Military & Hospitaller of St Lazarus of Jerusalem
Grand Priory of England & Wales
Commandery of Wales

Bursary Student Elective Report 2019

Plastic surgery elective in Comprehensive Rehabilitation Services in Uganda (CoRSU) – Week Three

DAY 1

Today I went and shadowed the orthotics and prosthetics team. Joyce, one of the technicians, showed me how they build a splint from scratch – first casting the limb using plaster of Paris, then filling it, then melting plastic in a very hot oven to make the outside hard. They also hand make specialised shoes, such as those for patients with a shortened femur and shoes with softer soles for patients with bony abnormalities such as a calcaneal spur. Lastly she showed me the different prosthetic devices they have, for amputees below knee, above knee, transfemoral and so on. I was fortunate to meet a patient on his second day of using his new prosthetics – he was 57-years-old and had been in a wheelchair for four years following a bilateral above knee amputation due to gangrene. The prosthetics are expensive and initially he just didn't have the money. Prosthetics can cost at least 3.5 million shillings each for an adult (about £720), which for some Ugandans is completely unaffordable, let alone for two. Joyce told me that it can take adults up to one month to learn to use their prosthetics comfortably, but active children can learn in just one day! I also met a little girl who had lost her right leg below the knee due to burns. Her prosthetic had become too small and needed to be replaced. It had caused some wounds from rubbing her so much. Joyce advised that she bandage the knee and go without the prosthetic until the wounds healed, whereupon they could build her a new prosthetic.

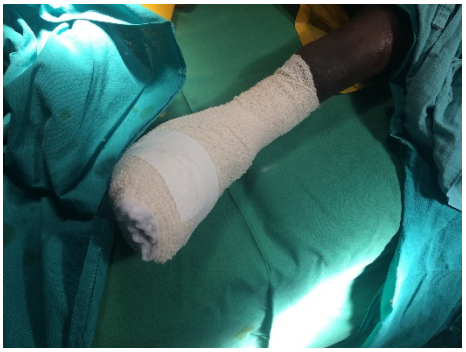
Miriam Nyeko-Lacek

The waiting area for the orthotics and prosthetics department

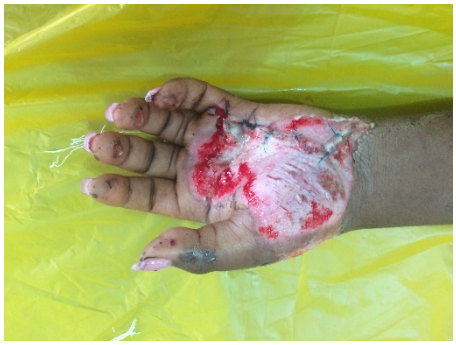
Shaping a splint

DAY 2

This morning I went to see our 14-year-old desmoid tumour patient. She is doing really well, and is able to flex her knee and has some sensation in her foot. I then went to theatre and scrubbed in to assist with a 2-year-old child with a post-burn contracture of the left foot. The final case of the day was a debridement of the wounds of a 29-year-old who had been involved in a nasty road traffic collision involving a bus. She had some very deep, painful wounds. They will eventually need at least a split skin graft, as a lot of muscle has been exposed, as well as her left tibia.



The post-burn contracture patient after surgery

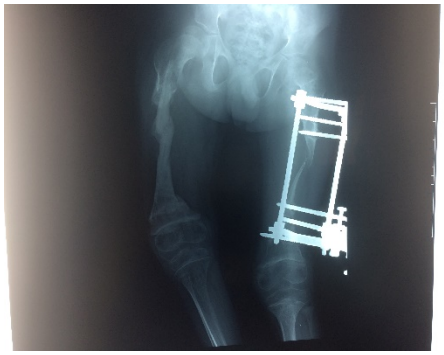


The wounds of the road traffic collision patient

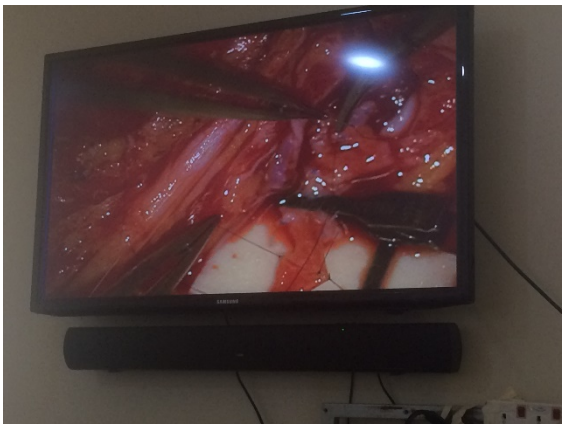
Miriam Nyeko-Lacek

DAY 3

Today was another fibula free flap, although this time the flap was from the right fibula to the left femur. This patient also had congenital pseudoarthrosis, although this time had had bilateral femoral fractures. The patient was a 9-year-old male, but he was very tiny, weighing only 17kg. He was also quite tearful before the operation, as he has had to have so many interventions over the years. I assisted with ventilating the patient, and scrubbed in towards the end, to help close the wounds.



The fibula free flap patient's radiograph before the surgery

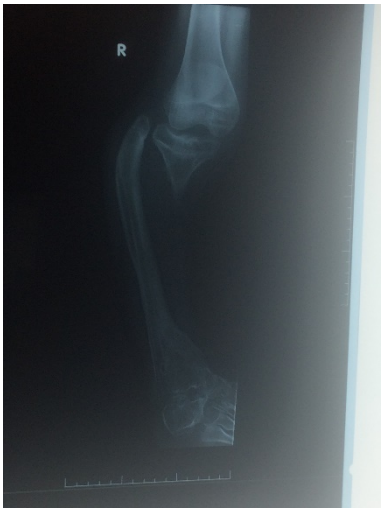


Watching microsurgery on the big screen

DAY 4

This morning we had two cleft lip surgeries on babies, 4 months and 10 months respectively. In the afternoon there was a 13-year-old female patient who was having a tibialisation of the right fibula due to chronic osteomyelitis. This is not something I'd heard of doing before, so I was very excited to scrub in. The surgeon started by dissecting the tissues around the fibula. The surgeon then used the bone saw to trim the fibula down, in order to fit it into the space available for the tibia. We then used drills to fix the new tibia in place with wires. Finally, we sutured the wounds closed – I learnt a new type of suture for this! I really enjoyed today's case, it was great to use such a variety of surgical techniques.

Miriam Nyeko-Lacek



Our patient's lower leg before the operation. Osteomyelitis has completely destroyed her tibia

DAY 5

Today I saw our desmoid patient in physiotherapy. She is now out of bed and walking with crutches. I then went to theatre and assisted with three cases. The first case was a 4-year-old girl with a post burn contracture of the axilla and jaw. The second was a 5-year-old patient with large keloids on his chest and chin. The keloids were very extensive, most of his upper chest was covered with scar tissue. We used insulin needles to inject a steroid (triamanolone) which helps soften the keloids and prevents them increasing in size. This can be a very painful procedure, even for an adult, which is why this was done in theatre, so that the child could have some anaesthesia on board. The final case was a 3-year-old with polydactyly of the right little toe. For this case, I acted as scrub nurse, helping to sterilise the patient's leg and drape the operating table. I really enjoyed today, it felt very hands on. The day finished with some cake, as two trainee anaesthetists were leaving. You can see written on the cake "Webele nyo" which means "Thank you" in Luganda.

Suturing the skin graft of the post-burn contracture patient

Miriam Nyeko-Lacek