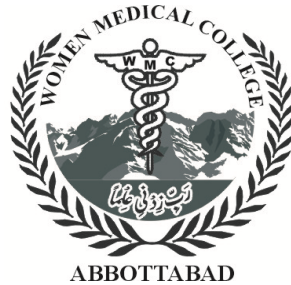


# Women Medical College

Department of Medical Education & Research

Abbottabad

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## Study Guide ENT 1-5 Year MBBS

# Teaching Hours Allocation

Table 1: Themes & Hours Allocation

Themes	In class teaching (Hours)	Clinical (Hours)
<b>Theme 01:</b> Foundation of Otorhinolaryngology & Head and Neck + <b>Theme 02:</b> Sore Throat	1	180 hrs
	11	
<b>Theme 03:</b> Difficulty in Swallowing	04	
<b>Theme 04:</b> Hoarseness & Stridor	14	
<b>Theme 05:</b> Deafness, Ear Discharge & Dizziness	8	
<b>Theme 06:</b> Nasal Obstruction	8	
<b>Theme 07:</b> Swelling Neck	04	

# Learning Objectives

**By the end of ENT Module, 4th year MBBS students will be able to:**

1. Describe the anatomy and physiology of Ear, Nose, Throat & Neck.
2. Obtain appropriate history, examine Ear, Nose, oral cavity, pharynx, larynx and Neck including mirror examinations and functional examinations of these areas.
3. Describe benign and malignant tumors involving the ENT and Head & Neck.
4. Assist in diagnostic procedures and take swab for culture and sensitivity from ear, Nose & throat under supervision.
5. Prescribe hematological investigations, x-ray paranasal sinuses, CT/MRI scan of paranasal sinuses, temporal bone and Head & Neck & interpret it.
6. Perform clinical tests of hearing, tuning fork tests and balance independently
7. Interpret pure tone audiogram & tympanogram.
8. Describe the ABC protocol for resuscitation of traumatic patients.
9. Discuss differential diagnosis of membrane on the tonsils and describe diphtheria.
10. Describe sialadenitis, sialolithiasis and enumerate the benign and malignant salivary tumors.
11. Discuss a treatment plan for the patients with various common diseases of the ENT and Head and Neck region.
12. Describe dysphagia and its causes, Plummer-Vinson Syndrome and malignant tumors of hypopharynx that could lead to dysphagia and hoarseness along with their management.
13. Describe the management of corrosive ingestion and foreign body in the esophagus.
14. Describe various congenital and acquired disorders of the ENT and Head & Neck region.

15. Describe the significance of hoarseness and stridor & enumerate their causes and clinical features of respiratory obstruction.
16. Differentiate clinically between various types of stridor and possible site of obstruction.
17. Describe tracheostomy and indications for this procedure.
18. Describe squamous cell carcinoma of the larynx and the impact of stage of disease on management and survival of patient.
19. Explain the mutual association of hearing and balance disorders & the various conditions that give rise to these disorders.
20. Describe the clinical features and course of otosclerosis, Meniere's disease, vestibular neuronitis & BPPV.
21. Diagnose suppurative otitis media & describe its intracranial and extra cranial complications.
22. Describe the 'rehabilitation of deaf and mute child' and the impact of hearing impairment in children.
23. Describe rhinosinusitis, its various types of rhino-sinusitis and its complications.
24. Describe the diseases of the nasal septum & define DNS and enumerate its various types.
25. Describe the pathophysiology, types, and management of Sino nasal polyposis.
26. Enumerate various conditions resulting in nasal obstruction & discharge.
27. Describe various types of allergic & non-allergic rhino-sinusitis.
28. Enumerate fungal and other granulomatous diseases of the nose & paranasal sinuses and describe their management.
29. Categorize various conditions benign & malignant neoplasms of the nose & paranasal sinuses.
30. Classify various types of neck swellings and describe clinical differentiating features of benign & malignant neck masses.

31. Describe a classification of various lymph nodes levels in the neck and describe the lymphatic drainage of the head and neck.
32. Obtain informed consent from patient and communicate with the patients, their families and community regarding diseases & its relevant issues.
33. Describe the anatomy and physiology of salivary glands
34. Describe benign & malignant diseases of the salivary gland.

# **ENT Module**

## **4<sup>th</sup> Year MBBS**

## Theme I – Sore Throat

**Table 1: Sore Throat**

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assessment
<b>Anatomy &amp; physiology of oral cavity, Pharynx &amp; salivary glands</b>	1hours	<ol style="list-style-type: none"> <li>1. Discuss the anatomy of oral cavity and site classification of oral cavity.</li> <li>2. Discuss applied anatomy of pharynx &amp; mechanism of deglutition</li> <li>3. Discuss applied anatomy of nasopharynx and anatomy and physiology of adenoids</li> <li>4. Discuss applied anatomy of oropharynx and anatomy and physiology of pharyngeal tonsils</li> <li>5. Discuss the anatomy of minor and major salivary glands</li> </ol>	Lecture, Discussion	MCQ,

<b>Acute Pharyngitis</b>	1 hour	6. Discuss classification, types, aetiology, clinical features, diagnosis and treatment of acute pharyngitis	Lecture/Discussion.	MCQ/Viva
<b>Chronic Pharyngitis</b>		7. Discuss classification, types, aetiology, clinical features, diagnosis and treatment of chronic pharyngitis		
<b>Acute Tonsillitis/ Peritonsillar abscess (Quinsy)</b>	1 hour	8. Discuss classification, types, aetiology, clinical features, diagnosis and treatment of acute tonsillitis 9. Discuss the aetiology, clinical features and treatment of quinsy	Lecture/Discussion.	MCQ/Viva
<b>Chronic Tonsillitis</b>		10. Discuss classification, types, aetiology, clinical features, diagnosis and treatment of chronic tonsillitis	Lecture/Discussion.	MCQ/Viva

<b>Oral ulceration</b>	1 hours	11. Enumerate differential diagnosis of oral ulcers and discuss management of Aphthous ulcers	Lecture/Discussion.	MCQ,
<b>Trauma to the palate and Oropharynx</b>	1 hour	12. Discuss the principles of soft tissue & bone repair in palatal and pharyngeal trauma.	Lecture/Discussion.	MCQ/Viva/OSCE
<b>Carcinoma of oral cavity</b>	1 hour	13. Discuss the aetiology, clinical features and treatment of oral carcinoma	Lecture/Discussion.	MCQ/Viva/OSCE
<b>Approach to a patient with sore throat</b>	1 hour	14. Enumerate differentials of sore throat and discuss important differentiating points	Lecture/Discussion.	MCQ/Viva/OSCE
<b>Anatomy &amp; physiology of salivary glands</b>		15. Describe the anatomy & physiology of parotid, submandibular, sublingual & minor salivary glands	Lecture/Discussion.	MCQ/Viva/OSCE
<b>Non neoplastic disorders of the salivary glands</b>	1 hour	16. Describe non neoplastic disorders of salivary glands, its management and treatment	Lecture/Discussion.	MCQ/Viva/OSCE
<b>Sialolithiasis and sialectasis</b>	1 hour	17. Describe stone formation and stasis of secretions in the salivary glands and its management	Lecture/Discussion.	MCQ/Viva/OSCE
<b>Neoplasm of salivary glands</b>	2 hour	18. Describe the features, course and management of benign and malignant,	Lecture/Discussion.	MCQ/Viva/OSCE

		submandibular, sublingual and minor salivary glands		
<b>Complications of salivary gland surgeries</b>		19. Describe in detail different surgical procedures of salivary glands and its complications	Lecture/Discussion.	MCQ/Viva/OSCE

## Theme II - Difficulty in Swallowing

**Table 2 : Difficulty in Swallowing**

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assessment
<b>Dysphagia &amp; Plummer Vinson Syndrome</b>	1 hour	20. Discuss Dysphagia & the anatomy and physiology of Esophagus and the appropriate medical and surgical treatment of dysphagia. 21. Discuss PVS & the predisposing factors for causation & management	Lecture/ Small Group Discussion	MCQ/Viva
<b>Pharyngeal and esophageal Pouches</b>	1 hour	22. Discuss Pharyngeal pouch & the predisposing factors, clinical features, and treatment.		MCQ/Viva
<b>Oropharyngeal Tumors</b>	1 hour	23. Enumerate oropharyngeal tumors. Discuss the types, aetiology and treatment of oropharyngeal carcinoma.	Lecture/ Small Group Discussion	MCQ/Viva
<b>Hypopharyngeal Tumors</b>	1 hour	24. Enumerate oropharyngeal tumors. Discuss the aetiology and treatment of hypopharyngeal carcinoma.	Lecture/ Small Group Discussion	MCQ/Viva

<b>Tumors of Esophagus.</b>		25. Classify esophageal tumors & describe the etiology, clinical features, and treatment options.	Lecture/ Small Group Discussion	MCQ/Viva
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# Theme III - Hoarseness & Stridor

**Table 3 Hoarseness & Stridor**

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assesment
<b>Applied anatomy of potential spaces in &amp; around the larynx and neck</b>	1 hour	26. Discuss applied anatomy of larynx. 27. Discuss the pre-piglottic, paraglottic & Rinke’s space.	Lecture	Formative
<b>Anatomy of Potential neck spaces</b>	2 hour	28. Discuss anatomy of deep fascia of neck & anatomy of potential pharyngeal and neck spaces.		
		29. Discuss surgical anatomy of peritonsillar, parapharyngeal & submandibular spaces. Discuss anatomy of retro pharyngeal space.		

<b>Applied anatomy &amp; physiology of Larynx/neck , Voice physiology</b>	1 hour	31. Discuss applied anatomy of Larynx. 32. Discuss the physiology of larynx. 33. Discuss the physiology of voice, speech production & its regulation	Lecture	Formative
<b>Acute Laryngitis</b>	1 hour	34. Discuss aetiology, clinical features, diagnosis, and treatment of acute simple laryngitis		MCQ
<b>Chronic Laryngitis</b>		35. Discuss chronic laryngitis including chronic granulomatous conditions of the larynx, its clinical features, diagnosis, and treatment.		MCQ
<b>Vocal nodules &amp; vocal polyps</b>	1 hour	36. Discuss differentiating points between vocal nodules & polyps, its aetiology, clinical features, diagnosis, and treatment.		MCQ/Viva
<b>Vocal cord paralysis</b>	1 hour	37. Discuss paralytic causes of hoarseness, its types, clinical features, diagnosis, and treatment.		MCQ

<b>Stridor</b>	1 hours	38. Enumerate causes of stridor. Explain types of stridor. Discuss management of congenital stridor		MCQ
<b>Apyrexial causes of stridor</b>		39. Discuss the aetiology and management of acquired apyrexial causes of stridor	Lecture	MCQ
<b>Pyrexial causes</b>	1 hour	40. Discuss the aetiology and management of pyrexial causes of stridor	Lecture	MCQ
<b>Laryngeal trauma</b>	1 hour	41. Discuss the management of laryngeal trauma	Lecture	MCQ
<b>Acute Respiratory obstruction</b>	1 hour	42. Discuss signs of respiratory obstruction. Enumerate alternate airways & discuss tracheostomy.	Lecture	
<b>Laryngotracheal Foreign body</b>	1 hour	43. Discuss the aetiology, types & treatment of Laryngotracheal Foreign bodies.	Lecture	
<b>Malignant Tumours of</b>	1 hour	44. Discuss incidence, epidemiology, risk factors, Pathology & classification of carcinoma larynx.		

<b>the Larynx / Carcinoma of Larynx</b>		Discuss UICC classification of laryngeal sites & subsites. Discuss management of carcinoma of all the subsites		
<b>Approach to a patient with hoarseness</b>	1hour	46. Discuss the differentials diagnosis of hoarseness and explain management approach to a patient presenting with hoarseness		



## Theme IV - Deafness, Ear Discharge & Dizziness

**Table 4 Deafness, Ear Discharge & Dizziness**

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assessment
<b>Applied Anatomy and Physiology of Ear</b>	1 hours	47. Describe the applied anatomy of the external, middle & internal ear. 48. Discuss the functions of the ear. 49. Discuss basic principles & interpretation of various tuning fork tests. 50. Discuss the interpretation of PTA & impedance audiometry	Lecture	Formative
<b>Trauma to External Ear and the Temporal Bone</b>	1 hour	51. Classify the trauma to external ear and the temporal bone. 52. Describe the appropriate imaging investigations & treatments.		MCQ/Viva

<b>Otitis Externa</b>	1 hour	53. Discuss Otitis Externa, its clinical features, differential diagnosis and relevant clinical & radiological investigations and treatment.		
<b>Acute Suppurative otitis media</b>	1 hour	54. Discuss acute suppurative otitis media.		

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assessment
		55. Describe its clinical features, differential diagnosis and relevant clinical & radiological investigations and treatment	Lecture	MCQ
<b>Chronic Suppurative Otitis Media without chloesteatoma</b>	1 hour	56. Discuss Chronic Suppurative Otitis Media and its clinical features, differential diagnosis and relevant clinical & radiological investigations and treatment.	Lecture	MCQ
<b>Chronic Suppurative Otitis Media with Cholesteatoma</b>		57. Discuss cholesteatoma and its clinical features, differential diagnosis and relevant clinical & radiological investigations and treatment.		MCQ
<b>Complications of Suppurative Otitis Media.</b>	1 hour	58. Discuss intracranial & extracranial otogenic complications and enumerate the appropriate clinical & radiological investigations and treatment.		MCQ

<b>Mastoiditis: Acute and Chronic</b>	1 hour	59. Discuss mastoiditis, its clinical features, differential diagnosis and relevant clinical & radiological investigations and treatment.		MCQ
<b>Acoustic Neuroma</b>	1 hour	60. Discuss acoustic neuroma & the appropriate clinical, audiological, and imaging studies used in diagnosis and treatment of acoustic neuroma.		

TOPIC	HOURS	LEARNING OBJECTIVES	MIT	Assessment
<b>Approach to patient with a Conductive hearing loss</b>	1hour 1 hour	61. Discuss the differential diagnosis of hearing loss & the medical and surgical management of CHL. 62. Discuss otosclerosis & its medical & surgical treatment of otosclerosis. 63. Discuss OME & its medical and surgical treatment	Lecture/ opd discussion	MCQ/Viva
<b>Approach to patient with a Sensorinueral Hearing Loss(SNHL)</b>	2 hours	64. Discuss SNHL & its differential diagnosis. 65. Discuss tinnitus & its management. 66. Discuss Ototoxicity & its management.		
<b>Vertigo Vestibular Neuronitis Meniere's Diseases BPPV</b>	1 hour	67. Discuss true vertigo & its types, pathophysiology, investigations & management. 68. Discuss Meniere's disease & its treatment. 69. Discuss BPPV & its clinical features, diagnoses & treatment.	Lecture CBD	MCQ/ OSCE
<b>Approach to a deaf patient</b>	1 hour	70. Discuss the approach to a deaf patient.	Lecture/ Role play	OSCE/Short case

<b>Approach to Management of Deaf Child</b>	1 hour	71. Differentiate congenital, developmental, and acquired hearing loss & describe the impact of hearing impairment at various ages and their management.	Lecture	MCQ
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# Theme V - Nasal Obstruction

Table 5 Nasal Obstruction

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assessment
<b>Applied Anatomy, Physiology of Nose &amp; Paranasal Sinuses</b>	1 hour	72. Discuss the surgical anatomy, physiology & congenital disorders of the nose & PNS. 73. Discuss the congenital disorders of the nose, palate & choanal atresia	Lecture/CBL	MCQ
<b>Diseases of the Nasal Septum</b>	1 hour	74. Discuss DNS, its types, the clinical features, medical & surgical treatment of nasal obstruction.		MCQ/Viva/OSCE
<b>Sino-Nasal Polyposis</b>		75. Discuss sino-nasal polyposis, its types and describe the clinical features, medical & surgical treatment of nasal polyps.		MCQ/Viva
<b>Fungal Rhinosinusitis</b>	1 hour	76. Discuss various fungi implicated in fungal rhinosinusitis and the appropriate clinical, radiological investigations and treatment of fungal rhinosinusitis.		MCQ/Viva

<b>Sino-Nasal Tumors</b>	1 hour	77. Discuss various benign and malignant tumors affecting the nose and paranasal sinuses and their clinical features, step involved in diagnosis and treatment options.		MCQ/Viva
<b>Trauma to Nose and Face and CSF rhinorrhea</b>	1 hour	78. Discuss the Le Forte classification of mid face fractures & the appropriate clinical and radiological investigations & management of these fractures.  79. Discuss CSF rhinorrhea and the predisposing factors, types, clinical features, investigations and treatment.	Lecture	MCQ/Viva
<b>Headaches and Facial Pain</b>	1 hour	80. Discuss rhinogenic headaches and the appropriate clinical, radiological investigations and treatment.		
<b>Granulomatous Diseases of the Nose</b>	1 hour	81. Discuss various granulomatous disorders affecting the nose & the clinical features, investigations & treatments.		
<b>Adenoids</b>	1 hour	82. Discuss anatomy diseases of adenoids and treatment		
<b>Juvenile Nasopharyngeal Angiofibroma</b>		83. Enumerate diseases of the nasopharynx.		

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	
		84. Discuss Juvenile nasopharyngeal angiofibroma, clinical features, investigations and treatment.		
<b>Nasopharyngeal Carcinoma</b>	1	85. Discuss the risk factor, clinical features, investigation, treatment and follow up nasopharyngeal carcinoma	Lecture	MCQ/Viva/OSCE
<b>Acute Sinusitis</b>	1 hour	86. Discuss acute sinusitis & the appropriate clinical, radiological investigations and steps involved in treatment of patients.		
<b>Chronic Sinusitis</b>		87. Discuss chronic sinusitis & the appropriate clinical, radiological investigations and steps involved in treatment of patients.		
<b>Complications of Sinusitis</b>		88. Enumerate the predisposing factors for development of complications due to sinusitis. 89. Discuss treatment.		
<b>Allergic Rhinitis (AR) and Non-allergic</b>	1 hour	90. Discuss allergic rhinitis and its types, pathophysiology, investigations & the medical and surgical treatment.		

TOPIC	HOURS	LEARNING OBJECTIVES	MITs	Assessment
		91. Discuss non –allergic rhinitis and the appropriate clinical and radiological investigations and its treatment.		
<b>Infective Rhinitis: Acute. &amp; Chronic.</b>	1 hour	92. Discuss infective rhinitis and the medical and surgical treatment of various types of acute and chronic infective rhinitis.	Lecture	MCQ
<b>Foreign Body, Rhinolith, Maggots Nose</b>	1 hour	93. Discuss Rhinolith and maggots in the nose and the appropriate medical and surgical treatment of patients with these conditions.		
<b>Approach to a patient with Epistaxis</b>	1 hour	94. Approach to a patient with epistaxis 95. Discuss epistaxis & the appropriate clinical, radiological & hematological investigations & treatment of the condition.	Role play/ Lecture	MCQ



## Theme VI - Neck Swelling

Table 6 Neck Swelling

TOPIC	HOURS	LEARNING OBJECTIVES	MIT	Assessment
<b>Para pharyngeal Abscess</b>	1 hour	96. Discuss the aetiology and management of each Para pharyngeal abscess.	Lecture	MCQ/Viva
<b>Retropharyngeal Abscess</b>		97. Discuss the types, aetiology, treatment and complications of each retropharyngeal abscess.		
<b>Submandibular Abscess</b>	1 hour	98. Discuss the causes and treatment of submandibular abscess.		
<b>Trauma of the Larynx and Neck</b>	1 hour	99. Classify the nature of trauma to the neck & larynx. 100. Discuss clinical features, investigations and treatment.	Lecture/CBL	
<b>Approach to a neck swelling</b>	1 hour	101. Discuss the approach to a neck swelling.	Demonstration	

<b>Evaluation of metastatic lymph nodes and occult primary in Neck (Occult Primary).</b>	1 hour	102. Discuss Occult primary & the predictable nodal drainage in head and Neck region.  103. Discuss the signs and symptoms of occult primary & the appropriate clinical and radiological investigations & different treatment options.	Lecture/CB	
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## Clinical Schedule

**Table 7 : Theme I - Foundation of Otorhinolaryngology & Head and Neck**

Topic	Hours	Learning objectives	Assessment method
History taking	01	1. Obtain detailed history of sore throat	OSCE
Examination	02	2. Perform Examination in a sore throat patient including general physical, local and systemic examination	OSCE
Nasopharyngeal examination	02	3. Perform mirror examination of nasopharynx	OSCE
Examination of oral cavity and oropharynx	02	4. Examine oral cavity and oropharynx in a systematic way	OSCE
Hypopharyngeal Examination	01	5. Perform Indirect hypopharyngoscopy with mirror	OSCE
Mouth gauge and other instruments	01	6. Assemble mouth gauge and name the instrument used in tonsillectomy with utility of each instrument.	OSCE
Examination of Neck	02	7. Perform systematic examination of Neck	OSCE

**Table 8 : Theme II - Sore Throat**

<b>Topic</b>	<b>Hours</b>	<b>Learning objectives</b>	<b>Assessment method</b>
Communicate with patient of tonsillectomy	01	1. Obtain a pre-operative informed consent from a patient of tonsillectomy	OSCE
Tonsillar surgery & its instruments	02	2. Observe tonsillectomy surgery and identify instruments used	OSCE
Conservative management of sore throat	01	3. Discuss a conservative management plan for inpatient acute follicular tonsillitis	OSCE
Scrubbing technique	01	4. Demonstrate scrubbing hands using proper solution & take proper time by proper method	OSCE
Biopsy from oral ulcer	01	5. Assist to take a biopsy from tongue ulcer	OSCE

**Table 9 : Theme III - Difficulty in Swallowing**

<b>Topic</b>	<b>Hours</b>	<b>Learning objectives</b>	<b>Assessment method</b>
Rigid Endoscopy system	01	1. Identify instruments & equipment used in rigid endoscopy system, describe rigid endoscopies.	OSCE
Oral & oropharyngeal mass palpation	01	2. How to palpate a mass in the oral cavity and oropharynx	OSCE
Oesophagoscopy	02	3. Observe rigid oesophagoscopy done for pharyngeal growth or dysphagia	OSCE

**Table 10 : Theme IV - Hoarseness and Stridor**

<b>Topic</b>	<b>Hours</b>	<b>Learning objectives</b>	<b>Assessment method</b>
History taking	02	1. Obtain detailed history of hoarseness & stridor	OSCE
Examination	02	2. Perform Examination in a patient with hoarseness & stridor, including general physical, local and systemic examination	OSCE
Indirect laryngoscopy examination	01	3. Perform mirror examination of Laryngopharynx	OSCE
Examination of Neck	01	4. Perform systematic examination of Neck	OSCE
Investigations of Laryngeal diseases	01	5. Fill requisition form for different types of investigations for Laryngeal diseases.	OSCE
Video laryngoscopy	01	6. Observe a video of laryngoscopy for the diagnosis of hoarseness in clinical setting	OSCE
Conservative management of Hoarseness	01	7. Discuss a conservative management plan for a patient of hoarseness due to voice abuse.	OSCE
Laryngoscopy	02	8. Observe rigid system laryngoscopy under general anesthesia and identify instruments used in the procedure	OSCE
Communicate with a patient for voice rest	01	9. Counsel a patient on voice rest	OSCE

Stridor in bilateral abductor vocal paralysis	02	10. Council bilateral abductor paralysis patient & its management in a post thyroidectomy patient	OSCE
Biopsy from laryngeal growth.	01	11. Observe the procedure for taking biopsy from laryngeal growth.	Formative
Tracheostomy	01	12. Demonstrate the procedure of tracheostomy	Formative
Communicate with patient on laryngectomy	01	13. Demonstrate the procedure how to Obtain informed consent from a patient for total laryngectomy	OSCE

**Table 11 : Theme V - Deafness, Ear Discharge & Dizziness**

<b>Topic</b>	<b>Hours</b>	<b>Learning objectives</b>	<b>Assessment method</b>
History taking	02	1. Obtain detailed history from a patient with ear discharge/deafness/dizziness	OSCE
Local Examination	01	2. Perform clinical examination of the hearing & balance system.	OSCE
Otoscopy Tuning fork test Balance testing Examination under microscope	03	3. Perform otoscopic examination of the ear 4. Perform tuning fork tests 5. Perform test of balance, peripheral & central 6. Assist in performing EUM	OSCE
Investigations of ear diseases	01	7. Discuss & fill requisition form for different types of investigations for ear diseases.	OSCE
Interpretation of audiogram and Impedance	01	8. Discuss the interpretation of audiogram and impedance.	OSCE

**Table 12 : Theme VI - Nasal Obstruction**

<b>Topic</b>	<b>Hours</b>	<b>Learning objectives</b>	<b>Assessment method</b>
History taking	02	1. Obtain detailed history from a patient with nasal obstruction	OSCE
Local Examination	01	2. Perform clinical examination of the nose & paranasal sinuses.	OSCE
Anterior & posterior Rhinoscopy		3. Perform anterior & posterior Rhinoscopies with mirror	
Probe test		4. Perform probe test	
Nasendoscopy	01	5. Assist in performing nasendoscopy.	OSCE
Pus culture / sensitivity	01	6. Perform Take swab from nose for different purpose	
X – Rays nasopharynx /PNS		7. interpret X – Rays nasopharynx/PNS for enlarged soft tissues shadow	OSCE
Nasal patency & adenoid facies in enlarged adenoids	01	8. Perform examination for nasal patency in enlarged adenoids.	OSCE

Adenoid surgery	01	9. Observe adenoid surgery being done in operating room	Formative
CT scan nose & nasopharynx	01	10. Interpret CT scan in nasopharyngeal angiofibroma, describe bowing sign.	Formative
Nasopharyngeal Biopsy	01	11. Observe surgery for nasopharyngeal biopsy	Formative
Investigations of nose & paranasal sinuses diseases	01	12. Document Fill requisition form for different types of investigations for nose & paranasal sinuses diseases.	Formative

**Table 13 : Theme VII - Swelling Neck**

<b>Topic</b>	<b>Hours</b>	<b>Learning objectives</b>	<b>Assessment method</b>
Examination of Neck Nodes	02	1. Perform systematic examination of all groups of neck nodes	OSCE
Examination of lump in the neck	01	2. Perform examination of lump in the neck in a systematic way.	OSCE
Surgery on a pharyngeal abscess	01	3. Observe surgery on a pharyngeal abscess & describe drainage of peritonsillar abscess	OSCE
Thyroid examination	01	4. Perform Thyroid Examination both anatomically & functionally	OSCE
Pharyngeal abscess surgery related instruments	01	5. Identify instruments used in drainage of pharyngeal abscess surgery	OSCE
Examination of parotid	01	6. Perform examination of parotid swelling	OSCE
Examination of thyroid	01	7. Perform examination of thyroid gland	OSCE

# Learning Resources

**Table 15: References Textbooks**

S#	Subjects	Resources
1.	Anatomy	<p><b>A. GROSS ANATOMY</b></p> <p>1. K.L. Moore, Clinically Oriented Anatomy</p> <p><b>B. EMBRYOLOGY</b></p> <p>1. Keith L. Moore. The Developing Human</p> <p>2. Langman's Medical Embryology</p>
2.	Community medicine	<p>1. Preventive and Social Medicine by K Park</p> <p>2. Community Medicine by M. Ilyas</p> <p>3. Basic Statistics for the Health Sciences by Jan W Kuzma</p> <p>4. Textbook of Community Medicine and Public Health, 2018. Saira Afzal, Sabeena Jala</p>
3.	Physiology	<p>1. Textbook Of Medical Physiology by Guyton And Hall</p> <p>2. Ganong ' S Review of Medical Physiology</p> <p>3. Human Physiology by Lauralee Sherwood</p> <p>4. Berne &amp; Levy Physiology</p> <p>5. Best &amp; Taylor Physiological Basis of Medical Practice</p>
4.	ENT	<p>1. Diseases of Ear, nose and Throat by Logan Turner, 11th edition</p> <p>2. Lecture notes Ear, Nose and Throat Notes by P. D. Bull, 10th edition</p>

		3. Diseases of Ear, Nose and Throat by P.L. Dhingra, 6th edition (optional reading) <b>Reference Books</b> 1. Current medical diagnosis & treatment by Maxine A. Papadakis 2. Scott-Brown's Otorhinolaryngology, Head & Neck Surgery
5.	Pathology	1. Robbins & Cotran, Pathologic Basis of Disease, 9th edition. 2. Rapid Review Pathology, 4th edition by Edward F. Goljan MD
5.	Pediatrics	1. Nelson Textbook of Pediatrics, 19th Edition 2. Textbook of Pediatrics by PPA, preface written by S. M. Haneef 3. Clinical Pediatrics by Lakshmanaswamy Aruchamy, 3rd Edition
6.	Pharmacology	1. Lippincott Illustrated Pharmacology 2. Basic and Clinical Pharmacology by Katzung

# **ENT Module**

## **3rd Year MBBS**

<b>Module Name</b>	<b>Topic</b>	<b>Learning Objectives</b>	<b>MITs</b>	<b>Assessment</b>	<b>Hrs</b>
Foundation ii	Introduction to the subject	Describe common ENT symptoms. Name common diseases of ENT. Name recommended books that students must read.	Lecture	MCQs	1
MSK II	Ear	Explain anatomy of ear	Lecture	MCQ	1
Respiratory	Larynx anatomy	Describe clinical anatomy of larynx. Laryngitis Describe etiology, clinical feature,	Lecture		1

		management of acute and chronic laryngitis.			
	Non – Neoplastic laryngeal lesions	Describe clinical features and management of different non neoplastic laryngeal lesions (Vocal cords nodules, polyps, and laryngocele)	Lecture / CBL	MCQs	1 hr
	Neoplastic laryngeal lesions	Describe the clinical feature and management of neoplastic laryngeal lesions.	Lecture	MCQs	1
	Vocal cord	Describe the	Lecture		2

	Palsy  Emergency Tracheotomy	clinical feature and management of vocal cord palsy Describe the indication, contraindication, complications, and operative steps to perform emergency tracheotomy.	CBL		
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# ENT Module

## 2nd Year MBBS

MODULE	Topic	Learning Objective	MITs	Hours	Assessment
Gastrointestinal , Hepatobiliary and Metabolism	Oral ulceration	Enlist the causes of oral ulcerations Describe Aphthous ulcers and its treatment Describe the clinical features and drugs used to treat esophageal candidiasis	Lecture	1	MCQs
Neuroscience ii	Lump in neck	Approach to a patient	Role play/ Demonstration	1	MCQs

		with lump in the neck			
	Sinusiti s	Describe the causes and clinical features of acute and chronic sinusitis	Lecture	1	MCQs