

उत्तर महाराष्ट्र विद्यापीठ, जळगाव  
अध्यादेश 181

महाविद्यालयाचे नाव  
के.सी.ई.सोसायटीचे एकलव्य शारीरिक शिक्षणशास्त्र महाविद्यालय,  
एम. जे. कॉलेज कॅम्पस, जळगाव.

करिअर ओरिएंटेड कोर्सचे नाव  
**CERTIFICATE COURSE IN AEROBICS AND FITNESS**

विद्याशाखा  
(शिक्षणशास्त्र)

शैक्षणिक वर्ष  
(2020-21)

North Maharashtra University, Jalgaon

Ordinance 181

- College Name : K.C.E.S's Eklavya College of Physical Education  
Title of the Course : Certificate Course in Aerobics and Fitness  
Aim/Objective of the Course : To promote and motivate people of all ages, backgrounds and abilities to lead active, healthy lives through scientific but easily understood overview of aspects related to physical activity.  
Duration of Course : 01 Year  
Fees Structure : Rs. 2000.  
Course Structure :  
1) Paper – I Science of Fitness Training  
2) Paper – II Aerobics  
3) Practical Course on Fitness and Aerobics  
Eligibility for Admission : HSC with reading and writing abilities in Marathi or English.  
Skeleton of Course :

Sr. No.	Paper	Name of the Subject	Theory/ Practical	Teaching Hours	Maximum marks allotted			Passing			Credit
					External	*Internal	Total	External	Internal	Total	
1.	Paper I	Science of Fitness Training	Theory	90	60	40	100	24	16	40	6
2.	Paper II	Aerobics	Theory	90	60	40	100	24	16	40	6
3.	Paper III	Fitness & Aerobics	Practical	120	60	40	100	24	16	40	8

\* Internal Marks are divided in 3 parts e.g. 05 marks for Attendance, 10 marks for Home Assignment Tutorial and 25 marks for Internal Test.

- Minimum Staff : 03  
Mode of Examination : Written and Practical  
Detail Syllabus : Attached

## PAPER – I

### SCIENCE OF FITNESS TRAINING

#### 1. Basics of Physical Fitness

- Meaning, Concept, Definition, Nature and Scope of Physical Fitness.
- Basic Types of Physical Fitness.
- Physical Fitness Testing Parameters.

#### 2. Human Body Fundamentals (Anatomy and Physiology)

- Skeletal System.
- Muscular System.
- Cardiovascular System.
- Respiratory System.
- Digestive System

#### 3. Fundamentals of Fitness Training

- Warming Up and Cooling Down.
- Characteristics of Training.
- General Principles of Training.
- Load and Recovery.
- Basic Methods of Conditioning.
- Training Components.

#### 4. Exercises for Specific Body Parts

- Head.
- Upper Extremities.
- Torso (Front and Back).
- Lower Extremities.

#### 5. First Aid and Nutrition

- First Aid.
- Nutrients.
- Obesity and Weight Management.
- Balanced Diet.
- Diet Plan.

#### References:

- जेठवीं मकर, (2011). *शारीरिक शिक्षण - अध्यापन व अध्यापन यंत्रणी*. निरख नूतन प्रकाशन, पुणे.
- Hardayal Singh (1991) *Science of Sports Training*, New Delhi, DVS Publications
- Joshi, Kote, (2006). *Biomechanics, applied kinesiology and physiology of exercise*, Chhaya Pub. House, Aurangabad.
- Kansal D.K. (1996), *Test and Measurement in Sports and Physical Education*, New Delhi: DVS Publications
- Kote, Joshi, (2006). *Scientific principles of sports training*, Chhaya Publication House, Aurangabad.
- Lamb, G. S. (1982). *Essentials of exercise physiology*. Delhi: Surjeet Publication.

## PAPER – II

### AEROBICS

#### 1. Basics of Exercise

- Meaning, Definition and Concept of Exercise.
- Basic Types of Exercise.

#### 2. Aerobics

- Meaning, Definition and Concept of Aerobics.
- Importance of Aerobics.
- Rules for Aerobics (Stretching, Age)
- Appropriate Aerobics Selection.
- Music.

#### 3. Basic Aerobics Workout Plan

- Stretching and Warming up.
- Aerobics.
- Strengthening Exercises.
- Core Exercises.
- Coordinative Exercises.
- Stretching and Cooling Down.

#### 4. Types of Aerobics

- Low Impact Aerobics.
- Step Aerobics.
- Dance Aerobics.
- Aqua Aerobics.
- High Impact Aerobics.

#### 5. General Specifications

- Stretching.
- Warming Up.
- Strengthening Exercises.
- Core Exercises.
- Coordinative Exercises.
- Cooling Down.

#### References:

David Katz, (2006). *ABC for Fitness™ Teacher Manual*.

[http://exercisery.cheu.gov.hk/files/DoctorsHanbook\\_ch4.pdf](http://exercisery.cheu.gov.hk/files/DoctorsHanbook_ch4.pdf)

[http://www.ilearn-project.eu/documents/eng/aerobics\\_guide.pdf](http://www.ilearn-project.eu/documents/eng/aerobics_guide.pdf)

<http://www.walkingabout.com>


Marilyn Mackay-Lyons, et. al., (2012-13). *Aerobics*.

Neil Armstrong, (2006). *Aerobic fitness of children and adolescents*. *Jornal de Pediatria* - Vol. 82, No.6, 2006.

PAPER – III

PRACTICAL COURSE ON FITNESS AND AEROBICS

1. Physical Fitness Testing
2. Warming Up and Cooling Down
3. Load and Recovery
4. Basics Methods of Conditioning
5. Training Components
6. Exercises for Specific Body Parts
7. First Aid
8. Diet Plan Construction
9. Aerobics
10. Strengthening Exercises
11. Core Exercises
12. Coordinative Exercises
13. Yoga
14. Relaxation Techniques
15. Fitness Plan Construction



**DIRECTOR**  
**PHYSICAL EDUCATION**