Final Paediatric Appointment –duration 8 weeks

Paediatric Appointment – Objectives

On completion of training the student should be able to.....

- 1. Diagnose common illnesses in neonates and children in Sri Lanka; identify those at risk of illnesses and initiate measures of preventing such illnesses.
- 2. Comprehensively manage common Paediatric problems in a primary health care centre.
- 3. Identify and adopt measures to correctly refer patients who need referral to a to a specialist clinic.
- 4. Identify patients needing transfer to a secondary or a tertiary health care centre and asses the urgency of transfer and to provide appropriate management till the child is taken over at the other institution.
- 5. Write clearly and meaningfully notes on BHT, referral and transfer forms and diagnosis cards as appropriate.
- 6. Communicate effectively with doctors, nurses, community health workers parents and caretakers and able to work as a team on matters of health in Sri Lankan children.
- 7. Give relevant advice regarding the patients problems to the patient and or to his/her parents or relatives.
- 8. Provide health education on common health problems in Sri Lanka to the parents/ relatives eg. nutrition, family planning, diarrhea, worms, scabies, immunization, growth and development, sanitation etc.
- 9. Cooperate as a member of the team of workers in a Paediatric unit.
- 10. Initiate procedures, which are necessary for the prevention of disease in the community.
- 11. Demonstrate interest in the follow-up of patients.
- 12. Demonstrate a scientific approach to the solution of the various problems related to health care.
- 13. Asses the growth and development of children and prevent/ correct where necessary the detrimental factors, for which purpose he/ she should demonstrate an understanding of
 - Infant feeding
 - Immunization
 - Normal growth and development
- 14. Demonstrate positive attitude towards continuing his education independently.
- 15. For each of the diseases recall the
 - (a). Relevant anatomy, physiological and biomedical facts
 - (b). Prevalence and incidence in Sri Lanka
 - (c). Important pathological aspects
 - (d). Clinical features
 - (e). Natural history
 - (f). Complications
 - (g). Laboratory and special investigations
 - (h). Differential diagnosis
 - (i). Management with special reference to the resources available in Sri Lanka
 - (j). Prognosis
 - (k). Method of prevention

Objectives of the neonatal unit appointment

Two students will be appointed at a given time to serve as shadow neonatal house officers. Each student will get an opportunity to work as a shadow HO twice (48hrs) during an eight week appointment. At the end of the appointment students are expected to

Be able to

- a. Explain the scientific basis of, observe and explain correctly
 - i. Neonatal resuscitation in the labour room & the theatre
 - ii. Exchange transfusions
 - iii. Phototherapy
 - iv. Gavage feeding
 - v. Insertion of nasogastric tubes
 - vi. Insertion of cannulations
 - vii. Withdrawal of venous and capillary blood for investigations
 - viii. Giving incubator care
- b. Recognize an ill baby
- c. Explain and recall the criteria for admission to the SBU
- d. Observe and explain the scientific basis of and recall the procedure of including
 - i. fluid therapy
 - ii. antibiotic treatment
 - iii. temperature regulation
 - iv. follow up plans
 - v. use of observation charts
 - vi. monitoring ill babies and well babies
- e. Explain the scientific basis of and recall the management of
 - i. surfactant deficient lung diseases
 - ii. meconium aspiration syndrome
 - iii. birth asphyxia
 - iv. preterm baby
 - v. septicaemia
 - vi. neonatal jaundice
 - vii. infant of a diabetic mother
 - viii. neonatal convulsions
 - ix. necrotizing enterocolitis
 - x. feeding problems
- f. Interpret haematological, biochemical and CSF values of test done in the neonatal unit.
- g. Explain clinical and laboratory features and management up to surgical interventions of neonatal surgical problems

These objectives are achieved through

1. Lectures

- 2. Bedside teaching
- 3. Ward classes
- 4. Life support classes- demonstrations followed by hands on experience- NALS, BLS, ALS
- 5. Outpatient department work
- 6. Teaching and ward classes at neonatal unit and post natal wards

Topics for continuous assessment

Shock

Anaphylactic shock

Dehydration

Diabetic ketoacidosis

Fluid therapy

Blood & blood product

Transfusion

Urine testing

Stools testing

Setting up an intravenous infusion

Venepunctures

Injections and immunizations

Administration of per rectal drugs

Severe asthma

Stridor

Cardiac failure

Cardiac pulmonary resuscitation (neonates & children)

Nebulisation

Oxygen therapy

Monitoring a ill child

Observation charts

Convulsions

Hypertensive

Encephalopathy

Snake bite

Poisoning

Neonatal emergencies

Lumbar puncture

Anthropometric measurements

(height, weight and head Circumference)

Growth charts

Common Paediatric /neonatal problems

Topics on Neonatal Medicine

- 1. Resuscitation of an asphyxiated baby
- 2. Neonatal examination
- 3. Care of the normal nexborn
- 4. Care of the sick neonate
- 5. Fluid therapy
- 6. Hyperbilirubinaemia, Phototherapy exchange transfusion

Knowledge Competence

A. Students are expected to know the management of emergencies in paediatrics.

Paediatric emergencies:

2. Cardio pulmonary resuscitation

- 3. Neonatal resuscitation
- 4. Convulsions and status epilepticus
- 5. Acute severe asthma
- 6. shock
- 7. Severe dehydration
- 8. Anaphylactic reactions
- 9. Poisoning
- 10. Snake bite
- 11. Hypertensive encephalopathy
- 12. Hepatic encephalopathy
- 13. Diabetic ketoacidosis
- 14. Supraventricular tachycardia
- 15. Peneumothorax
- **B.** Diagnosis and management of the common paediatric problems observed in the ward.

C. Intravenous fluids, blood and products

Students are expected to know the following:

- 1. Fluid requirements
- 2. Commonly and intravenous fluid preparations and their indications and contraindication.
- 3. Blood and blood products available
- 4. Complications of fluid and blood therapy
- 5. Setting up an intravenous line
- 6. Observations during fluid therapy

D. Immunisations

- 1. Current immunization schedule [EPI]
- 2. Non EPI vaccines availability, cost ect.
- 3. Maintenance of cold chain
- 4. Indication and contraindications of vaccines
- 5. Side effects of vaccines
- 6. Route of administration

E. Notifiable diseases

- 1. Notifications and forms
- 2. Notification diseases
- 3. Preventive measures implemented

F. Nutrition

- 1. Breast feeding importance
- 2. Formula feeding and its disadvantages

- 3. Infant feeding
- 4. Weaning
- 5. Nutrition of the toddler and beyond
- 6. Measurement of growth parameters
- 7. Growth charts and their application and interpretation
- 8. Undernutrition and overnutrition

G. Health education

Neonatology

- 1. Premature, Low birth weight (Preterm +IUGR babies)
- 2. Respiratory disorders
- 3. Neonatal sepsos/ Necrostising enterocolitis
- 4. Neonatal jaundice
- 5. Neonatal convulsions
- 6. Infants of diabetic mothers

Cardiology

- 1. Congenital heart disease
- 2. Rheumatic fever/ Rheumatic heart disease
- 3. Infective endocarditis
- 4. Cardiac failure
- 5. Myocarditis/ Cardiomyopathies/ Pericarditis

Respiratory Medicine

- 1. Tonsilitis/ Otitis Media
- 2. Epiglotitis/ Laryngotrachiobrochitis
- 3. Wheezy bronchitis
- 4. Bronchiolitis
- 5. Pneumonia
- 6. Bronchial Asthma

Gastroenterology

1. Diarrhoeas – Acute/chronic/ dysenteries

Liver & biliary system

- 1. Viral hepatitis
- 2. Biliary atresia
- 3. Chirrhosis/ Portal hypertension

Nutrition

- 1. Failure to thrive
- 2. Rickets
- 3. Malnutrition

Haematology

- 1. Anaemias
- 2. Bleeding disorders (Haemophilia/ ITP)
- 3. Malignancies

Renal Medicine

- 1. Nephrotic syndrome/ Nephritic syndrome
- 2. Urinary tract infections
- 3. Chronic renal failure/ Acute renal failure

Rheumatology

- 1. Arthritis JCA/ Septic/ Reactive etc.
- 2. Connective tissue disorders (SLE/ HSP/ Kawasaki)

Neurology

- 1. Convulsions (Febrile/ Afebrile)
- 2. Infections Meningits/ Encephalitis/ Abcess
- 3. Development delay/ Cerebral palsy

Endocrinology

- 1. Diabetes
- 2. Thyroid disorders
- 3. Growth hormonal problems

- 4. Congenital adrenal hyperplasia/ Cushings/ Addisons
- 5. Pubertal problems

Fevers

- 1. Malaria/ Typhoid/ Infectious mononucleosis
- 2. Pyrexia of unknown origin
- 3. Fevers with rashes

Musculoskeletal disorders

- 1. Duchannes muscular atrophy
- 2. CDH/ Perthes' disease