LEARNING OUTCOME

OBSTETRICS / GYNAECOLOGY

Rawalpindi Medical College
Rawalpindi
Lecture 1: Introduction and basic concepts

Date: 02-02-2015

Teacher: Prof. Shagufta Sial

Learning Outcomes:
At the end of lecture the student should be able to:

- Define gynaecology.
- Recognise the importance of a woman as a Biopsychosocial model
- Take pertinent history and examine a gynaecological patient according to ethical principles and accepted guidelines.
- Identify various gynaecological conditions requiring treatment.
- Develop a broad differential diagnosis of a female patient with acute abdomen
- Recognize the psychological, physical and physiological changes and requirements during various phases of a woman’s life.
- Be aware of population health and nutritional social, domestic, and medicolegal issues related to a woman in our society.
- Appreciate the importance of research in the field of gynaecology and how it can be applied to formulate best practice.

Lecture 2: Embryology of female genital tract

Date: 03-02-2015

Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:
At the end of lecture the student should be able to:
Enlist parts of female genital tract
Describe the developmental embryology of female genital tract
Identify common developmental anomalies clinically
Suggest and justify relevant investigations
Outline management plan of these patients

Lecture 3: Embryology of Male genital tract

Date: 05-02-2015

Teacher: Prof. Fehmida Shaheen

Learning Outcomes:
At the end of lecture the student should be able to:

Enlist parts of male genital tract
Describe the developmental embryology of male genital tract
Identify common developmental anomalies clinically
Suggest and justify relevant investigations
Outline management plan of these patients
Lecture 4: Anatomy of reproductive tract
Date: 09-02-2015
Teacher: Prof. Lubna Ejaz

Learning Outcomes:
At the end of lecture the student should be able to:

- Clearly understand the anatomical configuration of various pelvic organs
- Appreciate the close relationship between the reproductive, urinary and gastrointestinal tracts
- Knowledge about the importance of blood supply and lymphatic drainage to the pelvis

Lecture 5: Physiology of normal menstruation
Date: 10-02-2015
Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:
At the end of lecture the student should be able to:

- Define
- Enumerate hormones responsible for menstruation
- Describe changes in hormones, ovaries and endometrium during menstrual cycle.
Lecture 6: Physiology of ovulation and its clinical importance

Date: 12-02-2015

Teacher: Prof. Fehmida Shaheen

Learning Outcomes:
At the end of lecture the student should be able to:

- Describe ovarian cycle including the sequential development of ovarian follicle
- Understand control of ovarian cycle by higher centers
- Knowledge of various investigations done to detect ovulation
- Assessment of clinical impact of ovulation after various tests

Lecture 7: Gestational trophoblastic disease

Date: 16-02-2015

Teacher: Prof. Shagufta Sial

Learning Outcomes:
At the end of lecture the student should be able to:

- Define gestational trophoblastic disease.
- Describe epidemiology and various forms of GTD.
- Differentiate the signs and symptoms of GTD from a normal pregnancy.
- Plan relevant investigations.
- Recognize the high risk group of patients.
• Identify complications of GTD.
• Describe the surgical and medical management of hydatidiform mole and their associated risks.
• Explain the prognosis of disease.
• Plan follow up of case of molar pregnancy.
• Describe signs, symptoms and investigations for malignant and persistent forms of Gestational trophoblastic disease.
• Plan treatment of choriocarcinoma and persistent trophoblastic disease

Lecture 8: Abortions
Date: 17-02-2015
Teacher: Prof. Lubna Ejaz

Learning Outcomes:
At the end of lecture the student should be able to:

• Define different types of abortions and enlist common aetiological factors
• Able to diagnose different types of abortions by history, examination and pertinent investigations
• Knowledge of different management options, including medical and surgical

Lecture 9: Ectopic pregnancy
Date: 19-02-2015
Teacher: Prof. Fehmida Shaheen

Learning Outcomes:
At the end of lecture the student should be able to:
• Understand the different types of presentation of ectopic pregnancy
• Plan pertinent investigations, interpret and take appropriate action
• Clear knowledge of various forms of treatment and significance of each of them

Lecture 10: Primary and secondary amenorrhoea

Date: 23-02-2015

Teacher: Prof. Shagufta Sial

Learning Outcomes:
At the end of lecture the student should be able to:

• Define primary and secondary ammenorrhoea.
• Assess the various conditions associated with primary and secondary ammenorrhoea.
• Recognize the various clinical features of primary and secondary ammenorrhoea.
• Plan pertinent investigations and interpret them.
• Describe treatment options for primary and secondary ammenorrhoea.
• Rationalise the treatment according to the patients requirements

Lecture 10: All menstrual irregularities except amenorrhoea

Date: 24-02-2015

Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:
At the end of lecture the student should be able to:

- Define and describe normal menstrual cycle
- Enlist and define all menstrual irregularities with their pathological basis
- Differentiate between all menstrual irregularities based upon sign, symptoms and investigations.
- Suggest and justify relevant investigations
- Outline management plan of these patients

**Lecture 11: Menopause and HRT**

**Date:** 26-02-2015

**Teacher:** Prof. Lubna Ejaz

**Learning Outcomes:**

At the end of lecture the student should be able to:

- Define menopause and differential physiological changes from pathological and psychological conditions at this stage
- Implement appropriate investigations for risk assessment and screening in a menopause woman
- Effectively counsel women on lifestyle and behavior modification and psychological aspects
- Devise a menopause treatment plan using non pharmacological and hormonal replacement therapy
Lecture 12: Contraception

Date: 02-03-2015

Teacher: Prof. Shagufta Sial

Learning Outcomes:
At the end of lecture the student should be able to:

- Define contraception.
- Explain various methods of contraception (male and female).
- Explain the physiological basis of various contraceptive methods.
- Identify various contraceptive devices, gadgets and medicines used for contraception.
- Compare the short term and long term risks, benefits and costs of various methods.
- Rationalize contraceptive method required for a particular patient and her husband.
- Discuss the advantages and disadvantages and effectiveness of popular contraceptive methods.
- Enlist various contraceptive methods along with their risks and failure rates.
- Understand contraceptive prevalence rate, unmet need of contraception and reasons of failure of contraception in Pakistan.

Lecture 13: Infections of upper genital tract / PID

Date: 03-03-2015

Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:
At the end of lecture the student should be able to:

- Define upper genital tract / PID
- Enlist common infections of genital tract along with their causative agents
- Describe common characteristics of causative agents.
- Suggest and justify relevant investigations
- Differentiate between different types of infections based upon clinical features and investigations
- Differentiate from other causes of fever and lower abdominal pain
- Outline management plan
- Describe short term and long term complications of PID.

Lecture 14: Infections of lower genital tract / PID

Date: 05-03-2015
Teacher: Prof. Fehmida Shaheen

Learning Outcomes:
At the end of lecture the student should be able to:

- Enlist common infections of lower genital tract along with their causative agents
- Suggest and justify relevant investigations
- Differentiate between different types of infections based upon clinical features and investigations
- Outline management plan

Lecture 15: Sub fertility (Male)

Date: 09-03-2015
Teacher: Prof. Lubna Ejaz

Learning Outcomes:
At the end of lecture the student should be able to:

- Define male subfertility and discuss the testicular, pretesticular and post testicular causes of subfertility
- Relate the patients history and examination to the risk factors leading to male subfertility
- Formulate a sequential plan of investigations and their interpretation
- Outline a management plan for male subfertility

**Lecture 16: Sub fertility (Female)**

**Date:** 10-03-2015

**Teacher:** Prof. Rizwana Chaudhri

**Learning Outcomes:**

At the end of lecture the student should be able to:

- Define subfertility
- Enlist all causes of sub-fertility.
- Describe pathophysiology
- Suggest and justify relevant investigations
- Outline management plan
- Describe psychosocial effects
- Describe legal and ethical issues involved in sub fertility treatment in view cultural and religious factors e.g ovum and sperm donation,surrogacy.

**Lecture 17: Hirsuitism + PCOD**

**Date:** 12-03-2015
Teacher: Prof. Fehmida Shaheen

Learning Outcomes:
At the end of lecture the student should be able to:

- Understand the pathogenesis of hirsutism and PCOD
- Plan pertinent investigations and clearly interpret them
- Able to manage hirsutism and PCOD by selecting the appropriate treatment modality.

Lecture 18: Urogynaecology
Date: 30-03-2015
Teacher: Prof. Shagufta Sial

Learning Outcomes:
At the end of lecture the student should be able to:

- Define Urogynaecology.
- Understand the basis of pathophysiology of lower urinary tract.
- Explain various gynaecological conditions in which lower urinary tract is involved.
- Enlist various causes of urinary incontinence.
- Differentiate between various types of urinary incontinence on the basis of history and examination.
- Plan basic urodynamic investigations and interpret them.
- Rationalize the various medical and surgical treatments for urinary incontinence.
- Explain the pelvic floor muscle training exercises to the patient.
- Understand the role of physiotherapists and continence advisors in the management of pelvic floor disorders.
Lecture 19: UV prolapse and other displacement of uterus

Date: 31-03-2015

Teacher: Prof. Lubna Ejaz

Learning Outcomes:

At the end of lecture the student should be able to:

- Define and classify utero vaginal prolapse
- Describe the aetiology of UV prolapse
- Enumerate the clinical features and differential diagnosis of UV prolpase
- Knowledge about the principles and treatment modalities

Lecture 20: Endometriosis and adenomysosis

Date: 02-04-2015

Teacher: Prof. Fehmida Shaheen

Learning Outcomes:

At the end of lecture the student should be able to:

- Knowledge about pathogenesis and variable clinical presentation of endometriosis
- Understand the various investigations required for diagnosis and difficulties in their interpretation
- Manage endometriosis keeping in mind the different treatment modalities depending on age group
- Able to differentiate between endometriosis and adenomyosis as regards clinical presentation, diagnosis and treatment options
Lecture 21:  Benign diseases of uterus

Date: 06-04-2015

Teacher: Prof. Shagufta Sial

Learning Outcomes:

At the end of lecture the student should be able to:

- Define Leiomyoma (fibroid).
- Differentiate the signs and symptoms of Fibroid Uterus according to its location.
- Differentiate signs and symptoms of fibroid with other gynaecological and non gynaecological diseases.
- Explain various investigations required to reach diagnosis.
- Explain the various treatment options according to patient needs.
- Discuss the conservative, medical and surgical management, their risks and complications.
- Management of other benign diseases of Uterus e.g congenital, inflammatory and benign tumors affecting endometrium.

Lecture 22: Benign and premalignant disease of cervix

Date: 07-04-2015

Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:

At the end of lecture the student should be able to:

- Define
- Enlist common benign diseases
• Describe pathophysiology
• Suggest and justify relevant investigations
• Differentiate common benign diseases of cervix and various stages of premalignant diseases of cervix
• Enlist and describe various screening modalities for CA-cervix.
• Describe management plan for common benign diseases of cervix and premalignant diseases.
  • Describe prevention of CA-cervix.

Lecture 23: Benign diseases of ovaries

Date: 09-04-2015

Teacher: Prof. Lubna Ejaz

Learning Outcomes:
At the end of lecture the student should be able to:

• Enlist benign ovarian diseases
• Describe clinical presentation and complications of benign ovarian diseases
• Plan management for common benign ovarian diseases

Lecture 24: Malignant diseases of uterus

Date: 13-04-2015

Teacher: Prof. Shagufta Sial
Learning Outcomes:

At the end of lecture the student should be able to:

- Identify the women with risk factors for endometrial cancer.
- Know the clinical signs and symptoms related to endometrial cancer.
- Understand the various methods of investigating a case of postmenopausal bleeding.
- Understand the value of staging and various treatment models for various stages.
- Comprehend the significance of different types of pre-malignant and malignant uterine pathology.
- Enlist all the malignancies of uterus.

Lecture 25: Malignant diseases of cervix

Date: 14-04-2015

Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:

At the end of lecture the student should be able to:

- Enlist various types of cervical cancers.
- Describe etiological and pathological basis of cervical cancers.
- Knowledge of clinical symptoms and signs of cervical cancer
- Suggest and justify relevant investigations
- Describe various stages of cervical cancer.
- Outline management plan for patients with cervical cancer
- Describe psycho social aspects of this disease
- Describe complications and various treatment modalities.
Lecture 26: Malignant diseases of ovaries

Date: 16-04-2015

Teacher: Prof. Fehmida Shaheen

Learning Outcomes:

At the end of lecture the student should be able to:

- Identify the risk factors for ovarian cancer
- Knowledge of clinical symptoms and signs of ovarian cancer
- Suggest and justify relevant investigations
- Understand the value of staging
- Outline management plan for patients with ovarian cancer

Lecture 27: Benign and malignant diseases of vulva

Date: 20-04-2015

Teacher: Prof. Lubna Ejaz

Learning Outcomes:

At the end of lecture the student should be able to:

- Describe the applied anatomy of vulva including the lymphatic drainage
- Assess the benign, malignant and premalignant lesions of vulva on clinical basis
- Formulate specific investigations to diagnose the etiology including role of ST/I and nature of vulvar disease
- Discuss the management of benign and malignant vulvar lesions
Lecture 28: Benign and malignant diseases of vagina

Date: 21-04-2015

Teacher: Prof. Rizwana Chaudhri

Learning Outcomes:

At the end of lecture the student should be able to:

- Enlist benign diseases of vagina.
- Describe pathological basis of benign and malignant diseases of vagina.
- Knowledge of clinical symptoms and signs of disease.
- Suggest and justify relevant investigations
- Outline management plan

Lecture 29: Care of terminally ill patient

Date: 23-04-2015

Teacher: Prof. Fehmida Shaheen

Learning Outcomes:

At the end of lecture the student should be able to:

- Understand the psychological, psychosocial, emotional and practical needs of women affected by terminal illness
- Provide care and support to meet the needs of patients and their families throughout illness
- Understand the importance of multidisciplinary team approach in management of terminally ill patients
Lecture 30:  Common gynaecological procedures / operations

Date:  27-04-2015

Teacher:  Prof. Shagufta Sial

Learning Outcomes:

At the end of lecture the student should be able to:

- Understand the indications and contraindications of various gynecological operations and procedures
- Explain various gynaecological operations (major and minor) for example ERPC, hysteroscopy, abdominal and vaginal hysterectomy, myomectomy.
- Explain various gynaecological procedures for example pap smear, pipelle biopsy and wet preparation of vaginal discharge.
- Recognize the various instruments used in various common procedures and operations, their uses and their risks.
- Identify various complications associated with these procedures and operations
- Understand the basic principles of sterilization and disinfection required for gynaecological procedures and operations.

Lecture 31:  Post operative complications

Date:  28-04-2015

Teacher:  Prof. Lubna Ejaz

Learning Outcomes:

At the end of lecture the student should be able to:

- Recognize and manage early post-operative haemorrhage
- Knowledge of causes of post operative pyrexia and its management
- Identify risk factors of thrombo-embolic disease, its diagnosis and management
**Lecture 32:**  Medicolegal aseptic in obstetrics and gynaecology + ethics  

**Date:** 30-04-2015  
**Teacher:** Prof. Fehmida Shaheen  

**Learning Outcomes:**  
At the end of lecture the student should be able to:  
- Understand the psychological, psychosocial, emotional and practical needs of women affected by terminal illness  
- Provide care and support to meet the needs of patients and their families throughout illness  
- Understand the importance of multidisciplinary team approach in management of terminally ill patients  

**Lecture 33:** Disorders of childhood and adolescence  

**Date:** 04-05-2015  
**Teacher:** Prof. Shagufta Sial  

**Learning Outcomes:**  
At the end of lecture the student should be able to:  
- Understand the anatomy and physiology of prepubertal girl and physical and psychological changes occurring at puberty.  
- Evaluate mullerian anomalies including obstruction.  
- Understand the cause of ambiguous genitalia, intersex conditions and outline their management options.  
- Understand the causes and management of precocious and delayed puberty.  
- Investigate and manage common gynaecological problems in prepubertal girls.(vaginal discharge, bleeding, labial adhesions).  
- Investigate and manage menstrual dysfunction ,PCOS and abnormal vaginal bleeding during teenage.
- Investigate and appropriate referral of a pelvic/abdominal mass
- Obtain a complete history and conduct examination of a paediatric and adolescent patient

**Lecture 34:** USG in obstetrics and gynaecology

**Date:** 05-05-2015

**Teacher:** Prof. Rizwana Chaudhri

**Learning Outcomes:**

At the end of lecture the student should be able to:

- Identify abdominal and vaginal probes
- Define dating and anomaly scan
- Interpret terminology of different biometeries
- Identify different structures of fetal body and amniotic fluid and placenta.
- Identify common fetal pathological conditions.
- Identify normal pelvic USG.
- Identify common pelvic pathologies (H mole, ectopic pregnancy, adnexal masses)

**Lecture 35:** Life threatening gynaecological emergencies

**Date:** 07-05-2015

**Teacher:** Prof. Lubna Ejaz

**Learning Outcomes:**
At the end of lecture the student should be able to:

- Identify and enumerate the life threatening gynaecological emergencies like excessive vaginal bleeding, ruptured ectopic pregnancy, rupture, torsion / haemorrhage of ovarian cysts, acute pelvic inflammatory disease
- Knowledge of relevant investigations
- Management of shock, whether hypovolemic or septic
LEARNING OUTCOME

MEDICINE

Rawalpindi Medical College
Rawalpindi
Lecture 1: Viral Infections

Date: 02-02-2015
Teacher: Dr. HyderBaqai

Learning Outcomes:
At the end of lecture the student should be able to:

- About various viral Infections, their etiology and distribution.
- Understand pathogenesis, feature of Viral Hepatitis, infections, HIV, Rabies, Manonudosis, Dengue fever and Ebola, its diagnosis, management and prevention.

Lecture 2: Common bacterial infections

Date: 03-02-2015
Teacher: Dr. HyderBaqai

Learning Outcomes:
At the end of lecture the student should be able to:

- Recognize features of Typhoid fever, diagnosis management, etiology and complications.
- Fully understand/features diagnosis, treatment and complication of pulmonary /extra pulmonary Tuberculosis. Also toxicity of A.T.T.
- Diagnosis Brucellosis and its management..
- Promptly suspect patient with features of Meningitis and Tetanus know about it etiology, management and prevention.
- Understand about Anthax, Plague, prevention and treatment.
- Bio terrorism

Lecture 3: Protozoal,Fungal Infections & Malaria

Date: 06-02-2015
Teacher: Dr. HyderBaqai

Learning Outcomes:
At the end of lecture the student should be able to:

- Fully understand etiology, spread, diagnosis, treatment and prevention of Malaria.
- Recognize, Amoebiasis/ Giardiasis and other protozoal infection
- common fungal infection and their management
e.g. Mucormycosis, candidiasis, Histoplasmosis.
- Know about common spirochaetal disease of importance, their diagnosis and
• Recognize feature of common Ricketsial/chlamydial infection, diagnosis and treatment.

Lecture 4: Thyroid, Parathyroid & Adrenal Disorders
Date: 07-02-2015
Teacher: Dr. HyderBaqai
Learning Outcomes:
At the end of lecture the student should be able to:
• Manifestation, diagnosis, types and management of hyperthyroidism, hypothyroidism, Parathyroid disease, Adrenal disorders.
• Understand pheochromocytoma, Carcinoid disorder

Lecture 5: Pituitary Disorders
Date: 09-02-2015
Teacher: Dr. HyderBaqai
Learning Outcomes:
At the end of lecture the student should be able to:
• Know the broad outline of endocrine systems, control and feedback mechanism.
• Understand major manifestation of Endocrine disorder.
• Know about biochemical and metabolic disturbances associated.
• Investigate endocrine disorder.
• Stimulation and suppression tests.
• Major pituitary and hypothalamic disorder

Lecture 6: Diabetes Mellitus
Date: 10-02-2015
Teacher: Dr. HyderBaqai
Learning Outcomes:
At the end of lecture the student should be able to:
• Understand the etiology
• Pathogenesis of Diabetes
• Know the types of Diabetes mellitus
Know the criteria for the diagnosis
- Management of diabetes.
- Complications and its management
- Special situations.

Lecture 7: CN Disorder
Date: 12-02-2015
Teacher: Prof. Shoaib Shafi
Learning Outcomes:
At the end of lecture the student should be able to:
- About exact number of Cranial Nerves, types (Sensory/Motor/Mixed)
- Anatomy Pathophysiology patient involvement
- Etiology
- Presenting symptoms and Neurological Manifestation
- Investigations and treatment
- Prognosis and follow up

Lecture 8: Epilepsy + Parkinsons
Date: 13-02-2015
Teacher: Prof. Shoaib Shafi
Learning Outcomes:

**Epilepsy**
Students should be able to know the following points about epilepsy:
- Define
- Classify
- Clinical features (GTC)
- Management plan
- Duration of Treatment
- Complications of GTC

**Parkinsons**
Students should be able to know the following points about parkinsons:
- Define
• Pathophysiology
• Clinical features
• Management plan
• Mechanism of action of anti Parkinsonian drugs
• Follow up

Lecture 9: SOL Brian + Stroke
Date: 14-02-2015
Teacher: Prof. ShoaibShafi
Learning Outcomes:
At the end of lecture the student should be able to:

SOL Brian
• Types
• Anatomy
• Pathophysiology of CNS
• Presenting Symptoms/ Neurological Manifestation
• Differential diagnosis
• Investigation
• Treatment/ Prognosis
• Follow-up

Stroke
Students should be able to know the following points about stroke:

• Define
• Outline blood supply of brain and correlate with different stroke syndromes
• Risk factors
• Differentiate ischemic and hemorrhagic stroke
• differential diagnosis
• Identify lesion in CT scan
• Treatment and Management plan
Follow up

Lecture 10: MS+ Motor Neuron Disease
Date: 16-02-2015
Teacher: Prof. ShoaibShafi
Learning Outcomes:
MS
Students should be able to know the following points about MS:

- Define
- Pathophysiology
- Clinical features with common presentations
- Investigations with important features of MRI
- Management plan

**Motor Neuron Disease**

Students should be able to know the following points about MND:

- Clinical features and its different variants
- Investigations: enumerate the changes seen in EMG
  Management plan and prognosis

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**Lecture 11: Rheumatoid Arthritis**

**Date:** 17-02-2015  
**Teacher:** Prof. Shoaib Shafi

**Learning Outcomes:**

Students should be able to know the following points about RA:

- Define
- Discuss pathophysiology
- Clinical features
- Diagnostic criteria
- Enlist extra-articular manifestations
- Enlist investigations with important radiological findings
- Management plan
  Understand the role of NSAID/DMARD/STEROID

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**Lecture 12: WG, Giant Cell Arteritis, Good PausterSydrome, PolymyositisDematitis HenochSchonleinPurpura**

**Date:** 19-02-2015  
**Teacher:** Prof. Shoaib Shafi

**Learning Outcomes:**

Students should be able to know the following points about the mentioned diseases

**WG**

- Define Wegener’s granulomatosis
- Important clinical signs
- Diagnostic criteria
- Treatment
- Follow-up both for complications and future management
**Giant Cell Arteritis**
- Define
- Important clinical features
- Complications
- Diagnostic criteria
- Treatment
- Follow-up

**Good Pauster Syndrome**
- Define
- Briefly discuss pathophysiology
- Enlist three other causes of these symptoms
- Clinical features
- Complications
- Essential Diagnostic criteria
- Management plan

**Polymyositis Dermatitis**
- Define
- Enlist four important causes
- Clinical features
- Differentiate primary from secondary Polymyositis
- Investigations
- Management plan

**Henoch-Schonlein Purpura**
- Define
- Discuss pathophysiology
- Differentiate palpable from non-palpable purpura
- Complications
- Management plan

Prognosis

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**Lecture 13: SLE**
**Date:** 20-02-2015
**Teacher:** Prof. Shoaib Shafi

**Learning Outcomes:**
Students should be able to know the following points about SLE:
- Define
- Discuss pathophysiology
- Clinical features
- Appreciates differential presentations
- Important investigations
• Life threatening complications
• Management plan

**Lecture 14:** Tuberculosis  
**Date:** 21-02-2015  
**Teacher:** Prof. MuttiUllah  
**Learning Outcomes:**  
Students should be able to know the following points about TB:  
• Define  
• Discuss pathophysiology  
• Differentiate between primary tuberculosis and reactivated tuberculosis on the basis of pathophysiology  
• Clinical features  
• Common radiological findings in pulmonary TB  
• Diagnostic criteria  
• Different regimen of treatment  
• With special consideration to discuss 1st line ATT drugs and their side effects  
• Management plan  
  MDR and extrapulmonary TB

**Lecture 15:** Asthma  
**Date:** 23-02-2015  
**Teacher:** Prof. MuttiUllah  
**Learning Outcomes:**  
Students should be able to know the following points about Asthma:  
• Define  
• Discuss pathophysiology  
• Clinical features  
• Clinical parameters important in management  
• Indications for admission  
  Management plan

**Lecture 16:** COPD  
**Date:** 24-02-2015  
**Teacher:** Prof. MuttiUllah  
**Learning Outcomes:**
Students should be able to know the following points about COPD:

- Define
- Discuss pathophysiology
- Clinical features and different types
- Role of PFTs in diagnosis and monitoring of disease
- Grading of severity of disease
- Management plan including LTOTs
  Management of acute exacerbation

**Lecture 17:** Occupational Lung Diseases  
**Date:** 26-02-2015  
**Teacher:** Prof. MuttiUllah

**Learning Outcomes:**
Students should be able to know the following points about IDL:

- Define
- Discuss pathophysiology
- Clinical features
- Role of PFTs in IDL(physiology)
- Enlist important causes
  Management plan

**Lecture 18:** Pneumonia  
**Date:** 27-02-2015  
**Teacher:** Prof. MuttiUllah

**Learning Outcomes:**
Students should be able to know the following points about pneumonia:

- Define
- Classify Pneumonia
- Common causative agents
- Categorize severity of pneumonia
  Management plan: empirical treatment

**Lecture 19:** Tumors of the Lung  
**Date:** 28-02-2015  
**Teacher:** Prof. MuttiUllah

**Learning Outcomes:**
Students should be able to know the:

- Common primary tumors of the lung
- Clinical feature
- Common radiological findings of CA lung
- Staging of CA lung
- Various investigations used for diagnosis
- Management plan
  - Common tumors that metastasize into lungs

**Lecture 20:** Anemia  
**Date:** 2-03-2015  
**Teacher:** Prof. MuttiUllah  
**Learning Outcomes:**  
Students should be able to know the:

- Define Anemia
- Different Classifications of anemia
- Causes of different types of anemias
- Clinical features of anemia
- Specific features of different anemias
- Normal values of hematological parameters
- Basic investigations in anemia
- Specific investigation in different types of anemias
  - Treatment options in different anemia

**Lecture 21:** Leukemia  
**Date:** 3-03-2015  
**Teacher:** Prof. MuttiUllah  
**Learning Outcomes:**  
Students should be able to know the:

- epidemiology, and etiology/risk factors
- terminology and classifications
- Clinical features, investigations, and treatment principles with reference to acute and chronic myeloid/lymphatic leukemia.
  - General prognosis.
**Lecture 22:** Lymphoma  
**Date:** 5-03-2015  
**Teacher:** Prof. Mutti Ullah  
**Learning Outcomes:**  
Students should be able to know the:  
- What are lymphomas and their types  
- Epidemiology, etiology, types, clinical features, investigations and management principles of non Hodgkin and Hodgkin lymphoma.  
- WHO and clinical classification of lymphoma  
- Prognosis

**Lecture 23:** Metabolic Syndrome  
**Date:** 6-03-2015  
**Teacher:** Dr. Naveed Younas Khan  
**Learning Outcomes:**

**Lecture 24:** Hyper Lipidemia  
**Date:** 7-03-2015  
**Teacher:** Dr. Naveed Younas Khan  
**Learning Outcomes:**  
- What are hyperlipidemia, their epidemiology, genetics and etio/pathophysiology  
- Types, classification, clinical features/clinical assessment of predominant dyslipidemia, and complications.  
- Management (non pharmacological and pharmacological), and how to monitor therapy.  
- Outcome/prognosis

**Lecture 25:** General Management of poisoning  
**Date:** 9-03-2015  
**Teacher:** Dr. Naveed Younas Khan  
**Learning Outcomes:**  
- What is poisoning, and its types  
- General approach to poisoning (triage and resuscitation, clinical assessment and investigations, general, management, psychiatric evaluation)  
- Gastrointestinal decontamination  
- Commonly used antidotes and methods of poison removal  
- Role of psychiatric evaluation
Lecture 26: Organophosphate poisoning
Date: 10-03-2015
Teacher: Dr. Naveed Younas Khan

Learning Outcomes:
- What are organophosphates, and chemical/compounds which contain these.
- Mechanism of toxicity.
- Clinical features (acute cholinergic syndromes, cholinergic features, intermediate syndrome, organophosphate induced delayed polyneuropathy)
  Management steps and outcome

Lecture 27: Corrosive poisoning
Date: 12-03-2015
Teacher: Dr. Naveed Younas Khan

Learning Outcomes:
- What is corrosives poisoning
- Clinical features and complications (acute/long term)
  Management (acute/long term/psychiatric evaluation)

Lecture 28: Benzodiazepine poisoning
Date: 13-03-2015
Teacher: Dr. Naveed Younas Khan

Learning Outcomes:
- Commonly used benzodiazepines
- Mechanism of toxicity
  Clinical features and management of benzodiazepines poisoning

Lecture 29: Acute hepatitis A&E
Date: 14-03-2015
Teacher: Prof. Muhammad Umar

Learning Outcomes:
Student should be able to know the:

- Causes of hepatitis
- Transmission of hepatitis
- Clinical features of hepatitis
- Diagnosis of hepatitis
  Management of hepatitis
Lecture 30: Chronic hepatitis B&C  
Date: 30-03-2015  
Teacher: Prof. Muhammad Umar  
Learning Outcomes:  
Student should be able to know the:  
- Causes of hepatitis  
- Transmission of hepatitis  
- Clinical features of hepatitis  
- Diagnosis of hepatitis  
  Management of hepatitis

Lecture 31: Cirrhosis  
Date: 31-03-2015  
Teacher: Prof. Muhammad Umar  
Learning Outcomes:  
Student should be able to know the following points about cirrhosis:  
- Etiologies  
- Clinical features  
- Complications  
- Diagnosis  
- Management plan

Lecture 32: Ascites + HRS  
Date: 2-04-2015  
Teacher: Prof. Muhammad Umar  
Learning Outcomes:  
Ascites  
- Causes and pathophysiology  
- Clinical features  
- Management plan  
HRS  
- Define  
- Pathophysiology and types  
- Clinical features  
- Management plan
Lecture 33: Upper GI bleed +PSE
Date: 3-04-2015
Teacher: Prof. Muhammad Umar
Learning Outcomes:

Upper GI bleed
- causes of upper GI bleed
- Clinical features
- investigations and risk stratification
- Management (acute, long term), complications, and outcome depending on cause
- Primary and secondary prevention in cases of portal hypertension related bleeding

PSE
- Pathophysiology and types
- Clinical features, precipitating factors, and differential diagnosis of HE
- Investigations
- Management plan

Lecture 34: HCC+Lower GI Bleed
Date: 4-04-2015
Teacher: Prof. Muhammad Umar
Learning Outcomes:

HCC
At the end lecture a student should be able to discuss and describe
- Risk factors for HCC
- Prevention of HCC in HCV
- Clinical features of HCC
- Management of HCC

LGIB
Student should be able to know:
- Define upper and lower GI bleed
- Discuss causes of lower GI bleed
- Discuss relevant questions on history to differentiate between different causes of lower GI bleed
- Investigations
- Management plan
Lecture 35: Malasorption syndromes +IBD and IBS
Date: 06-04-2015
Teacher: Prof. Muhammad Umar
Learning Outcomes:

Malasorption syndromes
- causes
- pathophysiology
- Investigation
- Management plan

IBD
- Clinical features
- Differential diagnosis
- Difference between ulcerative colitis and Crohn's disease
- Investigations
- Management plan

IBS
- Diagnostic criteria
- Management plan

Lecture 36: IHD
Date: 07-04-2015
Teacher: Prof. Fayaz Shah
Learning Outcomes:

- Know what is coronary artery disease (acute coronary syndromes, angina)
- Know pathophysiological and anatomical basis
- Know clinical features, investigations, risk stratification, acute and long term complications/issues
- Know complications, management of ACS/chronic stable angina (thrombolysis, PCI, Surgery included), in hospital monitoring, risk modifications/secondary prevention, and prognosis

Lecture 37: IHD
Date: 09-04-2015
Teacher: Prof. Fayaz Shah
Learning Outcomes:

- Know what is infective endocarditic, and its epidemiology
- Know pathophysiology, microbiology, and clinical features (sub acute endocarditis, acute and post operative endocarditis)
Know investigations, diagnostic modified Duke’s criteria
Know management and prevention

Lecture 38: Cardiac arrhythmias
Date: 10-04-2015
Teacher: Prof. Fayaz Shah
Learning Outcomes:
- Know basics of arrhythmia etiology, pathophysiology
- Know heart blocks, atrial fibrillation, WPW, ventricular flutter/fibrillation in terms of predisposing conditions, clinical features, complications and diagnosis
- Know management including anti arrhythmic drug therapy, and therapeutic procedures

Lecture 39: Congenital heart disease, Cardiomyopathies
Date: 11-04-2015
Teacher: Prof. Fayaz Shah
Learning Outcomes:
Congenital heart disease
- Know fetal circulation
- Know etiology and incidence of ASD, VSD, PDA, Fallot tetralogy
- Know clinical features with focus on cyanosis growth delay, syncope, pulmonary hypertension
- Know investigations and management
Cardiomyopathies
- Know what are cardiomyopathies
- Know genetic basis, pathophysiology and clinical features of dilated/restrictive/hypertrophic/arrhythmogenic cardiomyopathy.
- Know diagnostic investigations and principles of management

Lecture 40: Pericardial Disease, DVT & Pulmonary embolism
Date: 13-04-2015
Teacher: Prof. Fayaz Shah
Learning Outcomes:
Congenital heart disease
Pericardial Disease
- Know what are diseases of pericardium
- Know etiology, clinical features, investigations and management of acute pericarditis
• Know causes, clinical features, investigations, and treatment of pericardial effusion with focus on cardiac tamponade and pericardiocentesis
• Know what is constrictive pericarditis, Its clinical features and management

**DVT & Pulmonary embolism**
• Know epidemiology, risk factors, clinical features, investigations of DVT
• Know Wells score for predicting DVT probability
• Know complications and treatment of DVT
• Know epidemiology, clinical features, investigations, and diagnostic algorithm of pulmonary embolism
• Know management of pulmonary embolism in terms of general measures, anticoagulation, thrombolysis, and surgical options etc
• Know prognosis

**Lecture 41:**  Depression Psychosis & Bipolar Disorders

**Date:**  14-04-2015

**Teacher:**  Prof. Fayaz Shah

**Learning Outcomes:**

**Depression**
• Manage depression on the basis of biopsychosocial model as explained in mhGAP Intervention guide.
• Identify the role of psychoeducation in management of depression.
• Importance of addressing current psychosocial stressors, reactivating social networks, structured physical activity programme and regular follow up.
• Recognise when to initiate antidepressant medication, how to monitor people on antidepressant medication and when to terminate antidepressant medication
• Understand the precautions to be observed for antidepressant medication in special population.
• Know basic knowledge about antidepressant classification as well as their dosing, common side effects and serious side effects.

**Psychosis**
Student should be able to:
• Manage Psychosis on the basis of biopsychosocial model as explained in mhGAP intervention guide.
• Identify the role of psychoeducation in management of Psychosis.
• Recognise the importance of facilitating rehabilitation of psychotic patient in community and regular follow up.
• Recognise when to initiate antipsychotic medication, how to monitor people on antipsychotic medication and when to discontinue antipsychotic medication
• Know basic knowledge about antipsychotics classification as well as their dosing, common side effects and serious side effects.
**Bipolar Disorders**
Student should be able to:
- Manage Bipolar disorder on the basis of biopsychosocial model as explained in mhGAP intervention guide.
- Identify the role of psychoeducation in management of Bipolar disorder.
- Identify the importance of reactivating social networks, rehabilitation and regular follow up.
- Know how to treat acute mania
- Understand the maintenance treatment of bipolar disorder
- Classify Mood stabilizers as well as know their dosing, common side effects and serious side effects.

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**Lecture 42: Epilepsy Developmental Disorders, Dementia**

**Date:** 16-04-2015

**Teacher:** Prof. FareedMinhas

**Learning Outcomes:**

**Epilepsy**
- Manage Epilepsy as explained in mhGAP intervention guide.
- Recognise when to start antiepileptic treatment and when to stop
- Explain the importance of followup and compliance
- Classify various antiepileptics, their doses, side effects
- Manage Epilepsy in Emergency as well as in special population groups.

**Developmental Disorder**
Student should be able to:
- Manage Developmental disorders as explained in mhGAP intervention guide.
- Identify the role of psychosocial treatment and advice in management of Developmental disorders.
- Identify the importance of family psychoeducation, community based rehabilitation, support for carers and regular follow up.
- Know how and what to advise teachers
- Know the importance of protecting human rights of child and family
- Communicate about prevention of developmental disorders

**Dementia**
Student should be able to:
- Manage Dementia on the basis of biopsychosocial model as explained in mhGAP intervention guide.
- Identify the role of psychosocial interventions in management of Dementia for both patient and carers.
- Identify how to convey the results of assessment.
- Recognize psychosocial interventions for cognitive symptoms and functioning.
- Identify how to promote independence, functioning and mobility of dementia patients.
• Manage behavioral and psychological symptoms of dementia.
• Identify role of anti-dementia medications.

Lecture 43: Drug Use Disorder Self harms/Suicide
Date: 17-04-2015
Teacher: Prof. FareedMinhas
Learning Outcomes:

Drug Use Disorder
• Manage Drug Use disorders on the basis of biopsychosocial model as explained in mhGAP intervention guide.
• Identify the role of psychosocial interventions like brief intervention techniques, self-help groups, addressing housing and employment needs.
• Identify the importance of support for families and carers in management of Drug Use disorders.
• Recognize and implement harm reduction strategies especially in special population like pregnant women and lactating mothers.
• Understand the pharmacotherapy for common drug use disorders.

Self harms/Suicide
• Manage Suicide/Self harm patients as explained in mhGAP intervention guide.
• Know how to provide care for person with self-harm
• Recognize how to offer and activate psychosocial support
• Know how to prevent suicide and self harm
• Acutely manage intoxication and able to engage patient in regular follow up thereafter.

Lecture 44: Acute Kidney Injury
Date: 18-04-2015
Teacher: Dr. Tanveer
Learning Outcomes:

• What is AKI, its pathophysiology, and causes (pre/post, and renal)
• Clinical features, criteria for AKI, and investigations.
• Management of AKI including hemodynamic monitoring, acid-base and electrolyte management, dietary measures, use of medications/renal replacement therapy, complications and their treatment
• Prognosis

Lecture 45: Chronic Kidney Diseases
Date: 20-04-2015
Teacher: Dr. Tanveer
Learning Outcomes:
• What is CKD, its stages, epidemiology, common causes and pathophysiology
• Clinical features including general symptoms, immune dysfunction, hematological abnormalities, aid-base abnormalities, cardio-vascular, neurological dysfunction and bone disease.
• Investigations and management with focus on criteria for referral to Nephrologist, anti-hypertensive therapy, reduction of proteinuria, life style modification, lipoid lowering agents, managing acid base imbalance, anemia and renal bone disease.
• Prognosis

Lecture 46:  Nephrotic& Nephritic Syndromes
Date:  21-04-2015
Teacher:  Dr. Tanveer
Learning Outcomes:
• What are nephrotic and nephritic syndromes, their epidemiology and etiology
• Clinical features, diagnostic criteria, important glomerulonephropathies, and complications
• Investigations and management with on complications
• Prognosis

Lecture 47:  Renal Replacment Therapy & Renal Transplantion
Date:  23-04-2015
Teacher:  Dr. Tanveer
Learning Outcomes:
    Renal Replacment Therapy
    • What is meant by RRT, its types, and when it is required
    • Differences between hemodialysis and peritoneal dialysis
    • Frequency, principles, and efficacy of RRTs
    Renal Transplantion
    • What is renal transplantation, When it is required
    • Prerequisites, types, contraindications, procedure
    • Monitoring and long term management

Lecture 48:  GI Radiology & Bone
Date:  24-04-2015
Teacher:  Dr. Nasir Khan
Learning Outcomes:
    GI Radiology
    • Identify various radiographic appearances of pneumo-peritoneum.
    • Identify small and large gut obstruction on plain abdominal x-ray.
• Identify and characterize various forms of abdominal calcifications.
• Identify common pathologies on barium studies.

**Bone**
Radiological findings in
• OA
• RA
• Gouty arthritis
• Osteoporosis
• Osteomalacia
• Rickets

**Lecture 49:** Brain Lesions
**Date:** 25-04-2015
**Teacher:** Dr. Nasir Khan

**Learning Outcomes:**
• Identify brain infarcts.
• Identify various presentations of infarcts and brain hemorrhage.
• Differentiate between ischemic and hemorrhagic infarcts.
• Identify and characterize brain lesions according to their location CT & MR characteristics, contrast enhancement, multi-centricity, mass effect.

**Lecture 50:** Scabies and Acne
**Date:** 27-04-2015
**Teacher:** Dr. Tameezud Din

**Learning Outcomes:**

**Scabies**
Students should be able to know
• Causative agent
• Clinical features
• Features of lesions
• Management plan

**Acne**
Students should be able to know
• pathophysiology
• Clinical features
• Features of lesions
• Management principles with common drugs used to treat acne
Lecture 51: Psoriasis and Drug eruptions
Date: 28-04-2015
Teacher: Dr. Tameezud Din

Learning Outcomes:

Psoriasis
Students should be able to know
• pathophysiology
• Features of lesions
• Management principles with common treatment modalities

Drug eruptions
Students should be able to know
• Features of lesions seen in drug reactions
• Differential diagnosis of bullous skin lesions
• Enlist common offending drugs
• Outline management principles of different drug reactions
LEARNING OUTCOME

SURGERY
Rawalpindi Medical College
Rawalpindi
Lecture 1: Painless dysphagia  
Date: 02-02-2015  
Teacher: Prof. Jehangir Sarwar  
Learning Outcomes:  
At the end of lecture the student should be able to:  
- Define dysphagia & its grades  
- Enlist etiological factors  
- Learn basic pathophysiology  
- Enlist differential diagnosis  
- Assess the symptoms & signs of achalasia  
- Ascertain different diagnostic modalities & their interpretation  
- Make a management plan  
- Identify complications

Lecture 2: Neck swellings  
Date: 03-02-2015  
Teacher: Prof. Muhammad Idress  
Learning Outcomes:  
At the end of lecture the student should be able to:  
- Classify various neck swellings  
- Discuss and plan management of 5 common neck swellings  
- Counsel a patient with neck swelling about his treatment

Lecture 3: Trauma to upper urinary tract  
Date: 06-02-2015  
Teacher: Prof. Muhammad Mumtaz  
Learning Outcomes:  
At the end of lecture the student should be able to:  
- At the end of this lecture you will be able to:  
- Incidence  
- Modes of trauma  
- Investigations & Staging of renal trauma  
- Ureteric trauma  
- Management in ER
Lecture 4: Principles of Paediatric Surgery  
Date: 07-02-2015  
Teacher: Prof. Naeem Zia  
Learning Outcomes:  
At the end of lecture the student should be able to:  
- Should be able to evaluate the pediatric patients with common surgical diseases.  
- Evaluate and develop a plan for the management of pediatric patients  
- Should understand fluid and electrolyte and nutritional status of patients.  
- Should be able to define common pediatric diseases including pyloric stenosis, abdominal wall defects.  
- Should be able to discuss how to calculate the daily fluid and electrolyte requirements, preexisting deficits, and abnormal ongoing losses in children.  
- Discuss calculating blood loss during surgery and blood replacement management.

Lecture 5: Painful dysphagia  
Date: 09-02-2015  
Teacher: Prof. Jehangir Sarwar  
Learning Outcomes:  
At the end of lecture the student should be able to:  
- Define dysphagia  
- Enumerate etiological factors  
- Enlist differential diagnosis  
- Assess the symptoms & signs of the disease  
- Plan pertinent investigations in diagnosis & their interpretation  
- Make a management plan & use of different treatment modalities  
- Differentiate between types of esophageal cancer

Lecture 6: Neck swelling  
Date: 10-02-2015  
Teacher: Prof. Muhammad Idress  
Learning Outcomes:  
At the end of lecture the student should be able to:  
- Classify various neck swellings  
- Discuss and plan management of 5 common neck swellings  
- Counsel a patient with neck swelling about his treatment
Lecture 7: Pain Right upper abdomen
Date: 12-02-2015
Teacher: Prof. Muhammad Hanif

Learning Outcomes:
At the end of lecture the student should be able to:

- assess patients with Rt. Upper abdominal pain
- differentiate between its various etiologies
- advise different investigations in such cases
- make a final diagnosis
- Advise treatment in a such a patient.

Lecture 8: Trauma to under urinary tract
Date: 13-02-2015
Teacher: Prof. Muhammad Mumtaz

Learning Outcomes:
At the end of lecture the student should be able to:

- At the end of this lecture we will be able to Know:
  - Incidence
  - Modes of trauma
  - Investigations for lower tract trauma
  - Management in ER
  - Definitive management

Lecture 9: Cushing Disease
Date: 14-02-2015
Teacher: Prof. Naeem Zia

Learning Outcomes:
At the end of lecture the student should be able to:

- Should be able to relate the symptoms and lab tests to the effected endocrine gland and associated hormones.
- Understand various causes of Cushing’s syndrome.
- Describe the actions of Cortisol and Aldosterone on target organs.
- Comprehend feedback control of adrenocortical hormones.
- Differentiate between Addison’s disease, Cushing’s syndrome, Conn’s syndrome and Adrenogenital syndrome.
Lecture 10:  Epigastric pain & Hematemesis  
Date:  16-02-2015  
Teacher:  Prof. Jehangir Sarwar  
Learning Outcomes:  
At the end of lecture the student should be able to:
- Enumerate etiological factors
- Enlist differential diagnosis
- Assess the symptoms & signs of the associated diseases
- Identify different modalities in making a diagnosis & their interpretation
- Establish a management plan & use of different treatment options

Lecture 11:  Thyrotoxicosis  
Date:  17-02-2015  
Teacher:  Prof. Muhammad Idress  
Learning Outcomes:  
At the end of lecture the student should be able to:
- Discuss etiology and pathophysiology of thyrotoxicosis
- Plan management of patient with thyrotoxicosis
- Counsel a patient with thyrotoxicosis

Lecture 12:  Surgical jaundice  
Date:  19-02-2015  
Teacher:  Prof. Muhammad Hanif  
Learning Outcomes:  
At the end of lecture the student should be able to:
- Differentiate between obstructive (surgical)/non-obstructive jaundice
- Investigate these patients
- Treat a patient suffering from surgical Jaundice

Lecture 13:  Cancers of upper tract  
Date:  20-02-2015  
Teacher:  Prof. Muhammad Mumtaz  
Learning Outcomes:  
At the end of lecture the student should be able to:
At the end of this lecture we will be able to Know:

- Classification
- Urothelial tumors of renal pelvis & ureter
- Presentation & findings
- Investigations
- Management

**Lecture 14:** Surgical hypertension  
**Date:** 21-02-2015  
**Teacher:** Prof. Naeem Zia  
**Learning Outcomes:**  
At the end of lecture the student should be able to:  
- Be able to list the differential diagnosis of an adrenal incidentaloma.  
- Be able to describe the workup of an adrenal incidentaloma.  
- Be able to discuss the treatment of an adrenal incidentaloma

**Lecture 15:** Epigastric mass  
**Date:** 23-02-2015  
**Teacher:** Prof. Jehangir Sarwar  
**Learning Outcomes:**  
At the end of lecture the student should be able to:  
- Enumerate etiological factors  
- Enlist differential diagnosis  
- Learn basic pathophysiology  
- Assess the symptoms & signs of the associated diseases  
- Plan pertinent investigations in diagnosis & their interpretation  
- Make a management plan & use of different treatment modalities  
- Identify complications

**Lecture 16:** Hyperparathyroidism  
**Date:** 24-02-2015  
**Teacher:** Prof. Muhammad Idress  
**Learning Outcomes:**
At the end of lecture the student should be able to:

- Discuss the pathophysiology and etiology of Hyperparathyroidism
- Manage a patient with hyperparathyroidism

Lecture 17: Malignant jaundice
Date: 26-02-2015
Teacher: Prof Muhammad Hanif
Learning Outcomes:
At the end of lecture the student should be able to:

- differentiate it from non-malignant obstructive jaundice
- use different techniques for imaging such patients
- offer different treatment modalities

Lecture 18: Total Hip Replacement
Date: 27-02-2015
Teacher: Prof. Riaz Ahmed
Learning Outcomes:
At the end of lecture the student should be able to:

- Define THR
- Components of THR
- Anatomy of hip joint
- Aims of THR
- Indications
- contraindications
- Types of THR
- Preoperative preparations
- Surgical approaches
- procedure
- complications early/late

Lecture 19: Incidentiloma
Date: 28-02-2015
Teacher: Prof. Naeem Zia
Learning Outcomes:
At the end of lecture the student should be able to:

- Be able to list the differential diagnosis of an adrenal incidentaloma.
- Be able to describe the workup of an adrenal incidentaloma.
- Be able to discuss the treatment of an adrenal incidentaloma.

Lecture 20: Right abdominal pain with jaundice
Date: 02-03-2015
Teacher: Prof. Jehangir Sarwar

Learning Outcomes:
At the end of lecture the student should be able to:

- Define jaundice
- Learn classification of the disease
- Enumerate etiological factors
- Enlist differential diagnosis
- Identify the clinical features of the associated diseases
- Plan pertinent investigations in diagnosis & their interpretation
- Make a management plan & use of different treatment options

Lecture 21: Breast mass in young girl
Date: 03-03-2015
Teacher: Prof. Muhammad Idress

Learning Outcomes:
At the end of lecture the student should be able to:

- Discuss benign diseases of breast
- Manage a patient with breast lump

Lecture 22: Obstructed small gut
Date: 05-03-2015
Teacher: Prof. Muhammad Hanif

Learning Outcomes:
At the end of lecture the student should be able to:

- Pathophysiology of dynamic and adynamic intestinal obstruction
- Cardinal features on history and examination
- Causes of small bowel obstruction
• How to investigate a patient suffering from small bowel obstruction
• How to treat a patient suffering from small bowel obstruction

Lecture 23:  Osteoporosis
Date:  06-03-2015
Teacher:  Prof. Riaz Ahmed
Learning Outcomes:
At the end of lecture the student should be able to:
• Define osteoporosis
• Prevalence
• Causes / Risk factors of osteoporosis
• Diagnostic classification
• Investigations
• Prevention of osteoporosis
• Role of calcium and vitamin D
• Role of bisphosphonates
• Role of estrogen and estrogen receptor modulators

Lecture 24:  Chest Trauma
Date:  07-03-2015
Teacher:  Prof. Naeem Zia
Learning Outcomes:
At the end of lecture the student should be able to:
• Anatomy of chest wall and thoracic viscera
• Physiology of respiration and nerve pathways for pain
• Enumerate different thoracic conditions requiring immediate management

Lecture 25:  Upper abdominal pain
Date:  09-03-2015
Teacher:  Prof. Jehangir Sarwar
Learning Outcomes:
At the end of lecture the student should be able to:
• Enumerate etiological factors
• Enlist differential diagnosis
• Identify the clinical features of the associated diseases
• Plan pertinent investigations in diagnosis & their interpretation
• Make a management plan & use of different treatment options
Lecture 26: Breast lump with nipple retraction
Date: 10-03-2015
Teacher: Prof. Muhammad Idress
Learning Outcomes:
At the end of lecture the student should be able to:
- Discuss malignant diseases of breast
- Manage a patient with carcinoma breast

Lecture 27: Intestinal Obstruction with weight loss
Date: 12-03-2015
Teacher: Prof. Muhammad Hanif
Learning Outcomes:
At the end of lecture the student should be able to:
- Pathophysiology of large intestinal obstruction
- How to investigate such patients
- How to treat a patient suffering from large bowel obstruction

Lecture 28: Congenital Talipes Equinovarus Deformity (CTEV)
Date: 13-03-2015
Teacher: Prof. Riaz Ahmed
Learning Outcomes:
At the end of lecture the student should be able to:
- Define CTEV & its incidence
- Components of CTEV
- Pathoanatomy
- Clinical evaluation
- Radiological evaluation
- Classification
- Treatment
  1. Non-operative treatment (ponseti casting)
  2. Operative Treatment

Lecture 29: Chest Trauma (continued)
Date: 14-03-2015
Teacher: Prof. Naeem Zia
Learning Outcomes:
At the end of lecture the student should be able to:
- Investigations for a patient with thoracic trauma
- Management of urgent thoracic conditions
Lecture 30: Right abdominal mass
Date: 30-03-2015
Teacher: Prof. Jehangir Sarwar
Learning Outcomes:
At the end of lecture the student should be able to:
- Enumerate etiological factors of benign & malignant disease
- Enlist differential diagnosis
- Assess the clinical features of the associated diseases
- Identify different modalities in making a diagnosis & their interpretation
- Establish a management plan & use of different treatment options

Lecture 31: Facial swelling below ear lobule
Date: 30-03-2015
Teacher: Prof. Jehangir Sarwar
Learning Outcomes:
At the end of lecture the student should be able to:
- Diagnose and differentiate various parotid swellings
- Outline a management plan for parotid swellings
- Counsel a patient with parotid swelling

Lecture 32: Hematochezia
Date: 02-04-2015
Teacher: Prof. Muhammad Hanif
Learning Outcomes:
At the end of lecture the student should be able to:
- Different causes of hematochezia
- How to differentiate between hematochezia and malena
- How to clinically evaluate and investigate such patients
- How to treat a patient suffering from hematochezia

Lecture 33: Head Injuries
Date: 03-04-2015
Teacher: Prof. Arif Malik
Learning Outcomes:
At the end of lecture the student should be able to:
- Define concussion, contusion, counter and diffuse axonal injury.
- How will you categorize head injury into minimal, mild, moderate, severe and critical.
- Explain primary injury, secondary injury in a patient with head trauma
- What is post traumatic brain swelling, explain the process involved
• Critaria for admission
• Indication for CT Scan
• Indication for operation
• What is the Monroe-Kellie theory

Lecture 34: Hemeatemesis
Date: 04-04-2015
Teacher: Prof. Naeem Zia
Learning Outcomes:
At the end of lecture the student should be able to:
• Should be able to define hematemesis.
• Should be able to describe causes of hematemesis
• Should be able to elaborate characteristics of bleeding as hematemesis, melena, and hematochezia.
• Should be able to define management of patient with upper GI bleeding.

Lecture 35: Blunt abdominal trauma
Date: 06-04-2015
Teacher: Prof. Jehangir Sarwar
Learning Outcomes:
At the end of lecture the student should be able to:
• Define mechanism of injury
• Enlist the organs affected by trauma
• Identify approach considerations to blunt trauma
• Enlist diagnostic modalities
• Assess the clinical presentations of trauma according to organ affected
• Plan management according to organ involved
• Brief “Damage Control Surgery”

Lecture 36: Facial swelling with facial nerve palsy
Date: 07-04-2015
Teacher: Prof. Muhammad Idress
Learning Outcomes:
At the end of lecture the student should be able to:
• Diagnose and differentiate malignant parotid swellings
• Outline a management plan for parotid tumors
Lecture 37: Hematochezia with weight loss
Date: 09-04-2015
Teacher: Prof. Muhammad Hanif
Learning Outcomes:
At the end of lecture the student should be able to:
- Different causes of hematochezia
- How to differentiate between hematochezia and malena
- How to clinically evaluate and investigate such patients
- How to treat a patient suffering from hematochezia

Lecture 38: CVAs (Management of Stroke- ischemic/Hemorrhagic)
Date: 10-04-2015
Teacher: Prof. Arif Malik
Learning Outcomes:
At the end of lecture the student should be able to:
- Ischemic stroke-types, Cause, Prevention, treatment
- What are the causes of Hemorrhagic Stroke
- Classify hemorrhagic stroke
- How will you manage
- What are the surgical options in management

Lecture 39: Lower abdominal pain
Date: 11-04-2015
Teacher: Prof. Naeem Zia
Learning Outcomes:
At the end of lecture the student should be able to:
- DESCRIBE CAUSES OF LOWER ABDOMINAL PAIN
- DEFINE Clinical Diagnosis / DDx
- Characterizing the pain
  - Other history to elicit
  - Ways to remember such a broad differential
- History & Physical / Labs / Imaging
  - DEFINE Non-surgical causes of acute abdomen
  - ELABORATE Clinical Management
    - Decision to Operate AND
    - Atypical presentations

Lecture 40: Left lower chest & upper abdominal trauma
Date: 13-04-2015
Teacher: Prof. Jehangir Sarwar
Learning Outcomes:
At the end of lecture the student should be able to:
- Define mechanism of injury
- Enlist the organs affected by trauma
- Identify approach considerations to penetrating & blunt trauma
- Enlist diagnostic modalities
- Assess the clinical presentations of splenic trauma
- Learn grading of splenic injuries
- Plan management according to grades of injury
- Brief “Splenectomy & OPSI”

Lecture 41: Case based learning
Date: 14-04-2015
Teacher: Prof. Muhammad Idress
Learning Outcomes:
- PBL

Lecture 42: Case based learning
Date: 16-04-2015
Teacher: Prof. Muhammad Hanif
Learning Outcomes:
- PBL

Lecture 43: Brain Tumors
Date: 17-04-2015
Teacher: Prof. Arif Malik
Learning Outcomes:
- Classify Brain tumors
- How patients present clinically
- How will you investigate these patients
- Possible medical management and admission
- What are the surgical options
- What are the adjuvant therapies available

Lecture 44: Case based learning
Date: 18-04-2015
Teacher: Prof. Naeem Zia
Learning Outcomes:
- PBL
Lecture 45: Case based learning  
Date: 20-04-2015  
Teacher: Prof. Jehangir Sarwar  
Learning Outcomes:  
- PBL

Lecture 46: Case based learning  
Date: 21-04-2015  
Teacher: Prof. Muhammad Idress  
Learning Outcomes:  
- PBL

Lecture 47: Case based learning  
Date: 23-04-2015  
Teacher: Prof. Muhammad Hanif  
Learning Outcomes:  
- PBL

Lecture 48: Anesthetic Assessment (ASA classification)  
Date: 24-04-2015  
Teacher: Prof. Jawad Zaheer  
Learning Outcomes:  
Anesthetic Assessment  
- Identification of potential problems  
- Prescription of pre-medication  
- Obtaining informed consent/Discussion Anaesthesia plan with the patient.  
- ASA Classification  
  Practical conduct of Anaesthesia  
- Monitoring  
- Induction of Anaesthesia  
- Maintenance of Anaesthesia  
- Fluid management  
- Smooth recovery from Anaesthesia  
- Post Anaesthesia Care/Pain management

Lecture 49: Case based learning  
Date: 25-04-2015  
Teacher: Prof. Naeem Zia  
Learning Outcomes:
Anesthetic Assessment
  • PBL

Lecture 50: Case based learning
Date: 27-04-2015
Teacher: Prof. Jehangir Sarwar
Learning Outcomes:
  • PBL

Lecture 51: Case based learning
Date: 28-04-2015
Teacher: Prof. Muhammad Idress
Learning Outcomes:
  • PBL
LEARNING OUTCOME

PAEDIATRICS
Rawalpindi Medical College
Rawalpindi
Lecture 1: Neonatal Resuscitation

Date: 06-02-2015

Teacher: Prof. Rai Asghar

Learning Outcomes:
At the end of lecture the student should be able to:

- Identify the babies who will need resuscitation at birth
- Enlist steps of resuscitation as per algorithm
- Identify different sizes of face masks, ambu bags, Laryngoscope blades and their use.
- Perform ambu bagging and chest compressions

Lecture 2: Perinatal Asphyxia

Date: 07-02-2015

Teacher: Dr. Tariq Mahmood

Learning Outcomes:

Lecture 3: Inborn Error of new Metabolism

Date: 07-02-2015

Teacher: Prof. Rai Asghar

Learning Outcomes:

- Significance of metabolic disorders
- Common metabolic disorders (Glycogen Storage disease, Galactosemia, PKU, Gaucher disease, MPS) and their presentation
- Relevant investigations and their management

Lecture 4: Neonatal Sepsis

Date: 07-02-2015

Teacher: Dr. Tariq Mahmood

Learning Outcomes:

- Define Neonatal Sepsis
• Identify risk factors
• Enlist common causative organisms
• Discuss clinical features
• Plan pertinent investigations, interpret and take appropriate action
• Describe treatment
• Identify complications and manage

Lecture 5: LBW, Prematurity
Date: 20-02-2015
Teacher: Dr. Najaf Masood
Learning Outcomes:
• Define LBW babies
• Enlist common causes of LBW babies
• Enumerate important complications and problems of premature babies
• Manage prematurity and its complications

Lecture 6: Neonatal Seizures
Date: 21-02-2015
Teacher: Dr. Tariq Mahmood
Learning Outcomes:
• Define Neonatal Seizures
• Enlist common causes of Neonatal Seizures
• Describe clinical types
• Plan pertinent investigations, interpret and take appropriate action
• Manage according to the cause
• Plan follow up

Lecture 7: IDM
Date: 27-02-2015
Teacher: Prof. Rai Asghar
Learning Outcomes:
• Know the clinical manifestations of IDM
• Do immediate monitoring of IDM
• Identify important complications
• Plan pertinent investigations, interpret and take appropriate action
• Manage IDM and its complications
Lecture 8: Neonatal Jaundice  
Date: 28-02-2015  
Teacher: Dr. Tariq Mahmood  
Learning Outcomes:  
- Enlist common causes of unconjugated and conjugated hyperbilirubinemia at different days of life  
- Plan pertinent investigations, interpret and take appropriate action  
- Know indications of phototherapy and exchange transfusion.  
- Manage according to the cause  
- Identify complications and manage

Lecture 9: Asthma  
Date: 06-03-2015  
Teacher: Prof. Rai Asghar  
Learning Outcomes:  
- Define Asthma  
- Identify risk factors  
- Discuss clinical presentation  
- Classify as per GINA guidelines  
- Make differential diagnosis  
- Plan pertinent investigations, interpret and take appropriate action  
- Manage acute attack  
- Plan long term management

Lecture 10: Pneumonia  
Date: 07-03-2015  
Teacher: Dr. Tariq Mahmood  
Learning Outcomes:  
- Classify Pneumonia according to the WHO ARI protocol  
- Plan pertinent investigations, interpret and take appropriate action  
- Assess complications  
- Manage Pneumonia and its complications

Lecture 11: AGN  
Date: 13-03-2015  
Teacher: Prof. Rai Asghar  
Learning Outcomes:  
- Define AGN  
- Discuss clinical presentation  
- Make differential diagnosis  
- Plan pertinent investigations, interpret and take appropriate action
• Assess complications
• Manage

Lecture 12: ARF
Date: 14-03-2015
Teacher: Dr. Tariq Mahmood
Learning Outcomes:
• Define ARF
• Enlist common causes at different ages
• Describe clinical presentation
• Plan pertinent investigations, interpret and take appropriate action
• Make differential diagnosis
• Assess Complications
• Manage disease and its complication

Lecture 13: CRF
Date: 03-04-2015
Teacher: Prof. Rai Asghar
Learning Outcomes:
• Define CRF
• Enlist common causes at different ages
• Discuss clinical presentation
• Plan pertinent investigations, interpret and take appropriate action
• Make differential diagnosis
• Assess complications
• Manage disease and its complications

Lecture 14: Hypertension
Date: 04-04-2015
Teacher: Dr. Tariq Saeed
Learning Outcomes:
• Define hypertension
• Enlist causes
• Discuss clinical presentation
• Plan pertinent investigations, interpret and take appropriate action
• Know the management
• Assess and manage complications
Lecture 15: Nephrotic Syndrome
Date: 10-04-2015
Teacher: Dr. Najaf Masood
Learning Outcomes:
• Define Nephrotic Syndrome
• Discuss clinical presentation
• Differentiate minimal change disease from atypical nephrotic syndrome
• Plan pertinent investigations, interpret and take appropriate action
• Assess complications
• Manage disease and its complications

Lecture 16: Cyanotic Congenital H.D, TGA, TOF
Date: 11-04-2015
Teacher: Dr. Tariq Mahmood
Learning Outcomes:
TOF
• Define Tetralogy of Fallot
• Discuss haemodynamics of the defect
• Describe the clinical presentation
• Plan investigations, interpret and to take appropriate action
• Know medical and surgical Management
• Assess for complications and their management

Lecture 17: Congenital Heart Disease, VSD, PDA
Date: 17-04-2015
Teacher: Dr. Najaf Masood
Learning Outcomes:
VSD
• Describe the haemodynamics of VSD
• Know the clinical presentation
• Plan and interpret the Investigations
• Know the medical and surgical treatment
• Identify Complications and manage them

PDA
• Describe haemodynamics of PDA
• Know the Clinical Presentation and its complications
• Plan appropriate investigations
• Know the medical and surgical treatment
• Explain the Prognosis
**Lecture 18: Cerebral Palsy**  
**Date:** 18-04-2015  
**Teacher:** Dr. Tariq Saeed  
**Learning Outcomes:**  
- Define Cerebral palsy  
- Know etiology and classification  
- Describe different clinical presentation  
- Discuss the Differential diagnosis  
- Manage with multidisciplinary approach

**Lecture 19: Hypothyroidism**  
**Date:** 24-04-2015  
**Teacher:** Dr. Najaf Masood  
**Learning Outcomes:**  
- Enlist causes  
- Discuss clinical presentation at various ages  
- Plan, interpret Investigations and take appropriate action  
- Treat and counsel the parents  
- Do follow-up

**Lecture 20: Epilepsy**  
**Date:** 25-04-2015  
**Teacher:** Dr. Tariq Mahmood  
**Learning Outcomes:**  
- Define epilepsy  
- Enumerate common causes  
- Classify  
- Discuss the clinical presentation  
- Plan pertinent investigations, interpret and to take appropriate action  
- Manage epilepsy and Status epilepticus  
- Counsel the patient / parents  
- Plan follow-up