KARACHI UNIVERSITY BUSINESS SCHOOL
UNIVERSITY OF KARACHI
FINAL EXAMINATION, DEC 2010: AFFILIATED COLLEGES
FINANCIAL MANAGEMENT: BA (H) – 551
BS-V

Date: 16 Jan 2011 Max Marks: 60
Time Allowed: 3 Hours

Instruction: Attempt any five questions.

Q# 1: a- The Pattrick Company's cost of equity is 16%. Its before-tax cost of debt is 13%, and its average tax rate is 40%. The stock sells at book value. Using the following balance sheet.

Assts		**Liabilities and Equity**	
Cash	$120		
Accounts Receivable	240		
Inventories	360	Long-term debt	$1152
Plant and equipment	2160	Equity	1728
Total Assets	**2880**	**Total Liabilities and equity**	**2880**

Required: Calculate Patrick's after-tax weighted average cost of capital. (4)

b- The Heuser Company's financial plan for the next year include the sale of long-term bonds with a 10% coupon. The company believes it can sell the bonds at a price that will provide a yield to maturity of 12 percent. If its tax rate 35%, what is Heuser's after-tax cost of debt? (4)

c- Trivoli Industries plan to issue some $100 par preferred stock with an 11% dividend. The stock is selling on the market for $97.00 and Trivoli must pay flotation cost 5% of the market price. What is the cost of preferred stock for Trivoli? (4)

Q# 2: Sharp Products Company is considering two mutually exclusive investments. The projects' expected net cash flows are as follows: (12)

	Expected Net Cash Flows	
Year	**Project – A**	**Project – B**
0	($300)	($405)
1	(387)	134
2	(193)	134
3	(100)	134
4	600	134
5	600	134
6	850	134
7	(180)	0

Compute each project's IRR?

Q# 3: Find the **(A) Future Value** and **(B) Present Value** of the following annuities. (1.5) each

a) $400 per year for 10 year at 10%
b) $200 per year for 5 year at 5%

i. Assume first payment is these annuities in made at end of the each year.
ii. Assume first payment is these annuities in made at beginning of the year.

Q# 4: a- Define Relaxed current asset investment policy, Restricted current asset investment policy and Moderate current asset investment policy. (3)

b- The Zocco Corporation has as inventory conversion period of 75 days, a receivable collection period of 38 days, and a payable deferral period of 30 days.

i. What is the length of the firm's cash conversion cycle? (3)

ii. If Zocco's annual sales are $3375000 and all sales are on credit, what is the firm's investment is accounts receivable? (3)

iii. How many times per year does Zocco turn over its inventory? (3)

Q# 5:a- The Wei Corporation expects next year's net income to be $15 million. The firm's debt ratio is currently 40%, Wei has $12 million of profitable investment opportunities, and it wishes to maintain its existing debt ratio. According to the residual dividend policy, how large should Wei's should Wei's dividend pay-out ratio be next year? (08)

b- After a 5 for 1 stock split, the Strasburg Company paid a dividend of $0.75 per new share which represents a 9% increase over last year's pre-split dividend. What was last year's dividend per share? (04)

Q# 6: Differentiate the following.

1. Pay-back vs Discounted pay- back period.
2. Primary vs Secondary market.
3. Organized vs over the counter market.
4. Money market vs capital market.
5. Principal component vs interest component in an amortization schedule.
6. Real rate vs Money/Nominal rate

End of Paper

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KARACHI UNIVERSITY BUSINESS SCHOOL

University of Karachi

FINAL EXAMINATION JULY 2010: AFFILIATED COLLEGES

FINANCIAL MANAGEMENT BA (H) – 551

BS-V

Date: July 4, 2010 Max Time: 2.5 Hrs

Max Time: 40

Attempt Any FOUR Questions

1. Project A has an Initial Investment of Rs. 11,000 and it generates positive cash flows of Rs. 4,000 each year for the next six years. Project B has an initial investment of Rs. 17,000 and it generates positive cash flow of Rs. 4,500 each year also for the next six years. Assume the discount rate, or required rate of return, 13 percent:

   a. Calculate the net present value of each project. If Project A and Project B are mutually exclusive, which one(s) would you select?

   b. Assume Projects A and B are independent. Based on NPV, which one(s) would you select?

   c. Calculate the internal rate of return for each project.

   d. Using IRR for your decision, which project would select if Project A and Project B are mutually exclusive? Would your answer change if these two projects were independent instead of mutually exclusive?

2, (a) The PakLand Corporation has issued a 10.95 percent annual coupon rate bond that matures December 31, 2030. If the required rate of return on bonds of similar risk and maturity is 9 percent, and assuming the time now is January 1 2010, what is the current value of PakLand's bonds?

   (b) PakLand's 10.95 percent coupon rate, 2030 bond is currently selling for Rs. 1,115. At this price what is the yield to maturity of the bond? Assume the time is January 2010.

3. Here are some data of Pak Telecom:

   i. The target capital structure is 40% debt and 60% equity

   ii. Projected retained earnings = Rs. 6 million.

   iii. k_d = 14%; /t= 40%

   iv. D_0 = Rs. 2; P_0 = Rs. 20; g= constant = 5%

   v. F = 10% on new stock sales

   vi. The following four capital projects have been identified. They are all of average risk, independent, and nondivisible :

Project	Cost	IRR
A	Rs. 2.5 million	14%
B	Rs. 5.0 million	13.6
C	Rs. 7.5 million	13.5
D	Rs. 2.5 million	12.8

Required: What is Pak Telecom's optimal budget, in Rupees?

4. National Corporation faces an IOS schedule calling for a capital budget of Rs. 60 million. Its optimal capital structure is 60% equity and 40% debt. Its earning before interest and taxes (EBIT) were Rs. 98 million for the year. The firm has Rs. 200 million in assets, pays an average of 10% on all its debt, and faces a marginal tax rate of 34 percent. F the firm maintains a residual dividend policy and will keep its optimal capital structure intact:

   Required: What will be the amount of the dividends it pays out after financing its capital budget?

5. Saad Bin Zafar, the chief financial officer of Rahat Chemical Company, believes in a moderate approach financing following the matching principle. Some of the projected balance sheet accounts of the company for the end of next year follows:

	Current and Fixed Assets	Permanent Current Assets
Cash	Rs. 30,000	Rs. 15,000
Accounts Receivable	15,000	5,000
Inventory	130,000	80,000
Fixed Assets	500,000	
Total Assets	Rs. 675,000	

Liabilities	
Accounts Payable	Rs. 20,000
Short-term Debt	?
Long-term Debt	?
Common Equity	450,000
Total Liabilities Equity	Rs. 675,000

(a) How much should Saad finance by short-term debt and long term-debt to conform to the matching principle?

(b) Saad's boss Maaz Ahmed, is the Vice President of Finance of Rahat Chemical Company and he expects interest rates to decrease in the future and hence would like to follow a very aggressive policy using a large amount of short-term debt and a small amount of long-term debt. He would also like to decrease net working capital to Rs. 25,000. How much should Maaz finance by short-term debt and how much by long-term debt to conform to his aggressive approach?

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KARACHI UNIVERSITY BUSINESS SCHOOL
UNIVERSITY OF KARACHI

FINAL EXAMINATION : AFFILIATED COLLEGES
FINANCIAL MANAGEMENT : BA (M) – 551
BS – V

Date : July 01, 2009 — **Time Allowed : 3 Hours**
Max. Marks : 60

Instructions: Attempt any five questions from the following.

Q.No.1(a). A firm has notes payable of Rs.1,546,000, long-term debt of Rs.13,000,000, and total interest expense of Rs.1,300,000. If the firm pays 8% interest on its long-term debt, what rate of interest does it pay on its notes payable?

(b). A risk-averse investor is considering two possible assets as the asset to be held in isolation. The assets' possible returns and related probabilities (i.e. the probability distribution) are as follows:

Asset X		Asset Y	
P	**k**	**P**	**k**
0·10 ~~0.12~~	–3%	0.05	–3%
0.10	2	0.10	2
0.25	5	0.30	5
0.25	8	0.30	8
0.30	10	0.25	10

Which asset should be preferred?

Q.No.2(a). You hold a diversified portfolio consisting of a Rs.5,000 investment in each of 20 different common stocks. The portfolio beta is equal to 1.15. You have decided to sell one of your stocks, a lead mining stock whose b=1.0, for Rs.5,000 net and to use the proceeds to buy Rs.5,000 of stock in a steel company whose b=2.0. What will be the new beta of the portfolio?

(b). Assume that you will receive Rs.2,000 a year in Years 1 through 5, Rs.3,000 a year in Years 6 through 8, and Rs.4,000 in Year 9, with all cash flows to be received at the end of the year. If you require a 14% rate of return, what is the present value of these cash flows?

Q.No.3: Suppose Indus Motor Company sold an issue of bonds with a 10-year maturity, a Rs.1,000 par value, a 10% coupon rate, and semiannual interest payments.

Required

Two years after the bonds were issued, the going rate of interest on bonds such as these fell to 6%. At what price would the bonds sell?

Q.No.4. Babar Corporation's present capital structure, which is also its target capital structure, is 40% debt and 60% common equity. Next year's net income is projected to be Rs.21,000, and Babar's payout ratio is 30%. The company's earnings and dividends are growing at a constant rate of 5%; the last dividend (D_0) was Rs.2.00; and the current equilibrium stock price is Rs.21.88. Babar can raise all the debt financing it needs at 14.0%. If Babar issues new common stock, a 20% flotation cost will be incurred. The firm's marginal tax rate is 40%.

(a) What is the maximum amount of new capital that can be raised at the lowest component cost of equity? (In other words, what is the retained earnings break point?)

(b) What is the component cost of the equity raised by selling new common stock?

Q.No.5(a). A company is anlysing two mutually exclusive projects, S and L, whose cash flows are shown below:

Years	0	1	2	3	4
S	–1,100	900	350	50	10
L	–1,100	0	300	500	850

The company's cost of capital is 12%, and it can get an unlimited amount of capital at that cost. What is the Regular IRR (not MIRR) of the better project? (Hint: Note that the better project may or may not be the one with the higher IRR.)

(b). You are considering the purchase of an investment that would pay you Rs.5,000 per year for Years 1–5, Rs.3,000 per year for Years 6–8, and Rs.2,000 per year for Years 9 and 10. If you require a 14% rate of return., and the cash flows occur at the end of each year, then how much should you be willing to pay for this investment?

Q.No.6. A firm has annual sales of Rs.2.19 million (assume 365 days in one year). Its working capital position, less cash balances in sales cash, is as follows:

Account Receivable	Rs.270,000
Inventory	Rs.174,000
Account Payable	Rs.228,000

(a) How many days does it take for cash to flow through the current asset cycle?

(b) How many days does it take for cash to flow through the current liabilities cycle?

(c) What is the net cash conversion cycle in days?

Q.No.7. Faheem Inc. expects EBIT of Rs.2,000,000 for the coming year. The firm's capital structure consists of 40% debt and 60% equity, and its marginal tax rate is 40%. The cost of equity is 14%, and the company pays a 10% rate on its Rs.5,000,000 of long-term debt. One million shares of common stock are outstanding. In its next capital budgeting cycle, the firm expects to fund one large positive NPV project costing Rs.1,200,000, and it will fund this project in accordance with its target capital structure. If the firm follows a residual dividend policy and has no other projects, what is its expected dividend payout ratio?