) and the Intensive Care Society (ICS), and all major complications of airway management (whether cared for by anaesthetists or other specialties) that occur in theatres, the ED and ICU should be reported to NAP4.

Whilst most reports will be from anaesthetists directly involved with management of these cases, reports are welcomed from intensivists, emergency physicians, operating department practitioners, anaesthesia nurses and surgeons. We are in contact with the professional organisations of these groups to seek their support with this project. Other cases may be identified by contact with NPSA or NHS Litigation Authority.

What is included?
We are interested in the complications of airway management in NHS hospitals and the main focus will remain anaesthesia. However, the project includes complications in both adults and children and complications arising during treatment by anaesthetists, emergency physicians and intensive care doctors.

This project is designed to collect data on the following major complications of airway management only

- Death.
- Brain damage.
- Emergency surgical airway or needle cricothyroidotomy.
- Unanticipated ICU admission: only

The 4th National Audit Project
Major Complications of Airway Management in the United Kingdom
where the complications of airway management are the cause of admission or lead to an adverse outcome.

In order for the project to be achievable we need to focus only on those cases with a poor outcome clearly identified as caused by difficult airway management.

Therefore we do not wish to be informed of the following cases:

- Cases admitted to HDU.
- Cases which would have been admitted to ICU even without airway management difficulty, unless the airway management difficulty resulted in significant adverse outcome.
- Difficult airway management, no matter how difficult, without adverse patient outcome (though we do wish to collect all cases of emergency surgical airway/needle cricothyroidotomy).

We estimate that approximately 100–200 cases (less than one per hospital) may be identified in one year. The project will be co-ordinated centrally, and supported locally by a network of local reporters (LRs) who will gather event details once a case has been reported. At the time of writing over 97% of UK hospitals have an agreed LR in post. As the project progresses we anticipate the LR will be supported by additional reporters in ICU and the ED.

We are aware that clinicians engaged in this process may have suffered trauma from the incident they report. We anticipate a role for the LR in supporting those doctors involved in these cases; advice on sources of support will be provided as part of the project process.

How are data reported?
All cases should be reported by email to the project team at: tcook@rcoa.ac.uk. It will be possible for anyone to notify the RCoA of a case fitting the inclusion criteria shown above. The only information required will be the date and time of the event, the hospital where the complication occurred and the name and contact details of the person reporting. No patient identifiers should be sent. Where someone other than the anaesthetist reports the case, the anaesthetist involved should not be identified.

How are the data managed?
After notification of an event the RCoA project lead will liaise with the LR to confirm that an event fulfilling the inclusion criteria has occurred, after which the case will be added to the RCoA list of confirmed cases. The LR will be asked to co-ordinate uploading of the case details to a secure password-protected part of the DAS website. The data collection form is populated to give the audit team a clear picture of the events that took place. Questions are not posed to judge or to imply criticism, but to seek the information needed to determine themes and learning points arising from these challenging cases.

Access to this area of the website will require a unique username which will be sent to the LR by the RCoA after the event is confirmed. Before submitting data the LR will need to create a password. The combination of username and password will ensure that only the person entering data has access to entering or modifying them. The DAS project lead will be able to read the entered data and judge when more data are required; the RCoA lead will not.

When more data are required the DAS project lead will ask the RCoA to inform the LR that more data are required. When a report is complete the username will be destroyed and the link between the RCoA list of reported cases and data on the DAS website will be broken.

The RCoA will have access to the hospital location of every notified event, but no details on the DAS website: first because of the password and then because access for that username will be removed when the reporting process is complete. The DAS project lead will have access to the report on the DAS website but will have no access to information on the identity of hospital, patient or clinicians. No patient- or anaesthetist-identifying data will be requested, and will be removed if already entered.

What if I do not know whether to report a case?
Dr Ian Calder (nap4moderator@rcoa.ac.uk) will act as a moderator. His role will be to advise LRs and those completing forms if they are unsure about inclusion criteria or the data to be submitted. He will be independent both of the RCoA and DAS.

Reviewing the cases
The data reported will be reviewed in detail by a panel from DAS, the RCoA and specialist societies, to seek themes and learning points.

Reporting of results
A formal report of the project will be published by the RCoA and DAS in mid-2010.

This will include quantitative analysis (incidence calculations) and an analysis of cases identified. This will be in the form of clinical review seeking learning points and cross
specialty education. The findings will be sent to all those who have assisted in the project.

Approvals
The project process has been approved by the National Research Ethics Service and by the Department of Health (Patient Information Advisory Group). It is endorsed and supported by the Association of Paediatric Anaesthetists, Obstetric Anaesthetists Association, Association of Anaesthetists of Great Britain and Ireland, Intensive Care Society, Intensive Care National Audit and Research Centre, College of Emergency Physicians, College of Operating Department Practitioners, Association for Perioperative Practice, the Chief Medical Officers of England, Northern Ireland and Wales, and the medical defence organisations. Discussions are continuing with several other organisations.

Why is this study important?
We believe this is an important project. Reports of such events are often incomplete and the subject remains controversial even within the profession. At present we do not know the incidence of these major complications or whether patterns exist in causes or consequences. Local learning from these events would benefit from wider dissemination.

We hope this project will teach us much about both the scale and nature of this problem. It offers the chance to increase knowledge, make better risk:benefit assessments in patient care and enable more robust disclosure of risk to patients. Greater understanding will also directly improve patient safety.

The key to success of the project is universal involvement. Please discuss this project within your departments and liaise with your emergency and ICU colleagues. We are happy to discuss the many questions which are likely to arise.

Tim Cook
tcook@rcoa.ac.uk

Nick Woodall
nicholas.woodall@nnuh.nhs.uk

Co-Audit Leads,
4th National Audit Project (NAP4)

Appointment of Members, Associate Members and Associate Fellows
The College congratulates the following who have now been admitted accordingly:

May 2008
Member
Dr Ashish Govindrao Alurwar

Associate Member
Dr Luis Mendia

Associate Fellow
Dr Ronelle Mouton

Affiliate – Physicians’ Assistant
Mr Paul Forsythe

June 2008
Members
Dr Sofia Amiruddin
Dr Piya Dhar
Dr Konstantinos Ioannou Patris
Dr Chandrasekaran Subramanian
Dr Anuradha Jayachandran
Dr Tendai Nicholas Ramhewa

Associate Fellow
Dr Mamdouh Haddara

Affiliates – Physicians’ Assistants
Mr Alexander Balynn
Mr Michael John Phillips
Ms Lisa Anne Churchill
Mr Lee Varney
Mr Richard Ormonde
Mrs Claire Joanne Cherie Bailey
How to maintain an anaesthetic logbook
Dr A McIndoe and Dr E Hammond, Co-authors of the RCoA PC/Macintosh Logbook (versions 1–7)

What are the options available to me?
Like it or not, all anaesthetic trainees are now expected to produce a case-based summary of training and supervision at each annual appraisal. Increasingly, consultants are also finding that the data gleaned from a logbook in conjunction with an accurate work diary provide the evidence needed to present a robust case for appropriate recognition of sessions at job planning appraisals. The problem is how should one best collect and analyse the data?

1 The paper-based logbook
This is certainly the simplest method of data collection. Those more senior in years will remember their College Tutor supplying them with a blue, bound, paper version of the College logbook on their first day as a novice SHO with instructions to enter the details of every case anaesthetised. This highly portable version of the logbook was and is extremely easy to use, taking no more than 30 seconds to complete a case entry.

<table>
<thead>
<tr>
<th>Strengths</th>
<th>Weaknesses</th>
</tr>
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<tbody>
<tr>
<td>Highly portable.</td>
<td>No reporting facilities.</td>
</tr>
<tr>
<td>Cheap – requires nothing more than a pen and</td>
<td>The cases are stored as a</td>
</tr>
<tr>
<td>paper!</td>
<td>simple uncollated list.</td>
</tr>
<tr>
<td>Requires no technical knowledge.</td>
<td>Easy to lose the original if</td>
</tr>
<tr>
<td>Easy to photocopy.</td>
<td>carried around every day.</td>
</tr>
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</table>

2 In-theatre hospital systems
This is the laziest and most uncontrolled method of maintaining a logbook and should really be considered only as a fallback option following irretrievable loss of a personal logbook. Unfortunately, hospital-based systems collect data in a variety of different ways primarily aimed at producing reports for the trust rather than the anaesthetist. ‘Data in equal data out’ in the sense that the quality of reports are dependent upon the accuracy of the information entered by the nurse in theatre. Frequently, there is no record of the detail of anaesthetic technique and it may be impossible to glean information later about the degree of supervision of the trainee in theatre. Sometimes Trusts may be reluctant to release data to anaesthetists in a form that is useful for appraisal purposes.

<table>
<thead>
<tr>
<th>Strengths</th>
<th>Weaknesses</th>
</tr>
</thead>
<tbody>
<tr>
<td>Somebody else enters the data on your behalf.</td>
<td>Somebody else enters the data on your behalf.</td>
</tr>
<tr>
<td>Uncontrolled format.</td>
<td>Uncontrolled format.</td>
</tr>
</tbody>
</table>

3 PC/Mac FileMaker Pro desktop/laptop logbooks
The Royal College of Anaesthetists desktop computer electronic logbook was first released in 1996. It was bound to a freeware or ‘runtime’ version of FileMaker Pro (a database application), which made it capable of operating on both PC and Macintosh computers. The original version was released at a time when Microsoft had just produced its first icon-based operating system (Windows 95) and access to the Internet was limited for

<table>
<thead>
<tr>
<th>Available logbooks</th>
<th>RCoA-approved?</th>
<th>Hardware costs</th>
<th>Software costs</th>
<th>Portable?</th>
<th>Reporting facility?</th>
<th>Data safe?</th>
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<td>Paper-based</td>
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<td>–</td>
<td>++</td>
<td>–</td>
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<tr>
<td>In-theatre hospital system</td>
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<td>–</td>
<td>–</td>
<td>–</td>
<td>–</td>
<td>?</td>
</tr>
<tr>
<td>PC (FileMaker Pro)</td>
<td>Yes</td>
<td>£££</td>
<td>–</td>
<td>+</td>
<td>+++</td>
<td>++</td>
</tr>
<tr>
<td>Mac (FileMaker Pro)</td>
<td>Yes</td>
<td>£££</td>
<td>–</td>
<td>+</td>
<td>+++</td>
<td>+++</td>
</tr>
<tr>
<td>PDA (Psion)</td>
<td>Yes</td>
<td>Not available</td>
<td>–</td>
<td>+++</td>
<td>+++</td>
<td>+</td>
</tr>
<tr>
<td>PDA (HanDBase)</td>
<td>Yes</td>
<td>£</td>
<td>++</td>
<td>+++</td>
<td>+++</td>
<td>+</td>
</tr>
<tr>
<td>Smartphone (HanDBase)</td>
<td>Yes</td>
<td>£</td>
<td>+++</td>
<td>+++</td>
<td>++</td>
<td>?</td>
</tr>
<tr>
<td>On-line logbook</td>
<td>No</td>
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<td>–</td>
<td>+++</td>
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<td>USB Memory stick (PC/Mac)</td>
<td>Yes</td>
<td>£</td>
<td>–</td>
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most to a 14.4Kb telephone modem! In 2003 the College Logbook Working Party distributed a second CD-ROM version of the logbook that matched the HanDBase PDA version, but most significantly the logbook portfolio of reports were set to match the format asked of trainees for Regional In-Training Assessments.

### Strengths
- Freeware.
- Wide range of customisable reports that match College requirements.
- Use of standardised picklists of terms makes reporting easier.

### Weaknesses
- Requires access to a PC or Macintosh computer.

#### 4 PDA-based (Personal Digital Assistant) logbooks
The first PDA that became commercially available was the Apple Newton; however, most will remember the Psion Organiser as the first to carry an Anaesthetic Logbook. In the mid-1990s SCATA (Society for Computing and Technology in Anaesthesia) produced a Psion logbook using a dataset proposed by Lack et al in the *BJA*. Unfortunately, the Psion Organiser is no longer available but in 2002 this successful model was translated and expanded into a HanDBase template, for use on Palm and Pocket PC PDAs, that remains in use to this day. The current version of HanDBase (v4) is available for some but not all smartphones and there have been problems due to small screen size and variations in the way that some devices synchronise with a desktop computer.

#### Strengths
- Highly portable.
- Use of standardised picklists of terms makes reporting easier.
- The information collected can be exchanged with other devices and programmes.

#### Weaknesses
- Cost – PDAs range from £100–400; the HanDBase database utility costs $30 (£15).
- Lifespan – the devices themselves tend to break down after two to three years use.
- Reliability – files stored in the machine’s memory are easily lost if the internal battery drains completely.
- Reporting facilities are fairly limited.
- Several smartphones are unable to run the logbook due to small screen size or variants in operating system.

#### 5 On-line or web-based logbooks
Surgeons have had access to on-line logbooks for several years. Trainees are not permitted to use alternatives and are required to pay for access to the facility. There are definite advantages for trainers who can easily monitor the progress of trainees but there are untested data protection issues involved in the transmission and storage of on-line data that may prove problematic in the future. In theory if the data are backed up on multiple servers then they are likely to be securely stored. In anaesthesia a number of trials have been undertaken, but most have fallen into abeyance. At the present time we know of only one active on-line anaesthetic logbook ([www.onlineanaesthesia.com](http://www.onlineanaesthesia.com)) although an on-line elogbook is planned as part of the eLearning Anaesthesia project.

#### Strengths
- Potentially free of charge to the user.
- Less reliance on the user to undertake essential housekeeping to prevent computer crashes.
- Cross-server backups possible.

#### Weaknesses
- Requires on-line access although this may also be achieved by mobile phone.
- Susceptible to bandwidth restrictions and slow access due to on-line ‘congestion’.
- Data protection?
- Charges for the use of the server on which data are stored.

#### 6 USB memory stick logbook
Whilst PDAs and laptop computers are still relatively expensive, the cost of solid-state memory sticks has fallen dramatically over the last five years. The PC/Mac logbook programme is a self-contained application that runs entirely from within a folder and does not actually require any components to be installed to the hard drive or system software of the host computer. It was always too big to be loaded to a 1.4Mb diskette but it will happily run from a USB memory stick with 20Mb of spare disk space. The logbook programme will load faster if the memory stick is plugged into a USB2 port (most likely found closest to the host computer motherboard) although it will perform satisfactorily via a USB1 port. Both the PC and Mac versions of the logbook work this way, but for those who ‘hot-desk’ between PC and Macintosh computers we have prepared a version of the logbook that uses the same data file but has both PC and Mac versions of the database application software already loaded to the same folder, so that it automatically runs on either platform. Those who use mainly a PC may also want to take advantage of the ‘briefcase’ utility in Windows. Right-click on the desktop to create a briefcase and then drop the logbook folder into it before copying the briefcase to the memory stick. Automatic synchronised backups of the memory stick logbook can then be made every time the device is plugged into the ‘backup’ computer. It is important to remember though that two different copies of the logbook will not be merged during the synchronisation process. The more recently used file will always overwrite the older one.
**Strengths**
- Highly portable.
- Inexpensive hardware, free software.
- Works on both PC and Macintosh.
- Makes use of any available host computer with a USB port.
- Will drive a printer connected to the host computer to produce reports.

**Weaknesses**
- USB sticks are small enough to lose easily!

### What are my colleagues doing?
A local survey conducted by Kelkar and Chelliah\(^1\) in 2007 suggested that all trainees, all SAS grades, and 45% of consultants currently keep a logbook. Although 23% of consultants use a paper-based system, the vast majority of trainees (>90%) use one or more versions of the RCoA-approved logbook software. Most anaesthetists now download their logbooks as freeware from the voluntarily and independently maintained website [www.logbook.org.uk](http://www.logbook.org.uk).

The website provides access to current versions of the logbook software, a range of help files and on-line email assistance ([support@logbook.org.uk](mailto:support@logbook.org.uk)). It has been operational since 2000 and receives 150,000 ‘hits’ each year from anaesthetists across the globe. The current logbook (version 7) was released in August 2007. Between August 2007 and June 2008, 12,885 copies of the logbook programmes were downloaded. A significant number of these downloads were made by international IP server addresses suggesting that the programme is now used throughout the wider anaesthetic community. Interestingly, however, examination of the monthly statistics suggests that there were August and February peaks that would coincide with the traditional changeover times for UK junior trainee posts.

<table>
<thead>
<tr>
<th>Logbook programme</th>
<th>Total number of downloads (August 2007 to June 2008)</th>
</tr>
</thead>
<tbody>
<tr>
<td>PC v7 (released Aug 2007)</td>
<td>5867</td>
</tr>
<tr>
<td>Macintosh v7 (released Aug 2007)</td>
<td>1443</td>
</tr>
<tr>
<td>PC v6 (released 2003)</td>
<td>921</td>
</tr>
<tr>
<td>PDA logbook (released 2003)</td>
<td>4654</td>
</tr>
</tbody>
</table>

Further analysis of the operating systems used to access the logbook website suggests that 82% of anaesthetists are Windows PC users and 13% are Macintosh users. The remaining 5% use a variety of operating systems (predominantly Linux). Very few anaesthetists (<1%) are currently using mobile telephone Symbian operating systems to access the logbook website.

![Figure 1: The home page of www.logbook.org.uk](http://www.logbook.org.uk)

![Figure 2: Number of copies of the logbook downloaded per month](http://www.logbook.org.uk)
What are the commonly encountered problems?

Any trainee who uses a paper-based logbook will need to set aside an evening (or two) to collate and count up the columns of information required for an annual appraisal. Moving on to electronic logbooks, Kelkar and Chelliah identified loss of data as a significant problem locally. Although 38% had never lost data, 51% had suffered this problem ‘one to two times’ and 11% ‘many times’. In 37% of cases this was compounded by failure to keep any form of back up. Complete battery failure will cause the memory of portable devices to be irreversibly wiped clean of data and this had been experienced by 24% of those who had lost data.

The authors of the desktop anaesthetic logbook have provided email support for users of the programme since its launch in 1996 (support@logbook.org.uk). Although the support was established primarily for users of the PC/Macintosh logbook, we have been able to give informal advice to resolve difficulties encountered using other unsupported logbooks. Over the past 12 months (August 2007 to July 2008) the email support address received 750 communications. Many of these were requests for software updates to the logbook programme when they become available but 391 emails related to problems using the logbook. To help speed up resolution of common problems we have set up a self-help ‘troubleshooting’ area of the website so users can download specific help sheets addressing the more commonly encountered logbook problems. Support has been requested in five main areas (see Table 2).

The HanDBase PDA logbook was intended as a portable solution to the problem of maintaining an up to date logbook when the only alternatives were either to collect operating lists on sheets of paper to transcribe later onto a desktop logbook programme or to lug a laptop from theatre to theatre. At the time the HanDBase logbook template was released in 2003 there were two types of PDA on the market and they used either the Palm or Pocket PC operating system. HanDBase was chosen because it was a database utility that worked on both types of PDA and it also allowed data to be exported to the more powerful desktop logbook programme providing access to the more detailed reports required for the RITA process. Since 2003, technology has advanced dramatically. There has been a proliferation in the number of available handheld computer devices and a shift in the pattern of usage away from the PDA towards a plethora of smartphones, all slightly different. The original Palm and Pocket PC operating systems are now relatively obsolete and no longer appear on these smartphones.

In response to these changes, DDH software has finally released different versions of HanDBase for five more operating systems (Windows Mobile/Pocket PC, Windows Mobile Smartphone, Symbian Series 60, Symbian UIQ, and Blackberry) but reports filtering back already from logbook users suggest that differences in screen sizes are producing unpredictable variations in how the logbook appears and functions on different devices. The net result is that we are seeing an increase in the number of requests for assistance in managing logbooks on a wide range of different mobile phones. Clearly one solution is unlikely to satisfy the needs of so many different models and it is becoming increasingly likely that we will have to abandon the concept that a single logbook might be usable on all the available devices.

A word about data protection

The 1998 Data Protection Act covers any information that can be used to identify a living person held on a computer or ‘relevant filing system’ (which may be paper-based). The question of what makes an individual identifiable is poorly defined by the act and is difficult to answer with certainty. The RCoA/AAGBI Joint Informatics Committee currently advise that it is reasonable for anaesthetists to continue to record a hospital number and date of birth with each case record because this allows an educational supervisor to confirm the accuracy of logbook data. On their own, these two items of data do not allow unique identification of an individual. Hospital numbers are

<table>
<thead>
<tr>
<th>Logbook problem</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Setting HanDBase preferences for the PDA logbook</td>
<td>450 (27%)</td>
</tr>
<tr>
<td>2 Difficulty exporting cases from the PDA to desktop logbook</td>
<td>753 (45%)</td>
</tr>
<tr>
<td>3 Incorrect date/time format after importing cases from a PDA</td>
<td>246 (14%)</td>
</tr>
<tr>
<td>4 Unable to produce a copy of the desktop logbook summary report</td>
<td>25 (1%)</td>
</tr>
<tr>
<td>5 Recovering data from the logbook file following a computer crash</td>
<td>223 (13%)</td>
</tr>
</tbody>
</table>
meaningless without access to a confidential hospital database, and it is estimated that 340,000 births occur globally each day. For those who remain unconvinced, the PC/Mac logbook allows the user to retrospectively replace all hospital ID numbers with a sequential numbering system if desired, and age in years can be entered instead of date of birth. Alternatively the user can opt to voluntarily data register for the sum of £35 per year. However, there remains a responsibility to safeguard any personal data collected. It is for this reason that the desktop logbook has always been distributed with an active password. Whilst to our knowledge, physical loss of computers is not a significant problem amongst anaesthetists (and no devices carrying anaesthetic logbooks have as yet been handed in to the BBC!), it might also be prudent to consider data encryption of laptop hard drives or USB flash drives.

Summary
The use of the RCoA electronic logbook is now almost ubiquitous amongst UK trainees. Although a logbook does not record competence, it does provide access to data about the nature and number of cases encountered and clinical procedures performed. This information is of value to trainees, trainers, and consultants who wish to support their arguments for changes in working patterns with objective and comparable evidence. Anaesthetists throughout the world downloaded 12,885 copies of the RCoA logbook programme during the last 12 months. During this period 86% of the problems encountered by users were related to the use of the PDA programme and 40% of anaesthetists are estimated to have lost data at some time. The most stable platform is the PC/Macintosh programme. All versions of this programme can be loaded to USB memory sticks with a minimum of 20Mb free space. The newest version of the software will work if plugged into either a PC or Macintosh host computer. Next year we hope to be able to announce the launch of a College-approved web-based elogbook. Until then please bear in mind that no logbook either paper or computer based is entirely safe, secure or foolproof and for this reason backups should always be kept in multiple locations.

We would like to thank all those logbook users who have taken the time to feed back their comments (both positive and negative). For the most up to date versions of the RCoA-approved electronic logbook please direct your browser to www.logbook.org.uk.

References
4 www.truecrypt.org.
Council report

At a meeting of Council on Wednesday, 18 June 2008, Dr J Hulf was admitted as President for the year 2008–2009. Professor C Dodds and Dr P Nightingale were admitted as Vice-Presidents for the year 2008–2009. Dr A-M Rollin was presented with the past Vice-President’s Medal.

Dr C Leng (Northampton), Dr A Mallick (Leeds), Dr D Moloney (Aintree), Dr C Sadler (London), Dr C Shannon (London), Dr N Snook (Leeds), Dr P Stone (Glasgow) and Dr M Thomas (London) were all admitted to the Board of Examiners.

Dr F Falter (Cambridgeshire) and Dr A McCrae (Edinburgh) were both admitted to the Fellowship ad eundem.

The following appointments/re-appointments were made (re-appointments are marked with an asterisk):

Regional Adviser
*Dr C Callander, Royal Gwent Hospital

Deputy Regional Advisers
There were no appointments or re-appointments this month.

College Tutors

Northern Ireland
Dr J A J Ferguson, Craigavon Area Hospital (in succession to Dr D W Lowry)
Dr P Stewart, Altnagelvin Area Hospital (in succession to Dr P T McSorely)

North Thames Central
*Dr E M C Ashley, The Heart Hospital

Mersey
Dr S M Burns, Warrington District General Hospital (in succession to Dr P Scott)

North West
Dr R Bhishma, North Manchester General Hospital (in succession to Dr I S Chadwick)
Dr T J Clarke, Royal Blackburn Hospital (in succession to Dr I R Stanley)

South East Scotland
*Dr D W Galloway, St John’s Hospital Howden (extended term of office for a further year)

Wessex
Dr J C G Bell, Basingstoke and North Hampshire Hospitals NHS Trust (in succession to Dr M A Rose)

West Midlands North
Dr N P Carter, Sandwell General Hospital (in succession to Dr A Jansen van Vuuren)
Dr J D Holbrook, Queen’s Hospital (in succession to Dr C M Heal)

West Midlands South
Dr S Feaver, George Elliot Hospital (in succession to Dr V Susarla)
Dr A Ruhnke, Walsgrave Hospital (in succession to Dr B V R N Murthy)

Heads of Schools
There were no updates to report this month.

At a meeting of Council on Wednesday, 16 July 2008, the following appointments/re-appointments were made (re-appointments marked with an asterisk):

Regional Advisers

Anglia
Dr S Fletcher, Norfolk and Norwich University Hospital (in succession to Dr N W Penfold)
*Dr J M Saddler, Royal Devon and Exeter Hospital
West Midlands South
Dr J M James, Birmingham Heartlands Hospital (in succession to Dr A F Malins)

Deputy Regional Advisers
Northern
*Dr A C Skinner, James Cook University Hospital

North West
*Dr C B W Till, Royal Lancaster Infirmary

South Thames East
Dr J E Curran, Queen Victoria Hospital (in succession to Dr A C Pearce)
Dr C J M Lanigan, University Hospital (in succession to Dr J V Sedgewick)

College Tutors
Oxford
*Dr C L Stapleton, Wexham Park Hospital

Yorkshire
Dr Z Rafique, Hull Royal Infirmary (in succession to Dr C D Rigg)
Dr J D Dodman, Pinderfields General Hospital (in succession to Dr P R Clarke)
Dr A L Lansbury, Leeds General Infirmary (in succession to Dr A D Fale)

North Thames West
Dr A Wijetunge, Central Middlesex Hospital (in succession to Dr P H Peel)

North Thames Central
*Dr S J Brocklesby, Barnet General Hospital

North Thames East
Dr K Raveendran, Queen’s Hospital (in succession to Dr P A Walker)
*Dr B M Emerson, St Andrew’s Centre for Plastic Surgery, Broomfield Hospital
Dr O E Mohr, Newham University Hospital (in succession to Dr N A Watt)
Dr M S May, Basildon University Hospital (in succession to Dr S Sampathkumar)
Dr E Simpson, Southend Hospital (in succession to Dr U I Bopitiya)

South East Scotland
Dr I de Beaux, Edinburgh Royal Infirmary (in succession to Dr C R Moores)

West of Scotland
*Dr P D Jefferson, Dumfries and Galloway Royal Infirmary
Dr A G Macfie, Golden Jubilee Hospital, Clydebank (new hospital)

South West Peninsula
*Dr J A L Pittman, Royal Devon and Exeter Hospital

South Thames East
Dr J J Cooper, Royal Sussex County Hospital (in succession to Dr R Kong)

South Thames West
*Dr J M Blair, St Helier Hospital

Wales
*Dr N M Agnew, Wrexham Maelor Hospital

West Midlands North
*Dr J P Chilvers, City Hospital, NHS Trust

Head of Schools
To note the following update for this month:
Dr D Connolly
School of Critical and Support Services, Yorkshire Deanery, Sheffield

The following recommendations were made to PMETB for approval, that Certificates of Completion of Training be awarded to those set out below, who have satisfactorily completed the full period of higher specialist training in anaesthesia. The doctors whose names are marked with an asterisk have been recommended for a joint CCT in Anaesthesia and Intensive Care Medicine.

Anglia
Dr Manasi Mangesh Bhagwat
Dr Jeremy Frank Corfe
Dr Dinesh Nethirasigamani
Dr Daniel Wren Wheeler

South East
Dr Amit Srivastava

Imperial School
Dr Julia Marjorie Richards
Dr Christopher John Whiten
Dr Ernst Christian Schwibert
Dr Andrew Christopher Steel
Dr Amit Mishra
Dr Sarah Elizabeth Gordon*

Barts/Royal London School
Dr Prabhakara Basavaraju

North Central
Dr Emma Fiona Stockton
Dr Madhurie Chakravarti-Chattopadhyay
Dr Khaled Ayazi
Dr Hooi Beng Lim
Dr Kathryn Jane Regan*
Dr Dorothy Kamya

Leicester
Dr James Andrew Sadler*
Dr James Simon Dougherty
Dr Anton Doran Leonard
Dr Simon Peter Young
Dr Neil James Flint*

Mersey
Dr Gopal Anand Iyer*
Dr Simon John Rider
Dr Preeti Manoj Kuduvalli
Dr Anil Kumar Samudrala Venkata
Dr Sheik Syed Hussain
Dr Kamal Taha Al-Naimi
Dr Sandeep Nayak

North West
Dr Sonny Mano
Dr Paul Ieuan Ferris*
Dr Hamish Edwin Thomson*
Dr Simona Sylvia Labor
Dr Moothedath Hariprasad
Dr Sujesh Bansal
Dr Rajesh Prakashchand Jain*
Dr Aji Thomas Mathew
Dr Doraraj Venkatanath
Dr Mahesh Pravin Kant Trivedi
Dr Santosh Ishvaral Patel
Dr Srikanth Chikkambotla
Dr Abdul-Ghaaliq Lalken

Northern School
Dr Benjamin Peter Norman
Dr Anita Margaret Holtham
Dr Prandeep Orakkan
The following list of Fellows by Examination was approved (University of Primary Medical qualification in brackets):

ABDUL Rasheed Shanawaz (India)
ALI Mohammed Akram (Bangalore)
ALLOCK Edward Charles (Southampton)
ALLMAN Louise Jennet (Bristol)
ALURI Sireesha (India)
ANANDAKRISHNAN Suresh (London)
ANDERSON Emma Lynette (Edinburgh)
ANDREW James David (Birmingham)
APPLETON Richard Thomas D (Glasgow)
ASWANI Andrew Daniel (Manchester)
BAIRD Colin Robert Wilson (Aberdeen)
BAKER Andrew Kellas (London)
BALAKUMAR Elanchezian (Madras)
BANAN Kamran (Iran)
BARESIENE Diana (London)
BARKER Graham Nicol (London)
BARKER Juliet Caroline (London)
BARLEY Mark (Nottingham)
BARNBROOK Julian Egbert John (Dundee)
BARNETT Justine (Bristol)
BARRASS Lynne Marguerite (Nottingham)
BASAVARAJU Aravind (Bangalore)
BASU Saptashree Melissa (Cambridge)
BAW Marcus Jason (Liverpool)
BEARD David John (Wales)
BEATTY Peter David (Aberdeen)
BELL Sarah Frances (Nottingham)
BENTLEY Catriona Ann (Birmingham)
BHALLA Paul Inder (Bristol)
BHANJADARY Rakesh Taranath (Mysore)
BHAT Satyawan (Mumbai)
BHTIA Nandlal (Mumbai)
BHULAR Jaspal Singh (London)
BICK Edward Ewart (Nottingham)
BINDAL Natisch Kumar (Birmingham)
BOOTH Christopher M A (Manchester)
BOSS John Michael Laurence (London)
BRETT Michael James (Glasgow)
Burch Jonathan (London)
BUSH Paul William (Sheffield)
CAIN Alistair William (Leicester)
CAMPBELL Jeremy Patrick (Edinburgh)
CAMPBELL Mark Damian (Dublin)
CARLE Coralie Ann (Nottingham)
CASSIDY Myles John Alexander (Glasgow)
CATHIAVADI Greemspet Mala (India)
CHAKRABARTI Kiron (Sheffield)
CHALLIS Matthew James (London)
CHIAM Patrick Shiuon Jye (Dundee)
CHIN Hanna Margareta (London)
CLYDE Aileen Elizabeth Grace (Glasgow)
COOPER Natalie Suzanne (Newcastle)
COPE Sean Patrick (Otago)
CORRY Richard Campbell (Edinburgh)
COTTLE Daniel Stephen (Manchester)
COVERDALE Nicola Jane (Leicester)
COWLEY Nicholas John (Birmingham)
CRAWLEY Simon Martin (Dundee)
CROSSINGHAM Gemma Victoria (Bristol)
CURTIS Richard Peter (Southampton)
DAVIES Sian Helen (Nottingham)
DAVODUAN Pejman (Beheshti)
DEMPSEY Zoey Sarah (Dundee)
DIAS Paul James (Nottingham)
DOREE Nicholas Charles (Manchester)
DUA Gunjeet (Punjab)
Please make your views known to us via email including your full name, grade and address. All contributions will receive an acknowledgement and the Editor reserves the right to edit letters for reasons of space or clarity.

bulletin@rcoa.ac.uk

The (anaesthetic) times, they are a changin’

Bulletin 48;March 2008:2462–2464

Sir,

Dr Norton’s article made interesting reading but I would like to draw his attention to another problem which I am sure all of us have faced.

Quite apart from the different times which can be logged by theatre staff for anaesthetic start time etc, there is another problem with record-keeping. Despite modern technology, it seems almost impossible for any hospital I have worked in to synchronise all clocks with the same (correct) time. I recently worked in a newly-built private finance initiative hospital with radio-controlled wall clocks. However, the anaesthetic machines were not always in time with these clocks. It is particularly frustrating when each year the change from British Summer Time to Greenwich Mean Time (or vice versa) is not applied to clocks in theatre or on anaesthetic machines. At times I have noticed that the engineers do not get around to changing the times for at least a month. Whilst I make an attempt to write the time deficit on every printout, I am not sure all my colleagues do the same.

Finally, in this age of ‘bare below the elbows’ when wearing a wrist watch is almost a disciplinary offence, surely the time (no pun intended) has come to make more effort to ensure that clocks in theatres, recovery and on anaesthetic machines are all reading the correct time and are synchronised. Accurate records of times can be vital in a medico-legal matter, as well as theatre efficiency which is what the article seemed to focus on.

Dr S Quasim, Specialist Registrar, Warwickshire

Poachers turned gamekeepers

Bulletin 49;May 2008:2489–2491

Sir,

The introduction of trainee assessment of consultant teaching is an interesting and positive move towards improving clinical teaching. Trainee feedback has the potential to motivate and advance education.

However, teaching is complex. The characteristics and attributes associated with good teaching are multiple and may vary by situation and student. Therefore the development of an objective rating scale is difficult. Before the routine assessment of consultant training abilities, any
Have you ever made a mistake?

Bulletin 48;March 2008:2442–2445

Sir,

Mr Bromiley’s humbling account of his wife’s death from a ‘can’t intubate, can’t ventilate’ (CICV) scenario should be read by every anaesthetist. Three years ago, our department experienced two post-induction deaths a few months apart. The deaths were not preventable, but investigation caused immense heartache and upset. The trust insisted that all consultants underwent Advanced Life Support (ALS) training, but those already ALS trained voiced concerns as to the course’s appropriateness to anaesthesia and approached the trust with proposals for an alternative scenario-based course,¹ that addressed anaesthetic crises such as occurred to Mrs Bromiley.

The first course ran in December 2006, subsequent courses running every two months parallel to clinical governance meetings – all consultants attend at least once a year for the purposes of appraisal. Using elements and algorithms borrowed from ALS as well as the Difficult Airway Society (DAS),² we believe this course answers the need for crisis management practice and uses scenarios not covered, to our knowledge, by any existing course.¹

Confrontation on courses is avoided by acting as both ‘facilitators’ and ‘attendees’, roles rotating so everyone has hands on practice, and scenarios develop in response to adverse incidents. Despite lacking advanced simulators, feedback is universally positive.

As Mr Bromiley states, the techniques we practise are familiar to us – it is non-technical skills that have seen the greatest change; better teamwork, a ‘what am I missing?’ approach when initial actions are ineffective, and earlier recognition of warning signs. Our course is available to all anaesthetists who would like to use it, and can be adapted to local situations by creation of suitable scenarios.

Dr J Palmer and Dr D O’Connor,
Consultant Anaesthetists, Salford

References
1 Continuing Scenario Based Anaesthetic Resuscitation Training (COSBART) (www.cosbart.org).

The medical impact of climate change

Bulletin 49;May 2008:2485–2488

Sir,

‘The medical impact of climate change’ by Dr Montgomery follows the information that 7,500 anaesthetists (plus presumably their spouses) travelled to Cape Town. The article itself is neither lucid nor well informed. It is hastily written and lacking any coherent structure. There are countless errors. Some are given below:

4,000 vehicles in North America in 1908, first oil well drilled 1888, half of the world forest destroyed since 1950 (!!!), Katrina in 2002, 12 tonnes per year of CO₂ emissions per person in the UK.

The one graph is grotesquely mislabelled by being called ‘cumulative’. In the paragraph called ‘Human adaptation to climate
change’ we get Gorbachev, a fence between India and Bangladesh, etc. However, there is not a single written word on the actual adaptive options. Are we unable to deal with diarrhoea, dengue fever or malaria? 

Dr I Hudecek, Consultant Anaesthetist, Walsall

Sir,

In his article on the medical impact of climate change Dr Montgomery declares that ‘there is no scientific dispute over the fact that humans are driving climate change’. That is an extraordinary statement to make about a system as complex and as clearly insufficiently understood as the planet’s climate! Having waded through the detailed statistics on carbon dioxide (CO₂) emissions, impressive figures on sea ice and glacier loss and countless dire predictions of what is in store for us unless we dramatically alter our ways, I was somewhat disappointed that his article provided no evidence at all to support this claim. This is hardly surprising as there is precious little such evidence. Evidence of warming says nothing about the causes of that warming.

Dr M Sammut, Consultant Anaesthetist, Newcastle upon Tyne

Sir,

The guest Editorial in Bulletin 49 was thought-provoking and timely. We are all used to disposable and single-use equipment and drugs, and seldom question the amount that goes into landfill for every case that we do; nor do we consider where it has come from and how it was produced.

In a way I’m surprised that this hasn’t become an issue until now.

Anaesthetists are thoughtful people, mindful of the effect that we have on others; and yet we do very little to address the staggering amount of waste that we produce. I’m sure that we do not actively choose to ignore the waste inherent in our practice; instead it must be that it hasn’t reached our consciousness. New habits are hard to pick up, especially if there is no obvious incentive or reward; this Editorial gave a reason for us to do our bit.

Dr E Burdett, Specialist Registrar in Anaesthetics and ICU, Enfield

Sir,

Dr Montgomery concisely and logically described humanity’s link to climate change and its subsequent effects on health and healthcare. My concern is that his words may be falling on deaf ears. I am an anaesthetic registrar and have become convinced of the need to change my personal/specialty practices. However, there is certainly no mention of a sustainable, ‘green’ framework for anaesthetic practice on the Royal College website, in the ‘Good Practice’ guide, nor in any syllabus for anaesthetic training. Nor is there any guide to modifying our carbon footprint: is TIVA greener than volatile anaesthesia? Do we need nitrous oxide? And can we recycle more in theatre?

The NHS had a carbon footprint of 18.6 million tonnes of CO₂ in 2004 – 60% due to the procurement of goods and services. It is time for anaesthetists, as denizens of an energy intensive part of the hospital, to set an example.

Dr M Scarfe, Anaesthetic Registrar, London

Response from the author, Dr H Montgomery

I would, of course, contest any lack of coherent structure, nor its information base. However, like any written piece, one style will appeal less to some (apparently such as Dr Hudecek) than others. Every effort was made to make it ‘lucid’. Many find visual representations easier to manage. In terms of facts, population data, for example, were rounded up for ease, and so an addendum may be made: at the time of writing the article, the world population was estimated to be 6,765,668,587 – 3% less than the quoted seven billion. As to carbon footprints: the figure offered is correct. The so-called ‘primary’ footprint represents direct personal use (for instance in home heating and personal transport). ‘Secondary’ footprint represents those emissions which others release on your behalf (‘carbon miles’ in food, your share of local government services and the like). Together, these total some 12 metric tonnes. Meanwhile, my quoted estimates of forest destruction may have been too low. Rainforests once covered 14% of the earth’s land surface; now they cover a mere 6%. Ethiopia alone has lost 98% of its forested area in 50 years. Some suggest that half of the forests in the world may have actually been destroyed in the 30 years to 1980 (Ma, 1999; Liu and Li, 2001). I’m sorry that minor typographical errors such as the first commercial oil well being drilled in 1858 rather than 1888, and the date of Katrina (2005) were missed. These, of course, in no way alter the message of the piece, nor its scientific validity. I am sure Dr Hudecek is aware that there are space and reference constraints to every publication. This piece was
There is now a growing disparity between a handful of doubters, and the vast majority of scientists and informed opinion of all disciplines who are firm in their view as to the anthropogenic nature of climate change and its gravity. Whilst we must all retain critical faculties, we must also recognise the consensus. On a more pragmatic note, and to quote Clint Eastwood, Dr Sammut might wish to decide ‘Do I feel lucky?’ Gambling against an expert scientific consensus established over at least two decades may seem brave. Being found wrong will prove catastrophic.

Bernard Johnson Adviser (Overseas) vacancy

The College invites applications from interested anaesthetists for the role of Bernard Johnson Adviser (Overseas). The role of the Adviser is to:

- Assist with the selection of appropriately qualified overseas doctors for specific training opportunities in the UK.
- Liaise with Deaneries and trusts for the identification of recognised training posts for the selected overseas doctors.
- Provide policy advice to the College Training Committee.
- Provide guidance to individual trainees.

The role requires a commitment of a minimum of three hours per week.

Applications close on Friday, 24 October 2008 and an application pack is available on the College website (www.rcoa.ac.uk).

The Royal College of Anaesthetists

4TH NATIONAL AUDIT PROJECT (NAP4)

Major Complications of Airway Management in the UK

NAP4 will run from 1 September 2008 – 31 August 2009

A one year prospective audit to determine the frequency of major airway complications in all NHS hospitals.

PHASE 1: a snapshot audit in September 2008 of all anaesthetic activity.

PHASE 2: a year-long case reporting period (1 September 2008 – 31 August 2009).

Please report all relevant complications of airway management during anaesthesia and in ICU or the Emergency Department.

Inclusion criteria:

- Death or brain damage
- Emergency surgical airway or needle cricothyroidotomy
- Unanticipated ICU admission: only where the complications of airway management are the cause of admission, or lead to an adverse outcome.

More detailed information can be found on the DAS website (www.das.uk.com/natauditproject) or RCoA website (www.rcoa.ac.uk), or directly from Tim Cook (tcook@rcoa.ac.uk) or Nick Woodall (nicholas.woodall@nnuh.nhs.uk) co-leads for the project.
IMPORTANT ANNOUNCEMENT

PRIMARY AND FINAL FRCA MCQ EXAMINATIONS:
Negative marking will be removed with effect from 1 September 2008

The only change that candidates will notice is that the optical mark reader answer sheet will have only two boxes against each question: ‘True’ and ‘False’. The ‘?’ box will be removed. There will be no other changes to the content or structure of the papers or syllabus at either level and the standards of knowledge expected for a pass will be unchanged.

The removal of the penalty for wrongly answering a question, however, will have significant implications for the way that candidates prepare for MCQ examinations and the mark required to pass. There will no longer be any advantage in not answering a question. In their revision, candidates should plan to answer all the questions and to aim for a minimum score of 80%.

8th Annual Education Day Paediatric Anaesthesia

17 NOVEMBER 2008

The Great Hall, St Bartholomew’s Hospital,
West Smithfield, London EC1A 7BE

Registration fee (inc lunch and refreshments): £100 (medical), £15 (non-medical)
Approved for 5 CPD points by RCoA

A day of lectures, short presentations and debates for anaesthetists and allied professionals with an interest in paediatric anaesthesia and critical care.

Programme
- Risk assessment and consent for paediatric procedures
- Nitrous oxide
- Codeine
- Obesity in children and adolescents
- Post-operative nausea and vomiting
- New paediatric analgesic drugs
- Paediatric pain services – challenges and pitfalls
- Peri-operative fluids
- Thrombo-embolism and paediatric surgery
- Diabetes and paediatric surgery
- NSAIDs in neonates

Application forms and further details from:
Lionel.davis@bartsandthelondon.nhs.uk
Advertising

The Royal College of Anaesthetists’ Bulletin is published bi-monthly and distributed to over 13,500 anaesthetists worldwide, the vast majority being in the UK. Being so widely distributed, it is obviously seen by many other professionals who work alongside anaesthetists.

Advertisements for courses and meetings from anaesthetic societies, or those organisations that are of interest to anaesthetists, are accepted with prior approval of the Editor or Editorial Board. Each advert is generally placed to the rear of the Bulletin amongst the other notices.

Text and any image, logo or crest should be submitted to Mrs Mandie Kelly or Mrs Edwina Jones by email (bulletin@rcoa.ac.uk). Please ensure that images are at least 300dpi in resolution and are sent as a separate file (rather than embedded within a Word document) which will ensure higher quality. Preferable formats are TIFF, JPEG, EPS or high-quality PDF.

The size of the advert is to some extent dictated by content and the layout of all adverts will be in keeping with the Bulletin style and design. Please note that we do not use loose inserts in any issue and cannot supply the names and addresses of our members for marketing or commercial purposes.

Prices below are per issue and are subject to VAT at the current rate:

<table>
<thead>
<tr>
<th>Advert</th>
<th>Size</th>
<th>Rate</th>
</tr>
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<tbody>
<tr>
<td>Quarter page</td>
<td>88 mm by 118 mm</td>
<td>£220.00</td>
</tr>
<tr>
<td>Half page</td>
<td>88 mm by 240 mm</td>
<td>£432.50</td>
</tr>
<tr>
<td>Full page</td>
<td>181 mm by 240 mm</td>
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</tr>
</tbody>
</table>

A 20% discount is available if advertisements are placed in six consecutive issues and are paid for in advance. Please supply a contact name, email and full address for the invoice.

PAYNE-STAFFORD-TAN
AN AWARD FOR CLINICAL EXCELLENCE

This award was established through the generosity of an American friend of the College, Mr Norman Knight. The aim is to mark excellence in clinical practice, teaching or research in anaesthesia, critical care or pain management. The award is open to any Fellow or Member of the College, and comprises a grant (to a maximum of £1,000) to be used for educational purposes such as attendance at a major conference or the purchase of educational materials. The recipient will be expected to provide a short report outlining how the funds have been used.

Nominations are now invited for the 2008 award, and must be made by a Fellow or Member of the College on behalf of another. The nomination should be in the form of a letter outlining the particular merits of the individual nominated, and should be accompanied by a full curriculum vitae. Nominations should be addressed to Professor D J Rowbotham, Chairman of the Academic and Research Committee at the College, before the closing date of Friday, 9 January 2009.
THE MERSEY COURSES
for THE FINAL FRCA PAPERS
21 OCTOBER 2008

THE FINAL MCQ WEEK
2.00 PM SUNDAY, 5 OCTOBER TO 12 NOON FRIDAY, 10 OCTOBER 2008

Five intense days (8.00 am – 8.00 pm)
Close analysis of MCQs with emphasis on
Medicine and Intensive Care | Surgery and Obstetrics
Physics Measurement Equipment | Neurosurgical Anaesthesia
Paediatric Anaesthesia | Chronic Pain | Statistics

Registration fee: £300

THE FINAL SAQ WEEKEND
2.00 PM FRIDAY, 10 OCTOBER TO 4.00 PM SUNDAY, 12 OCTOBER 2008

The Mersey Method of dealing with the SAQ paper
Master classes in style and technique | Time management and discipline | Practice and analysis

Registration fee: £250

NOTES
DISCOUNTED SUBSCRIPTION TO BOTH COURSES – £450
VENUE: AINTREE HOSPITALS, LIVERPOOL

FOR DETAILS, ASSESSMENTS AND AN APPLICATION FORM, PLEASE SEE OUR WEBSITE AT: WWW.MSOA.ORG.UK
THE MERSEY SELECTIVE COURSE

2.00 PM SUNDAY, 2 NOVEMBER TO 4.00 PM FRIDAY, 7 NOVEMBER 2008

Designed to cover aspects of the Basic Sciences syllabus not well explained in the available texts. Thus the course is considered to be suitable for those trainees revising for the Final Viva Examination in December 2008 and for those trainees preparing for the Primary MCQ Paper in February 2009.

MENU
Physics | Electricity | Measurement | Pharmacodynamics
Pharmacokinetics | Oxygen and Carbon Dioxide
Acid Base | Cardiovascular Physiology | Respiratory Physiology
Muscle Physiology | Metabolism Physiology | Renal Physiology
Statistics for the FRCA | Physiology of Altitude
Physiology of Depth | Physiology of Exercise *plus*
Daily MCQ Revision Exercises

LIMITED TO 35 PLACES*

Aintree Hospitals, Liverpool
Registration fee: £400 (incl breakfast, lunch and refreshments)

*Candidates will be sent a Revision and Preparatory Homework Booklet

FOR DETAILS, ASSESSMENTS AND AN APPLICATION FORM, PLEASE SEE OUR WEBSITE AT: WWW.MSOA.ORG.UK
(Courses > FRCA and FCARCSI Mersey Selective Course)
Deaths

It is with regret that the College records the deaths of the Fellows listed below.

Dr E Lloyd-Jones
Buckinghamshire
Dr E Lloyd-Jones
Buckinghamshire
Dr R D McKendrick
Lancashire
Dr D G Price
Berkshire
Dr A M Wilson
Cork, Ireland

The College is able to receive brief obituaries (of no more than 500 words), with a photo if desired, of Fellows, Members or Trainees. The obituaries will be published on the College website for a period of three months, after which they will be moved to a permanent archive. Please email your text and any photo to website@rcoa.ac.uk.

www.rcoa.ac.uk/obituaries

Appointment of Fellows to consultant and similar posts

The College congratulates the following Fellows on their consultant appointments:

Dr O Akerele
Bradford Royal Infirmary
Dr J Barron
Guy’s and St Thomas’ Hospitals Trust, London
Dr S J Davies
North Manchester General Hospital
Dr S R Desai
Queen Elizabeth Hospital, Birmingham
Dr J Greenbaum
Salford Royal NHS Foundation Trust
Dr A T M S Hameed
Friarage Hospital, Northallerton
Dr S S Lobo
Queen Alexandra Hospital, Portsmouth
Dr D Mahtani
Guy’s and St Thomas’ Hospitals Trust, London
Dr A Raajkumar
Royal Wolverhampton Hospitals NHS Trust
Dr S Sridler
Countess of Chester NHS Foundation Trust
Dr S Sagadai
The James Paget Hospital, Norfolk
Dr J F Silsby
Musgrove Park Hospital, Taunton
Dr S T Webb
Papworth Hospital, Cambridge

Association of Anaesthetists of Great Britain and Ireland

ANNUAL CONGRESS
17–19 September 2008, Torquay
Further details:
web www.aagbi/events/congress.htm
tel 020 7631 8804
e-mail meetings@aagbi.org

WSM LONDON
Further details:
web www.aagbi/events/vsm.htm
tel 020 7631 8804
e-mail meetings@aagbi.org

GAT 2009
1–3 July 2009, Cambridge
Further details:
web www.aagbi/events/gatasm.htm
tel 020 7631 8804
e-mail meetings@aagbi.org

College contacts

Chief Executive
Kevin Storey

Directors
David Bowman, Training and Exams
Charlie McLaughlan, Professional Standards

Managers
Martin Bennetts, Facilities
Graham Clissett, Examinations
Richard Cooke, Information Technology
Roger Smith, Financial Controller
Bob Williams, Professional Standards
Craig Williamson, Training

Advisory Appointment Committees
Anita Mattis: 020 7092 1571
Jane Griggs: 020 7092 1572

Courses and Meetings/Events
Ekaterina Boyd: 020 7092 1670
fax: 020 7092 1735
events@rcoa.ac.uk

Finance
Daniela Angiletta: 020 7092 1583
Sarah Bishop: 020 7092 1584

Hospital Visits
Afsana Choudhury: 020 7092 1652

Individual Trainees A–Le
Claudia Moran: 020 7092 1554

Individual Trainees Li–Z
Claire Higgins: 020 7092 1553

Membership
Karen Slater: 020 7092 1701
Craig Miller: 020 7092 1702

Regional & Deputy Regional Adviser and College Tutor Appointments
Karen Morris: 020 7092 1573

Venue Hire
Manja Krech: 020 7092 1510
roombookings@rcoa.ac.uk

Website and Bulletin
Edwina Jones: 020 7092 1692
Mandie Kelly: 020 7092 1693