

**Teaching and training in anaesthesia and critical care to undergraduates, postgraduates and ourselves**

Teaching and training undergraduates and postgraduates in anaesthesia and critical care is a collective responsibility of the university academics and the consultants in anaesthesia and critical care of the National Health Service. Hence emanates the necessity to ensure our professional development as well.

Teaching and training is geared to acquire competence which is defined in terms of knowledge, skills and attitudes.

In anaesthesiology education postgraduate training has been the focus of interest all over the world including Sri Lanka and has been fine tuned to very comprehensive highly organized state of the art curricula, examinations and evaluations. It has moved over time from learning at the feet of the guru or self-education from unknown or dubious sources to meticulously planned training from accredited sources, assessed for their accreditation or board certification on many domains. They are clinical, cognitive and interpersonal skills such as knowledge, clinical practice, professionalism, attitudes towards self, patients, colleagues and staff, communication, and the ability to work in a team in the relevant health care system. Competence in these areas are taught, evaluated, determined and documented in order to maintain high standards.

The postgraduates as well as trainers face major challenges such as 1) constant increase in the available medical knowledge, 2) anaesthesia and surgery being evolving specialties, 3) increase in older and more complicated patients, 4) introduction of new drugs and devices in to the market.<sup>1</sup>

One of the main problems facing the postgraduates is the availability of an ‘overwhelming’ amount of

information without a weightage of its relevance and priority.<sup>1</sup> There is also difficulty in accessing relevant information on an ‘urgent’ basis. There may also be many protocols and guidelines on the same subject from the various continents with the consequence of forgetting, non-prioritizing and disregarding vital material. Hence it is important that training centers in each country identifies the key areas and nationalize the information for safe and effective practice.

In order to enhance clinical practice, the training centers need to install skills training and simulation laboratories. Like the airline pilots, the virtuoso musicians and the champion sports persons only practice will make us perfect, but without subjecting humans to undue distress.

In addition the training centers need to ensure maintenance of quality standards of patient care and encourage research into questions facing our specialty.

Exposure of undergraduates to the specialties of anaesthesiology and critical care is as important. The undergraduates benefit immensely by being trained with anaesthesiologists who can best introduce them to the core principles of physiology and pharmacology which form the basis for resuscitation, peri operative assessment and care and also physics and medical technology in the clinical setting.<sup>2</sup> They also benefit by acquiring invaluable practical skills (eg. airway management, resuscitation, etc), and many ethical and clinical aspects of patient care by their presence in operating and post anaesthetic areas, emergency rooms, intensive care units, pre admission clinics, pain clinics, labour wards as well as in radiology suites, endoscopy units and psychiatric units. Therefore training rotations in anaesthesiology for



the medical undergraduates should be safeguarded in the university clinical training curricula and all efforts should be made to give a competency based training. Anaesthesia is a subject in the undergraduate curricular of the universities of Sri Lanka which includes a clinical rotation. The College of Anaesthesiologists and Intensivists of Sri Lanka awards a gold medal at undergraduate level for anaesthesia and critical care. Hence this mission, up to some degree has been looked into in Sri Lanka, but certainly deserves more attention.

A vital aspect of medical education that has been neglected and needs to be addressed is the exposure of the final year medical student to emergency medicine and critical care to familiarize them with the high intensity, high tech environment of acute medicine. The student needs to understand the guiding principles and different approach to treatment of multi-organ failure and the multi-disciplinary management of vital organ support. The importance of early warning signs and protocol driven goal directed therapy should also be highlighted.

A commitment to teaching, training and mentoring undergraduates is very rewarding, and students often look up to anaesthetists as life savers and perhaps inspiring role models. It also offers us the opportunity to encourage the keen students who seem to possess the required personality and characteristics to consider a career in anaesthesiology.

Why do we need to train ourselves? We, as experts in our specialty shoulder a great responsibility to be the best we can be, to ensure the development of our specialty with the next generation of anaesthetists. We owe it to ourselves, our patients, our students and our specialty. We need to nurture a strong, efficient, competent and caring future anaesthetist. Only teaching, training, examining, quality care and research will result in a product that provides the best anaesthesia and intensive care for the patients. In order to achieve this we need to continually educate and better ourselves by concentrating on continuous professional development. This includes gaining of knowledge,

learning new methods and skills in technology, learning research methodology, academic work, different styles of teaching learners, mentoring, evaluating and examining. Furthermore acquiring skills of management, innovation, communication and leadership incorporating the highest ethical standards are mandatory.

In summary, we should teach and mentor all undergraduates to ensure a sound foundation for their future practice (and hopefully pick those best suited for anaesthesia), train postgraduates to provide the best patient care, and train ourselves to the best of our ability to produce centers of education excellence in our specialty.

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## References

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