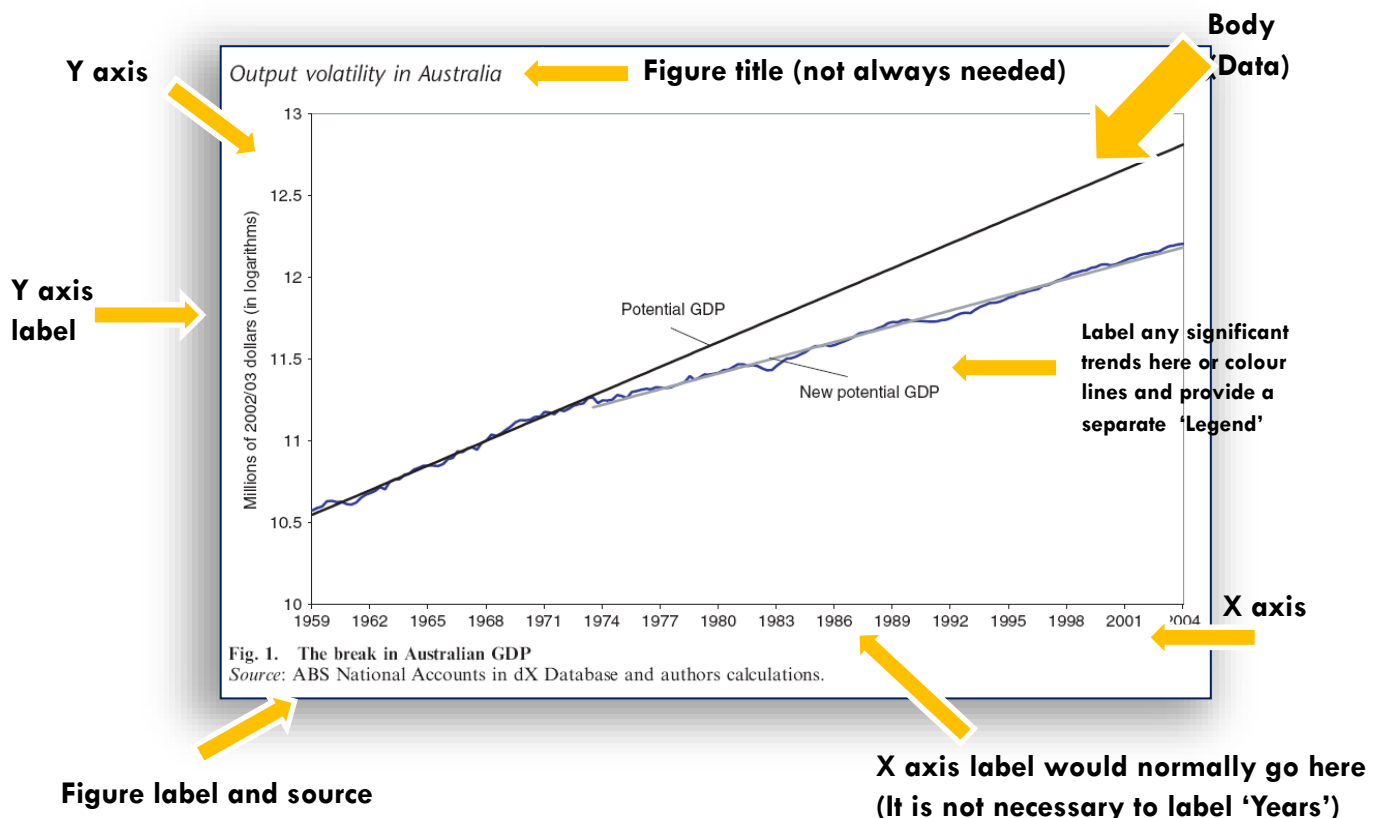# Using Figures and Tables in Assignments

It is good to use data to back up the points you have made in assignments. Data provides evidence and evidence is good support for arguments. However what is the best way to present such information? There are two main ways: Figures and Tables.

Figures

Figures can be diagrams of various kinds, e.g., drawings, logos, cartoons, but they can also be graphs or charts. For example, see the line graph below.

- It is critical that you refer to the figure in the body of your report or essay: 'See Figure 1 below for the break in Australian GDP'. Never place a figure in your assignment and leave the reader without a lead-in phrase or directional "hook". Place this directional hook as near as possible in the text to the table being identified.
- It is important to identify the names of axes. Assignment authors should describe what is going on in the figure in your assignment (e.g., 'Potential GDP diverges from New potential GDP at a log of $11.3m in 1974, see Y axis in Fig. 1'.) Never use a figure without describing the significant findings in the text of your report or essay.
- It is also important to cite any sources used when recording data. If multiple sources are used and a graph or chart is composed from these disparate sources, write 'Adapted from Jones (1999), Smith (2002), Harrison (2010)'.
- Figures are often given a 'Figure title' but this is not done in some subjects (check with your lecturer to establish the convention appropriate to your discipline). Figures are always given a label *below* the figure, with 'Figure' often abbreviated as 'Fig.'.
- There are many kinds of graphs/charts: plot, scatter, histogram, pie, area, radar, etc. Choose the one that best represents the data you have.

Y axis · **Figure title (not always needed)** · **Body (Data)**

Output volatility in Australia

Potential GDP

New potential GDP

Y axis label

Label any significant trends here or colour lines and provide a separate 'Legend'

Millions of 2002/03 dollars (in logarithms)

X axis

Fig. 1.   The break in Australian GDP
Source: ABS National Accounts in dX Database and authors calculations.

Figure label and source

X axis label would normally go here (It is not necessary to label 'Years')

Tables

Tables are treated in a similar way to figures with the following differences:

- Tables are labelled at the *top* of the table; figures are labelled *below* the figure.
- If appropriate, tables are given explanatory notes in footnotes. If there is more than one explanatory note, the footnotes can be numbered. Footnotes are prefaced with the word: 'Note' or 'Notes'.
- Headings are provided for data in columns; demarcation lines also need to be drawn to separate the lines of data (however, avoid unnecessary lines that might clutter the data).
- In general figures (charts/graphs) are used to demonstrate a *trend;* tables, by contrast, are used to show precise data.
- Provide data to an appropriate decimal place, do not provide more detail than necessary.
- The word 'Table' is never abbreviated; however the word 'Figure' often is ('Fig.').

Table title
Column titles or headings
Body (Data)
Source and explanatory footnote
Demarcation lines

Table 1. Rate of female entrepreneurship in Sydney SMEs by selected birthplace, 2001.

Birthplace	Employer	Employer (%)	Own account worker	Own account worker (%)	Rate of entrepreneurship (%)[a]
Australia	19,928	3.7	29,224	5.5	9.2
English-speaking countries total	23,471	3.8	35,374	5.7	9.5
Non-English-speaking countries total	9834	5.3	12,645	6.8	12.1
Selected 10 Asian countries					
Laos	58	4.5	64	5	9.5
Thailand	185	7.6	130	5.4	13
Vietnam	750	6.2	825	6.8	13
Indonesia	154	3.3	186	4	7.3
Malaysia	247	4	274	4.4	8.4
Philippines	163	1	359	2.1	3.1
Singapore	99	4.7	116	5.5	10.2
China	1252	7.5	1655	9.9	17.4
Hong Kong	450	5.3	422	4.9	10.2
Taiwan	107	7.7	109	7.8	15.5
Total selected 10 Asian countries	3465	5.2	4140	5.6	10.8

Source: Unpublished census data, Australian population and housing census 2001.
Note: [a]% employers plus % own account workers.

Finally:

- Consider whether a figure or table is necessary. Often a simple description in words in the body of your assignment is adequate for purpose. Tables and figures are used when they add something important, and when a lot of information needs to be condensed.
- If many tables and figures are used (e.g., in a major report, or a doctoral or masters' thesis) it is customary to provide a 'List of Tables and Figures' on a separate page at the beginning of the document. Tables are separated from Figures, and they are listed sequentially: *Table 1: Title… Table 2: Title …* etc. with corresponding page numbers. These are followed by *Figure 1: Title … Figure 2: Title … Figure 3: Title …* and so on, again with a corresponding page number. This allows readers to easily find the relevant information.