

**BOARD DIPLOMA EXAMINATION****SEMESTER END EXAMINATION (MODEL PAPER)****ARTIFICIAL INTELLIGENCE***For Final Year Computer Science*

Time : 2 : 00 Hours

Max. Marks : 40

**PART-A****8 × 1 = 8**

**Note :** Answer all questions and each question carries One marks.

1. State the need for Artificial Intelligence.
2. State D-Separation.
3. Define natural language.
4. Define learning.
5. Define parsing.
6. State discourse understanding.
7. State major design issues in speech recognition systems.
8. State AI role in robotics.

**PART-B****4 × 3 = 12**

**Note :** Answer all questions and each question carries Three marks.

9. (a) List the semantics in probabilistic logic.  
(or)  
(b) List the advantages of natural language process.
10. (a) List the types of inference in Bayes network.  
(or)  
(b) Explain AI role in robotics.
11. (a) Explain about transition network.  
(or)  
(b) State ambiguity and disambiguation.
12. (a) Explain AI role in flying with drones.  
(or)  
(b) Explain AI role in observing universe.



## PART-C

 $4 \times 5 = 20$ 

Note : Answer *all* questions and each question carries *Five* marks.

1. 13. (a) Explain about forward chaining algorithm.  
(or)  
2. (b) Explain about morphological analysis.
3. 14. (a) Explain about generating plans.  
4. (or)  
5. (b) Explain AI role in developing the neural networks.
6. 15. (a) Explain parsing a sentence with an example.  
(or)  
(b) Explain different forms of ambiguity in detail.
16. (a) Explain AI role in the medical field.  
(or)  
(b) Explain AI role in the military applications.