Al in Finance & Business Analytics

AFM 423

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Preface

Disclaimer Much of the information on this set of notes is transcribed directly/indirectly from the lectures of AFM 423 during Winter 2020 as well as other related resources. I do not make any warranties about the completeness, reliability and accuracy of this set of notes. Use at your own risk.

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Contents

Preface		1	
1	Intr	О	3
	1.1	Course Website	3
	1.2	Description	3

Intro

1.1 Course Website

All relevant course materials reside on UW LEARN.

1.2 Description

Recent yrs have seen profound changes taking place across market place with market participants increasingly looking into quantitative investing techniques.

Fourth Industrial Revolution.

In this course, we provide a framework for AI-technology driven investing.

Datasets

- generated by individuals (e.g. social media)
- business processes (e.g. commercial transactions)
- machines (e.g. satellite image data)

Issue is predication accuracy.

So-called AI enablers include

- Supervised ML/Statistical Learning (SL)
- Unsupervised
- DL and RL

In this course

- theoretical discussion
- RLab sessions
- \bullet use cases on investment examples for ML/SL, DL and RL.