Quick Casio cfx-9850G Plus probability keystroke guide

1 Press MENU 1 to select RUN mode for normal computations.
Note that, after executing a command with EXE , ◀ and ▶ act as replay keys.

2 OPTN provides on-screen menus for many commands. The six function keys, F1 to F6 at the top of the keyboard execute the corresponding on-screen commands. For example, OPTN F1 (LIST) puts the List menu on the screen. F6 turns the page. Pressing EXIT backs up the (heirarchical) menus.

3 Probability commands appear with OPTN F6 F3 (Prob). F4 (RAN#) generates random numbers uniformly on (0,1). Then F6 turns the page for normal distribution menu commands.

4 The Integer command is accessible with OPTN F6 F4 .

5 Pressing EXE repeatedly has the effect of repeating the previous command. So, after entering the command *Int(6Ran# +1)*, each successive press of EXE will simulate another roll of a standard die.

6 Press MENU 7 to select TABLE mode for tabulation.
Enter a function. Press F5 (RANG) to enter desired range and then F6 (TABL).

7 Tables can also be generated in RECUR mode, MENU 8 . Use n for the variable.
An automatic cumulation command is then available after SHIFT MENU (SET UP).

8 A column of values in a table can be transferred to a list, for data analysis purposes. First move the cursor to the appropriate column of the table, press OPTN F1 (LIST), F2 (LMEM) and then choose the desired list. Be careful: this will *replace* an existing list.

9 Press MENU 2 to select STAT mode for data analysis. Press F1 (GRPH) and then F6 (SET) to check or change the statistical graphs. For numerical analysis, press F2 (CALC) and then F6 (SET) to check or change the variables selected.
  For a histogram, press SHIFT MENU (SET UP) and change to manual graphing with F2 (MAN) to control histogram construction. Set a viewing window for the histogram with SHIFT F3 (V·Window).

10 Standard probability distribution tables are also available in STAT mode on the Casio cfx-9850 Plus by pressing F5 (DIST). (These tables are not available on the Casio cfx-9850.) Operational details are given overleaf.

11 To retrieve a variable from the table or function list, press VARS F4 (GRPH) and then use F1 (Y) to name the variable. (E.g. Y1, Y2, etc...)

12 To run a program, first press MENU log and then use the ▼ cursor to highlight the program name. F1 (EXE) will run the program; alternatively, F2 (EDIT) will display the program steps for editing. Press EXIT to escape without changing anything.

Quick Casio cfx-9850G Plus statistical inference guide

The Plus models of the Casio cfx-9850G range include facilities for hypothesis testing, confidence interval construction and probability distribution tables. Press MENU 2 to first select STAT mode.

Hypothesis testing

1 F3 (TEST) accesses various hypothesis tests: z, t, ^{2}, f and ANOVA. The z and t tests deal with either one-sample or 2-sample cases, while the z-tests also handle proportions. ANOVA tests are one-way only, with up to six treatments. Each test requires different kinds of data different calculator operations. However, there are enough similarities to describe them in general here.

2 After selecting the appropriate test, a menu appears. First, identify the data:

For z and t tests, the data can be either in the form of F1 (List) already stored in the calculator or F2 (Var) to input variables, in the form of summary statistics, if the original data are not to be used.

For the ^{2} test, the matrix of observed frequencies must be given. The data must be entered in a matrix before conducting the test. Press MENU 3 to select MAT mode to do this.

In the case of ANOVA, identify the number of treatments.

3 Move the ▼ cursor down the menu and choose or insert the appropriate test specifications, including the names of the data lists where necessary.

4 The final item in the list will conduct the test. Choose F1 (CALC) for a numerical report or F6 (DRAW) for the associated probability drawing.

Confidence Intervals

5 F4 (INTR) accesses confidence intervals for z and t tests. These operate in a similar fashion to the z and t hypothesis tests. Identify the data, and specify the confidence level (0 < *C-Level* < 1) and any other test specifications then press F1 (CALC) to get the left and right endpoints of the confidence interval and other statistical data.

Probability Distributions

6 F5 (DIST) accesses probability values for normal, Student's t, Chi squared, F, Binomial, Poisson and geometric distributions. (It is necessary to first turn the page with F6 to access the last two of these.) Both probability densities (pd) and cumulative distributions (cd) are available.

7 After selecting a normal, t, ^{2} or F distribution, enter the necessary parameters and statistics into the resulting menu. Move the cursor down to Execute and press F1 (CALC) to generate the required probability. Press EXIT to return after the result is displayed. The normal probabilities also include inverse normal tables.

8 For the binomial, Poisson and geometric probabilities, there is also an option to input a set of values. Choose F1 (List) to do this or F2 (Var) to find the probability associated with a single value only. If the List option is chosen, the results will be reported as a scrollable list. If you want to save this list, return to RUN mode with MENU 1, first retrieve it with OPTN F1 F1 (List) followed by SHIFT (-) (Ans). It can then be stored in the usual way.