# P07 Instructor & Reference Guide – Chart Customisation

## Theory Brief

Customising charts enhances their communicative power. By changing chart types or adding labels and gridlines, analysts can highlight specific insights or improve clarity.

## Worked Example

Below is a snapshot of the first few rows of the synthetic dataset and summary statistics:

Category Value1 Value2  
Category C 61.65 6.96  
Category A 53.00 -8.06  
Category B 52.71 -3.73  
Category B 44.79 -6.02  
Category C 44.38 -7.32

### Basic Statistics

* Value1\_mean: 50.09
* Value1\_median: 49.48
* Value1\_mode: 34.82
* Value1\_var: 97.78
* Value1\_std: 9.89
* Value2\_mean: 36.57
* Value2\_median: 35.39
* Value2\_mode: 20.32
* Value2\_var: 491.55
* Value2\_std: 22.17

### Correlation Matrix

Value1 Value2  
Value1 1.000000 -0.033423  
Value2 -0.033423 1.000000

### Visualisations

An example plot is saved in the results folder as P07\_plot1.png.

## Evaluation Rubric

* Correct transformation of chart types (40%)- Use of labels, legends, and gridlines (30%)- Quality of comparative analysis (20%)- Presentation and documentation (10%)

## Common Pitfalls

Over‑customising charts leading to clutter or selecting a chart type that misrepresents the data.