**STANDERD OPERATING PROCEDURE**

**DEPARTMENT OF ORAL MEDICINE & RADIOLOGY**

**SOP – Oral Medicine**

Oral Medicine is a dental specialty that bridges the traditional areas of health between Dentistry and Medicine. It is concerned with disorders of the oral and facial region, including orofacial manifestations of systemic diseases. The specialists of this field are empowered to provide care to patients with a wide variety of orofacial conditions, including oral mucosal diseases, orofacial pain syndromes, TM joint disorders, salivary gland disorders, and oral manifestations of systemic diseases. Oral cancer screening and relevant investigations are carried out. The Oral Medicine section is also involved in teaching and research involving orofacial diseases; systemic and behavioral disorders that impact oral health.

 This Standard operating procedure has been followed since the establishment of the college.

Procedures:

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| **Sr. No.** | **Responsibility** | **Activity** | **Reference document** |
| 1. | Peon | * Opens Department at 8.15am
* Cleaning all department chairs & dental chairs and department floor.
* After getting registered at the registration counter the patient hands over his/her case paper at the department (Oral Medicine) registration counter.
 | Patient’s Case paper |
| 2 | Sister (staff nurse) | The nurse enters the patients details in a specially designed OPD register (which includes the patient’s registration number, name, age, sex, list of departments referred to for further treatment, and examining doctor’s name) | OPD Register (New) |
| 3 | Staff Nurse, Department Attendant | **Patient calling system:** * Department attendant is stationed at the entrance of the department to manage the crowd.
* The patient sits and waits outside the department for his / her turn.
* The patient is called by the Attendant as per his / her turn on the basis of “first come first examine”.
* Priority patients: Senior citizens, disabled individuals and medically compromised patients are segregated and attended on priority basis.
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| 4 | Staff Nurse,Department Attendant | * Preparation of the dental chair for the patient: Sterile kidney tray carrying the instruments for dental examination is kept by the staff nurse on the trolley.
* The back rest of the dental chair is in upright position and the height of the chair are kept as low as possible to make it easy for the patient to sit.
* The stool for the doctor is kept on the right side of the patient.
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| 5 | Department Attendant | * Transportation of Instruments in rigidstainless steel (Autoclaveable) Containers from OPD To Department’s sterilization room in three sessions at 11 Am, 1pm & 5pm.

**A.** Manual cleaning using tap water, brush / scrub and detergent solution in stainless steel container**B.** Chemical cleaning solutions (Savlon). |  |
| 6 | Staff Nurse | * Packaging and wrapping of instruments in green pouch.
* Sterilization of instruments using autoclave(121° C At 15 Psi For 25 To 30 Minute)
* Transportation and submission of sterilized pouches from point of sterilization
* Documentation in sterilization maintenance record register is done
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| 7 | Staff Nurse/Department Attendant | * Receiving the patient in the clinic: The patient is guided to sit on the dental chair.
* Child patients are asked to be accompanied by their parents / guardians, while disabled / very senior citizens are allowed to be accompanied by their relatives.
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| 8 | Consultant doctor on Duty.* Intern
* Third and final year students under the guidance of the consultant
 | * In case of complaint of pain, details including site, onset, severity, radiation, time course, aggravating factors, relieving factors and associated symptoms are asked as required.
* History Taking: The history including the chief complaint, history of main presenting complaint, past medical & dental history, family history, occupational history, habits like smoking & alcohol, allergies, drugs and other treatment history are noted on the case paper.
* The referral documents / other treatment related documents, if any, provided by the patient is noted.
* The relevant history is noted on the patient’s case paper.
 | Patient’s Case Paper |
| 9 | Consultant doctor on Duty.* Intern
* Third and final year students under the guidance of the consultant
 | * Patient Examination: The patient is examined using disposable gloves and mouth mask
* Extra-oral examination is carried out for the Temporomandibular joint, salivary glands, muscles of mastication and lymph nodes, as per the case indications.
* The patient is carefully examined intra-orally using a mouth mirror&explorer. The findings are noted down on the patient’s case paper
* Diagnosis: Based on data gathered by the History and Examination, provisional and differential diagnosis is given on the basis of the collected information.
 | Patient’s Case Paper |
| 10 | Consultant on Duty | * Investigation: In case laboratory/ radiology investigations are required to be performed.
* Dento-maxillofacial Radiographs: Referred to Department oforal Radiology
 | Patient’s Case Paper |
| 11 | * Consultant on Duty
* Intern
* Third and Final year students under the guidance of the consultant
 | * Treatment Plan: Treatment plan is prepared. Emergency and elective treatments are advised accordingly depending on the chief complaint.
* For Emergency treatment procedures patient is referred to respective department:
* For Elective procedures patient is referred to respective department as per the following order:
* **Dept. No. 2:** Management of Oro-facial pain; precancerous and oro-mucosal lesions, Salivary gland infections, TMJ disorders, Oral manifestations in geriatric and medically compromised patients.
* Special Cases: Cases of Oral cancer, Pre-cancerous lesions, Oro-facial pain, Temporomandibular Joint Disorders, Vesiculo-bullous lesions, Ulcerative lesions, Salivary gland diseases, trauma cases Cysts and Tumors are examined in the department.
* Oral Cancer: Thorough patient evaluation is done; detailed case history, clinical and radiographic examination is carried out following which the required investigations are requested or performed.
* After arriving at a provisional diagnosis, the patient is referred to Department of Oral Surgery for further management.
* All Cases of Oral Cancer are entered in the special case registry file.
* Temporomandibular Joint Disorders: Detailed clinical and radiographic examination is carried out. Prescription for pain management is given which includes analgesic and muscle relaxants. Depending on the diagnosis a treatment plan is formulated and referred to department of oral surgery
* Oro-facial pain: Detailed history of pain is recorded. Patient is clinically evaluated and examination is carried out. After arriving at a Provisional Diagnosis, necessary investigations are advised and prescription is given for the pain management. Medical consultation is taken if indicated.
* Vesiculo-bullous / Ulcerative lesions /Oral manifestations in geriatric and medically compromised patients: Patients are evaluated, detailed case history and examination is performed. Clinical photographs are obtained in necessary patients. Investigations are advised and treatment plan is formulated based on the provisional / final diagnosis.
* Pre-cancerous lesions: Patients are evaluated, detailed case history and examination is performed. Clinical photographs are obtained in necessary patients. Required investigations are advised and treatment plan is formulated based on the diagnosis.
* **Dept.No. 3**:All Intraoral and extraoral radiological procedures are carried out such as IOPA, Occlusal radiography, OPG, Lat. Ceph., skull views, TMJ views, Hand Wrist Radiograph
* **Dept. No. 4:** Hematological investigations like CBC, HBsAg,urea, serum creatinine, Total Blilirubin, direct Bilirubin , PRF, BSL, BT/CT, cytology , processing and evaluation of biopsy specimens
* **Dept. No. 5:** Extractions, Biopsy, Minor and major surgical procedures, Implant placement
* **Dept. No. 6:** For treatment of Pediatric patients till the age of 14 years. Oral prophylaxis, extractions, restorations, pulpectomy, pulpotomy, roots canal treatment and space maintainers. Clinic for patients with special needs - Special needs and physically handicapped patients.
* **Dept. no. 7:**All Orthodontic treatments
* **Dept. No. 8:** Complete/ Partial Dentures, Fixed Dental Prosthesis, Full mouth rehabilitation, ophthalmic, ear prosthesis. Prosthetic rehabilitation in surgical defects Implants.
* **Dept. No. 9:** Restorations, Root canal treatment, Bleaching and Aesthetic procedures, endodontic treatments.
* **Dept. No.10:** Oral prophylaxis (Scaling and root planing), Gingival and periodontal surgeries, implants, Management of periimplantitis.
* **Dept No.11:** Treatment of camp patients (Oral prophylaxis, restorations).
* **Specialty clinic for health card patients and VIP patients**: All emergency treatments including extractions, root canal opening procedures, denture repair and adjustments, orthodontic treatment.
* **Tobacco cessation center:**tobacco cessation counseling
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|  |  | * Consultant supervises the Case Histories and countersigns the work done by Third year and final year students on the Case paper of the patient.
* Any prescriptions given are countersigned by the consultant.
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|  | Consultant on Duty | * Follow up for special cases:
* Special Cases where follow up visit is required, the same is mentioned in the case paper and the patients are informed by the doctor about the date and time for the next follow up visit.
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|  | Staff Nurse,Attendant on duty | * Sterilization:
* During the day, instruments are washed after each use.

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**MAINTENANCE OF DENTAL CHAIRS & EQUIPMENT**

1. **Purpose:**
* To ensure that the dental chairs and other equipment in the department are functional and thus facilitate smooth functioning of the department.
1. **Scope:**
* It involves all dental chairs and equipment used during treatment in the department.
1. **Responsibility:**
* The Consultant and staff nurse maintain all the essential equipment and prepare condemnation list when asked for by the principal office.
* The staff nurses and consultants are responsible for checking the functioning of the dental chairs and equipment.
1. **Standard Procedure:**

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| **Sr. No.** | **Activity** | **Responsibility** | **Reference document** |
| 1 | Preventive measures:* Dental Chair: All the dental chairs are periodically checked by the maintenance department

OPG: It is under regular maintenance. | Staff Nurse , Radiology technician, Chair technician |  |
| 2 | Non-functional dental chair/ equipment:* All Dental Chairs and Equipment are adequately numbered and records are maintained.
* A complaint is made to the Maintenance department on Maintenance department complaint letter mentioning date &time
* The Maintenance dept. staff checks the equipment or dental chair and either repairs it or gives a report if some part needs to be ordered / or if it cannot be repaired by the Maintenance department
* A letter is made to the Principal’soffice for further necessary action
* Register non-repairable equipment.
 | Staff Nurse, Chair technician in Maintenance department | Repair Activity book for IOPA and OPGMaintenance Register |
| 3 | Condemnation list of all non-functional and non-repairable equipment and furniture is prepared, whenever asked for, by the administrative office. | Staff nurse & counter checked by consultant. | Condemnation list file Maintenance Register |

**STOCK MAINTENANCE**

1. **Purpose:**
* To ensure that there is sufficient consumable material and thus facilitate patient treatment procedures.
1. **Scope:**
* It involves all basic essential equipment and consumable dental material required during treatment and Investigation.
1. **Responsibility:**
* The staff nurses are responsible for keeping a track of the stock of consumable materials, supervised by Head of Department.

 **4) Standard Procedure:**

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| **Sr.No.** | **Activity** | **Responsibility** | **Reference document/record** |
| 1 | Check the stock of consumable materials once every 15 days | Staff Nurse under the supervision of a senior consultant | Consumable Stock register |
| 2 | Indenting the required material from the dental store of the hospital on a weekly basis.* The staff nurse prepares the indent list which is checked and signed by HOD.
* First in and first out inventory management procedure is employed.
 | Staff Nurse & HOD | Consumable Stock register |

**SOP – ORAL RADIOLOGY**

“Look well to the spine for the cause of disease” – Hippocrates

Oral and Maxillofacial Radiology is a specialty concerned with diagnostic imaging for dental, craniofacial and adjacent structures. All aspects of oral Radiology including radiation physics, radiation biology, radiation safety, radiographic technique, patho-physiology of disease and interpretation of diagnostic images is concentrated on.

The department is equipped with 2 IOPA X-ray machines and 1 Panoramic X-ray machine for extra oral radiography.

**Purpose:** The preferred X-ray investigation as per the need of the patient is performed for proper diagnosis and treatment.

**Scope:** All patients who are in need of diagnosis and treatment.

**Goals:** Diagnostic images of teeth and surrounding bone should reflect the exact size and shape of the tooth.

**Personnel:** Teaching staff

 X-ray Technicians

 3rd and 4th year students

 Attendant on duty

 Sister Nurse

**Daily opening, closing and cleaning of department:**

1. A fixed time of 8:30 am is maintained to open the door of the department for daily routine. The lights, fans, UPS and air conditioner are put on by attendant.
2. Regular cleaning of department along with equipments, furniture are done by attendant.
3. Daily cleaning and mopping of floor is done by attendant.
4. Cleaning of master tank platform and filling with water is done on daily basis by attendant.
5. The entire platform surrounding master tank, sinks and dental chair spittoons are cleaned. The radiographic waste is taken out of bins.
6. The hangers, holders and bins are kept in respective places for easy accessibility.
7. IOPA film holders are dipped in disinfecting solution before being used.
8. After the IOPA X-rays are taken, the holders are washed and put back in disinfecting solution (provided by college) by attendant.
9. The IOPA films after being exposed by technicians are cleaned and taken to dark room for processing by attendant.
10. The films are processed by technicians.
11. After processing, films are taken to reporting by attendant.
12. A teaching staff present in Radiology section monitors all work done and inspects x rays.
13. The x rays are dispatched to patients.
14. Last x- ray is taken at 4:50 pm, processed and dispatched.
15. Daily statistics is done by x ray technicians after finishing all patients.
16. During closing hours, the attendant cleans up the dark room platform, the water from water tank is drained, tanks cleaned, processing solutions are covered with lid and radiographic waste is segregated in bins.
17. The department UPS, fans, lights are put off and the door is locked after ensuring no staff or Student is left inside the department.

**Sterilization:**

Instruments are washed and autoclaving done twice or thrice as per the need.

**Indenting:**

Indenting is done as per need, 2-3 times per week.

**Intra oral Radiography:**

1. The patient details are entered in X-ray department register by Technicians.

X-ray register details include date, patient name, tooth number and number of X-rays required.

1. The IOPA film packet is marked with patient details and tooth number.
2. **PATIENT CALLING SYSTEM:** Patient is seated outside the department and waits or his/her turn. The patients are called turn wise as per the sequence.

**Some patients are given priority:** Patients on wheel chair, severely handicapped individuals and Senior citizens who are severely compromised on health.

1. The dental chair is arbitrarily arranged with straight back rest and foot parallel to the floor. A sterile tray with mouth mirror and probe packed in cloth pouches are kept for gross examination of the patient by the technicians. The height of the chair is kept low to allow easy movement of the patient.
2. As the patient enters the clinic, the patient is guided to sit on the dental chair. The dental chair is adjusted accurately once patient is seated. The priority patients (as mentioned above) and Pediatric patient are allowed to be accompanied by relatives/parents respectively.
3. Gross interaction with patient regarding name, chief complaint are asked for. The patient is examined briefly using disposable gloves and mouth mask. The oral cavity is examined using mouth mirror and explorer.

**ExtraOral Radiographs:**

1. The patient details are entered in X-ray department register by Technicians.

X-ray register details include date, patients name and type of x rays required.

1. **PATIENT CALLING SYSTEM:** Patient is seated outside the department and waits or his/her turn. The patients are called turn wise as per the sequence.
2. Patients are explained about proper positioning and events to follow for proper X-ray technique.
3. Patients are made to wear Lead apron for safety of patient.
4. The Panoramic machine is arbitrarily arranged and patient explained to take position for hand, legs, back and proper orientation of patients head as needed for x-ray.
5. The exposure is made as per Manufacturer’s instructions.
6. Once the x-ray is displayed on computer screen and is approved, patients are released for the position and asked to wait for the print.
7. The Technician prints the X-ray and Staff present in Oral Radiology approves the x-ray.
8. The attainder will hand over the x-ray to patient or the accompanying person with the patient.

**Stock maintenance:**

**Purpose**: To ensure there’s adequate consumable material for smooth functioning of department.

**Scope**: It involves all the essential equipment and consumable material supply.

**Personnel**: Staff nurse is responsible to keep a track of materials and maintenance of stock register.

**Standard procedure**:

1. Checks the stocks present in department every 4th day.
2. Prepares indent of required material and is signed by senior teaching staff of the department.
3. Staff nurse along with department attendant gets stock to the department and is stored for further use.
4. Entry is made in Consumable register of the department.
5. Materials are given in department for use as and when required by staff nurse and entry is made in register.
6.