# FlexFit Customers Analysis

Analyzing Determinants of Subscription Variability
to Inform Tailored Marketing Strategies

YEW LI          EMILY YANG          JESSICA LYU          MERA ZHANG          JENNY ZHOU

# Marketing Objective

Project Problem & Analysis Questions

# FLEXFIT WEAR

FlexFit Wear is a pioneering sportswear brand dedicated to revolutionizing the way individuals experience activewear. We provide high-quality, flexible, and comfortable sportswear that caters to a broad spectrum of fitness enthusiasts, from yoga practitioners, gym-goers, to outdoors extreme activities.
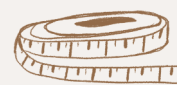
## FLEXFIT PLUSE
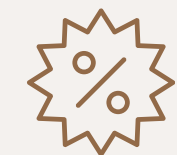
- 10% off initial purchase Birth Month 10% off
- Free Shipping Over $79 Free Returns
- Free hemming
- Access to in-person community events

# Business Context

## Market Dynamics and Competitive Landscape

## Sales Decline

FlexFit Wear is positioned in a dynamic sector where brands like Nike, Alo Yoga, and Lululemon dominate with robust subscription models and loyalty programs.

Thus, we need to compete with these established players and carve out a distinct market presence that appeals to a diverse consumer base.

In light of a notable 15% decline in sales this season compared to the previous one, FlexFit Wear has been compelled to reevaluate our business model and strategies.

# Objective

FlexFit Wear aims to enhance its subscription rates by employing sophisticated marketing analytics to derive actionable insights from our customer data.

The goal is to leverage this data to implement targeted marketing campaigns and achieve a 10% increase in subscription rates over the next six months.

# Analysis Variables

## Independent Variables

**Annual Frequency**

**Previous Purchase**

**Purchase Amount**

## Dependent Variables

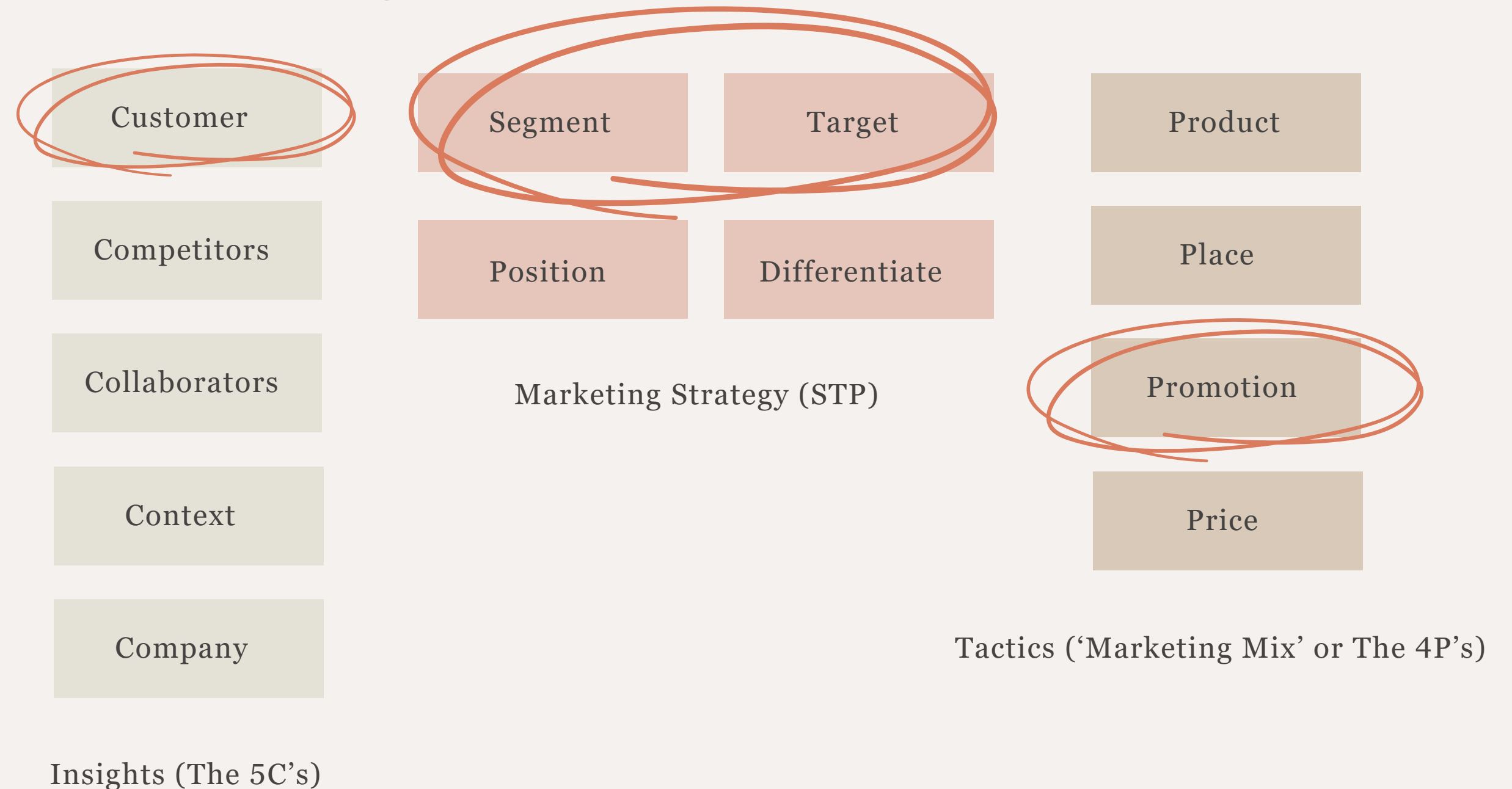**Subscription Rate**

# Analysis Questions

- Wha's our customers' demographic image?

- What is the purchasing preference of our existing customers?

- Which clusters can be identified based on DVs, and how do they differ in terms of subscription rates?

- Which independent variable is the strongest predictor of subscription rate as determined by a logistic regression model?

- Using predictive modeling, what is the expected change in a customer's probability of subscribing if their purchase behavior changes?

# Related Marketing Process

In which phase of the marketing process does our challenge reside?

To enhance our understanding of our customers, we aim to implement segmentation strategies for more accurate targeting.

Through analysis, we will gain insights to guide our strategy for creating targeted promotional campaigns and recommendations.

Customer

Competitors

Collaborators

Context

Company

Insights (The 5C's)

Segment

Target

Position

Differentiate

Marketing Strategy (STP)

Product

Place

Promotion

Price

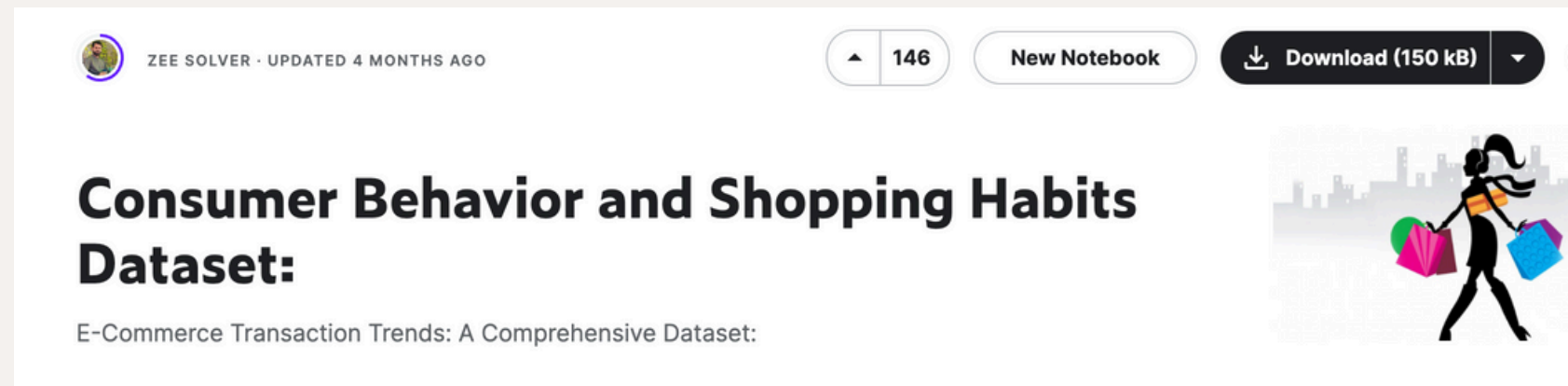Tactics ('Marketing Mix' or The 4P's)

# Data Analysis

**Data Processing Steps**
**Data Analyzing Journey**
**Key Findings**
**Implications**

# Dataset Overview



From Kaggle

**3,900** **Customers**
Age: 18-70
Gender: Male (2652), Female (1648)

**1,677** **Subscribers**
No  Female

**16** **Variables**
Demographic Information, Purchase History, Product Preferences, Shopping Frequency, and Online/Offline Shopping Behavior
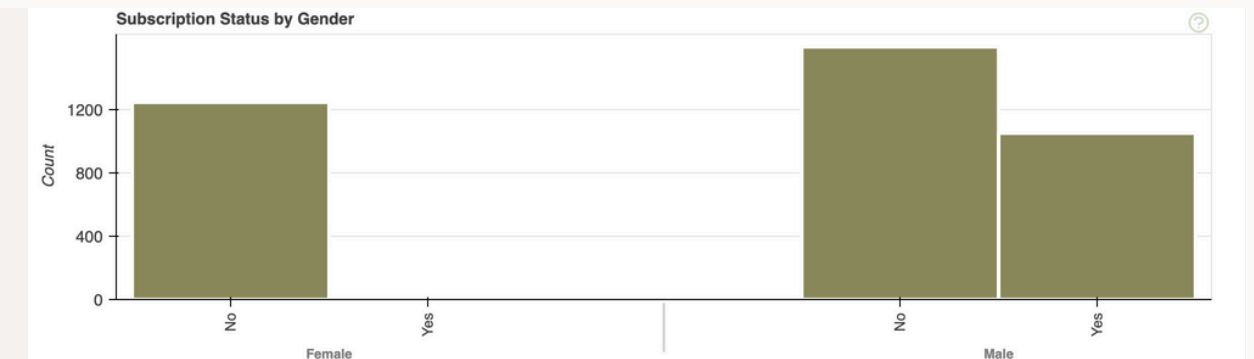
**Data Cleaning:**
- Checking for duplicates and missing values.
- Delate irrelevant variables (Item Purchased, Shipping Type)

**Data Preparation:**
- Gender: Male = 1, Female = 0
- Size: S = 0, M = 1, L = 2, XL = 3
- Subscription rate / Discount Applied / Promo Code Used: Yes = 1, No = 0
- Frequency of Purchases: Annually = 1, Quarterly = 4, Monthly = 12, Fortnightly = 26, Weekly = 52

# Insights from Data Exploration



**1. Review Ratings**

- The average customer review rating is notably different from a neutral score, pointing to generally favorable customer feedback on their purchases.

**2. Gender Differences in Subscription Status**

- There is a significant association between gender and subscription status. Gender may play a role in determining whether customers choose to subscribe to services or loyalty programs.

**3. Purchasing Behavior Over Time**

- Customers' purchasing frequency has varied significantly over time, suggesting changes in shopping behavior or customer loyalty.

**4. Frequency Distribution Insights**

- Product Category: Clothing is the most frequently purchased category.
- Seasonal Purchases: Purchases are fairly evenly distributed across seasons.

## Why K-means Cluster Analysis

- With data cleaning and descriptive data analysis, we then are able to focus on three valuables: Previous Purchase, Annual Frequency, and Purchase Amount.

- Through K-means Analysis, we are looking at how our consumers are distributed and what how each variable differentiate them into different clusters.

- By analyzing the clusters, we will be able to learn their consumer behaviors, figure out who we are missing out from our marketing strategy, and have a better focus in the future.

## Results & Insights:

- **Higher in Purchase and Frequency, more likely to subscribe**

  - In result, what we found was that people who purchase more in a year, in previous purchase, and previous amount would be more likely to be our subscribers. This is indicating that with more shopping experience and impression with our brand, the more likely they would subscribe to our brand.

- **Future Focus & Target Audience**

  - Cluster shows that still more than a half people who have shopped on our brand yet still haven't been our subscribers. Therefore, they should be our focusing group. We should see them as our targeted subscribers since they have impression and a little more push would encourage them to subscribe and be loyal to our brand.

# Logistic Regression

**Why Logsitic Regression? How does it work?**

- In order to further see how our brand should improve on each variables specifically, we then applied logistic regression to our statistical analysis.

- We chose logistic regression because our subscription status is not a continuous value and only logistic regression can help us define how each variable influence this kind of yes-or-no variable.

- Since this is a brand new tool, it took us a while to understand how it works and the formula of this regression is presented to the right-down side of the page.

- To see each step of our logistic regression, please check our technical appendices.

**Results & Insights:**

- By using logistic regression, we will be able to see that non of the variable is statistically significant. Only previous purchase is the closest to statistically significant 0.05, implying that it has more influence on making users as subscribers.

- This is at first disappointing. However, it is learned that under many situation, especially in real life, statistically insignificant is normal and 0.05 is not the only standard to value whether the regression is significant or not. This helps us to predict and gives us a clear vision in exactly how much we should achieve in these three variable in order to reach our target number of subscribers.

## K-Means Cluster Analysis



Consumers who have a **higher annual purchase frequency, previous purchase amount, and purchase amount**, in general, would be more likely to be users who have subscribed to our brand.

This shows us that purchasing behavior is more influential in subscription rate for our brand and we should focus and collect more data about users' purchasing behavior in the future to help us better analyze and predict.

## Logistic Regression

Although none of the three independent variables is statistically significant in influencing subscription rate ($p$-value>0.05), we found that **previous purchase amount has more effect on subscription rate**. ($p$-value = 0.054). We also learned that 0.05 is not the only standard for significance.

This indicates that **the more a user consumed last time, the more they would love to subscribe and stay loyal to our brand.**

Therefore, we could always make sure to send follow-up emails to users who have just made a purchase and promote subscriptions. We could also send out emails regularly to existing customers to promote subscriptions especially during holiday seasons. Email can advertise exclusive offes. It is believed that in this way, a user will be more likely to subscribe to our brand.

# Behavioral Insights Behind Purchase Frequency & Amount

## Consumer Loyalty

Regular purchasers develop a comfort and trust with the brand, naturally progressing to subscription models for convenience and cost savings.

## Emotional Engagement

Repeated interactions foster a sense of belonging and commitment, making subscriptions a logical next step.

# Managerial Implications

Practical Use of the Results
for Different Stakeholders

# Practical Use of the Results

## Investors

*Resource Allocation:*

- Based on insights from this analytics project, Flex Wear's investors might increase investment in marketing and customer retention initiatives to effectively reduce customer churn.

## Customers

*Enhance Personalization:*

- Leveraging insights from customer purchase behavior and preferences, offer highly personalized products, promotions, and subscription options that cater to individual needs and buying habits.

*Improve Customer Experience:*

- Utilize customer feedback and purchasing data to refine product offerings and service delivery, thereby elevating the overall shopping experience and increasing customer satisfaction.

# Practical Use of the Results

## Marketing Team

*Target High-Frequency Shoppers:*
- Develop targeted marketing campaigns for customers identified as high-frequency shoppers based on the K-means analysis. Since these customers are more likely to subscribe, strategies could include exclusive offers or early access to new products to encourage subscription sign-ups.

*Enhance Data Collection on Purchase Behaviors:*
- Intensify efforts to gather and analyze data on purchasing behaviors, especially frequency and purchase amounts. This could involve integrating more sophisticated tracking tools in the online shopping process to capture detailed data on customer purchasing patterns and preferences.

*Personalized Follow-Up Campaigns:*
- Implement personalized follow-up campaigns for customers immediately after a purchase, particularly targeting those with higher previous purchase amounts. Tailor these communications to highlight the benefits of subscribing, such as cost savings on future purchases, exclusive content, or loyalty rewards.

# Practical Use of the Results

## Marketing Team

*Segmentation Based on Purchase Amount:*
- Segment customers not only by frequency but also by the amount spent in recent transactions. Create special subscription offers that cater to the spending habits of these segments, such as tiered subscription levels that offer progressively better perks with higher spending thresholds.

*Strategic Use of Discounts and Promotions:*
- Refine the strategy for discounts and promotions based on their proven effectiveness in driving engagement and loyalty. Plan these promotions around insights gained from purchase patterns across different seasons and categories.

*Focus on Clothing Category:*
- Since clothing is the most frequently purchased category, develop specialized marketing strategies for this segment, such as highlighting new arrivals, seasonal collections, or exclusive lines, to capitalize on its high demand.

# Marketing Recommendations

Marketing Strategy for Different Clusters

# Cluster 0: High Spenders, Non-Subscribers

Characteristics:

This cluster has **the highest annual spending average** but **does not subscribe**. Despite being the smallest cluster, its members are **significant spenders**. This suggests that they may value the brand's offerings but haven't yet seen the benefit of subscribing, possibly due to the novelty of the brand or a lack of targeted incentives.

*Exclusive Membership Benefits:*
- Offer a premium membership that includes benefits such as exclusive access to limited-edition products, free hemming services, or personal fitness consultations. This can make the high spenders feel valued and encourage them to subscribe.

*Customized Communications:*
- Send personalized emails or messages that acknowledge their spending level and suggest products or services that align with their lifestyle, enhancing perceived personalization and value.

# Cluster 1: Moderate Spenders, Non-Subscribers

Characteristics:
- Cluster 1 is **medium-sized**, **spending at an average frequency and amount** but remains **non-subscribers**. Their **engagement level is moderate**, indicating potential interest in the brand that hasn't fully developed into loyalty.

*Introductory Subscription Offers:*
- Introduce a first-month discounted subscription offer or provide a free trial period to reduce their risk perception and allow them to experience the subscription benefits.

*Feedback and Engagement:*
- Solicit their feedback on products and services and engage them through surveys or polls, which can inform future products or services and make them feel involved and valued.

# Cluster 2: Above-Average Spenders, Potential Subscribers

Characteristics:

- **The largest cluster**, with **slightly above-average annual spending** and **above-average purchase amounts**. This group shows **a more consistent engagement** with the brand, suggesting a predisposition towards subscription.

*Loyalty Rewards Program:*

- Develop a loyalty program that rewards points for purchases that can be redeemed for discounts or free products. This acknowledges their current spending and incentivizes them to subscribe for additional benefits.

*Enhanced Personalization:*

- Leverage data analytics to offer highly personalized product recommendations based on their previous purchases and browsing behavior.

# Cluster 3: Low Spenders, Non-Subscribers

Characteristics:

- This is **the second largest cluster** but **spends much less than average annually and per purchase**. They have **not subscribed**, possibly indicating **a more casual interest in the brand or sensitivity to pricing**.

*Value Subscription Plans:*

- Offer a subscription plan that includes basic but essential benefits like free shipping, which could be appealing to cost-conscious consumers.

*Promotional Campaigns:*

- Run promotional campaigns that highlight the cost-effectiveness of subscriptions through comparisons or showcase long-term savings and benefits.

*Engage Through Community Building:*

- Encourage participation in community events or online forums where they can connect with other fitness enthusiasts, which could increase their engagement and interest in subscribing.

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*Thanks!*