

B.Sc. (Information Technology)-III Fifth Semester
5BIT4 - Computational Linguistics Paper - IV

P. Pages : 1

Time : Three Hours



GUG/W/18/1446

Max. Marks : 80

- Notes :
1. All questions are compulsory and carry equal marks.
 2. Draw Neat and labeled diagram and use supporting data wherever necessary.
 3. Avoid vague answers and write specific points / answer related to question.

1. a) What is Artificial intelligence? Explain A.I. techniques in detail. 8
b) Define control strategies. Explain each control strategies. 8

OR

- c) What is PROLOG? Explain cut and fail in PROLOG with example. 8
d) What are the problem characteristics? Explain in detail. 8

2. a) What is Heuristic search? Explain depth first search algorithm. 8
b) What are basic problem solving methods? Explain each in detail. 8

OR

- c) Explain the constraint satisfaction algorithm with example. 8
d) What is production System? Explain in detail. 8

3. a) Write a brief note on representing simple facts in logic. Explain it with example. 8
b) What is resolution? Explain the resolution in propositional logic in detail. 8

OR

- c) Explain an algorithm of conversion to clause form. 8
d) Discuss Representation of simple facts in logic. 8

4. a) Explain the general concept of implementation of A.I. System. 8
b) What is Declarative Representation of knowledge? Explain in detail. 8

OR

- c) Explain the following : 8
i) Syntactic analysis. ii) Semantic Analysis.
d) What is Pattern Recognition? Explain in detail. 8

5. Solve all the questions.
a) Write a brief note on structure of language. 4
b) Explain the Mean-End Analysis algorithm. 4
c) Give the basic principle of Resolution. 4
d) Explain about the choosing level of representation. 4
