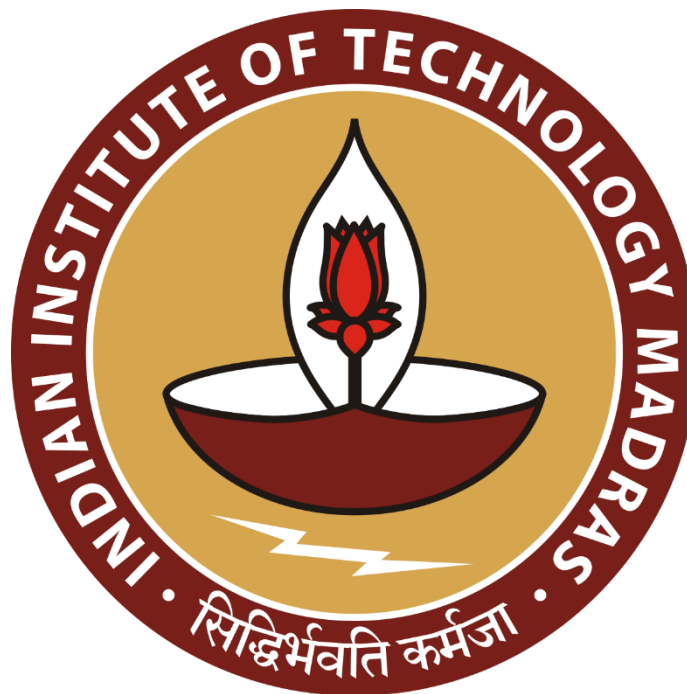# Resolving Inventory Strain and Profitability Gaps in Gift Retail

A Proposal report for the BDM capstone Project

Submitted by

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Declaration Statement

I am working on a Project Title "**Resolving Inventory Strain and Profitability Gaps in Gift Retail**". I extend my appreciation to Gupta Gift Shop, for providing the necessary resources that enabled me to conduct my project.
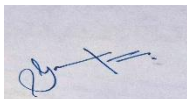
I hereby assert that the data presented and assessed in this project report is genuine and precise to the utmost extent of my knowledge and capabilities. The data has been gathered through primary sources and carefully analyzed to assure its reliability.

Additionally, I affirm that all procedures employed for the purpose of data collection and analysis have been duly explained in this report. The outcomes and inferences derived from the data are an accurate depiction of the findings acquired through thorough analytical procedures.

I am dedicated to adhering to the information of academic honesty and integrity, and I am receptive to any additional examination or validation of the data contained in this project report.

I understand that the execution of this project is intended for individual completion and is not to be undertaken collectively. I thus affirm that I am not engaged in any form of collaboration with other individuals, and that all the work undertaken has been solely conducted by me. If plagiarism is detected in the report at any stage of the project's completion, I am fully aware and prepared to accept disciplinary measures imposed by the relevant authority.

I agree that all the recommendations are business-specific and limited to this project exclusively and cannot be utilized for any other purpose with an IIT Madras tag. I understand that IIT Madras does not endorse this.

Signature of candidate
Name: Nitin Gupta
Date: 1 June 2025

1 Executive Summary and Title

This project "**Resolving Inventory Strain and Profitability Gaps in Gift Retail**" presents a comprehensive analysis of the operational and financial challenges faced by *Gupta Gift Shop*; a retail business located on Mall Road near Yak Hotel in Himachal Pradesh. Operating under a B2C model, the shop specializes in a wide range of gift items. The primary issues identified include inefficient inventory management and low pricing margins, both of which significantly affect the shop's profitability and cash flow.

To address these challenges, a data-driven financial analysis is proposed, leveraging historical sales data to gain insights into cost structures, pricing patterns, and profit/loss trends. This approach will help establish appropriate margins to ensure sustainable revenue generation. For inventory-related concerns, the project recommends implementing **ABC Analysis** to prioritize stock control based on product value and **Demand Forecasting** to align purchasing decisions with customer demand patterns. For margin management problems, the project proposes **a Financial Analysis** this helps the business to get the actual view of financial health

The expected outcome of this initiative is a more strategic pricing model and improved inventory efficiency, leading to reduced capital lock-up and enhanced profitability. These solutions aim to support *Gupta Gift Shop* in achieving long-term financial stability and better resource utilization, enabling the business to respond effectively to seasonal demand and market dynamics.

2   Organization Background

Gupta Gift Shop, owned by Mr. Dalip Gupta, is a well-established retail business located on Mall Road near Yak Hotel in Himachal Pradesh. Established in 2015, the shop reflects Mr. Gupta's extensive experience in sales and his deep understanding of the retail market. With more than a decade of legacy in the gift retail space, the shop has grown into a trusted and recognizable name among both locals and tourists.

Operating under a B2C (Business-to-Consumer) model, Gupta Gift Shop offers a wide range of attractive and unique gift items including hemp bags, key chains, showpieces, bubble heads, wooden bags, key holders, pocket mirrors, and dream catchers. The shop is strategically located in a busy commercial hub surrounded by 40–50 other retailers, contributing to consistent foot traffic and strong customer engagement.

Over the years, the business has built solid relationships with wholesalers and neighboring vendors, while also establishing a loyal customer base. These strong supplier networks and repeat customers have enhanced its reputation for quality and reliability, positioning Gupta Gift Shop as a prominent player in the local gift retail market.

3   Problem Statement

3.1   The business struggles with poor inventory management, causing an excess stock of slow-moving items and frequent unavailability of high-demand products. This imbalance ties up working capital in unsold goods and leads to missed sales opportunities, ultimately affecting profitability and reducing overall operational efficiency.

3.2   Business faces challenges in managing profit margins effectively, as products are often priced too low compared to their costs. This practice reduces overall profitability, restricting the financial flexibility needed for reinvestment, expansion, and long-term growth, ultimately hindering the shop's ability to compete and sustain itself in a dynamic market.

4   Background of the Problem

In business owner Mr. Dalip Gupta, faces several operational challenges that are typical in a small-scale retail business. One of the primary issues is the lack of a proper system for maintaining accurate records of daily sales and purchases. Without structured bookkeeping or digital tracking, it becomes difficult to monitor how much revenue is generated each month or to calculate the daily turnover required to meet financial targets. This lack of financial visibility hinders effective decision-making and planning. Furthermore, there is considerable uncertainty when it comes to pricing strategy—particularly in determining the appropriate profit margin to add to products. Without clear insights into costs, market rates, and competitor pricing, setting the right selling price to maximize profit while remaining competitive becomes a challenge. These gaps in financial management and pricing strategy make it difficult for Mr. Gupta to optimize the shop's profitability and plan for future growth.

In summary, the problems stem from the lack of maintenance of transactional data in business, combined with the inappropriate margins these problems may lead to generating low profits. Addressing these challenges becomes vital for bringing financial clarity and smooth operations to the business.

5   Problem Solving Approach

5.1   Given the nature of the problems faced by "Gupta Gift Shop", a comprehensive approach involving both quantitative and qualitative methods is required.

I. Quantitative Methods:

➢   Time-Series Analysis: Given the time-dependent nature of financial data, time-series analysis will help me to identify trends, patterns, and variations in the business's financial aspects.

➢   Statistical Computation: I plan to utilize various statistical computations to analyze financial data, extracting meaningful insights.

II. Qualitative Methods:

➢   Conversation: I plan to engage with the owner, Mr. Dalip Gupta, to gather qualitative insights into the challenges faced, his perspectives on his problems like inventory and margin management issues.

➢   Benchmarking: I plant to compare "Gupta Gift Shop" with similar businesses in the market to identify best practices regarding his problems.

5.2   Details about the intended data collection with justification

Data Collection

➢   Sales Data: Collected six months' sales data on past transactions, including cost prices, selling prices, quantities sold and purchasing of quantities. This data will be used for financial analysis and the formulation of inventory management to calculate desire/undesired stock.

➢ By analyzing the sales data, I was able to determine the margin between the cost and the selling price. This analysis facilitates accurate profit calculation and supports the development of an effective pricing strategy to ensure appropriate and sustainable selling prices for the products.
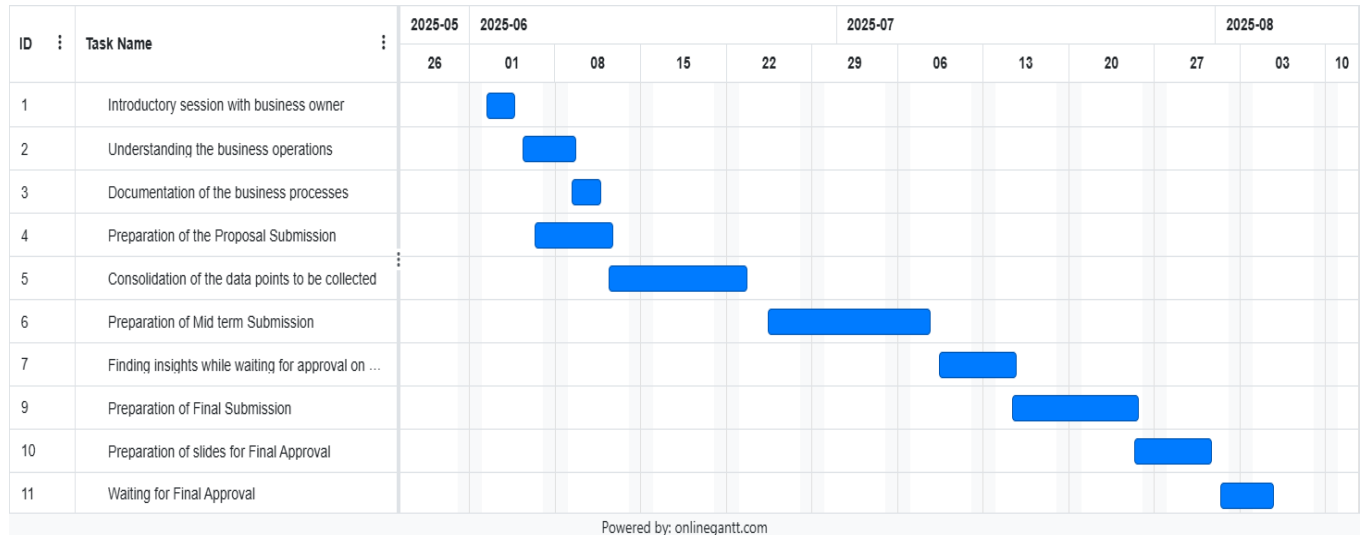
Justification:

➢ The collected sales data provides a solid basis for analyzing cost, selling price, and quantities sold. This helps in accurately determining profit margins and identifying pricing inefficiencies. It also supports inventory analysis by highlighting overstocked and fast-moving items. Overall, the insights gained enabled better pricing strategies and inventory control, improving profitability and operational efficiency for *Gupta Gift Shop*.

5.3   Analysis Tools:

➢ **Google Sheets:** Converting raw data from books to google sheets.
➢ **Google Collab:** For preliminary data processing, data cleaning, and analysis. Drawing charts and conducting various statistical computations. In google collab this will be done by "Python with Pandas, Matplotlib and Seaborn library".
➢ **Power Bi:** After cleaning data and basic analysis, I create dynamic and interactive dashboard with the help of power bi, this helps the owner to visualize the data into a more effective way and get more hidden insights with the help of power bi.

6 Expected Timeline

6.1 Gantt Chart

ID	Task Name	2025-05	2025-06				2025-07					2025-08	
		26	01	08	15	22	29	06	13	20	27	03	10
1	Introductory session with business owner		▮										
2	Understanding the business operations			▮									
3	Documentation of the business processes			▮									
4	Preparation of the Proposal Submission			▮									
5	Consolidation of the data points to be collected				▮								
6	Preparation of Mid term Submission					▮							
7	Finding insights while waiting for approval on …							▮					
9	Preparation of Final Submission								▮				
10	Preparation of slides for Final Approval									▮			
11	Waiting for Final Approval										▮		

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6.2 WBS (Work Breakdown Structure)
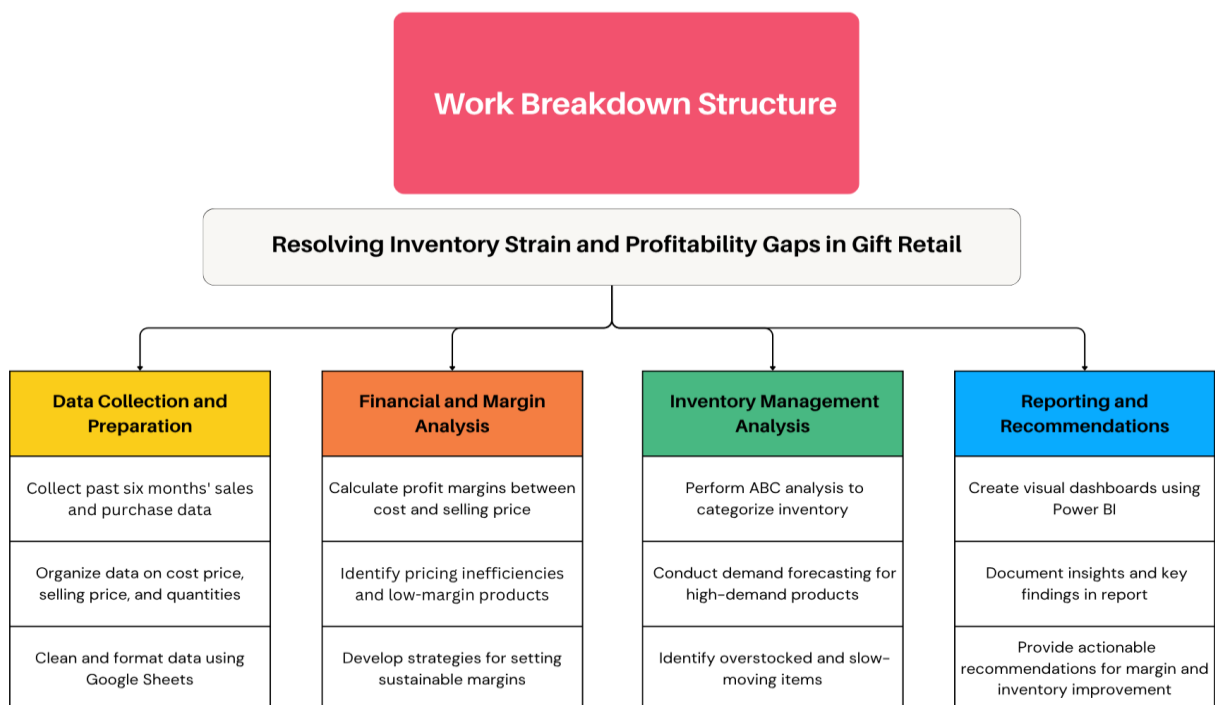
7   Expected Outcome

The following are the expected outcomes of the project -

➢ **Efficient Inventory management:**

By observing all of the stock-outs, stock-ups, sales data, and the segmentation model, very efficient inventory can be constructed making sure that most of resources that are brought are used and ensuring that the supplies are brought in such a way that would run exactly for the stipulated period of time without them getting exhausted before the given period of time or expiring because of the lack of sales. An efficient strategy can be constructed by using all the vast data that has been collected over time.

➢ **Enhanced Margin Management:**

By addressing the margin management issue, the business can implement data-driven pricing strategies that align selling prices with costs. This leads to improved profit margins, better financial stability, and greater capacity for reinvestment and long-term business growth.

➢ **Trend Analysis:**

Utilizing a data-driven approach enables the business to accurately analyze sales and inventory trends, supporting informed decision-making, precise demand forecasting, and strategic planning aligned with market behavior. This, in turn, may contribute to maximizing overall profitability.