

**Rashtriya Ayurved Vidyapeeth, New Delhi**  
**Ayurved – Subject: Swasthavritta and Yoga**

**MODULE NAME: SWASTHAVRITTA MODULE**

**I. Module Objective:**

- Updating Academicians in respect to various preventive practices as per classics, adopting techniques and Swastha Panchakarma procedures.
- Imparting skills in assessment of Health
- Updating in implementing Ritucharya regimens
- Updating in qualitative analysis of Ahara dravyas and formulating balance diet and therapeutic diet.
- Updating in conduction of Public Health activities.
- Updating in lifestyle modification counselling skills
- Updating in environmental science training, biomedical waste management techniques.
- Updating in demonstration of Yogasanas and basic techniques of Pranayama, Dhyana, Bandha, Mudra and Various Relaxation techniques.
- Updating in demonstrate methodology of epidemiological surveys, communicable and non-communicable disease case taking skills

**II. Learning Outcomes:**

On successful completion of this module, participant should be able to:

- Perform and teach various preventive practices as per classics, adopting techniques and Swastha Panchakarma procedures.
- Perform advanced skills in assessment Health
- Implement Ritucharya and Ritu sandhicharya regimens effectively
- Perform qualitative analysis of Ahara dravyas and formulating balance diet and therapeutic diet.
- Conduct Public Health activities in an effective way by adopting advanced techniques.
- Counsel lifestyle modification skillfully.
- Perform and train updated environmental science training, biomedical waste management techniques.
- Use different IT tools in execution of various programs
- Utilize recent advancements in survey studies and utilize online survey forms viz. google etc.
- Perform Yogasanas and basic techniques of Pranayama, Dhyana, Bandha, Mudra and Various Relaxation techniques.
- Demonstrate methodology of epidemiological surveys and skillfully take communicable and non communicable disease cases.
- Adopt and teach practical aspects of social hygiene, environmental hygiene
- Conduct certain surveys in specific diseases and in specific areas by utilizing advanced tools of surveys.

**III. Pre-requisite(s):** Lesson materials-Samhitas, text books, Instruments, equipment's, models and specimens, laboratory, computers with internet facility.

## **Swasthavritta-CME Module**

### **6-day CME for Teachers**

- **Unit 1- Topic: Concept of health- Ayurved & Modern Medicine. Reactive, active, pro- active approach to health.**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

- Concepts of health in Ayurved with details from Charaka samhita ( Vimansthana Adhyaya 8 / 89), Sushruta Samhita (Sutrasthana adhyaya 15/ 48), Kashyapa Samhita -Khilasthan and relevant commentary (Tika)
- Concept of Health in Modern Science- Definitions, Dimensions of Health , Concept of well being
- Application of Concepts of Health in Ayurved and designing of a Swasthya Assessment sheet
- Definition of Proactive, Active and Reactive approach to Health

#### **ii. Activity session (Group discussion)**

- Interactive session topics will distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieve respective learning objectives of topic, which will be designing by the resource person.
- Recent advances in Assessment of Health status. (Physical, Mental, Nutritional, Social, Economic etc.); Exercise among participants – cross checking
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram (flow chart) as 'study design' pertaining to their identified topics.  
(Network diagrams are a flowchart that show the sequential workflow of project tasks)

### **Unit 2 Topic: Primordial, Primary, Secondary & Tertiary Preventive measures in Ayurved**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

- Swasthya Rakshan measures in Ayurved- Ahara and Vihara
- Classification of Vihar - Niyatkala Vihar- Dinacharya, Ritucharya.
- Aniyatkala Vihar- Adharaniya and Dharaniya vega concept- Dharana and Udirana, Ritushodhan, Brumhana-Rasayana and Bhutadi Asparshana (environment purification)  
(Reference Ashtanghridaya Ayurved Rasayana Tika-Hemadri- Sutrasthan 2/1 and Sutrasthana -4/1)
- Applied aspect of Ahara in preserving health preventing disease and managing disease conditions.
- Applied aspect of Niyatkala Vihar- Occupation based Dinacharya procedures, Ritucharya
- Role of Adharaniya and Dharaniya Vega concept in diseases manifestation
- Role of Ritushodhan and Rasayan in Immunity building

- Methods of Bhutadi Asparshana for Prevention of air borne infections
- ii. Activity session** (Group discussion)
- Practical demonstration of Dinacharya procedures
- Practical demonstrations of Preventive Panchakarma applied in Ritucharya
- Material for activity: A sheet with listed Dinacharya and Ritucharya procedures. This will be distributed amongst participants and each will write procedure of one upakrama and the applied aspect in today's context swasthyarakshan and chikitsa.

### **Unit 3 Topic: Ayurvedic Dietetics -I**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

##### **Basic**

- Classical reference of Ahara prashashti (Charaka sutrasthana 27/349-350)
- Aharasevan kala (Charaka vimanasthana 2/3; Susruta Suthrasthana46, Astanga Hridaya Sutra 7, Yogaratnakar, Bhavprakash).
- Application of Trividha Kukshividnyaniya-Charak Vimansthana 2(Matarvat, Amatravat and AtimatrvtAhar) and their clinical relevance.
- Ahara Jeerna Lakshnas – (CharaksamhitaVimansthana -1/25-4, Ashtanghridaya Sutrasthana -8/55, Ashtangsamgraha Sutrasthana 11/58)

##### **Advanced**

- Aharavidhivishesha Ayatanani (CharaksamhitaVimanasthana- 1)
- Dwadashashana pravichar (Sushrutsamhita Uttartantra- 64/56)

#### **ii. Activity session** (Group discussion)

- Applied aspect of Aharavidhivishesha Ayatanani
- Applied aspect of Dwadashashan Pravichar.
- Application of the above concepts based on occupation, age and physiological conditions viz. garbhini, sutika etc.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics. Each participant will search for literature using personal laptops or mobile phones.

### **Unit 4 Topic: Ayurvedic Dietetics -II**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

- Swastha Hitakar-nityasevaniya Dravya.
- Swastha Ahitakara dravyas
- Ahara Vargas as per Charaksamhita, Sushrutasamhita, Ashtanghridaya
- Hitatama and Ahitatama dravyas as per ahara vargas
- Anukta Ahara dravyas and identification of their their gunas-characteristics

- Concept and applied aspect of Organic food in today's era. Health benefits of organic food and A2 milk
- Ill effects of genetically modified food, food grains, vegetables, fruits grown on fertilizers and A1 milk.
- **ii. Activity session** (Group discussion)
- Interactive session topics will be distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieve respective learning objectives of topic, which will be designing by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

### **Unit 5 Topic: Ayurvedic Dietetics -III**

**Categories:** Microteaching session & Practical of Swasthavritta

**Course contents:**

#### **i. Interactive session**

- Agnidushtikara Hetus in relation to Ahara- Anashan, Adhyashana, Samashana, Vishamashana, Virudhhashana
- Role of shadrasas in health maintenance
- Examples in today's era of the types of Viruddha Ahara.
- Agryasamgraha of Ahara dravyas
- **Advanced**
- Preparation techniques of some Pathya Preparations for lifestyle related diseases viz. Prameha, Hypertension, Hridroga etc. Preparation technique of Instant Pathyapaniya (E.g. Herbal tea etc)

#### **ii. Activity session** (Practical)

- Practical short demos of selected Pathya kalpanas (**Host institute will select**)

### **Unit 6 Topic: Concept of Pathyapathya and Hands on training of Pathyakalpana**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

##### **Basic**

Concept of Pathya-Apathya

##### • **Advanced**

Disease wise Samanya Pathya-apathya.

#### **ii. Activity session** (Group and Practical discussion)

- **Hands on training of selected Pathyakalpanas** (**Host institute will select**)

## **Unit 7 Topic: Modern Nutritional Concepts**

**Categories:** Microteaching session of Swasthavritta

### **Course contents:**

#### **i. Interactive session**

##### **Basic**

- Concept of nutrition in modern science.
- Deficiency disorders. Identifying specific nutrient predominant foods
- Recent advances in food adulterant identification and techniques of identifying adulterants
- Concept of balanced diet and its relevance

##### **Advanced**

- Recent advances in Anthropometric measuring skills and its application, Anthropometric measuring skill exercises
- **ii. Activity session(Practical)**
- Role of Ayurved in National Nutrition Programmes – exercise to be done by the participants
- Material for activity: A sheet and nutritional programmes with listed Ayurvedic inputs. The participants will make a network diagram as 'study design' pertaining to their identified nutritional programme.

## **Unit 8 Topic: Preventive Aspect of Nidra and Brahmacharya**

**Categories:** Microteaching session of Swasthavritta

### **Course contents:**

#### **i. Interactive session**

##### **Basic**

- Nidra –Terminology and effects
- Brahmacharya as a Upasthambha

##### **Advanced**

- Diwa swapa- indications and contraindications
- Ratri jagrana effects and preventive measures
- Akala shayana – effects and treatment
- Hetus and Chikitsa of Nidranasha and Atinidra

#### **ii. Activity session (Practical discussion)**

- Literature search for nidra and brahmacharya concepts from the Samhitas
- Demonstration of upakramas in nidranasha and atinidra- Nasya, Tarpan, abhyanga shirodhara, Panchakarma procedures
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

## **Unit 9 Topic: Yoga - Hatha Yoga**

**Categories:** Microteaching session of yoga

### **Course contents:**

#### **i. Interactive session**

##### **Basic**

- Various definitions of Yoga
- Different Chitta Vrittis and their explanation
- Definition of Hatha Yoga. Yogasiddhikara and Asiddhikara Bhavas
- Hatha Yoga practices- Asana, Mudra-bandha, Pranayam, Nadanusandhana

##### **Advanced**

- Knowledge about Yogic Shuddhikriyas- Shatkarmas

#### **ii. Activity session (practicals)**

- Practical Demonstration of different asanas
- Practical Demonstration of Pranayam – Anuloma-Viloma, Suryabhedan etc.
- Practical Demonstration of Yogic Shatkarmas
- Practical demonstration of various mudras and bandhas

**(Practical Demos of all above Yogic procedures will be taken online/ offline from day 2 to day 6 in the morning for minimum 1 hour before the main sessions)**

- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics. Each participant will search for literature using personal laptops or mobile phones.

## **Unit 10 Topic: Yoga –Ashtang Yoga**

**Categories:** Problem based learning and practical of Yoga

### **Course contents:**

#### **i. Interactive session**

##### **Basic**

- Yama, Niyama – types and effects
- Asanas, Pranayama
- Pratyahara
- Dharana –Dhyana-Samadhi- Sanyam.
- Mental health care through Yoga and Ayurveda

##### **Advanced**

- Therapeutic Yoga – disease specific asanas and pranyama
- Nadi Shuddhikara Pranayama

#### **ii. Activity session (Group discussion and Practical)**

- Role play for practice of Yama and Niyama by the participants.
- Disease specific Asana practicals
- Pranayam – therapeutic aspect- Anuloma-Viloma Pranayam and other nadi shuddhikara pranayama
- Material for activity: Disease specific sheet of yogic procedures. The participants will make a network diagram as 'study design' of yogic procedures

Each participant will search for literature using personal laptops or mobile phones.

**Unit 11 Topic: Environment and Health- I**

**Categories:** Microteaching of Swasthavritta

**Course contents: (Any one point as per the convenience of the organizing institute)**

**i. Interactive session**

**Basic**

- Effect of Desha and Kala on Health
- Air pollution – Effects, prevention & Control; Air testing parameters biological markers, biological standardization scientific evaluation.
- Vayu shuddhikarana-Ayurvedic Theory
- Water pollution – Effects, prevention & Control; Water testing parameters (pH, Hardness of water etc)
- Jala Prasadak Dravya as per Sushruta Samhita sutrasthan 45/17-18
- Soil pollution – Effects, prevention & Control; Soil testing parameters

**ii. Activity session (Practical)**

**Basic**

- Visit to Water Purification Plant
- Use of Jalaprasadaka Dravyas

**Advanced**

- Water testing parameters (pH, Hardness of water etc)
- Material for activity: Each participant will search for literature using personal laptops or mobile phones.

**Unit 12 Topic: Environment and Health- II**

**Categories:** Microteaching of Swasthavritta

**Course contents:**

**j. Interactive session**

**Basic**

- Recent updates in biomedical waste management. COVID 19 protocol at domiciliary and hospital level
- Refuse Disposal techniques
- Sewage Treatment Methods and their importance

**ii. Activity session (Practical)**

- Biomedical waste bins and need as per NABH for the attached hospital.
- Material for activity: Each participant will search for literature using personal laptops or mobile phones.

**Unit 13 Topic: Occupational Health**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

**i. Interactive session**

- Occupational Hazards and recent updates in prevention and management of occupational disorders by Lifestyle modification through Swasthavritta. (Dinacharya, Yoga etc.)

- Occupation based Dinacharya.

**ii. Activity session** (Group discussion)

- Interactive session topics will distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieving respective learning objectives of topic, which will be designed by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

**Unit 14 Topic: Naturopathy**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

**i. Interactive session**

**Basic**

Concepts, Principles of Nature cure, recent updates in various methods of nature cure.

**Advanced**

Practical demonstrations of methods adopted in Naturopathy. (Visit to Naturopathy institute, if there is any)

**ii. Activity session** (Group discussion)

- Interactive session topics will distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieve respective learning objectives of topic, which will be designing by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

**Unit 15 Topic: Epidemiology-I**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

**i. Interactive session**

**Basic**

- Aims of Epidemiology, Study designs, Design of questionnaire for Observational studies
- Sankramak Vyadhi –Ayurved Paribhasha
- Janapadaudhwansa- causes, treatment concepts.(Charaksamhita Vimansthana 3)
- Maraka Vyadhis – causes, signs-symptoms, treatment concepts (Sushruta Samhita- sutrasthana -6)
- Investigation of epidemic disease, Understanding and preventive measures of emerging diseases (Dengue, H1N1, Chikungunya, Covid-19etc),
- Disease coding as per Ayurveda (Ref. CCRAS)

**Advanced**



- Ayush measures for prevention of Covid 19, Vector borne diseases etc.
- ii. Activity session** (Group discussion)
  - Searching literature on Sankramaka Vyadhis and Janapada udhwansa
  - Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

## **Unit 16 Topic: Epidemology –II**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

### **i. Interactive session**

#### **Basic**

- Epidemiology of non-communicable diseases viz. Obesity, Diabetes Mellitus, Hypertension, Cardiovascular diseases, Stroke, Cancer
- **Advanced**
- Role of Ayurved in Non-Communicable diseases
- Lifestyle Interventions in non-communicable diseases based upon ahara and vihara

### **ii. Activity session** (Group discussion)

- Interactive session topics disease wise will be distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieving respective learning objectives of topic, which will be designed by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

## **Unit 17 Topic: Vyadhikshamatva- Ayurvedic and Modern Concepts**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

### **j. Interactive session**

#### **Basic**

- Definition, Types of Vyadhikshamatva.
- Methods to enhance Vyadhikshamatva (Immuno modulation in Ayurved)
- Immunity- Definition, Types

#### **Advanced**

- Vyadhi-aksham sharirani Features of Individuals prone for diseases (**Ref-Charaka samhita sutrasthana 28**)
- Importance of Bala and Oja in Vyadhi kshamatva
- Immunizing Agents

### **ii. Activity session** (Group discussion)

- Interactive session topics will be distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.

- Each group will propose methods of achieving respective learning objectives of topic, which will be designed by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

### **Unit 18 Topic: Maternal and Child Health Care**

**Categories:** Microteaching session of Swasthavritta

#### **Course contents:**

##### **i. Interactive session**

###### **Basic**

- Preventive aspect in pre-conceptual, antenatal, Intranatal, postnatal care.
- Maternal & Infant Care: Ayurvedic view & interventions.
- Suvarna Prashana Vidhi and effects
- Integrative measures in child growth and wellness

###### **Advanced**

Role of Panchakarma and Rasayana in Promotion of reproductive health

##### **ii. Activity session (Group discussion)**

- Interactive session topics as per pre conceptual, antenatal, intranatal and postnatal care, new born and infant care will be distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods to achieve respective learning objectives of topic, which will be designed by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

### **Unit 19 Topic: Primary Health Care, Ayush in Public Health**

**Categories:** Microteaching session of Swasthavritta

#### **Course contents:**

##### **i. Interactive session**

###### **Basic**

- Definition of Primary Health Care
- Principles and Elements of Primary Health Care based upon Alma Ata Declaration
- National Health Policy 2017, the goals to be achieved.

###### **Advanced**

- Role of Ayurved in Primary health care and National Health Policy 2017
- Training of ASHA workers, Village Health Workers, Dais and Anganwadi workers for AYUSH- (Ayurved) practices

##### **ii. Activity session (Group discussion)**

- Interactive session topics will distributed to each group by the Resource person.

- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieving respective learning objectives of topic, which will be designing by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

### **Unit 20 Topic: National Health Programmes**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

##### **Basic**

- Current National Health Programmes and their content (Any one important programme preferably with role of Ayurveda)

##### **Advanced**

- Role of Ayurved in Each National Health Programme (Any one important programme preferably with role of Ayurveda)

#### **ii. Activity session (Group discussion)**

- Interactive session topics as per National Health Programmes will be distributed to each group by the Resource person.
- Each group will present learning objectives of topics, which will be redefined by the resource person.
- Each group will propose methods of achieving respective learning objectives of topic, which will be designing by the resource person.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

### **Unit 21 Topic: National AYUSH Mission**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

#### **i. Interactive session**

##### **Basic**

- Updated Knowledge on National Ayush Mission with emphasis on submission of projects to different funding agencies etc.

##### **Advanced**

- Different components of National Ayush Mission
- Ayushman Bharat Scheme, Unnat Bharat Abhiyan Scheme
- Adoption of 5 villages under Unnat Bharat Abhiyan for Health promotion and disease prevention.
- Implementation of Ayush preventive and curative services in those villages

**ii. Activity session (Group and Practical discussion)**

- Searching of Literature and Government schemes related to National Ayush Mission
- Methods of implementation of Ayush practices in Rural areas
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

**Unit 22 Topic: Health Statistics**

**Categories:** Microteaching of Swasthavritta

**Course contents:**

**i. Interactive session**

**Basic**

- Definition of Health Statistics
- Sources of health statistics
- Uses of health information system
- Vital statistics. Current birth, death and other mortality statistics

**Advanced**

- Collection and presentation methods of statistical data
- Basic Statistical tests needed for Research data analysis

**ii. Activity session (Group and Practical discussion)**

- Calculation of Averages and percentiles with few examples
- Calculation method of death, birth and other mortality rates
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

**Unit 23 Topic: Stress Management through Yoga and Ayurveda**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

**j. Interactive session**

**Basic**

- Definition of Stress
- Stressors on today's life
- Ethics in Life – Sadvritta and Achara Rasayana concepts

**Advanced**

- Stress relieving measures through Ayurveda and Yoga
- Satvavajaya Chikitsa
- Study of Sadvritta from Charaka Samhita sutrasthana 8
- Achara Rasayana –applied aspect

**ii. Activity session (Practical discussion)**

- Literature search for Satvavajaya Chikitsa, Sadvritta, Achara Rasayana and Concepts from the Samhitas
- Demonstration of shiroabhyanga, padabhyang procedures and yoga for relaxation.
- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

**Unit 24 Topic: Teaching learning and assessment Methods.**

**Categories:** Teaching Technology

**Course contents:**

**i. Interactive session**

- Principles of Teaching learning,
- Learning Domains and Taxonomy. Bloom's Taxonomy, SMART and competency bases educational objectives. Introduction to curriculum.
- Various teaching learning methods,
- Problem based learning, Case Bases Learning, Interactive teaching Methods, Use of ICT in Teaching, Clinical/ Practical teaching bedside teaching, OMP, etc. Introduction to Methods of assessment like structured oral, OSCE/ OSPE, Mini CEX, DOPS, etc.
- Domain based Teaching of various topics in Swasthavritta with examples

**Unit 25 Topic: Introduction to AYUSH Research**

**Categories:** Research Methodology

**Course contents:**

**i. Interactive session**

**Basic**

- Introduction to Research Methodology.

**Advanced**

- Foundations of cause - effects / associations (e.g. Charaka's framework of causality), Areas of research (literary, drug, laboratory, clinical, epidemiological etc),
- Types of research (e.g. fundamental/applied, experimental/observational, qualitative/quantitative, conceptual/empirical), research lifecycle,
- Need for AYUSH research (जिज्ञासा versus Evidence), approaches of research (e.g. Reverse Pharmacology, Ayurveda Biology).

**ii. Activity session**

**Advanced**

- Reading and classification of research summaries according to types/areas
- Material for activity: Set of published abstracts/project summaries of AYUSH research projects and a template for classification of reported research.

## **Unit 26 Topic: Study Designs for Research**

**Categories:** Research Methodology

**Course contents:**

### **i. Interactive session**

#### **Advanced**

- The process of ideation, defining research question/hypothesis/objectives.
- Overview of study methods: literature research, clinical research (case reports, case series, cohort studies, clinical trials), laboratory research (*in-vitro*, *in-vivo*, *in-silico* etc), epidemiological designs (descriptive, analytical).
- How to design a study (concepts of confounders, bias / हेत्वाभास).

### **ii. Activity session**

#### **Advanced**

- Defining objectives, proposing methods for relevant objectives. The participants will propose their objectives, which will be refined by the resource person. Then the participants will propose methods to achieve respective objectives. The resource person will help in designing study for their objectives.
- Material for activity: A sheet with listed possible keywords specific to various methods. The participants will make a network diagram as 'study design' pertaining to their identified topics.

## **Unit 27 Topic: Survey Methods and Designing of a Questionnaire**

**Categories:** Microteaching session of Swasthavritta

**Course contents:**

### **i. Interactive session**

#### **Basic**

Different types of survey, designing of questionnaire for observational studies in Swasthavritta, Validation of questionnaire etc.

#### **Advanced**

Designing of questionnaire with an example related to Swasthavritta

### **ii. Activity session (Group and Practical discussion)**

Design a questionnaire on any topic related to Swasthavritta. Submit as an assignment.

- Material for activity: A sheet with listed possible keywords specific to topics. The participants will make a network diagram as 'study design' pertaining to their identified topics.

## **Unit 28 Topic: Overview of Scientific Publications**

**Categories:** Research Methodology

**Course contents:**

### **i. Interactive session**

#### **Basic**

- Overview of scientific publications, popular and scientific literature.

#### **Advanced**

- Overview of scientific publications, popular and scientific literature,
- Types of papers, peer review and editorial process, research journals (predatory publications and assessing the authenticity of journals), indexing and online databases,
- Guidelines for publications and reporting standards, introduction to publication ethics

## ii. Activity session

### Advanced

- Searching research literature specific to objectives (as defined in session 2), using PubMed/Scopus, Research Gate, CTRI, online ICE, mobile apps related to scientific Literature. Each participant will also create PubMed alert related to areas of research / clinical interests.
- Material for activity: Every participant will search for literature using personal laptops or mobile phones. A sheet of important links of web-sources will be provided to the participants.

## Unit 29 Topic: Getting Ready for Research

**Categories:** Research Methodology

**Course contents:**

### i. Interactive session

- Transforming idea into a proposal, research infrastructure, and funding agencies.
- Research Schemes of AYUSH Ministry,
- Introduction to AYUSH online platforms research infrastructure, AYUSH Informatics Grid
- Searching of Research proposal in various AYUSH stream, NMPB, DBT, DST and ICMR etc.

### ii. Activity session

- The participants will visit the NAMASTE (National AYUSH Morbidity and Standardized Terminologies Electronic) Portal, National Institute of Indian Medical Heritage for online texts, AYUSH Research Portal, SWAYAM platform, and online sources related to research funding.
- Material for activity: The participants will search respective portals using personal laptops or mobile phones. A sheet of important links of web-sources related to research funding and online courses will be provided to the participants.

## **Proposing the method for enrolment, participation and evaluation of the CME programme.**

### **A. Enrolment/ Selection:**

#### **Statement of Purpose (SOP) for attending CME:**

It will be a short brief summary of the participant's background including Education, Institute working, special interest in the subject. Initiatives adopted by the teacher in teaching subjects. Why participants want to attend CME. Considering the CME topic list; which areas he/she wants to learn or refresh. How he/she will utilize the knowledge gained during this program.

**After selection:** Providing schedule, Study material and introducing with participants expectations from the participants, Activities they need to complete and probable submissions.

### **C. During the session:**

**Pre-test:** (Conducting for the CME): (It will be based on Topics of CME, with questions of Qualitative and Quantitative measures, Questions of all types including Recall to application)

**Formation of Group:** Before starting of the CME, the organizer will divide the participants into suitable groups (minimum 5 participants in each group). Each day the group will decide the group leader/coordinator. Interactive session topics will distributed to each group by resource persons. The average duration of most group discussions is 15 minutes (not including the prep time). Group leader/coordinator will share and present the view of the group during activity session of that topic.

New sessions of CME are well divided and are imparting essential knowledge and skills considering the participants. Organizers can plan interactions and ensure at least one individual submission and one group presentation/day.

Organizers should carefully plan activities. The activities should have fixed objectives, resource material, planned discussions, and methods of assessment like presentation or submission as result.

An effective group discussion generally has a number of elements:

- All members of the group have a chance to speak, expressing their own ideas and feelings freely, and to pursue and finish out their thoughts
- Even in disagreement, there's an understanding that the group is working together to resolve a dispute, solve a problem, create a plan, make a decision, find principles all can agree on, or come to a conclusion from which it can move on to further discussion

### **D. Evaluation can be planned in four stages.**

**1. Reaction of participants:** -(Feedback on contents - Currently we are taking daily feedback and one feedback at the end.) A survey preferably online can be planned and submitted by participants. Questions will include reactions related to the CME of the participant. Qualitative and Quantitative questions can be planned based on sessions



2. **Learning:** - Post-test: Similar to Pre-test, quiz, or presentation from the participant. This will be an opportunity to know about the conducted program as well as the knowledge and skills gained by participants.

3. **Behavior:-**

A report of the change in Knowledge, skills, Practice to teaching will be reported by the participants within three months after completion of CME.

4. **Benefits –**

Participants will share a detailed report related to the benefits due to CME related to Knowledge, Skills and behavior/practice. What is implemented in the teaching? What was reaction of Students, Peers and Students? Remark of the participant implementing change. Any support difficulties noted. What else can be added in CME?

**Total Duration of Hours**

**36 Hours + 01 Hour**

i.	Microteaching session	12 Hours
ii.	Problem based learning	1 ½ Hours
iii.	Practical	13 ½ Hours
iv.	Research Methodology & Teaching Technology	9 Hours
v.	Pre and post training assessment	01 Hour
	(On the first day ½ an hour early for pretest and on the last day ½ an hour after the sessions are over for the post test)	

Note: Each session is 1 ½ Hour (45 min. Interactive session+ 45 Min. Activity session)

The CME Module has 29 topics, out of which 24 are to be taken. (Per day 4 sessions of 1 ½ hour each)

**Elective topics in CME-**

**22- 29 choose any 4 topics among these points**