

**KRIYA SHARIR - CME**  
**6-day CME for Teachers Module**

**Unit 1 Topic: Fundamental Principles of KriyaSharir** 01:30 hrs

**Categories:** Microteaching session of KriyaSharir

**Course contents:**

**i. Interactive session**

- Need of knowledge of fundamental principles of KriyaSharir
- Concept of Tridosha as per contemporary medical physiology
- **Mutual relationship between Triguna- Tridosha- Panchmahabhuta**

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

- Interactive session topics related to Tridosha 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.
- Material for activity: A sheet with listed possible keywords specific to topics on different types of dosha. The participants will make a network diagram as 'study design' pertaining to their identified topics.

**Unit 2 Topic: VataDosha** 01:30 hrs

**Course contents:**

**i. Interactive session**

- Basic knowledge of Properties and functions of Vata Dosha with its clinical applications + Probable Subjective & Objective parameters
- Judgement of signs & symptoms of 'Vatavridhhi' and 'Vatakshaya'
- Methods of assessment of 'Vatavridhhi' and 'Vatakshaya'
- Applied aspects
- **Basic knowledge of location of Vata Dosha**

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

- Material for activity: A sheet with listed 'Vatavridhhi' and 'Vatakshaya' lakshanas specific to disease may be formed.
- Discussion on normal & abnormal VataDosha assessment methods/ possible measures to assess functional status of VataDosha
- Possible research questions on 'Vatavridhhi' and 'Vatakshaya'
- **Use of modern tools and techniques for Assessment of General functions, 'Vatavridhhi' and 'Vatakshaya'**

**Unit 3 Topic: Pitta Dosha** 01:30 hrs

**Course contents:**

**i. Interactive session**

- Basic knowledge of Properties and functions of Pitta Dosha with its clinical applications + Probable Subjective & Objective parameters
- Judgement of signs & symptoms of ‘Pitta vriddhi’ and ‘Pitta kshaya’
- Methods of assessment of ‘Pitta vriddhi’ and ‘Pitta kshaya’
- Applied aspects
- **Basic knowledge of location of Pitta Dosha**
- **ii. Activity session** (Group discussion)
- Material for activity: A sheet with listed ‘Pitta vriddhi’ and ‘Pitta kshaya’ lakshanas specific to disease may be formed.
- Discussion on normal & abnormal Pitta Dosha assessment methods/ possible measures to assess functional status of Pitta dosha
- Possible research questions on ‘Pitta vriddhi’ and ‘Pitta kshaya’
- **Use of modern tools and techniques for Assessment of General functions, ‘Pitta vriddhi’ and ‘Pitta kshaya’**

**Unit 4            Topic: Kapha Dosha** 01:30 hrs

**Course contents:**

**i. Interactive session**

- Basic knowledge of Properties and functions of Kapha Dosha with its clinical applications + Probable Subjective & Objective parameters
- Judgement of signs & symptoms of ‘Kapha vriddhi’ and ‘Kapha kshaya’
- Methods of assessment of ‘Kapha vriddhi’ and ‘Kapha kshaya’
- Applied aspects
- **Basic knowledge of location of Kapha Dosha**

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

- Material for activity: A sheet with listed ‘Kapha vriddhi’ and ‘Kapha kshaya’ lakshana specific to disease may be formed.
- Discussion on normal & abnormal Kapha Dosha assessment methods/ possible measures to assess functional status of Kaphadosha
- Possible research questions on ‘Kapha vriddhi’ and ‘Kapha kshaya’
- **Use of modern tools and techniques for Assessment of General functions, ‘Kapha vriddhi’ and ‘Kapha kshaya’**

**Unit 5 Topic: Srotas** 01:30 hrs

**Course contents:**

**i. Interactive session**

- Concept of Srotas
- Details of number of Srotas mentioned by Acharya Charaka & Sushruta with reasoning
- Correlation of different ‘Srotas’ with systems mentioned in modern science
- Importance of Srotas in terms to Dhatu with its clinical applications
- **Basic understanding of concept of Srotodushti**

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

- Topics on each Srotas will be distributed.
- Assessment and evaluation of Srotomula & their correlation with signs & symptoms of vitiation of srotas or srotojanya disease (Clinical significance of Srotomoola)
- Each group will present learning objectives of given srotas and discussion will be made on each topic, which will be redefined/concluded by the resource person.
- Possible research questions on Srotas

**Unit 6 Topic: Dhatu and Dhatuposhan 01:30 hrs**

**Course contents:**

**i. Interactive session**

- Concept of dhatu, their formation and dhatuposhan
- Understanding of different dhatu poshan nyaya and cellular metabolic activity
- Understanding dhatu poshan as per contemporary medical physiology
- Theory of tissue formation and differentiation
- Kshaya & Vriddhi Lakshna of dhatu

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

- Topics on each Dhatu will be distributed to each group by the Resource person.
- Each group will present learning objectives of given topic and discussion will be made on each topic, which will be redefined/concluded by the resource person.
- Possible research questions on Dhatu
- **Use of modern tools and techniques in assessment of Dhatu like EMG, BMD, Semen Analyser etc.**

**Unit 7 Topic: Upadhatu 01:30 hrs**

**Course contents:**

**i. Interactive session**

- Difference between Dhatu & Upadhatu
- Concept of upadhatu and their formation
- Specificity of Upadhatu along with its reasoning such as Stanya & Raja (Artava) only formed in females
- Kshaya & Vriddhi Lakshna of upadhatu
- Concept of Artav & Stanya ayurvedic as well as contemporary science
- Definition & functions of kandaras and snayu
- **Concept of Twak in Ayurvedic as well as contemporary science**

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

- Topics on each updhatu will distributed to each group by the Resource person.
- Each group will present learning objectives of given topic and discussion will be made on each topic, which will be redefined by the resource person.
- Possible research questions on Upadhatu

**Unit 8 Topic: Agni**01:30 hrs

**Course contents:**

**i. Interactive session**

- Concept of Agni, types of Agni in the body
- Importance of Jathragni
- Location, properties and functions of Jathragni, Bhutagni and Dhatwagni
- Role of Jatharagni, Bhutagni & Dhatvagni in metabolism
- Correlation of their activity at cellular level
- Possible research questions on Agni

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

- Discussion on assessment of Agni
- Assessment of Agni may be done by different groups. If needed proforma may be changed/revised as per region, habitat or any other factor by adding or subtracting points

**Unit 9 Topic: Ahara and aharapaka**01:30 hrs

Process of digestion, absorption and metabolism

**Course contents:**

**i. Interactive session**

- Ahara, ahara-vidhi-vidhana, aharapaka
- AharaParinamakarabhava should be discussed along with its specific role in digestion and its correlation with modern/ contemporary science.
- Aharapaka should be discussed in details along with its stages.
- **Sara and Kitta Vibhajan, absorption of Sara.**
- Process of digestion, absorption and metabolism should be discussed in details.
- Possible research questions on Aharapaka
- **Basic understanding of concept of Grahani and Pittadhara Kala.**

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

Topics on three phases of digestion may be distributed to the each group and after discussion each group should represent the detail cycles of digestion, absorption & metabolism.

**Unit 10 Topic: Prakriti**01:30 hrs

**Course contents:**

**i. Interactive session**

- Concept of Prakriti, types of Prakriti
- Genetic basis of Prakriti
- Correlation of characteristics of Prakriti with Genotype & phenotype
- Importance of Prakriti
- Method of Prakriti assessment
- **Concept of Panchbhautik Prakriti**

**ii. Activity session**

- Assessment of Dehaprakriti by validated proforma (CCRAS Prakriti Assessment tool)
- Possible research questions on Prakriti

**Unit 11 Topic: Manas Prakriti 01:30 hrs**

**Course contents:**

**i. Interactive session**

- Concept of Manas Prakriti, types of Manas Prakriti
- Possible research questions on Manas Prakriti

**ii. Activity session**

- Assessment of all 16 types of 'Manas Prakriti' suggested by Sushruta
- Assessment of manasprakriti by validated proforma

**Unit 12 Topic: Manas and manas guna 01:30 hrs**

**Course contents:**

**i. Interactive session**

- Understanding Sattva, Raja and Tama
- Properties of Raja & Tama dosha & how they affect the mind
- Physiology of Manovaha srotas
- Clinical significance of Manas & Manas Guna
- Possible research questions on Manas & Manas Guna
- Basic understanding of Mana and Atma with its clinical applicability in Mental Health

**Unit 13 Topic: Indriya 01:30 hrs**

**Course contents:**

**i. Interactive session**

- Physiological description of Panchagyaanendriya and Karmendriya

- Indriya Panchapanchak
- Understanding Indriya Panchapanchak from modern perspective
- **Understanding of Gyan Grahan Prakriya**
- Demarcation between Indriya & Indriya Adhisthan with its physiological importance
- Possible research questions on Indriya

**Unit 14      Topic: Oja**01:30 hrs

**Course contents:**

**i. Interactive session**

- Concept of Oja
- Oja in intrauterine life or Ojoutpatti, Circulation etc.
- Importance of Oja in the body, types and their anatomical and physiological status in modern parlance.
- Physiological and clinical significance of Oja
- Etiological factors and manifestations of Ojavisramsya, vyapat and kshaya
- Concept of Vyadhikshamatva or Bala (immunity)
- Metabolic health markers for immunity
- **Understanding of Bala Vriddhikar Bhav and Immunomodulation**

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

- Correlation of Oja according to contemporary science
- Assessment of Oja
- Topics on various disorders where Ojakshaya is there, will be distributed to each group by the Resource person.
- Each group will present learning objectives of the signs and symptoms related to the respective disorder and discussion will be made on, which will be redefined by the resource person.
- Possible research questions on Oja

**Unit 15      Topic: Ashtavidhpariksha, Dashavidha pariksha, Sara Pariksha**01:30 hrs

**Course contents:**

**i. Interactive session**

- Clinical application of examination in darshan pariksha, Ashtavidha pariksha and dasavidha pariksha
- Significance of Sara Pariksha In Ayurveda

**ii. Activity session**

- Examination of touch, temperature, smell, taste and auditory examination etc.
- Assessment of dashavidha pariksha

- Assessment of Sara Pariksha
- **Assessment of Satmya, Anguli Praman, Sharir Bala (through Vyayama Shakti) and Nadi.**
- **Use of Simulators and Virtual Reality in assessment of various parameters.**
- Possible research questions on Darshana, Dashavidha pariksha, Sara Pariksha

**UNIT 16 Trya Mala**01:30 hrs

**Course contents:**

- i. Interactive session**
  - Basic Understanding and importance of Trya Mala
  - Clinical Applicability of Taila Bindu Pariksha.
- ii. Activity session (Group discussion)**
  - Probable criteria of assessment (Subjective/ Objective) of Normal and Kshaya- Vriddhi of Trya mala
  - Possible research questions on Trya mala

**Unit 17 Topic: Sleep and its disorders**01:30 hrs

**Course contents:**

- i. Interactive session**
  - Sleep physiology
  - its types in ayurveda and contemporary science
  - Relevance of sleep for healthy living
  - Sleep and dosha
  - EEG
- ii. Activity session**
  - Demonstration of EEG
  - Possible research questions on Sleep & its disorders

**Unit 18 Basic understanding of Shat Kriya Kala with its clinical significance. 45 minutes**

**Unit 19 Basic Understanding of Rasa, Rakta Dhatu with its Probable criteria of assessment (Subjective/ Objective) of Normal and Kshaya- VriddhiLakshana 45 minutes**

- **Understanding of Hridaya and concept of Rasa Samvahan**

**Unit 20 Topic: Endocrine systems**01:30 hrs - 01:30 hrs (**2 sessions**)

**Course contents:**

**ii. Interactive session**

- Physiology of endocrine glands
- Functions and effects of Endocrine glands
- Concept of endocrinology as per Ayurvedic perspective **Especially in context with Astauninditiya.**

**ii. Activity session**

- Demonstration of functions of endocrine glands on models

**Unit 21 Topic: Teaching learning and assessment Methods**01:30 hrs

**Categories:** Teaching Technology

**Course contents:**

**Interactive session**

- Principles of Teaching learning
- Discussion on teaching techniques of Kriya Sharir/Dosha as per modern physiological perspective so that the first year UG students do understand the dosha to their intellectual level and comprehend better.
- 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 etc.
- Introduction to Methods of assessment like structured oral, OSCE/ OSPE, Mini CEX, DOPS, etc.
- **Categorization of various topics under different methods of assessment for uniform assessment of students**

**Unit 22 Introduction to AYUSH Research and Overview of Scientific Publications** 01:30 hrs

**Categories:** Research Methodology

**Course contents:**

**i. Interactive session**

- Introduction to research methodology
- Types of research
- Need for AYUSH research

- 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 plan a research proposal (Research Methodology)

## ii. Activity session

- 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 23 Topic: Scope of research in Kriya Sharir 01 hour

### Categories:

### Course contents:

#### i. Interactive session

- Introduction to scope and carrier in KriyaSharir
- Recent developments in Kriya Sharir like e-physiology, pdf, e-books, online physiology journals
- Exercise and sports Physiology

## 24. Pre- and post-training assessment 30 minutes

- Assessment and Feedback forms may be given to participants before the commencement of sessions, so that they fill the forms at the end of each session/day and put them in sealed envelopes.