

Chapter 10: Additional Problems

1. Rework problem 6 assuming dividends are not reinvested.
2. a. Using information from Yahoo! Finance, calculate the average annual return and standard deviation of annual returns for the past 10 years (Dec 31 – Dec 31) for Apple stock. Note: Use “adjusted close” to account for dividends.
b. What compound annual return is equivalent to the return on Apple stock that you calculated in part a?

Note: For problem 2, you will need to get the data by clicking on the link called “Historical Prices” and selecting “Daily Prices”. Page down until you see “Download to Spreadsheet” and open the file. This will be a CSV (comma-separated) file, so I recommend copying and pasting the entire sheet into a regular Excel workbook. I would then use the VLOOKUP function to help you find the relevant year-end data.

3. Redo problem 35 using the current return on 10-year Treasury securities for the risk-free rate and betas on Yahoo! Finance.
4. Using information from Yahoo! Finance, calculate the return on Apple stock between each dividend and for the 2022 calendar year (end of 2021 through end of 2022) assuming all dividends are reinvested.

Note: Use the close price for prices since including dividends in your calculations.