Introduction to Neural Networks

Neural networks are a class of machine learning algorithms inspired by the human brain.

They consist of layers of nodes (neurons) connected by weights. Each neuron processes

inputs and passes its output to the next layer. Key components include:

1. Input layer: Takes data into the network.

2. Hidden layers: Perform computations using weights and activation functions.

3. Output layer: Produces predictions or classifications.

Applications include image recognition, natural language processing, and recommendation systems.