CERTIFIED PUBLIC ACCOUNTANT

ADVANCED LEVEL 2 EXAMINATIONS

A2.1: STRATEGIC CORPORATE FINANCE

DATE: WEDNSDAY, 30 NOVEMBER 2022

MARKING GUIDE AND MODEL ANSWER

SECTION A

QUESTION ONE

MARKING GUIDE	**Marks**
Sub question A	
Operating Cash flows	1
Investment	0.5
Realizable value	0.5
Workings of capital (maximum 1.5 marks for workings and 0.5 for posting)	2
Discount rate	0.5
Present Values	0.5
Base case Present value	1
Base case Present value-based decision	0.5
Issue costs calculation	0.5
Tax shield on subsidized loan	0.5
Tax shield on bank loan	
Interest costs	1
Tax relief	1
Discount factor	1
Present values	1
Net Present value	1
Subsidy benefit	0.5
Adjusted APV	
Issue costs calculation	0.5
Tax shield on subsidized loan	0.5
Tax shield on bank loan	0.5
Subsidy benefit	0.5
Total benefits	1
APV	1
Correct decision	1
Maximum marks	**18**
Sub question B	
Calculation of debts	1.5
Calculation of equity	1.5
Cost of equity calculation	2
After tax cost of debt	1
WACC calculation	2
Uses of WACC, Award 1 mark for a well explained, and 0.5 for only stated point, maximum 2 marks	2

MARKING GUIDE	Marks
Limitations of WACC, Award 1 mark for a well explained, and 0.5 for only stated point, maximum 2 marks	2
Maximum marks	**12**
Subquestion C	
Acid-Test ratio (Award 0.5 mark for correct formula and 0.5 mark for correct ratio solution and 1 mark for correct interpretation).	2
Interval measure (Award 0.5 mark for correct formula and 0.5 mark for correct ratio solution and 1 mark for correct interpretation).	2
Equity multiplier (Award 0.5 mark for correct formula and 0.5 mark for correct ratio solution and 1 mark for correct interpretation).	2
Long-term debt ratio (Award 0.5 mark for correct formula and 0.5 mark for correct ratio solution and 1 mark for correct interpretation).	2
Accounts Receivable days (Award 0.5 mark for correct formula and 0.5 mark for correct ratio solution and 1 mark for correct interpretation).	2
Return on assets (Award 0.5 mark for correct formula and 0.5 mark for correct ratio solution and 1 mark for correct interpretation).	2
Du Pont Identity	
Net Profit margin (Award 1 mark for correct formula and 1 mark for correct ratio solution).	2
Asset turnover (Award 1 mark for correct formula and 1 mark for correct ratio solution).	2
Equity multiplier-It is marked already	1
Dupont identity (Award 1 mark for the formula, 1 mark for correct answer and 1 mark for interpretation)	3
Maximum marks	**20**
Total marks	**50**

Model Answer

(a) VISIYO Co

Year	**0**	**1**	**2**	**3**	**4**
	FRW 'million'	**FRW 'million'**	**FRW 'million'**	**FRW 'million'**	**FRW 'million'**
Post-tax operating cash flows		37.5	45.7	53.4	59.9
Investment	-240				
Realizable value					64
Working capital (W1)	-7	-0.63	-0.53	-0.49	8.65
Cash flows	-247	36.87	45.17	52.91	132.55

Year	0	1	2	3	4
	FRW 'million'	FRW 'million'	FRW 'million'	FRW 'million'	FRW 'million'
Discount factor 12% (W2)	1	0.893	0.797	0.712	0.636
Present value	-247	32.92	36	37.67	84.3
Base case net present value	**-56.1**				

Base case net present value is approximately (FRW 56.1 million) and on this basis, the investment should be rejected.

Workings

1. Working capital

Year	0	1	2	3	4
	FRW 'millions'	FRW 'millions'	FRW 'millions'	FRW 'millions'	FRW 'millions'
Working capital		7	7.63	8.16	8.65
Required/(released)	7	0.63	0.53	0.49	-8.65

2. Discount rate

Using asset beta .

Formula ERi = Rf+βi(ERm-Rf)

Where:

ERi = Expected return of investment

Rf = Risk-free rate

βi = Beta of the investment

ERm = Expected return of the market

All-equity financed discount rate = 4% + (11% – 4%) 1.14 = 11.98% =approximately 12%

3. Issue costs

FRW120 million/0.97 = FRW 123,711,340 .

Issue costs = 3% x FRW123,711,340= FRW 3,711,340 or FRW 123,711,340- FRW 120,000,000

There will be no issue costs for the bank loan.

4. Tax shield on subsidized loan

Use PV of an annuity (PVA) years 1 to 4 at 8% (normal borrowing rate)

PVIFA(8%,4year) =3.312 FRW120m x 0.031 x 30% x 3.312 = FRW 3,696,192

Note to markers:
Full credit should be given if tax shield is discounted at the government interest rate of 3.1% rather than the normal borrowing rate of 8%.

5. Tax shield on bank loan

Annual repayment = (FRW 120m/PVA 8% Yr 1 – 4) = (FRW120m/3·312) = FRW 36,231,884

Year	0	1	2	3	4
		FRW '000'	FRW '000'	FRW '000'	FRW '000'
Opening balance		120,000	93,368	64,605	33,541
Interest at 8%		9,600	7,469	5,168	2,683
Repayment		36,232	36,232	36,232	36,232
Closing balance		93,368	64,605	33,541	(8)

Year	0	1	2	3	4
		FRW '000'	FRW '000'	FRW '000'	FRW '000'
Interest cost		9,600.00	7,469.45	5,168.45	2,683.38
Tax relief at 30%		2,880.00	2,240.83	1,550.54	805.01
Discount factor 8%		0.926	0.857	0.794	0.735
Present value		2,666.88	1,920.40	1,231.13	591.69
Net present value		**6,410.09**			

6. Subsidy benefit

Benefit = FRW120million x (0.08 – 0.031) x 70% x 3.312 = FRW13,632,192

7. Financing side effects

	FRW '000'
Issue costs (W3)	-3,711
Tax shield on subsidized loan (W4)	3,696
Tax shield on bank loan (W5)	6,410
Subsidy benefit (W6)	13,632
Total benefit of financing side effects	**20,027**

Adjusted NPV = Base NPV + Total benefit of financing side effects **=20.027+(56.1) = (36.073) Milion**

The adjusted present value of the project is around FRW (**36.073)** million and so the project should be rejected.

(b)

TWIGIRE Co

Capital Structure				%
Debt to Total Capitalization	44,000,000	0.92	40,480,000	9.54%
Equity to Total Capitalization	1,200,000	320	384,000,000	90.46%
Total			**424,480,000**	

Cost of Equity	
Risk Free Rate	9.00%
Equity Risk Premium	8.00%
Levered Beta	0.84
Cost of Equity Rf+βi(ERm-Rf)=9%+0.84(8%)	**15.72%**

Market Premium = Market return – risk free rate

Cost of Debt	
Before trac Cost of Debt	15%
Tax Rate	30%
After Tax Cost of Debt (15%*0.7)	**10.50%**

WACC= *15.72%*90.46%)+(10.5%*9.54%)	**15.22%**

Uses of WACC:

- The Weighted Average Cost of Capital serves as the discount rate for calculating the Net Present Value (NPV) of a business;
- It is also used to evaluate investment opportunities, as it is considered to represent the firm's opportunity cost. Thus, it is used as a hurdle rate by companies;
- A company will commonly use its WACC as a hurdle rate for evaluating mergers and acquisitions (M&A), as well as for financial modelling of internal investments. If an investment opportunity has a lower Internal Rate of Return (IRR) than its WACC, it should buy back its own shares or pay out a dividend instead of investing in the project;
- It is said that the 'same opportunity never knocks twice'. For taking advantage, the right decisions have to be taken at the right time. Since the single rate is used for all new projects, the decisions can arrive at a faster pace and the new opportunity can be grabbed and taken benefit of.

Limitations of using WACC:

- The cost of equity and cost of debt is required to determine for calculating the WACC which is difficult to estimate for private companies due to lack of publicly available information. For public companies, there are various methods for calculating the cost of equity. There is no single formula that can be used in every company but assuming the cost of equity is difficult for calculating WACC;
- The WACC carries an assumption that the debt-to-equity ratio will remain constant. For the forecasting value of a company, it is assumed that the WACC will remain constant and the debt-to-equity ratio will also remain constant. But it is impossible because the debt-to-equity ratio changes and so will the WACC;
- The WACC can be lowered by increasing debts which will create problems. If the debt is added beyond the optimal capital structure it will increase the present value of the cost of financial distress.

(c)

SN	Ratio	Formula	Computations	Answer
i	**Acid-Test Ratio**	(Current assets - Inventory)/Current liabilities	(4800-1300)/3000	1.17
ii	**Interval Measure**	Current assets-inventory /Average daily operating costs	((4,800-1300/(2,200/365))	581
iii	**Equity Multiplier**	Total assets/Total equity	(8,700/4,200)	2.07
iv	**Long-term debt ratio**	Long-term debt/(Total Asset)	((1500/(8,700)	0.17
v	**Days' sales in receivables**	365 days/Receivables turnover or Receivable/Sales*365 days	365/(3200/1700) or (1700/3200)*365	194
vi	**Return on assets**	Net income/Total assets	(322/8,700)	3.70%
vii	**Du Pont Identity**	Net Profit Margin*Asset Turnover*Equity Multiplier	(0.1006*0.3678*2.0714)%	7.66%
		Net Profit Margin = Net Income*100 /Revenue	(+322/3,200)	10.06%
		Asset Turnover = Sales*100 /Average Total Assets	(+3200/8700)	36.78%
		Equity Multiplier = Average Total Assets*100 /Average Shareholder's Equity	(8,700/4,200)	207.14%

i. **Acid-Test ratio:** The acid test (quick) ratio is an indicator of a company's short-term liquidity position and measures a company's ability to meet its short-term obligations with its most liquid assets. The quick ratio is considered a more conservative measure than the current ratio, which includes all current assets as coverage for current liabilities. A quick ratio of 1.17 indicates that the company has FRW 1.17 of liquid assets available to cover each FRW 1 of its current liabilities. Ideally the standard of quick ratio is 1:1, therefore TURINDANE Co is performing above the average by 0.17.

ii. **Interval measure:** Total costs for the year, excluding depreciation and interest, were FRW 2,200 million. The average daily cost was FRW2,200 million/365 = FRW 6.03 Million per day. The interval measure is thus FRW 3,500 million/FRW 6.03 =581 days. Based on this, TURINDANE Co could hang on for 19 months or so.

iii. **Equity multiplier:** The equity multiplier is a risk indicator that measures the portion of a company's assets that is financed by stockholder's equity rather than by debt. It is calculated by dividing a company's total asset value by its total shareholders' equity. Generally, a high equity multiplier indicates that a company has a higher level of debt. Investors judge a company's equity multiplier in the context of its industry and its peers, which is absent in this case.

iv. **Long-term debt ratio:** The long-term debt-to-total-assets ratio is a measurement representing the percentage of a corporation's assets financed with long-term debt, which encompasses loans or other debt obligations lasting more than one year. This ratio provides a general measure of the long-term financial position of a company, including its ability to meet its financial obligations for outstanding loans. A ratio of 0.17 indicates that the company has 17% of long-term debt for each FRW 1 it has in assets.

v. **Accounts receivable days:** This is a measure of the average number of days that it takes a company to collect payment for a sale. A high number suggests that a company is experiencing delays in receiving payments. That can cause a cash flow problem. A ratio of 194 days generally appears to be higher than the 45 days generally considered acceptable. TURINDANE Co should ensure the recovery process is strengthened.

vi. **Return on assets:** Return on assets (ROA) is an indicator of how profitable a company is relative to its total assets. ROA gives a manager, investor, or analyst an idea as to how efficient a company's management is at using its assets to generate earnings. The company earns a profit of 3.7% per FRW 1 invested.

vii. **Du Pont Identity:** The DuPont identity is an expression that shows a company's return on equity (ROE) can be represented as a product of three other ratios: the profit margin, the total asset turnover, and the equity multiplier. DuPont identity tells us that ROE is affected by three things:

1. Operating efficiency, which is measured by profit margin;
2. Asset use efficiency, which is measured by total asset turnover; and
3. Financial leverage, which is measured by the equity multiplier.

SECTION B

QUESTION TWO

MARKING GUIDE	Marks
Sub question A	
sales (award 1 mark for each year)	1
Total costs (award 1 mark for each year)	1
Net cash flow (award 1 mark for each year)	1
Net benefit of the new policy over the current policy	0.5
PV of net cash flow	1
Cost of switching	1
Net benefit of switching	1
Correct Decision	0.5
Maximum marks	**7**
Sub question B	
i. Arbitrage opportunity calculation	3
i. Correct decision	1
ii. APT against CAPM comparison	2
ii. Assumptions of APT (award 1 mark to each well explained assumption)	5
Maximum marks	**11**
Sub question C	
Arguments for CSR (award 1 mark to a well explained point, maximum 3.5 marks)	3.5
Arguments against CSR (award 1 mark to a well explained point, maximum 3.5 marks)	3.5
Maximum marks	**7**
Total Marks	**25**

Model Answer

(a)Details	Formula	Current Policy	New Policy		Notes
Price per Kg		250	250		
Cost per Kg		140	140		
Quantity sold		1,500	1,600		
Rate of return				2.5%	
Sales	Price *Quantity	375,000	400,000		Note 1
Total Cost	Cost *Quantity	210,000	224,000		Note 2
Net Cash flow	Sales-Cost	165,000	176,000		Note 3

(a)Details	Formula	Current Policy	New Policy		Notes
Net Cash flow				11,000	Note 4
PV of Net Cash Flow				440,000	Note 5
Cost of Switching					
Incremental costs				14,000	Note 6
Incremental costs due to delay in cash collection				375,000	Note 7
Total Cost of Switching				**389,000**	Note 8
Net benefit of switching				**51,000**	Note 9:

Decision: Switch should be made

Note1: Cashflow of the old policy is given by the old quantity (1500) times the price while the cashflow under the new policy the quantity should be adjusted from 1500 kg to 1600 kg.

Note 2: Total costs under the old policy is given by the old quantity (1500 Kg) times the cost of kg while the total cost under the new policy the quantity should be adjusted from 1,500 kg to 1,600 kg

Note 3 : The net cash flow/benefit under both policy will be given by the difference between total sales and total costs

Note 4: This is the net benefit that will be generated once the new policy is adopted. This is given by the difference between net cashflows from new and old policy wich is FRW 165,000 and FRW 176,000 respectively

Note 5 : This is given by net benefit between the old and new policy discounted at 2.5%. Notice that we have treated the monthly cashflow as a perpetuity because the same benefit will be realized each month forever.

Note 6: This is the incremental costs that will arise as a result of increased quantity from Kg1,500 to Kg 1,600 at a cost of FRW 140 per Kg

Note 7: This will be the incremental cost that will arise as a result of delay of cash collection which is now after 30 days if the new policy is adopted.

Note 8: This total cost of switching from the old to the new policy will be given by the total of incremental costs from both delay in cash collection and incremental cost

Note 9: The total net benefit of switching from the current to the proposed credit policy will be given by the difference between the PV of benefits expected from adopting the new credit policy and total switching costs

b) **APT**

(i) Arbitrage Opportunities

The slope between A and B is

$$\frac{(10\% - 5\%)}{(2-1)} = 5\%$$

whereas the slope between B and C is

$$\frac{(20\% - 10\%)}{(3-2)} = 10\%$$

If the beta of stock C was increased to 4, the slope between B and C would be 5%, as required in equilibrium. So **yes**, there are arbitrage opportunities because they do not all lie on the same line. Clearly, if the beta of stock C was increased to 4, then they would all lie on the same line.

(ii) Differences and assumptions

The APT is an alternate equilibrium pricing model that is built on different assumptions than the CAPM. Specifically, the APT does not assume that investors make decisions according to the mean-variance rule, and investors do not have to be risk averse.

The assumptions of the APT are:

- Capital market is characterized by perfect competition, and individual investors cannot influence the prices;
- All investors have the same expectations regarding the future in terms of mean, variance and covariance terms. Rates of return depend on some common factors and some noise, which is firm-specific;
- A very large number of assets exist in the economy;
- Short sales are allowed, and the proceeds are available to the short sellers;
- Investors prefer more wealth to less.

c) Arguments for and against CSR:

Arguments in favour of CSR include that it:

• Creates positive Public Relations for Bigogwe Supermarket Ltd, or, as a minimum avoids bad P.R.;

• Helps attract new and repeat custom which can improve Bigogwe Supermarket Ltd's financial metrics;

• Improves staff recruitment, motivation and retention at Bigogwe Supermarket Ltd;

• Helps keep Bigogwe Supermarket Ltd within the law and helps avoid fines and penalties.

However, there are many writers who vigorously oppose the notion that private

organisations should embrace social responsibility. Some of the main arguments against CSR are:

• Market capitalism is the most equitable form of society that has ever appeared;
• The ethics of doing business are not those of wider society;
• Governments are responsible for the well- being of society;
• An organization's maximum requirement is to remain within the law, no more than this is required.

QUESTION THREE

MARKING GUIDE	**Marks**
Sub Question A	
Calculation of E(st)(award 0.5 mark for each year, maximum 1.5 mark)	1.5
Calculation of NPV	
calculation of cashflows in FRW (award 0.5 mark for each year, maximum 2 marks)	2
Corect posting of discounting factor	0.5
calculation of PVs (award 0.5 mark for each year, maximum 2 marks)	2
Calculation of NPV	1
Correct decision	1
Maximum Marks	**8**
Sub Question B	
Cost of importation	0.5
Calculation of profit	1
Exchange rate with increase	0.5
Cost of importation with increase	0.5
Calculation of profit with increase	1
Calculation of cost of importation	0.5
Calculation of sales price	0.5
Break even exchange rate	0.5
Maximum Marks	**5**
i. Award mark for each of the two correct descriptions and 1 mark for each correct example ,maximum 4 marks	4
ii. Award 2 marks for a correct explanation of political risk and 2 marks for each correct explained way of Managing political risk maximum 8 marks	8
Maximum Marks	**12**
Total Marks	**25**

Model Answer

(a)RUNIGA Investments

Time (t)	Free Rate Rwanda(FRW)	Free Rate Europe (Eur)	Spot Rate (So)	E(ST) = [(1 + FRW) / (1 + REur)]t S0
1	7.40%	2.10%	1,170	1230.7346
2	7.40%	2.10%	1,170	1294.6219
3	7.40%	2.10%	1,170	1361.8256

Time (t)	Cash flows	Sale Value	E(ST)	FRW Cash flows	DF (10%)	PV
	EURO	FRW	FRW/€	FRW		FRW
	000'	000'		000'		000'
0	-21,000	-	1,170.00	-24,570,000	1	-24,570,000
1	4,300	-	1,230.73	5,292,139	0.909	4,810,554
2	5,200	-	1,294.62	6,732,024	0.827	5,567,384
3	6,300	13,500	1,361.83	26,964,234	0.751	20,250,140
NPV						6,058,078

Decision: Invest in this project as it has a positive NPV

(b)RUNIGA

		Amounts
i	Quantity sold	45,000
	Sales price	260
	Cost of production in BIF	350
	Exchange rate	1.97
	Cost of production in FRW (350/1.97)	177.665
	Profit (45000*(260-177.665)	**3,705,075**
	Exchange rate increase	12%
	Exchange rate with increase 1.97*(1+12%)	2.2064
	Cost of production in FRW - with increase=350/2.206	158.63
	Profit - with increase (45000*(260-158.63)	**4,561,675.13**
ii	**Break-even:**	
	Cost of production in BIF	350
	Sales price	260
	Break-even exchange rate (BIF/FRW)	**1.3462**

(c) International transactions and finance

i. **PPP:**

The basic idea behind *absolute purchasing power parity* is that a commodity costs the same regardless of what currency is used to purchase it or where it is selling. For instance, if a loaf of bread costs Ugx 5,000 in Uganda, and the exchange rate is Ugx 3.5 per FRW, then a loaf of bread

costs Ugx 5,000/3.5 = FRW 1,428 in Rwanda. In other words, absolute PPP says that FRW1 will buy you the same number of, say, beans anywhere in the world. (This concept is sometimes referred to as the law of one price.).

On the contrary, Relative Purchasing Power Parity is an economic theory which predicts a relationship between the inflation rates of two countries over a specified period and the movement in the exchange rate between their two currencies over the same period. It is a dynamic version of the absolute purchasing power parity theory. Suppose the Ugx-FRW. Suppose that FRW exchange rate is currently $S0$ = Ugx 3.50. Further suppose that the inflation rate in Britain is predicted to be 10% over the coming year, and (for the moment) the inflation rate in Rwanda is predicted to be zero. The exchange rate in a year will be Ugx 3.50 × 1.1 = Ugx 3.85.

ii.Political risk:

Description of Politic risk

Politic risk refers to changes in value that arise as a consequence of political actions. Political risk is the risk an investment's returns could suffer as a result of political changes or instability in a country. Instability affecting investment returns could stem from a change in government, legislative bodies, other foreign policymakers or military control. Political risk is also known as "geopolitical risk," and becomes more of a factor as the time horizon of investment gets longer. They are considered a type of jurisdiction risk.

Managing Political risk

Political risk can be hedged in several ways, particularly when confiscation or nationalization is a concern:

- The use of local financing, perhaps from the government of the foreign country in question, reduces the possible loss because the company can refuse to pay the debt in the event of unfavorable political activities;
- Structuring the operation in such a way that it requires significant parent company involvement to function is another way to reduce political risk;
- Companies that operate internationally, known as multinational businesses, can purchase political risk insurance to remove or mitigate certain political risks. This allows management and investors to concentrate on the business fundamentals while knowing losses from political risks are avoided or limited. Typical actions covered include war and terrorism;
- Avoid it in the first place: research the riskiness of a country, either by paying for reports from consultants that specialize in making these assessments or doing research yourself using the many free sources available on the internet. Then you will have the more informed option to not set up operations in countries considered political risk hot spots.

QUESTION FOUR

MARKING GUIDE	**Marks**
Sub Question A	
i. Cash payment	0.5
Market value of the target	0.5
PV of the incremental cash flow	1
Value of the target	1
% of the firm given up	0.5
Market value of the acquirer	0.5
Equity cost	1
ii. NPV cash value of the target	0.5
Cost of acquisition	0.5
NPV cash	1
Value of the target	0.5
Equity cost	0.5
NPV stock	1
iii.Correct decision	1
Maximum Marks	**10**
Sub Question B	
Assets from NTARAMA	1
Assets from IGIKWE	1
Purchase price of IGIKWE	1
Goodwill created	1
Total assets from both companies	1
Maximum Marks	**5**
Sub Question C	
Financial leverege, a well explained earn 2 marks	2
Risks associated with financial leverege (award 2 marks for each well explained point, maximum 6 marks)	6
MM no tax theory, a well explained theory earns 2 marks	2
Maximum Marks	10
Total Marks	**25**

Model Answer

(a)Transaction 1:

Qn	Particulars	FRW '000'
I	Cash payment	35,000
	Stock payment:	
	Market value of the target	45,000
	PV of the incremental cash flows (1,500,000/12%)	12,500
	Value of the target	57,500
	% of the acquiring firm given up	36%
	Market value of the acquirer	75,000
	Equity Cost (57,500+75,000)*36%	**47,700**
Ii	NPV by using cash:	
	Value of the target	57,500
	Cost of acquisition	35,000
	NPV by using cash	**22,500**
	NPV by using stock:	
	Value of the target	57,500
	Equity Cost	47,700
	NPV stock	**9,800**

iii) Advice/Decision: Acquire with cash because the NPV is greater with the stock payment offer

(b) Transaction 2:

For the merger to make economic sense, NTARAMA Ltd must feel the acquisition will increase value by at least the amount of the premium over the market value, so:

	FRW
Assets from NTARAMA (41,000*100)	4,100,000
Assets from IGIKWE (9,300*220)	2,046,000
Purchase price of IGIKWE 9300*(220+100)	2,976,000
Goodwill created (2,976,000 -2,046,000)	930,000
Total assets of both companies(4,100,000+2,976,000)	7,076,000

(c)Financial leverage

(i) Financial leverage

Financial leverage is the use of borrowed money (debt) to finance the purchase of assets with the expectation that the income or capital gain from the new asset will exceed the cost of borrowing. In most cases, the provider of the debt will put a limit on how much risk it is ready to take and indicate a limit on the extent of the leverage it will allow. In the case of asset-backed lending, the financial provider uses the assets as collateral until the borrower repays the loan. In the case of a cash flow loan, the general creditworthiness of the company is used to back the loan.

Risks of Financial Leverage:

- Although financial leverage may result in enhanced earnings for a company, it may also result in disproportionate losses. Losses may occur when the interest expense payments for the asset overwhelm the borrower because the returns from the asset are not sufficient. This may occur when the asset declines in value or interest rates rise to unmanageable levels.
- Volatility of Stock Price: Increased amounts of financial leverage may result in large swings in company profits. As a result, the company's stock price will rise and fall more frequently, and it will hinder the proper accounting of stock options owned by the company employees. Increased stock prices will mean that the company will pay higher interest to the shareholders.
- Bankruptcy: In a business where there are low barriers to entry, revenues and profits are more likely to fluctuate than in a business with high barriers to entry. The fluctuations in revenues may easily push a company into bankruptcy since it will be unable to meet its rising debt obligations and pay its operating expenses. With looming unpaid debts, creditors may file a case at the bankruptcy court to have the business assets auctioned in order to retrieve their owed debts.
- Reduced Access to More Debts: When lending out money to companies, financial providers assess the firm's level of financial leverage. For companies with a high debt-to-equity ratio, lenders are less likely to advance additional funds since there is a higher risk of default. However, if the lenders agree to advance funds to a highly-leveraged firm, it will lend out at a higher interest rate that is sufficient to compensate for the higher risk of default.

(ii) MM Theory

Modigliani and Miller (MM or M&M) have an argument that a firm cannot change the total value of its outstanding securities by changing the proportions of its capital structure. In other words, the value of the firm is always the same under different capital structures. In still other words, no capital structure is any better or worse than any other capital structure for the firm's stockholders.

END OF MODEL ANSWER AND MARKING GUIDE