

# Corporate Finance. Questions and Answers

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## 1 Home Work 1

- *Q (AXP5) Problem 2, (iii). What is better, to lease or to buy?*  
A (Maxim) Calculate NPV of both projects, and pick up project with maximum NPV
- *Q (AXP5) Problem 2, (ii). What discount rate to use, 2.8% or 10.3%?*  
A (Maxim) When you calculate NPV of the project, you should use opportunity costs of capital. You cannot borrow as much as you want for 2.8, can you? But you can save as much as you want and borrow as much as you want for 10.3.
- *Q (AXP5) Problem 1, (e). How we should think about it?*  
A (Maxim) This is a tricky question! Think about it like a perfect world. Saver can save as much as they want for market rate. Spenders can borrow as much as they want for market rate. There is no liquidity constraints in this world

- *Q (AXP5) Problem 1, (a). What is wealth?*  
A (Maxim) Wealth is PV of your today's and future inflows.

## 2 Home Work 2 (AmChem)

- *Q (AXP5) Can I assume 0 growth rate of sales for Collinsville Plant for 1980s*

A (Maxim) You can assume anything, usually there is no unique right answer for case questions, but your assumptions should satisfy 3 general rules:

1. They should be reasonable
2. They should be consistent with information from the case
3. They should be consistent with your previous assumptions. E.g. you cannot assume 0 growth rate answering question 1, and 5% growth answering question 2.

- *Q (AXP5) What beta to choose? Industry average or company?*

A (Maxim) When you want to estimate beta for new company, try to find similar company and take beta of this company. Only if you can't find similar company, you might use industry average beta.

- *Q (AXP5) How we pick up similar company. What should we look at?*

A (Maxim) Look mostly at operation side. Don't look too much at leverage and other financing stuff. What does matter is beta of the asset. According to M&M, it does not matter how the company finances its operations. So, you can easily go from beta of the asset to beta of the equity and vice versa.

## 3 Home Work 3 (Mariott)

- *Q (AXP5) Do we need to make a lot of calculations in answering question 3?*

A (Maxim) This is qualitative case, not quantitative. Determine who is winning and losing from this spin-off. Think about whose interests should maximize board of directors. Basically, answer to question 3 it is just a summary of answers for question 1 and 2

- *Q (AXP5) How we should approach to question 1?*

A (Maxim) Use the basic M&M equation  $V = D + E$ . After spin-off, we have 2 firms. So, you should think whether spin-off decrease/increase the asset value, or in other words whether  $V_1 + V_2 \leq V$ ? Whether this policy increase/decrease total shareholder value, or whether  $E_1 + E_2 \leq E$ ? How it affects bondholders, or whether  $D_1 + D_2 \leq D$ ?

## 4 Home Work 4 (UST)

- *Q (AXP5) Is there a typo in question 4?*

A (Maxim) Yes, there is a typo (bonus for group who first found it!).  
Please, change 1999 to 1994.