

BACHELOR OF ARCHITECTURE (B.Arch.)

00141

Term-End Examination

December, 2015

**BARE-077 : GREEN ARCHITECTURE AND
ENVIRONMENTAL PLANNING (ELECTIVE – 2)**

Time : 3 hours

Maximum Marks : 70

Note : Question no. 1 is compulsory. Answer any four questions from the remaining. Supplement your answers with neat sketches.

1. Explain in detail any **two** of the following with detailed sketches : 2×7=14
 - (a) Nitrogen Cycle
 - (b) Ecological Pyramid
 - (c) Material Cycles
 - (d) GRIHA and LEED

2. (a) What are the methods of water conservation and management in a Green Rated Building ? 7
 - (b) Describe the role of glass as a building material towards the thermal performance and interior lighting of a Green Rated Building. 7

3. What is Environment Impact Assessment (EIA) ? Describe in detail the various stages of the process in the Indian context. 14
 4. Discuss the impact of siting and orientation on the energy conservation of a building. 14
 5. What are the Government of India's policies related to the conservation, protection and recycling of natural resources and reserves ? Describe any one such policy/act in detail. 14
 6. What are the effects of environmental pollution on urban areas ? Discuss some necessary actions required to overcome and tackle this issue. 14
 7. What are the techniques and simulation softwares to carry out thermal design of buildings ? Describe any one with detailed examples. 14
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