



*In the name of God, the Most Gracious, the Most Merciful*



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## **INTRODUCTION**

The objective of the Postgraduate Medical Institute is to promote the Postgraduate Medical Education amongst the doctors by designing postgraduate medical studies programs in Balochistan keeping in view the provincial needs.

To achieve this objective the Postgraduate Medical Institute has developed structured training programs for specialist to be utilized in the health care facilities of tertiary and secondary levels. Beside clinical sciences the institute is also running Postgraduate training programs in Basic Medical Sciences.

The Postgraduate Medical Institute possesses all the relevant learning facilities like qualified and well trained faculty, teaching hospitals, libraries, lecture halls, clinicopathological conference halls, laboratories, audiovisual aids, internet access, etc.

The Postgraduate Medical Institute is affiliated with University of Balochistan. The format of the examination has been improved with more valid objectives and reliable methods of assessment. To

ensure the fairness and transparency the institute has introduced the use of assessment forms for scoring of all components of clinical and oral examination.

This booklet contains the information for the candidate of Diploma in Otorhinolaryngology (DLO) regarding eligibility criteria for admission to the course details of training program, Syllabus, Objective of the training program and format of examination.

## **ELIGIBILITY CRITERIA**

Requirements for Admission in Diploma in Otorhinolaryngology (DLO) course session 2013-15

- MBBS or equivalent qualification registered with the PMDC.
- One year House job in a teaching hospital six months of which should preferably be in the specialty of Otorhinolaryngology / Surgery & Allied.
- Only those doctors are eligible who are in the active service of Government of Balochistan for a minimum period of two years.
- Selection through entry test and selection committee approval.

## **TRAINING PROGRAM.**

The duration of program for Diploma in Otorhinolaryngology (DLO) is two years in this duration the trainees are suppose to attend the formal lectures in the relevant sciences but simultaneously trainees start their clinical programme which is specially designed for acquisition of knowledge, attitude and skill in the relevant field.

Following teaching modalities will be employed:

- Lectures
- Seminar Presentation and Journal Club Presentations
- Group Discussions
- Grand Rounds
- Clinico-pathological Conferences
- SEQ as assignments on the content areas
- Skill teaching in Operation theatres, emergency and ward settings
- Attend genetic clinics and rounds for at least one month.
- Self study, assignments and use of internet
- Bedside teaching rounds in ward
- OPD & Follow up clinics
- Long and short case presentations

This duration of two years is sub divided as follows:

### **1st Year**

- Basic Sciences lectures.
- Rotation in different units of Otorhinolaryngology.
- Indoor teaching in every clinical unit.

### **2nd Year**

- Clinical Residency Training in the unit of his/her own Supervisor.
- Clinical Sciences lectures in 2nd year.
- Indoor Clinical Teaching will be scheduled and organized by every individual unit and be sent to Post Graduate Medical Institute, Quetta.

## **AIMS AND OBJECTIVES OF THE COURSE**

The aim of 02 years diploma programme in Otorhinolaryngology (DLO) is to equip trainees with relevant professional knowledge, skills and ethical values to enable them to apply their acquired expertise at primary & secondary health care organizations as non-academic consultants.

### **OBJECTIVES**

At the end of training in Diploma in Otorhinolaryngology, a trainee doctor should be able to:

- Take a comprehensive and pertinent history of a patient presenting with ENT related complaints
- Perform detailed physical examination in a rational sequence that is both technically correct as well as methodical
- Elicit physical signs without discomfort to the patient.
- Evaluate patients in the setting of outpatients department, hospital wards and emergency.
- Order a set of relevant investigations considering availability, diagnostic yield, cost-effectiveness, side effects, and implications for management



- Comprehend Community Indicators related to individual's health.
- Aware of and can apply national and international guidelines for treatment and assessment.
- Counsel patients and relatives in patient's preferred language in elective and emergency situations in keeping principles of good communication skills, empathy and empowerment of patients.
- Exhibit emotional maturity and stability, integrity, ethical values and professional approach, sense of responsibility in day-to-day professional activities
- Take proper informed consent for physical examination and ensure confidentiality and appropriate environment for intimate physical examination.
- Act as an independent specialist at Tehsil and District Headquarter Hospital.
- Show initiative and become lifelong self-directed learners tapping on resources including clinical material, faculty, internet and on-line learning programmes and library.

## **SYLLABUS**

### **PART-I SYLLABUS**

#### **ANATOMY**

- Anatomy of the ear, nose, throat and trachea, larynx, and accessory sinuses, and their development.
- Blood supply, Nerve supply and the Lymphatic drainage of the ear, nose, throat and trachea, larynx, and accessory sinuses.
- Anatomy of the Central Nervous System with particular reference to ear, nose and throat
- Gross Anatomy of neck and chest in relation to trachea and oesophagus.
- Comparative study of Anatomy of the ear, nose and throat in relation to lower animals.
  
- **ANATOMY OF THE EAR**
  - Development and congenital anomalies
  - Anatomy of temporal bone
  - Anatomy of the external ear
  - Gross anatomy of the pinna and external auditory meatus Its relations to the adjacent structures

along with blood supply, lymphatic drainage and nerve supply.

### **ATTAINMENTS**

At the end of this session one should be able to know the gross anatomy of external ear, its blood supply, nerve supply and lymphatic drainage of the along with relations to the adjacent structures.

- **MIDDLE EAR**

- Various walls of the middle ear its contents and relations with each other and gross anatomy of the various air cells and Eustachian tube.

### **ATTAINMENTS**

At the end one should be able to know relations of the middle ear its contents along with their relations, anatomy of the various air cells their relations along with Eustachian tube gross anatomy, and relations.

- **INTERNAL EAR**

- Anatomy of the internal ear
- Structure of the organ of Corti
- 8<sup>th</sup> cranial nerve

- Structures of the internal auditory meatus
- Brain stem
- CPA structure
- Vidian nerve
- Infratemporal fossa
- Pterygopalatine fossa

### **ATTAINMENTS**

At the end of this session one should be able to know anatomy of the internal ear along with endolymphatic system. He knows structures of the internal auditory meatus along with CPA structures. He knows detailed anatomy of the 8<sup>th</sup> nerve and pathway of hearing. Anatomy of the brain stem is necessary. He should be able to tell the vidian nerve and structures of the infratemporal fossa and pterygopalatine fossa.

### **• ANATOMY OF THE NOSE**

- Development of nose and sinuses along with congenital anomalies
- Gross anatomy of the nasal cavity, Histology Olfactory pathway

- **PARANASAL SINUSES**

Gross anatomy of the paranasal sinuses their relations to various structures

**ATTAINMENTS**

At the end of this session one should know development of nose and sinuses along with congenital anomalies. He should also know the gross anatomy of nasal walls along with histology. He should also be able to describe the various sinuses along with their relations to various structures.

- **PHARYNX**

- Development of the pharynx and oral cavity along with congenital anomalies.
- Gross anatomy of the nasopharynx and various structures in the walls and their relation to adjacent structures.
- Anatomy of the oropharynx its various walls specially tonsil its relations and blood supply along with nerve supply and lymphatic drainage.
- Gross anatomy of the hypopharynx its various parts and relation to the larynx

## **ATTAINMENTS**

At the end of this session one should be able to know the anatomy of nasopharynx along with its structures and muscles of the pharynx various structures in its wall specially adenoids and Eustachian tubes. He should know the gross anatomy of the oropharynx specially gross anatomy of the tonsil, its relations with various structures along with blood supply and lymphatic drainage. Gross anatomy of the hypopharynx specially pyriform fossa and relation to the laryngeal structures.

- **LARYNX**

- Gross anatomy of the larynx.
- Details of the laryngeal cartilages
- Muscles of the larynx
- Nerve supply and blood supply of the larynx along with lymphatic drainage and its relations to the various structures

## **ATTAINMENTS**

At the end of this session one should know gross anatomy of the larynx, its cartilages, details of various muscles and their

functions. One should know blood supply, nerve supply and lymphatic drainage. He should know the various compartments of the larynx.

- **OESOPHAGUS**

- Gross anatomy of the oesophagus its structure and relation to various structures

**ATTAINMENTS**

At the end of this session one should know gross anatomy, its size structure of the wall and its relations to the various structures.

- **TRACHEOBRONCHIAL TREE**

- Gross anatomy of the trachea and bronchi and gross anatomy of the lungs

**ATTAINMENTS**

At the end of the session one should know gross anatomy of the trachesobronchial tree along with Lungs and their relations and structure of the trachea and bronchial tree.

- **SALIVARY GLANDS**

- Gross anatomy of the major salivary glands along with their structure and relation to the various structure

## **ATTAINMENTS**

At the end of this session one should be able to know the gross anatomy of the major salivary glands, their histology and specially relation to the other structures.

- **NECK**

- Congenital anomalies of the neck
- Triangles of the neck
- Lymphatics of the neck
- Thyroid and parathyroid glands

## **ATTAINMENTS**

At the end of this section one should know gross anatomy of the neck various triangles lymphatics of the neck thyroid and parathyroid glands.

## **PHYSIOLOGY**

- Physiology of ear, nose, throat and oesophagus
- Comparative study of physiology of the ear, nose and throat in relation to lower animals
- **ACOUSTICS**
  - Physics of sound



- **EAR**

- Conduction of sound from the tympanic membrane to the cochlea
- Transmission of sound through the bone
- Functional anatomy of the cochlea
- Transmission of the sound waves in the cochlea
- Functions of the organ of Corti
- Determination of sound frequency
- Determination of sound intensity
- Auditory pathway
- Functions of cerebral cortex in hearing
- The vestibular apparatus
- Functions of the utricle and saccule in the maintenance of static equilibrium
- Semicircular canals and their role in rotatory movement

### **ATTAINMENTS**

At the end of this session one should be able to know the intensity of sound and frequency of sound. He should also be to know that how the sound is transmitted from the air to the cochlea through air conduction and bone conduction. He

should know the functions and structure of Organ of Corti. Hearing pathway along with role of Cerebral cortex in hearing is necessary. Hearing theories are also included in the course.

He should also know the functional anatomy of semicircular canal and about the various factors responsible for balance maintenance.

- **NOSE**

- Functions of nose
- Sense of smell
- Olfactory membrane
- Stimulation of the olfactory cells
- Transmission of the smell signals to the central nervous system

### **ATTAINMENTS**

At the end of this session, one should know about the physiology of the nose one should be to the functions of the nose in detail. He should also know the olfactory pathway and about the sense of smell

## • **PHARYNX AND ORAL CAVITY**

- Sense of taste Guyton 745
- Primary sensations of taste
- Threshold of taste
- Taste bud and its functions
- Transmission of taste signals into the central nervous system
- Salivary glands Guyton 772
- Secretion of saliva
- Functions of saliva
- Nervous regulation of salivary secretion Guyton 772
- Mastication (chewing) Guyton 759
- Swallowing (deglutination) Guyton 760

## **ATTAINMENTS**

At the end of this session one should know the secretion of saliva and its functions. Taste buds and sensation of taste along with pathway and various primary taste sensations. He should be able to describe the process of chewing and deglutination.

## • **LARYNX**

- Functions of larynx

- **NECK**

- Congenital anomalies
- Thyroid and parathyroids
- Formation and secretion of thyroid hormones
- Functions of the thyroid hormones
- Regulation of thyroid hormone secretion
- Diseases of the thyroid

### **ATTAINMENTS**

At the end of this session one should know about the thyroid gland, its hormones their hormones and functions along with various diseases of the thyroids gland

### **BIOCHEMISTRY**

- Membrane biochemistry and signal transduction
- Gene expression and the synthesis of proteins
- Bioenergetics; fuel oxidation and the generation of ATP
- Enzymes and biologic catalysis
- Tissue metabolism

## **VITAMINS**

- Classification, components, sources, absorption and functions (physiological and biochemical role).
- Daily requirements, effects of deficiency and hypervitaminosis.
- Salient morphologic features of diseases related to deficiency or excess of vitamins.

## **MINERALS**

- Sources of calcium, phosphorous, iron, iodine, fluorine, magnesium and manganese.
- Trace elements and their clinical importance.
- Absorption and factors required for it.
- Functions and fate.

## **METABOLISM**

- Metabolic rate and basal metabolic rate
- Factors influencing metabolic rate, principles of measurement.

## **CARBOHYDRATES**

- Classification and dietary sources.
- Digestion, absorption and utilization of dietary carbohydrates.

## **LIPIDS**

- Classification of simple, derived and compound lipids.
- Dietary sources.
- Digestion, absorption, utilization and control.
- Fatty acid oxidation with steps involved.
- Ketogenesis and its significance.
- Lipotropic factors and their actions. lipoproteins, types and importance.

## **PROTEINS AND AMINO ACIDS**

- Classification and dietary sources of proteins.
- Digestion, absorption, utilization and control.
- Fate of amino acids.
- Urea formation with steps involved.
- Functions and effects of deficiency.

## **NUCLEOPROTEINS:**

- Structure and metabolism.

## **PIGMENT METABOLISM**

- Basic concept of endogenous and exogenous pigments.
- Causes of pigmentation and depigmentation.

- Disorders of pigment metabolism, inherited disorders, acquired disorders from deficiency or excess of vitamins, minerals, fats, carbohydrates, proteins etc.

## **PHARMACOLOGY**

- Introduction to Pharmacology
- Receptors
- Mechanisms of Drug Action
- Pharmacokinetics
- Pharmacokinetic Process
  - Absorption
  - Distribution
  - Metabolism
  - Desired Plasma Concentration
  - Volume of Distribution
  - Elimination
  - Elimination rate constant and half life
  - Creatinine Clearance
- Drug Effect
  - Beneficial Responses
  - Harmful Responses
  - Allergic Responses

- Drug Dependence, Addiction, Abuse and Tolerance
- Drug Interactions
- Dialysis
- Drug use in pregnancy and in children
- Ototoxicity and medication

## **PATHOLOGY**

### **Cell Injury and adaptation**

#### Cell Injury

- Reversible and Irreversible Injury
- Fatty change, Pigmentation, Pathologic calcification
- Necrosis and Gangrene

#### Cellular adaptation

- Atrophy, Hypertrophy,
- Hyperplasia, Metaplasia, Aplasia

### **Inflammation**

- **Acute inflammation** --- Vascular changes, Chemotaxis, Opsonization and Phagocytosis
- Enlist the cellular components and chemical mediators of acute inflammation
- Differentiate between exudates and transudate



- **Chronic inflammation**

- Etiological factors, Granuloma

- **Cell repair and wound healing**

- Regeneration and Repair
- Healing--- steps of wound healing by first and second intention
- Factors affecting healing
- Enlist the complications of wound healing

- **Haemodynamic disorders**

- Define and classify the terms Edema, Haemorrhage,
- Thrombosis, Embolism, Infarction & Hyperaemia
- Define and classify Shock with causes of each.
- Describe the compensatory mechanisms involved in shock.
- Describe the pathogenesis and possible consequences of thrombosis
- Describe the difference between arterial and venous emboli

- **Neoplasia**

- Dysplasia and Neoplasia
- Differences between benign and malignant neoplasms

- Enlist the common etiological factors for neoplasia
- Define and discuss the different modes of metastasis
- TNM staging system and tumor grade

## **PART-II SYLLABUS**

### **OTOLOGY**

- Examination of Ear.
- Aetiopathology of Inflammatory Conditions of External & Middle Ear
- Pathology of Cochlea.
- Pathology of Vestibular System.
- Diseases of External Ear.
- Ear Trauma.
- Acute Suppurative Otitis Media.
- Management of Acute Suppurative Otitis Media
- Chronic Suppurative Otitis Media.
- Management of Chronic Suppurative Otitis Media.
- Reconstruction of the Ear.
- Complication of Suppurative Otitis Media.
- Otalgia.
- Otosclerosis.

- Diseases of Temporal Bone.
- Sensorineural Hearing Loss.
- Sudden & Fluctuant Sensorineural Hearing Loss.
- Vertigo.
- Meniere's disease.
- Ototoxicity.
- Vestibular Schwannoma.
- Epithelial Tumours of External Auditory Meatus.
- Glomus & Other Tumours of the Ear.
- Disorders of Facial Nerve.
- Cochlear Implants.
- Presbycusis.
- Implantable Hearing Devices.

### **SURGICAL PROCEDURES**

- Trauma of the pinna and Tympanic membrane management
- Pinnaplasty
- Meatoplasty
- Myringoplasty
- Mastoidectomy
- Tympanoplasty

- Stapes surgery
- Surgery of the Facial Nerve.
- Surgery of the Vestibular System.
- Plastic Surgery of the Ear.
  
- Ossiculoplasty
- Labyrinthectomy
- Suregry of the facial nerve
- 8<sup>th</sup> nerve tumours
- CPA tuymours management

### **RHINOLOGY**

- Examination of Nose.
- Conditions of the External Nose.
- Congenital Anomalies of the Nose.
- Evaluation of the Nasal Airway & Nasal Challenge.
- Abnormalities of Smell.
- Mechanism & Treatment of Allergic Rhinitis.
- Food Allergy & Intolerance.
- Infective Rhinitis & Sinusitis.
- Intrinsic Rhinitis.
- Nasal Polyps.

- The Nasal Septum.
- Surgical Management of Sinusitis.
- Complications of Sinusitis.
- Cerebrospinal Fluid Rhinorrhoea.
- The Upper Airways & their relation to the respiratory System.
- Fracture of Facial Skeleton.
- Rhinoplasty.
- Epistaxis.
- Snoring & Sleep Apnoea.
- Non-Healing Granulomas.
- Facial pain & Headache.
- Aspects of Dental Surgery for Otorhinolaryngology.
- Trans-Sphenoidal Hypophysectomy.
- The Orbit.
- Neoplasms of Nose & Paranasal sinuses.

### **SURGICAL PROCEDURES**

All the major and minor surgical procedures performed on nose and sinuses along with steps and complications and their management.

At the end of this section one should be able to do

- Proof puncture

- Intranasal antrostomy
- CWL
- SMR
- Intranasal polypectomy

### **PHARYNGOLOGY**

- Examination of the oral cavity and pharynx
- Congenital anomalies
- Inflammatory conditions of the oral cavity
- Tumors of the oral cavity
- Inflammatory conditions of the nasopharynx
- Tumours of the nasopharynx management
- Inflammatory conditions of the oropharynx
- Tumours of the oropharynx
- Hypopharyngeal tumours

### **SURGICAL PROCEDURES**

- Adenoidectomy
- Examination of nasopharynx under anaesthesia
- Excision of nasopharyngeal tumours
- Drainage of abscess of the pharynx and oral cavity
- Tonsillectomy
- Management of tonsillectomy complications

- Pharyngeal pouches and their management
- All the procedures performed for pharyngeal tumours

### **LARYNGOLOGY & HEAD, NECK**

- Examination & endoscopy of the upper aero digestive tract.
- Oral cavity.
- Acute & chronic infections of pharynx & tonsils.
- Acute & chronic laryngitis.
- Sleep apnoea.
- Adenoidal and tonsillar pathology
- Disorders of voice.
- Management of obstructed airway & tracheostomy.
- Trauma & stenosis of larynx.
- Neurological affections of larynx & pharynx.
- Pharyngeal pouches.
- Tumours of the larynx.
- Angiofibroma.
- Nasopharynx (the postnasal space).
- Tumours of oropharynx & lymphomas of the head & neck

- Benign diseases of neck.
- Malignant neck diseases;
- The thyroid & parathyroid gland.
- Non-neoplastic salivary gland diseases.
  
- Benign salivary gland tumours.
- Malignant salivary gland tumours.
- Tumours of infratemporal fossa & parapharyngeal space.
- Cysts, granulomas & tumours of the jaw, nose & sinuses.
- The esophagus in otolaryngology.
- Facial plastic surgery.
- Plastic & reconstructive surgery of the head & neck.
- Terminal Care of Patients with head & neck Cancer.

### **AUDIOLOGY**

- Acoustics
- Computers in Audiology.
- Epidemiology.
- Otological Symptoms & Emotional Disturbances.
- Clinical tests of Hearing & Balance.



- Pharmacological Treatment of Hearing & Balance Disorders.
- Legal & Ethical Matters.
- Prevention of Hearing & Balance Disorders.
- Hearing Overview.
- Causes of Hearing Disorders.
- Noise & the Ear.
- Diagnostic Audiometry.
- Audiological Rehabilitation.
- Hearing Aids.
- Cochlear Implants.
- Tactile Aids.
- Central Auditory Dysfunction
- Tinnitus
- Overview of Balance
- Causes of Balance Disorders.
- Diagnostic Testing of Vestibular System
- Rehabilitation of Balance Disorders.

### **PAEDIATRIC OTOLARYNGOLOGY**

- Improving Paediatric Otolaryngological Consultation.
- Genetic Factors & Deafness.

- The Causes of Deafness.
- Testing Hearing in Children.
- Screening & Surveillance for Hearing Impairment in Preschool Children.
- Otitis Media with Effusion.
- Acute Suppurative Otitis Media in Children.
- Chronic Suppurative Otitis Media in Children.
- Surgery of Congenital Abnormalities of the External & Middle Ear.
- Management of Hearing Impaired Child.
- Cochlear Implantation in Children.
- Vestibular Disorders in Children.
- Speech & Language.
- Foreign Bodies in the Ear & Nose.
- Congenital Anomalies of the Nose.
- Craniofacial Anomalies.
- Nasal Obstruction & Rhinorrhoea in Infants & Children.
- Tonsils & Adenoids.
- Dental development, Orthodontics, Cleft lip & Cleft palate.

- Sleep Apnoea.
- Stertor & Stridor.
- Congenital Disorders of Larynx, Trachea & Bronchi.
- Stenosis of Larynx.
- Acute Laryngeal Infections.
- Foreign Bodies in Larynx & Trachea.
- Tracheostomy & Decannulation.
- Diseases of the Esophagus in Children.
- Branchial cleft Anomalies, Thyroglossal cysts & Fistulae.
- Tumours of the Head & Neck in Children.
- Salivary Glands Disorders in Children.
- The Drooling Child.
- Recurrent Respiratory Papillomatosis.

### **Emergencies in Otolaryngology-Head and Neck Surgery**

- Airway Obstruction.
- Inspired or Ingested Foreign Bodies.
- Sore Throat or Difficulty Swallowing.
- Epistaxis.
- Ear Complaints.
- Head and Neck Infections.
- Laryngeal and Tracheal Trauma.
- Facial Trauma

## **EXAMINATION / EVALUATION.**

The Diploma in Otorhinolaryngology (DLO) Examination will comprise of two parts. The format of examination shall be as under:-

### **Eligibility to appear in Part – I Examination**

- a. Application by the Trainee recommended by the Supervisor.
- b. Certificate by the Supervisor, countersigned by Dean PGMI that Trainee has regularly attended at least 75% of the basic science lectures, demonstration, tutorials, and practical or clinical work both in-patients and out-patients of Part-1 education.

### **Part I Examination:**

At the end of 1<sup>st</sup> Calendar Year, the Part-I examination will comprise of Basic Sciences Education papers relevant to the specialty of Otorhinolaryngology of only theory MCQ types as under:

#### **Paper I**

Anatomy & Pharmacology 100 Marks

#### **Paper II**

Physiology, Biochemistry & Pathology 100 Marks

**Total = 200 Marks**

### **Eligibility to appear in Part - II Examination**

1. The Trainee has completed the prescribed period of training of the course.
2. The Trainee has passed the Intermediate Evaluation (Part-I Examination).
3. Certificate by the Supervisor that the Log Book of Trainee is complete in all aspects and is signed by the Co-Supervisor and the Supervisor. The original Log Book will be presented by the Trainee during Practical / Oral examination.
4. The application form for Part-II examination with recommendation of the Supervisor.

### **Part-II Examination:**

#### **Paper-I:-**

MCQ's (One Best Type)	100 Questions	100 Marks
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#### **Paper-II:-**

Short Essay (Ten Marks Each)	10 Questions	100 Marks
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**Total = 200 Marks**

### **Clinical Examination:-**

Long Case	One Case	50 Marks
Short Case	Four Cases	80 Marks
Table Viva		60 Marks
Internal Evaluation		10 Marks

**Total = 200 Marks**

**Note:** Trainees who pass theory examination are allowed to appear in viva Voce / practical examination.

It is compulsory to pass all the component parts of the each subject separately. In case of failure to obtain 50% marks in any of components of examination Trainee will have to appear in all components of examination again. In the remaining prescribed three attempts allowed.

### **The panel of examiner will be as follows:-**

**External Examiner**                      **One**

(To be selected by University of Balochistan from the list of three examiners available)

**Internal Examiner**                      **Two**

(From the faculty of BMC)

## **LOG BOOK.**

Log book should include adequate number of diagnostic and therapeutic procedures observed and performed the indications for the procedure, any complications and the interpretation of the results, routine and emergency management of patients, case presentations in CPCs, journal club meetings and literature review.

Log Book will have 5% weightage in final examination.

Proposed Format of Log Book is as follows:

Candidate's Name: \_\_\_\_\_

Roll No. \_\_\_\_\_

The above mentioned procedures shall be entered in the log book as per format

### **PROCEDURES**

- Tonsillectomy
- Adenoidectomy
- Oesophagoscopy
- Bronchoscopy
- Incision drainage of Pharyngeal abscesses
- Septoplasty /SMR
- Turbinectomy
- Proof Puncture (Antral Washout), Inferior Meatal Antrostomy,
- Intra nasal Polypectomy

- Cald Well Luc's Operation: Cortical Mastoidectomy, Radical Mastoidectomy Modified, Radical Mastoidectomy

<b>S #</b>	<b>Date</b>	<b>Name of Patient, Age, Sex &amp; Admission No</b>	<b>Diagnosis</b>	<b>Procedure Performed</b>	<b>Supervisor's Signature</b>

### **EMERGENCIES HANDLED**

<b>S #</b>	<b>Date</b>	<b>Name of Patient, Age, Sex &amp; Admission No</b>	<b>Diagnosis</b>	<b>Procedure / Management</b>	<b>Supervisor's Signature</b>

### **CASE PRESENTED**

<b>S #</b>	<b>Date</b>	<b>Name of Patient, Age, Sex &amp; Admission No</b>	<b>Case Presented</b>	<b>Supervisor's Signature</b>



## SEMINAR / JOURNAL CLUB PRESENTATION

S #	Date	Topic	Supervisor's Signature

### Evaluation Record

(Excellent, Good, Adequate, Inadequate, Poor)

At the end of the rotation, each faculty member will provide an evaluation of the clinical performance of the fellow.

S #	Date	Method of Evaluation (Oral, Practical, Theory)	Rating	Signature

- Log Book will be signed by the supervisor/ Co- Supervisor regularly.
- Log Book completion is must before the candidate Final examination forms are signed.
- Log Book should be used in Practical/Clinical Examination at viva voce table or at TOCS cabin.

## **LEAVE.**

The Postgraduate Trainees will be entitled to avail the leave as per S&GAD and postgraduate studies schedule, after the recommendation of their supervisor and approval of the Registrar PGMI, Quetta.

### **RECOMMENDED BOOKS.**

- Lore. An Atlas of Head and Neck Surgery. 4th ed.
- Scott Brown Text Book of Otolaryngology
- Glasscock-Shambaugh Surgery of the Ear. 5th ed.
- Logan. McMinn's Clor Atlas of Head and Neck Anatomy. 3<sup>rd</sup> ed.
- Prescott. Oxford Hand Book of ENT
- Kerr. Scott-Brown's Otolaryngology. 6th ed.;1997
- Watkinson. Stell & Maran's Head & Neck Surgery4<sup>th</sup> ed
- Bailey. Head and Neck Surgery –Otolaryngology. 3<sup>rd</sup> ed.
- Ballenger. Ballenger's Otolaryngology: Head and Neck

### **JOURNALS.**

- American Journal of Otorhinology.
- The British Journal of Otolaryngology
- Journal of Academy of Otolaryngology and Head and Neck Surgery
- Bhatti Journal of Otorhinology
- Pakistan Journal of Otorhinology

## **TRAINING SITE**

- Post Graduate Medical Institute Quetta.
- Bolan Medical Complex Hospital Quetta.
- Sandeman (Prov :) Teaching Hospital Quetta.

## **FACULTY MEMBERS.**

### **PROFESSOR:**

Dr. Sultan Ahmed MBBS, D.L.O, M.S

### **ASSOCIATE PROFESSOR:**

Dr. Muhammad Siddique MBBS. FCPS

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