

Artificial Intelligence Important Topics

Unit 1

1. Define AI.
2. What are Agents? What are the types of agents?
3. What is Heuristic search Technique? Write about A* Algorithm with example.
4. Write Algorithm of Alpha beta pruning and explain.
5. What is a perfect decision game?

Note: learn problems for A algorithm and alpha beta pruning.*

Unit 2

1. What is propositional logic? Also explain logic equivalence.
2. What is Inference? Explain in detail.
3. Write about Predicate logic/ First order logic.
4. Explain a) Frames b) Semantic Nets

Unit 3

1. Briefly describe the basic architecture of typical expert system, mentioning the function of each of the main components.
2. Mention uses/ applications of Expert systems.
3. What is Fuzzy Logic?
4. Explain fuzzy logic system architecture. Define Membership function.
5. Write about decision making? What is utility theory and utility functions.

Unit 4

1. Draw and write about Machine Learning System.
2. Supervised vs unsupervised learning.
3. What is inductive Learning. Differentiate between inductive and deductive learning.
4. What is ANN? Draw architecture of ANN and mention its type.
5. Write in detail about Multi-layer feed forward neural network.
6. What is perceptron training rule?

Unit 5

1. What is NLP? What are the phases in NLP?
2. Write about ASR (automatic speech recognition) along with its examples (i.e. DRAGON , HARPY etc).
3. What are the applications of AI in today's world?
4. What is ubiquitous AI?