








Data Analysis Exercise

Brad Hogle, June 20th 2024

Overview

-  Introduction
-  Problem Statement
-  Summary of Data
-  Results
-  Action Items

Introduction

- 📌 **Bellabeat - Fashionable Health Trackers**
- 📌 **Fitbit Smart Device Data - 30 Users**
- 📌 **'R' used for analysis and visualization**



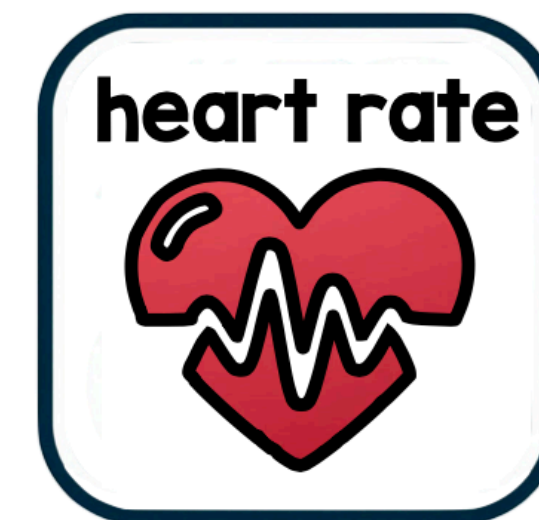
 **bellabeat**
Data Analysis Exercise

Problem Statement

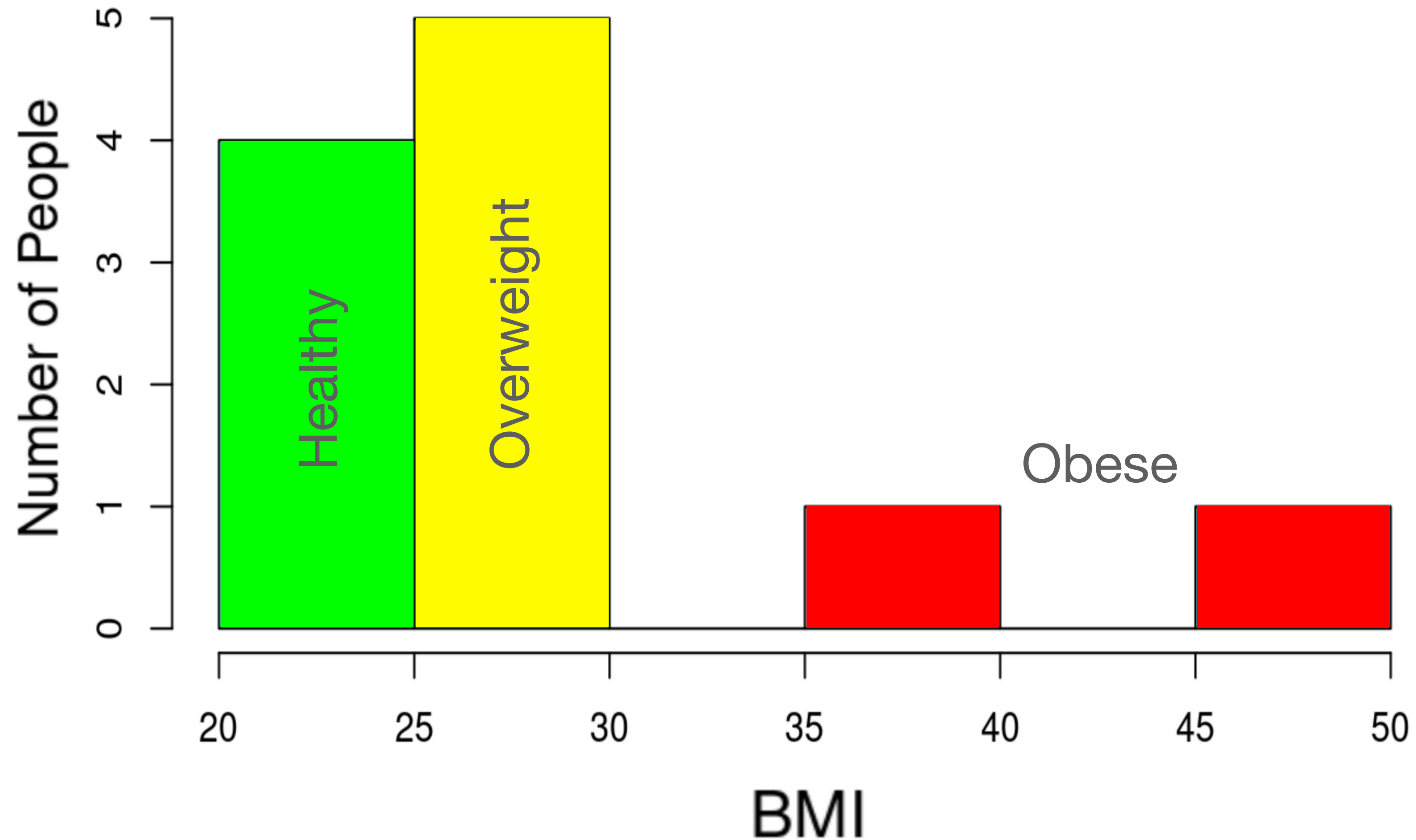
-  **What are trends in smart device usage?**
-  How could these trends apply to Bellabeat customers?
-  **How could these trends help influence Bellabeat marketing strategy?**

Summary of Data

- 📌 BMI, Weight
- 📌 Daily Summary of steps, distance, calories, level of activeness
- 📌 Logs of sleep level, heart rate, level of activeness

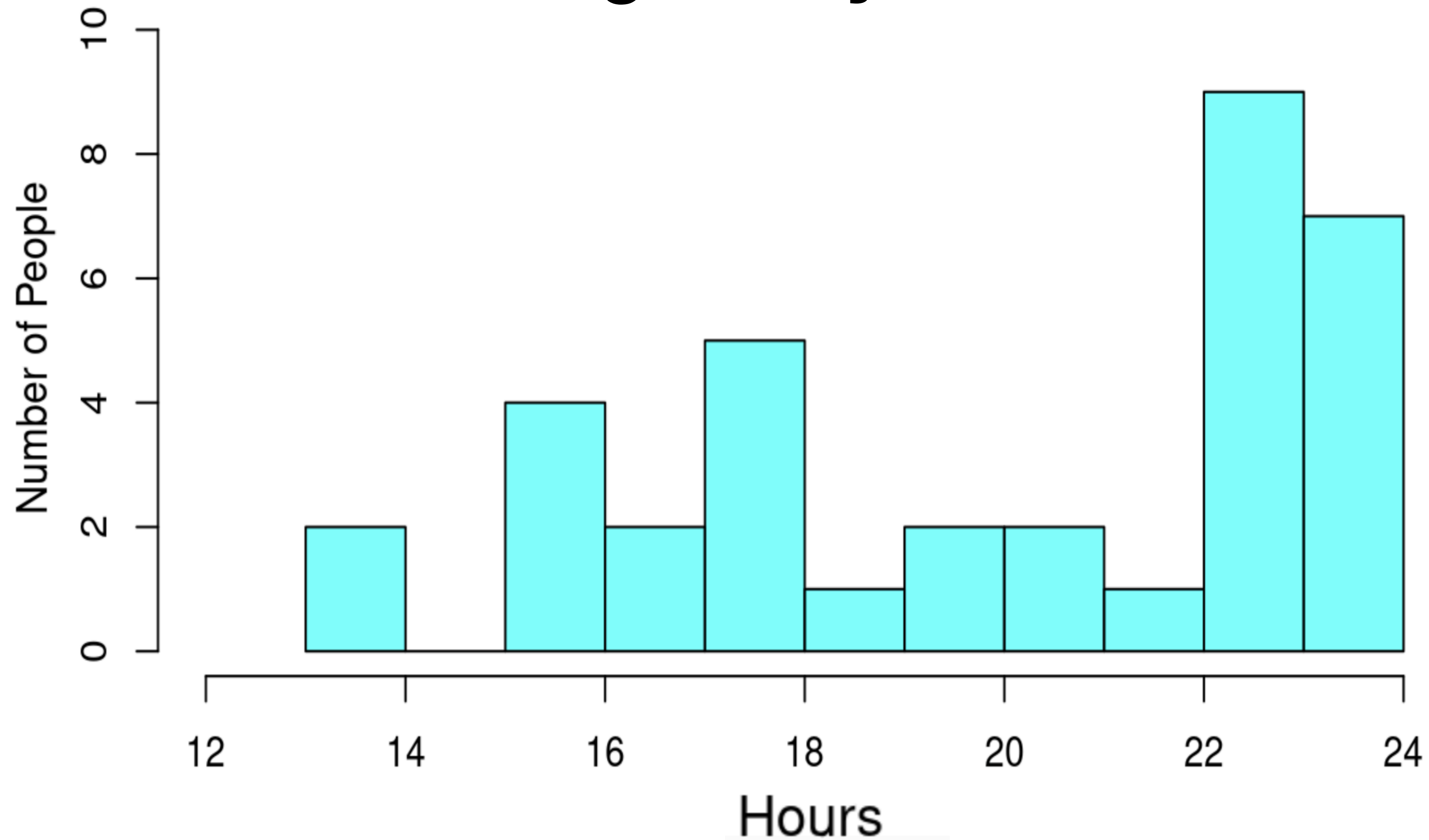


Histogram of Fitbit User BMI



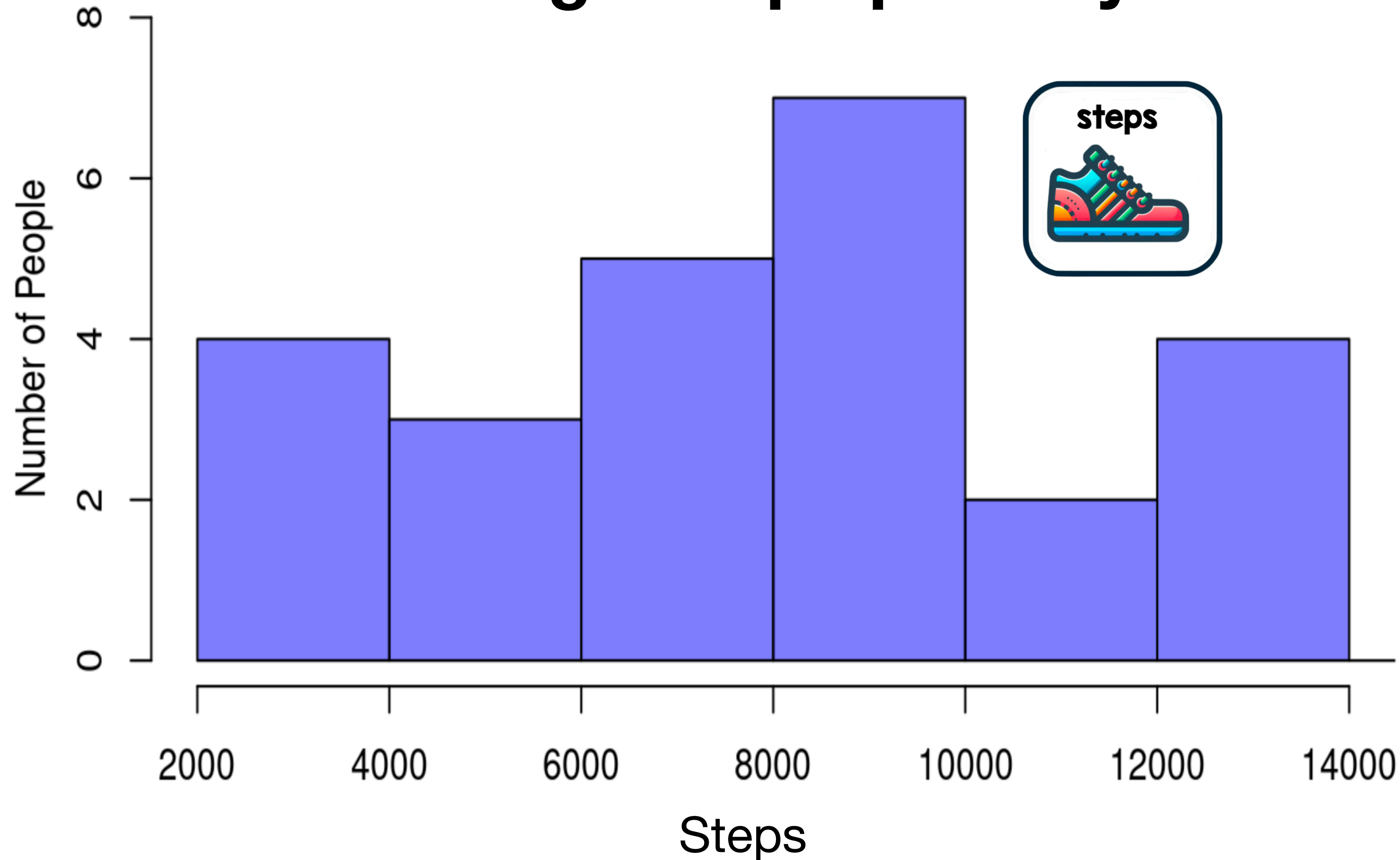
Only 11 users
Range from
healthy to obese

Average Daily Hours



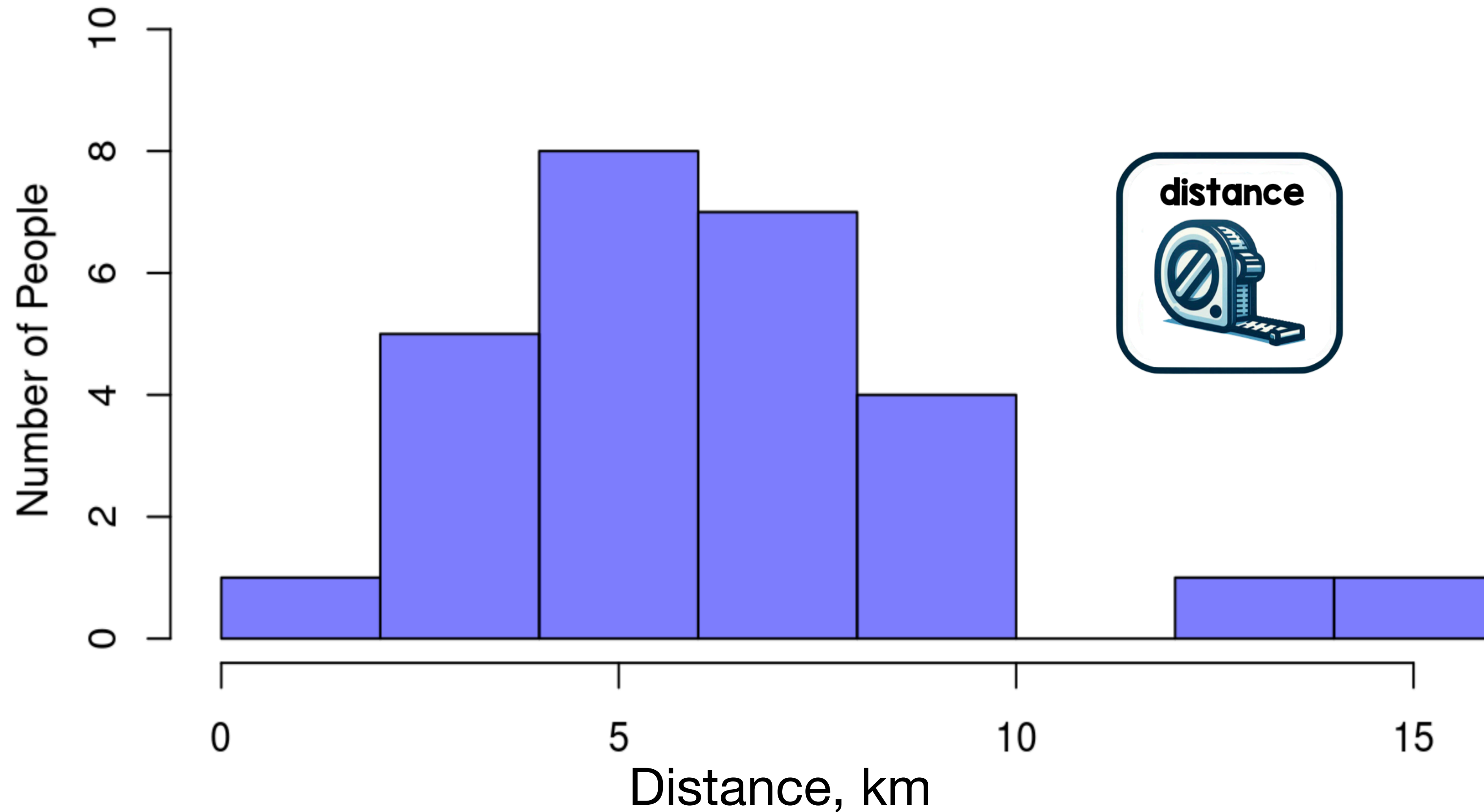
Most used more than 22 hours

Average Steps per Day



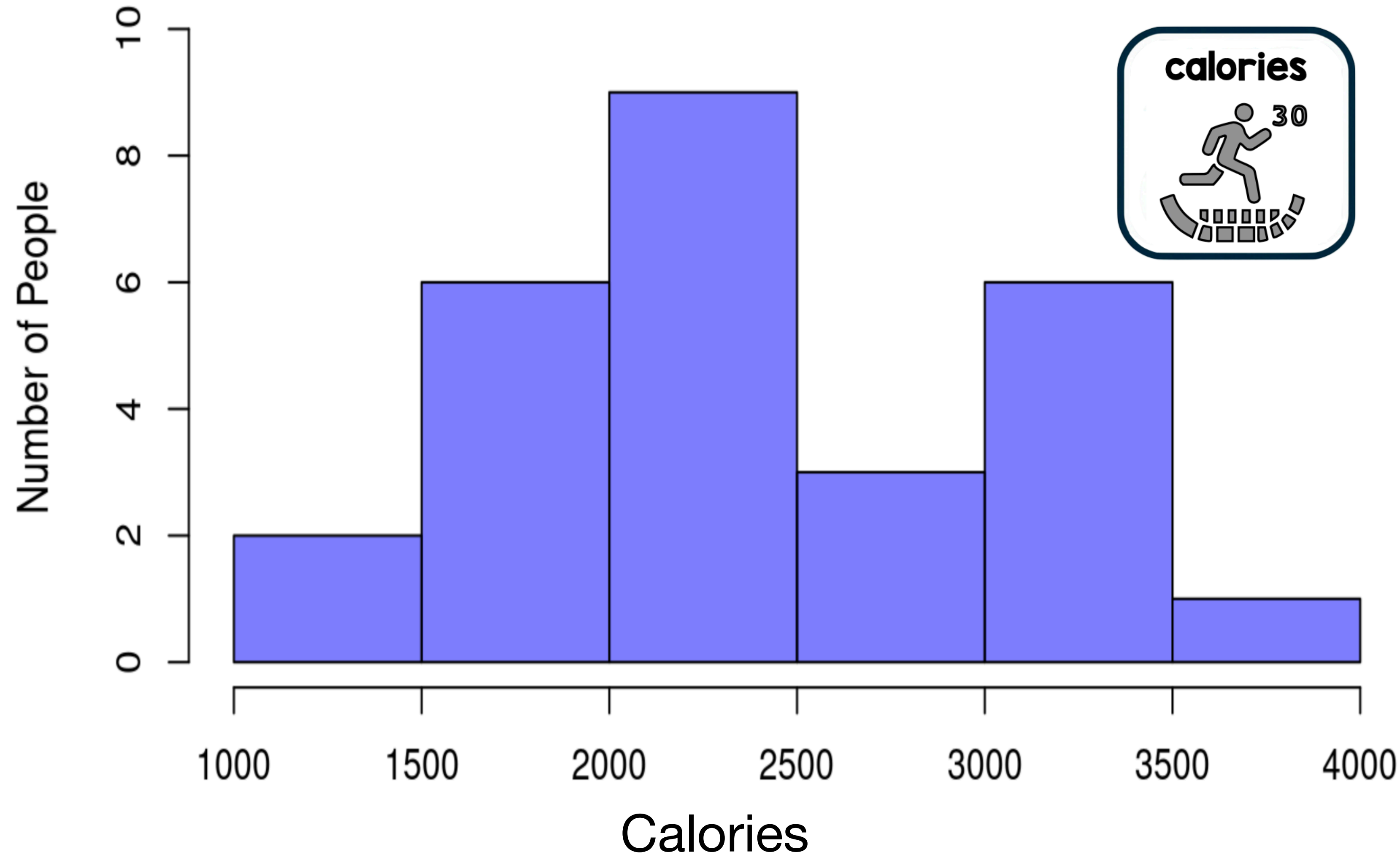
**Large range from
inactive to active**

Average Distance per Day



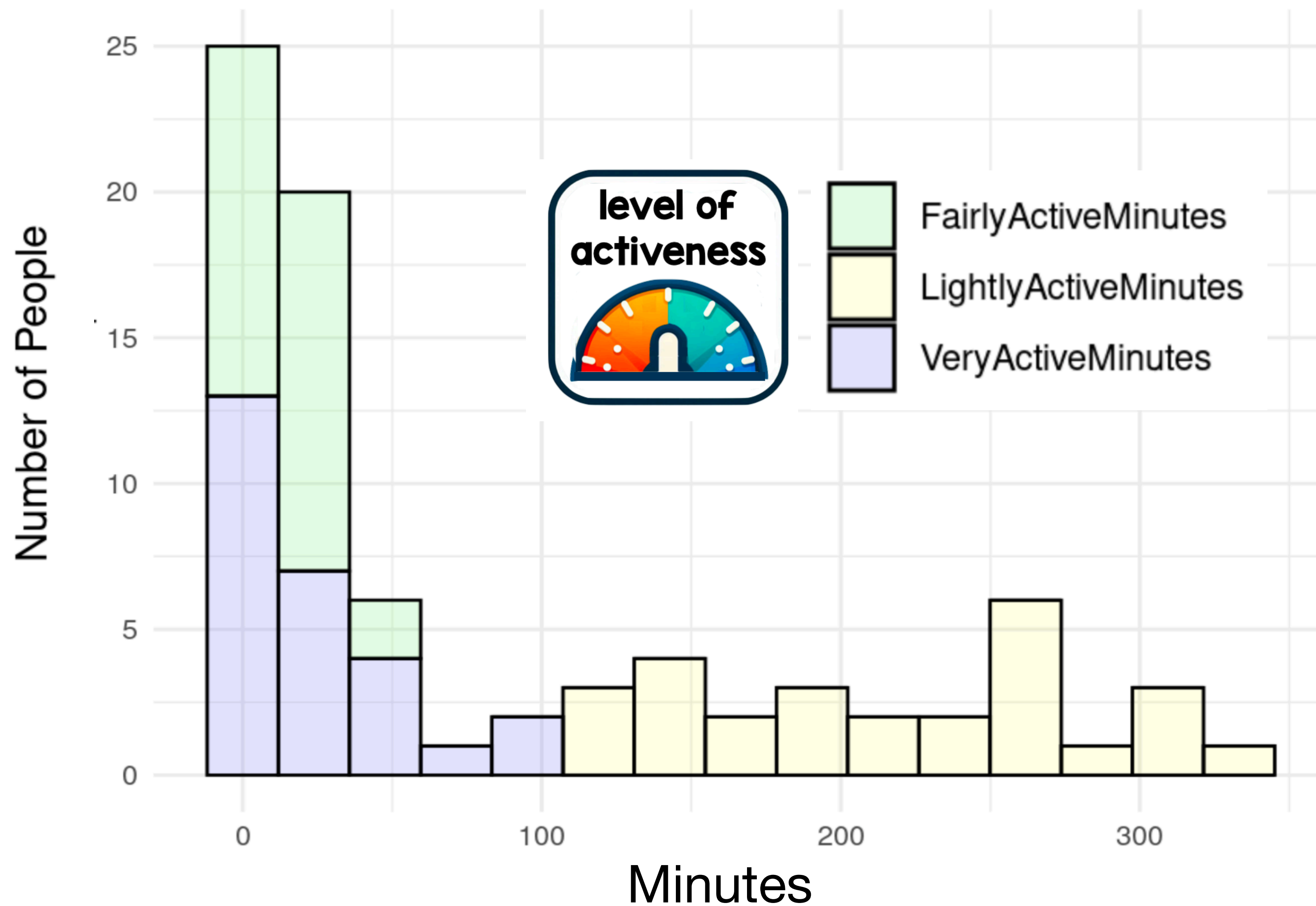
Large range of distance

Average Calories per Day



Also shows
large range of
calories

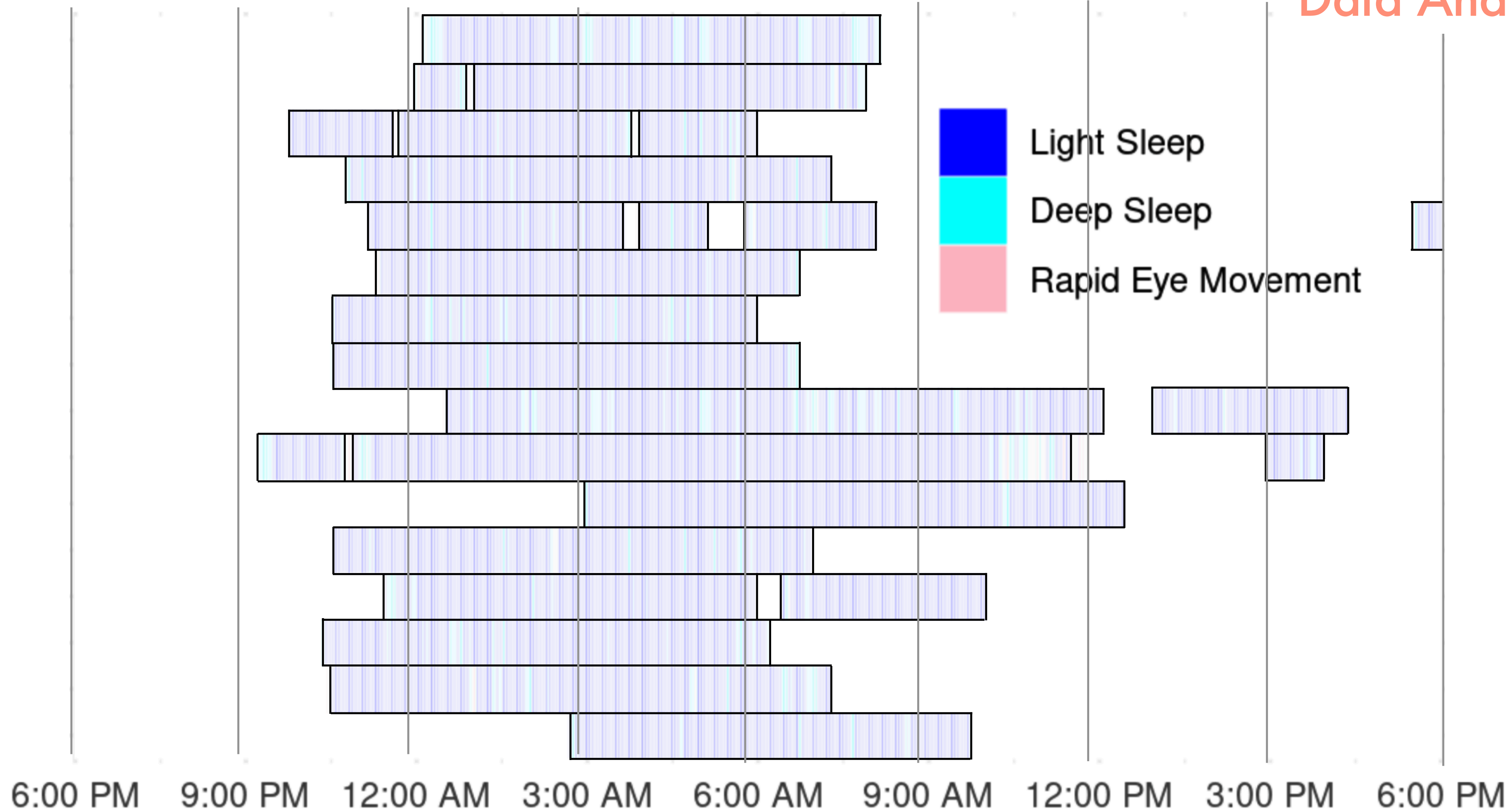
Minutes by Level of Activeness



Lightly Active is most common (after sedentary)

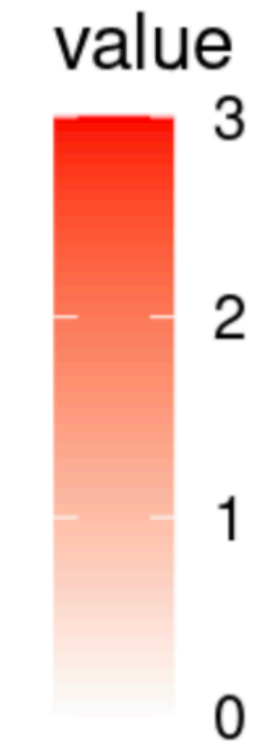
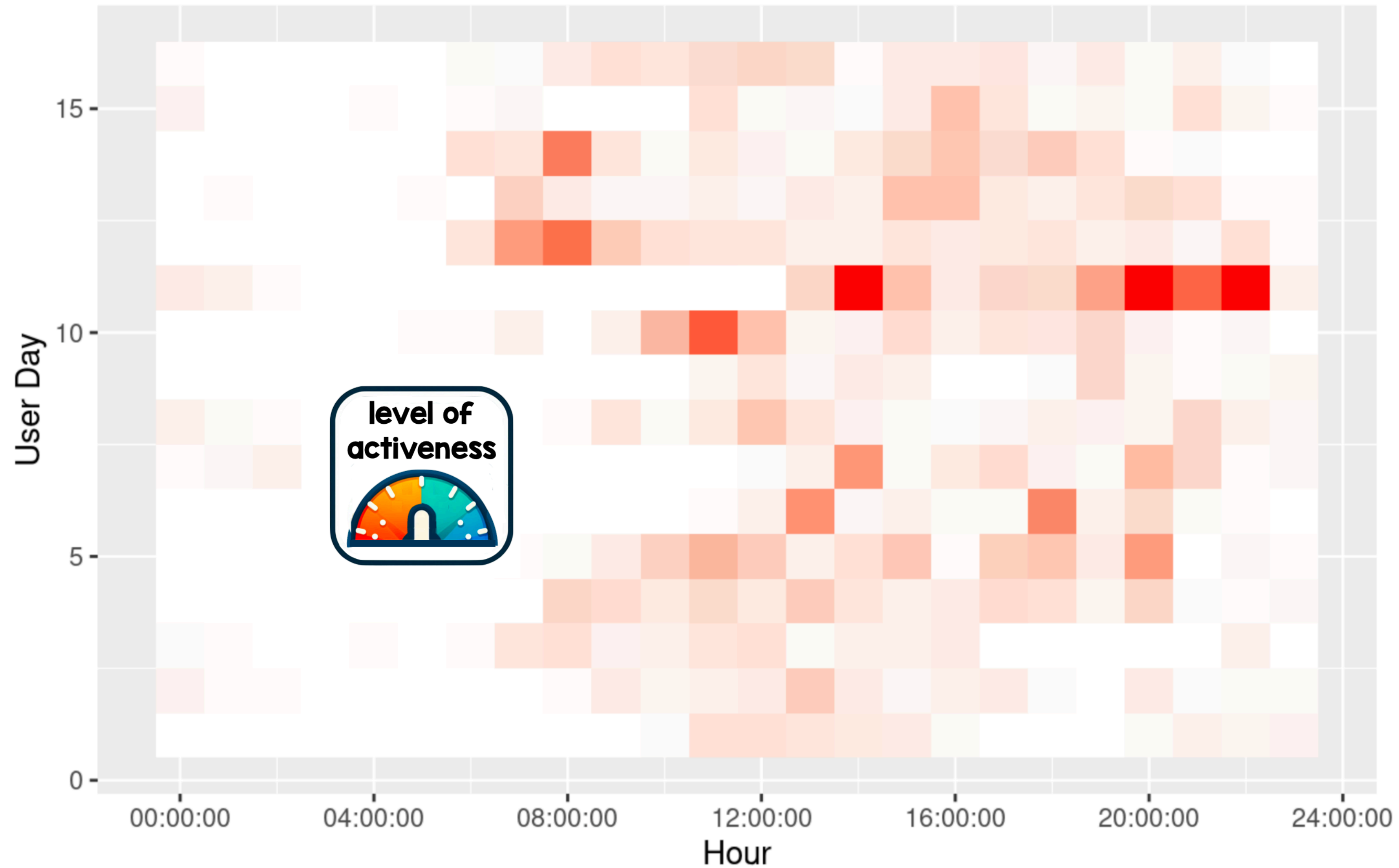
Fairly Active is least common

Sleep Level of 16 User Days



Range of
7 to 15
hours

Hourly Intensity of 16 User Days



**Some with
high activity
periods, some
mostly low**

Analysis

- 📌 **Wide variety of activity among users**
- 📌 **Users can set goals for steps, calories, distance, etc.**
- 📌 **Useful measurement of heart rate and sleep quality**

Action Items

- 📌 Focus on Bellabeat "Leaf"
- 📌 Appeal to female users who want to track health but remain stylish
- 📌 Run ads on Youtube and Facebook for women viewing health, fashion, nutrition content

