

AMSF Travel Scholarship Report

Recipient: Edward Miller

Destination: Nepal



**ADELAIDE MEDICAL
STUDENTS' FOUNDATION**

My placement was completed at the Tribhuvan University Teaching Hospital, a 1300 bed hospital in Kathmandu, Nepal. The four weeks were spent with the neurosurgical department, and it was an amazing experience. It included watching neurosurgery operations, going on wards rounds, copious evaluations of CT's, MRI and XRAYs, outpatients, and plenty of learning experiences with our friendly and inviting team.



Days begin with the morning general surgical handover at 8:30am. The tired residents present all the cases from the wards, ICU, recovery and pediatrics, as well as all newly admitted patients from ED, from the previous day and evening. The professors sit on one side of the room, the students, interns and residents on the other, all in their gleaming white coats and dusty sneakers. The professors occasionally ask disinterested questions of the residents on an obscure topic, whilst they are served tea by the energetic old tea man.

Following this is the neurosurgery ward round. Lead by Dr Gopa, with residents Dr Ali, Dr Amit and Dr Ram, all the neurosurgery inpatients are evaluated over the following 3-4 hours. Throughout my time, I saw many fascinating cases. One was TB meningitis complicated by a granulomatous tumour – for which the patient was eventually investigated due to 6 years of seizures unremitting with anti seizure medication. Another was a compound C₁,C₂ fracture after a fall from stairs – the patient was in a neck brace

for 2 weeks as there was no spinal team functioning that could have operated. There was the case of the 7 year old girl with pronator drift and mouth droop, found to have a huge hydatid cyst in her brain which the family could afford to have excised. There was the 5 day old infant with Dandy Walker syndrome, who had hydrocephalus, repeated seizures, and whose MRI showed an underdeveloped cerebellum with no vermis – a common finding in the Dandy Walker spectrum of posterior fossae malformations. That little infant's family could not afford further treatment either. In NICU that day as well there was also an Arnold Chiari malformation with a meningocele in another newborn infant. That child was in shock after a peripheral drain failed to relieve the symptoms of hydrocephalus. There was also another meningocele, this time in a seven year old – unheard of in Australia for that to present so late. This child had urinary symptoms and weakness, but surgery would be done for cosmetic purposes only. The damage had been done.



This was all on my first few days. But I saw many other fascinating cases throughout my time there. My first time in surgery I witnessed a craniotomy for a patient with Bell's palsy – trying to remove an artery lying close to the 7th nerve that was irritating it and causing the pain – only the dura was too vascularized to cut through without severe bleeding so the operation was abandoned. I saw pituitary tumours with classical signs of hypertension and bitemporal hemianopia. I saw plenty of cases of hydrocephalus and the various shunts – peritoneal, atrial, external. I saw a case of internal carotid artery aneurysm causing abducens nerve compression. In surgery I saw many brain tumour excisions – gliomas, oligodendromas, meningiomas – all with accompanying craniotomies. I saw transphenoidal pituitary tumour removal. I saw aneurysm clippings – all ACA now that I think about it, as well as decompressions for hemorrhagic strokes. In Australia these aneurysms would have been done endoscopically with coiling but in Nepal they required huge craniotomies. There was one poor lady who had bilateral ACA aneurysms, who needed to be sent away for endoscopic surgery. I saw a colloid cyst causing pathology in cranial nerves 5, 7, and 8 due to its CP angle location; and another colloid cyst, in another patient, causing sylvian aqueduct compression and obstructive hydrocephalus. I saw an interesting case of a lymphangioma in the internal cone of the rectus muscle of the



eye, which then extended up to the cavernous sinus. There was the fascinating case of the lady with a cystic hygroma growing in her subdural space; the shunt became infected and she then developed peritonitis. I saw an AVM with haemorrhagic transformation. I saw a spinal surgery involving decompressive laminectomy due to a schwannoma growing in the thoracic spine. I saw cases of neurocysticosis as well as hydatid cysts.



This SCAP has been fantastic as it allowed me to see first hand many complicated neurogenic diseases and their fascinating presentations. I was able to see so many clinical signs for the first time on the patients, and then look at the CT scans and MRI's, and confer with the team what was going on. The team were great at asking me questions and getting me to extend my learning. I have gotten better at reading MRI's and CT scans. I have also witnessed neurosurgery and realize how long and tedious this type of surgery can be at times;

how painstakingly laborious it is for such small increments in improvement on the patients part. I felt more like a doctor than I ever have, and I also had a lot of confidence in my own ability and recognizing that I do know a lot of things and I have the wisdom to use that knowledge as well. I recognized how crucially important communication, teamwork, give and take, and efficient impersonal reasoning is in order to get the best outcomes. Being able to discuss matters openly, fairly and reasonably is so important in creating an effective team, as well as a good heart and a lot of humour along with the seriousness.

I learnt about the difference in the healthcare system between a third world and first world country – in short, how lucky we are to have clean hospitals. Even though our system seems laborious and clunky at times, it really seems the lesser of two evils. I recognize how people often do the best with what they've got, save for the occasional corruption and malevolence which seems adept to human behavior. But this aside people genuinely seem to have this behavior of getting on with it and doing what needs to be done. This I greatly respect and admire – if you can do this, do your part, do what needs to be done but at the same time mind your own business and have a nice smile on your face, you can do a lot in this world. The contrary is true also – a grumpy face, a sour attitude, a



rushed, impersonal demeanor, even on the shortest ward rounds, can dramatically change the season of moment and make it more tiresome and burdensome for everyone. Particularly here, where there are no computers, nothing really works the way you want it to, and there is consistently no toilet paper in the bathrooms.

I want to thank Dr. Gopa, Dr Ali, Dr Amit and Dr Ram for inviting me into their team and giving me such a fantastic experience in the neurosurgical department of Tribhuvan University Teaching Hospital.

I also want to thank the AMSF for helping to make this trip possible. It's fantastic that we Adelaide University medical students have a great organization that exists to help us and is there to encourage us. Thankyou so much.

