

[KZ 0811]

AUGUST 2011

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Anatomy of Larynx with neatly labeled diagram.
2. Cranial nerves.
3. Draw the structure of inner ear & describe the mechanism of hearing.

II. Write notes on:

(8 x 5 = 40)

1. DNA.
2. Middle ear.
3. Thyroid hormone.
4. Inflammation.
5. Circle of Willis.
6. Bio electric Potential.
7. Sex – chromosomal disorders.
8. Shock.

III. Short Answers on:

(10 x 3 = 30)

1. Functional residual capacity.
2. Mitochondria.
3. Saltatory conduction.
4. Reflex arc.
5. Functions of cerebellum.
6. Sagittal Plane.
7. Memory.
8. Squamous epithelium.
9. Testosterone.
10. Wernicke's area.

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Pharyngeal Muscles and Physiology of Deglutition.
2. Auditory Pathway and Stapedial Reflex.
3. Describe the structure of cerebellum with diagram.

II. Write notes on:

(8 x 5 = 40)

1. Lever mechanism of hearing.
2. Nasal septum.
3. Cervical Trachea.
4. Inner hair cell.
5. CSF formation and flow.
6. Mechanics of ventilation.
7. Autosomal dominant and recessive disorders.
8. Aphasia.

III. Short Answers on:

(10 x 3 = 30)

1. Vestibular Nuclei.
2. Stroboscopy principles.
3. Hypopharynx.
4. Basilar Membrane.
5. Middle Meatus.
6. Golgi apparatus.
7. Artificial respiration.
8. Neuroglia.
9. Functional residual capacity.
10. Reflex arc.

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY**FIRST YEAR****PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING***Q.P. Code: 802305***Time : Three Hours****Maximum : 100 marks****Answer ALL questions in the same order.****I. Elaborate on:**

Pages (Max.)	Time (Max.)	Marks (Max.)
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- | | | | |
|---|---|---------|----|
| 1. Describe Vestibular pathway. | 7 | 20 min. | 10 |
| 2. Causes of sensori-neural hearing loss. | 7 | 20 min. | 10 |
| 3. Physiology of phonation. | 7 | 20 min. | 10 |

II. Write notes on:

- | | | | |
|--|---|---------|---|
| 1. Anatomy of auditory tube and muscle attached to it. | 4 | 10 min. | 5 |
| 2. Aetiology of Serous Otitis Media. | 4 | 10 min. | 5 |
| 3. Aetiology and clinical features of Bells palsy. | 4 | 10 min. | 5 |
| 4. Difference between an infant larynx and adult larynx. | 4 | 10 min. | 5 |
| 5. Write about sub mucous cleft palate. | 4 | 10 min. | 5 |
| 6. C.S.F formation and flow. | 4 | 10 min. | 5 |
| 7. Causes of conductive hearing loss. | 4 | 10 min. | 5 |
| 8. Write vital capacity. | 4 | 10 min. | 5 |

III. Short answers on:

- | | | | |
|--|---|--------|---|
| 1. Explain Neurotmesis. | 2 | 4 min. | 3 |
| 2. Functions of middle ear. | 2 | 4 min. | 3 |
| 3. Name three parts of bony labyrinth. | 2 | 4 min. | 3 |
| 4. Write note on Laryngeal web. | 2 | 4 min. | 3 |
| 5. Boundaries of inlet of larynx. | 2 | 4 min. | 3 |
| 6. Write motor nerve supply of larynx. | 2 | 4 min. | 3 |
| 7. Name the intrinsic muscles of the tongue. | 2 | 4 min. | 3 |
| 8. Write valsalvas manoeuvre. | 2 | 4 min. | 3 |
| 9. Functions of cerumen. | 2 | 4 min. | 3 |
| 10. Describe the velo pharyngeal closure. | 2 | 4 min. | 3 |

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Describe Anatomy of middle ear.
2. Describe major areas of brain related to speech & hearing with a neat labeled diagram.
3. Describe cartilages of larynx with a neat labeled diagram.

II. Write notes on:

(8 x 5 = 40)

1. Anatomy of to pharyngotympanic tube and muscle attached to it.
2. Causes of facial nerve palsy.
3. Pinna helps in localization sound. Discuss.
4. Describe muscles in the tympanic cavity.
5. Write vital capacity.
6. Acute otitis media.
7. Causes of functional aphonia.
8. Anatomy of Circle of Wills.

III. Short Answers on:

(10 x 3 = 30)

1. Describe Tensor tympani.
2. Draw and label stapes bone.
3. Muscle Attached to Auditory tube.
4. Name the adductor muscles of larynx.
5. Functions of middle ear.
6. Name three parts of bony labyrinth.
7. Name five Terminal branches of facial nerve.
8. Boundaries of subglottic space of larynx.
9. Mention Ventricle of larynx.
10. Name the three stages of deglutition.

[LD 0212]

AUGUST 2013

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Cartilages of larynx with a neat diagram, and explain the mechanism of phonation.
2. Tonotopic organization at various levels in the human auditory system.
3. Structure of cerebellum with a neat diagram.

II. Write notes on:

(8 x 5 = 40)

1. Neurotransmitters.
2. Cyanosis.
3. Functions of utricle and saccule.
4. Pinna shadow effect.
5. Muscles of the soft palate.
6. Immature swallow pattern.
7. Spasmodic dysphonia.
8. Myo-elastic aerodynamic theory of voice production.

III. Short Answers on:

(10 x 3 = 30)

1. Connective tissue.
2. Olfactory pathway.
3. Multidimensional voice profile.
4. Tidal volume.
5. Nervus intermedius of Wrisberg.
6. Paracusis willisi.
7. Cone of light.
8. Georg von Bekesy.
9. Mitochondrial DNA.
10. Cardiac cycle.

[LE 0212]

FEBRUARY 2014

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Draw the structure of inner ear. Add a note on organ of corti.
2. Write the physiology of phonation.
3. Write the anatomy of Eustachian Tube, Eustachian Tube function test.

II. Write notes on:

(8 x 5 = 40)

1. Define joints, types of joints.
2. Anatomical planes of the body.
3. Define Synapses and types.
4. Define cartilage & its types Language Disorders.
5. Functions of basal ganglia.
6. Define deglutition and write the stages of deglutition.
7. What is adenoids and its causes.
8. Structure of nasopharynx.

III. Short Answers on:

(10 x 3 = 30)

1. Mitochondria.
2. Cardiac cycle.
3. Laryngeal paralysis.
4. Define Vital capacity.
5. Functions of testosterone.
6. What is nystagmus and its types.
7. Types of cartilage.
8. Reflex arc.
9. Functions of cerebellum.
10. Tricho – oesophageal fistula.

[LF 0212]

AUGUST 2014

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Auditory Pathway and Stapedial Reflex.
2. Describe major areas of brain related to speech & hearing with a neat labeled diagram.
3. Laryngeal Muscles and Physiology of Phonation.

II. Write notes on:

(8 x 5 = 40)

1. Functions of testosterone hormone.
2. Lever mechanism of hearing.
3. Eustachian tube disorders.
4. Autosomal recessive disorders.
5. Cerebello – pontine angle tumors.
6. Semicircular canals.
7. Difference between an infant larynx and adult larynx.
8. C.S.F formation and flow.

III. Short Answers on:

(10 x 3 = 30)

1. Cleft lip.
2. Name the three stages of deglutition.
3. Functions of middle ear.
4. Functional residual capacity.
5. Connective tissue.
6. Vocal cord palsy.
7. Saltatory conduction.
8. Wernicke's area.
9. Action potential.
10. Gastro esophageal reflex disorder.

[LG 0215]

FEBRUARY 2015

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Draw the structure of middle ear and describe the mechanism of hearing.
2. Pharyngeal Muscles and Physiology of Deglutition.
3. Causes of sensorineural hearing loss.

II. Write notes on:

(8 x 5 = 40)

1. Functions of growth hormone.
2. Explain the mechanism of phonation.
3. Anatomy of auditory tube and muscle attached to it.
4. Trachea – oesophageal pucture.
5. Sex – chromosomal disorders.
6. Causes of neural hearing loss.
7. Formation and circulation of C.S.F.
8. Mechanics of ventilation.

III. Short Answers on:

(10 x 3 = 30)

1. Facial paralysis.
2. Name the 3 types of muscle.
3. Vital capacity.
4. Laryngeal web.
5. Acoustic neuroma.
6. Wernicke's area.
7. Basilar Membrane.
8. Golgi apparatus.
9. Sagittal Plane.
10. Define synapse.

[LH 0815]

AUGUST 2015

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Explain the detailed anatomy of inner ear.
2. Explain the anatomy and physiology of pharynx.
3. Laryngeal Muscles and Physiology of Phonation.

II. Write notes on:

(8 x 5 = 40)

1. Structure of organ of corti (neat labeled diagram).
2. Generation of action potential.
3. Explain various anatomical planes, sections, positions and orientations.
4. Causes of infantile stridor.
5. Brief notes on: a) Tonsils. b) Adenoids.
6. Artificial larynx.
7. Inner ear pathologies.
8. Structure of DNA with diagram.

III. Short Answers on:

(10 x 3 = 30)

1. Structure of vocal fold – Diagram.
2. Define morphology.
3. What is benign tumor?
4. Residual air.
5. Karyotyping.
6. Semicircular canals.
7. Define passive articulation, what are the passive articulators?
8. Naso-pharynx with its functions.
9. Lobes of the brain.
10. Laryngo pharyngeal reflux.

[LI 0216]

FEBRUARY 2016

Sub. Code: 2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH & HEARING

Q.P. Code: 802305

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(3 x 10 = 30)

1. Explain the cartilages of larynx with a neat labeled diagram.
2. Describe the structures of the brain related to speech language and Hearing with a neat labeled diagram.
3. Explain the walls of middle ear with a neat diagram.

II. Write Notes on:

(8 x 5 = 40)

1. Circle of willis.
2. Reflex pathway with a neat diagram.
3. Structure and function of Eustachian tube.
4. Anamolies of external ear.
5. Sub mucous cleft.
6. Artificial larynx.
7. Notes on: a) Laryngomalacea. b) Laryngeal atresia.
8. Facial paralysis.

III. Short Answers on:

(10 x 3 = 30)

1. Stages of swallowing.
2. Differentiate arteries and veins.
3. Define embryology.
4. What is malignant tumor?
5. Vital capacity.
6. Diagram of inner ear (hearing and balance).
7. Tracheo-esophageal puncture.
8. Velo-pharyngeal incompetence.
9. Enumerate Cranial nerves for speech production.
10. Laryngo Pharyngeal Reflux.

[LJ 0816]

AUGUST 2016

Sub.Code :2305

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time: Three Hours

Maximum : 100 Marks

Answer All questions

I. Elaborate on:

(3 x 10 = 30)

1. Nervous system with neat diagram.
2. Anatomy and physiology of larynx
3. Auditory pathways and vestibular pathway.

II. Write Notes on:

(8 x 5 = 40)

1. Cochleo- vestibular diseases and its management.
2. Facial paralysis.
3. Causes of speech disorder.
4. Blood supply of tongue and larynx.
5. Functions of thyroid hormone.
6. Management of inner ear disease.
7. Various theories of hearing.
8. Auditory ossicles.

III. Short Answers on:

(10 x 3 = 30)

1. Sub mucosal cleft.
2. Artificial larynx.
3. Bifid epiglottis.
4. Cochlea.
5. Laryngomalacia.
6. Broca's area.
7. Functions of soft palate.
8. Blood brain barrier.
9. Presbycusis.
10. Cavities of the vocal tract.

B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time: Three Hours

Maximum : 100 Marks

Answer All questions

I. Elaborate on: **(3 x 10 = 30)**

1. Brain and general lobes with neat diagram.
2. Anatomy and Physiology of pharynx and oro-peripheral structures.
3. Cranial nerves and its functions related to speech and hearing.

II. Write Notes on: **(8 x 5 = 40)**

1. Neuron.
2. Disease of outer, middle and inner ear.
3. Endocrine system.
4. Organ of corti.
5. Causes of speech disorder.
6. Causes of hearing loss.
7. Intrinsic muscles of larynx.
8. Basal ganglia.

III. Short Answers on: **(10 x 3 = 30)**

1. Stenosis.
2. Stridor.
3. Gastro oesophageal reflux disorders.
4. Structure of DNA and RNA.
5. Tympanic membrane.
6. CSF.
7. Circle of Willis.
8. Pinna shadow effect.
9. Sub mucosal cleft.
10. Trachea.

**B.Sc. AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY
FIRST YEAR
PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND
HEARING**

Q.P. Code: 802305

Time: Three hours

Maximum : 100 Marks

Answer All questions

I. Elaborate on:

(3 x 10 = 30)

1. Describe the anatomy of middle ear cavity under the following headings:
a) Boundaries b) Contents c) Communications d) Applied anatomy.
2. Describe the pathway of hearing.
3. Discuss the formation, flow, reabsorption, and functions of cerebrospinal fluid (CSF).

II. Write notes on:

(8 x 5 = 40)

1. List the functions of thyroid hormone.
2. Describe the nervous control of respiration.
3. Describe the structure of DNA.
4. What are the differences between an infant and an adult larynx?
5. Describe the structure of a synapse.
6. Discuss the different Cochleo-vestibular diseases.
7. Discuss the anatomy of the lateral wall of the nasal cavity.
8. Discuss the anatomy of the trachea.

III. Short answers on:

(10 x 3 = 30)

1. List any three types of epithelium giving examples for each.
2. What is meant by the term inflammation?
3. What is the function of the blood brain barrier?
4. What is residual volume? What is its importance?
5. What is meant by autosomal recessive inheritance?
6. What is the function of the following cellular organelles?
a) Mitochondria b) Lysosome
7. List three congenital oesophageal anomalies.
8. Menier's disease.
9. Laryngeal palsy.
10. What is meant by karyotyping?

BACHELOR IN AUDIOLOGY AND SPEECH LANGUAGE PATHOLOGY

FIRST YEAR

PAPER V – BASIC MEDICAL SCIENCES RELATED TO SPEECH AND HEARING

Q.P. Code: 802305

Time: Three hours

Maximum : 100 Marks

Answer All questions

I. Elaborate on:

(3 x 10 = 30)

1. Describe the innervation of the larynx. Discuss the physiology of phonation.
2. Describe how sound is perceived (Physiology of hearing).
3. Describe the blood supply of brain. Add a note on its applied anatomy.
Draw suitable diagrams where necessary.

II. Write notes on:

(8 x 5 = 40)

1. Discuss the genetic causes of hearing loss.
2. Describe the neuronal action potential with the help of a diagram.
3. Describe the structure of DNA.
4. Discuss the anatomy of the facial nerve.
5. Discuss the formation and flow of cerebro-spinal fluid.
6. Discuss the congenital diseases of the larynx.
7. Discuss the functions of growth hormone. Add a note on acromegaly.
8. Discuss the mechanics of ventilation.

III. Short answers on:

(10 x 3 = 30)

1. What is the function of the following cellular organelles?
a) Ribosomes b) Golgi body
2. What is stridor? List two causes of stridor.
3. Discuss the types of RNA.
4. What is Wernicke's area? What is its role in speech?
5. What is velopharyngeal incompetence?
6. Barotrauma.
7. Artificial larynx.
8. List the three types of cartilage giving examples for each.
9. List the ventricles of the brain.
10. Discuss the intrinsic ligaments of the larynx.