



THE BEST D

By Dr Toh Han Chong, Editor

Although I hadn't clocked enough road time recently, I nevertheless joined my cycling group on 28 May 2011 for our usual pre-dawn Saturday ride. At about 70 km, on a road curve near East Coast Park, my leg muscles seized up with cramps. The cramps reached a crescendo of agonising pain as I slowed to a stop. I could only keel over on a grass verge, both calves cut by the Shimano bicycle gears, my convulsing thighs feeling like sumo wrestlers were mangling them, my mind spinning.

After 30 minutes, I was able to strugglingly cycle to Kampong Arang where my cycling group was eating breakfast. At the next table, there was a doe-eyed boy about nine or ten years old with cerebral palsy in a special wheelchair, having breakfast with his family. While my excruciating muscle cramps lasted no more than 30 minutes, this boy would live the rest of his life with disability, dysfunction and seizing pains. If I were unable to feel pain, I would not have felt as much for this child. It is easier to inflict than to alleviate pain. I realised that as medical doctors, my colleagues and I are given a great privilege to look after people like this little guy.

With the graduation of the first cohort of Duke-NUS Graduate Medical School students taking place that afternoon, my thoughts flashed back to my own *St Elmo's Fire* pre-Internet medical school days. At ne-ne-ne-nineteen, everybody wanted to rule the world. The crux of any medical school education is to instill empathy. While empathy is central to Medicine, a dinner conversation I had with one of the earliest Singapore senior civil servants stationed in China in the 80s showed me that this virtue was even needed in the most pragmatic frame. He offered that one of the reasons why Singapore Inc had painful birth pangs making successful business inroads in

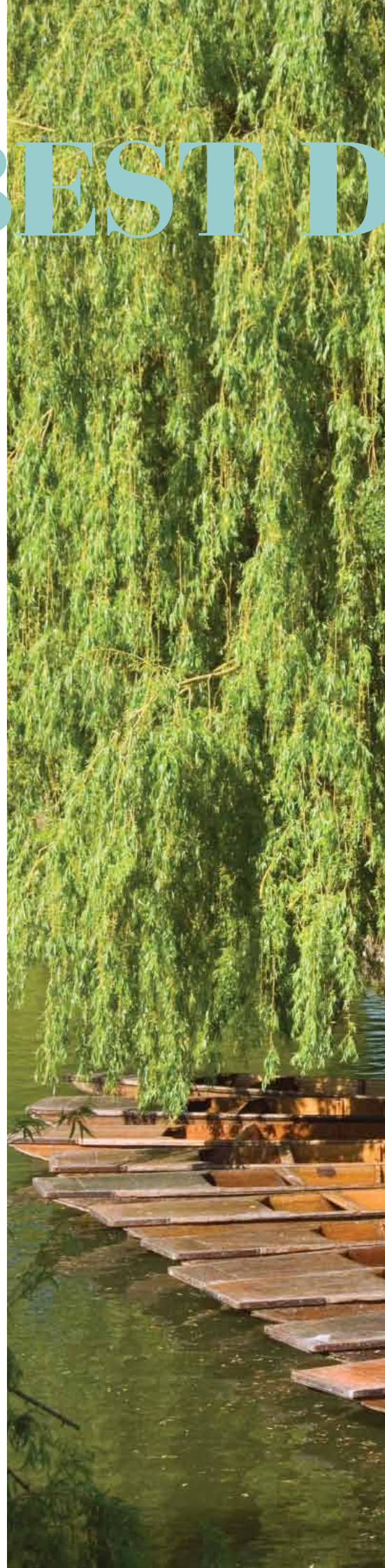
China was that the early waves of Singaporean officials in China were left brain technocrats who did not possess empathy: "The Singapore team did not empathise with the Chinese and were focused too squarely on the deal." He said that the other problem was that these technocrats were so smart, they wrote papers that covered themselves and pleased their bosses than commit to the long term interests of Singapore. So in the fiercely competitive world of medical school filled with bright, sometimes jaded students, how does one teach welfare for others above Darwinian survival?

Medical students need both the left and right brain, as doctoring not only needs left brain logic, systems thinking and scientific rationality, but also right brain intuition, holistic thinking and creativity. One of the top students in my pre-clinical year looked like the unshaven frontman of a punk band, super nerdy, super sloppy and super smart. He had a photographic memory and aced every pre-clinical exam. But the clinical years came as a rude shock to him because he had to demonstrate real interest in the lives of human beings, show tactile clinical examination dexterity for which he was klutzily dyspraxic, and simplify the complexities of human disease. He stumbled in the clinical years.

Medical school was tough. On some grey days, we felt we were on the road to nowhere, and just livin' on a prayer. Medical students began the long hours of slog every blue Monday, while the Arts students spent far fewer lecture hours a week on Keynes, Kant and Kit Kat, and the rest of their time canoodling and *kooning*.

Medical school was also about that crazy little thing called love, mostly unrequited for me. My dating history saw me commonly struck by selective mutism, rolling nystagmus, profuse hyperhidrosis and intention tremors.

The essence of an English medical education was the bedside tutorial, which was conducted with the same rigour and devotion





DAYS OF MY LIFE

as a Shakespearean performance. Particularly formidable was Prof Harold Ellis, whose Surgical Anatomy classes felt like a dentist drilling into one's teeth without anaesthesia. After being massacred by Prof Ellis for not knowing the muscles and nerves of the neck, we hoped for a little respect, lamenting, "Do you really want to hurt me, do you really want to make me cry?"

My deepest impression in medical school was that patients could access good medical care from dedicated healthcare staff in the ideologically-founded National Health Service (NHS), no matter king or pauper, saint or sinner, Man U or Liverpool. I remember pregnant single teen mothers, a Polish World War II war veteran with liver failure needing a new liver, a randy History professor with unstable angina desiring the nurses to sponge bathe him often, stone drunk hooligans battered from two football tribes going to war, West End girls battling that then mysterious disease called AIDS, children with cystic fibrosis drowning with every breath they took, and adults crippled by motor neuron disease and multiple sclerosis. We were at the womb-to-tomb ringside seats of birth, death and suffering humanity as Thatcher's privatisation of England, including the incredible shrinking hospital beds, was unfolding.

1987 saw the arrival of academic medical leaders to head clinical departments at Addenbrooke's Hospital. With the retirement of master clinician Lord John Butterfield as Regius Professor of Physic (Medicine) at the University of Cambridge, Sir Keith Peters, an internationally eminent Welsh nephrologist-immunologist, ascended the throne. His number two, the unassuming Sir Patrick Sissons is a clinical virologist and the current Regius Professor of Physic since 2005. Sir Leszek Borysiewicz, yet another clinician-scientist and a world authority on vaccines, is now Vice Chancellor at the University of Cambridge. As medical students,

we saw the transformation of Clinical Medicine to a strong Translational Medicine culture club of game-changing breakout discoveries, with Addenbrooke's Hospital next to the grey boxy building (function over form) of the Medical Research Council Laboratory of Molecular Biology, which spawned 13 Nobel Prize winners.

Even as we could see the importance of research to patient care, more than half my class would go into General Practice, a time honoured and highly respected career in the UK. In the NHS, the general practitioner is the cornerstone gatekeeper of healthcare. There was an article entitled "Why Medical School Should Be Free" published in the *New York Times* on 28 May 2011. In it, the authors, Peter Bach (Director of the Center for Health Policy and Outcomes at Memorial Sloan-Kettering Cancer Center) and Robert Kocher (a special assistant to President Barack Obama on healthcare and economic policies from 2009 to 2010), write that medical school fees create debts of about US\$155,000 on average. This pressures medical students to choose more lucrative subspecialties over becoming primary healthcare physicians, for which there will be a shortfall of 40,000 in the United States by 2020. Critics argue that this situation is not caused by the disparity of earning power alone, but also because primary healthcare in America is mired in ludicrous bureaucracy and inconsequential documentation over patient care, making it an unattractive career. In producing clinician-scientists in Singapore, especially at Duke-NUS, we must be mindful of their bread-and-butter challenges, seeing that the graduating pioneer cohort produced six marriages and four babies during their four years of medical school! You can't get money for nothing nor diapers for free.

During my med school days, I always tried to attend the National University of Singapore Faculty of Medicine Shield Playhouse whenever I came home from the UK for the holidays. More recently, I have had the privilege of doing so as a judge. There is huge talent and creativity among our medical students. A complete medical education must surely embrace out-of-classroom-and-ward experiences. We must never take away the students' sense of fun, indefatigable energy, faith in the system, hope in the never-ending story of Medicine, and empathy. *But the greatest of these is empathy.* **SMA**

Dr Toh's hostel room with a view: no PC, Internet, email, handphone, Skype, Facebook nor Twitter



Medical school days with old friends, L to R: Dr Lincoln Chee, Dr Chong Yap Seng, Dr Carolyn Kng, Dr Toh and Dr Sylvia Choo



Medical school days meant starting very early, pain, endurance and learning to pull together as a team

