Arbitrage Project #1: Kodak Insurance

The project is to be completed by your study group of between 3-5 people. A report of no more than 10 typed pages is due in class on Thursday, May 29. You may include high quality, neat, and concise supporting material in an appendix that may get evaluated when we grade the reports (depending on the communication value of the material). We will pick two groups for each of the four projects to make short (about 7 minute) presentations during class on Tuesday, June 4. Your grade on the project will be 80% on the report and 20% on the presentation, if you are picked. It will be 100% on the report if you are not picked to present. You should submit an intermediate report of approximately one page in class on Tuesday May 6 so that we can give you feedback on the progress of your work. This project, along with the “grading cash” from the FTS labs, represents the main basis for your grade in this portion of FIN 434, so you should treat it as a serious assignment.

Situation

You are a financial planner who is visited by a Kodak employee who has:

- 15 years before he expects to retire,
- an annual salary of $120,000,
- an annual bonus that is about 10% of annual salary in the form of five year nonmarketable at-the-money options on Kodak stock, and
- a 401K plan worth about $1 million that is composed of 25% Kodak stock (you cannot reduce this position), 25% in a corporate bond mutual fund, and 50% in a balanced common stock mutual fund.
Recently, Kodak’s stock price fell about 9% when it was announced that sales had been flat for the last couple of months. Your client is concerned about the level of risk he is exposed to through the combination of his human capital and 401K investments.

Your requirement is to create “Kodak insurance” that allows your client to reduce his exposure to the risk of changes in the fortunes of Kodak. Your client has an investment portfolio of $500,000 of marketable securities outside his 401K plan. What would you recommend that your client do to produce Kodak insurance?

Your proposal should include a detailed consideration of specific securities, or sets of securities, that your client should purchase, the transactions costs (including taxes) involved, and the effects on the risk of your client’s total wealth (including human capital). Your plan should cover the fifteen year period until your client plans to retire (and can then restructure his 401K investment mix).