

Code No: **R4202A**

R10

Set No. 1

IV B.Tech II Semester Supplementary Examinations, April/May - 2017

AI TECHNIQUES

(Electrical and Electronics Engineering)

Time: 3 hours**Max. Marks: 75**

Answer any FIVE Questions

All Questions carry equal marks

- 1 a) Explain briefly about the concept of knowledge representation learning process and learning tasks? [8]
b) Explain about the concepts of humans and computers in AI? [7]
- 2 a) Describe neural network models and architecture? [8]
b) Explain discrete, continuous and multi-category perception models? [7]
- 3 Explain briefly about the concept of RBF algorithms? [15]
- 4 a) Explain about reproduction operators concept in genetic algorithms? [8]
b) Explain briefly about the concept of binary encoding? [7]
- 5 a) Explain about the concept of mutation operator? [8]
b) Explain about generational cycle? [7]
- 6 a) Describe fuzzy set operations and relations? [8]
b) Define uncertainty? What are the membership functions with schematic? [7]
- 7 a) Explain briefly about the concept of membership value assignment? [8]
b) Explain development of rule base and decision making system in fuzzy logic system? [7]
- 8 How do you control the load frequency in power system by using fuzzy logic controller? [15]