Correlation Analysis (Price and Sell-Through Rate)

I performed a correlation analysis between price and sell-through rate to understand how pricing affects demand across product categories. This analysis helped identify price-sensitive categories, allowing me to tailor our pricing strategy accordingly. For highly price-sensitive categories, I'll avoid price increases or apply discounts to boost sales, while in less sensitive categories, I can make price increases without significantly impacting sell-through rates. This is a data-driven approach to pricing.

- **Footwear and Women's Apparel**: These categories show moderate price sensitivity, providing flexibility for slight price increases. I can consider strategic increases, particularly for high-demand items or those nearing sell-out.
- **Men's Apparel**: Since this category has the highest price sensitivity, I'll avoid price increases here. Instead, maintaining competitive or promotional pricing will help sustain strong sell-through rates.

Score Matrix (Column K)

To determine which products are suitable for a price increase, I used a scoring system similar to vendor analysis or ranking I used earlier during my first job:

- A **Score of 1** indicates a product that's a strong candidate for a price increase, due to high demand and limited inventory.
- A **Score of 0** suggests the product does not meet both criteria of high sell-through and low inventory and is less suitable for a price increase.

This scoring allows me to quickly identify which products could withstand a price increase without impacting customer demand.

(If I had a historic data I would have used Price elasticity analysis)

Price Adjustment Strategy

The goal of my price adjustment strategy is to balance revenue gains with customer retention, implementing different price adjustments based on demand and inventory levels. For strong-selling products, a slight price increase (5–10%) can capture additional revenue without significantly reducing demand. Since these items are already selling well, even a small increase can help maximize profitability.

Initially, I sorted the Sell-Through column in descending order to gain insights. However, I refined my approach to include a tiered pricing system for better granularity.

Tiered Pricing Approach

To optimize pricing, I developed a 3-Tier system:

- **Tier 1**: Higher price increases for very high-demand items with low stock.
- **Tier 2**: Moderate price increases for products with good demand and manageable inventory.
- **Tier 3**: Small or no price adjustments for items where we want to maintain demand stability.

The new price adjustments for our SKUs are shown in **Column I** as **Adjusted Price**. This tiered approach provides a balanced, data-driven framework to optimize revenue without risking customer loss.