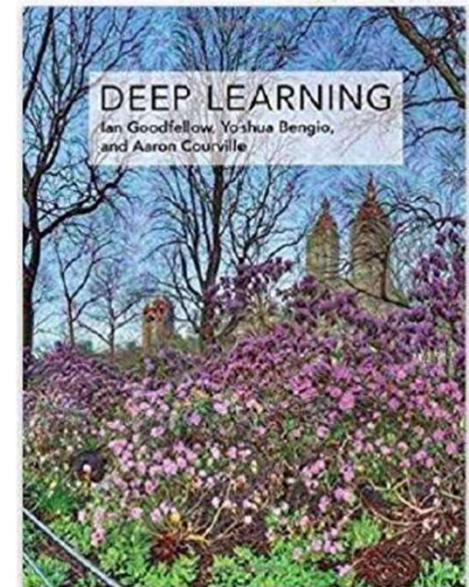


Introduction to deep learning

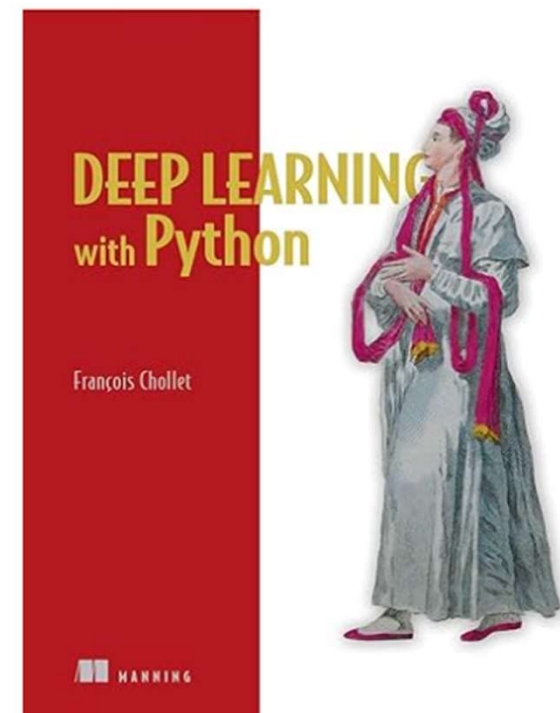
Fatemeh Mansoori

Book

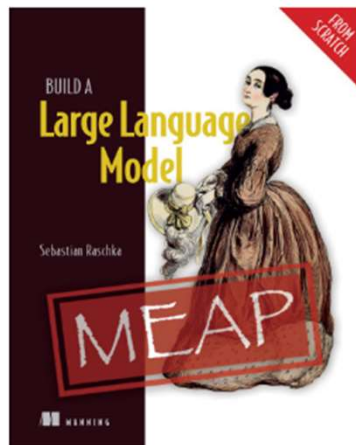
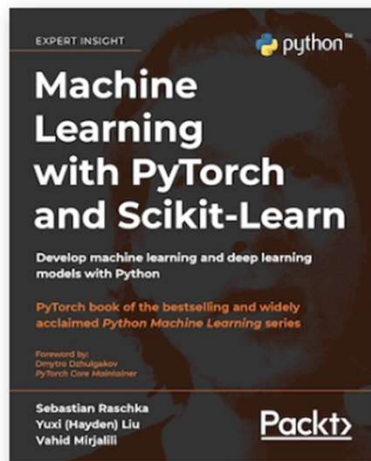
- Deep learning, I. Goodfellow, J. Bengio MIT Press, 2016
 - This book introduces a broad range of topics in deep learning.
 - The text offers mathematical and conceptual background, covering relevant concepts in linear algebra, probability theory and information theory, numerical computation, and machine learning.



- *Deep Learning with Python* introduces the field of deep learning using the Python language and the powerful Keras library. Written by Keras creator and Google AI researcher François Chollet,
- This book builds your understanding through intuitive explanations and practical examples.



- Assistant Professor of Statistics at the University of Wisconsin-Madison
- Best seller AI books



Andrew Ng

Dr. Andrew Ng is a globally recognized leader in AI (Artificial Intelligence). He is Founder of DeepLearning.AI, Founder & CEO of Landing AI, General Partner at AI Fund, Chairman and Co-Founder of Coursera and an Adjunct Professor at Stanford University's Computer Science Department.

As a pioneer in machine learning and online education, Dr. Ng has changed countless lives through his work in AI, and has authored or co-authored over 200 research papers in machine learning, robotics and related fields. In 2013, he was named to the Time 100 list of the most influential persons in the world.



- <https://www.deeplearning.ai/>

Course Information

- Communication :
 - At Office
 - Email : f.mansoori@mcs.ui.ac.ir
- TA :
 - سینا حسن جعفری
 - محمد مظاہری
 - زہرا زارع
 - ثنا سعیدمہر
- Meet at workshop

Grading

- Midterm
- Final
- Assignment
 - About 16 assignment
- Attendance

Course Description

- In this course:
 - Machine learning
 - Supervised : Decision Tree
 - Un Supervised : K-means
 - Deep learning
 - Introduction to NN
 - CNN
 - RNN
 - GAN

