Easy

Exercise 1: Import Pandas and read a CSV file into a DataFrame called `df` that contains the headers 'Height', 'Gender', and 'Weight'.

Exercise 2: Display the first 5 rows of the DataFrame `df`.

Exercise 3: Calculate the average height from the DataFrame `df`.

Exercise 4: Count the number of males and females in the DataFrame `df`.

Exercise 5: Create a new column 'BMI' in the DataFrame `df` using the formula: BMI = Weight (kg) / (Height (m))^2.

Medium

Exercise 6: Convert heights from centimeters to meters in the DataFrame `df`.

Exercise 7: Filter the DataFrame `df` to include only records with a BMI above 25.

Exercise 8: Group the DataFrame `df` by 'Gender' and calculate the average weight for each gender.

Exercise 9: Add a column 'WeightClass' to the DataFrame `df` with values 'Underweight', 'Normal', 'Overweight', or 'Obese' based on BMI thresholds.

Exercise 10: Using the `df` DataFrame, find the tallest male and female in the dataset.

Hard

Exercise 11: Normalize the 'Height' and 'Weight' columns in `df` so that they have a mean of 0 and a standard deviation of 1.

Exercise 12: Merge `df` with another DataFrame `df_exercise` that includes columns 'ExerciseHours' and 'ID', matching the rows based on an 'ID' column that you need to add to both DataFrames.

Exercise 13: From the DataFrame `df`, identify any outliers in the 'Weight' column using the IQR (Interquartile Range) method.

Exercise 14: Create a categorical encoding for 'Gender' in the DataFrame `df` where 'Male' is 0 and 'Female' is 1.

Exercise 15: Using the DataFrame `df`, calculate the Pearson correlation coefficient between 'Height' and 'Weight'.