Proposed Draft Ph.D. Course Work Physical Education

(A) Preamble

Ph. D. (Physical Education) student are required to complete this course work consisting of 20 credits and a Thesis under the guidance of supervisor/guide. The details are as follows

Course I Research Methodology

Course II Optional Subject

Course II Field work, seminar, Practical work & academic activities

Thesis Viva Voce

(B) Outline of the Course

An outline of the course I to III and guidelines for thesis are given below;

Ph. D. (Physical Education) Syllabus Frame work

Course	Title	Credits	Weightage factor
1	Research Methodology	5	80
2	Optional	10	160
3	Field work, seminar, Practical work & academic activities	5	80
	Thesis		
	Viva-voce		
Total		20	320

Course I provides an in-depth knowledge of Research process in Physical Education and acquainting the student with different methods of Research in Physical Education

Course II is meant for enhancing the student's knowledge and understanding the detail about the specialized area he/she is interested in his/her research study.

Course III comprises of four parts,

- a. Field work:
- b. Seminar:
- c. Practical work:
- d. Academic activities:

(C) Evaluation:

For Course 1 and 3

Research Scholar will have to

- Review two Research Papers from refereed research journal (10) & Seminar Presentations on current issues in PE (10) (1 credit)
- Submit Evaluation report of M. Phil. Dissertation or PhD thesis (1 credit)

• Written test on the basis of content of the course (50 marks) (3 credit)

For Optional Courses (Course 2)

- Review of two Research Papers from standard research journal concern to specialized area (10) & Seminar Presentations on current issues related to specialized area (10) (1 credit)
- Submission of CRPW & review on book (Published in last five years) related to specialized area (1 credit)
- Written test (50 marks) (3 credit)

The evaluation will be done by the concerned faculty of the research center.

Course I & II will be examined as follows

- Two tutorials of 10 marks each should be conducted for each course throughout the year/sessions
- On the completion of all the terms, a written examination of 80 marks should be conducted for each course.
- Student should prepare a Power point presentation for the seminars as follows:
- Seminar
- Review of related literature
- Research proposal
- Data collection tool & its reliability
- Data analysis, interpretation & conclusion
- Evaluation of the seminars mentioned above will be done by an expert and respective supervisor.

Thesis

- Every student has to write Thesis on the topic to be decided by him/her in consultation with a supervisor/guide. The topic of thesis and the name of the supervisor/guide need to be approved by Research and recognition Committee.
- A student is to finalize the general outline, collect the bibliographical details and complete
 thesis. A thesis is expected to give an exemplification of academic independence and
 research competence of the candidate.
- Student are supposed to be working on their thesis while completion of other courses.
- Every student will be required to give a seminar on the thesis. He/she will have to appear
 for viva-voce examination on thesis. The thesis can be submitted by the stipulated time
 duration according to the rule and regulation declared by University of Pune time to time,
 only after the completion of the Ph. D. Course work (Course I to III).
- Every student has to stringently follow the guidelines for writing report as given in the research report format prescribed by the faculty of Physical Education, University of Pune.
- Student to be allowed to submit final thesis and to appear for viva-voce must publish two
 research papers in a refereed journal or present it in state or national level seminar.
 Candidate should submit the relevant evidence on/before the time of submission of the
 thesis.

- Synopsis of thesis will be presented by candidate before experts prior to the submission of thesis to approve it for final submission.
- Thesis will be evaluated internally and externally by the experts appointed by University of Pune as per rules and regulation of the University of Pune, Pune.
- Each expert will evaluated the thesis and submit his/her report to the University.

Viva voce

- Viva voce will be organized by Department of Physical Education, University of Pune, Pune for all research candidates according to the directions given by the University of Pune after the report received on thesis by the experts.
- Viva voce shall be conducted and the detail presentation of research study shall be given before the viva voce committee.
- Committee of experts will evaluated the research candidate through viva voce.

Compulsory Course Research Methodology

Objectives

- 1. To acquaint the student with Philosophy of Research in Physical Education
- 2. To make student understand need and importance of Research in Physical Education
- 3. To give student knowledge of Research In Physical Education
- 4. To enable student with different data collection tools and the procedure of developing them
- 5. To enable the student to understand and apply different types and methods of research
- 6. To acquaint the student with need and importance of Research Statistics
- 7. To give student knowledge of fundamentals of Research Statistics
- 8. To enable student with different statistical tools and related procedures
- 9. To enable the student with writing interpretations and deriving conclusions from statistical analysis

Unit 1: Introduction

- 1.1 Meaning, Definition, Scope of Research in Physical Education & Sports
- 1.2 Aim, Ethics and Characteristics of Research
- 1.3 Research for generation of knowledge & formation of theory
- 1.4 Research Trends in Physical Education

Unit 2: Research Methods

- 2.1 Evaluation of Dissertation of any other researches
- 2.2 Quantitative Research ()
- 2.3 Qualitative Research ()
- 2.4 Review of related literature

Unit 3: Research Data, Analysis & interpretation

- 3.1 Parametric & non-parametric data
- 3.2 Data collection tools

- 3.3 Descriptive and Inferential Statistical tools
- 3.4 Interpretation of data & deriving conclusions

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Research Methods
- 4.2 Data collection tools
- 4.3 Statistical tools
- 4.4 Interpretation, discussion & conclusions

Unit 5: Course Related Practical Work, Field Work

Suggested Readings:

- 1. Barrow, H. M. (1979). Practical Approach to Measurement in Health & Physical Education. (3rd ed.). Philadelphia: Lee & Febigeer
- 2. Best, J. W. & Kahn, J. V. (2006). Research in Education. (10th ed.). New Delhi: PHI
- 3. Clark, D. H. & Clark, H. H. (1979). Research process in Physical Education, recreation & health. Englewood Cliffs: prentice Hall.
- 4. Johnson, B. & Christensen, L. (2008). *Education Research, Quantitative, Qualitative and Mixed Approaches*. (3rd ed.). Sage Publication: England.
- 5. Miller, David. K. (2002). Measurement by the Physical Educator. New York: McGraw Hill companies. John & Nelson (1998). Practical Measurements for Evaluation in Physical Education. Delhi: Surjit Publication.
- 6. Sprinthall, R. C. (1997). Basic statistical Analysis. (5th ed.). USA: Allyn & Bacon
- 7. Thomas, J. R. & Nelson, J. K. (2001). *Research Methods in Physical Education*, (4th ed.). USA: uman Kinetics.
- 8. Vincent, W. J. (). Statistics in Kinesiology. Campaign: Human Kinetics

Subject Specific Course work (Any two, five credit each) Paper I- Sports Training

Objectives:

- 1. To understand the scientific sports training process & principles
- 2. To develop attitudes and skills in designing sports training programs
- 3. To be better prepared to be a good researcher
- 4. To enable student to understand principles of sports training to develop and implement sports training programme and other training programmes

Unit 1: Introduction and Trends in Sports Training

- 1.1 Meaning, Definition, Scope of Sports Training
- 1.2 Aim and Characteristics of Sports Training
- 1.3 Trends in Sports Training
- 1.4 Talent Identification

Unit 2: Training Methods

- 2.1 Principles of Sports Training
- 2.2 Load, Adaptation, and Recovery
- 2.3 Sports Fitness Training Methods
- 2.4 Periodization

Unit 3: Training Program

- 3.1 Long Term and Short Term Training Plans
- 3.2 Technique, Skill, and Psychological Training
- 3.3 Design Training Program
- 3.4 Evaluation of Training Program

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Training Methods
- 4.3 Training Program and Plans
- 4.3 Talent Identification
- 4.4 Training Duration

Unit 5: Course Related Practical Work, Field Work

Suggested Reading:

- 1. Singh, H. (1991). Science of sports training. New Delhi: DVS publication
- 2. Uppal. A. K. (2001). Principles of sports training. New Delhi: Friends publication
- 3. Rainer Martens (2005). Successful coaching
- 4. Beachel & Taylor (2006). Essentials of strength training & conditioning

Paper II- Biomechanics

Objectives:

- 1. To enable student to understand the science of Biomechanics and kinesiology in relation to human performance
- 2. To enable student to analyze various fundamental movements and understanding the relevance of analysis
- 3. To enable student to understand the body structure and apply the knowledge in analysis of movements
- 4. To enable student to apply the knowledge of biomechanics for the purpose of research

Unit 1: Introduction and Trends in Biomechanics

- 1.1 Meaning, Definition, Scope of Biomechanics
- 1.2 Importance of Biomechanics
- 1.3 Trends in Biomechanics

Unit 2: Analysis of Techniques and Training

- 2.1 Analysis of fundamental Skills and Sports Skills
- 2.2 Video Film Analysis
 - Cinematography and Videography
- 2.3 Tools of Biomechanical Analysis
 - Electrography and Dynamography
 - LED's and Electromagnetic Markers
 - Force transducers and Pressure Sensors

Unit 3: Skill Analysis

- 3.1 Athletics Field Event
- 3.2 Athletics Track Events

- 3.3 Athletics Jumping Events
- 3.4 Skill Analysis of Various Sports

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Analysis of Techniques and Skills
- 4.2 Analyzing Methods in Sports
- 4.3 Sports Equipments and Surfaces
- 4.4 Videographic analysis in sports

Unit 5: Course Related Practical Work, Field Work

Suggested Readings

- 1. Hay, J (1981). The Biomechanics of sports techniques. New Jersy: Prentice Hall.
- 2. Bunn, J. W. (1981). Scientific principles of coaching. Englewood: Cliffs. Prentice Hall.
- 3. McGinnis, P. M.(2005). Biomechanics of sports exercises. USA: Human Kinetics.
- 4. Sunderrajan, G.S. Biomechanics of sports and games. Ludhiyana: Tondon Publication.
- 5. Susan, J. H (2003). Basic Biomechanics.(4th Edn.) Mc.Graw Hill Publication.
- 6. Rajlakshmi, D. (2007). Biomechanics for sports and games. Sports Educational Technologies.
- 7. Hoffman, S.J. (2005). Introduction to Kinesiology. Human Kinesiology Publication.
- 8. Uppal. A. K. and Lawrence, M. P. Kinesiology. New Delhi. Friends Publication: India.
- 9. Knudson, D. (2007). Fundamentals of Biomechanics. Chico, USA: Springer Publication.
- 10. Scott, M. G. Analysis of Human Motion. Newyork.

Paper III: Technology and e-learning in Physical Educational

Objectives:

- 1. To enable the learner to become effective user of technology in Physical Education
- 2. To acquaint the learner with the challenges and opportunities emerging in integrating new technology in Physical Education process.
- 3. To make the student familiar with new trends, techniques in Physical Education along with e-learning.
- 4. To enable the student to become good user of technology and e-learning in Physical Education.

Unit 1: Meaning & Scope of Technology in Physical Education

- 1.1 Technology in Physical Education as system approach to Educator.
- 1.2 System approach in technology in Physical Education and its characteristics.
- 1.3 Components of Technology in Physical Education software and hardware.

Unit 2: Modalities of Teaching

- 2.1 Difference between teaching and Instruction, conditioning & training
- 2.2 Stages of teaching pre active, interactive and post active.
- 2.3 Teaching at different levels one way, understanding and reflective.
- Modification of teaching behavior microteaching,

Unit 3: e-learning

- 3.1 e-learning definitions, scope, trends, attributes & opportunities
- 3.2 Pedagogical designs & e-learning
- 3.3 Assessments, feedback and e-moderation
- 3.4 On line learning management system

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Teaching
- 4.2 E-Learning
- 4.3 Teacher and Learner Behavior
- 4.4 Pedagogy

Unit 5: Course Related Practical Work, Field Work

Reference Books

- 1. Integrating Technology in the classroom shelly, cashman, gunter and gunter, publication by Thomson course technology
- 2. Essentials of Technology in Physical Education, Madan Lal, Anmol Publications
- 3. Online Teaching Tools and Methods, Mahesh Varma, Murari Lal & Sons
- Education and Communication for development, O. P. Dahama, O. P. Bhatnagar,
 Oxford &
 - IBH Publishing company, New Delhi
- 5. Information and Communication Technology, N. Sareen, Anmol Publication
- 6. Communication and Education, D. N. Dasgupta, Pointer Publishers
- 7. e-learning a Guidebook of principals, Procedures and practices, Son Naidu,
 Commwealth of Learning, Commonwealth Educational Media Centre for Asis
- 8. Education and Communication, O. P. Dham

Paper IV- Sports Nutrition

Objectives:

- 1. To understand the guidelines of nutrition & performance enhancements.
- 2. To acquaint with the Principles of sports nutrition
- 3. To understand the basic concept of body fuels & suggest basic practices
- 4. To understand the techniques in nutrition assessment & give suggestions.

Unit 1: Introduction to Sports Nutrition

- 1.1 Importance & Scope of Sports Nutrition
- 1.2 Concept of Sports Nutrition
- 1.3 Trends in Sports Nutrition

Unit 2: Content of Nutrition

- 2.1 Proportion of carbohydrates, fat & protein
- 2.2 Principles of Sports Nutrition
- 2.3 Recommendation for fat & protein
- 2.4 Water, exercise & dehydration

Unit 3: Diet prescription & ergogenic aids

- 3.1 Sports supplement
- 3.2 Nutrition according to Body composition & for special population
- 3.4 Pre meal, exercise & energy expenditure
- 3.4 Doping & its classification

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Proportion of diet content
- 4.2 Sports supplement
- 4.3 Intake & energy expenditure
- 4.4 Ergogenic aids

Unit 5: Course Related Practical Work, Field Work

Suggested Reading:

- 1. Manore, M. & Thompson, J. (2000). Sport nutrition for sport & performance. Champaign: Human kinetics.
- 2. Kern, m. (2005). Sports nutrition. Tayloy.
- 3. Driskell, J. A. & Wolinsky, I. (2006). Sports nutrition. New Delhi: Friends publications.
- 4. Groff, J. (2000). Advanced nutrition & human metabolism. Wadsworth.

Paper V- Management of Physical Education & Sports

Objectives

- To acquaint the students understand the scope and importance if management in Phy.
 Edn.
- 2. To acquit the students with concept & principles of management in physical education.
- 3. To acquaint the students to manage the programme of competitions, intramurals the basic level of competitions.
- 4. To acquaint the students with the budget management, school programme of Phy. Edn. and sports.

Unit 1: New trends in Management

- 1.1 Modern concept of Management
- 1.2 Process of Management
- 1.3 Structure of Management
- 1.4 New trends of Management

Unit 2: Management and Organisation

- 2.1 Scope and Importance of Management
- 2.2 Principles of Management
- 2.3 Major faction of Management
- 2.4 Formal and informal Organization

Unit: 3 Various Managements in P.E.

- 3.1 Facility Management
- 3.2 Fiscal Management
- 3.3 Equipment Management
- 3.4 Office Management

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Facilities in Physical Education & sports
- 4.2 Sports competition
- 4.3 Spots marketing

4.4 Physical Education program

Unit 5: Course Related Practical Work, Field Work

Suggested Readings:

- Bucher, C. A.& Krotee, M. L. (2002). Management of Physical Education of Sports, (12th Edn.). New Yark: McGraw Hill.
- 2. Voltmer, E.F. (1979). The organization and administration of Physical Education (5th Edn). New Jersy: Prentice Hall.
- 3. Parkhouse, B. L. (1991). The Management of Sports Foundation & Application St. Loup: Mosby Year Book.
- 4. Kamlesh, M. L. (2000). Management Concepts in Physical Education & Sports, New Delhi: Metropolitan Book Co. Pvt. Ltd.

Paper VI- Measurement and Evaluation in Physical Education

Objectives:

- 1. To enable student to understand the meaning of testing, measurement and evaluation.
- 2. To introduce student with different types of tests and evaluation techniques.
- 3. To enable student to understand the general principles of test constructions,
- 4. To enable student to understand the interpretation of test scores,
- 5. To enable student to plan, prepare to administer and execute the teacher made test.
- 6. To enable student to understand the concept of Grading system
- 7. To enable student to select appropriate tests and interpret the scores.
- 8. To enable student to construct tests, design new testing procedures.

Unit 1: Introduction of Evaluation process

- 1.1 Meaning of Test, measurement, Evaluation and Assessment
- 1.2 Different test in physical Education: Knowledge, Psychological, Fitness, Skill, Physiological, Special Population, Test batteries, Anthropometric test
- 1.3 Trends in Evaluation in Physical Education

Unit 2: Factors affecting measurement in physical education.

- 2.1 Different tools of Evaluation in physical Education
- 2.2 characteristics of Test batteries
- 2.3 Factors Considering for selecting test
- 2.4 Factors considering for administration of test

Unit 3: Testing Validity and Reliability of testing tools

- 3.1 Different methods for testing validity of tool
- 3.2 Different methods for testing reliability of tool
- 3.3 Norms-Types, Importance and construction
- 3.4 Construction of motor test & Questionnaire

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1. Revive on Test Batteries
- 4.2 Revive on Anthropometric study
- 4.3 Revive on Test construction
- 4.4 Revive on Standardization of test and test batteries

Unit 5: Course Related Practical Work, Field Work

Suggested Reading:

- 1. Miller, David. K. (2002). Measurement by the Physical Educator. New York: McGraw Hill companies.
- 2. John & Nelson (1998). Practical Measurements for Evaluation in Physical Education.

 Delhi: Surjit Publication.
- 3. Barrow, H.M.(1979).Practical Approach to Measurement in Physical Education. Ed. (3rd Ed.). Philadelphia: Lee & Febigeer,
- 4. Clarke, H. (1987). Application of Measurement in Health & Physical Education. Ed. (6th Ed.). New Jersey Prentic Hall, Inc 1987.
- 5. Kansal, D.K. (1996). Test & Measurement in Sports & Physical Education. New Delhi:.D.V.S.Publications,

Paper VII-Pedagogy in Physical Education and Sport

Objectives:

- 1. To enable students to distinguish among teaching, learning, & pedagogy
- 2. To be able to explain difference between effectiveness and expertise in teaching
- To acquire teaching skills & effectiveness & develop positive attitudes about process of learning & teaching
- 4. To enable them to sensitively apply teaching skills in different educational settings.

Unit 1: Physical Education Curriculum

- 1.1 Designing and Development of curriculum
- 1.2 Curriculum models & Frameworks
- 1.3 Trends in PETE in India, Curriculum in Physical Education Teacher Education
- 1.4 Legal, ethical and moral issues in teaching, promoting self growth in physical Education

Unit 2: The Domains of Developmental Physical Education

- 2.1 Domains of learning Physical Education
- 2.2 Systematic improvement in teaching skills
- 2.3 Assessing and improving teaching
- 2.4 Different Teaching styles in physical Education

Unit 3: Measuring teaching and its outcomes

- 3.1 Traditional methods
- 3.2 Systematic observation records
- 3.3 Combining observation technique, building observation systems
- 3.4 What to observe, training observer, calculating reliability of observation data.

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Teaching methods/styles
- 4.2 Curriculum development
- 4.3 Methods of teaching Physical Education to the people with unique need
- 4.4 Curriculum Planning

Unit 5: Course Related Practical Work, Field Work

Suggested Readings:

- Siedentop, D. (1991). Developing teaching skills in Physical Education. Ca:Mayfield Publishing company
- 2. Mosston, M., Ashworth, S. (1994). Teaching Physical Education (4th Ed). NY: Macmillan College Publishing Company
- 3. Kelly, L.E., Nelograno, V.J. (2004). Developing the Physical Education curriculum. Champaign, IL: Human Kinetics
- 4. Hopple, C.J. (2005). Elementary Physical Education teaching & assessment- A practical guide. Champaign IL: Human Kinetics

Paper VIII-Physical Fitness and Wellness

Objectives:

- 1. To enable student to understand Principles of Physical Fitness and wellness
- 2. To introduce students to various exercise for developing fitness
- 3. To introduce students to various training methods in sports
- 4. To enable students improve overall & specific fitness
- 5. To help them create database of exercises & training protocols
- 6. To enable student to assess fitness using different techniques
- 7. To understand the principles of exercise prescription.
- 8. To understand the guidelines & be able to design the exercise plans for variety of Population

Unit 1: Introduction of physical fitness and wellness

- 1.1 Trends & Relevant Issues in physical fitness and wellness
- 1.2 Concept of HRPF and SRPF
- 1.3 Benefits and advantages of different components of fitness
- 1.4 Concepts of Exercise, Physical Activity, Health and obesity

Unit 2: Physical Fitness and its Management

- 2.1 Principles of Exercise training to improve physical fitness
- 2.2 Factors affecting physical fitness

- 2.3 Phases for Exercise prescription
- 2.4 Management of Fitness programme

Unit 3: Developing Fitness and wellness

- 3.1 Different exercises and fitness Activities
- 3.2 Means and methods of developing physical fitness: Circuit training, Resistance training, plyometric training, Fartlek training, Interval training, Core training, cross training and other
- 3.3 Concept of wellness
- 3.4 The Components of total wellness

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Reviews on fitness development
- 4.2 Reviews on physical activity
- 4.3 Reviews on obesity
- 4.4 Reviews on wellness

Unit 5: Course Related Practical Work, Field Work

Suggested Readings:

- 1. Fahey, Insel, Roth (2004). Fit & well (6th Ed.). Boston: McGraw Hill co.
- 2. Greenberg, Dintiman, Oakes. (2004). Physical fitness & wellness (3rd Ed.). IL: Human Kinetics
- 3. Howley & Franks (1997). Health fitness instructor's Handbook (3rd Ed.) IL: Human kinetics
- 4. ACSM (1998) ACSM's resource manual for guidelines for exercise testing & Prescription (3rd Ed.) Lippincott, Williams & Wilkins
- 5. Durstine & Moore (2003) ACSM's exercise management for person's with chronic diseases & disabilities (2nd Ed.) IL: Human Kinetics

Paper IX- Exercise Physiology

Objectives:

- 1. To enable the student to understand the physiological effects of Exercise on different system or/and on the body as a whole.
- 2. To enable the students to understand bioenergetics & role of energy systems in sports activities.
- 3. To enable the students to understand the role of nutrition & its relevance in energy production.
- 4. To enable student to understand the importance of exercise physiology in research

Unit 1: Introduction

- 1.1 Concept Of Exercise Physiology
- 1.2 Aims And Objectives OF Exercise Physiology
- 1.3 New Trends in Exercise Physiology
- 1.4 Effect of Exercise on Different Systems.

Unit 2: Essentials and Energy for Movement

- 2.1 Energy System
- 2.2 Hormonal Regulation of Exercise, Muscular and Neurological Control Of Movement
- 2.3 Cardiovascular Control and Respiratory Regulation during Exercise
- 2.4 Sources of Energy System,

Unit 3: Environmental Influences Optimizing Performance in Sport

- 3.1 Thermal Regulation and Exercise Quantifying Sport Training Exercise Hypobaric, Hyperbaric and Microgravity Environments
- 3.2 Nutrition And Nutritional Ergogenics, Optimal Body Weight For Performance
- 3.3 Physical Activity for Health and Fitness
- 3.4 Effect of Altitude on Performance

Unit 4: Research Reviews (Minimum Eight) Related to

4.1 Effect of Different Training Program on Different Systems.

- 4.2 Effect of Altitude Training on Performance
- 4.3 Effect of Environmental Training on Performance
- 4.4 Effect of ergogenic aids on different systems

Unit 5: Course Related Practical Work, Field Work

Suggested Readings:

- 1. Mathew, D. K. and Fox, E. L. (1976). Physiology basis of Physical Education and athletics. Philadelphia: UBS company
- 2. Pearce Evelyn. (1992). Anatomy and physiology for nurces, calcutta: Oxford university press.
- 3. Sedey, Rod R.(1992). Anatomy and physiology. St. louis: Mosby.
- 4. Tortora G. J. (1996). Introduction to Human Body. (4th Ed.)California: Addison Weslay.
- 5. Marief Eclaine N. (1984). Human Anatomy and physiology (3rd Ed.). Cal: The Benjamin Cumming.
- 6. Clarke, H. David exercise physiology.
- 7. William D. Mcardle, Frank I. Katch, and Victor L. Katch Exercise physiology.
- 8. Koley, Shyamal Exercise Physiology.
- 9. Frank J. Corny and Harold .W. Burlon. Exercise physiology for health.

Paper X- Yoga

Objectives:

- 1. To understand the foundation & background of Yoga
- 2. To enable student to understand stages of yoga & importance of practicing yoga
- 3. To understand the benefits & effects of Kriyas, Bandhas, Pranayama
- 4. To enable them to understand relation of yoga, health & mental health
- 5. To introduce them to the research in yoga and its contributions

Unit 1: Basics of Yoga

- 1.1 History Of Yoga
- 1.2 Concept Of Yoga
- 1.3 Aims And Objectives Of Yoga
- 1.4 New Trends In Yoga

Unit 2: Ashtang Yoga

- 2.1 Asanas
- 2.2 Pranayama
- 2.3 Suryanamskar
- 2.4 Classification of Yoga: A) Hath Yoga, B) Power Yoga

Unit 3: Yoga and Mental Health

- 3.1 Self Study Learning Control Through learning your self
- 3.2 Self Control Through Yoga
- 3.3 Meditation
- 3.4 Kriya

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.5 Asanas
- 4.6 Pranayama
- 4.7 Kriya
- 4.8 Meditation

Unit 5: Course Related Practical Work, Field Work

Suggested Reading:

- 1. Iyengar, B. K. S. (1989). Light on yoga, Yoga Dipika. London: UNWIN paperbacks.
- 2. Kappmeir, K. L. & Ambrosihi, D. M. (2006). Instructing hata yoga. Champaign: Human kinetics.
- 3. Alice, C. (2000). Yoga for sports. Chicago: CB.
- 4. Sawmi Kuvalayanand (19930). Asanas. Lonavla: Kaivalayadham.
- 5. Tiwari, O. P. (2002). Asanas why & how?. Lonavla: Kaivalayadham.
- 6. Shivananda yoga Vedanta centre (1998). Yoga mind & body. London: D. K. paperbacks.

Paper XI- Sports Psychology

Objectives:

- 1. To get acquainted with the meaning, nature and scope of sports Psychology.
- 2. To be able to know & prepare psychological profiles of sportsmen.
- 3. To understand the role of sports psychology in the performance.
- 4. To know the various psychological problems and its coping techniques for better sports performance.
- 5. To introduce to the role of leaders, counselors, and social psyche in the performance enhancement.
- 6. To introduce the Psychological Tests and be able to conduct these tests on subjects.

Unit 1: Introduction

- 1.1 Meaning, scope & development of sport psychology
- 1.2 Relationship of sport psychology with other sport sciences
- 1.3 Need & importance of sport psychology
- 1.4 Psychological Profiling of Sportsmen/Athletes

Unit 2: Personality & Anxiety

- 2.1 Personality traits of Sportsmen
- 2.2 Anxiety Types, Effect of Anxiety on performance
- 2.3 Techniques for Relaxation & Activation
- 2.4 Effects of Spectators, society, family, etc. on sports performance

2.5 Personality Test: 16 PF, EPQ. Motivation: Athletic Motivation Scale

Unit 3: Growth & Development, Learning & Motivation.

- 3.1 Growth & Development in different stages and training implications to develop.
- 3.2 Learning & Learning Theories
- 3.3 Motivation Types & Techniques of motivation
- 3.4 Psychological Tests: Motivation, Personality, Anxiety, Aptitude, Intelligence, etc.

Unit 4: Research Reviews (Minimum Eight) Related to

- 4.1 Psychological Profile of Sportsman
- 4.2 Anxiety and Motivation
- 4.3 Growth and Development
- 4.4 Learning

Unit 5: Course Related Practical Work, Field Work

Suggested Reading:

- 1. B. J. Cratty. Psychology of Contemporary sports Champaign: Human Kinetics Publishers,
- 2. John M. Silva & Roberts. Psychological Foundations of Sport. Champaign: Human Kinetics Publishers.
- 3. Diane Gills, Psychological Dynamics of sports. Champaign: Human Kinetics Publishers.
- 4. Cox, Sports Psychology. Champaign: Human Kinetics Publishers.
- 5. Richard M. Sumin, "Psychology in Sports, Methods & Application. New Delhi: Surject Publication.
- 6. But, Lusan Dorcas, Psychology lof Sports. Network: Van Nostrand Reinhold Company
- 7. Cratty, Bryant. J. (1973)., Movement Behavior and Motor Learning. Philadelphia: Lea and Febiger.
- 8. Kamlesh M. L. Psychology of Physical Education and sports (London, Boston Rutledge and Kegan Paul.
- Linda K. Binket, Robert J. Ratella and Ann/, S. (1972). Really Sports, Psychology, Psychological Consideration Maximizing Sports Performance. Dubugne Jowa: C. Brown Publishers.