

## Equity Instruments: Newsletter – September 24, 2016

*Where we are in class...*

### Lecture Notes Packet 1 (pdf)

Last session: Page 78



As of next week: Page 150



Basics of DCF valuation  
Estimation of Discount Rates  
Estimation of Cash Flows  
Estimation of Growth Rates  
Terminal Value  
Choosing the Right Model  
Dealing with Loose Ends  
Valuation Examples  
The Dark Side of Valuation

*Where you should be in the project...*

### DCF Valuation portion of Project

*Item*

1. Pick a firm
2. Obtain its financials
3. Find out the businesses that your firm operates in
4. Obtain a riskfree rate
- 5. Estimate a market risk premium
6. Estimate a bottom-up unlevered beta
7. Estimate the market value of equity and debt
8. Estimate a bottom-up levered beta
9. Estimate a pre-tax cost of debt (using actual or synthetic ratings)
10. Convert operating leases into debt
11. Estimate a tax rate
11. Estimate a cost of capital
12. Capitalize R&D expenses
13. Estimate an adjusted operating income
14. Estimate net capital expenditures
15. Estimate non-cash working capital
16. Estimate Free Cash Flow to Firm
17. Estimate Free Cash Flow to Equity
18. Estimate a historical growth rate in earnings
19. Obtain analyst forecasts of growth in earnings for your firm
20. Estimate growth in earnings from fundamentals
21. Choose a length for the high growth period
22. Choose a DCF model
23. Value the firm/stock

### *Data Notes...*

You can get a risk free rate in US dollars by going to:

<http://www.cnnfn.com>

You can also get bond rates from other countries by going to:

<http://www.tradingeconomics.com/bonds-list-by-country>

Next week, we will start on equity risk premiums, the next peg in estimating discount rates. We will look at the conventional practice of using historical risk premiums as estimates of future equity risk premiums and why this practice is becoming dangerous. We will look at alternatives to historical risk premiums, and in particular, an implied equity risk premium that you can back into from the current level of the index. To get a deeper look at all of these, you may want to look at my paper on equity risk premiums (which is updated once every year):

[http://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=2742186](http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2742186)

I won't tell you that you will enjoy the read but you may find it useful.

### *Miscellaneous FAQs*

*I am analyzing a foreign company. Which riskfree rate should I get?*

Your choice of riskfree rate will be determined by which currency you do your valuation in, and whether you use real or nominal cash flows.

*What if I cannot get a risk free rate in the local currency?*

If, in spite of your best efforts, you cannot get a risk free rate in the local currency, you can do one of three things:

1. Do your valuation in real terms (using the TIPs rate as your risk free rate)
2. Do your valuation in an alternate currency, say US dollars
3. Build up to a synthetic risk free rate

*Should I normalize risk free rate?*

Hell, no! Please revisit the discussion we had towards the end of the class on risk free rates to see why this practice is dangerous.