CS - 801 B.E. VIII SemesterExamination, June 2015

Soft Computing

Time: Three Hours　　　　　http://www.rgpvonline.com　　　　　Maximum Marks: 70

Note: i)　All questions carry equal marks.

ii) There is internal choice in questions.

UNIT-I

1. a)　What is soft computing? Why it Cell soft?

b)　What is artificial intelligence? How it differ from natural Intelligence?

OR

2. a)　What are the differences between scripts and frame Structures in knowledge Representation?

b)　Explain A* and AO* algorithm with suitable example.

UNTT-II

3. a)　How MAD ALINE network Differ from AD ALINE Network?

b)　Describe back propagation training algorithm for the activation function, which is an arctan function?

OR

4. a)　Give difference between ANN and artificial intelligence.

b)　What is learning? Explain difference between learning and Training?

UNIT-III

5. a)　What is ART? Explain Rules and Applications, b)　Explain Counter propagation Network.

OR

6. a)　Explain Chinese character Recognition method using ART2.

b)　What do you mean by Associative memory of Neural network?

UNIT-IV

7. a)　Explain fuzzy logic and fuzzy quantifiers with example.

b)　What is Defuzzification? Explain with example.

OR

8. a)　Give difference between Fuzzy logic and predicate logic.

b)　What is Generalized Modus Ponens and Generalized Modus Tollens?

UNTT-V

9. a)　What is Optimization? Explain ant colony optimization,

b)　Explain the Genetic Algorithm cycle with example.

OR

10.　　Write short notes on Following. (Any Four):

a)　　　Constrained optimization.　b) Hybrid systems.　c)　　Convergence of G.A

d)　　　Neuro - Genetic System.　e)　Fuzzy logic controlled GA.