

Khulna University of Engineering & Technology
 B. Sc. Engineering 1st Year 2nd Term (Regular) Examination, 2022
 Department of Electrical and Electronic Engineering
 Hum 1203
 Economics and Accounting

Time: 3 hours

Full Marks: 210

N.B.: (i) Answer ANY THREE questions from each section in separate scripts.

(ii) Figures in the right margin indicate full marks.

Section A

Q1.

Consider the following table, and answer the questions below:

(35)

Price (\$ per Bushel)	Demand for Wheat (millions Bushel)	Supply of Wheat (millions Bushel)
5	35	15
6	25	17
7	20	20
8	10	25
9	02	27

- (a) Define market equilibrium. What is the equilibrium price and quantity? (CO1)
 - (b) If the government fixed a price ceiling of wheat per bushel at \$ 8, will there be surplus or shortage in the market? Show it in figure. (CO2)
 - (c) If the price floor is \$5, explain the market conditions with the help of a diagram. (CO4)
 - (d) Distinguish between movement and shift in supply curve. (CO1)
- Q2.
- (a) Define law of demand? Why the demand curve slopes downward? Explain. (CO2) (10)
 - (b) What do you mean by demand function? Draw up a demand curve from a hypothetical individual demand schedule. (CO2) (15)
 - (c) What do you mean by elasticity of demand? Discuss the determinants of demand. (CO2) (10)

- Q3. (a) "A rational producer will always produce in stage-2". Explain the various stages of production with necessary figure. (CO2) (20)
- (b) Explain the criteria for cost-benefit analysis. (CO5) (15)

Q4.

- (a) Distinguish between perfect competition and Monopoly. (CO1) (10)
- (b) What are the causes of inflation? (CO2) (10)
- (c) What do you mean by fixed cost and variable cost? What are the differences between fixed cost and variable cost? (CO3) (15)

Section B

- Q5. (a) Define accounting. Who are the users of accounting information? (CO1) (15)
- (b) Define transaction. Describe the characteristics of transaction. (CO1) (10)
- (c) What is ledger? What purpose is served by ledger? (CO2) (10)

- Q6. Dhaka Delivery company was formed on July 1 2023, where the owner Mr. X invested cash Tk. 5, 00,000 in the business. Other transactions are as follows: (CO3) (35)

July 2: Purchased a delivery truck in cash Tk. 4, 00,000.

July 3: Insurance premium paid in cash for one year from this date Tk. 24,000.

July 4: Rent paid in cash Tk. 12,000.

July 5: Supplies purchased on account Tk. 14,000.
 July 6: Received Tk. 45,000 from a customer in payment for future delivery Service.
 July 7: Performed delivery service for a customer for cash Tk. 50,000.
 July 8: Paid Tk. 14,000 accounts payable resulting from the transaction of July 5.
 July 9: Furniture purchase for office use on account Tk. 20,000
 July 10: Build a customer for delivery services performed Tk. 57,000
 July 12: Received a bill for advertising that appeared in the local newspaper in July Tk. 5,000
 July 13: received Tk. 15,000 on accounts receivable from customer
 July 14: Paid salaries of Tk. 6,000 to truck driver
 July 15: Received and paid the utility bill for July Tk. 1,500.
 July 20: Received a bill for gas and oil used in the truck for July Tk. 6,800.
 July 21: Mr. X withdrew Tk. 30,000 cash to pay personal living expenses.

Required: Prepare the journal entries to record the transactions for July 2023.

Q7.

- (a) What is adjusting entries? Describe the importance of describing entries. (CO1) (05)
- (b) What is trial balance? Discuss the errors not disclosed by trial balance. (CO2) (10)
- (c) From the following ledger balances of Dhaka Delivery Company, prepare a trial balance as on 31st July 2023. (CO3) (20)

	Taka		Taka
Cash	106500	Accounts Receivable	52000
Supplies	14000	Prepaid insurance	24000
Prepaid rent	12000	Delivery Truck	400000
Accounts Payable	31300	Unearned delivery revenue	45000
Capital	500000	Drawings	30000
Delivery Service Revenue	107000	Advertising expense	500
Gas and oil expenses	6800	Salaries expense	36000
Utilities expense	1500		

683300

Q8.

Mozaharul Islam started his own consulting firm, Islam Company, on June 1, 2023. The Trial Balance on June 30 is as follows: (CO4) (35)

ISLAM COMPANY

TRIAL BALANCE

JUNE 30, 2023

Account Titles	Debit (Tk.)	Credit (Tk.)
Cash	7750	
Accounts receivable	6000	
Prepaid insurance	2400	
Supplies	2000	
Office equipment	15000	
Accounts payable		4500
Unearned service revenue		4000
Capital, Mozaharul Islam		21750
Service revenue		7900
Salaries Expense	4000	
Rent expense	1000	
	38150	38150

28250

32250

28250

24250

16000

28400

12500

16000

9250

Additional Data:

- (i) Supplies on hand at June 30 Tk. 1300.
- (ii) A utility bill for Tk. 150 has not been recorded.
- (iii) The insurance policy is for one year.
- (iv) Salaries unpaid for the month Tk. 1500.
- (v) Depreciation charged on equipment Tk. 250 for the month

Required:

- (a) You are required to prepare a statement of comprehensive income for the month of June 2023.
- (b) Prepare a statement of Owners' Equity, and
- (c) Prepare a statement of financial position as on June 30, 2023.

Khulna University of Engineering & Technology
B. Sc. Engineering 1st Year 2nd Term Examination 2021
Department of Electrical and Electronic Engineering

Hum 1203

Economics and Accounting

Time: 3 hours

Full Marks: 210

- N.B.: (i) Answer ANY THREE questions from each section in separate script.
(ii) Figures in the right margins indicate full marks and course outcomes (COs).

Section A

- Q1. (a) What is managerial economics? What is the role of managerial economics in engineering? (15) (CO1)
- (b) What makes engineering economics decisions difficult? (08) (CO1)
- (c) Suppose a demand function of Q₁ good is $Q_1 = P_1^{-0.8} P_2^{0.5} Y^{1.5}$, where, P₁ = price of Q₁, P₂ = price of Q₂ and Y = income of consumer. Determine—
i) Own price elasticity of Q₁ good,
ii) Cross elasticity considering the relation between Q₁ and Q₂ goods, and
iii) Income elasticity.
- Q2. (a) Discuss the law of diminishing marginal utility. (08) (CO1)
(b) Explain the concept of consumer's surplus using related diagram. (12) (CO2)
(c) State consumer's equilibrium with the help of indifference curve and budget line. (15) (CO2)
- Q3. (a) Calculate national income accounting by income method. Mention the problems in calculating national income. (15) (CO2)
(b) What do you mean by fixed cost and variable cost in production? Why the short-run average cost curve is 'U' shaped? (12) (CO1)
(c) "A firm under perfect competition is price taker"— Do you think so? Why? (08) (CO2)
- Q4. (a) Write down the characteristics of perfectly competitive market. (05) (CO2)
(b) Define inflation. Explain the different types of inflation. (15) (CO3)
(c) Explain graphically the equilibrium of a monopolist in short-run. Show normal profit, super-normal profit and loss situation. (15) (CO3)

Section B

- Q5. (a) State the importance and necessity of accounting in engineering. (10) (CO1)
(b) Describe the steps in the accounting cycle. (15) (CO4)
(c) "Double entry system is a complete and scientific method of book keeping"— Discuss. (10) (CO2)
- Q6. On 1st July 2020 Mr. Reja established The Reja Travel Agency. The following transactions were completed during the month: (20+ 15) (CO4)

2020 July-1 Mr. Reja invested Tk 200,000 cash in the name of the agency.

- " 2 Paid Tk 15,000 cash for office rent.
" 3 Purchased office equipment for Tk 25,000.
" 4 Incurred advertising expenses of Tk 3,000 in the "Daily Mail" on account.
" 5 Paid Tk 5,000 cash for office supplies.
" 6 Earned 60,000 for service rendered. Cash Tk 10,000 is received from customers and the balance of Tk 50,000 is billed to customers on account.
" 7 Paid the "Daily Mail" amount due in transaction (4).
" 8 Withdrew cash Tk 4,000 for owner's personal use.
" 9 Paid salaries to employees Tk 10,000.
" 10 Received Tk 50,000 in cash from customers who have previously billed in transaction (6).

Required: a) Prepare Journal.

b) Prepare a tabular analysis of the transactions using the following column headings: Cash; Accounts Receivable; Supplies; Office Equipment; Accounts Payable and Mr. Reja's Capital.

- Q7. (a) What is trial balance? What are the limitations of trial balance? (10) (CO1)
 (b) How does a trial balance differ from a financial position? (05) (CO1)
 (c) The following accounts are taken from the ledger of M. Rahman and Co. at December 31, 2021: (20) (CO2)

Name of accounts	Tk.
Cash at bank	43,400
Sales return	2,800
Sales	48,500
Depreciation	700
Allowance for bad debit	31,000
Accumulated depreciation	19,500
Advanced paid salaries	31,100
Interest received	67,000
Rent received	27,550
Motor car	41,500
Profit on sale	11,250
Bills payable	20,250
Income tax expense	26,700
Loss on fire	2,650
Good will	21,100

Prepare a trial balance.

- Q8. The unadjusted trial balance of Mondol and Co. as on June 30, 2021 is presented below— (35) (CO5)

Mondol and Co. Trial balance as on June 30, 2021

Account Titles	Debit (Tk.)	Credit (Tk.)
Cash	5,840	
Account receivable	1,410	
Supplies	890	
Prepaid insurance	1,900	
Land	48,000	
Building	82,000	
Accumulated depreciation-building		18,960
Equipment	43,000	
Accumulated depreciation-equipment		16,800
Accounts payable		2,160
Unearned delivery fees		2,100
Mortgage payable		58,000
Capital		65,000
Withdrawals	15,000	
Earned fees		55,090
Salary expenses	16,670	
Telephone expenses	620	
Utilities expenses	1,350	
Repair expenses	1,430	
Total	2,18,110	2,18,110

Additional data:

- a) Supplies used during the month Tk. 270.
- b) Prepaid insurance expired during the month Tk. 600.
- c) Depreciation on buildings Tk. 500 and equipment Tk. 900.
- d) Unearned fees earned during this month Tk. 1300.
- e) Salaries earned but not yet paid Tk. 1200.

Required:

- i) Prepare income statement for Mondol and Co. for the month of June,
- ii) Prepare Owner's equity statement, and
- iii) Prepare Balance sheet as on June 30, 2021.

B. Sc. Engineering 1st Year 2nd Term Regular Examination, 2020

Department of Electrical and Electronic Engineering

Khulna University of Engineering & Technology

Hum 1203
Economics and Accounting

Time: 1.5 Hours

Full Marks: 120

N.B.: (i) Answer ANY TWO questions from each section in separate scripts.

(ii) Figures in the right margin indicate full marks.

Section A

Q1. (a) Explain following concepts: (15)

- (i) Contraction and extension of demand
- (ii) Decrease and increase of demand
- (iii) Elasticity of demand

(b) Explain law of diminishing marginal utility with its limitation. (15)

Q2. (a) What is inflation? What are the main causes of inflation in a country like Bangladesh? (12)

(b) Suppose that a consumer has the MU_x and MU_y of following table, money income (18) of \$10, $P_x = \$2$ and $P_y = \$1$.

Units	1	2	3	4	5	6	7	8	9	10
MU_x	14	12	11	10	9	8	6	4	3	1
MU_y	13	11	10	8	7	6	3	2	0	-5

- (i) Describe how this consumer should spend each dollar of her \$10 to purchase each unit of x and y so as to maximize her total utility.
- (ii) Show that her TU would be less if she bought one more unit of either X or Y.
- (iii) Show that the equilibrium condition for utility maximization is satisfied when the consumer purchases 2X and 6Y.

Q3. (a) What is meant by total cost, Average cost and Marginal cost of a firm? (05)

(b) What are the conditions of perfect competition market? (10)

(c) What is monetary and fiscal policy? Write down the main objectives of monetary policy. (15)

Section B

Q4. (a) Describe the steps of accounting process. (15)

(b) Discuss the elements of financial statements. (15)

Q5. From the following transactions of Mr. Zaman & Co. prepare necessary ledger (30) accounts in the book of Mr. Zaman & Co.

2020 January-1 Mr. Zaman invested cash as capital for his own business Tk. 200,000

- " -2 Cash deposited into bank Tk. 75,000.
- " -3 Supplies purchase in cash for office use Tk. 5000.
- " -5 Furniture purchased for office use Tk. 20,000.

- " -6 Earned Tk. 40,000 for service rendered: Tk. 30,000 cash is received from customers and the balance of Tk. 10,000 is billed to customers on account.

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Q6. (a) From the following trial balance of Mr. Reja prepare a statement of comprehensive income, and owner's equity statement as on 31st December, 2020: (30)Trial Balance of Mr. Reja as on 31st December, 2020

Account Title	Debit (Tk)	Credit (Tk)
Accounts Receivable	30,000	
Accounts payable		20,000
Capital		100,000
Furniture	25,000	
Salaries (10 months)	20,000	
Rent (15 months)	30,000	
Services revenue		120,000
Utility expenses	2,000	
Insurance premium	3,000	
10% Investment (1-1-20)	90,000	
Interest on above investment		6,000
Equipment	46,000	
Total	246,000	246,000

Additional Information: Depreciation on furniture @5% pa and @10% on equipment pa.

B. Sc. Engineering 1st Year 2nd Term Regular Examination, 2019
Department of Electrical and Electronic Engineering
Khulna University of Engineering & Technology

Hum 1203
Economics and Accounting

Time: 3 Hours

Full Marks: 210

- N.B.: (i) Answer ANY THREE questions from each section in separate scripts.
(ii) Figures in the right margin indicate full marks.
(iii) Necessary table/graphs/charts may be supplied on request.

Section A

- Q1. (a) What is demand law? Draw a demand curve from a hypothetical demand function. (15)
(b) Find the equilibrium price and quantity and show it on a diagram when a demand function is given by $Q_d = 24 - 2P$ and a supply function is given by $Q_s = 40P$. (20)
- Q2. (a) What is utility? Explain the relationship between total utility and marginal utility. (15)
(b) Consumer's equilibrium point is attained at the point of an indifference curve tangent to budget lines. Why not at the point where the indifference curve intersects? Explain. (20)
- Q3. (a) What are the properties of a perfect competition market? Explain short run equilibrium of a firm under perfect competition market. (25)
(b) What are the differences between competitive market and monopoly market? (10)
- Q4. (a) Explain the idea of inflation. (05)
(b) What are the causes of inflation? Explain. (20)
(c) Distinguish between the cost push and demand pull inflation. (10)

Section B

- Q5. (a) Define accounting. Why accounting is called the language of business? (10)
(b) Briefly describe the double entry system of accounting. (10)
(c) Describe the steps of an accounting cycle. (15)
- Q6. (a) What is transaction? Differentiate between transactions and events. (12)
(b) Jane started a delivery service in May 2018 and the following transactions occurred: (23)
May 1: Jane deposited Tk. 50,000 in his business bank account.
May 2: Purchased a truck for Tk. 8,000, cash of Tk. 2,000 was paid and a note was signed for remaining cost.
May 5: Purchased office supplies for Tk. 4,000 on account.
May 10: Revenue earned but not yet collected Tk. 2,000.
May 13: Office supplies were used Tk. 500.
May 16: Received Tk. 1,000 from a customer previously billed on May 10.
May 19: Jane withdrew Tk. 3,000 for personal use.
May 25: Paid salaries Tk. 7,000 and utility bill Tk. 2,000 in cash.
May 29: Paid Tk. 2,000 cash on balance owed for truck.
May 30: Cash received Tk. 10,000 by delivering service.
Required: Record above transactions in general journal.

- Q7. (a) Define depreciation. What are the factors considered while depreciating a plant asset?
 (b) Jonus company bought a delivery truck on January 1, 2012. Data is given below: (20)
- | | |
|---------------------------------|------------|
| Cost- | Tk. 13,000 |
| Expected salvage value- | Tk. 1,000 |
| Estimated useful life in years- | 5 |
| Estimated useful life in miles- | 1,00,000 |
- Required: Calculate annual depreciation for the first year (2012) under following methods:-
- Straight-line
 - Unit-of-activity
 - Declining-balance

- Q8. The following balances are taken from the books of accounts of Surma Ltd. On 30th June, 2004:

Name of accounts	Debit Tk.	Credit Tk.
Accounts Receivable	29,000	
Purchases	81,000	
Allowances for doubtful accounts		16,000
Inventories	6,000	
Furniture	10,000	
Accumulated depreciation-furniture		4,000
Buildings	1,40,000	
Accumulated depreciation-buildings		30,000
Cash	2,000	
Bad debts	6,000	
Salaries	20,000	
Interest expense	4,000	
Rent expense	6,000	
Salesman's Salaries	2,000	
Freight in	7,000	
Dividend	15,000	
Sales		2,00,000
Interest income		1,000
Bonds payable		10,000
Capital		60,000
Retained earnings(30.06.2003)		7,000
Total	3,28,000	3,28,000

Adjustments:

- Inventory on hand is Tk. 10,000
- Depreciate furniture @ 10% per year
- Depreciate buildings @ 5% per year
- Allowance for doubtful account is to be increased to Tk. 19,000
- Accrued Salaries Tk. 2,000
- Accrued interest expense Tk. 1,000
- Accrued selling expense Tk. 1,500
- Charge 50% income tax on income before income tax

Required:

- Prepare an income statement (20)
- Prepare a balance sheet (15)

Khulna University of Engineering & Technology
B. Sc. Engineering 1st Year 2nd Term (Regular) Examination 2018
Department of Electrical and Electronic Engineering

Hum 1203
Economics and Accounting

Full Marks: 210

Time: 3 hours

N.B.: (i) Answer ANY THREE questions from each section in separate scripts.
(ii) Figures in the right margin indicate full marks.

Section A

- Q1. (a) Define Economics. Distinguish between Microeconomics and Macroeconomics. (10)
 (b) Explain contraction in demand and extension in demand. (05)
 (c) A demand function of X commodity given by $Q_d = 12 - 2P$ and supply function given by $Q_s = 20P$. Find the market equilibrium price and quantity of commodity X by diagram. (20)
- Q2. (a) Discuss the characteristics of indifference curve. (05)
 (b) Prove that price effect = substitution effect + income effect. (10)
 (c) Explain how consumer's equilibrium is determined with help of budget line and indifference curve. (20)
- Q3. (a) What are the differences between fixed and variable cost. (05)
 (b) The following table gives an individual's marginal utility schedule for commodity X and Y. The price of X and the price of Y are \$1, and the individual's income is \$8 per time period and is all spent.
 (i) Indicate how this individual should spend her income in order to maximize her total utility.
 (ii) What is the total amount of utility received by the individual when equilibrium?
- | Q | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | Total |
|-----------------|----|----|----|----|----|----|---|---|-------|
| MU _X | 11 | 10 | 9 | 8 | 7 | 6 | 5 | 4 | 60 |
| MU _Y | 19 | 17 | 15 | 13 | 12 | 10 | 8 | 6 | 100 |
- (c) Explain equilibrium of a competitive firm in short run under normal profit, abnormal profit and loss. (15)
- Q4. (a) Define national income. What are the measures of accounting national income? Discuss. (15)
 (b) Prove that APC + APS = 1. (10)
 (c) What is inflation? What are the main causes of inflation in a country like Bangladesh? (10)

Section B

- Q5. (a) Define Accounting. State the importance of accounting. (10)
 (b) Discuss the steps of Accounting cycle. (15)
 (c) Describe the double entry system. (10)
- Q6. (a) Presented below is information related to Peter Real Estate Agency: (20)

January 1	Peter begins business as a real estate agent with a cash investment of Tk. 15,000.
January 2	Hires an administrative assistant.
January 3	Borrowed Tk. 5000/- from bank by signing a note.
January 4	Purchased office furniture for Tk. 1900 on account.
January 6	Sells a house for Mr. Kidman, bills kidman Tk. 3200 for reality service provided.
January 25	Paid Tk. 700 on the balance related to the transaction of January 4
January 27	Purchased used car for Tk 4000 cash for use in business.
January 30	Paid the administrative assistant Tk. 2500 in salary for January.

Requirement: Journalize the transactions with explanations.

- Q6. (b) What is transaction? Write down the characteristics of a transaction. (10)
 (c) "All transactions are events, all the events are not transactions." Explain. (05)
- Q7. (a) What is cost? Classify cost in relation to the volume of production. (10)
 (b) Discuss the methods of depreciation. What is ledger? Why ledger is called the king of all books? (15)
 (c) Following information is related to the purchase of a small delivery truck given by ABC company on January 1, 2005. (10)

Cost	1300
Expected salvage value	1000
Estimated useful life in Years	5
Estimated useful life in miles	1,00,000

Using above information calculate depreciation for the first 1 year under following methods: (i) Straight – line (ii) Units of activity (iii) declining – balance.

- Q8. The unadjusted trial balance of Monir Traders on December 31, 2002 follows: (35)

Monir Traders Unadjusted Trial Balance December 31, 2002		
Name of accounts	Debit (Tk.)	Credit (Tk.)
Cash	11,000	
Supplies	4,500	
Equipment	1,50,000	
Accumulated depreciation, equipment		15,000
Unearned membership fees		24,000
Notes payable		50,000
Monir's capital		58,250
Monir's withdrawals	30,000	
Fees received		90,000
Salaries expense	38,000	
Interest expense	3,750	
Total	2,37,250	2,37,250

Additional data: (a) On December 31, employees have earned Tk. 800 but unpaid. (b) The cost of supplies on hand on December 31 is Tk. 1,800. (c) The amount of unrecorded accrued interest on December 31 is Tk. 1,250. (d) An analysis of the unearned membership fees shows that Tk. 16,000 remains unearned at December 31. (e) In addition to the membership fees included in the revenue account balance, the company has earned another Tk. 12,000 in fees that will be collected on January 21. (f) Depreciation expense for the year is Tk. 15,000.

Required:

- (i) Prepare statement of comprehensive income and statement of owner's equity for this year ended December 31.
- (ii) Prepare statement of financial position as on that date.

N.B.: (i) Answer ANY THREE questions from each section in separate scripts.

(ii) Figures in the right margin indicate full marks.

Section A

- Q1. (a) Define law of demand. Why the demand curve slopes downward? Explain. (10)
 (b) How does technology and government policy affect the supply of any goods or services? (05)
 (c) If there are 10,000 identical individuals in the market for commodity X, each with a demand function is given by $Q_{dx} = 12 - 2P_x$ and 1000 identical producers of X, each with a supply function is given by $Q_{sx} = 20P_x$.
 (i) Find the market demand equation and market supply equation.
 (ii) Obtain equilibrium price and quantity.

Now, if the government decides to collect a sales tax of \$2 per unit sold, from each of the 1000 sellers of commodity X-

- (iii) What effect does this have on the equilibrium price and quantity?
 (iv) Who actually pays the tax?
 (v) What is the amount of taxes collected by the government?

- Q2. (a) Explain the idea of price-elasticity of demand, income elasticity of demand and cross price elasticity of demand. (15)
 (b) The "Nabarun corporation" is a publisher of romance novels. The corporation hired an economist to determine the demand for its product. After months of hard work the economist informed that the demand for the firm's novel is given by the following equation:

$$Q_x = 12000 - 5000P_x + 5I + 500P_c$$

where, Q_x is the demand for the firm's novel, P_x is the price charged for the novel, I is the income per capita, P_c is the price of books from competing publishers. Assume that the initial values of P_x , I and P_c are \$5, \$10,000 and \$6, respectively. Using the above information, the company's manager wants to

- (i) determine the effect of price increase would have on total revenue.
 (ii) Evaluate how sale of the novel would change during a period of rising income.
 (iii) Assess the probable impact if competing publishers raise their prices.

- Q3. (a) Define market. Write down the forms of market. (10)
 (b) Define short-run. For a given price, explain how the perfect competitive firm chooses the level of output that maximizes profit. (15)
 (c) Explain the short-down position in the short-run under perfect competition. (10)

- Q4. (a) What do you mean by fixed cost and variable cost? What are the differences between fixed cost and variable cost. (12)
 (b) What are the elements of total cost of a firm in the short run? What average cost curve generally U shaped in the short-run? (13)
 (c) What are the Internal and External economics of scale? (10)

Section B

- Q5. (a) What is basic accounting equation? What are the elements of accounting equation? (05)
- (b) Mr. Saiful established Sundarbon Travel Agency. The following transactions were completed during the month of January 2015: (30)
- 2015
- ✓ January 1 Invested Tk 80,000 cash and Tk 20,000 equipment to start the agency.
 - ✓ January 2 Paid Tk 4000 cash for January office rent.
 - ✓ January 3 Purchased office equipment for Tk 5000 cash.
 - ✓ January 4 Incurred Tk 3000 of advertising costs in the Daily Ittefaq on account.
 - ✓ January 5 Paid Tk 6000 cash for office supplies.
 - ✓ January 6 Earned Tk 75000 for service rendered: Tk 10,000 cash is received from customers and the balance of Tk 65,000 is billed to customers on account.
 - ✓ January 7 Withdraw Tk 2000 cash for personal use.
 - ✓ January 8 Paid Daily Ittefaq amount due in transaction (January 4).
 - ✓ January 9 Paid employees' salaries Tk 22000 in cash.
 - ✓ January 10 Received Tk 50,000 in cash from customers who have previously been billed in transaction (January 6).
 - ✓ January 11 Service provided on account Tk 6000.
 - ✓ January 12 Utility bill received but not yet paid Tk 500.
- Instructions: Prepare a tabular summary of the transactions, using the following column headings:
- Cash, Accounts Receivable, Supplies, Office equipment, Accounts payable and Mr. Saiful's, Capital.
- Q6. (a) What is accounting process/cycle? What are the steps of accounting cycle? (05)
- (b) Bina is a licensed CPA. During the first month of operation of her business, the following events and transactions occurred: (30)
- 2015
- ✓ January 1 Bina invested Tk 1,60,000 cash.
 - ✓ January 3 Hired a secretary-receptionist at a salary of Tk 12,000 per month.
 - ✓ January 4 Purchased Tk 3000 of supplies on account from Excellent Supply Company on account.
 - ✓ January 8 Paid office rent of Tk 4,800 cash for the month.
 - ✓ January 12 Completed a tax assignment and billed client Tk 8000 for service rendered.
 - ✓ January 13 Received Tk 7000 advance on a management consulting engagement.
 - ✓ January 18 Received cash of Tk 5,400 for service completed.
 - ✓ January 30 Paid secretary-receptionist Tk 12000 salary for the month.
 - ✓ January 31 Paid cash to Excellent Supply Company transaction (January 4).
- Required: Prepare necessary ledger accounts.
- Q7. (a) What is trial balance? What are the limitations of trial balance? (05)
- (b) What is adjustment entry? Discuss the importance of adjusting entries. (10)
- (c) From the following ledger balances of Sumon Traders, prepare a Trial Balance as on 31st December, 2016: (20)
- | | | | |
|---|-----------|--------------------------|-----------|
| Cash ----- | Tk 20,500 | Service Revenue ----- | Tk 70,000 |
| Land ----- | Tk 70,000 | Salaries expense ----- | Tk 19,000 |
| Building ----- | Tk 82,000 | Prepared Insurance ----- | Tk 2000 |
| Accumulated depreciation-building ----- | | | Tk 14,000 |
| Office expense ----- | Tk 2000 | Accounts payable ----- | Tk 33,000 |
| Interest expense ----- | Tk 500 | Capital ----- | Tk 80,000 |
| Electricity expense --- | Tk 1000 | | |

Q8. The following trial balance related to Green Trading House is as on December 31st, 2015: (35)

Green Trading House
Trial Balance as on December 31, 2015

Account Titles	Debit (Taka)	Credit (Taka)
Sales		1,80,000
Sales returns	5000	
Purchase	95,000	
Transportation-in	4000	
Stock 1-1-2015	10,000	
Wages	20,000	
Administrative expenses	25,000	
Insurance	3000	
Selling and distribution expense	10,000	
Purchase return		2,500
Drawings	10,000	
Capital		1,50,000
Land	1,20,000	
Equipment	20,000	
Accounts Receivable	15,000	
Account payable		10,000
Cash	7000	
Allowance for baddebts		1500
	3,44,000	3,44,000

Adjustments:

- (i) Ending stock is estimated to have cost Tk 8000.
- (ii) Equipment is to be depreciated by Tk 4000.
- (iii) Administrative expenses Tk 2000 is unpaid.
- (iv) Raise the allowance for baddebts to Tk 3,500.

Required:

- (a) Prepare a statement of comprehensive income for the period ended December 31, 2015.
- (b) Prepare owner's equity statement; and
- (c) Prepare a statement of Financial Position as on 31st December, 2015

Time: 3 hours

- N.B.: (i) Answer ANY THREE questions from each section in separate scripts. Full Marks: 210
(ii) Figures in the right margin indicate full marks.

Section AQ1

- (a) Define Robbins definition of Economics. Explain the basic problems of an economic organization. (07)
- (b) Explain the factors behind the downward sloping demand curve. (08)
- (c) Solve the following problems:
There are 10000 identical individuals in the market for commodity X, each with a demand function is given by $Q_{de} = 12 - 2P_x$ and 1000 identical producers of commodity X, each with a supply function is given by $Q_{su} = 20P_x$.
(i) Obtain equilibrium price and quantity.
Now, if the government decides to collect a sales tax of \$2 per unit sold from each of the 1000 sellers of commodity X,
(ii) What effect does this have on the equilibrium price and quantity?
(iii) Who actually pays the tax?
(iv) What is the amount of taxes collected by the government?

- Q2. (a) Define price-elasticity of demand. Explain various types of price-elasticities of demand with examples. (15)

- (b) What are the main determinants of price-elasticity of demand? (15)
- (c) Define Income-elasticity of demand with examples. (05)

Q3.

- (a) What do you mean by fixed cost and variable cost? What are the differences between fixed cost and variable cost? (12)
- (b) What are the elements of Total cost of a firm in the short run? What average cost curve generally U shaped in the short-run? (13)
- (c) What are the internal and external economies of sale? (10)

Q4.

- (a) Define National Income and Personal Income. Explain "Income Method" of National Income Accounting. (20)
- (b) What is GDP deflator? Why do the economists prefer real GDP as a measure of Economic well-being? Explain. (15)

Section B

- Q5.** (a) What is transaction? Discuss the characteristics of financial transactions. (10)
 (b) What is accounting cycle? Describe the steps of accounting cycle. (10)
 (c) Mr. Rafin started a business on 1st July, 2016. During the first month of operation he completed these transactions. (15)

2016, July- 1	The owner invested TK 150000 of cash in the business.
2016, July- 2	Purchased TK 5000 of office equipment paying cash of TK 2000 and the balance on account.
2016, July- 3	Purchased supplies of TK 7500 for cash.
2016, July- 4	Performed services: for cash TK 26000 and on account TK 37000.
2016, July- 5	Paid TK 15000 to accounts payable.
2016, July- 6	The owner withdrew TK 20000 cash for personal use.
2016, July- 7	The company paid TK 6500 cash for rent.
2016, July- 8	Collected cash of TK 4500 from customers on account.
2016, July- 9	Paid employee salaries of TK 39000.
2016, July- 10	Incurred utilities expense of TK 5000 on account.

(15) Required: Prepare a tabular analysis of the transactions, using the following column headings: Cash, Equipment supplies, Accounts Receivable, Accounts Payable, and Mr. Rafin's Capital.

- Q6.** (a) Define Accounting. Discuss the functions of Accounting. (10)
 (b) Describe the steps in the Accounting process. (10)
 (c) Discuss briefly the various users of Accounting data. (15)

- Q7.** (a) What is trial balance? Write down the limitation of trial balance. (08)
 (b) From the following ledger balances, prepare a trial balance as on June 30, 2016. (17)

	TK		TK
Cash &	7150	Capital &	21750
Accounts receivable &	10000	Salaries payable &	1500
Prepaid insurance &	2750	Service revenue &	14400
Supplies &	500	Rent expense &	5500
Office equipment &	15000	Depreciation expense &	1000
Accumulated depreciation-office equipment &	250	Insurance expense &	250
Accounts payable &	4500	Utilities expense &	250
Utilities payable &	150	Supplies expense &	1500
Unearned Service revenue &	1500	Advertisement expense &	150

- (c) The Accountant of M/S Attab Enterprise completed Trial Balance for the year ended 31st December 2015. The following information were subsequently revealed. (10)
- Electric charge outstanding TK 2000.
 - Outstanding wages for December TK 2500.
 - A bill of TK 3500 for purchase of supplies on 20 December not yet paid.
 - Advertisement expense for the next year amounted to TK 2000.
 - Goods purchased from Rahman on December 25 for TK 15000 but it did not yet record.

Q8.

Required: Prepare the adjusting entries at December 31, 2015.

The following trial balance was taken from the ledger of Amin Traders at the end of the accounting period. (35)

Amin Traders Trial Balance as on December 31, 2015		
Account Titles	Debit (TK)	Credit (TK)
Capital		160000
Sales		310000
Sales returns	10000	
Purchase	120000	
Purchase discount		10000
Transportation- in	10000	
Salaries expense	60000	
Rent expense	60000	
Advertisement expense	30000	
Cash	30000	
Accounts Receivable	60000	
Inventory (1-1-15)	50000	
Store Equipment	90000	
Accumulated depreciation- Store Equipment		20000
Account payable		20000
Total	520000	520000

Additional Information:

- (a) Ending inventory at December 31, 2015 TK 60000.
- (b) Estimated depreciation of store equipment. $5\% \times 4500 = 4500$ *1b*
- (c) Salaries unpaid TK 4000 for the period.
- (d) Rent prepaid TK 12000.

Required: (i) You are required to prepare a statement of comprehensive income (ii) prepare an owner's equity statement and (iii) prepare a statement of financial position as on 31st December 2015.

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(08)
(12)
(1)

N.8.: (i) Answer **ANY THREE** questions from each section in separate scripts (including question no.).
 Q8, from section B)
 (ii) Figures in the right margin indicate full marks

Section A

- Q1.** ✓ (a) Explain the concept of Economics, Microeconomics and Macroeconomics. (15)
 (b) Draw and explain a Production Possibilities Frontier for a society that produces food and clothing. Show an efficient point, an inefficient point and an infeasible point. (15)
 (c) Show the effects of a drought in your PPF. (05)
- Q2.** (a) Suppose, your demand function is $\theta_d = 20 - 5P$ and supply function is $\theta_s = 10P$. Now show the equilibrium price, equilibrium quantity and the total revenue received by producers. (15)
 (b) Now estimate the price elasticity of demand at price = 2, and price = 3. (10)
 (c) In equilibrium, show producer and consumer surplus. Explain clearly. (10)
- Q3.** (a) Discuss the characteristics of indifference curve. (10)
 (b) Explain how consumers equilibrium is determined with help of indifference curve? (15)
 (c) Suppose Honda's total cost of producing 4 cars is \$225000 and its total cost of producing 5 cars is \$250000. What is the average total cost of producing 5 cars? What is the marginal cost of the Fifth car? (10)
- Q4.** (a) In year 2010, the economy produces 100 loaves of bread that sell for \$2 each. In year 2011, the economy produces 200 loaves of bread that sell \$3 each. And in 2012 the economy produces 200 loaves of bread that sell \$4 each. Calculate Nominal GDP, Real GDP and the GDP deflator for each year. Use 2010 as the base year. (10)
 (b) By what percentage does each of these three statistics rise from one year to another? Explain clearly. (10)
 (c) Suppose GDP is \$8 trillion, Taxes is \$0.5 trillion, and Public savings is \$0.20 trillion. Assume this country is closed. Calculate consumption, Govt. purchases, National savings and investment. (15)

Section B

- Q5.** (a) What do you mean by classification of cost? Show the classification of cost with examples. (15)
 (b) The following information has been obtained from the records of ABC manufacturing concern for the period from Dec 01, 2015 to Dec 31, 2015. (20)

Description	Taka
Cost of raw materials on Dec 01, 2015	30000.00
Wages paid	450000.00
Purchase of raw materials during this month	230000.00
Factory overhead	92000.00
Opening work process on (01.12.2015)	12000.00
Closing work process on (31.12.2015)	15000.00
Stock of finished goods (01.12.2015)	60000.00
Stock of finished goods (31.12.2015)	55000.00
Closing stock of raw materials (31.12.2015)	25000.00
Selling and distribution overheads	20000.00
Sales	900000.00
Administrative overhead	30000.00

Required: Prepare a statement of cost and showing

- (i) Raw materials used, (ii) Prime cost, (iii) Production cost, (iv) Cost of goods sold and (v) Profit/Loss

- Q6. (a) What is accounting cycle? State the steps of accounting cycle. (10)
 (b) Define adjusting entries. State the importance of adjusting entries. (09)
 (c) Describe the rules of "Debit" and "Credit" of accounts. (09)
 (d) Why Ledger is called the king of all accounts? (07)
- Q7. (a) Define financial statement. Discuss its objective and importance. (10)
 (b) From the following ledger balance of Global Company, prepare a Trial Balance as on 31st December, 2015: (25)

	Taka
Cash	32000.00
Account receivable	77000.00
Prepaid insurance	2700.00
Stock (1-1-15)	86000.00
Office supplies	3000.00
Furniture & Fixture	40000.00
Accumulated depreciation- Furniture & fixture	5000.00
Notes payable	8600.00
Accounts payable	64900.00
Income Tax payable	10300.00
Capital	100000.00
Reserve fund	57900.00
Sales	880000.00
Sales return	11000.00
Sales discount	2000.00
Purchase	575000.00
Purchase return	2600.00
Transportation-in	30000.00
Salaries	164000.00
Advertising expense	32000.00
Rent expense	24000.00
Depreciation expense furniture and fixtures	4800.00
Office supplies expense	3400.00
Insurance expense	2400.00
Utilities expense	1500.00
Income Tax expense	10300.00

- Q8. The following unadjusted Trial Balance has been taken from the books of ABC Enterprises as on 31st December 2013. (35)

ABC Enterprise		
Trial Balance as on 31st December 2013		
Account Titles	Debits (TK)	Credit (TK)
Opening inventory (1-1-13)	23000.00	
Withdrawn	1000.00	
Office furniture	20000.00	
Office supplies	3000.00	
Transportation-in	6000.00	
Purchase	40000.00	
Sales discount	6000.00	
Sales		125000.00
Capital		96000.00
Account payable		15000.00
10% Bank loan (1-1-13)		50000.00
Purchase discount		4000.00
Provision for doubtful debts		4000.00
Notes payable		26000.00
Salaries expense	24000.00	
Prepaid advertising	3000.00	
Plant and machinery	110000.00	

Account Titles	Debit (TK)	Credit (TK)
Prepaid office rent	12000.00	
Miscellaneous expense	11000.00	
Notes receivable	24000.00	
Prepaid insurance	4000.00	
Interest on Bank loan	3000.00	
Cash at Bank	10000.00	
Cash in Hand	5000.00	
Accounts receivable	15000.00	
	320000.00	320000.00

Adjustments:

- (i) Closing inventory were valued TK. 22000.00.
- (ii) Bad debts written off TK. 3000.00 and make allowance for doubtful debts 10% on accounts receivable.
- (iii) Advertisement expense paid for two years.

Required:

- (a) Prepare statement of comprehensive income.
- (b) Owner's equity statement and
- (c) Statement of financial position.

N.B. i) Answer ANY THREE questions from each section in separate scripts
ii) Figures in the right margin indicate full mark.

Section A

Q1.

- (b) Define Economics? Distinguish between Microeconomics and Macroeconomics (15)
(c) Define law of Demand. What determines the quantity of a good that buyers demand? (10)
(c) Does a change in consumers taste lead to movement along the demand curve or a shift in the demand curve? Explain. (10)
- Q2.**
- (a) What is utility? Explain the relation between total utility and marginal utility. (15)
(b) What is the law of diminishing marginal utility? Discuss limitation of diminishing marginal utility. (10)
(c) Drawing up a demand curve from the law of diminishing marginal utility. (10)

Q3.

- (a) Draw the supply and demand curve for cookies. In the equilibrium, show producer and consumer surplus. (10)
(b) Explain why producing more cookies would lower total surplus (05)
(c) Tuhin buys only milk and cookies. In 2014, Tuhin earns \$100, milk costs \$2 per quart and cookies costs \$4 per dozen. Now suppose that all prices increases by 10% (percent) and Tuhin's salary increases by 100% (percent) in 2015. Now, draw Tuhin's budget constraints. How would Tuhin's optimal combination (consumer equilibrium) of milk and cookies in 2015 compare to his optimal combination in 2014. (20)

Q4.

- (a) What are differences between GDP and NDP? (08)
(b) Explain price elasticity of demand, income elasticity of demand and cross-price elasticity of demand. (12)
(c) Suppose that your demand schedule for compact discs is as follows (15)

PRICE	Quantity Demanded (Income-\$10,000)	Quantity Demanded (Income-\$12,000)
\$8	40	50
10	32	45
12	24	30
14	16	20
16	08	12

- (i) Use midpoint method to calculate your price elasticity of demand as the price of compact discs increases from \$8 to \$10 when your income is \$10,000 and \$12,000.
(ii) Calculate your income elasticity of demand as your income increases from \$10,000 to \$12,000. When the price is 12 and 16.

Section B

- Q5.**
- (a) Why Accounting is called "Language of Business"? (10)
(b) Who are the users of accounting information? Explain. (10)
(c) What is cost accounting? Discuss the difference between cost accounting and financial accounting. (15)

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- Q6:** (a) "All transactions are event but all events are not transactions". Explain (10)
 (b) Quick Carriage Company started on June 1, 2014 by Hares has the following (25)
 transactions during June.

June 1	Hares invests Tk 1,57,000 cash in the new business called Quick Carriage Company.
June 2	A truck is purchased for the business for Tk 1,36,000
June 3	Equipment is purchased on credit for Tk 10,000
June 4	A fee of Tk 1,200 for hauling goods is billed to a customer
June 5	A fee of Tk 22,300 for hauling goods is received in cash
June 6	Cash Tk 600 is received from customer who was billed in June 4
June 7	A payment of Tk 5,000 is made on the equipment purchase in June 3
June 8	Repair expense of Tk 1,700 are paid in cash
June 9	Purchased gasoline in cash Tk 900
June 10	Cash Tk 1,800 is withdrawn from business by Hares for his personal use

Required: Journalize the above transactions.

- Q7:** (a) What are the basic steps in the recording process? (10)
 (b) What purpose is served by ledger accounts? (10)
 (c) Why adjustment entries are necessary? (10)
 (d) Why both sides of Trial Balance are equal? (05)
- Q8:** Abdul Kamal is in business as a stationary merchant. From the following Trial Balance extracted from his books of accounts. You are required to prepare (a) Income statement for the year ended December 31, 2014 (b) Owner's equity statement and (c) Balance sheet as on that date: (35)

ABDUL KAMAL

Trial Balance

As on December 31, 2014

Titles of Accounts	Debit (Tk)	Credit (Tk)
Cash in hand	45,000	
Plant and Machinery	1,50,000	
Furniture and fixtures	40,000	
Withdrawal	10,000	
Capital		1,90,000
Insurance charges	1,000	
Salaries and wages	25,000	
Accounts receivable	35,000	
Inventories (1-1-14)	20,000	
Trade mark rights (10 years from 1-1-14)	40,000	
Purchases	1,70,000	
Postage and telegrams	2,000	
Bad debts	1,000	
10% Loan from Hatiz taken on (1-7-14)		65,000
Interest on loan	1,000	
Accounts payable		55,000
Sales		2,30,000
Total Tk	5,40,000	5,40,000

Adjustments:

- 1) Inventories on 31-12-2014 Tk 45,000.
- 2) Depreciate plant and machinery @ 10% and furniture & fixtures @ 5% per annum.
- 3) Invoice of the value of Tk 5,000 was recorded in the sales book on December 29, 2014, but goods were not dispatched until January 7, 2015 and were included in closing inventories.
- 4) The accounts receivable Tk 1,200 are bad and should be written-off.
- 5) Create a reserve for doubtful debts @ 5% on accounts receivable.
- 6) Goods of the value of Tk 1,000 were distributed free among customer for advertisement.

Time: 3 hours

Full Marks: 210

- N.B. i) Answer ANY THREE questions from each section including question No. 8 in separate scripts.
 ii) Figures in the right margin indicate full marks.

Section A (Economics)

- Q1.** (a) Define Economics. Distinguish between Microeconomics and Macroeconomics. (15)
 (b) Draw and explain a production possibilities frontier for an economy that produces milk and cookies. What happens to this frontier if the disease kills half of the economy's cow population? (20)
- Q2.** (a) What do you mean demand? Distinguish between demand schedule and demand curve. (13)
 (b) Why demand curve downward sloping from left to right. (10)
 (c) Draw up a demand curve from a hypothetical demand schedule? (12)
- Q3.** (a) If demand is elastic, how will an increase in price change total revenue? Explain. (15)
 (b) What is meant by a competitive firm? Draw the cost curves for a typical firm. (20)
 For a given price how a competitive firm chooses the level of output that maximizes profit.
- Q4.** (a) What is Gross Domestic product (GDP), Real GDP and GDP growth. (10)
 (b) What is inflation? What are the main causes of inflation in a country like Bangladesh. (10)
 (c) To control inflation how fiscal policy and monetary policy works? Explain. (15)

Section B (Accounting)

- Q5.** (a) Discuss the steps of Accounting Cycle. (10)
 (b) Who are the users of Accounting Information – explain. (10)
 (c) Describe the rules of "Debit" and "Cr. dit" of Accounts. (10)
 (d) Define double entry system. (05)
- Q6.** (a) What is journal? Discuss the objectives of journal. (10)
 (b) Record the following transactions in general journal of Mahim: (25)

		Tk
January 01	Cash invested as capital	2,00,000
January 02	Rent paid in cash.....	15,000
January 03	Goods purchase for cash.....	40,000
January 04	Goods sold in cash.....	30,000
January 05	Stationery goods purchase in cash.....	3,000
January 06	Goods sold on account.....	10,000
January 08	Cash received from debtor.....	10,000
January 10	Received commission in cash.....	500
January 12	Utility bill received but not paid.....	600
January 15	Salary paid to employee	8,000

- Q7. (a) Define ledger. Discuss the objectives of ledger. (08)
 (b) Write down the differences between journal and ledger. (07)
 (c) The following transactions in the books of shamim & Co. (20)

2012 July 01	Shamim introduced capital of Tk 50,000 to his business.	
July 02	Rent paid in cash.....	Tk 5,000
July 03	Purchased furniture for cash.....	Tk 10,000
July 05	Goods purchase on account.....	Tk 40,000
July 08	Goods sold in cash.....	Tk 45,000
July 10	Cash paid to creditors.....	Tk 40,000
July 13	Cash withdrawn by Shamim for his personal use..	Tk. 7,000

Required: prepare necessary ledger accounts.

- Q8. (a) What is trial Balance? Why both sides of Trial Balance are equal? (05)
 (b) What are the errors not detected by a Trial Balance? (05)
 (c) Discuss the objectives of financial statement. (05)
 (d) The following Trial Balance of M/S Momtaz & Co. has been incorrectly prepared. Redraft it correctly: (20)

M/S Momtaz & Co.
 Trial Balance
 As on 31st December 2013

Account Titles	Debit (Tk)	Credit (Tk)
Capital		80,000
Opening stock	25,000	
Discount expense		500
Commission received		700
Fixed asset		60,000
Sales	90,000	
Purchases		50,000
Purchase return		1,000
Sales return	2,000	
Carriage inward		600
Carriage outward		700
Wages	27,000	
Bills receivable	5,000	
Accounts receivable	10,000	
Bills payable		8,000
Rent receivable	3,000	
Interest paid		2,000
Cash in hand	800	
Accounts payable	6,100	
Closing stock	33,800	
Total Tk	2,03,500	2,03,500

1,865⁰⁰
1,859⁰⁰

Khulna University of Engineering & Technology
B.Sc. Engineering 1st Year 2nd Term Examination, 2011
Department of Electrical and Electronic Engineering
HUM-1203
Economics and Accounting

Full Marks: 210

Time: 3 hours

N.B. i) Answer ANY THREE questions from each section in separate scripts.
ii) Figures in the right margin indicate full marks.

(5)
(2)

Section A

- Q1. (a) Define elasticity of demand. (07)
Q2. (a) Discuss the relation of elasticity with the law of diminishing utility. (13)
(b) Why demand curve slopes downwards? Explain. (10)
(c) What is budget line? (05)
(d) What is market? What are the assumptions of a monopoly and monopolistic competition firm? (12)
(b) What is meant by external economies? How diseconomies result when a firm or industry expands? Explain. (12)
(c) How a market reaches in equilibrium in the short run under perfect competition? (11)
Discuss with assumptions.
- Q3. (a) What is monetary policy? (07)
(b) Discuss the objectives of monetary policy in the developing country like Bangladesh. (15)
(c) What are the instruments of monetary policy? Explain. (13)
- Q4. (a) Distinguish between GDP and GNP. What are the problems in calculating national income? (25)
(b) What is investment? Write down the main determinants of investment. (10)

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Section B

- Q5. (a) Discuss briefly the various users of accounting data. (10)
(b) "Bookkeeping and Accounting are the same"- do you agree? (10)
(c) What are the generally accepted accounting principles? Give an example of an accounting principle. (15)
- Q6. (a) Describe the rules of "Debit" and "Credit" of account. (05)
(b) On April 1 Reja established Reja Travel Agency. The following transactions were completed during the month: (30)
1. Invested Tk 10,000 cash to start the agency.
2. Paid Tk 400 cash for April office rent.
3. Purchased office equipment for Tk 2,500 cash.
4. Incurred Tk 300 of advertising costs in the Daily Jugantor, on account.
5. Paid Tk 600 cash for office supplies.
6. Earned Tk 9,500 for service rendered. Tk 1,000 cash is received from customers, and the balance of Tk 8,500 is billed to customers on account.
7. Withdrew Tk 200 cash for personal use.
8. Paid Daily Jugantor amount due in transaction (4).
9. Paid employee salaries Tk 2,200.
10. Received Tk 8,000 in cash from customers who have previously been billed in transaction (6).

Instruction: prepare a tabular analysis using the following column headings:
Cash, Accounts Receivable, Supplies, Office Equipment, Accounts payable and Reja's Capital.

- Q7. (a) What is the basic accounting equation? Explain its elements.
 (b) The following data are collected from the books of Afzal Advertising:
1. Supplies on hand at December 31, total Tk 1,500 (trial balance shown a debit balance of supplies account Tk 5,000)
 2. Expired insurance for the year Tk 1,000
 3. Service provided but unbilled Tk 2,500 at December 31.
 4. Interest of Tk 400 accrued on notes payable for the year.
 5. Tk 1,100 of the unearned fees has been earned.
 6. Accrued salaries at December 31 are Tk 2,000.
 7. Repairs to automobiles of Tk 600 have been incurred but bills are unpaid (use accounts payable)
 8. Automobile depreciation is Tk 2,000 for the year.

Instruction: prepare the adjusting entries for the items above.

- Q8. (a) Choudhury Shop began the current year with Tk 36,585 of capital. The following trial balance was taken from its ledger at the end of the year.

Choudhury Shop
Trial Balance as on 31/12/2011

Account Titles	Debit (Tk)	Credit (Tk)
Cash	3,350	
Inventory opening	20,760	
Store supplies	575	
Office supplies	450	
Prepaid insurance	935	
Store equipment	22,410	
Accumulated Depreciation - store equipment		3,120
Office equipment	5,210	
Accumulated depreciation - office equipment		1,130
Accounts payable		895
Choudhury, Capital		36,585
Choudhury, Drawings	12,000	
Sales		1,81,240
Sales returns	510	
Purchases	1,12,650	
Purchase discount		1,830
Freight - in	670	
Sales salaries	19,140	
Rent expense	9,000	
Office salaries expense	12,540	
Utilities expense	4,600	
Total Tk	2,24,800	2,24,800

Instructions: Using the following information prepare income statement, owner's equity statement and Balance sheet as on 31/12/2011

- i) Ending inventory Tk 21,115.
- ii) Store supplies on hand Tk 135 and office supplies on hand Tk 50.
- iii) Expired insurance Tk 780.
- iv) Estimated depreciation for the year on store equipment Tk 1,515 and on office equipment Tk 51.

1,7495

Khulna University of Engineering & Technology
B.Sc. Engineering 1st Year 2nd Term Examination, 2010
Department of Electrical and Electronic Engineering
HUM-1203
Economics & Accounting

Time: 3 hours

Full Score: 210

- N.B. i) Answer ANY THREE questions from each section in separate scripts.
ii) Figures in the right margin indicate full score.

Section A

- Q1. (a) Define law of demand. Why the demand curve slopes downward right? (10)
(b) What is meant by price elasticity of demand? Calculate price elasticity of demand on a linear demand curve. (13)
(c) Define equilibrium. Explain market equilibrium with numerical example. (12)
- Q2. (a) What is production and production function? (10)
(b) Explain the law of variable factors of production. (25)
- Q3. (a) What is inflation? What are the main types of inflation? (10)
(b) Write down the various causes of inflation in a country like Bangladesh. (15)
(c) What is meant by GNP, GDP, NNP and GNP deflator? (10)
- Q4. (a) Discuss the various concept of cost. (10)
(b) Write short notes: i) Total cost (TC), ii) Average cost (AC), Marginal cost (MC), iii) Average fixed cost, iv) Average variable cost. (16)
(c) Why shortrun average cost curve U shaped? (09)

Section B

- Q5. (a) Discuss briefly the various users of accounting data (10)
(b) "Book keeping and Accountancy are the same" – do you agree? Explain. (10)
(c) What are the generally accepted accounting principles? Give an example of an accounting principle. (15)
- Q6. (a) Write down the difference between journal and ledger. (09)
(b) Mr. Rafin started his own consulting firm, Rafin consulting on July 1, 2010. The following transactions occurred during the month of July. (26)

2010	Rafin invested Tk 80,000 cash in the firm.
July 1	
July 2	Paid Tk 8,000 for office rent for the month.
July 3	Purchased Tk 1,500 of supplies on account.
July 4	Paid Tk 500 to advertise in the Daily Ittefaq.
July 5	Received Tk 10,000 cash for service provided.
July 6	Withdrew Tk 2,000 cash for personal use.
July 8	Performed Tk 13,300 of service on account.
July 11	Paid Tk 6,000 for employee salaries.
July 12	Paid for the supplies purchased on account on July 3.
July 13	Received a cash payment of Tk 10,000 for service provided on account on July 8. T.A.C.U.
July 14	Borrowed Tk 10,000 from the Bank on a note payable.
July 15	Purchased office equipment for Tk 20,000 on account.
July 16	Paid utilities expense Tk 750.

Required: Journalize the above transactions.

QUICK PHOTOSHOT

- Q7. Mr. Mahim is an Architect. During April 2010 he completed the following (35) transactions:

2010 April 1	He invested Tk 100,000 in cash.
April 3	Paid office rent Tk 4,000 in cash.
April 8	Purchased office supplies in cash Tk 6,000.
April 10	Paid Tk 3,000 to advertise in the local news paper.
April 12	Received Tk 15,000 for service provided.
April 20	Completed Architectural work on account Tk 60,000.
April 29	Paid Tk 10,000 for utilities expenses.
April 30	Withdrew Tk 18,000 for personal use.

Cash
 Capital
 Rent
 Purchase
 Advertising
 Income
 Accrual
 Utilities
 Withdrawal

Required: Prepare necessary ledger accounts.

- Q8. From the following trial balance of Khulna Community Center, prepare an income statement, owner's equity statement and a balance sheet as on 31st December 2009: (35)

KHULNA COMMUNITY CENTER
Trial Balance
As on 31st December, 2009

Account Title	Debit (Tk)	Credit (Tk)
Cash	65,000	
Prepaid advertising	15,000	
Prepaid rent	60,000	
Land	3,75,000	
Building	3,78,000	
Equipment	90,000	
Accumulated depreciation - Building		33,600
Accumulated depreciation - Equipment		48,000
Notes payable		4,70,000
Accounts payable		8,500
Capital		3,76,000
Drawing	10,100	
Revenue from hire		87,000
Salaries expense	21,250	
Light and power expense	8,750	
Total:	10,23,100	10,23,100

QUICK PHOTOSHOP

Other data:

- i) During December Tk 12,000 of prepaid advertisement expenses was used up. 3k Prepaid
- ii) Depreciation expense: on the building Tk 1,050 in December and on the equipment Tk 1,500.
- iii) Prepaid rent expired during the period of Tk 40,000.

Khulna University of Engineering & Technology
B. Sc. Engineering 1st Year 2nd Term Examination, 2009
Department of Electrical and Electronic Engineering
HUM 1203
Economics and Accounting

Time: 3 hours

Full Marks: 210

- N.B.: (i) Answer ANY THREE questions from each section **including question No. 4 from section A** in separate scripts
(ii) Figures in the right margin indicate full marks

Section A

- Q1. (a) What do you mean by event? (05)
(b) What is transaction (explain with an example)? (10)
(c) State characteristics of business transaction. (10)
(d) All transactions are event but all events are not transaction- explain. (10)
- Q2. (a) Define ledger. Distinguish between Journal and ledger. (10)
(b) What is trial balance? Why both sides of trial balance are equal? (15)
(c) What is liabilities? Describe each type of liabilities. (10)
- Q3. Soab Akter started North-South Transport Company on January 1, 2004. During the month the transport company completed the following transaction:
Jan 1 Invested cash in his business Tk 15,00,000
,, 1 Motor lorry purchased from Progati motors Tk 10,00,000
(Cash paid Tk 7,00,000 and on account for the remaining balance)
Jan 1 His private furniture amounted to Tk 10,000 transfer to his office
Jan 2 Office equipment purchased from Otobi equipment Tk 12,000 (on account)
Jan 3 purchased one computer for Tk 20,000
Jan 4 Paid office rent Tk 4,000
Jan 5 Cash paid for January 2 transactions.
Jan 17 Transport service revenue received in cash Tk 10,000.
Jan 18 Transport service completed to "X" company but not received Tk 10,000.
Jan 22 Paid electric bill Tk 3,000
Jan 23 Paid advertisement expense Tk 500.
Jan 25 Cash received from "X" company.
Jan 30 Paid Tk 2,000 for employee's salaries.
Jan 30 Withdraw Tk 5,000 for personal use.
Required: Record the transaction in general journal.

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- Q4. (a) Why both sides of a balance sheet are equal? (05)
 (b) The trial Balance of Reja and Sons as of the end of June 30, 2009: (30)

Reja and Sons
Trial Balance
June 30, 2009

Account Titles	Debit Balance (Tk.)	Credit Balance (Tk.)
Cash	38,000	
Repair supplies	20,000	
Equipment	1,50,000	
Accumulated depreciation equipment		10,000
Prepaid insurance	12,000	
Capital		1,15,000
Service revenue earned		4,00,000
Wages expenses	2,15,000	
Rent expenses	90,000	
Total	5,25,000	5,25,000

Adjustments:

- (i) Prepaid insurance expired during the period Tk. 8,000.
- (ii) Unused repair supplies on June 30, 2009 Tk. 3,000.
- (iii) Depreciation on equipment was Tk. 22,000.
- (iv) Salaries accrued but not paid Tk. 6,000.

Required:

- (a) Prepare an income statement for the period June 30, 2009
- (b) Prepare owner's equity statement and
- (c) A balance sheet as on June 30, 2009.

Section B

- Q5. (a) What is economics? Why do you study economics being a student of engineering? (10)
- (b) Distinguish between micro and macro economics. (10)
- (c) Why is "what to produce" a problem in every economy? How does the mixed enterprise economy solve this problem? (15)
- Q6. (a) What is price-elasticity of demand? Explain various types of price-elasticity of demand. (15)
- (b) Explain income elasticity and cross-price elasticity of demand. (10)
- (c) Price-elasticity of demand varies along a linear demand curve. Explain. (10)
- Q7. (a) Define market. Write down the form of market. (10)
- (b) What are the characteristics of perfect competition market? (05)
- (c) Explain the equilibrium of a firm in the short run under perfect competition. (20)
- Q8. (a) Define inflation. What are the various types of inflation? (15)
- (b) What is project evaluation? Explain the cost-benefit analysis of a project. (20)