MCOM SECOND SEMESTER

COMM- CC-202 ADVANCED COST AND MANAGEMENT ACCOUNTING

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Unit- I: Standard Costing & Variance Analysis: Meaning & Objectives of Standard Costing, Types of Standards, Setting of Standards, Variance Analysis – Material, Labour, Overheads, Sales and Profit Variances, Interpretation of the Variances, Lab based assignments.

Standard Costing- Standard costing is an important cost accounting technique used to control costs and improve efficiency. It involves setting predetermined, benchmark costs for producing a good or service and then comparing them to the actual costs incurred to identify and analyze any differences, known as **variances**. This approach is a key part of **management by exception**, where managers only need to investigate significant deviations from the standard, saving time and resources.

Objectives of Standard Costing -Standard costing isn't just about crunching numbers; it's a strategic tool with several key objectives:

- **Cost Control & Reduction:** This is the primary objective. By comparing actual costs to a predetermined standard, a company can pinpoint areas of inefficiency, waste, and excessive spending. This allows management to take timely corrective action.
- **Performance Evaluation:** It provides a reliable benchmark to measure the performance of different departments and managers. Variances in material, labor, and overhead costs can indicate whether a department is operating efficiently or not.
- **Informed Decision-Making:** Standard costs provide a predictable basis for making strategic decisions such as setting product prices, preparing bids for contracts, and formulating budgets. It helps in understanding the cost structure and its impact on profitability.
- **Simplifying Accounting Procedures:** Standard costing simplifies inventory valuation and record-keeping, as all units are valued at a uniform standard cost, regardless of the fluctuating actual costs. This saves significant clerical effort.
- **Motivation:** When standards are set realistically and are a collaborative effort, they can serve as a goal for employees, encouraging them to perform more efficiently and become more cost-conscious.

Types of Standards -The type of standard you choose to set is crucial, as it impacts employee morale and the effectiveness of the system. The main types of standards are:

- **Ideal Standards:** These are based on perfect operating conditions with no waste, no machine downtime, and no inefficiencies. They represent the theoretical minimum cost. While useful for long-term goals and continuous improvement, they can be unrealistic and demotivating for employees as they're virtually impossible to achieve.
- **Basic Standards:** These are long-term, stable standards that remain unchanged over a long period. They're used primarily to show trends in efficiency and are not used for short-term performance evaluation.
- **Current Standards:** These standards are based on current, expected operating conditions. They are most relevant for the current period and are revised regularly to reflect changes in prices and efficiency.
- **Attainable (or Practical) Standards:** These are the most common and widely used standards. They are challenging yet realistic, allowing for normal inefficiencies like machine breakdowns, employee rest periods, and a certain amount of material waste. Variances from these standards indicate a genuine need for investigation and action.

Setting of Standards -Setting accurate and effective standards requires a collaborative effort from various departments within a company. The process typically involves setting standards for each component of cost: material, labor, and overhead.

1. Setting Material Standards

- **Quantity:** Engineers and the production department determine the standard quantity of materials required to produce one unit of a product. This includes allowances for normal waste and scrap.
- **Price:** The purchasing department sets the standard price of materials by considering market prices, supplier quotes, and anticipated price changes.

2. Setting Labor Standards

- **Time:** The engineering or production department determines the standard time required to produce one unit through time and motion studies. This standard allows for normal interruptions and rest periods.
- **Rate:** The human resources or payroll department determines the standard wage rate per hour for each grade of labor. This includes wages, bonuses, and other benefits.

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3. Setting Overhead Standards

- **Variable Overhead:** A standard rate is set per unit of activity (e.g., direct labor hours or machine hours). This rate is calculated by dividing the budgeted variable overhead costs by the budgeted production activity.
- **Fixed Overhead:** A standard rate is also determined for fixed overhead. This involves budgeting the total fixed costs for a period and dividing it by the expected volume of production.

Variance Analysis -Variance analysis is the process of dissecting the difference between a **standard cost** (or budgeted amount) and an **actual cost** (or actual revenue) to identify the causes of the deviation. This process helps managers pinpoint and address inefficiencies, evaluate performance, and improve future planning. A variance is **favorable** (F) if it increases profit and **unfavorable** (A) if it decreases profit.

Material Variances-Material variances measure the difference between the actual cost of materials used and the standard cost for the output achieved. It's broken down into two main parts:

- **Material Price Variance (MPV):** This variance measures how much of the total cost variance is due to paying a different price for materials than the standard price.
  - **Formula:** MPV=(Standard Price−Actual Price)×Actual Quantity
  - **Interpretation:** A favorable MPV means you paid less per unit for materials, which could be due to bulk discounts, favorable market conditions, or effective bargaining. An unfavorable MPV means you paid more, possibly due to a general price increase, rush orders, or poor purchasing decisions.
- **Material Usage Variance (MUV):** This variance measures how much of the total cost variance is due to using a different quantity of materials than the standard quantity for the actual production.
  - **Formula:** MUV=(Standard Quantity−Actual Quantity)×Standard Price
  - **Interpretation:** A favorable MUV means you used less material than expected, which could be due to better quality materials, increased worker efficiency, or improved production processes. An unfavorable MUV means you used more, potentially due to material waste, defective materials, or inexperienced workers.

Labor Variances-Labor variances analyze the difference between the actual cost of labor and the standard cost for the output achieved. It's also typically broken into two variances:

- **Labor Rate Variance (LRV):** This variance measures the difference between the actual wage rate paid and the standard wage rate.
  - **Formula:** LRV=(Standard Rate−Actual Rate)×Actual Hours

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- **Interpretation:** A favorable LRV indicates you paid a lower average wage, which could happen if you used less skilled (and cheaper) labor than planned. An unfavorable LRV means you paid more, perhaps due to a wage rate increase, overtime pay, or using more skilled labor.

- **Labor Efficiency Variance (LEV):** This variance measures the difference between the actual hours worked and the standard hours allowed for the output produced.
  - **Formula:** LEV=(Standard Hours−Actual Hours)×Standard Rate
  - **Interpretation:** A favorable LEV means workers took less time than expected to complete a task, indicating high productivity, better tools, or using more skilled workers. An unfavorable LEV means they took more time, possibly due to inexperienced workers, machine breakdowns, or poor supervision.

Overhead Variances-Overhead variances measure the difference between actual and standard overhead costs. They are usually split into fixed and variable components.

Variable Overhead Variances

- **Variable Overhead Expenditure/Spending Variance (VOEV):** This variance measures the difference between the actual variable overhead cost incurred and the budgeted variable overhead cost for the actual hours worked.
  - **Formula:** VOEV=Actual Hours×(Standard Rate−Actual Rate)
  - **Interpretation:** A favorable VOEV means you spent less on variable overheads per hour than budgeted. An unfavorable variance means you spent more, possibly due to an increase in indirect material prices or utility rates.
- **Variable Overhead Efficiency Variance (VOEfV):** This variance measures the change in variable overhead due to a difference between the actual hours worked and the standard hours for the output produced.
  - **Formula:** VOEfV=Standard Rate×(Standard Hours−Actual Hours)
  - **Interpretation:** This variance mirrors the labor efficiency variance. A favorable VOEfV indicates that fewer hours were used to produce the output, leading to lower variable overhead costs. An unfavorable variance means more hours were used, and thus, more variable overhead was incurred.

Fixed Overhead Variances

- **Fixed Overhead Expenditure/Spending Variance (FOEV):** This variance is a straightforward comparison of the actual fixed overhead cost with the budgeted fixed overhead cost.
  - **Formula:** FOEV=Budgeted Fixed Overhead−Actual Fixed Overhead

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- **Interpretation:** A favorable FOEV means you spent less on fixed costs than planned (e.g., lower rent or insurance premiums). An unfavorable variance means you spent more.

- **Fixed Overhead Volume Variance (FOVV):** This variance measures the difference between the budgeted fixed overhead and the fixed overhead absorbed (or applied) based on the actual production volume. It's often a key indicator of capacity utilization.
  - **Formula:**
    FOVV=(Actual Production Volume−Budgeted Production Volume)×Standard Fixed Overhead Rate per Unit
  - **Interpretation:** A favorable FOVV means you produced more units than budgeted, which allowed you to absorb more fixed costs. An unfavorable FOVV means you produced less than budgeted, leaving some fixed costs "unabsorbed." This may be due to a lack of demand or production bottlenecks.

Sales and Profit Variances-While the above variances focus on costs, sales and profit variances analyze the difference between actual sales/profit and the budgeted amounts.

- **Sales Price Variance:** This variance measures the difference between the actual selling price and the standard selling price for the units sold.
  - **Formula:** Sales Price Variance=(Actual Price−Standard Price)×Actual Quantity
  - **Interpretation:** A favorable sales price variance means you sold products at a higher price than expected, which can happen in a strong market or with a successful marketing campaign. An unfavorable variance means you sold at a lower price, perhaps due to increased competition or a need to liquidate inventory.
- **Sales Volume Variance:** This variance measures the impact on profit of selling a different number of units than budgeted.
  - **Formula:**
    Sales Volume Variance=(Actual Quantity Sold−Budgeted Quantity Sold)×Standard Contribution Margin per Unit
  - **Interpretation:** A favorable sales volume variance indicates that you sold more units than planned, which increased total contribution margin. An unfavorable variance means you sold fewer units, leading to a decrease in contribution margin. This can be caused by market downturns, competitor actions, or ineffective sales strategies.

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Unit – II: Budgeting & Budgetary Control: Concept of Budget, Budgeting and Budgetary Control; Budgeting Process, Advantages and Problems of Budgeting, Kinds of Budgets; Zero Base Budgeting, Cash Budget, Performance Budgeting, Lab based assignments.

Concept of Budget, Budgeting and Budgetary Control; Budgeting Process, Advantages and Problems of Budgeting

A budget is a quantitative plan of action for a future period, expressed in monetary or physical terms. **Budgeting** is the process of preparing these budgets, and **budgetary control** is the system of using budgets to monitor and regulate a company's performance.

Concept of Budget, Budgeting, and Budgetary Control

- **Budget:** A financial and/or quantitative statement prepared prior to a defined period of time, outlining the policy for that period. It's a roadmap for the company's financial activities.
- **Budgeting:** The act of creating and managing budgets. It's a management function that involves planning, coordinating, and controlling all aspects of a business's operations by allocating resources to achieve specific goals.
- **Budgetary Control:** A system of control that involves setting budgets, continuously comparing actual results with the budgeted amounts, and taking corrective action to achieve the planned objectives. It's the mechanism that makes the budget a powerful tool for cost management and performance evaluation.

Budgeting Process -The budgeting process is a continuous cycle of planning, execution, and review. While specific steps may vary, the general process includes:

1. **Setting Organizational Goals:** The process begins with top management defining the company's overall strategic goals and objectives for the upcoming period. These goals provide the foundation for all functional budgets.
2. **Forecasting and Data Collection:** Relevant data from the previous period, market trends, and economic forecasts are collected to create realistic estimates for sales, expenses, and production.
3. **Preparing Individual Budgets:** Each department (e.g., sales, production, marketing) prepares its own budget based on the master goals. The **sales budget** is often the starting point, as it drives the production, raw materials, and labor budgets.
4. **Budget Negotiation and Coordination:** Departmental budgets are reviewed and negotiated by a budget committee to ensure they are realistic and aligned with each other. This step is crucial for coordinating all activities across the organization.

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5. **Finalization and Approval:** Once all budgets are coordinated and reconciled, they are compiled into a **master budget** and approved by top management.
6. **Implementation:** The approved budget is communicated to all relevant managers and employees, who are responsible for ensuring their activities stay within the planned limits.
7. **Monitoring and Variance Analysis:** Throughout the budget period, actual performance is continuously compared against the budgeted figures. Any significant differences, or **variances**, are analyzed to determine their cause.
8. **Taking Corrective Action:** Based on the variance analysis, managers take timely corrective action to bring performance back on track. This might involve adjusting a process, retraining employees, or, if circumstances have changed drastically, revising the budget itself.

Advantages and Problems of Budgeting-Advantages

- **Planning and Direction:** Budgeting forces management to look forward, anticipate problems, and create a clear plan for the future.
- **Coordination and Communication:** It ensures that all departments work together towards common goals. The process clarifies responsibilities and promotes inter-departmental cooperation.
- **Performance Evaluation:** A budget serves as a benchmark for measuring performance. It helps to identify both high-performing and underperforming areas and personnel.
- **Cost Control:** By setting targets for costs, budgeting helps to control spending, identify waste, and improve efficiency.
- **Motivation:** When employees are involved in the budgeting process, they are more likely to be motivated to meet the targets they helped set.

Problems

- **Rigidity:** Budgets can be inflexible and may not easily adapt to unexpected changes in the business environment, such as a sudden market downturn or a new competitor.
- **Time-Consuming:** The process of preparing and revising budgets can be time-consuming and costly, requiring significant managerial and clerical effort.
- **Unrealistic Targets:** If targets are set too high or too low, they can become a source of demotivation. Unrealistic budgets can lead to stress and employee resentment.
- **"Use it or Lose it" Mentality:** Managers may spend their entire departmental budget by the end of the year to avoid having their next year's budget reduced, even if the spending is not necessary.
- **Data Manipulation:** Managers may intentionally understate revenue and overstate expenses to create "budgetary slack," making it easier to meet their targets.
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Kinds of Budgets; Zero Base Budgeting, Cash Budget, Performance Budgeting -Budgets can be categorized in various ways, but some of the most common types are based on their purpose or the method used for their preparation. The main kinds of budgets include the **master budget**, which is a comprehensive financial plan for the entire organization, and **functional budgets**, which are specific budgets for each department or function (e.g., sales, production, labor, materials).

Zero-Based Budgeting (ZBB) -Zero-based budgeting is a method where every budget item must be justified for each new period, regardless of whether it was in the previous budget. Instead of simply adjusting last year's budget, ZBB starts from a "zero base," meaning all expenses must be re-evaluated and justified from scratch.

- **Process:** Managers must create "decision packages" that justify each activity's need, cost, and expected benefits. These packages are then ranked by importance, and funding is allocated based on the company's priorities. This approach forces managers to question all expenditures and allocate resources more efficiently.
- **Advantages:** It identifies and eliminates unnecessary spending, promotes cost consciousness, encourages strategic resource allocation, and increases accountability since every expense needs to be defended.
- **Disadvantages:** It's a very time-consuming and labor-intensive process that can be resource-intensive. It may also create a short-term focus, as managers prioritize easily justifiable projects over long-term strategic initiatives.

Cash Budget -A **cash budget** is a detailed forecast of a company's expected cash inflows (receipts) and cash outflows (payments) over a specific future period. It's a critical tool for managing liquidity.

- **Purpose:** The primary purpose is to anticipate periods of **cash surplus** or **cash deficiency**. A company can use this information to plan for short-term borrowing (to cover deficits) or for making short-term investments (with surpluses).
- **Components:** It typically includes:
  - **Beginning Cash Balance:** The amount of cash on hand at the start of the period.
  - **Cash Inflows:** Cash collected from sales, loans, asset sales, etc.
  - **Cash Outflows:** Payments for expenses like wages, rent, raw materials, taxes, and loan repayments.
  - **Ending Cash Balance:** The calculated balance at the end of the period.
- **Significance:** It helps a business avoid cash flow problems, manage working capital effectively, and make informed financial decisions.

Performance Budgeting –Performance budgeting is a system that links the allocation of funds to specific, measurable outputs or outcomes. Unlike traditional budgeting, which focuses on what is being spent (inputs), performance budgeting emphasizes what is being achieved (outputs).

- **Purpose:** The goal is to improve accountability and efficiency by relating expenditures to program results. It's particularly common in the public sector and non-profit organizations, where it helps justify the use of taxpayer or donor funds.
- **Process:** Budgets are prepared based on functions, programs, and activities, with clear performance indicators and goals. For example, a fire department's budget wouldn't just be for salaries and equipment; it would be linked to performance metrics like "reducing response time" or "number of fire safety inspections completed."
- **Advantages:** It increases accountability, promotes transparency, improves the effectiveness of programs by focusing on results, and provides a clear basis for resource allocation.
- **Disadvantages:** It can be difficult to quantify some outcomes, especially for service-oriented or social programs. It also risks encouraging a "tunnel vision" where managers focus only on meeting the specific metrics, potentially at the expense of other important, but unmeasured, objectives.

Unit-III: Responsibility Accounting: Responsibility Accounting- Meaning, Features, Objective, Assumptions, Problems, Responsibility Centres - Cost, Profit, Revenue and Investment, Measuring Divisional Performance - Introduction, Different Measures of Financial Performance, Lab based assignments.

Responsibility Accounting- Meaning, Features, Objective, Assumptions, Problems - Responsibility accounting is a management control system that holds individual managers accountable for the revenues, costs, or investments under their control. It works by breaking down a company into smaller, manageable units called **responsibility centers**. These centers can be cost, revenue, profit, or investment centers, and managers are evaluated based on their performance within their respective areas. The core idea is that managers should only be held accountable for things they can directly influence.

Meaning & Features-Responsibility accounting is not a separate accounting system but a framework for presenting and reporting financial data. Its key features include:

- **Organizational Structure:** It requires a clear organizational chart with defined lines of authority and responsibility. The accounting system is structured to mirror this chart.

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- **Controllable vs. Uncontrollable Costs:** A central tenet is to distinguish between costs a manager can control and those they can't. A manager is only evaluated on the costs and revenues they have the authority to influence.
- **Budgets and Standards:** Each responsibility center has a budget or set of performance standards that serves as a benchmark for evaluating performance.
- **Performance Reporting:** It relies on a system of timely and accurate reports that show the difference (variance) between actual and budgeted results for each responsibility center.
- **Management by Exception:** Managers at each level receive reports that focus on significant variances, allowing them to focus their attention on areas that require corrective action.

Objectives and Assumptions-The main goal of responsibility accounting is to create a more efficient and accountable organization.

- **Objectives:**
  - **Cost Control:** It helps control costs by assigning responsibility for them to a specific person.
  - **Performance Evaluation:** It provides a fair and reliable basis for evaluating the performance of managers and departments.
  - **Motivation:** By giving managers more autonomy and holding them accountable for their results, it can increase their motivation and sense of ownership.
  - **Better Decision-Making:** It provides relevant information to managers at all levels, enabling them to make better operational decisions.
  - **Goal Congruence:** It helps align the goals of individual managers with the overall strategic goals of the organization.
- **Assumptions:**
  - The business has a well-defined, decentralized organizational structure.
  - Responsibilities are clearly defined and assigned to specific individuals.
  - Managers have the authority to influence the costs, revenues, or investments for which they are held accountable.
  - There is a reliable reporting system to provide timely and accurate performance reports.

Problems of Responsibility Accounting-While highly effective, responsibility accounting is not without its challenges.

- **Difficulty in Classifying Costs:** It can be difficult in practice to definitively categorize costs as either "controllable" or "uncontrollable." Many costs, like shared fixed costs, are influenced by multiple managers.

- **Conflict with Centralized Functions:** Decisions made by central departments (e.g., IT, HR, or marketing) may impact the costs of a responsibility center, but the manager has no control over those costs. This can lead to frustration and disputes.
- **Focus on Short-Term Goals:** Managers may become so focused on meeting their short-term budget goals that they neglect long-term strategic initiatives or essential but costly activities.
- **Budgetary Slack:** Managers may intentionally propose lower performance targets or overstate costs in their budgets to make their actual performance look better, which can undermine the entire system.
- **Human Factor:** The system can create a high-pressure environment that discourages collaboration between departments, as managers may be reluctant to help colleagues if it negatively impacts their own performance metrics.

Responsibility Centres - Cost, Profit, Revenue and Investment -Responsibility centers are organizational units within a company where a manager is held accountable for a specific set of activities. This framework is a key component of **responsibility accounting**, which aims to improve internal control and performance measurement by breaking down a large organization into smaller, more manageable units. The four main types of responsibility centers are: Cost, Revenue, Profit, and Investment.

1. Cost Center-A **cost center** is a department or division that incurs costs but does not directly generate revenue. Its manager is responsible for controlling and minimizing costs while providing a service or producing a product.

- **Features:**
  - Focuses solely on **costs**.
  - Does not generate revenue.
  - Managers are primarily evaluated on their ability to adhere to a budget and maintain cost efficiency.
- **Examples:** The Human Resources Department, Accounting Department, Maintenance Department, or a specific production unit within a factory.
- **Performance Measurement:** Performance is measured by comparing **actual costs to a budgeted amount** (variance analysis), and by using metrics like cost per unit produced or machine utilization rates.

2. Revenue Center-A **revenue center** is a division responsible for generating sales but is not held accountable for the costs incurred to generate those sales.

- **Features:**
  - Focuses exclusively on **revenues**.
  - Costs are managed at a higher level, and the manager has no control over them.

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    - Managers are evaluated on their ability to meet sales targets.
- **Examples:** A sales department or a ticket counter at a stadium. While they generate revenue, they don't control the costs of the products or services they're selling.
- **Performance Measurement:** Performance is measured by comparing **actual sales to a budgeted revenue target** (sales variance) and by tracking sales volume, market share, and sales growth.

3. Profit Center-A **profit center** is a business unit that is responsible for both its **revenues and its costs**, and therefore, its profitability. The manager of a profit center has more autonomy than a cost or revenue center manager.

- **Features:**
    - Manages both **revenues and expenses**.
    - Has the authority to make decisions that affect both sides of the income statement.
    - Managers are evaluated based on the center's ability to generate a profit.
- **Examples:** A specific department within a large retail store (e.g., the electronics department), a branch office, or a product line.
- **Performance Measurement:** Performance is measured by the **profitability** of the center. Key metrics include contribution margin, gross profit, and controllable profit.

4. Investment Center-An **investment center** is the highest level of responsibility center. The manager is responsible for **revenues, costs, and the investment in assets** used by the center. They have the authority to make capital investment decisions.

- **Features:**
    - Controls **revenues, expenses, and capital investments**.
    - Acts almost as a self-contained business within the larger company.
    - Managers are held accountable for how effectively they use the company's assets to generate profits.
- **Examples:** A major division of a large corporation (e.g., General Motors' Chevrolet Division) or a subsidiary company.
- **Performance Measurement:** Performance is measured by how well the center generates a return on its invested capital. Key metrics include **Return on Investment (ROI)**, **Residual Income (RI)**, and **Economic Value Added (EVA)**.

Measuring Divisional Performance - Introduction, Different Measures of Financial Performance

Introduction to Measuring Divisional Performance-Measuring divisional performance involves evaluating the financial and operational performance of a company's decentralized business units, or divisions. In a decentralized structure, divisional managers have significant

autonomy to make decisions about their operations, pricing, and investments. To ensure these decisions align with the company's overall strategic goals, management uses a variety of metrics to assess each division's contribution and hold managers accountable. These measures help to identify areas of strength and weakness, guide resource allocation, and motivate managers to make decisions that enhance shareholder value.

Different Measures of Financial Performance-While different types of responsibility centers (cost, revenue, profit, investment) have their own performance metrics, for **investment centers**, which are the highest level of responsibility and control capital assets, the primary financial measures are:

1. Return on Investment (ROI)-ROI is the most widely used measure of divisional performance. It expresses a division's operating profit as a percentage of the assets employed in that division. ROI is a powerful tool because it allows for the comparison of divisions of different sizes.

- **Formula:** ROI=Divisional AssetsDivisional Operating Income×100%
- **Pros:** It's easy to calculate and understand, and it encourages managers to focus on both increasing profits and using assets efficiently.
- **Cons:** ROI can lead to **dysfunctional behavior** or **sub-optimization**. A division manager with a high ROI may be reluctant to accept a profitable new project if its ROI is lower than the division's current ROI, as it would cause the division's overall ROI to decrease. This can lead to decisions that are not in the best interest of the entire company.

2. Residual Income (RI)-Residual income is a measure that calculates the profit a division earns above a minimum required rate of return on its assets. Unlike ROI, RI is an absolute dollar value, not a percentage.

- **Formula:** RI=Divisional Operating Income−

  (Divisional Assets×Minimum Required Rate of Return)

- **Pros:** RI is designed to overcome the sub-optimization problem of ROI. It encourages managers to invest in any project that earns a return greater than the company's minimum required rate of return, as this will always increase the division's RI. This aligns divisional goals with corporate goals.
- **Cons:** Since RI is an absolute dollar amount, it makes it difficult to compare the performance of divisions of different sizes. A larger division will almost always have a higher RI than a smaller one, even if the smaller division is performing more efficiently.

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3. Economic Value Added (EVA)-Economic Value Added (EVA) is a refinement of the residual income concept. It measures a division's "true" economic profit by subtracting the cost of capital from its after-tax operating profit. EVA is also a dollar amount.

- **Formula:**
  EVA=Net Operating Profit After Taxes(NOPAT)−(Capital Employed×Weighted Average Cost of Capital(WACC))
- **Pros:** EVA is considered superior to both ROI and RI because it aligns management decisions directly with shareholder wealth maximization. It accounts for the actual cost of all capital (debt and equity) used by the division.
- **Cons:** Calculating EVA is complex as it requires a number of adjustments to standard financial accounting figures to arrive at NOPAT and Capital Employed. It can be difficult to implement and explain to divisional managers.

Unit-IV: Strategic Management Accounting: Target Costing; Kaizen Costing; Life Cycle Costing; Just-in-Time Approach; Value Chain Analysis; Cost Accounting Standards, Balanced Scorecard, Lab based assignments.

Strategic Management Accounting (SMA) is the **integration of management accounting information with business strategy** to support decision-making and achieve competitive advantage.It goes beyond traditional cost control and financial reporting, focusing on long-term planning, competitor analysis, and value creation.Strategic management accounting is an approach that uses both financial and non-financial information to help a company develop and implement its corporate strategy and achieve a competitive advantage. It differs from traditional management accounting by focusing on external factors, such as competitor costs and market share, in addition to internal data.

2. Features

- Forward-looking, future-oriented
- External focus (competitors, industry trends, customers)
- Links financial and non-financial information
- Supports strategic decisions like pricing, outsourcing, product mix, investment, and market entry
- Focuses on **long-term performance** rather than short-term profit

3. Objectives

- Provide information for **strategic decision-making**
- Enhance **competitive advantage**

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- Align management accounting with overall **business strategy**
- Monitor **industry trends, competitors, and customer needs**
- Support **value creation and cost leadership/differentiation strategies**

4. Techniques of SMA-Some widely used SMA tools and techniques include:

1. **Benchmarking** – Comparing performance with industry leaders
2. **Value Chain Analysis** – Evaluating each stage of operations for efficiency
3. **Target Costing** – Setting product costs based on competitive market price
4. **Life Cycle Costing** – Analyzing total cost across product life cycle
5. **Balanced Scorecard (BSC)** – Linking financial and non-financial performance measures
6. **Competitor Analysis** – Assessing competitor costs, pricing, and profitability
7. **Activity-Based Costing (ABC)** – Allocating costs based on activities and resources used
8. **Customer Profitability Analysis** – Understanding which customers/products generate value

5. Difference Between Traditional Management Accounting & SMA

Aspect	**Traditional Management Accounting**	**Strategic Management Accounting**
Focus	Internal, historical data	External + internal, future-oriented
Timeframe	Short-term (monthly/quarterly)	Long-term (strategic horizon)
Objective	Cost control, reporting	Competitive advantage, value creation
Tools	Budgeting, variance analysis	BSC, value chain, competitor analysis
Decision	Operational	Strategic

6. Importance of SMA

- Helps in **long-term sustainability**
- Improves **decision-making in dynamic environments**
- Identifies **new market opportunities**
- Enhances **cost competitiveness**
- Provides **integrated financial + strategic perspective**

In summary:**Strategic Management Accounting (SMA) is a bridge between strategy and accounting**, providing managers with information that helps shape long-term business success in a competitive environment.

Target Costing-Target costing is a strategic costing method used to manage a product's costs over its life cycle. It starts by determining the price a company believes the market will bear for

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a product, then subtracts the desired profit margin to arrive at the maximum allowable cost. This "target cost" is a cap that the product's design and manufacturing must not exceed.

- **Formula:** Target Cost=Target Selling Price−Desired Profit Margin
- **Key Idea:** Instead of designing a product and then figuring out its price, a company determines the price first and then designs a product that can be profitably sold at that price. This approach drives cost reduction from the very beginning of the product's life cycle, during the design and development phase.

Target costing is a **cost management technique** where the market price and desired profit determine the maximum allowable cost of a product.It is a **market-driven, customer-focused** approach.

Process

1. Determine the **expected selling price** (based on market conditions and competitors).
2. Deduct the **desired profit margin**.
3. The result = **Target Cost** (maximum cost allowable).
4. Design and produce the product within this cost constraint.

Example-If the market price of a smartphone = ₹20,000 and profit margin desired = ₹5,000 → Target cost =₹15,000.The company must design and source materials within this cost.

Benefits

- Aligns cost with customer expectations.
- Prevents overpricing.
- Encourages innovation and efficient design.

2. Kaizen Costing-Kaizen costing is a continuous improvement philosophy focused on cost reduction for existing products and processes. While target costing is applied during the design phase, kaizen costing is applied during the **production phase**. The word "Kaizen" is a Japanese term for "continuous improvement."

- **Key Idea:** It sets a target for small, incremental cost reductions over time rather than a single large cost cut. This is achieved through daily, ongoing improvements in the production process, often led by cross-functional teams. For example, a company might set a goal to reduce a product's direct labor and material costs by 1% each month.

Kaizen costing focuses on **continuous cost reduction** during the **production stage** of a product's life cycle.Unlike target costing (applied in the design phase), Kaizen costing applies **after production begins**.

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Principle-Small, continuous improvements (Kaizen = "change for the better" in Japanese).

Techniques

- Improve work processes.
- Reduce waste and inefficiencies.
- Engage employees at all levels in cost reduction.

Example-In automobile manufacturing, workers suggest small improvements in assembly-line processes that reduce material waste or save time → lowering costs.

Benefits

- Sustained cost reduction.
- Promotes employee involvement.
- Enhances competitiveness.

3. Life Cycle Costing (LCC)-Life cycle costing is a method that tracks and accumulates a product's costs over its entire life cycle, from research and development (R&D) to its eventual withdrawal from the market. It recognizes that a company's decisions during one phase of a product's life can have significant cost implications in later stages.

- **Key Idea:** It provides a holistic view of a product's profitability by including costs that are often overlooked, such as R&D, design, manufacturing, marketing, distribution, and even end-of-life disposal. It helps managers make more informed decisions by showing the "total cost of ownership."

Life cycle costing considers the **total cost of ownership** of a product from its **design to disposal** (entire life span).It ensures long-term profitability rather than just focusing on production costs.

Stages of Costs

1. **Pre-production**: Research, design, product development.
2. **Production**: Manufacturing, labor, materials.
3. **Post-production**: Marketing, distribution, customer service.
4. **End-of-life**: Disposal, recycling.

Example-An aircraft company considers not only manufacturing costs but also maintenance, fuel efficiency, and disposal costs when pricing an airplane.

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Benefits

- Helps in pricing decisions.
- Prevents underestimation of long-term costs.
- Ensures products are profitable throughout their life.

Comparison Table

Aspect	Target Costing	Kaizen Costing	Life Cycle Costing
Stage	Product design & planning	Production phase	Entire product life cycle
Focus	Achieving target cost before launch	Continuous cost reduction	Total cost over product's life
Approach	Market-driven, customer-focused	Continuous improvement	Long-term cost analysis
Key Benefit	Ensures competitive pricing	Ongoing efficiency	Holistic profitability

☞ In short:

- **Target Costing** = Cost planning before launch.
- **Kaizen Costing** = Cost reduction during production.
- **Life Cycle Costing** = Cost analysis across product's whole life.

Just-in-Time (JIT) Approach-Meaning The **Just-in-Time (JIT) approach** is a production and inventory management philosophy aimed at eliminating waste by producing and delivering goods only when they are needed. It's based on the idea that inventory is a form of waste and that having excess inventory hides inefficiencies.

- **Key Idea:** JIT works by synchronizing production with customer demand, which minimizes inventory holding costs and frees up capital. It relies on a strong relationship with suppliers who can deliver high-quality materials on short notice. The success of JIT is often tied to other principles like continuous improvement and total quality management.

Just-in-Time is an **inventory management and production philosophy** where materials are purchased and products are made **only when needed**, reducing waste and holding costs. It is closely linked to lean manufacturing.

Features

- Zero or minimum inventory

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- Materials delivered “just in time” for production
- Strong supplier coordination
- Demand-driven production

Advantages

- Reduces inventory holding cost
- Minimizes waste and obsolescence
- Improves efficiency & quality
- Strengthens supplier relationships

Limitations

- High dependency on suppliers
- Risk of production stoppage due to delays
- Not suitable if demand fluctuates heavily

Value Chain Analysis (VCA)-Meaning Proposed by Michael Porter, Value Chain Analysis examines all **activities of a business** (from input procurement to final customer service) to identify sources of **cost advantage or differentiation**.

Value chain analysis is a strategic tool for identifying the key activities that create value for a customer and for analyzing how these activities can be optimized to achieve a competitive advantage. The value chain, as conceptualized by Michael Porter, consists of a company's primary and support activities.

- **Primary Activities:** Directly involved in creating and delivering a product or service (e.g., inbound logistics, operations, marketing, sales).
- **Support Activities:** Enable the primary activities to function efficiently (e.g., procurement, technology development, human resource management).
- **Key Idea:** By analyzing each activity, a company can find ways to either lower costs (cost advantage) or add value to justify a higher price (differentiation advantage).

Components of Value Chain

1. **Primary Activities**
    - Inbound logistics (material handling, warehousing)
    - Operations (production, assembly)
    - Outbound logistics (distribution, delivery)
    - Marketing & Sales (promotion, pricing, selling)
    - Services (after-sales, warranty, support)
    -

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2. **Support Activities**
    - Firm infrastructure (finance, planning, control)
    - Human resource management (recruitment, training)
    - Technology development (R&D, innovation)
    - Procurement (purchasing resources)

Purpose

- Identify value-adding activities
- Eliminate or improve non-value-adding activities
- Achieve **cost leadership** or **differentiation strategy**

Cost Accounting Standards (CAS)-Meaning-Cost Accounting Standards are **guidelines and principles** issued to bring **uniformity, consistency, and transparency** in cost accounting practices across industries.In India, these are issued by the **Institute of Cost Accountants of India (ICAI-CMA)**.

Objectives

- Ensure consistency in cost measurement and reporting
- Facilitate comparison across organizations
- Help in regulatory compliance (e.g., pricing, taxation, government contracts)
- Improve reliability of cost information for decision-making

Examples of CAS (India)

- **CAS-1**: Classification of Cost
- **CAS-2**: Capacity Determination
- **CAS-3**: Overheads
- **CAS-6**: Material Cost
- **CAS-7**: Employee Cost
- **CAS-22**: Manufacturing Cost
- (Total 24 Cost Accounting Standards issued so far)

Comparison Snapshot

Concept	Focus Area	Key Benefit
JIT	Inventory & production management	Lower inventory costs, lean operations

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Concept	Focus Area	Key Benefit
Value Chain Analysis	All business activities	Identifies value creation & cost advantage
Cost Accounting Standards	Uniform cost practices	Transparency, comparability, compliance

👉 Together:

- **JIT** improves **operational efficiency**.
- **Value Chain Analysis** improves **strategic positioning**.
- **Cost Accounting Standards** ensure **accuracy & consistency** in cost data.

Cost Accounting Standards (CAS)-Cost Accounting Standards (CAS) are a set of 19 standards and rules issued by the U.S. government for use by contractors in determining costs on negotiated procurement contracts. While they are a form of regulation, they are crucial for providing uniformity and consistency in cost accounting practices, particularly for government contractors.

- **Key Idea:** The purpose of CAS is to ensure that costs are consistently estimated, accumulated, and reported. This prevents contractors from manipulating their accounting methods to their advantage when dealing with government contracts, ensuring fair and accurate pricing.

Cost Accounting Standards are **uniform rules and guidelines** issued to regulate, standardize, and bring consistency in the **measurement, assignment, classification, and reporting of costs**. In India, they are issued by **The Institute of Cost Accountants of India (ICAI-CMA)**.

Objectives

- Ensure **consistency and comparability** of cost data.
- Improve **accuracy and reliability** of cost accounting information.
- Facilitate **regulatory compliance** (e.g., government contracts, pricing, SEBI, taxation).
- Assist management in **cost control and decision-making**.

Examples of CAS (India)

- **CAS-1**: Classification of Cost
- **CAS-2**: Capacity Determination
- **CAS-3**: Overheads
- **CAS-6**: Material Cost

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- **CAS-7**: Employee Cost
- **CAS-22**: Manufacturing Cost

Balanced Scorecard (BSC)-The **Balanced Scorecard** is a strategic performance management tool that provides a holistic view of a company's performance by linking its strategic objectives to a set of measurable metrics. It goes beyond traditional financial measures to include non-financial perspectives.

- **Four Perspectives:**
    1. **Financial:** How a company looks to its shareholders (e.g., profitability, revenue growth).
    2. **Customer:** How a company looks to its customers (e.g., customer satisfaction, market share).
    3. **Internal Business Processes:** What a company must excel at to satisfy customers (e.g., product quality, operational efficiency).
    4. **Learning and Growth:** How a company can sustain its ability to change and improve (e.g., employee skills, technology).
- **Key Idea:** The balanced scorecard helps an organization translate its vision into a clear, actionable plan by ensuring that managers focus on a balanced set of leading and lagging indicators, not just financial results.

The Balanced Scorecard, developed by **Robert Kaplan and David Norton**, is a **strategic performance management tool.**It measures organizational performance from **four perspectives**, balancing financial and non-financial measures.

Perspectives of BSC

1. **Financial Perspective**
    - Profitability, ROI, revenue growth.
2. **Customer Perspective**
    - Customer satisfaction, retention, market share.
3. **Internal Business Process Perspective**
    - Efficiency, innovation, quality, cycle time.
4. **Learning & Growth Perspective**
    - Employee skills, training, innovation, knowledge management.

Benefits of BSC

- Provides a **holistic view** of performance.
- Links **strategy with operations**.
- Encourages **long-term sustainability**, not just short-term profits.
- Aligns employees' actions with business strategy.

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Comparison Snapshot

Aspect	Cost Accounting Standards (CAS)	Balanced Scorecard (BSC)
Nature	Guidelines for cost measurement & reporting	Performance measurement & management tool
Focus	Cost transparency, consistency	Strategic alignment, balanced performance
Issued By	ICAI-CMA (India)	Kaplan & Norton (conceptual framework)
Application	Cost control, compliance	Strategy execution, performance evaluation

In short: **CAS** = Standardization of cost practices (accuracy, consistency).

- **BSC** = Strategic tool to measure performance beyond financial results.

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