



MCQs for Assessment of Fundamentals of AI

1. Which of the following most suitably defines Artificial Intelligence?
 - (a) Artificial Intelligence is a field that aims to make humans more intelligent hbjh
 - (b) Artificial Intelligence is a field that aims to improve the security
 - ☒ (c) Artificial Intelligence is a field that aims to develop intelligent machines
 - (d) Artificial Intelligence is a field that aims to mine the data
2. Identify the Artificial Intelligence Branch in followings?
 - ☒ (a) Machine Learning
 - (b) Cyber forensics
 - (c) Full-Stack Developer
 - (d) Network Design
3. Who has official coined the term “Artificial Intelligence”?
 - (a) Fisher Ada
 - (b) Alan Turing
 - ☒ (c) John McCarthy
 - (d) Allen Newell
4. Which is the most appropriate situation for blind search usage?
 - (a) Real-life situation
 - ☒ (b) Small Search Space
 - (c) Complex game
 - (d) All of the above
5. Which of the following algorithm requires less memory?
 - (a) Optimal Search
 - ☒ (b) Depth First Search
 - (c) Breadth-First Search
 - (d) Linear Search


6. If a robot is able to improve its reward as per the external conditions, then the robot is considered as the _____.

- (a) Mobile
- (b) Supervised Learning
- (c) Closed Loop Agent
-  (d) Intelligent


7. Which of the following method was developed to determine whether a machine could or could not mimics human like intelligence?

- (a) Proposition Logic
-  (b) Turing Test
- (c) Predicate Logic
- (d) Knowledge Base


8. Which of the following describe the component of an Expert system?

- (a) Knowledge Base
- (b) Inference Engine
- (c) User Interface
-  (d) All of the above

9. Which algorithm is used in the Game Theory to make decisions of Win/Lose?

- (a) Heuristic Search Algorithm
- (b) DFS/BFS algorithm
- (c) Greedy Search Algorithm
-  (d) Min/Max algorithm

10. Which is not the requirement of Knowledge representation?

- (a) Inferential Efficiency
- (b) Inferential Adequacy
-  (c) Representational Verification
- (d) Representational Adequacy

11. Which of the inputs are required for an Intelligent Agent to perceive and act upon the environment?

- (a) Sensors
- (b) Perceiver
- (c) Actuators
- ☒ (d) Both a and c

12. Is the statement "Rational agent always does the right things" correct?

- ☒ (a) True
- (b) False

13. When exploration problem is required for an intelligent Agent?

- (a) Agent contains the knowledge of State and actions.
- ☒ (b) Agent does not contain the knowledge of State and actions.
- (c) Only actions are known to the agent.
- (d) None of the above

14. When hypothesis space states that the result should be positive, but in fact it is negative, it is called as _____.

- (a) False Negative Hypothesis
- ☒ (b) False Positive Hypothesis
- (c) Specialized Hypothesis
- (d) Consistent Hypothesis

15. The PEAS in the task environment stands for _____.

- (a) Peer, Environment, Actuators, Sense
- ☒ (b) Performance, Environment, Actuators, Sensors
- (c) Perceiving, Environment, Actuators, Sensors
- (d) None of the above

16. Which of the following methods are used for knowledge representation in AI?

- I. Predicate Logic
- II. Propositional Logic
- III. Compound Logic
- IV. Machine Logic

☒ Both I and II

(b) Only II

(c) Both II and III

(d) Only IV

17. Which of the following methods is used by inference engine?

(a) Forward Chaining

☒ Backward Chaining

(c) Both a and b

(d) None of the above

18. Which statement is true for the Heuristic function?

(a) The heuristic function is used to solve mathematical problems.

(b) The heuristic function takes parameters of type string and returns an integer value.

(c) The heuristic function does not have any return type.

☒ The heuristic function calculates the cost of an optimal path between the pair of states.

19. Which of the following is function of an Artificial Intelligence "Agent"?

(a) Mapping of goal sequence to an action

(b) Work without the direct interference of the people

☒ Mapping of precept sequence to an action

(d) Mapping of environment sequence to an action

20. Which of the following is not an Intelligence agent?

(a) Learning AI agent

(b) Goal-based AI agent

(c) Simple reflex AI agent

☒ Unity-based AI agent

21. Which of the following clearly defines Weak AI?
- (a) The study of mental faculties using mental models implemented on a computer
 - (b) The embodiment of human intellectual capabilities within a computer
 - (c) A set of computer programs that produce output that would be considered to reflect intelligence if it were generated by humans
 - (d) All of the mentioned
22. Exploratory Learning is another name for?
- (a) Supervised Learning
 - (b) Unsupervised Learning
 - (c) Reinforcement Learning
 - (d) All of the above
23. Strong Artificial Intelligence is _____.
- (a) the embodiment of human intellectual capabilities within a computer
 - (b) a set of computer programs that produce output that would be considered to reflect intelligence if it were generated by humans
 - (c) the study of mental faculties through the use of mental models implemented on a computer
 - (d) all of the mentioned
24. Choose the correct option for given statements:
- A.** Knowledge base (KB) consists of set of statements.)
- B.** Inference is deriving a new sentence from the KB.
- (a) A is true, B is true
 - (b) A is false, B is false
 - (c) A is true, B is false
 - (d) A is false, B is true
25. What is perceptron?
- (a) A single layer feed-forward neural network with pre-processing
 - (b) An auto-associative neural network
 - (c) A double layer auto-associative neural network
 - (d) A neural network that contains feedback

26. Which term is used for describing the judgmental or commonsense part of problem solving?

- ☒ Heuristic
- (b) Critical
- (c) Value based
- (d) Analytical

27. What is back propagation?

- (a) It is another name given to the curvy function in the perceptron
- ☒ It is the transmission of error back through the network to allow weights to be adjusted so that the network can learn
- (c) It is another name given to iterative searching methods
- (d) None of the above

28. GA techniques are inspired by _____.

- ☒ Evolutionary
- (b) Cytology
- (c) Anatomy
- (d) Ecology

29. Genetic algorithms are heuristic methods that do not guarantee an optimal solution to a problem.

- ☒ TRUE
- (b) FALSE

30. Which of the following is not related to AI?

- (a) Predictive Analytics
- (b) Diagnostic Analytics
- ☒ Cognitive Analytics
- (d) All of the above