Business Insights from EDA

1. Regional Revenue Distribution

- a. South America leads revenue generation (\$219,352.56), contributing significantly more than other regions. This indicates robust market demand, possibly due to popular products like "ActiveWear Smartwatch."
- b. Europe (\$166,254.63) is the second-highest revenue contributor, driven by preferences for "ActiveWear Rug" and "SoundWave Headphones."
- c. Asia (\$152,074.97) and North America (\$152,313.40) have similar revenues but may benefit from localized marketing to boost engagement.

2. Customer Signup Trends

- a. A gradual increase in customer signups occurred in 2024, with peaks in April and November (11 signups each), possibly due to seasonal campaigns or new product launches.
- b. Declines in signup activity during mid-2023 suggest potential gaps in marketing efforts or customer outreach during that period.

3. Category Performance

- a. **Books** lead in revenue (\$192,147.47), showcasing a strong demand for reading material, which could be capitalized on through exclusive book bundles or promotions.
- Electronics (\$180,783.50) and Clothing (\$166,170.66) are close contenders, emphasizing the need to maintain inventory and focus on competitive pricing.
- c. Home Decor (\$150,893.93), while fourth, represents an opportunity for growth through targeted advertising and seasonal sales.

4. Top Products and Brand Dominance

- a. ActiveWear and SoundWave brands dominate sales, with products like
 "ActiveWear Smartwatch" (100 units sold) and "SoundWave Headphones"
 (97 units) leading.
- This suggests brand loyalty or effective branding strategies that could be extended to other product lines.

5. Regional Product Preferences

- a. South America shows strong demand for educational and tech-based products like "ActiveWear Smartwatch" and "HomeSense Desk Lamp."
- b. Asia's top products are more diverse, including "HomeSense T-Shirt" and "ActiveWear Jacket," suggesting a preference for clothing and utility items.
- c. Europe's preference for "ActiveWear Rug" and "SoundWave Headphones" reflects demand for home and lifestyle products.

6. Potential Growth Opportunities

- a. Asia and North America, while having similar revenues, could be further segmented and targeted to boost regional sales.
- b. Introducing new product lines or enhancing promotions in the Home Decor category may close the revenue gap with other categories.
- c. Leveraging the success of top-selling products in South America across other regions could increase brand penetration.

7. Marketing and Engagement Gaps

- a. Declines in customer signups and transactions during mid-2023 suggest missed opportunities to engage with customers during those months.
- Specific campaigns or discounts in slower months could improve year-round revenue consistency.