# Data Analysis Project

## Data Analyst: (Ahmad Abubakar)

## Client/Sponsor: Bellabeat

## Purpose:

The purpose of this analysis was to understand user behavior related to physical activity, sleep, and overall wellness. These insights can help guide smart device feature development and targeted health recommendations for Bellabeat users.

## Scope / Major Project Activities:

|  |  |
| --- | --- |
| Activity | Description |
| Data Collection | The data was downloaded from Kaggle. thus Kaggle data set contains personal fitness tracker from thirty fitbit users. Thirty eligible Fitbit users consented to the submission of personal tracker data, including minute-level output for physical activity, heart rate, and sleep monitoring. It includes information about daily activity, steps, and heart rate that can be used to explore users’ habits. For this analysis we used dailyActivity\_merged.csv and sleepDay\_merged.csv |
| Data Cleaning | Removing duplicate rows in each dataset, Date Format Standardization, Merge Datasets, Filter Out Zero Values, Missing Data Handling. |
| Analysis | Studying the data set to identify trends and relationships. |
| Recommendations | Suggest recommendations for bellabeat marketing team to helps guide Bellabeat’s marketing strategy. |
| Deliver final report | Deliver final report and recommendations to the bellabeat marketing department. |

## This project does not include:

Specify the things that this project isn’t responsible for doing (out of scope). For instance, “this project does not involve a summation of 2019 data analysis*”*

* Heart rate data
* Weight data

## Deliverables:

A specific list of things that your project will deliver*.*

|  |  |
| --- | --- |
| Deliverable | Description/ Details |
| Dashboard | A data visualization for all the key insights gained from the analysis. |
| Recommendations | A list of recommendations |
| Final report | A final report detailing all the visualization backed with the explaination of the visuals. |

## Schedule Overview / Major Milestones:

|  |  |  |
| --- | --- | --- |
| Milestone | Expected Completion Date | Description/Details |
| Data collection | 4/28/2025 | Downloading the data from the source. |
| Data review | *4/30/2025* | Review all the datasets. |
| Data Analysis | *5/02/2025* | The analysis completed |
| Recommendation list | *5/03/2025* | List of recommendations |
| Final report | *4/07/2025* | Final report detailing all work, analysis, methodologies,and fidings |

## \*Estimated date for completion: May 07, 2025

This is my expected date “if all goes well and I have everything I need, this is when I’ll be done”**May 07, 2025***.*