GUIDANCE ON "FLIKE"

All students are expected to use Flike for Assignment 1. As the guidance on the use of this software is limited, some additional guidance is presented here.

On starting Flike, the user will see the GUI shown in Figure 1.

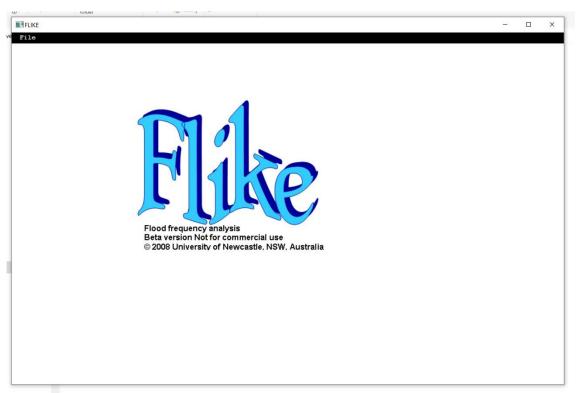


Figure 1. Opening Screen for Flike

The use of Flike requires the user to undertake these steps

- 1. Open or create a datafile
 - a. To do this, the user will click on "File". This will generate a list comprising
 - i. New generates a new datafile. This is the option you will need to use the first time that you use the program for the assignment.
 - ii. Open opens an existing datafile. If you use this option, you will open the datafile that you previously created.
 - iii. Exit
 - b. Both the New and Open options will open a screen (see Figure 2) where you enter a filename. For a new file, the program will generate a file with that name, while for an existing file, the program will open that datafile; in the case of an existing file, you can click on the filename in the usual manner. The expected extension for a Flike file

is ".fld". Additionally, these files are text files and can be edited if necessary, using a text editor like "Vim".

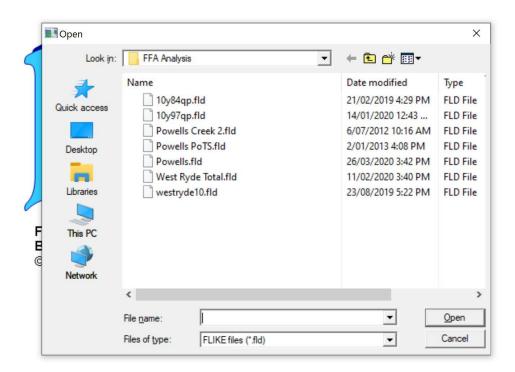


Figure 2. Open File Screen

- 2. Import data into the datafile. After you have created (opened) the datafile you will see the screen shown in Figure 3 when the General Tab is highlighted. On this screen, you will select the Inference Method, and the Probability Model.
 - a. For the Inference Model, you need to use the Bayesian with No Prior Information. You may wish to try other options, but the recommended option is to be used for your report.
 - b. For the probability Model, you need to select either the LP3 or the GEV. In either case, you should try the other option to ascertain which probability model results in the best fit to the data.
- 3. After completion of the General Tab, you need to highlight the "Gauged Flows" tab. It is on this tab that you will enter your AMS data into Flike. To enter data, you will need to highlight the "Import" button on the right of the screen. This will result in the screen shown in Figure 4. For the

AMS provided to you, the first column contains the year and the second column contains the AMS flow. These are the values you enter in the Data Columns section of the screen.

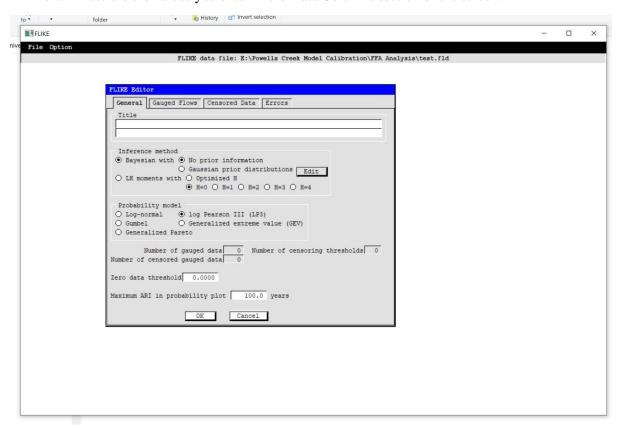


Figure 3. FFA Details Screen

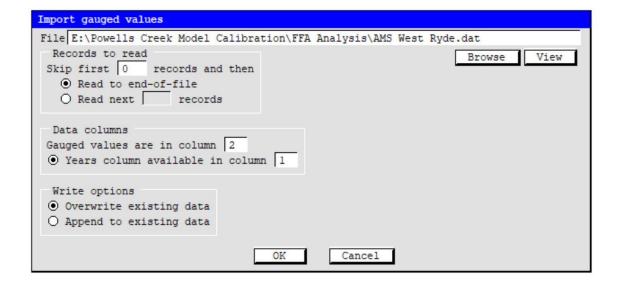


Figure 4. Import Data Screen

- 4. Flike should now have the information necessary for fitting the selected statistical model to the data. This will be shown by the "Option" button now having the following options:
 - a. Edit Data takes you back to the data screens so you can modify data.
 - b. Fit Model runs the Bayesian Inference model to fit the Statistical Model to the available data.
- 5. After fitting the model, additional options should appear in the "Option" button. These will be "View Plot" and "View Results". The "Edit Data" option remains in case there is a need to edit the data and to rerun the fitting algorithm.
 - a. View Plot this is a FFA plot that you can save for inclusion in a report. You can edit the scale and the form of the probability plot.
 - b. View Results this is a text file with both the input data and the predicted quantiles provided.