

Math 454 - Spring 2021 - Homework 11

Published: Friday, April 23, 2021

Status - Reading Assignments:

Here is the status of the reading assignments you were asked to complete by this date plus the material taught in class without assigned reading.

SCF2 (Shreve Textbook):
ch.1-5.4.1

MF454 lecture notes:
ch.2 – 9.3

Other: • Wiersema (optional - no internet PDF) p.130-135: one period binomial model

New reading assignments:

Reading assignment 1 - due Monday, April 26:

- a. Carefully read the MF454 items already done in lecture: MF ch.9.4–9.6, MF ch.10.

Reading assignment 2 - due: Tuesday, April 27:

- a. Carefully read MF ch.11. The most important item might be Remark 11.2 which outlines how the theorems of this chapter will be used to price a contingent claim.

Reading assignment 3 - due: Wednesday, April 28:

- a. Carefully read the remainder of SCF2 ch.5.4.

Reading assignment 4 - due Friday, April 30:

- a. Carefully read SCF2 ch.5.5.1 and 5.5.2

Written assignments:

General note on written assignments: I will not collect those assignments for grading but doing them might be helpful for your quizzes and exams.

Written assignment 1:

Prove Exercise 12.1. in MF454. You will need a version 2021-04-15 or newer of the lecture notes

Written assignment 2:

Work through the proof of the Black–Scholes formula in SCF2 ch.5.2.5. It mostly is down to earth calculus and not overly abstract.