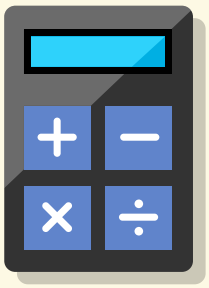
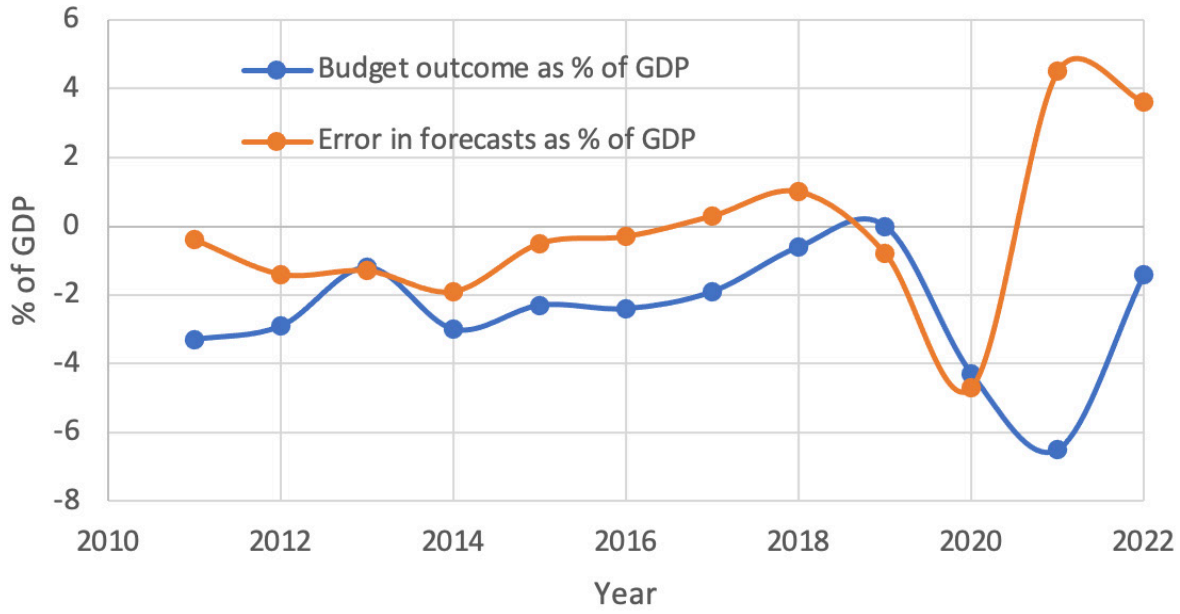
# Graphing and interpreting errors in Budget Forecasting Solutions



## Part 1: Budget forecasting errors over time

**1** Graph the Budget outcomes and errors in percentage forecasts for the period between 2010-2022 on one chart.




**2** What type of graph did you select to use?

Line graph

**3** Why did you choose this type of graph?

To compare the trend between the budget outcome and error in forecasts easily. Answers will vary



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## Part 2 – Distribution of Budget forecasting errors

### Questions 1-4

| | Error percentage |
|---|---|
| | -4.7 |
| | -1.9 |
| | -1.4 |
| | -1.3 |
| | -0.8 |
| | -0.5 |
| | -0.4 |
| | -0.3 |
| | 0.3 |
| | 1 |
| | 3.6 |
| | 4.5 |
| Average (mean) | -0.2 |
| Median | -0.4 |

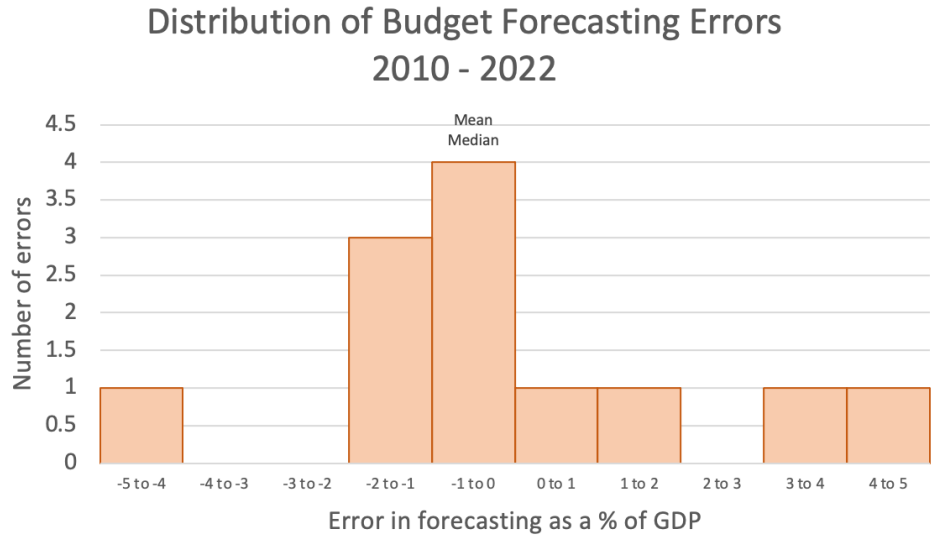
### Question 5

The mean is higher than the median making the data positively skewed because there were more negative values in the data set.

### Questions 6-8

| Category | Number of errors in this category |
|---|---|
| -5 to -4 | 1 |
| -4 to -3 | 0 |
| -3 to -2 | 0 |
| -2 to -1 | 3 |
| -1 to 0 | 4 |
| 0 to 1 | 1 |
| 1 to 2 | 1 |
| 2 to 3 | 0 |
| 3 to 4 | 1 |
| 4 to 5 | 1 |
| Total | 12 |

### Question 9




### Question 10

There is a positive skew to the data. The mean and median are located in the same category.