

Time allowed- 3:30 hours

Total marks- 100

[N.B. - The figures in the margin indicate full marks. Questions must be answered in English. Examiner will take account of the quality of language and of the manner in which the answers are presented. Different parts, if any, of the same question must be answered in one place in order of sequence.]

Marks

1. Hewlett-Packard (HP) shocked the business world when its former CEO announced that rival computer maker Compaq had agreed to be acquired by HP. The announcement came at the end of a year in which slumping demand and strong competition from Dell had buffeted both companies. The merged company would have annual revenues of about \$87.4 billion, putting it in the same league as IBM, and would be able to provide customers with a full range of computer products and services. With the exception of printers, in which HP is the market leader, there was significant product overlap between HP and Compaq.

To justify the acquisition, the CEO of HP claimed that it would yield a number of benefits. First, there would be significant cost savings. Some \$2.5 billion per year would be taken out of annual expenses by eliminating redundant administrative functions and laying off 15,000 employees. In addition, combining the PC businesses of HP and Compaq would enable HP to capture significant scale economies and compete more efficiently with Dell. The same would be true in the computer server and storage businesses, areas in which Dell was gaining share. Critics, however, were quick to point out that Dell's competitive advantage was based on its cost-leadership business model that was based on the efficient management of its supply chain—an area in which both HP and Compaq lagged behind Dell. Although achieving economies of scale is desirable, would the merger allow HP to reduce its cost structure, such as by increasing its supply-chain efficiency? If HP could not change its PC business model to match Dell's low costs, then the merger would not provide any real benefit.

In addition to the cost advantages of the merger, the CEO argued that the acquisition would give HP a critical mass in the computer service and consultancy business, in which it significantly lagged behind leader IBM. By being able to offer customers a total solution to their IT needs, both hardware and services, the CEO argued that HP could gain new market share among corporate clients, who would now buy its PCs as part of the total "computer package"; moreover, HP would be entering the higher-margin service business. Here, too, however, critics were quick to perceive flaws. They argued that HP would still be a minnow in the service and consultancy area, with less than 3% of the market share.

In 2005, HP announced that it had achieved its cost savings target and that it was continuing to find ways to reduce the duplication of resources in the merged company. However, it also announced that Dell's entry into the printer business had hurt its profit margins, and the profit margins on the sales of its PCs were still well below those obtained by Dell. HP's stock price plunged, and its board of directors reacted by firing the CEO and bringing in a new CEO, Mark Hurd, a person with proven skills in managing a company's cost structure. Hurd initiated another round of cost reductions by pruning HP's product line and workforce. In Spring 2006, the company astounded analysts when it announced much higher profit margins on its sales of PCs and higher profits across the company. Many strategies of the HP CEO had begun to pay off; HP's PCs were much more attractive to customers, and Dell's foray into printers had not proved highly successful against market leader HP. Neither had Dell's entry into other electronics industries, such as MP3 players, televisions, and so on.

The result was that competitive advantage in the PC industry seemed to be moving away from Dell and toward HP. As a result, Dell has been forced to find ways to increase its level of differentiation to increase the attractiveness of its machines and so defend its position against HP and Apple. Dell bought the upscale PC maker Alienware in one move to increase differentiation; it also entered into the physical retailing industry when it opened Dell PC stores in major shopping malls, imitating Apple's strategy. And to find more cost savings, Dell also began to use AMD's cheaper chips and broke its long-term exclusive tie to Intel to find more cost savings. Analysts worry these moves will increase its cost structure, and the battle has heated up in the PC industry as Dell, HP, and Apple work to find new ways to lower costs and differentiate their products to increase their profitability and ROIC.

Requirements:

- a) What kind of corporate-level strategies did HP and Dell pursue to strengthen their multibusiness models?

- b) What are the advantages and disadvantages associated with these strategies? 4
- c) What alternative strategies could they apply other than acquisition? Mention them with advantages and disadvantages. 4

2. The CEO of HOBBY Company, a bird-seed company is about to convene its board meeting. The company started operation in 2000. In the initial years, it was very successful with high-quality supplies and good relationships with suppliers. The number of suppliers was not abundant but it could tap reliable suppliers. The company charged a high price and customers considered it worthy. It sold a wide variety of seeds packaged to meet the varied needs of the customers. The company was growing fast with the highest quality and highest-margin ingredients.

After 10 years of operation, it went public in 2010 with an initial public offering (IPO). In the year before, it recorded annual sales of Taka 150 million and an annual profit of Taka 7.5 million. IPO offering resulted in further growth. Growth expanded geographically and to retailers resulting an additional Taka 75 million in sales in 2020 with more than 20% market share as the dominant player in the industry.

However, global recession and ageing customers led to a decline in demand since 2007. Subsequent generations are less interested in this kind of hobby. This industry saw its product as a commodity type with less room for differentiation resulting into high competition. Besides, new smaller competitors entered with unique and different products. Some large companies reduced quality to reduce costs and acquire more market share. Since 2022, the company has been passing bad times with negative profits.

The board is expecting the CEO to present strategic alternatives to restore its profitability and stock price in the future.

Requirements:

- a) As the CEO, prepare the alternative strategic scenarios for presenting to the board. 3
 - b) What are the pros and cons of each scenario? 6
3. MGM Limited is one of the biggest removal companies in Bangladesh, offering home and business removals. It has a number of long-term contracts with large businesses, although it has not won any new major contracts in the last two years. MGM Limited is listed on Bangladesh's stock market. MGM Limited is financed by a mixture of equity and short and long-term debt, but its gearing level is below the average for its sector.

MGM Limited has four executive directors, who each own 20% of the company's share capital, with the other 20% owned by external shareholders. MGM Limited has paid a constant dividend since it has been listed and its share price has risen slightly over the last three years.

MGM Limited is based in a number of the large cities and towns in Bangladesh and owns the majority of the sites where it is located. Many of its employees have worked for the company for a long time. Drivers of the lorries used by MGM Limited are required to have a special, heavy vehicles licence. Salary levels at MGM Limited are relatively high compared with other companies in the sector.

TDCL Company (TDCL Co)

MGM Limited is currently considering making a bid for TDCL Co, an unlisted company specialising in distribution and delivery services. TDCL Co is owned 100% by its founder, Chanchal Chowdhury. TDCL Co has built up a portfolio of small contracts over time. It has made unsuccessful bids for two larger contracts over the last 12 months, the bids being rejected primarily because TDCL Co was not felt to be big enough to be able to guarantee the level of service required.

TDCL Co is based in many of the same cities and towns where MGM Limited is located, although TDCL's premises are all rented. The drivers of TDCL's vehicles do not require a heavy vehicles licence. TDCL Co has a few long-serving employees who are mostly centre managers. Most of its drivers and staff, however, stay at TDCL Co for only a short time. Salary levels are low, although TDCL Co pays high levels of overtime and high bonuses if target profit levels are achieved. TDCL Co is highly geared, leading to recent media speculation about its financial viability.

Terms of bid for TDCL Company

In initial discussions about the acquisition, Chanchal Chowdhury -TDCL Director indicated that he would prefer the consideration to be a share-for-share exchange, the terms being one TDCL Co share for five MGM Limited shares.

TDCL Co has 2 million Tk.1 shares in issue, and MGM Limited has 50 million Tk.0.50 shares in issue. Each MGM Limited share is currently trading at Tk.6.50, which is a multiple of 8 of its free cash flow to equity. The multiple of 8 can be assumed to remain unchanged if the acquisition takes place. TDCL Co's free cash flow to equity is currently estimated at Tk.7 million, with an expected annual growth rate of 3%, and it is expected to generate a return on equity of 15%.

Chanchal Chowdhury expects that the total free cash flows to equity of the combined company will increase by Tk.5 million due to synergy benefits. He believes that MGM Limited will be able to win more contracts because it is larger and because it will be diversifying the services which it offers. He also believes that significant operational synergies can be achieved, pointing out the time MGM Limited drivers spend idle during the winter months when removal activity is traditionally lower. Chanchal Chowdhury believes that he can achieve the synergies if he is given management responsibility for the operational reorganisation, including dealing with the staff employment and retention issues. Chanchal Chowdhury thinks that synergies could also be achieved in central administration and in premises costs.

The chief executive and the finance director of MGM Limited are in favour of bidding for TDCL Co. However, one of the other executive directors is opposed to the bid. He is sceptical about the level of synergies which can be achieved and does not want Chanchal Chowdhury of TDCL to be brought into the management of MGM Limited. He suggests that if the bid is to go ahead, it should be a cash offer rather than a share exchange. MGM Limited's chief executive has responded that Chanchal Chowdhury is likely to ask for a higher equivalent price if the purchase is for cash.

Requirements:

- a) Estimate the equity value of the combined company and the expected additional value arising from the combination of MGM Limited and TDCL Company. 6
 - b) Estimate the share of the gain from the combination created for Chanchal Chowdhury and the share of the gain created for MGM Limited's shareholders and comment on your results. 6
 - c) Evaluate how reliable the estimates of the synergies for the combined company are likely to be and discuss the factors which may prevent the forecast synergies from being achieved. 3
4. You are appointed by Edward Thames Ltd., a foreign company and you are based in the company Head Office in France which uses Euro (€) as its base currency. It also has a few subsidiary companies around the world.

Edward Thames, a large listed company, which manufactures agricultural machines and equipment for different markets around the world. Edward Thames's treasury division is considering how to approach the following three cases of foreign exchange exposure that it faces.

Case One

Edward Thames regularly trades with companies based in Zuhait, a small country in South America whose currency is the Zupesos (ZP). It recently sold machinery for ZP140 million, which it is about to deliver to a company based there. It is expecting full payment for the machinery in four months. Although there are no exchange traded derivative products available for the Zupesos, Medes Bank has offered Edward Thames a choice of two over-the-counter derivative products.

The first derivative product is an over-the-counter forward rate determined on the basis of the Zuhait base rate of 8.5% plus 25 basis points and the French base rate of 2.2% less 30 basis points.

Alternatively, with the second derivative product Edward Thames can purchase either Euro call or put options from Medes Bank at an exercise price equivalent to the current spot exchange rate of ZP142 per €1. The option premiums offered are: ZP7 per €1 for the call option or ZP5 per €1 for the put option.

The premium cost is payable in full at the commencement of the option contract. Edward Thames can borrow money at the base rate plus 150 basis points and invest money at the base rate minus 100 basis points in France.

Case Two

Namesco Ltd. is Edward Thames's subsidiary company based in Bangladesh, a small country in Asia, whose currency is the Bangladeshi Taka (BDT). The current pegged exchange rate between the Bangladesh Taka and the Euro is BDT35 per €1. Due to economic difficulties in Bangladesh over the last couple of years, it is very likely that the Bangladesh Taka will devalue by 20% imminently.

Namesco Ltd. is concerned about the impact of the devaluation on its Statement of Financial Position. Given below is an extract from the current Statement of Financial Position of Namesco Ltd.

	BDT '000
Non-current assets	179,574
Current assets	146,622
Total assets	<u>326,196</u>
Share capital and reserves	102,788
Non-current liabilities	132,237
Total capital and liabilities	<u>326,196</u>

The current assets consist of inventories, receivables and cash. Receivables account for 40% of the current assets. All the receivables relate to sales made to Edward Thames in Euro. About 70% of the current liabilities consist of payables relating to raw material inventory purchased from Edward Thames and payable in Euro. 80% of the non-current liabilities consist of a Euro loan and the balance are borrowings sourced from financial institutions in Bangladesh.

Case Three

Edward Thames manufactures a range of farming vehicles in France which it sells within the European Union to countries which use the Euro. Over the previous few years, it has found that its sales revenue from these products has been declining and the sales director is of the opinion that this is entirely due to the strength of the Euro. Edward Thames's biggest competitor in these products is based in the USA and US\$ rate has changed from almost parity with the Euro three years ago, to the current value of US\$1.47 for €1. The agreed opinion is that the US\$ will probably continue to depreciate against the Euro, but possibly at a slower rate, for the foreseeable future.

Required:

- a) Explain briefly the type of currency exposure Edward Thames faces for each of the above cases. 2
 - b) Recommend which of the two derivative products Edward Thames should use to manage its exposure in case one and advise on alternative hedging strategies that could be used. Show all relevant calculations. 4
 - c) Compute the gain or loss on Namesco Ltd.'s Statement of Financial Position, due to the devaluation of the Bangladesh Taka in case two, and discuss whether and how this exposure should be managed. 4
5. BD Lamps Ltd., a listed company which manufactures electronic components, is interested in acquiring Hyco Electronics Ltd., an unlisted company involved in the development of sophisticated but high-risk electronic products. The owners of Hyco Electronics Ltd. are a consortium of private equity investors who have been looking for a suitable buyer for their company for some time.

BD Lamps Ltd. estimates that a payment of the equity value plus a 25% premium would be sufficient to secure the purchase of Hyco Electronics Ltd. BD Lamps Ltd. would also pay off any outstanding debt that Hyco Electronics Ltd. owed. BD Lamps Ltd. wishes to acquire Hyco Electronics Ltd. using a combination of debt finance and its cash reserves of Tk.20 million, such that the capital structure of the combined company remains at BD Lamps Ltd.'s current capital structure level.

Information on BD Lamps Ltd. and Hyco Electronics Ltd.

BD Lamps Ltd. has a market debt to equity ratio of 50:50 and an equity beta of 1.18. Currently BD Lamps Ltd. has a total firm value (market value of debt and equity combined) of Tk.140 million.

HycO Electronics Ltd., Statement of profit or loss extracts for the year ended 30 June

All amounts are in Tk.000

	2022	2021	2020	2019
Sales revenue	16,146	15,229	14,491	13,559
Operating profit (after operating costs and tax allowable depreciation)	5,169	5,074	4,243	4,530
Net interest costs	489	473	462	458
Profit before tax	4,680	4,601	3,781	4,072
Taxation (28%)	1,310	1,288	1,059	1,140
After tax profit	3,370	3,313	2,722	2,932
Dividends	123	115	108	101
Retained earnings	3,247	3,198	2,614	2,831

HycO Electronics Ltd. has a market debt to equity ratio of 10:90 and an estimated equity beta of 1.53. It can be assumed that its tax allowable depreciation is equivalent to the amount of investment needed to maintain current operational levels. However, HycO Electronics Ltd. will require an additional investment in assets of 22c per Tk.1 increase in sales revenue, for the next four years. It is anticipated that HycO Electronics Ltd. will pay interest at 9% on its future borrowings.

For the next four years, HycO Electronics Ltd.'s sales revenue will grow at the same average rate as the previous years. After the forecasted four-year period, the growth rate of its free cash flows will be half the initial forecast sales revenue growth rate for the foreseeable future.

Information about the combined company

Following the acquisition, it is expected that the combined company's sales revenue will be Tk.51,952,000 in the first year, and its profit margin on sales will be 30% for the foreseeable future. After the first year the growth rate in sales revenue will be 5.8% per year for the following three years. Following the acquisition, it is expected that the combined company will pay annual interest at 6.4% on future borrowings.

The combined company will require additional investment in assets of Tk.513,000 in the first year and then 18 paisa per Tk.1 increase in sales revenue for the next three years. It is anticipated that after the forecasted four-year period, its free cash flow growth rate will be half the sales revenue growth rate. It can be assumed that the asset beta of the combined company is the weighted average of the individual companies' asset betas, weighted in proportion of the individual companies' market value.

Other information

The current annual government base rate is 4.5% and the market risk premium is estimated at 6% per year. The relevant annual tax rate applicable to all the companies is 28%.

TEL Electronics Co.'s interest in BD Lamps Ltd.

There have been rumours of a potential bid by TEL Electronics Co. Ltd. to acquire BD Lamps Ltd. Some financial press reports have suggested that this is because BD Lamps Ltd.'s share price has fallen recently. TEL Electronics Co. Ltd. is in a similar line of business as BD Lamps Ltd. and until a couple of years ago, TEL Electronics Co. Ltd. was the smaller company. However, a successful performance has resulted in its share price rising, and TEL Electronics Co. Ltd. is now the larger company.

The rumours of TEL Electronics Co. Ltd.'s interest have raised doubts about BD Lamps Ltd.'s ability to acquire HycO Electronics Ltd. Although TEL Electronics Co. Ltd. has made no formal bid yet, BD Lamps Ltd.'s board is keen to reduce the possibility of such a bid. The Chief Financial Officer has suggested that the most effective way to reduce the possibility of a takeover would be to distribute the Tk.20 million in its cash reserves to its shareholders in the form of a special dividend. HycO Electronics Ltd. would then be purchased using debt finance. He conceded that this would increase BD Lamps Ltd.'s gearing level but suggested it may increase the company's share price and make BD Lamps Ltd. less appealing to TEL Electronics Co. Ltd.

Requirements:

Prepare a report to the Board of Directors of BD Lamps Ltd. that:

- Evaluates whether the acquisition of HycO Electronics Ltd. would be beneficial to BD Lamps Ltd. and its shareholders. The free cash flow to firm method should be used to estimate the values of HycO Electronics Ltd. and the combined company assuming that the combined company's capital structure stays the same as that of BD Lamps Ltd.'s current capital structure. Include all relevant calculations.

- b) Discusses the limitations of the estimated valuations in part (a) above. 2
- c) Estimates the amount of debt finance needed, in addition to the cash reserves, to acquire Hyco Electronics Ltd. and concludes whether BD Lamps Ltd.'s current capital structure can be maintained. 3
- d) Explain the implications of a change in the capital structure of the combined company, to the valuation method used in part (a) and how the issue can be resolved. 4
- e) Assesses whether the Chief Financial Officer's recommendation would provide a suitable defence against a bid from TEL Electronics Co. Ltd. and would be a viable option for BD Lamps Ltd. 4

6. Samsung Ltd is a locally incorporated foreign company which manufactures machinery for industrial use and has a year end of 31 December 2022. The Board of Directors (BOD) appointed your firm as an adviser. You are the Manager of the engagement partner of the firm. The BOD of Samsung Ltd require advice on the following matters with reference to relevant International Financial Reporting Standards (IFRS):

- i) Samsung Ltd acquired a cash-generating unit (CGU) several years ago but, at 31 December 2022, the directors of Samsung Ltd were concerned that the value of the CGU had declined because of a reduction in sales due to new competitors entering the market. At 31 December 2022, the carrying amounts of the assets in the CGU before any impairment testing were:

	Amount in million Tk.
Property, Plant and Equipment (PPE)	40
Goodwill	12
Other assets	76
	128

- ii) The fair values of the Property, Plant and Equipment and the other assets at 31 December 2022 were BDT40 million and BDT68 million respectively and their costs to sell were BDT400,000 and BDT1,200,000 respectively. The CGU's cash flow forecasts for the next five years are as follows:

Date year ended	Pre-tax cash flow Amount in million Tk.	Post-tax cash flow Amount in million Tk.
31 December 2023	32	20
31 December 2024	28	20
31 December 2025	20	12
31 December 2026	12	6
31 December 2027	52	40

- iii) The pre-tax discount rate for the CGU is 8% and the post-tax discount rate is 6%. Samsung Ltd has no plans to expand the capacity of the CGU and believes that a reorganisation would bring cost savings but, no plan has been approved. The directors of Samsung Ltd need advice as to whether the CGU's value is impaired. The following extract from a table of present value factors has been detailed below:

Year	Discount rate 6%	Discount rate 8%
1	0.9434	0.9259
2	0.8900	0.8573
3	0.8396	0.7938
4	0.7921	0.7350
5	0.7473	0.6806

Requirement:

You are required to assist to the partner to advice the BOD of Samsung Ltd on how the above matters should be accounted for in its financial statements as at 31 December 2022. 10

7. The former CFO of ABC company was charged by the SEC with improper earnings management during 2015-2017. The CFO is accused of reporting inflated EPS without following appropriate accounting principles. The data analytics report of the SEC investigation team reports that the improper earnings management aimed to improve the presentation of profits and financial performance. He failed to properly document the basis for adjustments and thus violated financial reporting, books and records, and internal control provisions.

Requirements:

- a) Explain the concept of improper earnings management with an example. 2
- b) What are the motivations for improper earnings management? 2

- c) What do you understand by “gray area” in financial reporting? Give an example. 2
- d) Mention the key distinctions between financial fraud and a gray area in financial reporting. 2
- e) How can internal control of a listed company be improved to prevent improper earnings management? 2

8. a) Enam Private Company Ltd has been operating in the manufacturing sector for over a decade. One of its major products is manufacturing equipment, which can reduce toxic emissions in the production of chemicals. The company recently employed a new marketing manager who introduced a series of marketing initiatives. This has resulted in significant growth for the company since the appointment of the marketing manager. One of the initiatives is the warranties that the company gives to its customers. The company guarantees its products for three years, and if problems arise within the period, it undertakes to fix them or provide a replacement for the product.

You are the Senior Manager recently engaged by Audit Consultant responsible for Enam Private Company Ltd.’s audit. You are performing the final review as required by **ISA 520 Analytical procedures** for the audit and have come across the following issues.

Receivable balance due from Abu Company Ltd.

Enam Private Company Ltd has a material receivable balance due from a customer named Abu Company Ltd. During the year-end audit, your team reviewed the ageing of this balance and found that no payments had been received from Abu Company Ltd for over eight months. Enam Private Company Ltd, however, would not allow this balance to be included in the list of balances to be circulated. Instead, management has assured your team that they will provide a written representation confirming that the balance is recoverable.

Warranty provision

The warranty provision included in the statement of financial position is material. The audit team has performed testing over the calculations and assumptions, which are consistent with prior years. The team has requested a written representation from management confirming the basis and amount of the provision. Management is yet to confirm acceptance of the need to issue this representation.

Requirements:

For each of the two issues above:

- i) Evaluate the appropriateness of written representations as a form of audit evidence. 4
 - ii) Describe TWO (2) additional procedures the auditor should perform to conclude the balances to be included in the financial statements. 4
- b) Manufacturing companies in many countries are often criticized for unethical labour issues, such as hiring children, paying low wages and maintaining unhealthy working environments. Sometimes, customers globally also question the company initiatives that harm the environment through production operations. However, companies claim that they abide by laws and act ethically.

Requirement:

Explain why the argument that “anything legal is ethical” is insufficient. 2

---The End---