2025 Medical Elective at Mae Tao Clinic

Report for Office of Global Health, University of Sydney

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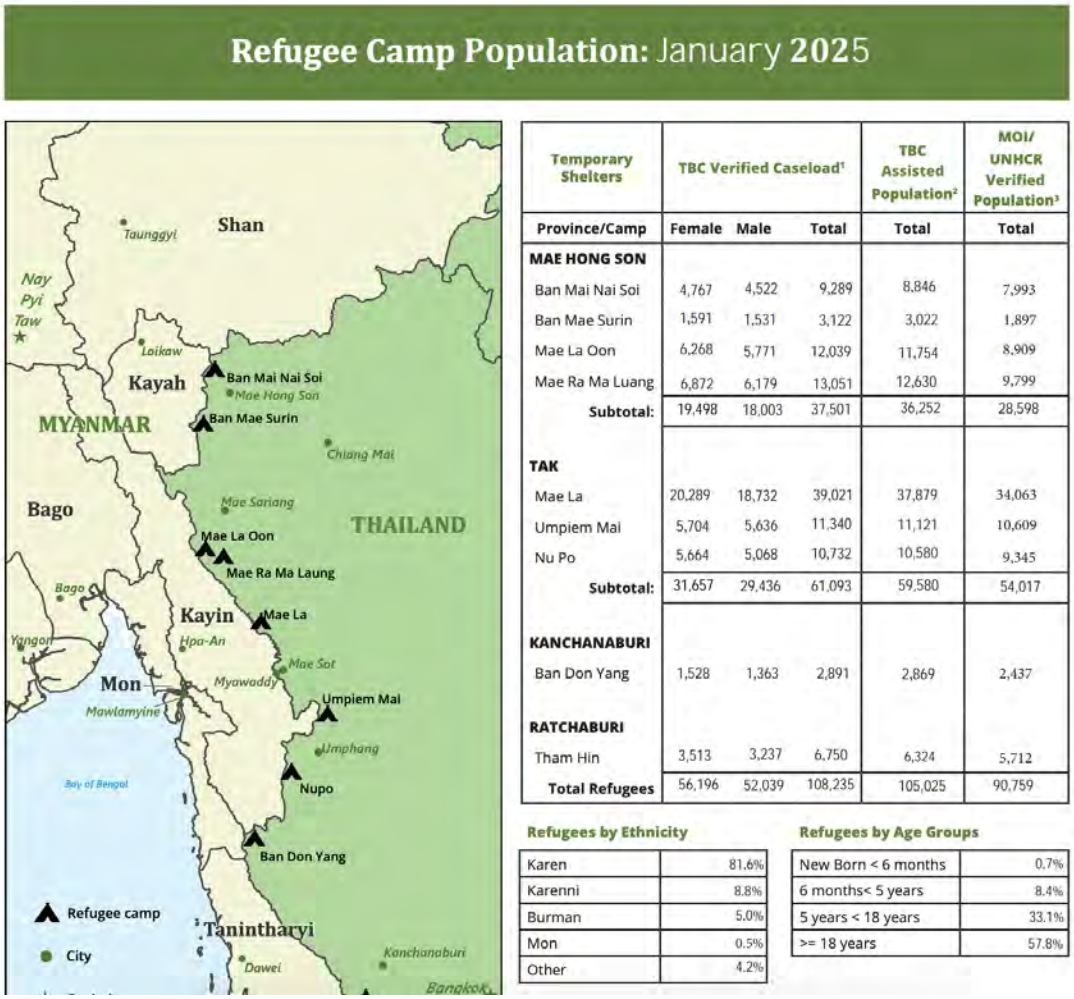
This report details some background and context of the Mae Tao Clinic, my motivations for choosing it as my clinical elective, my impressions of how medical care is provided in a resource-constrained context and the impact that the experience has had on me. I also provide excerpts from my interview with one of the Burmese medical interns at the clinic about his experiences before and during joining the clinic.

Background and context

The Mae Tao Clinic was set up by Dr Cynthia Maung in 1989 to provide primary health care to refugees, migrant workers and others displaced during the Burmese student pro-democracy movement in the late 1980s. The clinic is located just outside of Mae Sot, a small border town about 4 hours' drive from the next nearest Thai town, Sukhothai, and is 12km from the Burmese border. Since its inception, the clinic's scope of service provision has widened as the local population of informal migrants has grown, increasing demand for healthcare amidst the developing conflict across the border.

Recently, the 2021 military coup which overthrew the democratically elected National League for Democracy sparked the beginning of mass protests and a civil war that plunged the country deeper into crisis and disenfranchised millions of civilians, such as many of those living within Karen state in Myanmar's east. Additionally, in 2023 Cyclone Mocha ravaged western and central Myanmar, straining the already vulnerable healthcare infrastructure of Myanmar. Adding further stress, the week before my arrival, the newly appointed Trump U.S. administration dramatically cut funding to its foreign aid programs, shutting down the nearby Mae La refugee camp's healthcare provider and gutting a substantial proportion of the Mae Tao Clinic's finances.

I applied to undertake my elective at the Clinic because I hoped that the experience of working alongside its medics would closely match my motivations for studying medicine. Over the course of my undergraduate studies, I became increasingly concerned that the world's future will be marked by turmoil due to environmental pressures and the international conflict that both stems from and amplifies these pressures. These twin dynamics already affect countries most exposed to climatic disasters, with histories of colonial subjugation and fewer material and institutional resources to absorb these impacts. With the generous assistance of the Jackson family, sponsors of the Carl Richard Jackson sponsorship, I used the medical elective as an opportunity to step outside of my comfort zone and to experience healthcare in a very different setting; one which would expose me to the future of healthcare in an unstable world.



Temporary Shelters	TBC Verified Caseload[1]			TBC Assisted Population[2]	MOI/ UNHCR Verified Population[3]
Province/Camp	Female	Male	Total	Total	Total
MAE HONG SON					
Ban Mai Nai Soi	4,767	4,522	9,289	8,846	7,993
Ban Mae Surin	1,591	1,531	3,122	3,022	1,897
Mae La Oon	6,268	5,771	12,039	11,754	8,909
Mae Ra Ma Luang	6,872	6,179	13,051	12,630	9,799
Subtotal:	19,498	18,003	37,501	36,252	28,598
TAK					
Mae La	20,289	18,732	39,021	37,879	34,063
Umpiem Mai	5,704	5,636	11,340	11,121	10,609
Nu Po	5,664	5,068	10,732	10,580	9,345
Subtotal:	31,657	29,436	61,093	59,580	54,017
KANCHANABURI					
Ban Don Yang	1,528	1,363	2,891	2,869	2,437
RATCHABURI					
Tham Hin	3,513	3,237	6,750	6,324	5,712
Total Refugees	56,196	52,039	108,235	105,025	90,759

Refugees by Ethnicity

Karen	81.6%
Karenni	8.8%
Burman	5.0%
Mon	0.5%
Other	4.2%

Refugees by Age Groups

New Born < 6 months	0.7%
6 months< 5 years	8.4%
5 years < 18 years	33.1%
>= 18 years	57.8%

The Mae Tao Clinic's catchment and local refugee camps and their populations. The Mae Tao Clinic is located 15km from Mae Sot. Source: The Border Consortium (2025), URL: https://www.theborderconsortium.org/resources/key-resources/camp-population/.

My role at the clinic was to rotate through the departments, including reproductive health, surgical and medical inpatient, medical outpatient, and paediatrics. As I was the only foreign student at the clinic at the time, there was flexibility about how long I could stay in any one department. Initially, I observed to gain some awareness of the workflow and customs before getting settled and working with greater independence.

Providing resource-limited care in tropical medicine

I was initially impressed by the types of pathologies with which patients presented to the clinic. Some were novel to me, a result of the local tropical climate – including infectious diseases such as malaria, dengue, HIV, leptospirosis, scrub typhus, and their sequelae. Many more were chronically unwell patients who presented to the clinic with longstanding complications of their conditions, such as massive ascites in cirrhosis caused by Hepatitis-B or hydrocephalic meningism caused by reactivated tuberculosis.

While some patients presented with disease progression that was far more progressed than one regularly sees in metropolitan Australian hospitals – unsurprising given the

barriers to accessing routine health checks – there were also many patients presenting to the clinic with relatively minor complaints e.g. diabetes check-ups, reflecting high widespread health literacy and care-seeking. Despite the challenges accessing the clinic – detection by local border police means a hefty fine and deportation – many will cross the river border (oftentimes as pregnant women in active labour) to seek out the clinic. Daily arrivals of amputee patients seeking prosthetic limbs and physiotherapy were a stark reminder of the conflict raging just across the border.

The clinic is not formally recognised by the Thailand government and receives no government funding, instead relying on NGOs, foreign aid, and private donations. It provides its services for free to its patients and asks only the names of the patients' parents and their birth village as proof of identity. Patients requiring critical treatment that the clinic is unable to provide, such as emergency surgery, are referred to the nearby Mae Sot Hospital, although beds for undocumented and non-paying patients are never guaranteed, and the possibility of a police officer visit upon discharge always looms.

While most of the clinic's patients have no financial resources or ID required at formal health clinics or hospitals, and despite the clinic's limited resources, many will actively seek out the clinic for its quality of care and also for the trust and cultural connection they share with the medics and staff – most of whom are also Karen Burmese – and their concomitant lack of trust with the Thai government health system.

In these circumstances, the medics, nurses and doctors at the Clinic do exceptionally well to provide high-quality and culturally safe care. Despite lacking many investigations such as X-Ray or CT imaging and all blood tests save for full blood counts, pregnancy and malaria tests, the physicians employ finely tuned physical examination skills and clinical scoring systems to ascertain differential diagnoses, and extensive experience to triage common conditions such as stratifying the severity of a patient's Dengue fever.

Of course, management was hampered by resources and usually restricted to supportive care and simple pharmacological and procedural intervention. It was challenging to witness less-than-gold-standard treatment for some conditions, for example the general provision of conservative antibiotic therapy for non-ruptured appendicitis, or the decision to discharge home an infant with cyanotic signs and heart failure secondary to valvular heart disease on merely diuretic medication. However, I had to remind myself that these were decisions being made in a context where the next best alternative was no care at all.

The arrivals area at the Mae Tao Clinic

Central waiting area at the MTC

The reproductive health ward

Developing my own clinical skills and experience

Reproductive Health

My first rotation, through the reproductive health department, gave me the opportunity to witness and take part in over a dozen vaginal deliveries, perform admission work-ups for women entering active labour where I could extensively familiarise myself with fetal ultrasound, brush up on neonate physical examinations and conduct routine postnatal mother and baby checks. The high patient load meant that I was able to use quantity and repetition to quickly improve these skills (which I had not been able to in Sydney, Australia).

I also visited the outpatient reproductive health services, which also includes family planning services and teenagers' sexual health consultations. I learnt that these services are critical to the promotion of public health measures and have an outsized impact on improving the community's wellbeing due to maternal safety. Maternal mortality rates are very high in the conflict zones of eastern Myanmar, from which Mae Tao Clinic's intakes originate -- 7 per 10,000 live births (2013), caused by postpartum haemorrhage, hypertensive disorders, sepsis, and consequences of unsafe abortions. The reproductive health clinic and its associated organisation, the Shoklo Malaria Research Unit, play an important role in improving maternal mortality outcomes in the region. While rotating through this team, I also assisted with auditing the Hepatitis B screening program for mothers arriving at the antenatal clinic and helped prepare a report for their policy outreach team.

Some issues faced by local pregnant women here include Hepatitis B infection (~3.5% of first presenting ANC visits at the clinic) and HIV transmission. Some of the issues faced by local newborns include G6PD deficiency, prematurity, ABO incompatibility and thalassaemia. The clinicians were excellent at identifying early warning signs of seriously unwell babies and mothers who were expediently referred to the local hospital. This was also the case with a mother with moderate pre-eclampsia who I observed labouring for several hours without progression of the baby's station.

I also learnt more about the uneasy process of registering births where almost all the mothers were undocumented migrants. In Thailand, citizenship requires a parental line of citizenship. However, if the parents were able to afford it, and the service was actively running, they could apply for a birth certificate, which would be coordinated through a liaison who would travel to and from Bangkok. These would confer on the child the right to stay for ten years and obtain a primary-level education. However, if either condition were not fulfilled (the parents impecunious or the service not operating), then the children would be left effectively without proof of birth, belonging neither to Thailand nor Myanmar, and invisible to the states that provide protection, services, and benefits. Many were stuck in this crack between the two states.

In-Patient medicine

My next rotation was the medical inpatient department. The medical IPD is a catch-all of pathologies - spanning the full gamut of presentations from respiratory, neurological haematological, autoimmune, gastrointestinal to cardiac disease. Each day, I participated in early morning observations and physical examinations before accompanying in the ward round. These were an excellent opportunity to develop my physicians' examiners' skills and also observe how the local doctors used their limited resources to treat complex disease.

I examined one patient in particular who left an enduring impression. He was an adolescent admitted to the clinic after a fall from a height and receiving an emergent tracheostomy in a nearby hospital. He had clear neurological deficits and was worked up by the hospital yesterday as a cervical spinal cord transection. I had never attempted to establish communication with a paralysed patient before. I worked with a fellow intern to establish a method of communication through affirmative blinking and set out to undertake a full neurological examination. Having lost other means of communicating, his eyes were remarkably expressive and palpably showed his shock and fear at his newfound condition. Throughout the day, I could not stop thinking about the boy's vulnerability and dependence on his treating health workers to be safely shepherded through this transition to a new, very different life.

While visiting the paediatric ward, I was able to observe a fascinating and complex case. The child was four years old and had previously been in contact with the clinic due to anaemia and splenomegaly attributed to HbE disease and had begun triple therapy for meningitis caused by tuberculosis. Now, the child presented with symptomatic pancytopaenia. Together with the paediatrician, we considered whether this was a complication of the existing HbE, iatragenic bone marrow suppression due to the anti-TB

treatment, an aplastic anaemic crisis caused by a superimposed viral infection, or a new haematological malignancy. Ultimately the child was referred to the public hospital, although we were no longer able to follow-up her outcomes once she left the clinic.

Ward rounds at the medical IPD; Bedside ultrasound to investigate a pericardial effusion, plugged into an iphone with an app installed to operate the device.

Out-Patient Medicine

The outpatient clinic presented an exciting opportunity for me to develop independent clinical habits in a general practitioner-style setting. Each morning, I would arrive to a line of patients admitted from the community and attend to them with an accompanying medic who could both translate and assist with clinical decision-making. We saw a wide variety of ailments, such as rheumatic joint pain, fatigue, post-viral thyroiditis, abdominal pain, an incarcerated inguinal hernia, renal colic, and liver cirrhosis with massive ascites.

I was challenged by several of these cases. The two most challenging cases presented with fatigue and post-viral thyroiditis, respectively. In the first, I took an extensive history and examination - revealing several days of dyspnoea and sternal chest pain – but no other remarkable findings. I felt an intense wish to give some closure via diagnosis and treatment, understanding that she had taken significant risk and effort coming to the clinic and would be unlikely to return again. However, I was at a loss as to what to offer. I tentatively suggested an exposure-sensitivity bronchitis and a short course of oral prednisolone, but that was waved off by the consulting outpatient physician, who suggested it was likely an acute stress response and that no treatment was required.

In the other case, of post-viral neck-swelling, I was challenged by the decision of whether to admit a potentially critically unwell patient. The patient presented with painful swelling

extending from her lower jaw midway down her neck, painful swallowing and a hoarse voice and a history of recent viral illness. Trained to always escalate a patient with a potentially threatened airway, I initially considered that perhaps her condition was a simple post-viral thyroiditis that did not strictly warrant admission in an Australian hospital. However, there was every possibility of a more sinister pathology at play, such as a bacterial infection of the mouth's soft-tissue, and without further investigations at hand, I opted to return to first principles and advocated for her admission, given the possibility of an imminent airway collapse with a potentially catastrophic outcome.

Working the outpatient clinic, Feb 2025

Excerpts from an interview with a Burmese medical student interning at the Clinic

The more time I spent at the Clinic, the more that I gravitated toward the Burmese medical students and interns, who were on their third 'final' year of studies. Since 2021, they moved to the border area to avoid conscription, later volunteering and afterward working at the Mae Tao Clinic. They continue to maintain their studies and complete examinations with the expectation that their university should graduate them eventually.

I sat down one afternoon and spoke with one of the Burmese medical students, who was happy to tell his story and have it reproduced on condition of anonymity. I copy some extracts below.

"After the military coup… I did not return to study at the government university and joined the CDM (Civil Disobedience Movement), which conscientiously objects to the military government and requires its adherents to reject the military's institutions, including the universities. As a result, I did not attend my classes, and I was expelled…

The revolutionary National Unity Government (NUG), formed by the National League for Democracy in exile together with ethnic authorities [of the various states of Myanmar] has enabled us to continue to study. Some universities in Thailand and other countries will accept and recognise the documents certified by the NUG and enable us to practice in these countries.

Many of my friends, and other medical students, have joined the People's Defence Force and took up arms - pausing their studies. Some have died in the war, especially in the early 2021 rallies, while others died in detainment. One of my professors died in prison. Other doctors died on the road out of Myanmar trying to escape."

Regarding when he decided to leave Myanmar:

"The main concern was the conscription law of 2024 that required every man 18-35 to present themselves for registration… My family encouraged me to leave, even though I wanted to stay in my country… I was lucky because soon after I left, the government has made it very difficult to obtain passports and leave the country.

My other sisters also left the country… My family has not yet been threatened but we worry that this is in our near future… We are constantly asking our parents to come with us and live in Thailand. But they don't want to leave."

Regarding how he would complete his studies, and what he planned to do after*:*

"… To complete my surgical term I have to join the frontline camps within the NUG-controlled areas where we can treat ethnic groups there… Going to the frontline camps is very treacherous - there's obviously the risk of getting drawn into the ongoing conflict."

On his options once he completes his studies: *"Some options for us include returning to work for our ethnic groups, going to Bangkok to apply for further studies, or applying to go to a third country… Most of us are hoping to complete medicine and work as doctors but to do so in the righteous way … Definitely [I hope to return to Myanmar] but only if the CDM is successful and the NUG comes back to power.…*

Ultimately, I was hugely impressed by how the medical staff of the Clinic (many of whom were younger than me and yet had already experienced far greater hardships) accept their challenging circumstances as motivation to continue to provide healthcare to

others in need. Further, the clinic's commitment to treating all those who come through its doors regardless of means of identity was an inspiring reminder of our vocation's commitment to upholding the fundamental dignity of humanity.

Final Reflections

I am very grateful to the Jackson family for selecting to support me through the Carl Richard Jackson Scholarship. As I hope this report indicates, their funding has given me the opportunity to experience a side of medicine that I would never have been able to otherwise experience as an Australian student. It has opened my eyes to the huge impact of obstetric care and family planning services in conflict settings, the importance of developing a rigorous attitude to physical examination for such settings and has given me further inspiration to be a helpful critical-care oriented doctor with capability to be deployed in these environments. I am more firmly convinced than ever that we, as doctors who have benefited from the privilege of Australian medical education, ought to employ our skillsets in the service of the vulnerable if we are to protect human dignity at its most imperilled.