CMAs ROLE IN CREDIT APPRAISAL, PROJECT FINANCING, AND COST BENEFIT ANALYSIS

Abstract

Cost and Management Accountants (CMAs) play a pivotal role in strengthening the credit appraisal ecosystem by providing scientific costing analysis, operational insights, and financial-cost integration for lending institutions. Their expertise is particularly valuable in evaluating the borrower's cost structure, product-wise profitability, working capital efficiency, and cash-flow sustainability-areas often overlooked in traditional financial appraisals. As banks increasingly rely on data-driven assessments, the technical competence of CMAs helps identify hidden inefficiencies in manufacturing and service industries through tools such as marginal costing, activity-based costing, cost-volume-profit (CVP) analysis, capacity utilization studies, and variance analysis. This article highlights how CMAs contribute to assessing credit risk more accurately by evaluating viability, sensitivity, production costs, and break-even dynamics. Real-world examples demonstrate how costing insights can reveal risks missed by financial statements alone. By integrating technical costing expertise with financial analytics, CMAs ensure more reliable lending decisions and enhance credit discipline in the economy.

Introduction

Credit appraisal is central to responsible lending, requiring banks to judge a borrower's ability to generate stable cash flows. Financial statements offer a broad view but often miss internal cost inefficiencies, flawed pricing, and product-level losses.

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Cost and Management Accountants (CMAs) bridge this gap. Their expertise in cost records, working capital, and operational analysis provides a scientific evaluation of business viability. In sectors where input prices, labour usage, and overhead absorption frequently fluctuate, CMA-driven cost audits and analyses become essential tools for accurate credit risk assessment.

Why CMAs Are Critical in Credit Appraisal

Banks traditionally assess creditworthiness through financial ratios, cash flows, collateral strength, market reputation, and repayment history. Yet these measures often overlook operational inefficiencies. A business may show profits while under-absorbing overheads, misallocating fixed costs, or overvaluing inventory, all of which distort real margins, inflate working capital needs, and weaken long-term repayment ability.

CMAs bridge this critical gap by delivering a deeper operational perspective by:

1. **Ensuring accurate product costing**
2. **Assessment of idle capacity and its**

impact

3. **Verification of overhead absorption**
4. **Working capital cycle analysis**
5. **Risk assessment based on Cost audit**
6. **Sensitivity and break-even analysis**

By integrating these insights, CMAs serve as both **risk mitigators for banks** and **performance-enhancing advisors for borrowers,** strengthening credit decisions and improving business sustainability.

Key Costing Functions Performed by CMAs in Credit Appraisal

1. Product-Wise Cost Sheet Evaluation

Banks typically assess performance at an entity level, whereas CMAs examine **product-level cost behaviour,** reviewing:

- Material cost Trends
- Labour cost - standard vs. actual
- Overhead classification and distribution
- Department-wise cost allocation
- Selling and distribution cost review

Technical Illustration

A textile unit applies overhead at ₹50 per machine hour. When maintenance downtime reduces machine hours but fixed overheads remain unchanged, unit costs become understated and profitability appears inflated. A CMA quickly highlights this under-absorption and its effect on margins.

CMAs uncover true cost pressures and margin erosion, enabling banks to identify early operational stress and assess borrower health more accurately.

2. Marginal Costing and Pricing Viability

Marginal costing gives banks a clearer view of pricing strength and cost–volume behaviour—areas that traditional financial statements often blur. By separating variable and fixed costs, CMAs help evaluate:

- Minimum viable selling price
- Contribution margin adequacy
- Ability to withstand price cuts or volume drops
- Profit sensitivity to output changes

Technical Illustration

- Contribution per unit: ₹40
- Fixed costs: ₹6,00,000
- Break-even volume: 15,000 units

At 12,000 units, the firm is below break-even, indicating viability stress even if accounts show short-term profit due to inventory or timing effects.

A CMA-led marginal costing review separates fixed and variable costs, helping banks evaluate pricing sustainability, volume adequacy for debt servicing, and exposure to market fluctuations, thereby improving credit appraisal and early risk detection.

3. Activity-Based Costing (ABC) for Modern Credit Appraisal

Activity-Based Costing (ABC) is vital when businesses manage multiple products or processes. Unlike traditional costing, which allocates overheads using broad bases like labour or machine hours, ABC assigns costs according to the actual activities each product consumes. This gives banks a clearer view of true product-level profitability.

Technical Illustration

A borrower's "high-value" product appears profitable under traditional costing. ABC reallocates setup time, specialised machining, and inspection effort to this product, revealing thin or negative margins.

For lenders, this exposes margin risk, cross-subsidisation, and cash-flow strain, allowing CMAs to flag hidden vulnerabilities and support more accurate credit decisions.

4. Standard Costing and Variance Analysis

Standard costing and variance analysis give lenders early warnings that traditional financial statements may miss. Variances reveal gaps between planned and actual performance, allowing banks to pinpoint operational stress quickly.

Key indicators include:

- **Material variances** – signalling procurement issues, price pressures, quality problems, or pilferage
- **Labour variances** – reflecting idle time, overtime misuse, or productivity shortfalls
- **Overhead variances** – indicating excess capacity or poor cost control
- **Sales variances** – revealing demand weakness, pricing pressure, or customer concentration risks

Illustrative Case

A company budgets material at ₹100/kg but procures at ₹130/kg, creating a ₹30 adverse price variance. Further review shows reliance on a single supplier, distorting cost forecasts and heightening supply-chain risk.

Such variance insights enable CMAs to highlight procurement weaknesses and operational vulnerabilities that financial ratios cannot capture, supporting more reliable credit assessment.

5. Cost of Idle Capacity and Loan Viability

Idle capacity is one of the most critical yet overlooked determinants of a borrower's repayment ability. Under-utilisation directly inflates fixed overheads per unit, weakens margins, and ultimately reduces the DSCR (Debt Service Coverage Ratio).

Illustration

- Installed capacity: 10,000 units/month
- Actual output: 6,000 units
- Idle capacity: 40%

Under-utilisation raises overhead per unit and compresses operating cash flows, weakening debt-servicing capacity.

CMAs quantify idle-capacity cost using machine-hour analysis and overhead variances, helping banks distinguish structural inefficiency from temporary demand issues and improving credit judgement.

6. Working Capital Assessment Using CMA Data

Banks rely extensively on the CMA Report (Forms I–VII) for working capital appraisal, making its accuracy crucial. A CMA ensures that financial data reflects true operational and cost conditions, not just accounting figures.

A CMA-led review provides:

- Proper classification of current assets and liabilities
- Realistic inventory valuation
- Accurate receivables ageing
- Creditor periods in line with industry norms
- Sales projections based on actual capacity
- Cash flows tied to cost and production structure
- A working capital cycle that mirrors real operations

Banks increasingly prefer CMA-prepared statements due to their **integrity, cost-focus, and alignment with actual business operations,** improving both sanction quality and post-sanction monitoring.

Cost Audit Insights Useful for Banks

Cost audit under Section 148 of the Companies Act provides powerful data points:

- Quantitative records
- Input-output ratio

- Energy consumption pattern
- Labour utilisation ratio
- Stock reconciliation
- Abnormal loss costing
- Margin analysis
- Utility cost behaviour

For instance, abnormal wastage of raw materials or low yield indicates rising working capital requirements and pressure on cash flows. When banks recognise such inefficiencies early, they can better judge the borrower's true liquidity position.

CMAs and Credit Risk Mitigation through Cost Insights

1. Identifying Over-Trading

When sales rise but contribution falls, the business is pushing volume without earning more. CMA helps banks flag such over-trading before lending.

2. Detecting Inventory Overvaluation

Borrowers may overstate WIP, finished goods or slow-moving stock. Using proper costing (FIFO/LIFO/Weighted Avg + absorption), CMA uncovers inflated inventory values.

3. Incorrect Product Pricing

Many businesses sell at a loss but report profits due to wrong overhead absorption.

Example: Actual cost ₹120, selling price ₹115 → ₹5/unit loss. CMA reveals the true cost and loss.

4. Cash-Flow & Cost Linkage

CMA reviews the conversion cycle, inventory liquidity, cost-driven cash usage and payment terms, giving banks more realistic cash-flow projections.

CMAs in Project Finance Credit Appraisal

Project finance demands precise costing of machinery, utilities, labour, raw materials, manufacturing processes, capacity utilisation, cost–benefit ratios, DSCR, and sensitivity checks.

CMAs support this by preparing:

- **Detailed Project Reports (DPRs)**
- **Sensitivity analysis (±10% price/ volume change)**
- **Break-even capacity**
- **Cost of production and profitability statements**
- **Feasibility studies**

Advanced Costing Tools for Credit Appraisal

1. Throughput Accounting

Identifies production bottlenecks, helping banks assess whether the borrower can actually scale output after receiving funds.

2. Target Costing

Example: Market price ₹500, profit target ₹50 → target cost ₹450.

If actual cost is ₹480, the gap signals higher financing risk unless a credible cost-reduction plan exists.

3. Life Cycle Costing

Crucial for solar, machinery, and infrastructure projects.

Banks must factor in long-term operating and maintenance costs to judge sustainability of cash flows and repayment capacity.

Sector-Specific Costing Inputs by CMAs

1. Manufacturing Sector

- Material yield analysis
- Energy cost mapping
- Scrap ratio computation
- Batch costing
- Job costing
- Capital intensity vs output

2. Service Sector

- Employee cost per service unit
- Overhead absorption per job

- Capacity utilisation
- Customer profitability

3. Construction Sector

- Contract costing
- Escalation clauses
- Cost overrun analysis

CMA's Supporting Role in Bank Monitoring

After loan sanction, CMAs assist in:

- Stock audits
- Concurrent audits
- TEV studies
- Forensic costing
- Monitoring end-use of funds
- Checking diversion of funds

Cost audits often uncover manipulation in:

- Inventory
- Production records
- Power consumption
- Capacity claims

These findings help banks prevent NPAs.

Case Study: Thabet, D. A. (no date) "Management Accounting Systems, Credit Risk Management Practices and Organizational Performance at Commercial Banking Sector in Palestine."

Evidence from the Palestinian banking study shows that strong management-accounting systems enhance credit-risk assessment. Similarly, CMA-led reviews of cost data—such as variance analysis, overhead absorption, utilisation gaps, and contribution diagnostics— provide lenders clearer visibility of operational efficiency and cash-flow risk, enabling more precise credit decisions, including revised limits, tighter terms, or altered lending outcomes.

Conclusion

CMAs are indispensable to the financial ecosystem due to their analytical rigor, cost mastery, and statutory relevance. Their involvement in credit appraisal enhances lender confidence through robust risk evaluation and compliance verification. In project financing, they ensure that project assumptions, cash flows, and risk assessments reflect economic realities, supporting sustainable financing decisions. In cost–benefit analysis, they quantify economic and social value with scientific accuracy, enabling optimal capital allocation. With increasing regulatory complexity and growing emphasis on economic efficiency, CMAs will continue to play a pivotal role in shaping India's financial and developmental landscape. MA

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Congratulations!!!

CMA Rajeev Mehrotra

Our heartiest congratulations to CMA Rajeev Mehrotra, Member of the Institute, who has been appointed by Supreme Court in the three-member committee headed by former Chief Justice of Jammu and Kashmir High Court Justice, M M Kumar to oversee the Corporate Insolvency Resolution Process (CIRP) of Realty Major Supertech Realtors Pvt. Ltd. The committee will also comprise former National Buildings Construction Corporation (NBCC) Chief Managing Director Anoop Kumar Mittal. The top court asked the Committee "to appoint a reputed and experienced entity to conduct a forensic audit of the accounts of the Corporate Debtor (Supertech Realtors Pvt. Ltd) and its parent company".

CMA Rajeev Mehrotra is Former Chairman and Managing Director of RITES Ltd. (2012-2021). He was responsible for overall corporate performance management, matters of policies and business strategy, internal controls, listing and company law matters, investors relations, Legal and taxation matters of projects in India and abroad, audit and compliances etc. He served as Member Technical with NCLT at Jaipur bench during July 23 to Sept.24, during which several complex matters on IBC and company law were handled. He also srved as Director Finance of RITES Limited during 2007-2012 with the same company and received advanced training in Financial Management of power utilities from Samford University in USA, attended programme on Investment Appraisal and Risk Management from Harvard Institute for International Development, USA and Advance management Program on Global leadership from IMI in New Delhi and ESCP Paris. He was conferred with "ICON OF THE YEAR AWARD" by the Institute of Cost Accountants of India in March 2012.

We wish CMA Rajeev Mehrotra the very best for all his future endeavours.