

Eviews : a Primer

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This little tract will help you to navigate your way around Eviews. Eviews can be found in the 3rd floor computer lab in McNeil (for Econ students with a valid account), and in the undergrad computer rooms on the 1st floor of McNeil.

- launching
- Opening a new workfile
- Importing data saved in ascii format.
- Plotting data, running regressions
- useful command-line instructions

Launching

The current version is Eviews 3.1 To open, go to the toolbar and click :

```
start - applications - Eviews
```

Opening a New Workfile

The basic object in Eviews is a Workfile. You will need to open a Workfile for every project you want to do. To do so, you need to know your sample size and frequency. Suppose that your data were quarterly from 1947Q1 to 1997Q4. In Eviews :

1. `file-new-workfile`
2. select "quarterly"
3. type "47:1" as the start date, and "97:4" as the end date.
4. Now you will find yourself in the workfile window.
5. Notice that there are already 2 series there : "c", and "resid". they stand for "coefficients" and "residuals". Every time you estimate something, the coefficients are stored in "c" and the residuals in "resid".

Importing Ascii Data

Ascii files are also known as text files. The extensions we normally see are : `.txt`, `.asc`, `.dat`. Data sets are often arranged in columns, separated by a <Tab>, or a <space> or some other symbol e.g. <,>. Often, you will find it useful to open your data files in Excel or some other spreadsheet to view the data set and "clean up" before using. For purposes of problem sets, this will probably be done for you already (what luck!) Even if not, it's useful that you do it yourself. In one of the Macro courses, you'll probably have the opportunity to mess with Citibase data so you'll learn a lot more about data in Eviews. For the moment, suppose your data set is called "yadda.txt" (and obviously you need to know what path your data is in). To import, do the following.

1. Select **File -- import -- read text-lotus-excel**
2. Select the path and filename of your file
(e.g. `h:\<user>\<subdirectory>\yadda.txt`)
3. You will be looking at a large dialog box with lots of options.
4. *In the top left window*, give names to your series, separated by a space. (Sometimes, the names are already in the data set. In this latter case just key in the number of series you have in the data set)
5. *In the top-middle window*, select the data ordering (usually in columns)
6. *In the top-right window*, select the # of rows and columns to skip. If your data set contains no header rows or columns, then don't skip anything.
7. *middle-middle window* : Where it says "Delimiters", this is what it means: A Delimiter is a symbol that separates the numbers in a data set. As mentioned above, it's often a comma, a <tab>, a <space>, <colon> etc. You get the idea. Treating multiple delimiters as one means that when you encounter, say, 2 <tab>'s or 2 <space>'s in succession, Eviews will ignore the second one. It is important that you choose correctly because otherwise, Eviews will mess up the columns in your data set, and start importing the data points into the wrong cells. This is potentially important when you have missing observations in your data set. Now this is NOT important if you have data that is neatly arranged in columns, with no missing observations in between (in which case, let the default be "treat multiple delimiters as one"). As you gain experience handling data, you'll soon learn how to examine the data set before handling it. Again, everything is nicely handed to you in the problem set, so you hopefully don't have to worry about these problems.
8. When you're done, click "OK"
9. If you're successful, you should see your series appear in your workfile window. Cross check to make sure you imported correctly. A quick way to do so is to plot the series.
10. At this point, save the workfile (I don't have to teach that right??) the file extension, you should note, is `.wf1`.

Plotting Data

1. To plot data, select the series in your workfile window. (e.g. <gdp>). Then in the window, select :
View - open selected - one window.
2. The series pops up in a new window. In the new window, click **view**, and select the type of graph you want.

3. You can open multiple series with the same steps, but just holding shift or CTRL when you are selecting the series you want to open.
4. Experiment on your own.

Running Regressions

Suppose you want to regress income (inc) on consumption (cons) and a constant (as if we'd ever want to do that). To do that, do the following :

1. In the Eviews menu, select
"Quick - estimate equation"
2. Up pops a dialog box. Enter the dependent variable first, followed by the regressors, separated by a space. So enter :
inc c cons
3. Mess around with the options yourself, but you'll see that a different option calls up a different dialog box. Click "oK", and voila, the regression output appears.
4. When you run this regression, you'll note that the residuals have been saved in the "resid" series. If you want to keep the residuals for further analysis later, it would be wise to give the residuals another name.

Useful Commands

Notice that in Eviews, there's a command line window where you can do your data transformations and give it instructions. Eviews understands common logical expressions. Here are some examples of common transformations you will need to take :

```
genr <loggedseries> = log(<oldseries>)
```

The command **genr** generates a new series by taking logs of the old series.

```
genr gdpgrow = dlog(gdp)
```

The command **dlog** takes the logged-first-differences (percentage growth rates) of gdp.

```
genr agesq = age^2
```

^{^2} squares a series

```
genr ser5 = ser1 - 0.5*ser2 + ser3/ser4
```

You can add, subtract, multiply and divide series in the usual way (e.g. when you want to set up a cointegrating vector)

Final Words

Experiment a lot, and use the help menu.