ARCADA

Homework:
Image Segmentation

Task 1: Run code from Github

1. Clone repository from https://github.com/bonlime/keras-deeplab-v3-plus/blob/master/README.md
2. Run the code mentioned in README, get the same result!
   - You will need to install "opencv" and updated "keras"

Task 2: Train the same model yourself

1. Based on task 1
2. Download "training/validation" data from http://host.robots.ox.ac.uk/pascal/VOC/voc2012/#data
3. Use "JPEGImages" as input, "SegmentationClass" as targets
4. Rescale all images to max 64 pixels, add padding
   - You have this code already!
5. Train a model (CPU is fine)
6. Compute and prind prediction, check that it makes sense

Task 2: Train the same model yourself

Some helpful code for training model:

```
deeplab_model = Deeplabv3(input_shape=(64,64,3), classes=20)
deeplab_model.compile(optimizer='rmsprop', loss='mean_absolute_error')
deeplab_model.fit(data, labels, epochs=3, batch_size=10)
```