## ELECTIVE (SSC5c) REPORT (1200 words)

A report that addresses the above four objectives should be written below. Your Elective supervisor will assess this.

Tropical diseases are undoubtedly one of the biggest differences in paediatric medicine between Malaysia and the UK. I observed a patient who had been admitted with dengue fever, a condition I was unfamiliar with prior to this placement. This has again brought to light how important it is to understand what effect the environment you are in, can have on your patients; be it rural or urban, an area of poorer social/economical status or tropical country. This 6 year old child, diagnosed with dengue fever, presented non-specifically with a febrile illness. Dengue fever is transmitted by the bite of a mosquito; it affects infants, young children and adults with symptoms ranging from a high temperature, headache, retro orbital pain or bone, muscle and joint pain. This child was managed supportively with paracetamol, drinking plenty of fluids and bed rest as there are no specific medications or vaccines to treat this condition. (1)

Dengue fever has been of increasing concern this year in Malaysia, with far more cases being reported in February 2015 than during the same time-period last year. Health officials put the country's dengue tally at 22624 through February 2015, and the total number of deaths this year-to-date at 54. (2) In 2014, in fact, Malaysia saw a significant rise in dengue, a three-fold increase from the previous year. (2)

There has also been a recent outbreak in measles, a condition that I haven't seen in the UK, however one that I am more familiar with. Having now observed the condition first-hand, I was able to apply my prior knowledge to the patient's presentation of a maculopapular rash, koplik spots and bilateral conjunctivitis. Speaking to the doctors on the ward, I learnt additional features that are useful for recognising a child with measles, including a rash that quickly spreads from the face to the body, and the body rash which is less pruritic than that of the face. One of the reasons for this outbreak can be attributed to a lack of immunisation in some children, another the choice to use herbal products as opposed to conventional medicines, possibly influenced by different cultural beliefs in Malaysia. Despite full prior immunisations, there was however one 11 year-old child who was diagnosed with and is being treated for measles.

With the exception of said tropical disease and communicable diseases that are usually prevented by childhood immunisation, such as measles, other common conditions seen by the paediatric team in Malaysia are similar to those regularly seen in the UK, both within primary care and the hospital setting. These are mainly respiratory airway diseases and infections such as asthma, bronchiolitis and otitis media.

Malaysian healthcare is the responsibility of the government's Ministry of Health. It operates a two tier healthcare system with a government-run universal healthcare system, running in parallel with the private healthcare system. Hospital Kuala Lumpur is the largest hospital under the Ministry of Health of Malaysia; as a tertiary referral hospital, it operates 53 departments, 28 of which are clinical. (3) Upon speaking to some of the junior doctors on the paediatric ward, I gained further insight into the early stages of child healthcare and how children can be referred to hospital, if poorly. There are 3 main ways of referral: parents can take their child to a family clinic without the need for the child to be a registered patient, can go to the outpatient department, or can go to the accident and emergency department. Usually, children are safe enough to be managed by the family doctors; however, a lot of parents tend to bring their children to the hospital accident and emergency department with relatively minor

ailments such as the common cold. The accident and emergency department, however, also operates a traffic light system in order to help triage their patients according to their need of an immediate assessment and subsequent management; increasing in severity with green representing mild, amber as moderate and red as severe.

Similarly to the UK, parents in Malaysia are given a red book for the paediatric team to record the wellbeing of their child at routine checks. Parents are advised to bring this book to any further appointments or if their child is sick and brought to hospital. This book is used to record various indicators of a child's well-being for their early years; the child's weight and height will be plotted on a centile chart to monitor their growth; all immunisations are also recorded and should be used as a reference point if a child presents sick with a fever. In addition, the child health book in Malaysia contains information on a child's milestone development with images representing the stages of various categories;

- physical
- cognitive/mental
- social/emotional
- communication/language

Malaysia has experienced dramatic improvements in health, particularly that of maternal and child health. Child mortality, recognised as the best indicator of the well-being of a child population has seen a vast improvement over recent decades. Reported infant mortality rate has declined from 41 per 1000 live births in the 1970s to 13.0 and 7.0 in 1990 and 2012 respectively. (4,5)

I have learnt, from speaking to senior doctors on the ward, about some of the measures put in place to improve infant mortality rates, for example, health improvement strategies to address common but potentially life threatening issues that affect children such as oral rehydration for the treatment of dehydration. Public health care initiatives have also contributed to the improvement of healthcare including the control of communicable diseases such as malaria and tuberculosis and better access to immunisation. Other substantial contributors to the dramatic decline of infant rate mortality since the 1970s are better access to clean water, improved sanitation and better child nutrition.

I was surprised to learn however of the 6 children being treated for measles on the paediatric ward, during my first week. Whilst the issue of accessibility of immunisation has improved, my experience in Malaysia has highlighted the importance of public health care promotion, particularly in developing countries through educating parents who care for these young children.

During my placement in Malaysia, I have also learnt how essential it is to establish a good rapport with a patient's guardians, where cultural beliefs play a huge part of their community. If care is not taken, this can potentially cause a breakdown in communication and trust of the professional relationship between a patient and/or guardian and their doctor. Education has been highlighted further as having a huge impact upon primary health prevention, most important perhaps in this context is to increase levels of immunisation against infectious diseases. The importance of recognising the signs of an ill child from simple measures such as inspecting the child from the end of the bed using respiratory rate, colour and dehydration status has been further reinforced.

References

(1) Dengue, NHS choices. September 2014, UK, accessed 1st May 2015. http://www.nhs.uk/Conditions/dengue/Pages/Introduction.aspx

(2) Dengue fever deaths. February 2015, UK, accessed 1st May 2015. http://outbreaknewstoday.com/dengue-fever-deaths-up-to-54-in-malaysia-44015/

(3) Hospital Kuala Lumpur, Ministry of health Malaysia. May 2015, UK, accessed 2nd May. http://www.hkl.gov.my/

(4) State of the World's Children, Malaysia, UNICEF. UK, accessed 2st May 2015. http://www.unicef.org/malaysia/sowc\_08-childsurvival-malaysia.html

(5) Child and Maternal health in Malaysia, Commonwealth health online. UK, accessed 2nd May 2015.

http://www.commonwealthhealth.org/asia/malaysia/child\_and\_maternal\_health\_in\_malaysia/