

POSTGRADUATE EDUCATION IN MALAYSIA

Postgraduate medical education in Malaysia received a shot in the arm with the introduction of the "open concept" for the local postgraduate Masters programme in 1996. Numerous applications are received each year from spirited young doctors who wish to take full advantage of the new system which allows doctors in the Ministry of Health (MOH) hospitals to pursue their postgraduate training in MOH hospitals, under the direct supervision of MOH specialists and with the blessing of the 3 participating local Universities, namely Universiti Malaya (UM), Universiti Kebangsaan Malaysia (UKM) and Universiti Sains Malaysia (USM). Such a system has minimised the disruption of services in MOH hospitals, which would have otherwise occurred if doctors in MOH were compelled to pursue the 4-year Masters programme entirely at the universities. The other advantage of this system is of course the greater volume of specialists trained each year using existing training facilities in MOH hospitals. Also, senior and experienced MOH specialists will now have the opportunity to prove their mettle in postgraduate training, something they have always been doing, albeit in an ad-hoc and unstructured manner.

Since the implementation of the Masters Programme, under the "open system" in 1996, 2,502 applications have been received for the 16 courses offered by the 3 local universities. Of these, 1,800 (72%) have been accepted for training. At the time of writing, 1,399 (78%) are still in the Programme. The other 22% have left the course, either because of failure or other reasons. Only doctors who have completed 2 years of service after their housemanship are eligible to apply. Selection of candidates will be made by the local universities based on set criteria and methods which are different for each university. The 16 courses offered are *Internal Medicine, General Surgery, Pediatrics, Anesthesiology, Obstetrics & Gynecology, Orthopedics, Ophthalmology, Otorhinolaryngology, Pathology, Radiology, Psychiatry, Family Medicine, Sports and Rehabilitative Medicine (UM only), Public Health, Emergency Medicine (USM only) and Rehabilitative Medicine (UM only)*.

The placement of trainees placed in MOH

hospitals and the Universities is decided by the National Co-ordinating Committee, comprising representatives from the relevant sections of the MOH and the 3 Universities, based on a 60:40 ratio in favour of MOH training centres. Training places are limited by the number of trainers available at accredited training centres. Despite initial hiccups, the local Masters programme under the "open concept" has taken off very well. All parties involved in the programme appreciate the importance of effective communication using existing mechanisms to ensure the success of the programme.

It has been estimated that the country requires more than 6,000 specialists by year 2020. This number represents approximately 15% of 42,319 doctors needed for that year (using the norm of 1:800, which some may consider outdated!). However, if we use the projected population of 23 million in the year 2000, we will need at least 6,786 specialists for the country, using varying specialist:population ratios for the various disciplines as the basis. The local universities have successfully produced approximately 700 specialists since 1986 and 1,399 more are presently being trained, of whom 288 are expected to graduate next year. Although the number of doctors trained in postgraduate medical education has doubled since the introduction of the local postgraduate programme under the open system in 1996, it can be appreciated that we will still be short of our target.

Overseas postgraduate courses

The other alternative of course is for our doctors to sit for the overseas postgraduate examinations. The exact number of doctors pursuing postgraduate education at overseas centres is not known as almost all of them do so quietly at their own expense and without declaring their intentions to the authorities. Although the Public Services Department (PSD) no longer offers scholarships to those pursuing basic postgraduate degree overseas, it allows doctors to do so on fully-paid leave. The Part I and II of The MRCP (UK) for both adult and pediatric medicine can now be taken once a year in

Malaysia. Most overseas professional colleges, however, have made or will make significant changes in the structure and conduct of the postgraduate examinations. Doctors wishing to take up surgery, for instance, have to sit for the MRCS or the AFRCS (entry qualifications) before being permitted to undergo a formal 4-year surgical training programme leading to the FRCS (exit qualification). Places for the latter programme are limited and there is no guarantee that our doctors will be offered places. Not many of our doctors wishing to do surgery, therefore, relish the thought of going overseas to fulfill their aspirations in surgery. The local Masters programme is probably the best option for them. Those interested in Internal Medicine, Pediatrics and O&G can still sit for the MRCP and the MRCOG examinations in Malaysia and at overseas centres and the degrees obtained are still accepted as "exit" qualifications in Malaysia. They will then have to undergo 18 months of supervised training at accredited training units in Malaysian hospitals before being gazetted as specialists. Those who qualify from the local Masters programme require only 6 months for gazettement.

Number and type of specialists produced

Although the number of specialists trained locally and abroad in Malaysia has increased, it falls short of the required projection for the year 2000, even if we take into consideration the numbers presently available at the Universities and the private sector. Also there is some disparity in the distribution of specialty services within the MOH. As of 1.4.99, the MOH has 156 general physicians, 131 pediatricians, 130 surgeons, 80 obstetrician & gynaecologists, 55 psychiatrists, 60 radiologists, 70 pathologists, 62 orthopaedic surgeons, 86 anaesthetists, 57 ophthalmologists and only 27 otorhinolaryngologists. Doctors applying for the "less popular" disciplines will be given special consideration in order to correct the imbalance.

Subspecialty training

Malaysia has yet to offer a certified subspecialty postgraduate course. I believe UKM will be offering such a course in Cardiology soon. There are however accredited subspecialty training

centres in Malaysia and these include cardiology, cardio-thoracic surgery, nephrology, urology, neurology, neurosurgery, gastroenterology, hepatology, respiratory medicine, rheumatology, endocrinology, dermatology, infectious disease, hematology, plastic surgery and hand and microsurgery.

In the MOH, doctors wishing to subspecialize after procuring the basic specialist degree will have to undergo a 3-year formal training programme locally, with the option of completing the third year at overseas centres to learn procedural skills and upgrade knowledge in very specialized areas that are not freely available in this country. The PSD provide scholarships for this purpose. As it stands, the MOH has under its wings 14 dermatologists, 5 neurologists, 9 nephrologists, 8 respiratory physicians, 7 forensic pathologists, 7 cardiologists, 13 urologists, 10 neurosurgeons, 5 plastic surgeons, 9 pediatric surgeons, 7 cardiothoracic surgeons, 1 hand and microsurgeon, 5 radiotherapists and 3 specialists in rehabilitation medicine. The total number of specialists, including 58 doctors who are presently undergoing subspecialty training, in MOH hospitals is 1,003 at present. The lack of accredited subspecialty training centres in some disciplines in MOH hospitals makes it necessary for some of our doctors to be posted to the universities and even private hospitals for such training.

In the pursuance of specialization, we must not forsake our unique training system which teaches us to be competent in common medical emergencies, for example, and yet retain the right to provide highly specialized services whenever the need arises. The concept of a generalist physician with special interest in a specific clinical area is probably the best model to follow and is being strongly advocated by professional colleges abroad. However we still need a pool of doctors to undergo advanced subspecialty training to provide the best possible service to the community. While we welcome specialists to subspecialize after procuring their basic specialist qualification, we are concerned about the increasing trend towards greater subspecialisation to a degree that makes them terribly dependent on others when confronted with patients with multiple problems. In other words, there is a trend towards *learning more and*

more about less and less.

Generalists

Concerns have been expressed in western countries regarding the dwindling number and role of specialists with general interest (the so-called generalists). The trend towards more specialization is inevitable of course if one wishes to achieve excellence in a particular field. Also with greater specialization, we will be in a better position to attract patients from the region in the spirit of medical tourism. Notwithstanding this, generalists with special interest in certain areas still play a very important role in the total management of patients and will be in a very good position to provide initial treatment and advice to patients with acute illnesses and multiple medical problems, something the highly specialized subspecialists find difficult to do. There needs to be a balance between the two. The Malaysian postgraduate training programme is unique as it adopts a holistic approach to postgraduate training. In the UK, professional colleges are structuring their training programmes for the benefit of general physicians including those with special interests in a specific clinical areas. This holistic approach is chosen to provide a "seamless" service to patients.

Development of a subspecialty service

The development of specialist services should be well co-ordinated and well-planned. Specialists can be rendered helpless without a supportive specialist team. Their ability to function efficiently and effectively depends to a large extent on a supportive skilled workforce eg. skilled nurses. They need to also establish inter-disciplinary and inter-institutional linkages to provide the best possible care for their patients. A hepatologist for example will require the expertise of pathologists, radiologists, virologists, hepatobiliary surgeons in order to execute quality treatment. If possible the whole team should be trained at the same centre.

In the planning of our subspecialty services, we must put the interest of the nation first before that of the doctor. Doctors tend to aspire for disciplines that will allow them to be more "marketable". Being able to perform procedures eg. interventional cardiology and endoscopy is one way of achieving this status. Unfortunately

after having mastered these skills, they begin to get restless and give any number of reasons to leave for the private sector. It is most important for the MOH to allocate places for all subspecialties and attract doctors to take up "less popular" disciplines. Otherwise we may end up training more of the same and after some years when they leave the service, we churn out even more of the same as well. Doctors have 2 choices when they wish to take up postgraduate training. Either they choose one that is readily available (probably because it is still new or is not "popular") or one that they have to wait for (because of too many applications as they are considered "popular"). A bit of "policing" may be necessary to ensure greater accessibility and equity of highly specialized care for our patients. Otherwise, we will continue to lag behind the rest of the world in the various fields of medicine and be forever dependent on other countries whenever we are faced with a problem or a crisis, wasting precious ringgits along the way.

Clinical governance

Clinical governance is the acceptance of the responsibility by individual physicians to work in a way which is consistent with the values and strategic objectives of the organization which employs them. Within this, there is a responsibility to maintain good medical practice and achieve high standards. The responsibility of the organization to provide appropriate facilities for medical work and to support the professional development of physicians and clinical teams on a continuing basis. We must be accountable for clinical performance of our doctors. We must examine new ways to deliver clinical excellence

A high standard of medical practice is prerequisite of good medical care and clinical governance is the means for ensuring maintenance of high standards. The Academy of Medicine of Malaysia and other professional bodies must be involved with the development of standards in the clinical specialties.

Specialists of the future

Quantity is of no use without quality. We all know that. We must ensure that the specialists we produce can and will improve the quality of care of our patients. They should practise evidence-based medicine and work towards improving

medical and health outcomes. Healthcare costs must always be considered before making management decisions. They must be prepared for the numerous challenges in the next millenium, be prepared to accept the public as healthcare advocates, be mature enough to accept constructive criticisms regarding their clinical competence, engage actively in continuing professional development (CPD) and self regulation and be prepared to learn management skills. In addition, specialists of the future must be proficient in information and communications technology. These are some of the factors we need to consider as we plan our postgraduate education for the future.

Good medical practice requires putting patients first. Doctors must have the commitment to sustain and improve the quality of care through greater professionalism and teamwork. Postgraduate education of the future is not just about the acquisition of core knowledge. It needs to incorporate the learning of newer disciplines such as the cell biology, molecular biology, genetics, behavioural and social science, ethics and law, management skills, public health medicine, epidemiology, health economics and health informatics. Specialists of the future must know the difference between efficacy, effectiveness, efficiency, equity and economy in the management of their patients and still be able to care for their patients through improvement in their communications skills.

Challenges for the future

Dramatic changes in healthcare are expected in the 21st century as a result of changes in the practice of medicine and in society. These include changing demographics and the pattern of disease, new technologies, changes in healthcare delivery, increasing consumerism, patient empowerment and autonomy, changing professional roles and emphasis on effectiveness

and efficiency. These represent challenges facing the medical profession in the next millenium. Our postgraduate programmes must be tailored to address these challenges. Initiatives such as distance learning under the Telemedicine Flagship Application of the Multimedia Super Corridor should be maximally exploited to facilitate all levels of training and promote personal empowerment and responsibility of health. Patients should be provided with all levels of care wherever they are.

The most important consideration in the development of future postgraduate training programmes is whether such an effort will indeed improve the quality of care of the community and improve health outcomes. If specialization is to be developed, it has to be for the benefit of patients, the community and the nation as a whole and not health professionals alone.

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