## Assignment 2

## COSI 120A Topics in Computer Systems 2020 Fall

Due: 12:00 am, 10/09/2020

## [50 marks]

Write a program to implement the following recommendation approaches. Test it on MovieLens-100K and calculate the RMSE.

- a) User-User [15 marks]
- b) Item-Item [15 marks]
- c) Latent Factor Model [20 marks]

Here is the <u>link</u> for MovieLens-100K. Please use "ua.base" for training, and "ua.test" for testing.

## Bonus [20 marks]

Implement the above recommendation approaches in Hadoop/Spark.