GROUP - IV (SYLLABUS 2016)

SUGGESTED ANSWERS TO QUESTIONS

DECEMBER-2019

Paper-19: COST AND MANAGEMENT AUDIT

Time Allowed: 3 Hours Full Marks: 100

The figures in the margin on the right side indicate full marks.

All Sections are compulsory. Each Section contains instructions regarding the number of questions to be answered within the Section.

All working notes must form part of the answer

Wherever necessary, candidates may make appropriate assumptions and clearly state them.

Section-A (20 Marks)

Section-A contains Question Number 1. All parts of this question are compulsory.

 (a) Choose the correct option from amongst the four alternatives given (1 mark is for the correct

choice and 1 mark for justification/workings):

2×10=20

- (i) SHYAN LTD. has a machine of productive capacity of 1500 unit per hour. It runs 3 shifts with 1 weekly off and 12 holidays per year, each shift has one hour stoppage due to lunch, change shift etc. Maintenance is done in running time. The Normal Capacity of the plant as per CAS-2 will be
 - (A) 131.40 lakh units
 - (B) 94.815 lakh units
 - (C) 108.36 lakh units
 - (D) None of the above

- (ii) BORS & Co., a firm of Cost Accountants was appointed as Cost Auditor of PANTEX LTD on 31.07.2018 for auditing the cost records for the FY 2018-19. The Auditor appointed as such shall continue in such capacity upto
 - (A) 31.07.2019, on expiry of one year of appointment.
 - (B) 30.09.2019, on expiry of six months from close of accounts.
 - (C) 30.08.2019, date of submission date of Cost Audit Report.
 - (D) 15.09.2019, date of holding of Annual General Meeting of PANTEX LTD.
- (iii) Which one of the following KPI (Key Performance Indicator) is used to measure efficiency of manufacturing performance?
 - (A) Production per Machine Hour
 - (B) Operating Cycle of Materials turnover
 - (C) Material as % of Total Cost
 - (D) % of idle time to total available time
- (iv) The consumer service audit critically examines:
 - (A) Outstanding payment of consumers.
 - (B) Price consumers are ready to pay for particular product/service.
 - (C) And appraise management of business enterprise of responsibility towards consumers.
 - (D) Demand of a product by consumers.
- (v) "Related Party" with relation to a party means
 - (A) a Director or his relative.
 - (B) a Key Managerial Person or his relative.
 - (C) a firm, in which a Director, Manager or his relative is a partner.
 - (D) Either or all of the above
- (vi) Once the instance document is successfully validated from the tool, the next step is to
 - (A) download XBRL validation tool.
 - (B) pre-scrutinize the validated instance document.
 - (C) convert to human readable format and verify correctness of the instance document.
 - (D) attach instance document to the Form CRA-4.

- (vii) The Bureau of Energy Efficiency is formed under
 - (A) The Electricity Act, 2003
 - (B) The Energy Conservation Act, 2001
 - (C) The Electricity (Supply) Act, 1948
 - (D) The Electricity Regulatory Commission Act, 1998
- (viii) The knowledge of Entity's Internal Control is to be understood by the Cost Auditor as required by
 - (A) Cost Auditing Standard 101
 - (B) Cost Auditing Standard 102
 - (C) Cost Auditing Standard 103
 - (D) Cost Auditing Standard 104
- (ix) Profit Reconciliation of the company as a whole is dealt in
 - (A) Part D para 2 of the Annexure to Cost Audit Report.
 - (B) Part C para 1 of the Annexure to Cost Audit Report.
 - (C) Form of the Cost Audit Report.
 - (D) Part A para 1 of the Annexure to Cost Audit Report.
- (x) The following details relating to MENG LTD are given:

	₹
Royalty paid on Units produced	25,000
Hire charges on Equipment	20,000
Design Charges	18,000
Software Development Charges for Production	22,000

What will be the Direct Expenses of the Company (as per CAS-10)?

- (A) ₹60,000
- (B) ₹ 63,000
- (C) ₹65,000
- (D) ₹85,000

Answer:

- (i) (B) 94.815 lakh units. As per CAS 2, normal capacity is maximum productive capacity reduced by time lost on preventive maintenance, holidays, Set up delays. Here, Normal capacity = (365-52-12) x (8-1) x 3 x 1500 = 94.815 lakh unit.
- (ii) (B) 30.9.2019. As per Rules, 2014, the Cost Auditor, unless removed or resigned from office, shall continue till expiry of 180 days from closure of financial year or till he submits the cost audit report. Here his submission of the report did not go beyond six months from closure of financial year.
- (iii) (B) Operating cycle of Materials Turnover. Key Performance indicator of manufacturing is the Operating cycle of Materia!, WIP, Finished Goods Turnover.
- (iv) (C) An appraise management of business enterprise of responsibility towards consumers. The audit is based on the philosophy that the role of business should be conducive to raising the quality of life through its contribution in terms of better product-quality and services by making available the products and services of the right qualities at the right time, in right quantity, at the right place and right price.
- (v) (D) Either or all of the above. This is as per clause 76 section 2 of the Companies Act 2013.
- (vi) (B) Pre-scrutinize the validated instance document.

Reason will be: Once the instance document is successfully validated from the tool, the next step is to pre-scrutinize the validated instance document with the help of the same tool using a working internet connection. In the Pre-scrutiny, the server side validations shall be performed, using the MCA21 data base.

(vii) (B) The Energy Conversation Act, 2001. The Bureau is established by merging Energy Management Centre and controls energy conservation.

Alternative Reason: The Bureau of Energy Efficiency formed under the Energy Conservation Act 2001. The agency's function is to develop programs which will increase the conservation and efficient use of energy in India.

- (viii) (D) Cost Auditing Standard 104. The Audit Standard 104 deals with knowledge of Business, its processes and Business Environment, which includes knowledge on the Entity's Internal Control.
- (ix) (A) Part D para 2 of the Annexure to Cost Audit Report. This is pursuant to Rule 6(4) of the Companies (Cost Records and Audit) Rules.
- (x) (D) 85,000. Direct expenses = Royalty paid on units produced + Hire Charges of equipment used for production + Design charges + Software development charges related to production ₹ 25,000 + ₹ 20,000 + ₹ 18,000 + ₹ 22,000 = ₹ 85,000.

Section-B (80 Marks)

Answer any five questions from Question Numbers 2 to 8.

Each question carries 16 marks.

2. (a) (i) Healthcare Equipment Limited is engaged mainly in the production of Cardiac stents, Catheters, Pacemakers and Intraocular lenses.

State below whether maintenance of Cost Records is applicable if the company fulfils turnover criteria and is

- (I) a foreign company having registered office at Mumbai.
- (II) a company classified as a micro enterprise.
- (III) a foreign company having only liaison offices at Delhi and Mumbai.
- (IV) a domestic company whose average turnover of ₹ 40 crore for last two years has dropped to ₹ 24 crore in FY 2018-19.
- (ii) How the cost of production of goods and provision of services as per CAS-4 read with CGST Rules are determined:
 - (I) where the supply of goods or services is for a consideration not wholly in money.
 - (II) where goods are intended for further supply as such by the recipient?
- (b) (i) A firm of Cost Accountants was appointed by a company to evaluate the costs of the various products manufactured by it for its information system. One of the partners of the firm was a Non-Executive Director of the company. Is it permissible?
 - (ii) A Cost Auditor has reported fraud to the company as required under sec. 143 of the Companies Act, 2013. What disclosures are to be made by the company in its Board's Report?
 4+4=8

Answer:

2. (a) (i)

- (1) Healthcare Services is in non-Regulated sector (item 33 of B: non-Regulated sector) and any company, domestic or foreign, having annual turnover of ₹ 35 crore or more from all its products or services in the previous year shall maintain cost records. Therefore, the Rule is applicable to a foreign company.
- (2) Nothing contained in Companies (Cost Records and Audit) Rules shall apply to a company, which is classified as a micro enterprise or a small enterprise as per the turnover criteria under Micro, Small and Medium Enterprises Development Act.
- (3) Nothing contained in serial number 33 shall apply to foreign companies having only liaison offices in India.

(4) Once maintenance of cost records becomes applicable, it would be maintained on a continuous basis in the subsequent years also even if the turnover of the company in the previous year falls below threshold limit.

2. (a) (ii)

Cost Accounting Standard 4 (CAS 4) specifies the principles for determination of cost of production for valuation of goods based on cost. Where the supplier and the recipient are not related and price is the sole consideration, the value of supply or services shall be transaction value. CGST Act and Rules 27, 28, 29 of CGST Rules provide methodologies for determination of value of supply under certain exceptional situations.

- (1) Where the supply of goods or services is for a consideration not wholly in money, the value shall be the (a) open market value or (b) the value of supply of goods or services or both of like kind and quality for distinct or related person.
- (2) Where goods are intended for further supply as such by the recipient, the value shall be an amount equivalent to 90% of the price charged for the supply of goods of like kind and quality to his customer not being a related person. If the value is not determinable, it will be 110% of cost.

2. (b) (i)

Clause 4 of Part-I of the Second Schedule to the Cost and Works Accountants Act, 1959 states that expressing an opinion on cost and pricing of any business or any enterprise in which the auditor or his firm or a partner in his firm has a substantial interest would constitute misconduct, unless he discloses the interest also in his report. As per the facts of the case, the firm has been retained to evaluate the cost of products manufactured by it for its information system. Therefore, this amounts to Professional misconduct.

2. (b) (ii)

According to Section 143(12) of the Companies Act 2013, if an auditor of a company, in the course of the performance of his duties as auditor, has reason to believe that an offence involving fraud is being or has been committed against the company by officers or employees of the company, he shall immediately report the matter to the Board/ Audit Committee/ Central Government within such time and in such manner as may be prescribed.

As per Rule 13 of the Companies (Audit and Auditors) Rules, 2014, following detailed disclosures of fraud reported to Audit Committee are to be made in Board's Report:

- (a) Nature of Fraud with description;
- (b) Approximate Amount involved;
- (c) Parties involved, if remedial action not taken; and
- (d) Remedial actions taken.

- 3. (a) (i) What are the advantages of Cost Accounting Standards?
 - (ii) Answer the following with reference to Transportation Cost as per Cost Accounting Standard-5 (CAS-5):
 - (I) What items of cost shall not be included in Transportation Cost?
 - (II) For apportionment of outward Transportation Cost, what basis should be adopted? 2+2=4
 - (b) The financial Profit and Loss Account of PANWOOD LTD, a manufacturing company for the year ended 31st March, 2019, was ₹1,15,71,480. During the course of Cost Audit, it was noticed the following:
 - (i) Some discarded assets sold off which fetched a profit of ₹ 95,000.
 - (ii) Interest was received amounting to ₹1,05,000 from outside the business investment.
 - (iii) Voluntary Retirement payment of ₹3,80,000 was not included in the Cost Accounts.
 - (iv) Some renovation work was carried out at a cost of ₹6,20,000 and its useful life was only for five years.
 - (v) Donation of ₹1,28,000 towards CSR commitment was not considered in the Cost Accounts.
 - (vi) Insurance claim of ₹ 18,05,000 relating to previous year received during the year.
 - (vii) Loss on sale of investments amounts to ₹ 32,800.
 - (viii) The closing inventory of raw materials was undervalued ₹30,600 and that of finished goods was overvalued ₹2,30,700 in the financial records.
 - (ix) Post retirement medical grant to the extent of ₹ 2,80,000 was not considered in Cost Accounts.
 - (x) Profit from Retail trading activity amounting to ₹ 1,90,000.

You are required to prepare a Reconciliation Statement between two Accounts and work out the Profit as per Cost Accounts.

Answer:

(3) (a) (i)

Cost Accounting Standards are set of standards that are designed to achieve 'uniformity and consistency in cost accounting practices.' The Institute of Cost Accountants of India, recognizing the need for structured approach to the measurement of cost in manufacture or service sector and to provide guidance to the user organizations, government bodies, regulators, research agencies and academic institutions to achieve uniformity and consistency in classification, measurement and assignment of cost to product and services, has constituted Cost Accounting Standards Board (CASB) with the objective of formulating the Cost Accounting Standards. The advantages of Cost Accounting Standards are as follows:

4

- a. Providing a structured approach to measurement of costs in manufacturing process or service industry;
- b. Integrating, harmonizing, and standardizing cost accounting principles and practices;
- c. Providing guidance to users to achieve uniformity and consistency in classification, measurement, assignment, and allocation of costs to products and services;
- d. Arriving at the basis of computing the cost of product, activity, or service where required by legal or regulatory bodies;
- e. Enabling practicing members to make use of Cost Accounting Standards in the attestation of General Purpose Cost statements; and
- f. Assisting in clear and uniform understanding of all the related issues by various user organizations, government bodies, regulators, research agencies, and academic institutions.

(3) (a) (ii)

Cost Accounting Standard 5 (CAS-5) on "Determination of Average (Equalized) Cost of Transportation" deals with the determination of average transportation cost of a product.

- (a) Cost of Transportation comprises of the cost of freight, cartage, transit insurance and cost of operating fleet and other incidental charges whether incurred internally or paid to an outside agency for transportation of goods. Penalty, detention charges, demurrage and cost related to break down and expenses abnormal and non-recurring in nature will not be included in transportation cost.
- (b) The following basis may be used, in order of priority, for apportionment of outward transportation cost depending upon the nature of products, unit of measurement followed and type of transport used:
 - (i) Weight
 - (ii) Volume of goods
 - (iii) Tonne-Km
 - (iv) Unit / Equivalent unit
 - (v) Value of goods
 - (vi) Percentage of usage of space

Once a basis of apportionment is adopted, the same should be followed consistently

3. (b)

Statement showing the Reconciliation of Profit and Loss between Cost and financial account for the year ended 31st March, 2019.

Particulars	₹	₹
Profit as per Financial Accounts.		11571480
Add: Expenses/Loss not considered in Cost Accounts		
(a) Loss on Sale of Investments	32800	

(b) Donation towards CSR Commitment	128000	
(c) Post-retirement Medical grant	280000	
(d) Voluntary Retirement payment	380000	
(e) 4/5 of Renovation Expenses Amortized	496000	1316800
Less: Incomes not considered in Cost Accounts		
(a) Profit on Sale of old assets	95000	
(b) Interest received from outside investment	105000	
(c) Insurance claim for previous year received	1805000	
(d) Profit from Retail Trading Activity	190000	
(e) Effect of Undervaluation/overvaluation of closing inventory	200100	(2395100)
Profit as per Cost Accounts		10493180

- 4. (a) You are the Management Accountant of MANGLOW LTD, a large manufacturing company suffering from Working Capital Crisis. Which areas will you cover to overcome the Crisis?
 - (b) What is Energy Audit? Briefly state the key-functions of Energy Auditor.

2+6=8

Answer:

4. (a)

Working capital being an indispensable part of operation of business should be evaluated to point out the inefficiency of either procurement or the application of the working capital. The analysis of working capital can be done by measuring operational inefficiencies and liquidity of the company. Furthermore, the cash management in the working capital should be included in such analysis. Some steps are suggested to establish whether excessive amount is blocked.

A. Need to make Performance Analysis

To help monitor the variations, a Performance Analysis Report on Working Capital and Inventory Management is to be made to appraise the management about its current performance. It would help the organization

- (i) to improve profits and profitability,
- (ii) to optimize resource allocation,
- (iii) to optimize the product and service portfolio.

B. Tools of Measurement

The analysis of working capital components like Current assets and current Liabilities can be made by various financial ratios like

- (a) Receivables Ratio, (Sale/Debtors,)
- (b) Inventory Ratios (Raw Materials stock/consumption, Stores & Spares/consumption, Finished Goods stock/Cost of Sales etc.)
- (c) Financial Ratio (Current Ratio, Quick Ratio, Turnover Ratio etc.).

C. Remedial Measure

To avoid misuse of working capital, the policies regarding inventory management commensurate to the scale of business be reviewed and laid down. This should include

Procurement policy,

Stocking policy,

Inventory valuation method,

Physical verification of inventory policy,

This analysis should be critical for operational inefficiencies and liquidity of the company.

D. Cash Management

The cash management in the working capital should be included in such analysis to establish whether excessive amount is blocked in the working capital. The cost of working capital funding should be highlighted especially in their multiple source of working capital funding. Those costs would include interest paid on cash credits, loans, cost of collection efforts, cost of inventory carrying etc. The total cost of managing working capital as a percentage of total working capitalinvested would be a very useful performance indicator.

In the current situation, the Management Accountant should examine the variations and identify the blocked capital in slow moving area like Debtors or Inventory. He may recommend liquidation of slow moving capital and advise measures for preventing further accumulation.

4. (b)

Energy auditing is an activity that serves the purposes of assessing energy-use, pattern of a factory or energy consuming equipment and identifying energy saving opportunities. In that context, energy management involves the basic approaches in reducing avoidable losses, improving the effectiveness of energy use, and increasing energy use efficiently. The energy auditor is normally expected to give recommendations on effective improvements leading to monetary benefits and also advise on energy management issues. Generally, energy auditor for the industry is an external party. The following are some of the key functions of the energy auditor?

- 1. Quantification of energy costs and quantities.
- 2. To correlate trends of production or activity to energy cost.
- 3. To devise energy database formats separately by products, departments or energy consuming departments.

While performing the aforesaid key functions, the energy auditor is required to carry out the following activities:

- 1. To analyse the historical energy consumption and cost data.
- 2. To conduct preliminary energy audit with the objective to identify:
 - (A) major energy consuming equipment and process.
 - (B) Obvious inefficiencies and energy wastes.
 - (C) Priority areas for further detailed investigation.
- 3. To conduct detailed technical and economic analysis of energy efficiency measures involving large efficiency measures involving large capital or long pay back periods.
- 5. (a) (i) For appointment of Internal Auditor by the company under Companies Act, 2013, state.
 - (I) Is it mandatory to file documents with ROC on appointment of Internal Auditors?
 - (II) Can a Director of a company be appointed as its Internal Auditor? 2+2=4
 - (ii) Explain briefly the concept of "Adequacy of Internal Control".
 - (b) You are appointed as Internal Auditor of a Hospital. State your approach for steps to be taken for conducting the audit.

Answer:

5. (a) (i)

- (1) The appointment of internal auditor can be done only by means of a resolution passed at the meeting of the Board as specified under rule 8 of the Companies (Meeting of Board and its Powers) Rules, 2014 and accordingly, the company is also required to file Form MGT-14 with the Registrar within 30 days from the date of passing of resolution by the Board. However, filing of resolutions under section 117 has been exempted for private companies.
- (2) The Internal Auditor shall be either a Chartered Accountant, Cost Accountant, or such other professional as may be decided by the Board to conduct internal audit of the functions and activities of the company. The Internal Auditor may or may not be an employee of the Company. Hence, the Director can be appointed as Internal Auditor if the Board or Audit Committee considers the person as eligible to be appointed as Internal Auditor. On ethical grounds, a Director who is Key Managerial Person should not act as Internal Auditor.

5. (a) (ii)

Adequacy of Internal Controls: The auditor should obtain an understanding of the accounting system sufficient to identify and understand major classes of transactions, manner of initiation of transactions, significant accounting records, supporting documents and specific accounts in the financial statements and the accounting and financial reporting process. Accounting control comprises of the plan of an organisation and the

4

procedures and records that are concerned with the safeguarding of assets and the reliability of financial controls. Internal control, as far as financial and accounting aspects are concerned, aims at the following:

- (i) Flow of work through various stages.
- (ii) Segregation of personnel duties
- (iii) Adequate documentation.
- (iv) The transactions are recorded with appropriate amounts and time
- (v) The assets should be properly safeguarded
- (vi) Properauthorisation.
- (vii) Existence of organisational chart
- (viii) System to locate the deviations and departures from the prescribed procedures
- (ix) Standardized records and formats. It would ensure availability of right information at right time.
- (x) Efficient Management Information System. Etc.

5. (b)

A hospital belongs to Health Services in non-Regulated sector b; per the Companies (Cost Records and Audit) Rules. 2014 and is required to maintain cost records in addition to Financial records if its turnover exceeds = ₹ 35 crore for a product or services during the previous year.

An Auditor should conduct the following functions in the course of audit of a Hospital-

- Obtain a list of books, documents, register and other re cords as maintained by the Hospitals.
- Examine the audit report of last year and note down qualifications, if any, therein.
- Examine the system of receiving grants and donations, whether received through cheque or otherwise
- Examine the scope of responsibilities according to the overall objectives of audit.
- Note down the important clause of Trust Deed or Charter, which may affect the audit and accounts of hospital.
- Examine the Minutes of Meetings of the Board of Directors/Trustees or the Managing Committee, and note down the important decisions concerning the financial transactions relating to fixed assets, investments and financial powers as required by him during the audit.
- Examine the Internal Control system reg. purchase of fixed assets, medicines, stores, consumables, clothing etc.
- Examine the Internal Control System for recording of purchases, issue and storage of all items and physical verification of them.
- Obtain the rate structure for fees, medicine and other services, power to do concession or waiver of fees.
- Calculate and examine the requisite input-output ratios.

- Examine Financial and Cost Records as maintainable by statute.
- Verify the system of internal check as regards purchase and issue of stores, medicine, etc.
- Examine that the appointment of the staff, payment of salaries etc., are duly authorized.
- Physically verify the investments, fixed assets and inventories.
- Check that adequate depreciation has been provided on all the depreciable assets.
- 6. (a) The following are the summarized Balance Sheet and Income Statement of GREENCON LTD, a cement manufacturing company.

Income Statement for the year ended March 31,2019

	Amount (in ₹ lakhs)
Sales	4,000
Less: Cost of Goods sold	3,275
Gross Margin	725
Less: Administrative and Selling Expenses PBIT	120
	605
Less: Interest Expenses Profit before Tax (PBT)	90
	515
Tax paid Profit after Tax	180
	335

Balance Sheet as at 31.03.2019

(Amount in ₹ lakh)

Equity and Liability	₹	Assets	₹
(1) Shareholders' Fund:		(1) Non-Current Assets:	
(a) Share Capital:		Net Fixed Assets	1,600
Paid up Capital	800	(2) Current Assets:	
(80,00,000 Shares of ₹ 10 each fully paid)	600	(a) Inventory (b) Trade Receivables	400 250
(b) Reserve and Surplus: Retained Earnings		(c) Marketable Securities(d) Cash and Cash Equivalents	350 400
(2) Non-Current Liabilities:			
Long-Term Borrowing			
7-5%, Debenture	1,200		
(3) Current Liabilities:			
(a) Trade payables	260		

(b) Bills payable	100	
(c) Other Current Liabilities	40	
	3,000	3,000
Earning per Share (EPS)	₹ 4.19	
Market Price per Share	₹ 75	

Additional Information:

Their industry average ratios for the year 2018-19 are given below:

Current ratio	2.5
Quick ratio	1.5
Sales to inventory	8
Average collection period	35 days
Times interest earned	6
Profit margin	7%
Price to earning ratio	15
Return on total assets	10%

Required:

- (i) Calculate the financial ratios as stated supra (in Additional information)
- (ii) Analyse the financial performance of GREENCON LTD for the year ended March 31,2019.
- (b) GREENTECH LTD, a cement manufacturing company located at Ajmer (Rajasthan), has set up its own Power Plant to cater its need in manufacturing process for production of cement.

The following details are extracted from the Financial and Cost Accounting records of GREENTECH LTD for the year ended March 31, 2019.

Power Generated: 59885900 KWH of which 4% is used by Power Generating Plant.

Material and Utility used:

- (i) Coal consumptions : 1800 MT@ ₹ 30,000 per MT
- (ii) Oil: 30 MT @ ₹ 1,50,000 per MT
- (iii) Water (extraction and treatment): 40 lakh litres @ ₹ 3 per litre
- (iv) Stores and other consumptions: ₹ 1,60,000
- (v) Cost of Boiler Plant is ₹ 60 lakh with no residual values.
- (vi) Cost of Power Generating Plant is ₹ 100 lakh with no residual values.

- (vii) Depreciation is charged on Straight Line Method @ 10% [for (v) and (vi)].
- (viii) Wages and Salaries for Power Generating Plant:80 skilled workers @ ₹ 20,000 and 120 helpers @ ₹ 12,000 per month.
- (ix) Wages and Salaries for Boiler Plant:50 semi-skilled workers @ ₹ 15,000 and 80 helpers @ ₹ 10,000 per month.
- (x) Repairs & Maintenance of Generating Power Plant and Boiler Plant is ₹ 20 lakh.
- (xi) Share of Administrative Overhead Expenses ₹ 125 lakh.
- (xii) Realization from Sale of Ash disposed is ₹ 9 lakh.

You are required to prepare a Cost Sheet for Electricity Generating Cost and calculate the Cost of Power per KWH for the year ended March 31, 2019, as per the Companies (Cost Records and Audit) Rules, 2014.

Answer:

6. (a)

GREENCON LTD.

Calculation of Financial Ratios:

(₹ in Lakh)

Ratio	Formula used	Value of ratio of	Industry's average ratio	Remarks
(A) Liquid Ratio				
(i) Current Ratio	<u>Current Assets</u> Current Liabilities	1400/400=3.5	2.5	Above standard
(ii) Quick Ratio	Current Assets-Inventory Current Liabilities	1000/400=2.50	1.5	Above standard
(iii) inventory Turnover ratio	<u>Cost of goods sold</u> Inventory	3275/400=8.19	8	Above standard
(iv) Average Collection period	<u>Trade Receivable x 365 days</u> Sale	(250/4000)x365 = 23 days	35 days	12 days lower from standard
(B) Profitability Ratio				
(i) Profit margin	Net Income after Tax × 100 Sales	(335/4000)xl00 = 8.38%	7%	Above standard
(ii) Price to earning ratio	Market price per share Earning per share	75/4.19=17.90	15	Above standard

(iii) Return on total assets	<u>Net Profit after tax</u> Total assets	(335/3000) = 11.17%	10%	Above standard
(C) Coverage ratio				
(i) Interest Coverage ratio	Profit before interest and tax Interest	605/90=6.72	6	Above standard

Evaluation of Financial performance of the company:

- (1) Liquidity Position: Current Ratio as well as Quick Ratio is higher than the industry's average ratio. So it may be thought the liquidity position of the company is sound and satisfactory. Inventory turnover Ratio is little bit higher than industry's average ratio.
 - Average debt collection period is lower than industry's debt collection period that indicates very efficient receivable management. Hence, liquidity position of the company is very sound. More than half of the total assets are financed out of the owned funds signifying satisfactory level of debt financing.
- (2) Profitability position: Profit margin ratio of GREENCON LTD. is better than industry's average ratio. Return on total Assets of the company is little bit higher than the industry's average. It indicates that the company is more or less efficient in utilizing its assets. Price earnings Ratio of the company is higher compared with the industry's average. It indicates that investors' evaluation about the prospect of the company is good.

Interest Payment Capacity:

Interest payment capacity of GREENCON LTD. is satisfactory as interest cover ratio is higher than industry's coverage ratio.

So, overall financial performance of GREENCON Ltd. is very sound and impressive.

6. (b)

Statement showing Cost of Power Generated by Power Generating Plant for the year ended March 31, 2019

(Amount in ₹ lakh)

Power Generated: Effective Power Generated (Note):		59885900 5,74,90,464	Cost per KWH (₹)
Coal Consumptions: 1800x30000 Less: Sale of ASH	540.00 (9.00)	531.00	0.92
Oil (30 Mt x ₹ 150000)	45.00	45.00	0.08
Water: (40 lakh x 3)	120.00	120.00	0.21

Stores and other consumptions:		1.60	0.01
Wages and salaries for power generating plant: (80 x 20000 x 12): (120 x 12000x12):	192.00 172.80	364.80	0.63
Wages and salaries for Boiler plant: (50 x 15000 x 12) (80 x 10000 x 12)	90.00 96.00	186.00	0.32
Repair and maintenance for PGP & BP	20.00	20.00	0.03
Depreciation: Power Generating Plant: 10% of 100 lakh Boiler plant: 10% of 60 lakh	10.00 6.00	16.00	0.03
Administrative overhead expenses		125.00	0.22
Total cost		1409.40	2,45

Note:

As power generating plant consumes 4% of power, Effective power produced for manufacturing = $0.96 \times 59885900 = 5,74,90,464 \text{ KWH}$.

7. (a) The following parameters are extracted from the Cost Accounting Records of ALCOBOX Ltd. multi products manufacturing company for two years:

(Amount in ₹ lakh)

Year ended 31st March	2019	2018
Gross Sales including GST	28,560	27,790
GST	4,130	3,920
Other Income	_	-
Raw materials consumed	15,960	14,840
Direct wages and salaries	490	450
Power and fuel	350	320
Stores and spares consumed	80	70
Repairs and maintenance	70	60
Depreciation charged to production cost centres	220	210
Factory overheads:		
Salaries and wages	70	60
Depreciation	30	30

Rates and taxes	15	14
Other overheads	75	66
Administrative overheads:		
Salaries and wages	140	130
Rates and taxes	90	90
Other overheads	2,250	2,100
Selling and distribution overheads:		
Salaries and wages	100	80
Packing and forwarding	85	85
Depreciation	15	15
Other overheads	1,730	1,640
Interest	1,160	1,030
Bonus and gratuity	200	150

You are required to compute the following RATIOS as stipulated in PART-D, PARA-4 to the Annexure of Cost Audit Report under the Companies (Cost Records and Audit) Rules, 2014 for the year ended March 31, 2019 and March 31, 2018.

- (i) Profit before Tax (PBT) to Value Added
- (ii) Value Added to Net Sales
- (iii) Profit before Tax (PBT) to Net Revenue from Operations

8

(b) KASAUTI MOTORS LTD, a manufacturing company of motor vehicles has, in FY 2019-20, faced abnormal fall in demand of passenger vehicles. A huge inventory compelled the company to shut down production operations for 15 working days in the 1st part of September, 2019. But the plant was running at budgeted level of Utilization except the shut down period.

In this respect, the company has furnished the following information for the year ended March 31, 2020:

Particulars	Budget: FY 2019-20 (₹ in lakh)
No. of working days	305
Contribution (90% capacity)	2,250
Indirect Wages and Salaries	600
Depreciation	240
Other Fixed Expenses	350

Inventory Carrying Cost (Addl.)	15
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Required:

- (i) Find out expected abnormal loss due to shut down for the 1st six months of the year 2019-20, from the facts and figures stated supra.
- (ii) Write a note to the Management suggesting remedial measures.

4+4=8

Answer:

7. (a)

CALCULATION OF PROFIT BEFORE TAX (PBT)

(Amount in ₹ lakh)

YEAR ENDED 31 ^{SI} MARCH	2019	2018
Gross Sales inclusive of GST	28560	27790
Less: GST	4130	3920
Net Sales	24430	23870
Net Revenue from Operations	24430	23870
Cost of Sales		
Raw material consumed	15960	14840
Direct wages and salaries	490	450
Power and fuel	350	320
Stores and spares consumed Repairs and maintenance	80 70	70 60
Depreciation charged to production centres	220	210
Factory over heads (including depreciation)	190	170
Administration overheads	2480	2320
Selling and distribution overheads (inclusive depreciation)	1930	1820
Interest	1160	1030
Bonus and gratuity	200	150
Total B	23130	21440
Profit before Tax (PBT) (A-B)	1300	2430

CALCULATION OF VALUE ADDED

(Amount in ₹ lakh)

YEAR ENDED 31s1 MARCH	2019	2018
Net Sales (A)	24430	23870
Less: Cost of bought out of inputs:		
Direct materials consumed	15960	14840
Stores 8i spares consumed	80	70
Power and fuel	350	320
Repairs and maintenance	70	60
Overheads (exclusive salaries, wages,		
rates & taxes and depreciation)	4140	3891
Total cost of bought out of inputs (B)	20600	19181
VALUE ADDED (A-B)	3830	4689

(Amount in ₹ lakh)

YEAR ENDED 31st MARCH	2019	2018
(i) Profit before tax (PBT) to Value Added As (%)	1300/3830 33.94%	2430/4689 51.82%
(ii) Value Added to Net Sales As (%)	3830/24430 15.68%	4689/23870 19.64%
(iii) Profit before tax (PBT) to net revenue from operations As (%)	1300/24430 5.32%	2430/23870 10.18%

7. (b)

(i) Calculation of Abnormal Cost (₹ lakh)

	Budget FY 2019-20* lac	Suspension of work, abnormal cost
Mo of working days	305	15
Indirect Wages & Salaries	600	29.51
Depreciation	240	11.80
Other Fixed Expenses	350	17.21
Inventory carrying cost (extra)		15.00
Total	1,190	73.52

The estimated abnormal cost is ₹73.52 lakh

- (ii) The company in the automotive sector is suffering from slowing demand pattern due to overall recession across the country and even worldwide. The Management may consider some of the following steps:
- 1) Reduction of 5% of workforce by suitable compensation package
- 2) Change part of product mix to electric cars, Al & Robotics, Commercials.
- 3) Go for more exports taking advantage of favorable foreign exchange parity.
- 4) Draw a marketing plan, which is customer friendly and cost effective.
- 5) Make attractive after sales service addressing common customer issue
- 6) Brand acquisition to effect synergy.
- 8. Answer any four out of the following five questions:

 $4 \times 4 = 16$

- (a) Explain "Risk Assessment" with reference to Cost Audit Standard 104 at 'Cost Statement' level.
- (b) Write a short note on Internal Audit of Utilization of Resources.
- (c) A Corporate Social Responsibility (CSR) audit can identify various management risks. What are the areas that the audit should cover to mitigate risks?
- (d) The following are the process-wise input and output in a Textile Mill:

Department	Input (kg)	Output (kg)
Blow Room	41,10,169	38,27,662
Carding	38,42,123	35,74,310
Draw Frames	35,48,981	35,07,245
Roving (Simplex)	34,82,360	34,44,054
Ring Frame	35,16,085	32,73,475

Required:

Find the cotton input per 1000 kg of Ring Frame yarn output if initially the cotton under weight of 0.3% moisture loss from the invoice weight.

(e) From the following figures of Diamond Industrial Components Ltd., a single product company, Find out Value Addition as defined in the Companies (Cost Records and Audit) Rules, 2014 for the year ended March 31, 2019.

Year ended	31.03.2019 (₹ in lakh)
1. Net Sales	4,980

2. Raw Materials	2,990
3. Stores and Spares	21
4. Power and Fuel	105
5. Overheads	377
6. Salaries, Wages	410
7. Bonus, Gratuity	42
8. Packing Forwarding Cost	21
9. Interest	280
10. Depreciation	11

Answer:

- (a) As per Cost Auditing Standard 104 on Knowledge of Business, its process and the Business environment, it is necessary to assess the risks related to material misstatement, whether due to fraud or error at the overall cost statement and at the assertion level including items of cost, cost heads and disclosure thereof.
 - Risks at the cost statement level may derive in particular from a deficient control environment or adverse economic conditions. The Management's lack of competence may have a pervasive effect on the cost statements and may require an overall response by the Auditor. According to 1SA315, Understanding the Entity and its Environment and Assessing the Risks of Material Misstatement, "the auditor should perform risk assessment procedures to obtain an understanding of the entity and its environment, including its internal control". The Audit risk has three components: Inherent Risk, Control Risk and Detection Risk. For identifying and assessing the risk, the Auditor shall
 - Identify risks including relevant controls that relate to misstatement or fraud
 - Assess whether the risk is related to recent significant economic, accounting, or other developments and require specific attention
 - Assess risks involving significant transactions with related parties.
 - Assess the degree of subjectivity in the measurement of information related to risk.
 - Assess the need for revising assessment of risk based on additional evidence.
- (b) There is a need over measuring the efficiency of internal resources of the organization. An internal audit team be entrusted with the task of identifying the weak areas of resource utilization and suggest remedies for the deficiencies. The auditor should check whether proper operating standards and norms have been established for measuring economical and efficient use of resources. They should be detailed enough to be identifiable with specific operating responsibilities and should be capable of being used by operating personnel for monitoring and evaluating their performance. The Auditor should review the methods of establishing the operating standards and norms. He

should carefully examine the assumptions made while setting the standards to ensure that they are appropriate and necessary. The variances should be examined to evaluate whether or not the standards and norms are practical. The system of identification and analysis of deviations from standards should be examined. The auditor should examine whether analysis of variance is communicated to those concerned in time. He should also examine whether in communicating the variances, serious matter are highlighted and communicated more expeditiously than is done in normal course. As a part of evaluating resource utilization, identifying the facilities, which are underutilized, is an important function of the auditor. Such instances may consist of underutilized machines, unoccupied storage space, huge cash and bank balances, idle man power, excess inventory of finished goods, raw materials, stores, work in process, sundry debtors etc. While commenting on staffing, the auditor may pay special attention to nonproductive work being performed. Finally, the auditor should review all procedure with reference to their costs and benefits. One of the factors resulting in inefficiency is that in many cases, procedure may become hindrance to operations.

- **(c)** Corporate Social Responsibility is a mandatory requirement, and any departure from the requirements may lead the management into difficulty. A CSR audit program can identify all or any of the following risks:
 - Effectiveness of the operating framework for CSR implementation
 - Effectiveness of implementation of specific, large CSR projects
 - Adequacy of internal control and review mechanisms
 - Reliability of measures of performance
 - Management of risks associated with external factors like regulatory compliance, management of potential adverse NGO attention, etc.

A CSR Audit should cover the following points to find out excellence:

- Maintenance of Human Rights viz: Fundamental Human Rights, Freedom of association and Collective bargaining, Non-discrimination, Forced labor, Child labor
- Business image: Relations with clients, suppliers and sub-contractors, Prevention of corruption and anti-competitive practices
- Use of Human Resources with dignity and efficiency: Labor relations, Working conditions including steps taken for preventing accidents and health hazards, health and safety measures including compensation in case of any accidents, career development and training, Remuneration system that motivates the employees.
- Corporate Governance: Board of Directors, Audit and internal controls, Treatment of shareholders, Executive remuneration
- Environment: Incorporation of environmental considerations into the manufacturing and distribution of products, and into their use and disposal effect on pollution, pollution control measures undertaken,
- Community Involvement: Impacts on local communities, contribution to social and economic development, General interest causes, creation of socials infrastructure like roads, schools, hospitals.

(d) Calculation of Department wise waste multiplier:

Department	Input	Output	Input/	Loss%	Output (%)	Waste
	(Kgs)	(Kgs)	output			multiplier
Blow Room	4110169	3827662	0.9313	6.87	93.13	1.18125
Carding	3842123	3574310	0.9303	6.97	86.64	1.09893
Draw Frames	3548981	3507245	0.9882	1.18	85.62	1.08600
Roving	3482360	3444054	0.9890	1.10	84.68	1.07410
(Simplex)Ring frame	3516085	3273475	0.9310	6.90	78.84	1.00000

The initial Cotton input will be Blow Room Input $1.18125 \times (1/0.997) = 1.18480 \times (0.3\%)$ moisture loss).

For 1000 kg Ring Frame output cotton requirement will be 1184.80 kgs. based on Invoice Weight.

Note: Output % = (100 - 6.87) = 93.13, $(93.13-93.13 \times 6.97\%) = 86.64$, $(86.64-86.64 \times 1.18\%) = 85.62$, $(85.62-85.62 \times 1.10\%) = 84.68$ and $(84.68-84.68 \times 6.90\%) = 78.84$.

(e) Value Addition:

Year ended	31.03.2019 ₹ lac
1. Net Sales	4,930
2a. Cost of bought out Materials	3,011
2b. Power & Fuel	105
2c. Overheads (including distribution cost)	398
2d. Total cost of bought out materials and services (2a+2b+2c)	3,514
3. Value Addition (1)-(2d)=	1,466