

August - 2009

[KV 703]

Sub. Code: 4170

FIRST B.D.S DEGREE EXAMINATION

(Regulations for the candidates admitted from 2008-09 onwards)

Paper III – DENTAL ANATOMY, EMBRYOLOGY AND ORAL HISTOLOGY

Q.P. Code: 544170

Time: Three hours

Maximum: 70 Marks

ANSWER ALL QUESTIONS

I. Essays: 2 x 15 = 30 Marks

1. Classify oral mucus membrane. Write in detail about histology of gingiva.
2. Write an essay about tooth development. Add a note on histological and morphological differentiation of odonto genesis.

II. WRITE SHORT NOTES ON: 6 X 5 = 30 Marks

1. Histology of osteoclasts.
2. Reparative dentin.
3. Spill way spaces.
4. Compensatory curves.
5. Enumerate theories of eruption and write in detail about periodontal ligament traction theory.
6. Difference between deciduous and permanent teeth.

III. SHORT ANSWER QUESTIONS: 5X 2 = 10 Marks

1. Active and passive eruption.
2. Haematoxilin and eosin stains.
3. Branches of mandibular nerve.
4. Von-ebner gland.
5. Tome's process.

August 2010

[KX 703]

Sub. Code: 4170

FIRST B.D.S DEGREE EXAMINATION

(Regulations for the candidates admitted from 2008-09 onwards)

Paper III – DENTAL ANATOMY, EMBRYOLOGY AND ORAL HISTOLOGY

Q.P. Code: 544170

Time: Three hours

Maximum: 70 Marks

Answer ALL Questions

I. Essays:

2 x 15 = 30 Marks

1. Describe the bell stage of tooth development with the help of diagrams and add a note on root development.
2. Define and classify oral mucosa. Describe the macroscopic and microscopic structure of gingiva.

II. Short notes on:

6 x 5 = 30 Marks

1. Age changes in dentin.
2. Ligament traction theory.
3. Ductal system of major salivary glands.
4. Differences between maxillary 1st premolar and mandibular 1st premolar tooth.
5. Epithelial mesenchymal interaction in tooth development.
6. Dentogingival junction.

III. Short answer questions:

5 x 2 = 10 Marks

1. pH of saliva.
2. Epithelial attachment.
3. Fibroblasts.
4. Structure of a taste bud.
5. Key of occlusion.

February 2011

[KY 703]

Sub. Code : 4170

FIRST B.D.S. DEGREE EXAMINATION.

(Regulations for the candidates admitted from 2008-2009 onwards)

**Paper III - DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P. Code : 544170

Time: Three hours

Maximum: 70 Marks

Answer **ALL** questions.

I. Essays:

(2 x 15 = 30)

1. Classify salivary glands. Discuss in detail about the histology of major salivary glands with suitable diagrams.
2. Discuss in detail about the chronology and morphology of permanent mandibular right first molar.

II. Write short notes on :

(10 x 6 = 60)

1. Life cycle of Ameloblast.
2. Muscles of Mastication.
3. Theories of tooth eruption.
4. Specialized mucosa.
5. Types of dentin.
6. Composition of saliva.

III. Short Answers questions:

(5 x 2 = 10)

1. Osteoclasts.
2. Enamel tufts.
3. Stellate Reticulum.
4. Periodontal ligament fibres.
5. Cementocytes.

August 2011

[KZ 703]

Sub. Code : 4170

FIRST B.D.S. DEGREE EXAMINATION

DENTAL ANATOMY, EMBRYOLOGY AND ORAL HISTOLOGY

Q. P. Code : 544170

Time : Three hours

Maximum: 100 Marks

Answer **ALL** questions

I. Essay Questions:

(2 x 20 = 40)

1. Write in detail about the structure of dentin. Add a note on age changes of dentin.
2. Classify cementum. Write about cementogenesis and the functions of cementum.

II. Write Short notes on :

(10 x 6 = 60)

1. Serous cell.
2. Occlusal morphology of mandibular second premolar.
3. Deglutition.
4. Zones of pulp.
5. Enamel lamellae.
6. Chronology of permanent dentition.
7. Basal lamina.
8. Fixation.
9. Bell stage of tooth development.
10. Incremental lines.

February 2012

[LA 703]

Sub. Code: 4170

FIRST B.D.S. DEGREE EXAMINATION

PAPER III

DENTAL ANATOMY, EMBRYOLOGY & ORAL HISTOLOGY

Q.P. CODE: 544170

Time: Three hours

Maximum: 70 Marks

**Answer ALL questions in the same order
Draw Suitable diagrams wherever necessary**

I. Elaborate on: (2X10=20)

1. Define eruption. Explain the theories of eruption. Mention the eruption time period for all the permanent teeth.
2. Describe the morphology of permanent maxillary first molar. Write the differences between deciduous and permanent maxillary molar.

II. Write notes on: (10×5=50)

1. Pain transmission in dentin
2. Ridges
3. Hypo mineralized areas in enamel
4. Development of palate
5. Epithelial cell rests
6. Fibres of periodontal ligament
7. Spillway space
8. Non keratinocytes
9. Myoepithelial cell
10. Alveolar bone proper

[LB 655]

AUGUST 2012

Sub. Code: 4170

**FIRST YEAR B.D.S. DEGREE EXAM
PAPER III – DENTAL ANATOMY, EMBRYOLOGY
AND ORAL HISTOLOGY**

Q.P.Code: 544170

Time: 180 Minutes

Maximum: 100 Marks

Answer ALL questions in the same order

I. Elaborate on:

**Pages Time Marks
(Max.)(Max.)(Max.)**

- | | | | |
|---|----|----|----|
| 1. Classify oral mucous membrane. Discuss in detail about specialized mucosa. | 19 | 30 | 20 |
| 2. Describe the differences between deciduous and permanent dentition. Describe the occlusal morphology of permanent right maxillary first molar. | 19 | 30 | 20 |

II. Write notes on:

- | | | | |
|---|---|----|---|
| 1. Calcium metabolism. | 3 | 10 | 5 |
| 2. Ground section. | 3 | 10 | 5 |
| 3. Development of palate. | 3 | 10 | 5 |
| 4. Functions of the periodontal ligament. | 3 | 10 | 5 |
| 5. Theories of eruption. | 3 | 10 | 5 |
| 6. Minor salivary glands. | 3 | 10 | 5 |
| 7. Enamel lamellae. | 3 | 10 | 5 |
| 8. Types of dentin. | 3 | 10 | 5 |
| 9. Pulp stones. | 3 | 10 | 5 |
| 10. Chronology of permanent teeth. | 3 | 10 | 5 |
| 11. Histology of cementum. | 3 | 10 | 5 |
| 12. Cap stage. | 3 | 10 | 5 |

[LC 655]

FEBRUARY 2013

Sub. Code: 4170

**FIRST YEAR B.D.S. DEGREE EXAM
PAPER III – DENTAL ANATOMY, EMBRYOLOGY
AND ORAL HISTOLOGY**

Q.P.Code: 544170

Time: 180 Minutes

Maximum: 70 Marks

I. Elaborate on:

(2x10=20)

1. Classify oral mucous membrane. Write in detail about histology of gingival.
2. Write an essay on morphology of mandibular 1st molar tooth.

II. Write notes on:

(10x5=50)

1. Types of dentin.
2. Hertwig's epithelial root sheath.
3. Myoepithelial cells.
4. Theories of dentinal sensitivity.
5. Fixation & dehydration in tissue processing.
6. Tome's process.
7. Endochondral ossification.
8. Functions of periodontal ligament.
9. Mechanism of shedding.
10. Zone of pulp.

[LD 655]

AUGUST 2013

Sub. Code: 4170

**FRIST YEAR B.D.S. DEGREE EXAM
PAPER III – DENTAL ANATOMY, EMBRYOLOGY
AND ORAL HISTOLOGY**

Q.P.Code: 544170

Time: 180 Minutes

Maximum: 70 Marks

I. Elaborate on:

(2x10=20)

1. Explain the various stages in development of tooth in detail with suitable diagrams.
2. Classify Salivary glands. Explain in detail serous salivary gland.

II. Write notes on:

(10x5=50)

1. Enamel lamellae and tufts.
2. Theories of tooth eruption.
3. Neonatal lines
4. Histology of Pulp
5. Define the following – Centric occlusion and Centric relation.
6. Types of Cementum
7. Occlusal surface of Mandibular II Premolar.
8. Epithelial Attachment
9. Non-Keratinocytes
10. Functions of Periodontal ligament.

[LE 655]

FEBRUARY 2014

Sub. Code:4170

**FIRST YEAR B.D.S. DEGREE EXAM
PAPER III – DENTAL ANATOMY, EMBRYOLOGY
AND ORAL HISTOLOGY**

Q.P Code: 544170

Time: 180 Minutes

Maximum: 70 marks

I. Elaborate on:

(2X10=20)

1. Classify Oral mucosa and write in detail about Keratinized mucosa.
2. Describe the morphology of permanent mandibular first molar.

II. Write Notes on:

(10X5=50)

1. Bell stage
2. Gnarled enamel
3. Theories of dentin hypersensitivity
4. Development of tongue
5. Histology of pulp
6. Sharpey's fibres
7. Curve of spee
8. Differences between deciduous and permanent dentition (any 5)
9. Serous cells
10. Non Keratinocytes

[LF 655]

AUGUST 2014

Sub. Code:4170

**FIRST YEAR B.D.S. DEGREE EXAM
PAPER III – DENTAL ANATOMY, EMBRYOLOGY
AND ORAL HISTOLOGY**

Q.P Code: 544170

Time: 180 Minutes

Maximum: 70 marks

**Answer all questions in the same order
Draw suitable diagrams wherever necessary**

I. Elaborate on: **(2X10=20)**

1. Write in detail about development of teeth.
2. Write an essay on histology of periodontal ligament.

II. Write Notes on: **(10X5=50)**

1. Hypo mineralised structures of enamel
2. Age changes of pulp
3. Taste buds
4. Histology of osteoclasts
5. Non keratinocytes
6. Cemento enamel junction
7. Decalcification in processing of tissues
8. Development of palate
9. Branches of mandibular nerve
10. Embrasures

FIRST YEAR B.D.S. DEGREE EXAM
PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY

Q.P Code: 544170

Time: 180 Minutes

Maximum: 70 Marks

Answer all questions in the same order
Draw suitable diagrams wherever necessary

I. Elaborate on:

(2 x 10 = 20)

1. Discuss the process of amelogenesis in detail.
2. Describe the chronology of permanent teeth. Discuss in detail the morphology of permanent right mandibular first molar.

II. Write Notes on:

(10 x 5 = 50)

1. Cemento-enamel junction.
2. Ground section.
3. Development of tongue.
4. Cells of the periodontal ligament.
5. Incremental lines of Retzius.
6. Serous cell.
7. Composition of saliva.
8. Pain transmission in dentin.
9. Hertwig's epithelial root sheath.
10. Functions of pulp.

[LH 655]

AUGUST 2015

Sub. Code: 4170

FIRST YEAR B.D.S. DEGREE EXAMINATION

PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND ORAL HISTOLOGY

Q.P. Code: 544170

Time : Three Hours

Maximum : 70 marks

Answer all questions in the same order

Draw suitable diagrams wherever necessary

I. Elaborate on:

(2 x 10 = 20)

1. Classify oral mucous membrane, describe in detail about specialized mucosa.
2. Describe in detail about Right Permanent Mandibular first molar.

II. Write notes on :

(10 x 5 = 50)

1. Bell stage.
2. Hypocalcified structures of Enamel.
3. Types of Dentin.
4. Histology of Pulp.
5. Tomes granular layer.
6. Epithelial rests of Malessez and Serrae.
7. Functions of Saliva.
8. Line angle and Point angle.
9. Muscles of Mastication.
10. Bundle bone.

[LI 655]

FEBRUARY 2016

Sub. Code: 4170

**FIRST YEAR B.D.S. DEGREE EXAMINATION
PAPER III – DENTAL ANATOMY, EMBRYOLOGY
AND ORAL HISTOLOGY**

Q.P. Code : 544170

Time : Three Hours

Maximum : 70 Marks

Answer All Questions in same order

Draw suitable Diagrams wherever necessary

I. Elaborate on:

(2 x 10 = 20)

1. Enumerate the stages in tooth development and write in detail about advanced bell stage.
2. Write the differences between deciduous and permanent teeth.
Write the eruption dates for all permanent teeth.

II. Write Notes on:

(10 x 5 = 50)

1. Occlusal surface of maxillary first molar.
2. Incremental lines.
3. Interglobular dentin.
4. Taste bud.
5. Myoepithelial cell.
6. Keratinized mucosa.
7. Cementocyte.
8. Periodontal group of fibres.
9. Ground substance.
10. Ligaments of Temporo mandibular joint.

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

**Answer all questions in the same order
Draw suitable diagrams wherever necessary**

I. Elaborate on: **(2 x 10 = 20)**

1. Write in detail about the development, function and histology of Periodontal ligament.
2. Discuss the various aspects of tooth number 11.

II. Write Notes on: **(10 x 5 = 50)**

1. Development of Tongue.
2. Incremental lines of Retzius.
3. Theories of dentin hypersensitivity.
4. Functions of Pulp.
5. Cemento-Enamel Junction.
6. Tooth numbering systems.
7. Occlusal aspect of Right Permanent Maxillary first molar.
8. Masticatory mucosa.
9. Theories of eruption.
10. Fixatives.

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

**Answer all questions in the same order
Draw suitable diagrams wherever necessary**

I. Elaborate on:

(2 x 10 = 20)

1. Explain Amelogenesis and life cycle of Ameloblast with suitable diagrams.
2. Describe the morphology of right permanent mandibular second premolar.

II. Write Notes on:

(10 x 5 = 50)

1. Occlusal surface of Maxillary First Permanent molar.
2. Histology of Gingiva.
3. Cellular Cementum.
4. Functions of Pulp.
5. Osteoclast.
6. Principal fibres of Periodontal ligament.
7. Development of Palate.
8. Functions of Saliva.
9. Ground section of Tooth.
10. Theories of Tooth eruption.

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

Answer all questions in the same order
Draw suitable diagrams wherever necessary

I. Elaborate on: **(2 x 10 = 20)**

1. Write an essay on functions, development, histology of Pulp.
2. Describe in detail about right maxillary first molar.

II. Write Notes on: **(10 x 5 = 50)**

1. Sharpe's fibers.
2. Development of tongue.
3. Non-keratinocytes.
4. Types of cementum.
5. Age changes of dentin.
6. Cementoenamel junction.
7. Serous cells.
8. Tome's process.
9. Curve of Spee and Curve of monsoon.
10. Histology of Tempromandibular joint.

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

**Answer all questions in the same order
Draw suitable diagrams wherever necessary**

I. Elaborate on: **(2 x 10 = 20)**

1. Enumerate the stages in life cycle of ameloblast and write in detail about amelogenesis.
2. Describe in detail about Maxillary central incisors.

II. Write Notes on: **(10 x 5 = 50)**

1. Principle fibres of periodontal ligament.
2. Functions of cementum.
3. Enamel Lamellae.
4. Cap stage.
5. Histology of pulp.
6. Serous acini.
7. Osteoclasts.
8. Cusp of carabelli and Oblique ridge.
9. Occlusal morphology of mandibular 2nd premolar.
10. Define the following
 - Groove
 - Cusp
 - Cingulum
 - Fossa
 - Pit

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

Answer all questions in the same order
Draw suitable diagrams wherever necessary

I. Elaborate on: **(2 x 10 = 20)**

1. Classify oral mucous membrane. Describe in detail about masticatory mucosa.
2. Describe in detail the morphology of Mandibular Permanent First Molar.

II. Write Notes on: **(10 x 5 = 50)**

1. Histology of Taste bud.
2. Ligaments of TMJ.
3. Periodontal Ligament Fibres.
4. Antrum of Highmore.
5. Interglobular Dentin.
6. Myoepithelial cells.
7. Cell Rests of Serre.
8. Mineralisation.
9. Development of Tongue.
10. Key of Occlusion and curve of Spee.

[LO 655]

FEBRUARY 2019

Sub. Code: 4203

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

Answer all questions in the same order
Draw suitable diagrams wherever necessary

I. Elaborate on: **(2 x 10 = 20)**

1. Classify salivary glands. Discuss in detail Parotid gland with suitable diagrams.
2. Write about the development of face with diagrams and add a note on developmental defects of palate.

II. Write Notes on: **(10 x 5 = 50)**

1. Epithelial rests of Malassez.
2. Fixatives.
3. Difference between Permanent and Deciduous dentition.
4. Primary, Secondary and Tertiary dentin.
5. Haematoxylin and Eosin staining.
6. Demilunes.
7. Types of Papillae.
8. Neural crest cells.
9. Active and Passive eruption of teeth.
10. Embrasures

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

**Answer all questions in the same order
Draw suitable diagrams wherever necessary**

I. Elaborate on: **(2 x 10 = 20)**

1. Describe in detail about types of Dentin with Histology. Add note on age changes in Dentin.
2. Discuss in detail the chronology and morphology of Permanent right Maxillary first premolar.

II. Write Notes on: **(10 x 5 = 50)**

1. Role of neural crest in orofacial development.
2. Incremental lines of Enamel, Dentine and Cementum.
3. Keratinization.
4. Functions of pulp.
5. Nerve supply of Tongue.
6. Dead tracts.
7. Difference between cellular and acellular cementum.
8. Gingival ligament.
9. Taste Pathway.
10. Decalcification.

[LQ 655]

FEBRUARY 2020

Sub. Code: 4203

FIRST YEAR B.D.S. DEGREE EXAM
(Common to Second Year Paper I - Modified Regulation III Candidates)

**PAPER III – DENTAL ANATOMY, EMBRYOLOGY AND
ORAL HISTOLOGY**

Q.P Code: 544203

Time: 180 Minutes

Maximum: 70 Marks

**Answer all questions in the same order
Draw suitable diagrams wherever necessary**

I. Elaborate on: **(2 x 10 = 20)**

1. Define periodontium. Write in detail about the structure and functions of periodontal ligament.
2. Discuss in detail about the chronology and morphology of Permanent right Mandibular second premolar.

II. Write Notes on: **(10 x 5 = 50)**

1. Histology of Maxillary sinus.
2. Mechanism of shedding.
3. Compensating curves.
4. Deglutition.
5. Alveolar bone proper.
6. Odontoblasts.
7. Cementoenamel junction.
8. Macroscopic features of gingiva.
9. Surface structures in enamel.
10. Histophysiological stages in tooth development.
