

SYLLABUS OF MOALAJAT

- **Clinical Biochemistry and Genetics**

- **Clinical Biochemistry**

- Basic chemistry of carbohydrates, lipids, amino acids and proteins.
- Enzymes: General characteristics of enzymes
& assay methods kinetics assay of some clinically important enzymes.
- Vitamins and minerals.
- Metabolism of carbohydrate lipids and amino acids
Classification of body fluids and their biochemical co-relation
(General considerations)
- LFT, KFT, Sugar profile, Lipid profile.
- Enzyme assays

Genetics DNA as Genetic Material: Structure of DNA, Structure of RNA DNA Replication, Transcription, Translation Mutations : (Basic) Chromosomal Abrasions Genetic disorders Autosomal and sex chromosomal abnormalities In-born errors of Carbohydrate, protein and lipid Metabolism (General considerations) DNA based diagnosis DNA based diagnostic probes Population based DNA testing Mutation detection Gene therapy

- **Usoole Tashkhees wa Tajveez (Principles of Diagnosis and Treatment)**

- Tashkhees ki gharz-o-ghaiyat Aam Istefsaraat

Rudade Mareez (The History Taking)

(a) Student's Approach to the Patient (b) History Taking

3. A. Amraze Nizame Aasab, Amraze Nafsania wa Ghudade Laqanati Amraze Nizame Tanaffus wa Daurane Khoon, Tauleede Dam, Ghudade Lymphaviah ((Diseases of Nervous System, Psychiatric diseases and Endocrine Systems, Diseases of Respiratory, Circulatory, Haemopoetic Systems, Lymph nodes and disease due to atmospheric pollution)

Amraze Nizame Asbi Suda wa aqsaam, Sarsam wa aqsaam, Warme dimaghi nukhai, Warme Aghshiyae dimagh, Duar, Qoma, Sara, Tashannuj, Rasha wa aqsaam (Daur raqs aur Parkinsonism), Sakta, Khuraje Dimagh, Falij, Laqwa, Istarkha, Huzale Zohri, Waja ul Asab, Dimaghi Sudde, Jiryane Khoon Dimaghi, Alzheimer's disease

Amraze Nafsaniya Sahar, Nisyaan, Malankholiya, Mania, Kaboos, Izterabe Nafsani, Izmevlaal, Ikhtinaqur raham, Psychosis, Neurosis, Ikhtilaj, Akhoni (Waham), Shahwate Kalbia, Jooul Baqar.

Ghudade Laqanati Ghuddae laqanati aur unki ifrazat ka tasawwur atibba ki nazar mein (umoomi jayaeza)

Ghuddae Nukhamiya Ghuddae Nukhamia ke ifrazat ki qillat wa ifrat se hone wale Amraz e.g., Kibrul Izm, Qazamah (Dwarfism), Zibetus sada, Salate nukhamiya.

Ghuddae Darqiya Ghuddae Darqiya ke ifrazat ki qillat wa ifrat se hone wale Amraz e.g., Farte Darqiya (Hyperthyroidism), Tasammume Darqiya, Qusoore Darqiyaq, Ghoter (Goiter) Cretinism, Ozema Mashati, Salate Darqiya. Ghuddae Janibud Daraiqa Ghuddae Janibud darqiya ke ifrazat ki qillat wa ifrat se hone wale Amraz e.g., Farte duraiqiya (Hyper parathyroidism), Qusoore Duraqiya (Hypo parathyroidism).

Banqaras Banqaras ke hissae Laqanati ke ifrazat ki qillat wa ifrat se hone wale Amraz e.g., Zibetus Sukkari (Diabetes mellitus), Qillate Sukkaridum (Hypoglycaemia), Salae Jazeerom (Insulinoma)

Ghuddae Fauqul Kulya Ghuddae Fauqul kulya ke ifrazat ki qillat wa ifrat se hone wale Amraz e.g., Mutalazema Koshing, Aldosteroma, warmul qawatim (Phoechochromocytoma), Addison's disease, Naqse aldosteromia (Hypo aldosteronism).

Metabolic Disorders Diabetes mellitus, lipid metabolic disorders, osteoporosis

Amraze Tavarus Sibghi Jasdi Amraz (Autosomal disorder), Sinfi vabasta Amraz (Sex linked diseases).

Amraze Khusiya Ifrazat ka mukhtasar jayeza, Khusiya aur amraze bah ka bahmi taalluq, Jinsi Amraz e.g., Jinsi muhtasar (sexual paucity), Aajil buloogh (Delayed or Incomplete puberty), Mutlazima Klinefelter (Klinefelter syndrome), Acquired testicular defects, Infertility, Salate Khusiya, Tasaddiur Rajal (Gynaecomastia).

Amraze Khusiyatur Raham Balooghe muhtasar (Isosexual precocious puberty), Turner syndrome, Uqr, Salate Khusiyat ur raham.

Amraz Nizame Tanaffus Sual, Warme Hanjra, Warme Qasbatur Riya, Warme Shobatur Riya, Sartane Shobatur Riya, Ittisae Shob, Nafsuddam, Bohtus Saut, Zeequn Nafas, Zaatul Riya, Zaatul Janb, Khuraje Riya, Nafkhatul Riya, Taqayyuhe Sadr, Istesqaus Sadr, Sartaane Riya, Suqoote Riya, Suddae Riya, Tadarrune Revi, Ittesae Shobatur Riya, Faza ki aaludgi se mutaaliq Amraze Riya. COPD, Tumours of bronchus and lungs, respiratory failure

Amraze Qalb wa Dauraane Khoon Sue mizaje qalb, Zoafe qalb, Khafqaan, Warm Ghilaafe qalb, Warm Azlate qalb, Warm Batanae qalb, Warm Batanae qalb hudaari, zubhai sadria, Ghashi, Izamul qalb, Iflaasul qalb, Maitatul qalb, Suqoote qalb imtelai, Corpulmonale, Zaghtuddum qavi. Saqoot Dauraane Khoon satahi, Tasallube sharayeen, Anurisma, Manuatul qalb, Cardiac arrhythmia, Khilqi amraze qalb, Butue qalb, Cardiac arrest, Cardiac failure, Sadma Heart block. pericardial diffusion

Amraz Samamate Qalb Tazaiuqur raseen (mitral stenosis), qusoourur raseen (mitral

incompetence), tazaiuqe aurata (aortic stenosis), qusoore aurata (aortic incompetence).

Amraze Sharayeen wa aurida (Diseases of vessels) Atherosclerosis, Aneurism, thrombophlebitis, Burger's disease, Raynaud's disease and other vascular diseases.

Taftishaat Amraze Qalb wa Daurane khoon ke jaanch ke mukhtalif qadeem wa jadeed tareeqon ke bare mein malumat. (e.g. ECG, Echocardiography, Cardiac imaging, Catheterization etc.)

Amraze Dam Faqrudam, Abyazuddam, Thalasaemia, Fasade Khoon, Nazafuddam Mizaji, Amraze Injimaduddam.thrombocytopenia

Immunological Disorders

Haemopoitic system

Lymph nodes and disease due to atmospheric pollution

3.B. Amraze Nizame Hazm, Baul wa Tanasul wa Istahala (Diseases of Digestive & Uro-genital systems and Metabolism)

Approach towards a patient with **Gastrointestinal Disease** Amraz Fam (Diseases of Mouth) Amraz Mari (Diseases of Oesophagus) Amraz Maedah (Diseases of Stomach):- Zofe medah Sue mizaje medah Warme medah Qarho-e-medah-o-asna-e-ashari (Peptic Ulcer Disease) Kasrat-o-qillat-e-hamoozat-e-maedi Sartaan-e-medah (Carcinoma of Stomach). Tukhma Sue-e-hazm Amraz Amaa (Diseases of Intestines):- Zarb-o-khilfa (Malabsorption Syndrome). Disorders of Absorption Ishaal (Diarrhoea). Zalaqul-ama. Qoolanj-e-ama (Intestinal colic). Baraz-ud-dam (Melena). Warm-e-qaulon (Inflammatory Bowel Disease). Warm-e-qaulon qarhi.(Ulcerative colitis) Diqq-e-ama (Intestinal Tuberculosis). Iltehaab-e-miqad (Proctitis). Acute Appendicitis and Peritonitis Irritable Bowel Syndrome, Intestinal Obstruction Common Diseases of Colon and Anorectum Diseases of Liver and Biliary Tract:- Zofe kabid. Su-e-mizaj-e-kabid. Warm-e-kabid (Hepatitis). Dubelatul kabid (Liver abscess). Yerqaan. (Hyperbilirubinemia) Alcoholic liver Disease Talaiuf-e-kabid (Cirrhosis of liver) Hepatic Failure Carcinoma of liver. Istaqqa (Ascitis). Izm ul kabid (Hepatomegaly). Hisatul mirara (Cholylithiasis) Warm e mirara (Cholecystitis). Other Biliary Diseases Amraz Tihal (Diseases of Pancreas):- Warm-e-banqaraas (Pancreatitis). All modern diagnostic procedures related to Digestive system. Amraz-e-Nizam-e-Baule-o-Tanassul wa Istahala (diseases of urinary and reproductive system and metabolism)

Diseases of **Urinary System**: Diseases of Kidney: Su-e-mizaj-e-kuliya. Zofe kuliya. Warm-e-kuliya.(Glomerulonephritis) Mutafarriq Amraz-e-kuliya. Diq ul kuliya. (RenalTuberculosis) Saqoot ul kuliya (Renal paranchymal Disease, Acute and Chronic Renal Failure). Nephrotic Syndrome Warm-e-Hauz ul kuliya (Pyelo-nephritis). Hisatul kuliya (Renel calculi). Hydronephrosis. Incontinence of urine. Baulud dam (Haematuria). Renal lesions in diabetes. Urinary Tract Diseases All modern diagnostic procedures related to Uro-genital system

Diseases of **Reproductive System**: Zofe baah. Surrat-e-inzal. Kasrat-e-Ehtalaam Aur mutalique amraz. Salpingitis Oophoritis Per vaginal Bleeding Disorders (Menorrhagia, Metrorrhagia etc.) Proctitis Sterility

Diseases of Metabolism: Common metabolic disorders and diseases

- **Amraze Mutaddiyah, Hummiyat, Jild wa Mafasil (Infectious diseases, Fevers and Diseases of Skin & Joints and Autoimmune disorders)**

Amraze Mutaddiyah (Infectious diseases) Mana'at and Tadiya Importance of Mana'at in the treatment of infectious diseases Classification of Infectious Diseases Micro-organism and host interaction Nosocomial Infections Bacterial Diseases Viral Diseases Fungal Diseases Protozoal Diseases Helminthic Diseases HIV and associated disorders

Hummiyat (Fevers) Tareef-e-Humma Ufoonat Aam Usoole Ilaj

Amraaze-Jild (Skin Diseases) Applied anatomy of Skin Functions and classification of skin Examination of Skin and an approach to diagnosing skin diseases Principles of therapy Disorders of pigmentation Disorders of nails Diseases of Hair Different Skin Diseases Skin Infections and Infestations Skin in systemic diseases Management of skin diseases cosmetology

Amraz-e-Mafasil (Rheumatology) Clinical examination of musculoskeletal system Applied anatomy, physiology and Investigations Major manifestations of musculoskeletal diseases Niqris (Gout) Wajaul Mafasil (Arthralgia) Warne-Mafasil (Arthritis) Tahajjur Mufasil (Fixation of Joint) Irqun-Nisa (Sciatica) Wajawul Zahar (Backache) Wajawul Khasra (Low Backache) Wajawul Qutn (Lumbago) Osteoporosis Ankylosing spondylosis Principles of Management of musculoskeletal disorders