## STELLA MARIS COLLEGE (AUTONOMOUS), CHENNAI - 600 086

# General Core Course Offered to students of B.A. / B.Sc. / B.Com. / B.B.A. / B.V.A. / B.S.W. / B.C.A. Degree Programme

#### **SYLLABUS**

(Effective from the academic year 2019-2020)

#### **ENVIRONMENTAL STUDIES**

CODE:19CM/GC/ES12

**CREDITS:2** 

LTP:200

**TOTAL TEACHING HOURS:26** 

#### **OBJECTIVES OF THE COURSE**

- To help students to gain the fundamental knowledge of the environment
- To create in students an awareness of current environmental issues
- To inculcate in students an eco-sensitive, eco-conscious and eco-friendly attitude

## **COURSE LEARNING OUTCOMES**

On successful completion of this course, students will be able to

- Articulate the interdisciplinary context of environmental issues
- Adopt sustainable alternatives that integrate science, humanities and social perspectives
- Appreciate the importance of biodiversity and a balanced ecosystem
- Calculate one's carbon footprint

Unit 1 (10 Hours)

- 1.1 Introduction: The multidisciplinary nature of environmental studies; Environmental Ethics-Role of the Individual in protecting the environment
- 1.2 Natural Resources: renewable (forests and water)and non-renewable (minerals)-energy resources: renewable and non-renewable sources, impact of over-exploitation
- 1.3 Ecosystems: terrestrial (forest, grassland and desert) and aquatic (ponds, oceans and estuaries); structure and function
- 1.4 Biodiversity: India as a mega-diversity nation; threats to biodiversity; in-situ and ex-situ conservation of biodiversity
- 1.5 Solid Waste Management, Source Segregation and Rain Water Harvesting

# Unit 2 (10 Hours)

- 2.1 Environmental Pollution: Air, Water, Noise and Plastic Pollution: causes, effects and control measures -Impact of over-population on pollution and health carbon footprint
- 2.2 The Environmental Dimension of Sustainable Development: The United Nations Sustainable Development Goals of the 2030 Agenda

- 2.3 Climate Change and Environmental Disasters: Natural Disasters: floods, earthquakes, cyclones, tsunamis and landslides; man-made disasters: Bhopal Gas Tragedy and Chernobyl Nuclear Disaster
- 2.4 Environmental Movements: Chipko, Silent Valley and Narmada Bachao Andolan International Agreements: Montreal Protocol, Kyoto Protocol and Climate Change Conferences
- 2.5 An Overview of Environmental Laws in India: Environmental (Protection) Act 1986, Biological Act, 2002, National Green Tribunal Act, 2010, Coastal Regulation Zone Notification, 2011

Unit 3 (6 Hours)

- 3.1 A study of the eco-friendly initiatives on campus
- 3.2 A critical review of an environmental documentary film
- 3.3 Ecofeminism and the contributions of Indian Women Environmentalists
- 3.4 The highlights of Environmental Encyclical-*Laudato si*-On Care for our Common Home
- 3.5 Environmental Calendar

## **BOOK FOR STUDY**

Bharucha, Erach. *Textbook of Environmental Studies for Undergraduate Courses*, (2<sup>nd</sup> ed.) Universities Press, 2013.

#### **BOOKS FOR REFERENCE**

Bhattacharya, K.S. Arunima Sharma, *Comprehensive Environmental Studies* Narosa Publishing House Pvt.. Ltd., New Delhi, 2015.

Saha, T.K., *Ecology and Environmental Biology* Books and Allied (P) Ltd., Kolkata 2016. Sharma, J.P. *Environmental Studies (for undergraduate classes)* 3<sup>rd</sup> edition, University Science Press, 2016.

## **JOURNALS**

Journal of Environmental Studies and Sciences Journal of Environmental Studies

#### WEB RESOURCES

www.enn.com

www.nationalgeographic.com

## PATTERN OF ASSESSMENT

Continuous Assessment Test: Total Marks: 25 Duration: 60 minutes Section A-10 x 1 = 10 Marks (All questions to be answered) Multiple Choice Questions

Section B -  $3 \times 5 = 15$  Marks (3 out of 6 to be answered in 150 words each)

Other Component: Total Marks: 25

Any **one** of the following for 25 marks

Quiz/Scrap Book/Assignment / Poster Making/Case Study/Project/Survey/Model-Making

## **No End Semester Examination**