CURRICULUM FOR DNB SURGICAL ONCOLOGY

National Board of Examinations New Delhi

INTRODUCTION

The National Board of Examinations was established in 1975 by the Government of India with the prime objective of improving the quality of the Medical Education by establishing high and uniform standards of postgraduate examinations in modern medicine on an all India basis.

DNB in Surgical Oncology

APPROVAL OF COURSE

The DNB program shall be started only after appropriate regulatory approvals from NBE.

STUDENTS' ELIGIBILITY AND SELECTION METHODS

Entry Requirements

Applicants for DNB Surgical Oncology course should have passed DNB or MS in General Surgery.

Selection Procedure

Students will be granted admission as per the procedure laid down by the NBE for admission to various DNB Super Specialty courses in various Institutions/Hospitals accredited for running DNB Surgical Oncology Courses. Currently, this is being done through a CET-Super Specialty Examination held as per schedule of examinations laid down by NBE from time to time followed by merit base centralized counseling conducted by NBE.

Duration of the Course

The duration of course in Surgical Oncology will be 3 years, which will include training in clinical, basic sciences and research.

DNB SURGICAL ONCOLOGY COURSE - GENERAL DESCRIPTION

Surgical Oncology covers the treatment of solid tumours of the oro-eosophago-gastrointestinal tract, of parenchymal and endocrine organs and of skin, mesenchymal, neurogenic, bone and soft tissues. Surgical Oncology also includes prevention, genetic counseling, specific diagnostic and staging procedures, rehabilitation and follow-up care. Surgical Oncology is focused on multimodality therapy.

The Surgical Oncologist differs from his colleagues in general surgery in several respects. With rapid advances in surgery, radiation, medical oncology, and new disciplines such as immunotherapy and hyperthermia, the Surgical Oncologist is in a critical position to help integrate these approaches to the management of an individual patient. It is likewise critical that the Surgical Oncologists have special training that makes it possible for him or her to understand these divergent fields and appreciate their potential roles in treatment. The Surgical Oncologist should take the responsibility for training new residents and educating the general surgical staff of their hospitals and medical institutions to better define the concepts and indications of advances in cancer diagnosis and management.

PROGRAMME GOAL

At the end of the course the candidate should have acquired knowledge, skills, aptitude and attitude to be able to function as an independent clinician/ consultant and a teacher.

PROGRAMME AIMS

The trainee should achieve such knowledge during the training period that he/she after qualification, independently or as a responsible surgical member of an interdisciplinary oncology team is able to:

- Recognize symptoms and signs of cancer
- Make a diagnostic programme for suspected tumours or metastasis and perform
- Staging and classification of manifest tumours
- Perform prognostic assessment

- Define the role of surgery in a given classified disease reflecting the patient's general condition, including or excluding multimodality approaches in a pretreatment discussion within a multidisciplinary team
- Perform an adequate preoperative work-up
- Perform cancer surgery within his/her specialty with high skill and quality
- Manage postoperative care
- Decide on and perform adequate follow-up
- Implement national guidelines into local practice
- Perform palliative surgical treatment, supportive and terminal care
- Diagnose, score and treat side-effects and complications of surgical treatment
- Assess the impact of surgical interventions on quality of life
- Communicate accurately and adequately to cancer patients and their relatives
- Manage common psychologic reactions to crisis and final stage of life
- Practice medicine in accordance with medical ethics and patient's rights

TEACHING & LEARNING METHODS

Teaching method and learning methods will include

a) Knowledge acquisition by

- Personal study including effective use of medical literature, tutorials, post graduate teaching
- Journal Club
- Seminar(presentations)
- Lecture/ discussion: lectures on newer topics by faculty, in place of seminar/as per need
- Case presentation/Discussion: Trainees will present a clinical case for discussion before a faculty and discussion made pertaining to its management and decision to be recorded in case files.

b) Clinical skills and attitudes by

Demonstration of examination skills in normal subjects & patients by trainer

- Presenting history, demonstrating clinical findings & use of investigations on ward rounds or tutorial sessions
- Presenting cases for group discussion grand rounds, PG meetings etc, personal study including the effective use of medical literature, review of paper or electronically based problem cases
- Observation of consultant trainers managing clinical problems in day to day practice
- Observation of consultant trainer communicating with patients and members of team in day to day practice
- Clinical teaching: In OPD, ward rounds, emergency, ICU and operation theater
- Bedside clinical training for patient care management and for bedside manners
- Grand ward rounds
- Multi-disciplinary seminars: All students should by turn present seminars. At
 other times he is expected to actively attend the seminars. A list of name of
 student with topic and moderator should be submitted beforehand.
- Clinico-pathological Conference: All students are expected to present cases of Interest by turn. Active participation by hematologist and pathologist is recommended. Prior intimation of case by students to faculty members is expected. Such meetings should be entered into logbook.
- Interdepartmental Meeting: It is strongly recommended once a week especially
 with dept. of Radiodiagnosis, Dept of Pathology and Dept. of Microbiology. Either
 case presentations or a topic of common interest can be actively discussed.

c) Procedures -

- Demonstration of technique by trained operator in patients requiring the procedure,
- Use of models to practice technique,
- Perform procedure under observation,
- Reinforce skills during on the job training with both in-patients and out-patients.

d) Paper presentation

e) Poster presentation

SYLLABUS

Part I

Basic Sciences

A broad knowledge is needed to plan optimal treatment for an individual cancer patient throughout the disease course. The trainee in Surgical Oncology must therefore have a knowledge of fundamental biology of cancer including etiology and epidemiology, natural history of malignant diseases, cancer biology as well as tumor immunology.

1. Etiology and epidemiology of malignant diseases

- Genetic Predisposition to Cancer
- Chemical Carcinogenesis
- Hormones and the Etiology of Cancer
- Ionizing Radiation
- Ultraviolet Radiation Carcinogenesis
- Physical Carcinogens
- Trauma and Inflammation
- Tumor Viruses
- Herpes viruses
- Papilloma viruses and Cervical Neoplasia
- Hepatitis Viruses
- Parasites
- Environmental factors in carcinogenesis

2. Prognosis and natural history of malignant diseases

- Mechanisms and patterns in local, regional and distant dissemination of malignant diseases
- Differences in natural history between hereditary and sporadic forms of cancer

- Diseases predisposing to malignancy e.g. Inflammatory bowel disease or primary sclerosing cholangitis
- Prognostic and predictive factors
- Genetics of hereditary malignant diseases

3. Cancer biology

- Cell kinetics, proliferation, apoptosis and the balance between cell death and cell proliferation
- Angiogenesis and lymphangiogenesis
- Genome maintenance mechanisms to prevent cancer
- Intercellular and intermolecular adhesion mechanisms and signaling pathways
- Potential effects of surgery and surgery-related events on cancer biology (e.g. Angioenesis)

4. Tumor immunology

- Cellular and humoral components of the immune system
- Regulatory mechanisms of the immune system
- Tumor antigeneity
- Immune-mediated antitumour cytotoxicity
- Effect of cytokines on the tumor
- Effects of the tumor on anti-tumor immune mechanisms
- Potential adverse effects of surgery and surgery-related events (like blood transfusions) on the immunological responses

5. Cancer Screening and Early Detection

• Cancer screening and early detection

6. Basic principles of cancer treatment

A trainee in Surgical Oncology has to become familiar with the basic principles of

- Surgery
- Radiotherapy

- Chemotherapy
- Endocrine therapy
- Immunotherapy
- Evaluation of the choices of treatments
- Adverse effects with these treatments
- Interactions of these treatment modalities with those of surgery

Part II

1. Cancer Epidemiology

Cancer Epidemiology

2. Cancer Prevention

- Prevention of tobacco-related cancers
- Nutrition in the etiology and prevention of cancer
- Chemo-prevention of cancer
- Cytokinetics
- Drug resistance and its clinical circumvention
- Principles of dose, schedule, and combination
- Chemotherapy
- Regional Chemotherapy
- Animal models in developmental therapeutics
- In vitro and in vivo predictive tests
- Pharmacology
- Toxicology by organ system

3. Chemotherapeutic Agents

- Folate Antagonists
- Pyrimidine and Purine Antimetabolites
- Alkylating Agents and Platinum Antitumor Compounds
- Anthracyclines and DNA Intercalators

- Epipodophyllotoxins / DNA Topoisomerases
- Microtubule targeting anticancer drugs derived from plants and microbes
- Vinca Alkaloids, Taxanes, and Epothilones, Asparaginase
- Recent Advances/concepts

4. Principles of Endocrine Therapy

- Steroid Hormone Binding and Hormone Receptors
- Hypothalamic and Other Peptide Hormones
- Corticosteroids
- Estrogens and Anti-estrogens
- Clinical use of Aromatase Inhibitors in Breast Carcinoma
- Progestins
- Androgen Deprivation Strategies in the treatment of Advanced Prostate Cancer

5. Principles of Cancer Pathology

Principles of cancer pathology

6. Principles of Imaging

- Imaging neoplasms of the head and neck and central nervous system
- Imaging neoplasms of the thorax
- Imaging neoplasms of the abdomen and pelvis
- Cross-sectional imaging of musculoskeletal neoplasms
- Imaging the breast
- Ultrasound in cancer medicine
- Radionuclide imaging in cancer medicine
- Perspectives in imaging
- Interventional radiology for the cancer patient

7. Principles of Surgical Oncology

- Principles of Surgical Oncology
- Vascular access in cancer patients

8. Principles of Radiation Oncology

- Physical and biologic basis of Radiation Oncology
- Principles of Hyperthermia
- Photodynamic Therapy for cancer

9. Principles of Medical Oncology

Principles of Medical Oncology

10. Principles of Biotherapeutics

- Immunostimulants
- Active specific immunotherapy with vaccines
- Interferons
- Cytokines: biology and applications in cancer medicine
- Hematopoietic Growth Factors.
- Monoclonal Serotherapy
- Cancer Gene Therapy
- Hepatitis Viruses
- Parasites

11. Neoplasms of the Thorax

- Cancer of the Lung
- Malignant Mesothelioma
- Thymomas and Thymic Tumors

12. Neoplasms of the Female Reproductive Organs

- Neoplasms of the vulva and vagina
- Neoplasms of the cervix
- Endometrial cancer
- Neoplasms of the fallopian tube
- Ovarian cancer
- Gestational Trophoblastic Disease

13. Neoplasms of the Breast

Neoplasms of the breast

14. Neoplasms of the Skin

Neoplasms of the skin

15. Malignant Melanoma

Malignant melanoma

16. Neoplasms of the Bone and soft Tissue

Bone Tumors & Sarcoma of non- osseous tissues

17. Neoplasms of the Hematopoietic System

- Myelodysplastic Syndrome
- Acute Myeloid Leukemia in adults
- Chronic Myeloid Leukemia
- Acute Lymphocytic Leukemia
- Chronic Lymphocytic Leukemia
- Tumors of the heart and great vessels
- Primary germ cell tumors of the Thorax
- Metastatic tumors in the Thorax

- Hairy Cell Leukemia
- Hodgkin's Disease
- Non Hodgkin's Lymphomas
- Mycosis Fungoides and the Sezary Syndrome
- Plasma cell tumors
- Mast cell Leukemia and other mast cell neoplasms
- Polycythemia vera and essential thrombocythemia

Neoplasms of the Alimentary Canal

- Neoplasms of the Esophagus
- Neoplasms of the Stomach
- Primary Neoplasms of the Liver
- Treatment of Liver Metastases
- The Gallbladder
- Diagnosis and Management of Biliary Tract Cancer
- Neoplasms of the Ampulla of Vater
- Neoplasms of the Exocrine Pancreas
- Neoplasms of the small intestine, vermiform appendix, and peritoneum, colon and rectum & anal canal

Neoplasms of the Genitourinary Tract

- Renal Cell Carcinoma
- Neoplasms of the Renal Pelvis and Ureter
- Bladder Cancer
- Neoplasms of the Prostate
- Neoplasms of the Penis
- Neoplasms of the Testis
- Neoplasms in Acquired Immunodeficiency Syndrome

Neoplasms of Unknown Primary Site

Neoplasms of unknown primary site

Neoplasms in Children

- Principles and practice of pediatric oncology
- Incidence, origins, epidemiology
- Principles of pediatric radiation oncology
- Late effects of treatment of cancer in children and adolescents
- Childhood Acute Lymphoblastic Leukemia
- Pediatric Acute Myeloid Leukemia
- Hodgkin's disease in children and adolescents
- Non Hodgkin's Lymphoma in children
- Langerhan's Cell Histiocytosis
- Hepatic tumors
- Renal tumors of childhood
- Germ cell tumors
- Neuroblastoma
- Soft tissue sarcoma of childhood

Complications of Cancer and its Treatment

- Management of cancer pain
- Anorexia and Cachexia
- Antiemetic Therapy
- Neurologic complications
- Dermatologic complications of cancer chemotherapy
- Skeletal complications
- Hematologic complications of cancer
- Blood bank support
- Coagulopathic complications of cancer

- Urologic complications
- Cardiac complications
- Respiratory complications
- Liver function and hepatotoxicity in cancer
- Gastrointestinal complications
- Oral complications
- Gonadal complications
- Endocrine complications
- Secondary cancers: incidence, risk factors, and management

Infections in Patients with Cancer

• Infections in patients with cancer

Oncologic Emergencies

Oncologic Emergencies

CLINICAL PROCEDURES

The trainee in Surgical Oncology must achieve knowledge and skills in performing complex cancer operations in her/his specialty. The final aim with surgical training is to develop skills in performing RO (radical) resections, adequate diagnostic procedures, lymph node dissections and meaningful palliative procedures. The numbers of operations are not fixed but should be guidance to what is needed to accomplish relevant skills.

The trainee should have experience in the following procedures:

1. Melanoma and sarcoma:

- Excision of melanoma
- Regional node dissection
- Regional perfusion
- Surgery of abdominal sarcomas

Surgery of trunk and limb sarcomas

2. Gastrointestinal surgery

- Oesophagectomy
- Gastrectomy with lymph node dissection
- Whipple's pancreaticoduodenectomy
- Liver resection
- Colonic resection
- Rectal resection
- Palliative procedures

3. Endocrine surgery

- Thyroidectomy with regional lymph node dissection
- Adrenalectomy

4. Breast surgery

- Mastectomy with axillary dissection
- Breast conserving surgery
- Sentinel node biopsy for breast cancer

5. Vascular access

Venous Port System

6. Laparoscopic surgery

- Staging laparoscopy for GI cancer
- Staging laparoscopy for malignant lymphoma
- Laparoscopic resection of malignant tumours

7. Thoracic surgery

- Pulmonary lobectomy with lymphadenectomy
- Pneumonectomy with lymphadenectomy

- Mediastinoscopy
- Resection of pulmonary lung metastases
- Thoracoscopic approaches

8. Urologic surgery

- Radical prostatectomy with lymphadenectomy
- Radical nephrectomy
- Partial nephrectomy
- Radical cystectomy with lymphadenectomy
- Retroperitoneal lymphadenectomy
- Iliac lymphadenectomy
- Inguinal lymphadenectomy

9. Gynecologic surgery

- Surgery of endometrial, ovarian and tubal cancer
- Radical hysterectomy
- Other pelvic malignancies

THESIS

Guidelines for Submission of Thesis/Dissertation by Candidates

Research shall form an integral part of the education programme of all candidates registered for DNB degrees of NBE. The Basic aim of requiring the candidates to write a thesis/dissertation is to familiarize him/her with research methodology. The members of the faculty guiding the thesis/dissertation work for the candidate shall ensure that the subject matter selected for the thesis/dissertation is **feasible**, **economical** and **original**.

Guidelines

- a) The dissertation may be normally restricted to the size of 100 pages, to achieve this, following item may be kept in view:
 - i. Only contemporary and relevant literature may be reviewed.

- ii. The techniques may not be described in detail unless any modification / innovations of the standard techniques are used and reference may be given.
- iii. Illustrative material may be restricted
- iv. Since most of the difficulties faced by the residents related to the work in clinical subject or clinically oriented laboratory subjects the following steps are suggested:
 - The number of clinical cases to be included in the dissertation may be limited. No number is therefore, prescribed and it will vary from topic to topic.
 - For prospective study, as far as possible the number of cases should be such that adequate material, judged from the hospital attendance, will be available and the candidate will be able to collect the case material within a period of 6-12 months so that he / she is in a position to complete the work within the stipulated time.
 - The objective of the study should be limited and well defined.
 - As far as possible, only clinical or laboratory data of investigations of patients or such other material easily accessible in the existing facilities should be used for the study
 - The laboratory work required to be performed by the residents of clinical departments should be minimal. For this purpose technical assistance, wherever necessary, may be provided by the department concerned. The resident of one specialty taking up some problem related to some other specialty should have some basic knowledge about the subject and he/she should be able to perform the investigations independently. Wherever some specialized laboratory investigations are required, a co-guide may be co-opted from the concerned investigative department. The quantum of laboratory work to be carried out by the candidate should be decided by the guide and co-guide by mutual consultation.
 - The clinical residents may not ordinarily be expected to undertake experimental work or clinical work involving new techniques not

hitherto perfected or the use of chemicals or radio isotopes not readily available. They should however, be free to enlarge the scope of their studies or undertake experimental work on their own initiative but all such studies may be feasible within the existing facilities.

- The residents should be able to use freely the surgical pathology / autopsy data if it is restricted to diagnosis only. If however, detailed histological data are required the resident will have to study the case himself with the help of guide / co-guide. The same will apply in case of clinical data.
- b. Statistical methods used for analyses will be described in detail.

Thesis Submission to NBE

- 1. As per NBE norms, writing a thesis is essential for all DNB candidates towards partial fulfillment of eligibility for award of DNB degree certificate.
- 2. The protocol of Thesis/ Dissertation should be submitted to the office of the NBE through head of the institutions within three (3) months of joining the training in Medical college/university/DNB accredited institution.
- No correspondence will be made in regard to acceptance of the protocol except only in the case of rejected protocols for which individual will be informed by office through mail/website.
- 4. DNB candidates are required to submit their thesis before the cut off date which shall be 30th June of same year for candidates appearing for their scheduled December final theory examination. Similarly candidates who shall be appearing in their scheduled June DNB final examination shall be required to submit their thesis by 31st of preceding December.
- 5. Thesis should be hard bound and the front cover page should be printed in the standard format. A hard bound thesis should be accompanied with:
 - I. A summary of thesis.

- II. Thesis submission form duly completed.
- III. NBE copy of challan in original.
- IV. Soft copy of thesis in a CD duly labeled.
- V. Copy of letter of registration with NBE.
- 6. A declaration of thesis work being bonafide in nature and done by the candidate himself at the institute of DNB training need to be submitted bound with thesis.
- 7. It must be signed by the candidate himself/herself, the thesis guide and head of the institution, failing which thesis shall not be considered.
- 8. If thesis is rejected or needs to be modified for acceptance, NBE will return it to the candidate with suggestion of assessors in writing for modification.
- If any unethical practice is detected in work of the Thesis, the same is liable to be rejected. Such candidates are also liable to face disciplinary action as may be decided by NBE.
- 10. The thesis is to be submitted 6 MONTHS before the commencement of the DNB examination along with thesis evaluation fees of Rs. 1500/- drawn in favor of NATIONAL BOARD OF EXAMINATIONS payable at New Delhi, for evaluation.

Guidelines for Writing of Thesis/Dissertation

Title - Should be brief, clear and focus on the relevance of the topic.

Introduction – Should state the purpose of study, mention lacunae in current knowledge and enunciate the Hypothesis, if any.

Review of Literature – Should be relevant, complete and current to date.

Material and Methods- Should include the type of study (prospective, retrospective, controlled double blind) details of material & experimental design procedure used for data collection & statistical methods employed; statement of limitations ethical issues involved.

Observations— Should be organized in readily identifiable sections having correct analysis of data be presented in appropriate charts, tables, graphs & diagram etc. These should be statistically interpreted.

Discussion- Observations of the study should be discussed and compared with other research studies. The discussion should highlight original findings and should also include suggestion for future.

Summary and Conclusion

Bibliography - Should be correctly arranged in Vancouver pattern.

Appendix— All tools used for data collection such as questionnaire, interview schedules, observation check lists etc should be put in the annexure.

ASSESSMENT

The formative assessment will be observation of the trainee's performance in day to day practice. This requires close interaction between the trainee and trainer, allowing direct observation of the trainee's performance in a range of clinical settings. Formative assessment of knowledge will also include annual appraisals by external subject experts, assessment of presentations in clinics, grand rounds, seminars etc., and in future using MCQs, when a reliable and valid set has been developed. The log book will also be assessed periodically.

The summative assessment of competence will be done in the form of DNB Final Examination leading to the award of the degree of Diplomate of National Board in Surgical Oncology. The DNB final is a two-stage examination comprising the theory and

practical part. An eligible candidate who has qualified the theory exam is permitted to appear in the practical examination.

Examination

a) Theory Exam:

- I. The theory exam comprise of three papers (I,II & III), maximum marks 100 each divided into I) Basic Medical Sciences as applied to Surgical Oncology, II) Principles and Practice of Surgical Oncology & III) Recent Concepts/advances in Surgical Oncology respectively.
- II. There are 10 short notes of 10 marks each, in each of the papers.
- III. Maximum time permitted is 3 hours for each paper.
- IV. Candidate must score at least 50% in the aggregate of 3 papers to qualify the theory exam.
- V. Candidate who have qualified the theory exam are permitted to take up the practical exam.

b) Practical Exam:

- I. Maximum Marks: 300.
- II. Comprises of Clinical Examination and Viva.
- III. Candidate must obtain a minimum of 50% marks in the Clinical Examination (including Viva) to qualify for the Practical exam.
- IV. There are a maximum of two attempts that can be availed by a candidate for Practical Exam.
- V. First attempt is the practical exam following immediately after the declaration of theory results.
- VI. The final attempt can be taken by the candidate within two years of passing the theory exam.
- VII. Absentation from Practical Exam is counted as an attempt.
- VIII. Appearance in first practical exam is compulsory;
- IX. Requests for change in centre of exam are not entertained, as the same is not permissible.

LOG BOOK

A candidate shall maintain a log book of operations (assisted / performed) during the training period, certified by the concerned post graduate teacher / Head of the department / senior consultant. In general it will be a portfolio of material documenting the trainees progress and clinical performance and might include: summaries of exemplary clinical case material, profile of clinical case mix seen and surgical procedures performed/assisted each month, training/educational courses attended, published or unpublished audit, critical review of literature presentations of audit, clinical cases & research work at local or national meetings and peer reviewed publications.

SUGGESTED READING:

Molecular biology

- Molecular Diagnosis of Cancer, Cotter.F.E.
- Molecular Biology for Oncologist, Yarnold.J.R. et al.
- Cancer Chemotherapy Handbook, Baquiran Delia
- The Lymphomas, Canellos.G.P.et al
- Chemotherapy Source Book, Perry.M.C
- Leukemia, Henderson. E.S.et al
- Cancer Medicine, Holland. J .F.et al
- Atlas of Clinical Haematology, Begemann
- Text book of Malignant Haematology, Degos.L et al
- Clinical Hematology, Rochard Lee.et al
- Clinical Oncology, Abeloff et Al
- Important Advances in Oncology, Devitha, V.T.
- Cancer Principle And Practice Of Oncology, Devitha, V.T. et al
- Decision Making in Oncology Evidence Based Management, Djulbegovic .B and Sullivan.
- AJCC Cancer Staging Manual (Americal Joint Committee on Cancer)
- Cancer Treatment, Halnane.E
- Cancer Treatment , Haske.L

- Oncology for Palliative Medicine, Hoskin Peter And Wendy
- Regional Therapy of Advanced Cancer, Rubin.J.T
- The non Hodgkin's Lymphoma, Magrath.l.
- Comprehensive Text book of Oncology, Vol 1-2, Mossa, A.R.
- Oxford textbook of Oncology Peckham. M et al
- A Multi- disciplinary Approach for Physicians and Students, Rubin Clinical Oncology
- Atlas of Diagnostic oncology, Skarin.A.T
- Basic Science of Oncology, TannocK, E.I.
- Pediatric Oncology, Philip Lanszowsky
- Comprehensive Text Book of Thoracic Oncology, Aisner J, at al
- Pediatric Surgical Oncology, Andrassu, R.J.
- Breast: Comprehensive Management of Benign and Malignant Disorders, Bland
- Gleenn's Thoracic and Cardiovascular Surgery, Baue.A.E et al
- Surgery of Childhood Tumours, Carachi. R. et al
- Cancer of the Colon, Rectum and Anus, Cohen, A.M.
- Atlas of Surgical Oncology, Daly.J.M And Cady.B
- Cancer of the Prostate, Das.S & Crawford ,E.D
- Prostate Cancer, Ernstoff,M.S.et al
- Bone Marrow Transplantation, Forman, S.J.
- Minimal Access Surgery in Oncology, Geraghty, J.G. et al.
- Clinical Management of Bladder Cancer, Hall, R, R 1999 (Acc. No. 3667)
- Soft Tissue Tumours, Harms D & Beattie, E.J
- Cancer Surgery, Harvey, J.C and Beattie, E.J.
- Testicular Cancer: Investigation and Management, Horwich. A
- Bone Tumor: Diagnosis, Treatment and Prognosis, Huvos. Andrew G
- Reconstrction and Plastic Surgery: Grab's Encyclopedia of flaps.
- Bailey & Love's Short Practice of Surgery, Manrl, C.V.Russel R.C.G
- Surgical Emergencies , Monson .J. et al
- Gastric Cancer, Nishi.M
- Superficial Bladder Cancer, Pagano.F. et al.

- Carcinoma of the Kidney, Testis and Rare Urologic Malignancies, Petrovic H .Z. et al
- Breast Cancer, Roses.D.F
- · Breast Cancer, Singlets .D.E
- Atlas of Esophageal Surgery, Skinner D.B.
- Surgery of the Breast: Principles and Art, Spear.S.L. et al.
- Gastric Cancer, Sugimori. T & Sasaki.M.
- Colorectal Cancer, Williams.N.S
- Campbell's Urology, Walsh. et.al
- Soft Tissue, Weiss.S.W. & Brooks J.S.J.
- Urological Oncology Waxmanj, J. Williams.
- Prevention and Early Detection of Colorectal Cancer, Young.G.P. et.al
- Maingot's Abdominal Operations, Zinner M.J.

Anesthesiology

- Pharmacology and Physiology in Anesthetic Practice, Stoelting .R.K.
- Anesthesiology: Problem Oriented Patient Management, Yao .F.S.F.

Head & Neck Oncology

- Essentials of Head & Neck Oncology, Close.I.G.
- Head & Neck cancer: A Multidisciplinary approach, Harrison L.B.
- Complication in Head & Neck Surgery, Ossoff.R.H.
- An Atlas of Head & Neck, Lore.J.M.
- Management of Head & Neck Cancer: Multidisciplinary Approach, Million .C.R.
- Color Atlas of Head & Neck Surgery Face, Skull & Neck, Shah.J.P.
- Color Atlas of Operative Technology in Head and Neck Surgery, Parotid.
- Soft Tissue and Reconstructive Surgery. Shah.J.P
- Surgery of Cancer of the Larynx and Related Structures, Silver E.E.
- Multimodality Therapy for Head and Neck Cancer, Snoks.G.B.

- Comprehensive Management of Head and Neck tumors, Thawley.S.E et.al
- Basal & Squamous Cell Skin Cancer of the Head and Neck, Weber.R.G.et.al

Oral Oncology

- Burker's Oral Medicine: Diagnosis and Treatment .Lynch. M.A
- Malignant Tumor's of the Mouth. Jaws and Salivary Glands, Langdonj. I.D & Henk. J.M
- Cancer of the Face and Mouth: Pathology and Management for Surgeons.
 Mcgregor. I.A & Mcgregor. F.M.
- Oral Oncology, (Proceedings of the 3rd International congress on oral cancer),
 Varma. A. K.

Gynecologic oncology

- Practical Gynaecologic Oncology, Berekj & Hacker .W.F
- Gynecological oncology: Guide to Clinical Management, Blake Peter et.al
- Gynaecologic Oncology: Fundamental Principles & Clinical Practice, Copplegon.
 M
- New Development in Cervical Cancer Screening and Prevention, Franco. E & Monsoneco. J
- Principles and Practice of Gynecologic Oncology, Hosking W.J et al.
- Ovarian Cancer: Controversies in Management, Gershenson.D.M & Mcguire.W.P
- Essentials of Gynaecologic Cancer, Lakiton.F et al
- Epithelial Cancer of the Ovary, Lawton. Frank. G. et.al
- Hand Book of Colposcopy, Luesely. D. et.al
- Cancer and Pre-Cancer Of The Cervix, Luesley.D.M & Barrass.R
- Gynaecologic Cancer Surgery, Morrow.C.P et.al
- Synopsis of Gynecologic Oncology , Morroki.C.P & Curtun.J.P.

- Multimodality Therapy in Gynecologic Oncology, Sevin .B.U. et al
- Ovarian Cancer, Sharp.F. et.al
- Cancer of the Cervix, Shingleton H.M & Orr.J.W

Pediatric oncology

- Color Atlas of Pediatric Hematology .Hann. I.M.
- Manual of Pediatric Hematology and Oncology .Lanzkowsky Philip.
- Principles & Practice of Pediatric Oncology. Pizzo.P.A & Popla CK

Journals

- American Journal of Pediatrics
- Acta Oncologica
- Hematology / Oncology
- British Journal of Cancer
- Cancer
- CA.A.Cancer Journal For Clinicians
- Cancer Detection & Prevention
- Cancer Genetics and Cytogenetics
- Cancer Journal (Scientific American) (NP)
- Cancer Survey (NP)
- Cancer Treatment Review
- Clinical Oncology
- Current Problem In Cancer
- Current Opinion In Oncology
- European Journal of Surgical Oncology
- European Journal of Surgical Oncology
- Genes, Chromosomes And Cancer
- Gynecologic Oncology
- Hematological Oncology
- Hematology Oncology Clinics of North America

- Indian Journal of Cancer (Indian)
- International Journal of Cancer (UICC)
- International Journal of Gynecological Cancer
- International Journal of Radiation Oncology
- Journal of Cancer Education (NP)
- Journal of Clinical Oncology
- Journal of National Cancer Institute (Gift)
- Journal of Psycho Social Oncology
- Journal of Surgical Oncology
- Medical & Pediatric Oncology
- Nutrition and Cancer
- Oncology (NP)
- Psycho-Oncology
- Radiotherapy & Oncology
- Seminars In Oncology
- Seminars In Oncology Nursing
- Seminars In Radiation Oncology
- Seminars In Surgical Oncology
- Surgical Oncology Clinics of North America