

Homework 01 – Introduction

Arthur J. Redfern
arthur.redfern@utdallas.edu
Jan 14, 2019

0 Outline

- 1 Logistics
- 2 Reading
- 3 Theory
- 4 Practice

1 Logistics

Assigned: Mon Jan 14, 2019
Due: Wed Jan 23, 2019
Format: PDF uploaded to eLearning with the following format

Homework 01 – Introduction

FirstName LastName
NetID

As a Comet, I pledge honesty, integrity, and service in all that I do

1. Complete or Incomplete
2. Complete or Incomplete
- ...
7. Complete or incomplete

2 Reading

None

3 Theory

None

4 Practice

1. If you are not familiar with Python and it's commonly used libraries read the following tutorial

Web site: <http://cs231n.github.io/python-numpy-tutorial/>

Complete

2. Install TensorFlow and associated dependencies on your local machine

Web site: <https://www.tensorflow.org/install/>

Options: Via package (pip or Docker) or build from source; recommended to include GPU support if you have a Nvidia GPU with CUDA compute capability 3.5 or higher (don't worry about this if you don't)

Complete

3. Read the following sections in the TensorFlow guide

Web site: <https://www.tensorflow.org/guide/>

Sections: High level APIs
Estimators
Low level APIs
TensorBoard
Performance

Complete

4. Run the following tutorials on TensorFlow on your local machine

Web site: <https://www.tensorflow.org/tutorials/>

Tutorials: 1. Basic classification
5. Save and load

Complete

5. Browse through the features of Google's Colaboratory

Web site: <https://colab.research.google.com/notebooks/welcome.ipynb>

Complete

6. Browse through the examples (seeds) on Google's SeedBank

Web site: <https://research.google.com/seedbank/>

Features: Browse Seeds

Tutorial

FAQ

Complete

7. Run the Fashion MNIST with tf.keras example on Google's Colaboratory

Web site: <https://research.google.com/seedbank/seed/5648554290839552>
https://colab.research.google.com/github/tensorflow/docs/blob/master/site/en/tutorials/keras/basic_classification.ipynb

Complete