RESEARCH WORK

Dr Manoj K Mittal

1) A clinical study of efficacy of 4% articaine hydrochloride versus 2% lignocaine hydrochloride in dentistry J Int Oral Health 2014 Sep;6(5):81-3

Dr Rashmi Heralgi

2) “Aloe Vera and its uses in Dentistry”. Indian Journal of Dental Advancements. 2011, 3 (4): 656-658

Dr Samarth Tiwari

2. Evaluation of Different Disinfectants on Dimensional Accuracy and Surface Quality of Type IV Gypsum Casts Retrieved from Elastomeric Impression Materials. Journal of International Oral Health 2014; 6(3): 77-81

Dr Apoorva Bhardwaj

2)

ACHIEVEMENT

Our college is proud of our students who have topped the university examinations for consecutive years and have been rewarded for the same.

GALLERY
STATISTICAL ANALYSIS OF OPD
(Year 2016 – 17)

TOTAL NEW AND OLD OPD YEAR 2016-17 = 25,743

SPECIAL CASES
<table>
<thead>
<tr>
<th>S. No.</th>
<th>Name of Procedure</th>
<th>Year 2016-17</th>
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</thead>
<tbody>
<tr>
<td>1</td>
<td>Gingivectomy</td>
<td>14</td>
</tr>
<tr>
<td>2</td>
<td>Depigmentation</td>
<td>10</td>
</tr>
<tr>
<td>3</td>
<td>Modified Widman Flap</td>
<td>11</td>
</tr>
<tr>
<td>4</td>
<td>Conventional Flap</td>
<td>12</td>
</tr>
<tr>
<td>5</td>
<td>Apically Displaced Flap</td>
<td>6</td>
</tr>
<tr>
<td>6</td>
<td>Frenectomy</td>
<td>3</td>
</tr>
<tr>
<td>7</td>
<td>Curettage</td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>Gingivoplasty</td>
<td>2</td>
</tr>
<tr>
<td>9</td>
<td>Root Coverage</td>
<td>2</td>
</tr>
<tr>
<td>10</td>
<td>Incision &amp; Drainage</td>
<td></td>
</tr>
<tr>
<td>11</td>
<td>Crown Lengthening</td>
<td>2</td>
</tr>
<tr>
<td>12</td>
<td>Operculectomy</td>
<td>2</td>
</tr>
<tr>
<td>13</td>
<td>Vestibuloplasty</td>
<td></td>
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<tr>
<td>14</td>
<td>Excision of gingival overgrowth</td>
<td>12</td>
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<tr>
<td><strong>TOTAL</strong></td>
<td></td>
<td><strong>76</strong></td>
</tr>
</tbody>
</table>

**SYLLABUS**

**UG**

1) Introduction: Definition of Periodontology, Periodontics, Periodontia, Brief historical background, Scope of Periodontics.


3) Defense mechanisms in the oral cavity: Role of Epithelium, Gingival fluid, Saliva and other defensive mechanisms in the oral environment.

4) Age changes in periodontal structures & their association with periodontal diseases.

5) Classification of periodontal diseases: Need for classification - Scientific basis of classification, classification of gingival & periodontal diseases as described in world workshop 1989; Gingivitis - Plaque associated ANUG, steroid hormone influenced, medication influenced, desquamative gingivitis, other form of gingivitis as a nutritional deficiency, bacterial & viral infection, etc.; Periodontitis: Adult periodontitis, rapidly progressive periodontitis A & B, Juvenile periodontitis (localized, generalized, and post-juvenile); Prepubertal periodontitis; Refractory periodontitis.

6) Gingival diseases: Localized and generalized gingivitis, Papillary, marginal and diffuse gingivitis; Etiology, pathogenesis, clinical signs, symptoms and management of Plaque associated gingivitis
   1. Systemically aggravated gingivitis (sex hormones, drugs and systemic diseases)
   2. ANUG
3. Desquamative gingivitis- Gingivitis associated with lichen planus, pemphigoid pemphigus, and other vesiculobullous lesions
4. Allergic gingivitis
5. Infective gingivitis-Herpetic, bacterial and candidial
6. Periconitis
7) Gingival enlargement (classification and differential diagnosis) Epidemiology of periodontal Disease:
Definition of index, incidence, prevalence, epidemiology, endemic epidemic, and pandemic; Classification of indices (Irreversible and reversible); Deficiencies of earlier indices used in Periodontics; Detailed understanding of Silness & Loe Plaque Index, Loe & Silness Gingival Index, CPITN & CPI; Prevalence of periodontal diseases in India and other countries; Public health significance (All these topics are covered at length under community dentistry. Hence, the topics may be discussed briefly. However, questions may be asked from the topics for examination.
8) Extension of inflammation from gingival Mechanism of spread of inflammation from Gingival area to deeper periodontal structures.
9) Pocket Definition, signs and symptoms, classification, pathogenesis, histopathology, root surface changes and contents of the pocket.
10) Etiology: Dental Plaque (Biofilm); Definition, new concept of biofilm- Types, composition, bacterial colonization, growth, maturation & disclosing agents; Role of dental plaque in periodontal diseases; Plaque microorganisms in detail and bacteria associated with periodontal diseases; Plaque retentive factors; Materia alba; Food debris; Calculus; Definition; Types, composition, attachment, theories of formation; Role of calculus in disease; Food Impaction- Definition, types, etiology; Hirschfelds’ classification; Signs, symptoms & sequelae of treatment; Trauma from occlusion- Definition, types, histopathological changes, role in periodontal disease, measures of management habits, their periodontal significance, Bruxism & parafunctional habits, tongue thrusting, lip biting, occupational habits; IATROGENIC FACTORS; Conservative Dentistry- Restorations, Contact point, marginal ridge, surface roughness, overhanging restorations, interface between restoration and teeth Prosthodontics, Interrelationship, Bridges and other prosthesis, pontics (types), surface contour, relationships of margins to the periodontium, Gingival protection theory, muscle action theory & theory of access to oral hygiene; Orthodontics- Interrelationship, removable appliances & fixed appliances; Retention of plaque, bacterial changes; Systemic diseases; Diabetes, sex hormones, nutrition (Vit.C & proteins); AIDS & Periodontium; Hemorrhagic diseases, Leukemia, clotting factor disorders, PMN disorders.
12) Host response: Mechanism of initiation and progression of periodontal diseases; Basic concepts about cells, Mast cells, neutrophils, macrophages, lymphocytes, immunoglobulins, complement system, immune mechanisms & cytokines in brief; Stages in gingivitis- Initial, early, established & advanced; Periodontal disease activity, continuous paradigm, random burst & asynchronous multiple burst hypothesis.
13) Periodontitis: Etiology, histopathology, clinical signs & symptoms, diagnosis and treatment of adult periodontitis; Periodontal abscess- definition, classification, pathogenesis, differential diagnosis and treatment; Furcation involvement, Glickmans’ classification, prognosis and management; Rapidly progressive periodontitis; Juvenile periodontitis- Localized and generalized; Post-juvenile periodontitis; Periodontitis associated with systemic diseases; Refractory periodontitis.
14) Diagnosis: Routine procedures, methods of probing, types of 2 probes, (According to case history); Halitosis- Etiology and treatment, Mention advanced diagnostic aids and their role in brief.
15) Prognosis: Definition, types, purpose and factors to be taken into consideration.
16) Treatment plan: Factors to be considered.
17) Periodontal therapy: General principles of periodontal therapy; Phase I, II, III, IV therapy; Definition of periodontal regeneration, repair, new attachment and reattachment; Plaque control
   1. Mechanical tooth brushes, interdental cleaning aids, dentifrices
   2. Chemical- Classification and mechanism of action of each & pocket irrigation.
18) Pocket eradication procedures: Scaling and root planning; Indications; Aims & objectives; Healing following root planning; Hand instruments, sonic, ultrasonic & piezo-electric scalers; Curettage & present concepts- Definition, Indications, Aims & objectives, Procedures & healing response; Flap surgery- Definition, types of flaps, design of flaps, papilla preservation, indications & contraindications, Armamentarium, surgical procedure & healing response.
19) Osseous Surgery: Osseous defects in periodontal disease, Definition, Classification; Surgery- Resective, additive osseous surgery (osseous grafts with classification of grafts), healing responses, other regenerative procedures, root conditioning, guided tissue regeneration.
20) Surgery & periodontal plastic surgeries: Definition, Mucogingival problems- Etiology, classification of gingival recession (P.D. Miller Jr. & Sullivan & Atkins), indications & objectives; Gingival extensions procedure- lateral pedicle graft, frenectomy , frenotomy; Crown lengthening procedures; Periodontal microsurgeries in brief.
22) Hypersensitivity: Causes, Theories & management.
23) Implants: Definition, types, scope & biomaterials used. Periodontal considerations: such as implant-bone interface, implant Gingiva interface, implant failure, peri-implantitis & management.
24) Maintenance phase (SPT): Aims, objectives, principles, Importance, procedures, maintenance of implants.
26) Periodontal management: Management of medically compromised patients.
27) Inter-disciplinary care: Pulpo-periodontal involvement, Routes of spread of infection, Simons’ classification, management.
28) Systemic effects of periodontal diseases- Cardiovascular disease, Low birth in brief, weight of babies, etc.
29) Infection control protocol- Sterilization and various aseptic procedures.
30) Ethics.

Books Recommended:
5. Orban. Orban’s periodontics.
6. WHO. Oral Health Survey.
Syllabus Sequential work during the MDS course- The course is divided into 36 months.
1. Departmental orientation (1st month)
2. Rules and regulations (1st month)
3. Syllabus comprehension (1st month)
4. Preparation of log-books (1st month)
5. Basic sciences lectures (1st to 12th month)
6. Sterilization (1st month onwards)
   - seminar
   - daily participation in routine sterilization procedures
7. Basic periodontology seminars (1st to 4th month)
8. Other seminars (from 3rd month onwards)
9. Preclinical work (1st to 4rd month)
   - Instruments, sterilization, disclosing agents, oral hygiene aids & methods
   - Bite guards, splints, fiber splints, composites
   - Microbiological, immunological, radiological, biochemical diagnostics
   - casts, models, basic and advanced instrumentation
   - Anesthesia techniques
   - Incisions, suture materials and suturing techniques
   - Occlusal assessment & selective grinding/ coronoplasty
10. Library dissertation (2nd month)
11. Journal clubs (from 3rd month)
12. OPD (from 4th month)
13. Cases of indices (10 cases complete) (4th to 5th month)
14. Case history (from 4th month)
   - Elaboration
   - Methodical recording
15. Medical emergency workshop (in between 4th to 6th month)
16. Phase I therapy execution on variety of cases (minimum 15 hand instrumentation cases) (from 5th month)
17. Ultrasonic scaling (after min 15 completed hand scaling cases- approx 6th month onwards)
18. Probable topics for final dissertation (4th month)
19. Synopsis for final dissertation (as per MUHS dates- usually 6th month)
20. Conference activities (all ISP conferences and PG workshops mandatory)
21. Involvement in departmental study or study/ survey/ systematic review/ meta-analysis/ case report/ case series etc. for conference presentations (7th month onwards)
22. Publications (throughout MDS course- minimum 2)
23. Submission of library dissertation (12th month)
24. Pilot study for final dissertation (11th to 12th month)
25. Commencing final dissertation (after submission of LD- approx. 13th month)
26. Undergraduate lectures (12th to 24th month)
27. Assistance in surgical procedures (only after completion of 100 non-surgical cases- approx 10th month)
28. Hypersensitivity management, local drug delivery, minor LASER assisted surgeries, halitosis management, systemic antibiotics etc. (11th month onwards)
29. Minor surgical procedures (11th month onwards)
30. Basic periodontal surgeries (12th month onwards)
31. Regenerative procedures (16th month onwards)
32. Periodontal plastic surgeries (16th month onwards)
33. Implants (minimum 2- 16th month onwards)
34. Advanced surgeries/ microsurgery/ innovative surgeries (15th month onwards)
35. Interdisciplinary case presentations (12th month onwards)
36. Case presentations (for each surgical case before surgery)
37. Submission of final dissertation (30th month)
38. Submission for publication related with Final Dissertation (mandatory, 31st month)
39. Submissions
40. Assessment exams, theory and oral to be conducted every 6 months (6th, 12th, 18th, 24th, 30th and 33rd month)
41. Preliminary exam (33rd or 34th month)
42. Final exam (36th month)
43. Any other periodontology related work assigned by PG teacher or HOD or took up by PG student with appropriate permission (throughout MDS course)

**Kindly note:** The sequence of procedures to be followed can’t be altered. The next level won’t be allowed unless and until complete documentation, approval and submission were done at the earlier level. Bypassing the sequence and any independent activity by PG student will attract penalties to the level of detainment. Students are free to approach any of the teachers in the departmental PG unit. The **word of HOD would be final and binding.**

**Any extraordinary and able student may opt for next level prior to the time schedule provided he/she completes the due assignments prior to the level.**

Best of luck.
PERIODONTICS

Objectives
The following objectives are laid out to achieve the goals of the course Knowledge

• Discuss historical perspective to advancement in the subject proper and related topics
• Describe etiology, pathogenesis, diagnosis and management of common periodontal diseases with emphasis on Indian population
• Familiarize with the biochemical, microbiologic and immunologic genetic aspects of periodontal pathology
• Describe various preventive periodontal measures
• Describe various treatment modalities of periodontal disease from historical aspect to currently available ones
• Describe interrelationship between periodontal disease and various systemic conditions
• Describe periodontal hazards due to estrogenic causes and deleterious habits and prevention of it
• Identify rarities in periodontal disease and environmental/ Emotional determinates in a given case
• Recognize conditions that may be outside the area of his Speciality/competence and refer them to an appropriate Specialist
• Decide regarding non-surgical or surgical management of the case
• Update him by attending course, conferences and seminars relevant to periodontics or by self-learning process.
• Plan out/ carry out research activity both basic and clinical aspects with the aim of publishing his work in scientific journals
• Reach to the public to motivate and educate regarding periodontal disease, its prevention and consequences if not treated
• Plan out epidemiological survey to assess prevalence and incidence of early onset periodontitis and adult periodontitis in Indian population (Region wise)
• Shall develop knowledge, skill in the science and practice of Oral Implantology
• Shall develop teaching skill in the field of Periodontology and Oral Implantology

**SKILL**
• Take a proper clinical history, thorough examination 01 intra orally, extra orally, medical history evaluation, advice essential diagnostic procedures and interpret them to come to a reasonable diagnosis
• Effective motivation & education regarding periodontal disease maintenance after the treatment
• Perform both non-surgical & education regarding periodontal disease, maintenance after the treatment
• Perform both non-surgical and surgical procedures independently
• Provide Basic Life Support Service (BLS) recognizes the need for and advance life support and does the immediate need for that.

**Human values, ethical practice to communication abilities**
• Adopt ethical principles in all aspects of treatment modalities, Professional honesty & integrity are to be fostered Develop, Adopt ethical principles in all aspects of treatment modalities; Professional honesty & integrity are to be fostered. Develop Communication skills to make awareness regarding periodontal disease. Apply high moral and ethical standards while carrying out human or animal research, Be humble, accept the limitations in his knowledge and skill, and ask for help from colleagues when needed, Respect patients rights and privileges, including patients right to information and right to seek a second opinion.

**Course Contents**

**Paper I**
- Applied Anatomy:
  1. Development of the Periodontium
  2. Micro and Macro structural anatomy and biology of the periodontal tissues
  3. Age changes in the periodontal tissues
  4. Anatomy of the Periodontium
    - Macroscopic and microscopic anatomy
    - Blood supply of the Periodontium
    - Lymphatic system of the Periodontium
    - Nerves of the Periodontium
  5. Temporomandibular joint, Maxillae and Mandible
  6. Cranial nerves (5,7,9,11,12)
  7. Tongue, oropharynx
  8. Muscles of mastication

**Physiology**
  1. Blood
  2. Respiratory system - Acknowledge of the respiratory diseases which are a cause of periodontal diseases (periodontal Medicine)
3. **Cardiovascular system**
   h. Blood pressure
   i. Normal ECG
   j. Shock

4. **Endocrinology - hormonal influences on Periodontium**

5. **Gastrointestinal system**
   a. Salivary secretion - composition, function & regulation
   b. Reproductive physiology
   i. Hormones - Actions and regulations, role in periodontal disease
   ii. Family planning methods

6. **Nervous system**
   a. Pain pathways
   b. Taste - Taste buds, primary taste sensation & pathways for sensation

**Biochemistry**
1. Basics of carbohydrates, lipids, proteins, vitamins, proteins, enzymes and minerals
2. Diet and nutrition and periodontium
3. Biochemical tests and their significance
4. Calcium and phosphorus

**Pathology**
1. Cell structure and metabolism
2. Inflammation and repair, necrosis and degeneration
3. Immunity and hypersensitivity
4. Circulatory disturbances - edema, hemorrhage, shock, thrombosis, embolism, infarction and hypertension
5. Disturbances of nutrition
6. Diabetes mellitus
7. Cellular growth and differentiation, regulation
8. Lab investigations
9. Blood

**Microbiology:**
1. General bacteriology
   a. Identification of bacteria
   b. Culture media and methods
   c. Sterilization and disinfection

2. Immunology and Infection

3. Systemic bacteriology with special emphasis on oral microbiology - staphylococci, genus actinomyces and other filamentous bacteria and actinobacillus actinomycetemcomitans
4. Virology
   a. General properties of viruses
   b. Candidiasis
6. Applied microbiology
7. Diagnostic microbiology and immunology, hospital infections and management

**Pharmacology:**

1. General pharmacology
   a. Definitions - Pharmacokinetics with clinical applications, routes of administration including local drug delivery in Periodontics
   b. Adverse drug reactions and drug interactions

2. Detailed pharmacology of
   a. Analgesics - opioid and nonopiod
   b. Local anesthetics
   c. Haematinics and coagulants, Anticoagulants
   d. Vit D and Calcium preparations
   e. Antidiabetic drugs
   f. Steroids
   g. Antibiotics
   h. Antihypertensive
   i. Immunosuppressive drugs and their effects on oral tissues
   j. Antiepileptic drugs

3. Brief pharmacology, dental use and adverse effects of
   a. General anesthetics
   b. Antipsychotics
   c. Antidepressants
   d. Anxiolytic drugs
   e. Sedatives
   f. Antiepileptics
   g. Antihypertensives
   h. Antianginal drugs
   i. Diuretics
   j. Hormones
   k. Pre-anesthetic medications

4. Drugs used in Bronchial asthma cough

5. Drug therapy of
   a. Emergencies
   b. Seizures
   c. Anaphylaxis
   d. Bleeding
   e. Shock
   f. Diabetic ketoacidosis
   g. Acute addisonian crisis
6. Dental Pharmacology
   a. Antiseptics
   b. Astringents
   c. Sialogogues
   d. Disclosing agents
   e. Antiplaque agents

7. Fluoride pharmacology

**Biostatistics:**
- Introduction, definition and branches of biostatistics
- Collection of data, sampling, types, bias and errors
- Compiling data-graphs and charts
- Measures of central tendency (mean, median and mode), standard deviation variability
- Tests of significance (chi square test, t-test and Z-test)
- Null hypothesis

**Paper II**

**Etiopathogenesis**
1. Classification of periodontal diseases and conditions
2. Epidemiology of gingival and periodontal diseases
3. Defensic mechanisms of gingiva
4. Periodontal microbiology
5. Basic concepts of inflammation and immunity
6. Microbial interactions with the host in periodontal diseases
7. Pathogenesis of plaque associated periodontal diseases
8. Dental calculus
9. Role of iatrogenic and other local factors
10. Genetic factors associated with periodontal diseases
11. Influence of systemic diseases and disorders of the periodontium
12. Role of environmental factors in the etiology of periodontal disease
13. Stress and periodontal diseases
14. Occlusion and periodontal diseases
15. Smoking and tobacco in the etiology of periodontal diseases
16. AIDS and periodontum
17. Periodontal medicine
18. Dentinal hypersensitivity

**Paper III**

**Clinical and Therapeutic Periodontology and Oral Implantology**

**Please note:**
Clinical periodontology includes gingival diseases, periodontal diseases, periodontal instrumentation, diagnosis, prognosis and treatment of periodontal diseases.
I. **GINGIVAL DISEASES**
   1. Gingival inflammation
   2. Clinical features of gingivitis
   3. Gingival enlargement
   4. Acute gingival infections
   5. Desquamative gingivitis and oral mucous membrane diseases
   6. Gingival diseases in the childhood

II. **PERIODONTAL DISEASES**
   1. Periodontal pocket
   2. Bone loss and patterns of bone destruction
   3. Periodontal response to external forces
   4. Masticatory system disorders
   5. Chronic periodontitis
   6. Aggressive periodontitis
   7. Necrotising ulcerative periodontitis
   8. Interdisciplinary approaches
      - Orthodontic
      - Endodontic
   9. Periodontic considerations

III. **TREATMENT OF PERIODONTAL DISEASES**
   A. History, examination, diagnosis, prognosis and treatment planning
   1. Clinical diagnosis
   2. Radiographic and other aids in the diagnosis of periodontal diseases
   3. Advanced diagnostic techniques
   4. Risk assessment
   5. Determination of prognosis
   6. Treatment plan
   7. Rationale for periodontal treatment
   8. General principles of anti-infective therapy with special emphasis on Infection control in periodontal practice
   9. Halitosis and its treatment
   10. Bruxism and its treatment

B. **Periodontal instrumentation**
   1. Instrumentation
   2. Principles of periodontal instrumentation
   3. Instruments used in different parts of the mouth

C. **Periodontal therapy**
   1. Preparation of tooth surface
   2. Plaque control
   3. Anti microbial and other drugs used in periodontal therapy and wasting diseases of teeth
   4. Periodontal management of HIV infected patients
   5. Occlusal evaluation and therapy in the management of periodontal diseases
   6. Role of orthodontics as an adjunct to periodontal therapy
7. Special emphasis on precautions and treatment for medically compromised patients
8. Periodontal splints
9. Management of dentinal hypersensitivity

D. Periodontal surgical phase - special emphasis on drug prescription
1. General principles of periodontal surgery
2. Surgical anatomy of periodontium and related structures
3. Gingival curettage
4. Gingivectomy technique
5. Treatment of gingival enlargements
6. Periodontal flap
7. Osseous surgery (resective and regenerative;
8. Furcation; Problem and its management
9. The periodontic - endodontic continuum
10. Periodontic plastic and esthetic surgery
11. Recent advances in surgical techniques

E. Future directions and controversial questions in periodontal therapy
1. Future directions for infection control
2. Research directions in regenerative therapy
3. Future directions in anti-inflammatory therapy
4. Future directions in measurement of periodontal diseases

E. Periodontal maintenance phase
1. Supportive periodontal treatment
2. Results of periodontal treatment

IV. ORAL IMPLANTOLOGY
1. Introduction and historical review
2. Biological, clinical and surgical aspects of dental implants
3. Diagnosis and treatment planning
4. Implant surgery
5. Prosthetic aspects of dental implants
6. Diagnosis and treatment of peri-implant complications
7. Special emphasis on plaque control measures in implant patients
8. Maintenance phase

V. MANAGEMENT OF MEDICAL EMERGENCIES IN PERIODONTAL PRACTICE
Teaching/learning Activities
- Seminars: - A minimum of 15 seminars to be presented by each student during the PG course (At least 5 Seminars per year)
- Journal clubs: - a minimum of 25 Journal articles to be reviewed by each student during the PG course
- Interdepartmental Seminars: - Each PG student should present at least one seminar in an interdepartmental meeting during the PG course. Such meetings may be held at least once every month
• Library Assignment: one to be presented at the end of 18 months of the course.

**Academic Activities:**

**I Year**
Submission of synopsis for Dissertation - within 6 months from the start of the course
Library Assignment I - to be submitted at the end of the I year

**II Year**
Library Assignment II - to be submitted at the end of the II year
Scientific Paper presentation at the conferences III Year

**III Year**
Scientific Paper/Poster presentation at conferences
Submission of Dissertation - 6 months before completion of

**Skills**
**First year**
**Pre-Clinical work**

**Dental**
1. Practice of incisions and suturing techniques on the typhodont models
2. Fabrication of bite guards and splints
3. Occlusal adjustments on the casts mounted on the articulator
4. X-Ray techniques and interpretation
5. Local anesthetic techniques

**Medical**
1. Basic diagnostic microbiology and immunology, collection and handling sample, culture techniques.
2. Basic understanding of immunological diseases
3. Interpretation of various biochemical investigations
4. Practical training and handling medical emergencies and basic life support devices
5. Basic Biostatistics - Surveying and data analysis Clinical work

1. Applied periodontal indices 10 CASES
2. Scaling and root planning (SRP)
   a. Hand 15 CASES
   b. Ultrasonic 15 CASES
3. Curettage 10 CASES
4. Gingivectomy 20 CASES
5. Ginvivoplasty 10 CASES

**Clinical Work**
2. Case history and treatment planning 10 CASES
3. Local Drug Delivery techniques 5 CASES
4. Periodontal surgical procedures
- Pocket therapy
- Muco-gingival surgeries
- Implants (2 implants)
- Management of peri endo problems

5. Occlusal adjustments 10 CASES
6. Perio splints 10 CASES
Third Year

Clinical work
1. Regenerative techniques - Using various graft and barrier membranes

2. Record, maintenance and follow up of all treated cases including implants Assessment examinations: - In addition to the regular evaluation, log book etc., assessment examinations should be conducted once every six months & progress of the student monitored

Note: The number of cases mentioned are minimum number to be performed by each candidate. Submission of Synopsis for Dissertation should be done within 6 months of the commencement of the course.

Submission of two copies of Library Assignments at the end of 1 and 2nd year Submission of pre-clinical work as scheduled. Submission of Dissertation - 6 months before completion of III year. Maintenance of Work Diary/Log book as prescribed by RGUHS.

Monitoring Learning Progress
It is essential to monitor the learning progress to each candidate through continuous appraisal and regular assessment. It not only helps teachers to evaluate students, but also students to evaluate themselves. The monitoring to be done by the staff of the department based on participation of students in various teaching / learning activities? It may be structured and assessment be done using checklists that assess various aspects. Checklists are given in Section IV

SCHEME OF EXAMINATION

Theory : 300 Marks
Written examination shall consist of four question papers each of three hours duration. Total marks for each paper will be 75. Paper I, II and III shall consist of two long questions carrying 20 marks each and 5 short essay questions carrying 7 marks each. Paper IV will be on Essay. Questions on recent advances may be asked in any or all the papers. Distribution of topics for each paper will be as follows:

Paper I: Applied Basic Sciences: Applied Anatomy, Physiology, 8s Biochemistry, Pathology, Microbiology, Pharmacology, Research Methodology and Biostatistics. Should Epidemiology come under Paper II?

Paper II: Normal Periodontal structure, Etiology 8s Pathogenesis of Periodontal diseases, epidemiology as related to Periodontics

Paper III: Periodontal diagnosis, therapy 8s Oral implantology
Paper IV: Essay (with emphasis on recent advances in periodontics)
*The topics assigned to the different papers are generally evaluated under those sections. However, a strict division of the subject may not be possible and some overlapping of topics is inevitable. Students should be prepared to answer overlapping topics.

B. Practical / Clinical Examination: 200 Marks
The clinical examination shall be of two days duration

1st day
Case discussion
- Long case - One
- Short case - Two

Periodontal surgery - Periodontal flap surgery on a previously prepared case in one quadrant of the mouth after getting approval from the examiners

2nd day
Post-surgical review and discussion of the case treated on the 1st day Presentation of dissertation & discussion

All the examiners shall participate in all the aspects of clinical examinations / Viva Voce / Pedagogy

Distribution of Marks for Clinical examination (recommended)

<table>
<thead>
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<th>Marks</th>
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<tbody>
<tr>
<td>a) Long Case discussion</td>
<td>50</td>
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<tr>
<td>b) 2 short cases</td>
<td>50</td>
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<tr>
<td>c) Periodontal surgery</td>
<td>75</td>
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<tr>
<td>d) Post - operative review</td>
<td>25</td>
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<tr>
<td><strong>Total</strong></td>
<td><strong>200</strong></td>
</tr>
</tbody>
</table>

C. Viva Voce: 100 Marks

i. Viva- Voce examination: 80 marks
All examiners will conduct viva-voceconjunctly on candidate's comprehension, analytical approach, expression, interpretation of data and communication skills. It includes all components of course contents. It includes presentation and discussion on dissertation also.

ii. Pedagogy: 20 marks
A topic is given to each candidate in the beginning of clinical examination. He/she is asked to make a presentation on the topic for 8-10 minutes.

Topic be given to each candidate in the beginning of clinical examination. He/she is asked make a presentation on the topic for 8-10 minutes.
## Constructed Area for P.G Study

<table>
<thead>
<tr>
<th>Facility</th>
<th>DCI Requirement</th>
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<tbody>
<tr>
<td>Faculty rooms</td>
<td>630</td>
<td>650</td>
<td>Available</td>
</tr>
<tr>
<td>Clinics</td>
<td>600 (min. for MDS I Yr)</td>
<td>800</td>
<td>Available</td>
</tr>
<tr>
<td>Seminar room</td>
<td>300</td>
<td>320</td>
<td>Available</td>
</tr>
<tr>
<td>Department Library</td>
<td>200</td>
<td>220</td>
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</tr>
<tr>
<td>Patient Counseling Room</td>
<td>200</td>
<td>200</td>
<td>Available</td>
</tr>
<tr>
<td>PG common room</td>
<td>200</td>
<td>210</td>
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</tr>
<tr>
<td>Patient waiting room</td>
<td>300</td>
<td>310</td>
<td>Available</td>
</tr>
<tr>
<td><strong>Total area as per DCI 2007 regulations</strong></td>
<td><strong>2430</strong></td>
<td><strong>2710</strong></td>
<td><strong>Available</strong></td>
</tr>
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