**Oct 29**

**Start: 9am**

**Session 1: 9:00-10:20**

Introduction to ML

ML Workflow

Jupyter Noterbooks

Introduction to Google Colab.

**Break # 1: 10:20 am (10min)**

**Session 2:  10:30-12:00**

Linear Regression

Logistic Regression

Gradient Descent Method

Support Vector Machine

**Break # 2: Lunch 12-1 (1 hour)**

**Session 3: 1:00-2:00.**

Lab 1: Run Google Colab.

**Break # 3:  2:00-2:10 (10m)**

**Session 4: 2:10-3:00**

Introduction to Scikit-Learn

Overfitting and Underfitting

Training, Test.

Train models with SKlearn

**Break # 4: 3:00-3:10 (10m)**

**Session 5: 3:10-4:00**

Lab 2: Using Scikit Learn.

End: 4pm

**Oct 30**

**Start: 9am**

**Session 1: 9:00-10:20**

Artificial Neural Networks

Preprocessing Data

Hyper parameters and validation

k-fold Cross-Validation

**Break # 1: 10:20 am (10min)**

**Session 2:  10:30-12:00**

**Lab 3:** Tuning Parameters

**Break # 2: Lunch 12-1 (1 hour)**

**Session 3: 1:00-2:00.**

Other ML models: KNN, Decision Tree, Ensemble Learning.

Unsupervised Learning Methods.

**Break # 3:  2:00-2:10 (10m)**

**Session 4: 2:10-3:00**

Lab 4. Scikit Learn Advance Features.

**Break # 4: 3:00-3:10 (10m)**

**Session 5: 3:10-4:00**

Deep Learning and the Future of AI/ML

End: 4pm