Assignment 2

1. First Analysis (CNN vs Transformer architecture)
    1. I took two models "EfficientNet-B0" and “ViT-B/16” to compare CNN and transformer-based model on a fixed noise level on training data of 30%.
    2. I found that ViT performance was very low as it has very high number of parameters for a small training set of 1800 images.
    3. So, I included “DeiT-Tiny” which is a ViT model of size ~ 5M parameters.
    4. Still EffiencientNet performed better over 5 epochs.
    5. EfffiencientNet accuracy - 74.05%
       DeiT-Tiny accuracy – 73.57%
       ViT Accuracy – 64.52%

2. Testing EfffiencientNet on variable label noise

Noise level	Accuracy
0.3	71.90%
0.4	66.19%
0.5	56.67%
0.6	44.76%
0.8	25.48%