



MAHATMA GANDHI UNIVERSITY
of
MEDICAL SCIENCES & TECHNOLOGY
JAIPUR

Syllabus

Fellowship in Head and Neck Oncology (One Year Program)

Edition 2020-21

Notice

1. Amendments made by the Board of Management of the University in Rules / Regulations of the Courses shall automatically apply.
2. The University reserves the right to make changes in the syllabus/books/ guidelines, fee structure or any other information at any time without prior notice. The decision of the University shall be binding on all.
3. The Jurisdiction of all court cases shall be Jaipur Bench of Hon'ble Rajasthan High Court only.

Syllabus

Fellowship in Head and Neck Oncology (Code)

(One Year Program)

Rules & Regulations

1. TITLE OF THE COURSE

The title of the course shall be "Fellowship in Head and Neck Oncology".

2. DURATION OF COURSE/ TRAINING

The course shall be of one-year duration from the date of commencement of academic session.

3. ELIGIBILITY FOR ADMISSION:

MS/DNB (ENT) / MS/DNB (General Surgery) / MDS (Maxillofacial Surgery)

Other Eligibility Condition: The candidate should be registered with either the National Medical Commission (NMC) or Medical Council of the domicile State.

4. CRITERIA FOR ADMISSION

Selection for Fellowship Programme shall be done by an Admission Board of the University strictly on merit. It will consist of two-step process –Written Entrance Examination followed by Counseling / Personal Interview (PI).

5. RESERVATION POLICY

Reservation shall be applicable as per policy of the State Government of Rajasthan.

6. ENROLMENT AND REGISTRATION

Every candidate who is admitted to Fellowship Programme in Mahatma Gandhi Medical College & Hospital shall be required to get himself/herself enrolled and registered with the Mahatma Gandhi University of Medical Sciences & Technology (**MGUMST**) after paying the prescribed eligibility and enrolment fees.

The candidate shall have to submit an application to the MGUMST through Principal of College for the enrolment/eligibility along with the requisite original documents and the prescribed fees within two months of his/her admission or up to November 30 of the year of admission whichever is later without late fees. Then after, student will have to pay applicable late fees as per prevailing University Rules.

No candidate shall be allowed to appear in University examination without his/her enrolment with the University.

7. MIGRATION RULES

No student, once admitted to the course and enrolled by the University, will be permitted to migrate to any other Course/ University.

8. ATTENDANCE

Minimum 80% attendance is mandatory, both, for theory and practical classes. Student with deficient attendance will not be permitted to appear in University examination.

9. ELIGIBILITY TO APPEAR FOR UNIVERSITY EXAMINATION

1. **Logbook:** Every candidate shall maintain a logbook for recording his/her participation in the Training Program conducted in the department. The record will include academic activities as well as the presentations and procedures carried out by the candidate. The log book shall be verified and certified by the Department Head and Principal of College.
2. The candidate before commencement of the University theory paper examination shall—
 - a. attend at least one the Conference
 - b. present at least one paper and one poster in a conference.
 - c. publish at least one article in a journal.

10. CONDUCTION OF THE UNIVERSITY EXAMINATION:

University examination shall be conducted twice in a year; that is Main and Supplementary Examination.

Supplementary Examination -

There shall be a supplementary examination conducted by the University within 4-6 months of the Main Examination for those candidates who do not pass at the Main examination.

11. SCHEME OF EXAMINATION

The examination shall be held at the end of the Course. The examination shall consist of Theory and Clinical/Practical & Oral.

The examinations shall be organised on the basis of 'Marking system' to evaluate and to certify candidate's level of knowledge, skill and competence.

(1) Theory:

There shall be two theory papers of 3 hours duration and 100 marks each. The theory examination shall be held in advance before the Clinical and Practical examination, so that the answer books can be evaluated before the commencement of the Clinical / Practical & Oral examination.

Paper-I and Paper-II will be set by two different external examiners from outside of the state.

Each theory paper shall consist of –

2 Essays	2 x 20 =	40 Marks
10 Short Notes	10 x 6 =	60 Marks
Total		100 Marks

The external examiner, who is paper setter for Paper-I shall evaluate the answer books of Paper-I. The answer books of Paper-II shall be evaluated by the Head of the Department.

Nomenclature of Papers:

Paper-I **Basics of Head & neck Oncology.**

Paper-II **Head & neck Oncology Management & Recent Advances**

(2) Clinical / Practical and Oral:

Clinical/Practical examination shall be conducted by one External and one Internal Examiner to test / aimed at assessing the knowledge and competence of the candidate for undertaking independent work as a specialist / teacher. Practical examination shall consist of carrying out special investigative techniques for Diagnosis and Therapy. Candidates shall also be examined in procedures in surgical disciplines. Oral examination may be comprehensive enough to test the candidate's overall knowledge and competence about the subject, investigative procedures, therapeutic technique and other aspects of the specialty, which shall form a part of the examination.

One Long Case		70 Marks
Two Short Cases	2 x 40 =	80 Marks
Oral Examination		50 Marks
Total		200 Marks

12. RESULT:

For passing Fellowship Examination, a candidate will be required to obtain at least 40% marks in each theory paper, 50% marks in the aggregate of both the theory papers and 50% marks in the aggregate of Clinical / Practical and Oral examination separately. A candidate failing in any theory paper or in the aggregate of theory papers or Clinical / Practical & Oral examination shall have to reappear in the whole Fellowship examination.

A candidate shall be permitted a maximum of 4 attempts or for 2 years to complete Fellowship Program from the date of admission of the course.

13. APPOINTMENT OF EXAMINER& PAPER SETTER

- a. All the examiners, paper setters, theory examination answer books evaluators, Internal and External Examiners for Practical examinations shall be appointed by

the President of the University out of the panel submitted by the Head of the department through the Dean of the concerned Faculty

- b. Qualification of the Paper Setter/External Examiner:
P.G. in Broad Specialty (MD/MS/DNB) / Super specialty (DM/MCh) in the concerned subject with 5 years of PG Teaching experience.
- c. Qualification of the Internal Examiner:
P.G. in Broad Specialty (MD/MS/DNB) / Super specialty (DM/MCh) in the concerned subject with 3 years of PG Teaching experience.
- d. Paper setter can be an examiner

14. GRACE MARKS

No grace marks will be provided in Fellowship Program examinations

15. REVALUATION / SCRUTINY

No Revaluation shall be permitted in the Fellowship Programs examinations. However, the student can apply for scrutiny of the answer books as per University Rules.

CURRICULUM
FELLOWSHIP IN HEAD AND NECK ONCOLOGY
(One Year Program)

GOALS

To acquire clinical and technical skills in management of Head and Neck neoplasm.

AIMS AND OBJECTIVES

To provide exposure to head and neck surgeries, flap surgery, endocrine surgery and research.

COURSE OF STUDY

Paper-I: Basics of Head & neck Oncology.

Head and Neck Anatomy

Epidemiology and pathogenesis of Head and Neck tumors

Principles of Head and Neck Onco Surgery

Basics of Head and Neck reconstructions

Basics of Radiation therapy for Head and Neck cancer

Basics of Chemotherapy for Head and Neck Cancer

Basics of dentistry, maxillofacial prosthetics and implants

Paper-II: Head & neck Oncology Management & Recent Advances

Head and neck tumor management

Protocols for Head and Neck cancer management

Recent advances in head and neck oncology

Weekly presentations – Twice per week

1. Epidemiology, pathogenesis of head neck cancers
2. Levels of evidence and design of clinical trials survival analysis
3. Radiation biology and fractionation
4. Chemotherapy in HNSCC – indications and evidence
5. Pre malignant lesions in the oral cavity and chemo prevention
6. Biomarkers in HNSCC
7. Nutritional considerations in HNSCC
8. Screening in Head and Neck cancer
9. Pain management in HNSCC and cancer cachexia
10. Adverse pathological features in HNSCC and its relevance
11. Radiological anatomy of oral cancers and Mechanism of mandibular involvement and radiological assessment
12. Skull base anatomy and imaging

13. Approaches to the oral cavity and oropharynx
14. Approaches to the ITF and skull base and lateral skull base
15. Neck dissection – types and rationale and operative technique
16. Mandibulectomy – types, indications
17. Regional flaps
18. ATA guidelines for thyroid cancer
19. Adjuvant treatment in HNSCC & Organ preservation strategies
20. Management of recurrent and unresectable disease in SCC
21. Cutaneous cancers in the head and neck
22. Flap physiology and microvascular technique
23. Organ preservation in laryngeal cancers
24. preservation in advanced laryngeal and hypopharyngeal cancers
25. Management of vascular injury in head and neck
26. Radial forearm flap ALT, fibula – anatomy and technique
27. Management of failed free flaps in head neck
28. Conservative laryngeal surgery
29. Role of virtual planning in maxillo- facial reconstruction
30. Dysphagia – evaluation and management, Lymphedema in head neck - management
31. Post-operative management of DTC
32. Management of nasopharyngeal carcinoma
33. Management of hypopharyngeal carcinoma
34. Major salivary gland tumours – evaluation and management + facial nerve management
35. Temporal bone tumours – management
36. Head neck soft tissue sarcomas- management
37. Evaluation and management of Sino nasal cancers
38. Evaluation of orbital invasion and management
39. Infra temporal fossa – approaches and management
40. Paediatric HN tumours

ASSESSMENT

- Periodical internal assessment (4 monthly per year), both in theory and clinical should be made for every candidate.
- Internal assessment will be made on day to day work of the trainee.

POSTINGS IN VARIOUS UNITS

Three monthly

- 15 days posting in Radiation therapy department
- 15 days posting in Medical Oncology department
- 7 days posting in Pain and palliative care and rehabilitation
- 15 days posting in Tobacco cessation clinic and screening

TEACHING AND TRAINING METHOD--

The fundamental components of the teaching programme should include:

1. Case presentations & discussion- once a week
2. Seminar – Once a week
3. Journal club- Once a week
4. Grand round presentation- once a week
5. Faculty lecture teaching- once a month
6. Clinical Audit-Once a Month
7. one oral presentation & One original Article publication during their training period in a recognized conference.

The rounds should include bedside sessions, file rounds & documentation of case history and examination, progress notes, round discussions, investigations and management plan) interesting and difficult case unit discussions.

The training program would focus on knowledge, skills and attitudes (behaviour), all essential components of education. It is being divided into theoretical, clinical and practical in all aspects of the delivery of the rehabilitative care, including methodology of research and teaching.

Theoretical: The theoretical knowledge would be imparted to the candidates through discussions, journal clubs, symposia and seminars. The students are exposed to recent advances through discussions in journal clubs.

Symposia: Trainees would be required to present a based on the curriculum in a class of teachers and students. A free discussion would be encouraged in these symposia. The topics of the symposia would be given to the trainees with the dates for presentation.

Clinical: The trainee would be attached to a faculty member to be able to pick up methods of history taking, examination, prescription writing and management in rehabilitation practice.

Bedside: The trainee would work up cases, learn management of cases by discussion with faculty of the department.

Journal Clubs: This would be a weekly academic exercise. A list of suggested Journals is given towards the end of this document. The candidate would summarize and discuss the scientific article critically. A faculty member will suggest the article and moderate the discussion, with participation by other faculty members and resident doctors. The contributions made by the article in furtherance of the scientific knowledge and limitations, if any, will be highlighted.

Research: He/ she would also be given exposure

to partake in the research projects going on in the departments to learn their planning, methodology and execution so as to learn various aspects of research.

REFERENCE BOOK & JOURNALS---

1. Essentials of Head & Neck Oncology, Close I.G.
2. Head & Neck cancer: A Multidisciplinary approach, Harrison L.B.

3. Complication in Head & Neck Surgery, Ossoff.R.H
4. An Atlas of Head & Neck, Lore.J.M.
5. Management of Head & Neck Cancer: Multidisciplinary Approach, Million.C.R.
6. Colour Atlas of Head & Neck Surgery Face, Skull & Neck , Shah.J.P
7. Colour Atlas of Operative Technology in Head and Neck Surgery, Parotid.
8. Soft Tissue and Reconstructive Surgery. Shah.J.P
9. Surgery of Cancer of the Larynx and Related Structures, Silver E.E.
10. Multimodality Therapy for Head and Neck Cancer, Snoks.G.B
11. Comprehensive Management of Head and Neck tumors, Thawley.S.E et.al
12. Basal & Squamous Cell Skin Cancer of the Head and Neck ,Weber.R.G.et.al
13. Burker's Oral Medicine: Diagnosis and Treatment. Lynch. M.A
14. Malignant Tumor's of the Mouth. Jaws and Salivary Glands, Langdonj. I.D & Henk. J.M
15. Cancer of the Face and Mouth: Pathology and Management for Surgeons. Mcgregor. I.A & Mcgregor. F.M.
16. Oral Oncology, (Proceedings of the 3rd International congress on oral cancer), Varma. A. K.

MODEL PAPER

Code

Short Name

Fellowship in Head and Neck Oncology Main -Examination Month, Year

Paper-I

Basics of Head & neck Oncology

Time : Three Hours

Maximum Marks :100

Draw diagrams wherever necessary

Attempt All Questions

- Q.1. Elaborate on [2x20=40]
- i. Levels of evidence & design of clinical trails for Head & Neck Cancer
 - ii. Cancer cachexia
- Q.2. Write Short Notes on (any ten) [10x6=60]
- i. Surgical anatomy of neck
 - ii. Classify Salivary glands tumors
 - iii. How to do Nutritional Assessment of Head and neck cancer patients.
 - iv. Anatomy of skull base
 - v. Staging of oral cavity cancer
 - vi. Deglutation
 - vii. Classify neck dissection and its indications
 - viii. Classify mandibulectomy and its indication
 - ix. Classify vegal nerve tumors
 - x. Staging of medullary carcinoma thyroid
 - xi. Etiology of oral cavity cancer
 - xii. Regional flaps

MODEL PAPER

Code

Short Name

**Fellowship in Head and Neck Oncology
Main - Examination Month, Year**

Paper-II

Head & neck Oncology Management & Recent Advances

Time : Three Hours

Maximum Marks :100

Draw diagrams wherever necessary

Attempt All Questions

- Q.1. Elaborate on [2x20=40]
- i. Organ preservation in advanced laryngeopharyngeal carcinoma
 - ii. Craniofacial resection
- Q.2. Write Short Notes on (any ten) [10x6=60]
- i. Thoracic duct injury & its management
 - ii. Treatment of Nasopharyngeal carcinoma
 - iii. Role of Proton beam therapy in Head and Neck Cancer
 - iv. Classify laryngeal surgery
 - v. Virtual planning of maxillo facial reconstruction
 - vi. Treacheostomy techniques and care
 - vii. Facial nerve reconstruction
 - viii. Head and neck sarcoma classification
 - ix. Management of osteosarcoma of maxilla
 - x. How to evaluate orbital invasion by tumors
 - xi. Approaches to infra temporal fossa.
 - xii. Fibular free flap Anatomy & its classification