SRMINSTITUTE OF SCIENCE ANDTECHNOLOGY

RAMAPURAMCAMPUS

Department of Computer Science and Engineering

18CSE388T – ARTIFICIAL NEURAL NETWORKS

CONTINUOUS LEARNING ASSESMENT – 1

Branch: CSE-AIML Max. Marks: 25

Year/Sem: III/V Date: 13.09.2022

Set: ODD Duration: 60mins

**PART-A (5x1 = 5)**

**ANSWER ALL THE FOLLOWING QUESTIONS**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Q.No** | **Questions** | **Marks** | **CO** | **BL** | **PI** |
| 1 | **Who was the inventor of the first neuro computer?**  a) Dr. John Hecht-Nielsen  b) Dr. Robert Hecht-Nielsen  c) Dr. Alex Hecht-Nielsen  d) Dr. Steve Hecht-Nielsen | 1 | 1 | 1 | 1.7.1 |
| 2 | **Signal transmission at synapse is a?** a) physical process b) chemical process c) physical & chemical both d) none of the mentioned | 1 | 1 | 1 | 1.7.1 |
| 3 | **Where does the chemical reaction take place in neuron?** a) dendrites b) axon c) synapses d) nucleus | 1 | 1 | 3 | 1.5.1 |
| 4 | **The cell body of neuron can be analogous to what mathematical operation?**  a) summing b) differentiator c) integrator d) none of the mentioned | 1 | 1 | 1 | 1.5.1 |
| 5 | **Activation value is associated with?** a) potential at synapses b) cell membrane potential c) all of the mentioned d) none of the mentioned | 1 | 1 | 1 | 1.5.1 |

**PART-B (2x4= 8)**

**ANSWER ALL THE FOLLOWING QUESTIONS**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Q.No** | **Questions** | **Marks** | **CO** | **BL** | **PI** |
| 6 | Elaborate the neural network architecture. | 4 | 1 | 3 | 1.5.1 |
| 7 | Compare Biological Neural Networks with Artificial Neural Networks. | 4 | 1 | 3 | 1.7.1 |

**PART-C (1x12 = 12)**

**ANSWER ANY ONE OF THE FOLLOWING QUESTIONS**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Q.No** | **Questions** | **Marks** | **CO** | **BL** | **PI** |
| 9 (a) | Explain in brief about the History of Neural Networks. | 12 | 1 | 1 | 1.7.1 |
| (OR) | | | | | |
| 9 (b) | Elaborate about Central Nervous System and Peripheral nervous system with neat diagram. | 12 | 1 | 2 | 1.5.1 |

**OUTCOME ALIGNMENT MATRIX:**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **QUESTION**  **NUMBER** | **CO DISTRIBUTION** | | | | |
| **CO1** | **CO2** | **CO3** | **CO4** | **CO5** |
| 1 | 1 |  |  |  |  |
| 2 | 1 |  |  |  |  |
| 3 | 1 |  |  |  |  |
| 4 | 1 |  |  |  |  |
| 5 | 1 |  |  |  |  |
| 6 | 4 |  |  |  |  |
| 7 | 4 |  |  |  |  |
| 8 | 4 |  |  |  |  |
| 9 (a) | 12 |  |  |  |  |
| 9 (b) | 12 |  |  |  |  |
| **Total** | **41** |  |  |  |  |
| **%** | **100** |  |  |  |  |

**QUALITY MATRIX:**

|  |  |  |  |
| --- | --- | --- | --- |
| **QUESTION NO.** | **BL DISTRIBUTION** | | |
| **L1** | **L2** | **L3** |
| 1 | 1 |  |  |
| 2 | 1 |  |  |
| 3 |  |  | 1 |
| 4 | 1 |  |  |
| 5 | 1 |  |  |
| 6 |  |  | 4 |
| 7 |  |  | 4 |
| 8 |  | 4 |  |
| 9 (a) |  | 12 |  |
| 9 (b) | 12 |  |  |
| **Total** | **16** | **16** | **9** |
| **%** | **40%** | **40%** | **21%** |

**BLOOM’S LEVEL DISTRIBUTION:**

Prepared by: Scrutinized by: Verified and approved by HOD