

Amazon Product Review Analysis Report

1. Executive Summary

This report provides actionable insights based on Amazon product and customer review data. As part of RetailTech Insights' efforts to help e-commerce sellers optimize their strategies, the project explores product categories, pricing, reviews, discounts, and ratings to inform data-driven decisions regarding product improvement, pricing, and customer engagement.

2. Dataset Description

The dataset includes:

- Product Attributes: Name, category, actual price, discounted price, discount percentage
- Customer Metrics: Ratings (1.0 to 5.0), number of reviews, review content
- Aggregated Format: Each row represents a unique product

3. Analysis Tasks and Insights

Task 1

Products in SmartWatches and USBtoUSBAdapters enjoy the highest average discounts, exceeding 90%. Example: USBtoUSBAdapters – 94.1%

Task 2

MobileCables, PhoneCases, and ScreenProtectors dominate product count, indicating high competition.

Task 3

Headphones, SmartWatches, and USB Cables receive the most reviews, showing strong customer engagement.

Task 4

Top-rated product: Zuvexa USB Rechargeable Electric Lighter with 4.7/5 rating.

Task 5

Adapters, SmartWatches, and Chargers show significant price reductions.

Task 6

Top-reviewed product: Amazon Basics High-Speed HDMI Cable with 853,946 reviews.

Task 7

751 products have at least 50% discount, indicating aggressive pricing.

Task 8

Most products rated between 4.0 and 4.3, indicating overall customer satisfaction.

Task 9

Adapters and MobileCables lead in revenue potential.

Task 10

>₹ 500 price range contains 1,245 products; average discount in this range is ~43%.

Task 11

High-rated products usually fall in the 30–60% discount range.

Task 12

About 70% of products have fewer than 1,000 reviews.

Task 13

Top discount categories: USBtoUSBAdapters, SmartWatches, PhoneCharms.

Task 14

Top products by rating and reviews: Amazon Basics HDMI Cable, boAt Earphones, Zuvexa Lighter.

4. Dashboard Overview

A dynamic Excel dashboard has been developed to visualize:

- Review distribution by rating
- Top-reviewed and top-rated products
- Average discount by category
- Price range distribution
- Revenue potential by category
- Category-wise product count and review volume

Dashboard Tabs: Amazon Dashboard, Amazon_Dashboard

5. Recommendations

- Promote high-engagement products like AmazonBasics HDMI and boAt Headphones.
- Use moderate discounts (~40–60%) as they are more effective than extremely high ones.
- Invest in marketing for products with fewer than 1,000 reviews.

- Focus on high revenue categories such as Adapters, Cables, and SmartWatches.

6. Conclusion

This analysis highlights how ratings, discounts, review counts, and pricing drive Amazon sales. These insights can help RetailTech Insights recommend optimized strategies for sellers looking to scale.