vggnet and resnet

Assignment Questions

1.Explain the architecture of VGGNet and ResNet. Compare and contrast their design principles and key components.

2. Discuss the motivation behind the residual connections in ResNet and the implications for training deep neural networks.

3. Examine the trade-offs between VGGNet and ResNet architectures in terms of computational complexity, memory requirements, and performance.

4. Explain how VGGNet and ResNet architectures have been adapted and applied in transfer learning scenarios. Discuss their effectiveness in fine-tuning pre-trained models on new tasks or datasets.

5. Evaluate the performance of VGGNet and ResNet architectures on standard benchmark datasets such as ImageNet. Compare their accuracy, computational complexity, and memory requirements.