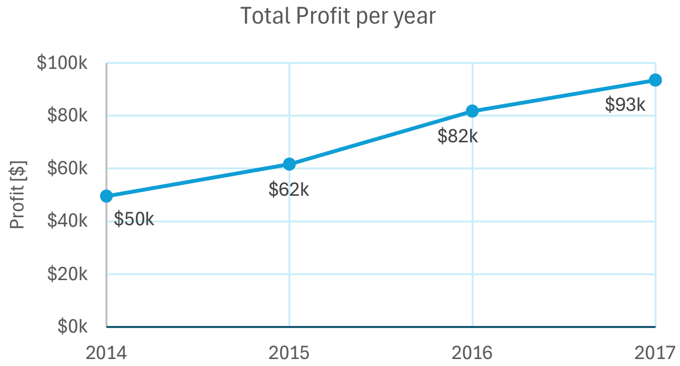
Profitability Analysis – Key Insights and Strategic Recommendations (2014–2017)

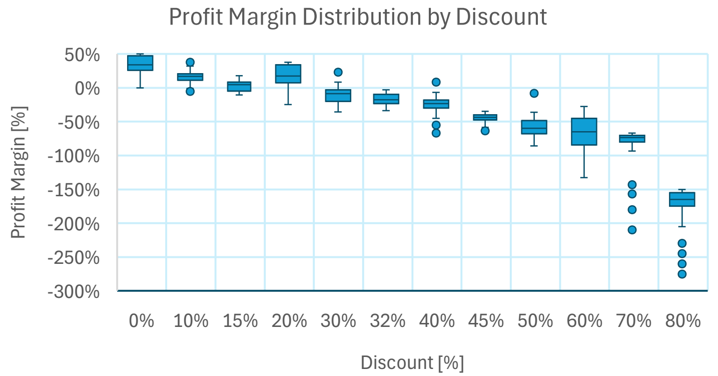
Profit increased from $49.5k (2014) to $93.4k (2017)

even in years with lower sales, likely due to improved cost



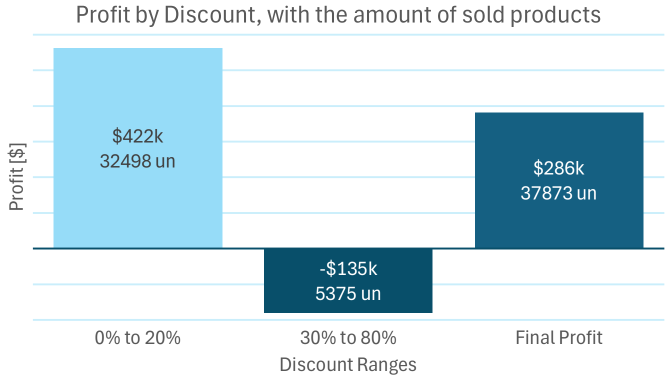
The average profit margin is only 12%, below the goal for retail (20–30%)

with excessively negative margins starting at 30% discount.



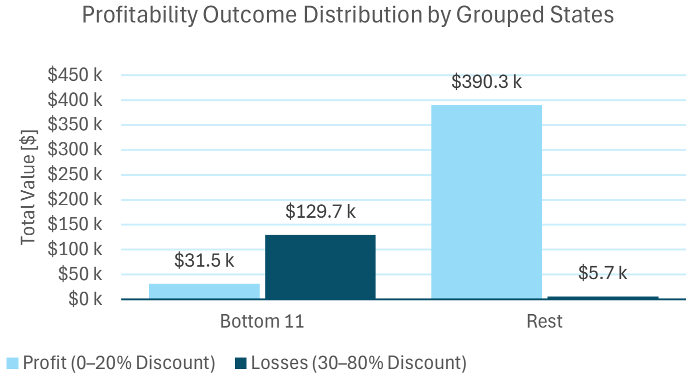
High discounts (30–80%) generated a net loss of $135k

while discounts of 0–20% brought $422k in profit



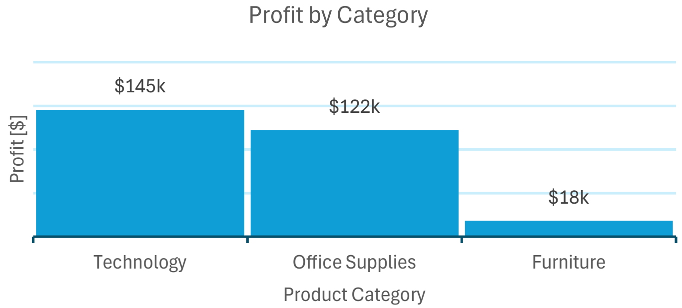
A few states are responsible for a large share of losses

mostly due to excessive discounts only applied on them.



Furniture is the weakest category with the highest losses

mainly concentrated in Tables and Bookcases



Recommendations

Reassess discounts above 30%: they consistently lead to losses

Investigate pricing strategy and costs to increase the margin

Monitor margin monthly: aim to raise average above 20%

Promote top-performing sub-categories and reduce their discounts

Increase sales on Central and South regions

Investigate possible decline and customer churn

All findings were statistically validated using ANOVA and t-tests where applicable.

Analysis performed using Excel Pivot Tables, Charts, and custom banding logic.

Data source: Superstore sales data (2014–2017)

https://www.kaggle.com/datasets/vivek468/superstore-dataset-final