

**SYLLABUS FOR GSAT-2017**  
**FOR ADMISSION TO M.Sc. Environmental Science**  
**(TEST CODE NO: 105)**

**SECTION – A**

**(15 bits: 15 Marks)**

**Multidisciplinary nature of Environmental Studies:** Definition, Scope and Importance – Need for Public Awareness.

**Ecosystems:** Concept of an ecosystem - Structure and function of an ecosystem - Producers, consumers and decomposers - Energy flow in the ecosystem - Food chains, food webs and ecological pyramids. Typical Structure of Ecosystem – Forest, Grassland, Desert and Aquatic ecosystems.

**Biodiversity and its conservation:** Biodiversity, Definition, Types of Biodiversity (Genetic, Species and Ecosystem), Causes for depletion of biodiversity, Ecological importance of biodiversity Conservation of Biodiversity at national level.

**SECTION – B**

**(20 bits: 20 Marks)**

**Natural Resources :** Forest resources – Use and over – exploitation, deforestation - Mining, dams and other effects on forest and tribal people.

**Water Resources** – Use and over utilization of surface and ground water – Floods, drought, dams – benefits and problems - Food resources: World food problems, effects of modern agriculture, fertilizer-pesticide problems, water logging and salinity.

**Energy and Land resources:** Solar Energy, Wind Energy, Types of Indian Soils, Reasons for depletion of fertile soil and conservation of soils.

**SECTION – C**

**(25 bits: 25 Marks)**

**Environmental Pollution:** Definition, Cause, effects and control measures of Air pollution, Water pollution, Soil pollution and Noise pollution.

**Solid waste Management:** Causes, effects and control measures of urban and industrial wastes. – Role of an individual in prevention of pollution.

**Social Issues and the Environment:** From Unsustainable to Sustainable development -Urban problems related to energy - Water conservation, rain water harvesting, and watershed management.

**Global Environmental Problems:** Climate change, global warming, acid rain, ozone layer depletion, nuclear accidents.

**Human Population and the Environment:** Environment and human health. Trends of Population growth in urban areas, reasons for population explosion and its control.

### MODEL QUESTIONS

1. The following Gas is responsible for Global warming  
a) Carbon dioxide    b) Sulphur dioxide    c) Oxides of Nitrogen    d) None of the above
2. World Environmental Day is celebrated on  
a) Jan 5<sup>th</sup>    b) June 5<sup>th</sup>    c) July 5<sup>th</sup>    d) Sept 5<sup>th</sup>
3. The gas responsible from Bhopal Disaster  
a) Methyle Iso Cynide    b) Methyle Iso Cynate    c) Di Methyle Iso Cynide    d) both a&b