BTECH MINOR COURSE

2022-23 | Autumn Semester – Term 2

BASICS OF FINANCIAL MANAGEMENT

Course instructor: Prof. Rohan Chinchwadkar

Weightage in evaluation: 20 marks

Individual Project: Application of Corporate Finance Concepts

The objective is to apply different concepts of corporate finance to analyse real world companies. Each student has been assigned a separate company for the project (list shared in a table at the end of the document). Students can use Yahoo Finance or Google Finance (and resources in IIT Bombay Library) to access data. Enjoy!

Deliverables of the project

1. Report which presents the analyses mentioned for the project (in a word doc)
2. Data used for analysis, with sources (in an excel sheet)

Analyses

A. Corporate Governance Analysis

Objective: To assess the company's corporate governance structure and examine the relationships between different stakeholders in the business (society, bondholders, and financial markets)

Key Steps

1. Examine whether there is a separation between the management of a business and its owners. If so, also assess how much power owners have in monitoring management and influencing decisions.

2. If the firm has borrowed money, either in the form banks or in the form of bonds, evaluate the potential for conflicts of interest between the equity investors and lenders and how it is managed.

3. Evaluate the company's standing as a corporate citizen, by looking at its reputation (good or bad) in society.

Framework for Analysis

1. Corporate governance

a. Ownership structure: Start by looking at proportions of the outstanding stock held by institutions, insiders, and individuals.

b. Top shareholders: Look at the top ten to twenty holders of the company's shares. In addition to checking to see how many are institutions, look for the presence of founders and activist investors on the list. (You are trying to see whether these stockholders will be willing to stand and contest management, if they feel that their value is being put at risk.)

c. CEO and top management: Look at the background of the CEO and examine how he or she got to the position. In particular, check for tenure (how long he or she been CEO), whether the CEO came up through the ranks or from another organization, his/her age, and connections to the ownership of the company. If you can, ask the same questions about the rest of the top management team.

d. Board of directors: Look at the composition of the board of directors and in particular at connections that the directors may have to the top management and, in particular, to the CEO. Check to see whether there are external assessments of the board's independence and quality and also check news stories to evaluate whether there is evidence that the board is willing to stand up to management.

2. Debtholder concerns

a. Debt type: If your firm borrows money, examine whether it borrows from banks or by issuing bonds. With either one, follow through and find more details on the borrowing.

b. Default risk measures: If your company has been rated by a ratings agency (S&P, Moody's, Fitch), find out the bond rating and the rating agency's views of the company.

3. Society and other stakeholders

a. Employee satisfaction: Look for hard data on employee satisfaction such as employee turnover and compensation numbers for your company, relative to its peer group. Also, look for qualitative assessments of the company as an employer, generally from news stories about the issue.

b. Society: In general, it is tough to get a measure of how a company stands with society, unless your company is at one of the extremes. In addition to looking for news stories that mention your company is a social context, you can try to see whether the company makes the lists of socially responsible corporations that are published by some external entities (environmental, labor, and political) but recognizes that they may be no consensus, as these groups have different agendas.

<u>B. Stockholder Analysis</u>

Objective: To identify the average and marginal investors in the company, with the intent of figuring out how diversified these investors are, and getting a measure of the risk (both amount and type) in your company.

Key Steps

1. Given the investor breakdown in your company's equity, identify the average investor in your company.

2. Develop a risk profile for your company and break the risk down into its component parts: firm-specific and market risks, micro or macro risk, discrete or continuous risks, small or large risks.

3. Get a measure of variability in your company's stock price and a measure of default risk and a measure of default risk for its debt.

Framework for Analysis

a. Stockholder composition

a. Looking at the breakdown of stock holdings by the type of investor – institutional, individual, and insider, makes a judgment on the "average" or "typical" investor in your company.

b. Looking at the list of top holders of stock in your company makes a judgment on the "marginal" investor in your company.

c. If you have significant insider holdings in your company, identify who these insiders are and what role they play in the running of the company.

b. Risk profiling

a. Make a list of all of the risks that your company is exposed to in its business and classify these risks into firm-specific, sector wide and market-wide groupings.

b. Looking at each risk item in your profile list, consider how that risk will be viewed by managers, the average investor, and the marginal investor, and how each of them may try to manage that risk.

c. Risk measures

a. Estimate the standard deviation in your company's stock, if publicly traded. Compare to the standard deviations of other stocks in your peer group and in the market.

b. If your company's debt is rated by a ratings agency, obtain the bond rating. If it is rated by multiple agencies, examine differences in the ratings and see whether you can find reasons for those differences.

<u>C. Risk and Return: Analysis for the Firm</u>

Objective: To estimate the risk parameters for your company and use these parameters to estimate costs of equity and debt for the firm

Key Steps

1. Looking at the stock price history of your company, evaluate both its riskiness and its performance as an investment, relative to the market and after adjusting for risk.

2. Develop a measure of equity risk in the company and compute a cost of equity for it.

3. Find a measure of default risk in the company and compute a cost of debt for it.

Framework for Analysis

1. Estimating risk-free rate and equity risk premium

a. Estimate a risk-free rate for India. If there is an AAA-rated entity issuing long-term bonds, you can use the interest rate on those bonds as your risk-free rate. If not, you will have to subtract out the default spread for the entity (government, for example) from the interest rate on the entity's bonds to get to a risk-free rate.

b. Based on the geographical risk exposure of your company, estimate an equity risk premium for the company. You should be able to find at least a revenue breakdown by region, in your company's financial reports, and sometimes asset and income breakdowns. You can find risk-free rates and equity risk premiums for individual countries, as well as regions, on http://www.damodaran.com (under updated data).

2. Estimating relative risk

a. Run a regression of returns on your firm's stock against returns on a market index to estimate beta. To run the regression, you will need to get data on past returns for your stock and for a market index.

b. Assuming that the company is funded by all equity, use this beta to calculate the cost of equity using the CAPM equation.

3. Estimating default risk and cost of debt

a. If your company is rated, find the bond rating and estimate a default spread based on the rating. Add the default spread to the risk-free rate to estimate a pretax cost of debt.

Some important points:

1. **Deadline for submission**: November 15, 2022, 5.30 pm

2. **Submission / email:** There will be a link to the project in the week "9 November - 15 November" on the General page of the course. Please do not send me any submissions on email. Please upload them only on Moodle before the deadline. Please compress all your files into a .zip file and name all files/folders using this convention "<Your Roll No.> IITB PE-VC 2022 Project"

3. **Late submissions will not be entertained.** Please ensure that all important files are included in the .zip file and confirm that the file has been successfully uploaded/submitted.

4. Please contact the TA, Vidit Mohan, for any doubts. **Email:** mohan.vidit@sjmsom.in

Assignment of companies

Sr. No.	Roll No.	Name	Company
1.	180110076	Shivprasad Kathane	Reliance
2.	18D180011	Ghadage Manasi Sunil	TCS
3.	190010055	Prem Kavathiya	HDFC Bank
4.	190020026	Avishi Agarwal	General Insurance Corp. of India
5.	190020063	Kriti Chaturvedi	Infosys
6.	190020083	Pimpalshende Pratiksha Sudhir	HUL
7.	190020118	Suyash Ashok Kadam	ICICI Bank
8.	190040051	Kaligandla Chandana Sahitya	Bajaj Finance
9.	190040126	Thumuganti Vaishnavi	ICICI Lombard
10.	190050025	Ayush Jangir	Bharti Airtel
11.	190050029	Dasari Gnana Heemmanshuu	SBI
12.	190100054	Harshit Jain	Kotak Mahindra
13.	190100056	Harsh Sudhir Kumar Raj	Wipro
14.	190110005	Ali Asgar Saifee	HCL Tech
15.	19D110006	Gaurav Ashok Sodhani	Zomato
16.	19D170012	Krutarth Dhaduk	HDFC Life
17.	200020004	Aayush M Gopal	SBI Life Insurance
18.	200020048	Divij Goyal	ITC
19.	200020118	Samagra Jain	Larsen & Toubro Ltd.
20.	200050048	Hardik Rajpal	Asian Paints
21.	200050083	Naman Singh Rana	Maruti Suzuki
22.	200050097	Parekh Dhairya	UltraTechCement
23.	200050119	Rounak Dalmia	Titan Company
24.	200070084	Tayde Indrayani Sadanand	ONGC
25.	200100101	Nabh Lohia	Sun Pharma
26.	200100106	Omkar A Chavan	Nestle
27.	200110017	Aryan Agarwal	JSW Steel
28.	200110018	Aryan Aswani	Tata Steel
29.	20D180003	Advait Nilesh Dhakane	Tech Mahindra
30.	20D180019	Manasi Pawar	NTPC
31.	20D180034	Shlok Puri	Power Grid Corp
32.	210040047	Dewaansh Vijayvargiya	Tata Motors
33.	210040094	Mihir Narendra Borse	Pidilite Industries
34.	210040120	Rahul Agarwal	Bajaj Auto
35.	210050128	Rahul Kumar	Vedanta
36.	210070079	Shiv Bharuka	Mahindra & Mahindra
37.	210100039	Bagrecha Nakul Nirmal	ICICI Prudential
38.	210110023	Anmol Kurothe	Axis Bank
39.	21D070087	Vasu Soni	Nykaa (Fsn E-Commerce Ventures)