

A Passion for Trauma Care

PROFILE



TEXT BY

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Dr Chua Wei Chong is a consultant general and trauma surgeon at Tan Tock Seng Hospital (TTSH). He is also the Director of TTSH Surgical Sciences Training Centre, member of the TTSH Clinical Board and Honorary Treasurer of the College of Surgeons, Singapore. Prior to joining TTSH, Dr Chua led a distinguished career in Singapore Armed Forces, completing his final tour as Chief Army Medical Officer and Commander, SAF Medical Training Institute. He was awarded the Public Administration Medal (Bronze) (Military) in 2011.

Trauma is a global epidemic, the leading cause of death in people below 40 years old in developed countries. In Singapore, trauma is the number one cause of emergency department admissions in all hospitals and the fifth cause of death across all ages. During my training years as a general surgeon, I saw how injuries, often resulting from accidents, could completely change the lives of both the injured and their loved ones. Even if a life was saved through timely surgery, the subsequent morbidity often adds to the burden of the family and society. My interest in this field of surgery was further cemented through my interactions with local and overseas mentors, all of whom, I noticed, possess an innate passion for saving lives emergently.

TIME IS LIFE IN TRAUMA CARE

In many industries and businesses, time is money. In trauma care, time is life. There are very few fields in medicine where time is such a critical factor. The term "golden hour of trauma" was coined to define life-saving procedures that must be done within the first few hours of trauma to prevent death. Notably, the three most common preventable causes of death are pneumothorax, haemorrhagic shock and loss of airway. If these conditions are

diagnosed and treated early, precious lives could be saved. Beyond these initial emergency management skills, a robust hospital trauma system is necessary to prioritise and treat the different injuries in order to achieve the best possible outcome for a polytrauma patient.



An important but uncommonly known role of a trauma surgeon is that of leading and coordinating the care of the critically injured patient. There is no room for a "fog of war" scenario in the resuscitation bay, where the emergency physician, general surgeon, orthopaedic surgeon, neurosurgeon and nurses have to determine the best course of action to take when every injured

organ is in urgent need of repair. Teamwork, mutual understanding and trust among the various specialists have to be built over years under the umbrella of the trauma service, so that once a decision is made, the team is aligned and will proceed with the plan together. I have always felt a sense of fulfilment and camaraderie while standing together with my colleagues in the intensive care unit discussing the next steps to take for a trauma patient.

Communicating and empathising with the loved ones of patients can sometimes be trying because of the emotionally charged atmosphere. An avenue for the family's grief, especially when not all patients will survive, needs to be provided. One of the greatest challenges is breaking the bad news to family members that their loved one is unlikely to survive from severe trauma, while supporting both the patient and the family in the last leg of their journey. These cases further strengthen my resolve to always do my best in providing optimal care for my patients.



REACHING FAR AND WIDE

In 2013, I made my first visit to hospitals in Phnom Penh, Cambodia, with my hospital's trauma director. I was moved by how keen the Cambodian doctors were to acquire more skills to manage trauma despite the lack of hospital resources. We felt that the best way to contribute to the country was to impart our knowledge and skills to them. Fortunately, we were able to obtain support from an official in the Cambodian Ministry of Health for a partnership with Calmette Hospital, a public tertiary hospital in Phnom Penh, to provide training for local doctors and nurses. After much planning, a memorandum

of understanding was signed between Tan Tock Seng Hospital and Calmette Hospital in January 2014, and the first Skills in Trauma and Resuscitation (STAR) course was conducted. Since then, we have sent teams to conduct basic, intermediate and advanced STAR courses at Calmette Hospital three times a year, and medical personnel from other local hospitals have also benefitted from attending the course.

In April 2015, I was informed that a young man who had sustained a serious head injury in a motorcycle accident was evacuated to Calmette Hospital. I was truly moved to know that the patient's life was saved partly because of the training and skills received by the Cambodian ER doctors. All the hard work and late nights put in to develop the STAR programme have been worthwhile; the sense of hope given to the patient's family is immeasurable. In order for such a collaboration to be effective in the long run, a sustainable presence in Cambodia is needed to continue this training journey and to nurture the next generation of life-savers.

Nine years ago, I was part of a small group of trauma surgeons who organised the first Singapore Trauma Conference. We had the privilege of having world-renowned experts share about trauma care, and the conference has steadily gained prominence as a regional trauma conference attended by doctors and nurses in the Asia Pacific region. Today, Singapore's advancement in

trauma care is recognised by many countries, thanks to Singapore Trauma, the work of the National Trauma Committee, and Singapore's comprehensive participation in international trauma-related events.

In the last three years, I have travelled to a number of countries to conduct talks and courses, such as the International Advanced Trauma Life Support Provider course in Myanmar and Mongolia. While I continue to provide trauma care to hospital patients, I believe that by sharing my knowledge and skills with my counterparts in the region, I will be able to help even more people. Although every trip presents different challenges and experiences, there is always one constant: the desire to save the life of a fellow human being. Verbally, we may speak different languages, but our hearts speak the same language. ♦

Legend

1. Dr Chua conducting the Advanced STAR Course in Cambodia, focusing on operative damage control surgery
2. The Memorandum of Understanding Ceremony between Tan Tock Seng Hospital and Calmette Hospital in January 2013
3. Dr Chua teaching airway management at the inaugural Advanced Trauma Life Support (ATLS) Provider Course in Mongolia in 2015

