

# EDA Portfolio Project - Treadmill Buyer Profile Report

## Introduction

The market research team at AeroFit is focused on identifying the key characteristics of the target audience for each type of treadmill offered by the company. This analysis aims to enhance the recommendation process for new customers by understanding customer preferences and behaviors. By investigating potential differences in customer characteristics across the product range—including age, income, fitness level, and usage patterns—the team seeks to provide tailored product recommendations for the KP281, KP481, and KP781 treadmills. This deeper understanding of the target audience will allow AeroFit to refine its marketing strategies and ensure that each treadmill is optimally matched with the needs and expectations of its customers.

## Steps

These are the steps I had taken for creating meaningful insights

1. Import important libraries.
2. Check datatypes.
3. Missing values detection and check duplicates.
4. Statistical summary.
5. Count unique values for categorical features.

## Analyze

1. From my first analyzation I saw that age group 20-29 frequently appear which shows that this age group purchase more treadmill from the Aerofit.
2. Customers with 16 years of education and have partnered buy treadmill more as compared to rest.
3. Product KP281 was purchased more as compared to rest of products in both genders.
4. Product KP281 buy frequently by the age group of 20-29.
5. Miles with usage and fitness show positive correlation.
6. There are different number of outliers in each column.

## Recommendations

1. Company needs to advertised more about the KP481 and KP781 product or give some discount so customer attract towards the product.
2. Need to give some more advantages of fitness or give some promotion so customer will purchase the products.