David Schulz 4/5/2021 CS3450 Lab 4: Transfer Learning

## **Lab 4: Transfer Learning**

## **Advantages of Transfer Learning**

Transfer learning allows a model to be trained without the need for massive datasets related to the specific topic because it has already been trained on large datasets that are similar. This also means that it will take much less time to train a model that was pre-trained for a similar task than a completely new model.

Reference: <a href="https://www.sparkcognition.com/transfer-learning-machine-learning/">https://www.sparkcognition.com/transfer-learning-machine-learning/</a>

## How to Fix Layers from Being Updated During Training in PyTorch

Every PyTorch parameter in a model has a requires\_grad flag. The flag is set to False by default, so all layers are fixed on initial creation, but you can manually set the parameters of specific layers to update during training by adding the requires\_grad=True parameter to their PyTorch creation method call.