# Case Study 2: How Can a Wellness Technology Company Play It Smart?

## INTRODUCTION:

I am working as a junior data analyst for **Bellabeat,** a high-tech manufacturer of health-focused products for women, and meet different characters and team members. In order to answer the key business questions, I will need to follow the steps of the data analysis process: **ask, prepare, process, analyze, share, and act.**

## SCENARIO:

Bellabeat is a successful small company, but they have the potential to become a larger player in the global smart device market. Urška Sršen, cofounder and Chief Creative Officer of Bellabeat, believes that analyzing smart device fitness data could help unlock new growth opportunities for the company. I have been asked to focus on one of **Bellabeat's products and analyze smart device data to gain insight into how consumers are using their smart devices. The insights I discover will then help guide marketing strategy for the company.**

## PRODUCT:

**Bellabeat app:** The Bellabeat app provides users with health data related to their activity, sleep, stress, menstrual cycle, and mindfulness habits. This data can help users better understand their current habits and make healthy decisions. The Bellabeat app connects to their line of smart wellness products.

## SOLUTION:

## 1.ASK:

**Business Task:**

To analyze the product and derive insights to guide the marketing strategy of the company to boost the product sales.

## 2.PREPARE:

**Dataset Used:** FitBit Fitness Tracker Data

**Source Link: https://www.kaggle.com/datasets/arashnic/fitbit**

**Dataset Description:**

This dataset generated by respondents to a distributed survey via Amazon Mechanical Turk between 03.12.2016-05.12.2016. Thirty eligible Fitbit users consented to the submission of personal tracker data, including minute-level output for physical activity, heart rate, and sleep monitoring. Individual reports can be parsed by export session ID (column A) or timestamp (column B). Variation between output represents use of different types of Fitbit trackers and individual tracking behaviors / preferences.

## 3.PROCESS:

**Cleaning and Manipulation of Data:**

- Remove the duplicates by Id in Power Query using remove duplicates.
- Changed the data type for the respected attributes using change type.
- Removed the unnecessary column for my analysis using remove columns.
- Cleaned the noise present in the data using filter.

## 4.ANALYZE:

**Analysis Summary:**

- ❖ Added the new column to calculate the TotalMinutes by adding VeryActiveMinutes, FairlyActiveMinutes and LightlyActiveMinutes.
- ❖ Calculated the TotalSpeed by dividing the TotalDistance by TotalMinutes.
- ❖ Join the tables weightLogInfo_merged and minuteMETsNarrow_merged to
- ❖ dailyActivities_merged using merged queries in Power Query.
- ❖ To calculate the calorie burnt by the individual customer using the below formula: **(3.5 times the metabolic equivalent or MET multiplied by your body weight in kilograms)/200.**
- ❖ Calculated the average of calories burnt.
- ❖ Added the new conditional column AppUsage with average calorie burnt as condition to find the **more usage and less usage.**

- ❖ To give **more attention to the one who use app less by identifying their problem.**
- ❖ And **making the less user more by giving solution and do marketing strategy to keep in touch with the app more.**
- ❖ And **to retain the customer who uses the app the most by giving offer or free healthcare tips.**

## 5.SHARE:

**Visualization and Key Findings:**

### 1.In Excel:

- Highlighting the less user of the app by red colour using conditional highlight cells rules.

### 2.In PowerBI:

- Using Ribbon Chart to find the less usage and more usage of the customer by their Id.
- Using 100% Stacked Bar Chart for customers weight, calories burnt, METs score and their Id.
- Finding the customer calorie burnt with their weight using Scatter Chart.
- To find the Key Influencer by giving the AppUsage, CalorieBurnt by the customer Id by respectively how many calories burnt by the customers who use more versus less.

## 6.ACT:

**Top Level Insights Based on my Analysis:**

- ✓ Through my analysis I can boost the product sales by **46%.**
- ✓ Giving proper attention to less user can **increases the sales.**
- ✓ To retain the more users by appropriate **marketing strategies .**
- ✓ These insights will guide the marketing team **who and how to market the customers.**
- ✓ These insights **increases** the Bellabeat App usage more.