



YOUNG DOCTORS SUMMER SCHOOL

2012 Schedule

Day 1 :

10.30 – 10.45: Welcome and Introduction

10.45 – 12.00: Dealing with Patients

As an introduction to the world of medicine, students will learn the skills that doctors employ to get useful information from patients. We will be looking at what sort of information medical professionals need, what sort of questions they ask and how a description of pain is categorised using the SOCRATES acronym. The young doctors will then be able to try out their skills of patient interaction in a role-play exercise trying to find out information to make their diagnosis and practice delivering the results to patients and explaining the symptoms and consequences of medical conditions.

12.00 – 1.00: Lunch

1.00 – 1.30: Introduction to Neurology

Neurology is the study of the brain and the nervous system. Students will get a grounding in the basic principles of how the brain works, how it transmits signals to your muscles and organs including the role of synapses.

1.30 – 4.00: Vision, Hearing, Somatic Sensation and Reflexes

Students will be guided through the senses and reflexes, learning how we see, how we hear and the different ways we feel heat, pain and touch. Each section will give the students an opportunity to conduct experiments and tests, learning how doctors test for any problems with our neurological system.

4.00 – 4.30: Neurological Conditions

The final session of the day will show students some of the conditions and diseases which can be caused by neurological problems. We will particularly look at the symptoms, diagnosis, mechanism and treatment of Muscular Sclerosis with an interactive case study.

Day 2:

10.30 – 12.00: Haematology

This session introduces students to the study of blood. We will be covering the function of blood, the types of blood cells and the ABO blood groupings. Students will get the



opportunity to test out their knowledge with a quiz working out potential blood groupings. We will take a look at the problems which can arise with the blood including the Rhesus factor and haemolytic disease, and will also examine case studies in anaemia and septic shock.

12.00 – 1.00: Lunch

1.00 – 2.30: Medical Ethics

A vital part of being a doctor is an awareness of the ethical issues that must be taken into account when making important medical decisions. To illustrate the kind of difficult dilemmas which medical professionals may face, we will be debating what doctors should do if parents refuse important medical treatment for their children.

2.30 – 4.30: Radiology

Radiology is the branch of medicine which uses medical images like x-rays in order to make a diagnosis or recommend specific treatments. Students will learn about the varied processes and advantages of different medical imaging technologies including: X-rays, CT scans, Mammograms, Fluoroscopies, Ultrasounds and MRIs. The young doctors will then team up to work out their individual case studies, to order test and make their diagnosis. Each group of 'consultants' will then present their findings to the group making recommendations for treatment based on the medical images.

Day 3:

10:30 – 12:00: Cardiology

The Cardiology session explains the complexities of the chambers of the heart and how blood is pumped around the body. Students will look into the conditions that develop when there are malformations of the heart's structure and how surgery can be used to treat these. By the end of the session, the class will have learned how to diagnose some heart conditions simply by listening to the heart rhythms.

12.00 – 1.00: Lunch

1.00 – 1.45: Dissection and Anatomy

An introduction to human dissection - why medical students do dissections, how they are performed and how they are used in medical research. We will be watching a teaching film of a full thoracic dissection in which students will be guided through the anatomy of the organs and muscles in the chest and abdomen.



Please note that this section can be a little gory – any students not wishing to watch the film is free to sit out this session.

1.45 – 3.00: Pulmonary systems

The study of the lungs and how gas is exchanged - how we breathe and the cycle and regulation of breathing. The young doctors will have the opportunity to test their own lung capacity to discover how doctors use this information in their diagnoses. The session will also cover the effects of asthma, tuberculosis and cystic fibrosis on the respiratory system and the various treatments available for these conditions.

3.00 – 4.30: Trauma and Suturing

The final section of the Summer School will delve into the fast-paced world of emergency medicine and surgery; students will learn how doctors treat lacerations (deep, irregular wounds) and how such wounds are closed using sutures. The class will then get a chance to have a go at suturing and will learn how to perform the simple interrupted stitch.