

TOOLS

A. **Format Grid**

If you change the definition of your variables, for example, from floating point type to an integer type, you will want to reformat the data in the grid. Under the Tools drop-down menu, click on the Format Grid option. This will reformat the data in your grid to correspond with the definition of the variables.

B. **Sort Cases**

There may be a reason to sort the cases in the data grid. For example, you may have created a file that contains integer identification numbers for each case. If these are not in order, you may want to sort the file to put records in order of that variable. Simply click on a cell in the column of the variable to sort then select the sort option under Tools. Your file will be sorted in either ascending or descending order based on which one you select when the sort dialog appears.

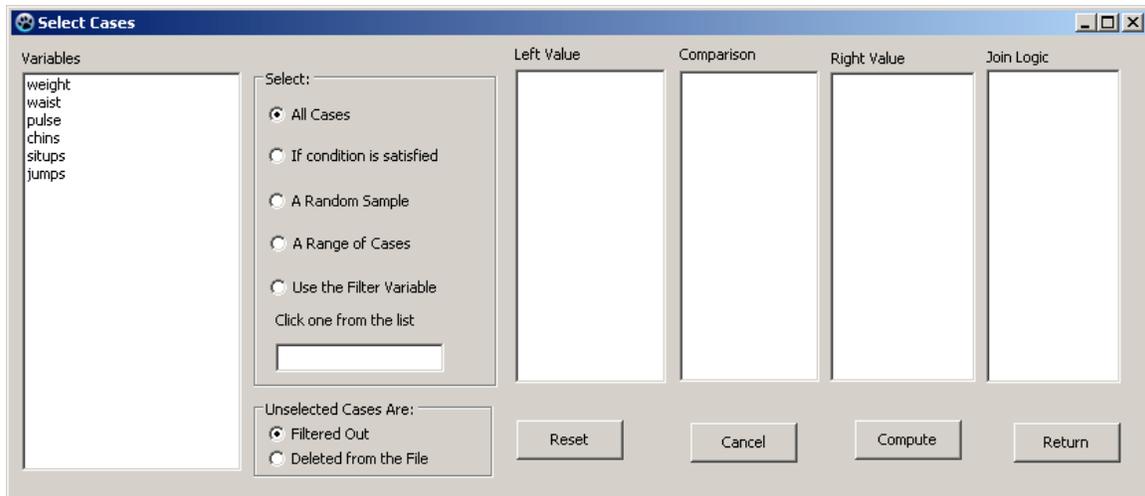
C. **Print Grid File**

To obtain a hard-copy of the data in your data grid, click on this option under the Tools menu. The data will then be displayed on the "Output" form which resembles a basic word-processor. You can edit information on this form if desired. The form has an icon for sending the displayed page to your printer. Click on this icon and the file will be printed.

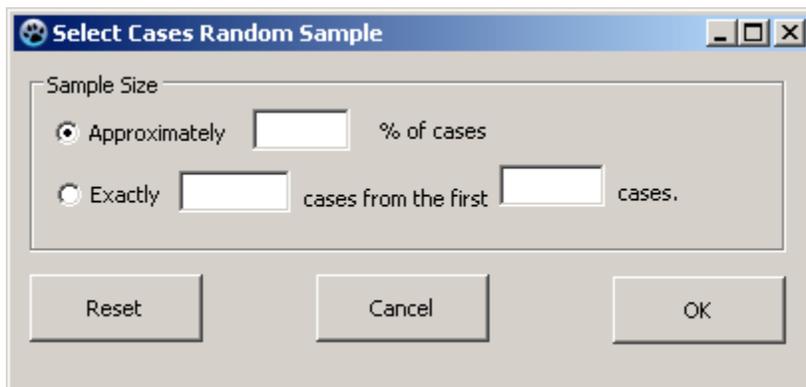
D. **Select Cases**

Your data file may contain a large number of cases but for some analyses you may wish to use only a subset of those cases. You can select cases to analyze in several ways. For example, you can randomly select a number of cases or you can select a number of cases from the beginning of the file. You can also select cases starting at a specific case number through another case number. Sometimes you need to select cases based on specific values of one or more variables in the file. In this case one can use the "Select If" option to create the selection criteria and apply it to the file. Cases NOT selected can be deleted from the data grid or can be "flagged" by a separately created selection variable. To demonstrate selection of cases, we have loaded the file CANSAS.LAZ in our data grid and clicked the Select Cases option in the Tools menu.

The first dialog form to appear is shown below:

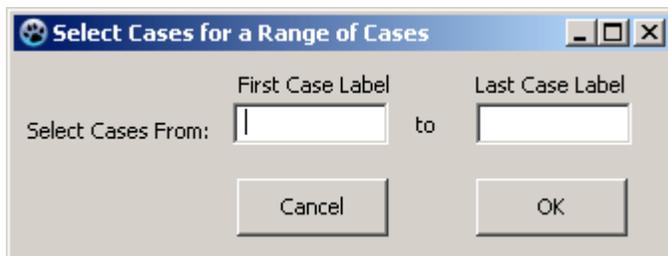


Notice that there are five options. The first selects all cases in your file even though you may have previously selected cases that created a “filter” variable. If you click on the Random Sample option, the form below appears:



Notice you can specify either a percent of the cases or an exact number of cases from the first N cases in the file.

If you select the option to use a Range of Cases in the previous form, you will see:



In this form you enter the first and last case label from which to select the desired cases.

When you use the “Select If” option the form shown below appears. We have entered specifications for selecting cases using two different variables in our file. To enter a variable name, you click on the name of the variable in the list of variables and click the right arrow button to enter it in the selection edit box. Notice that opening and closing parentheses are used to separate the criteria and that the criteria are joined

by a logic symbol. To enter values, parentheses, logic, etc. you simply click the corresponding keys shown on the form. Here then is the form:

The screenshot shows the 'Select Cases IF:' dialog box. On the left, a list of variables includes 'weight', 'waist', 'pulse', 'chins', 'situps', and 'jumps'. The 'waist' variable is selected. The main text area contains the logical expression: $(\text{weight} > 180) \& (\text{waist} > 35)$. A keypad below the text area provides buttons for parentheses, comparison operators ($<$, $>$, \leq , \geq , $=$, \neq , $-$), arithmetic operators ($+$, 0 , $.$), and logical operators (and, or, not). At the bottom are 'Reset', 'Cancel', and 'OK' buttons.

When the selection criteria have been entered, click the OK button to return to the Select Cases form. Here is what that form looks like when we have clicked the OK button:

The screenshot shows the 'Select Cases' dialog box. On the left, the same list of variables is shown. The 'Select:' section has radio buttons for 'All Cases', 'If condition is satisfied', 'A Random Sample', 'A Range of Cases', and 'Use the Filter Variable'. The 'If condition is satisfied' option is selected. Below this is a text box for 'Click one from the list'. The 'Unselected Cases Are:' section has radio buttons for 'Filtered Out' and 'Deleted from the File'. The 'Filtered Out' option is selected. The 'Left Value' column contains '>' and '>'. The 'Comparison' column contains '180' and '35'. The 'Right Value' column contains 'weight' and 'waist'. The 'Join Logic' column contains '&'. At the bottom are 'Reset', 'Cancel', 'Compute', and 'Return' buttons.

When we click the Compute button on this form, the logic we used to select cases is shown in the four columns on this form. Notice we have also selected the “Filtered Out” option. This will create a filter variable in our data grid which is used by various procedures to select cases for an analysis. Our data form now appears as below:

LazStats [-] [] [X]

FILES Variables Tools Edit Analyses Options Simulations Help

No. Cases: No. Variables: Current File:

Case 0	weight	waist	pulse	chins	situps	jumps	IfFilter
CASE 1	191.00	36.00	50.00	5.00	162.00	60.00	YES
CASE 2	189.00	37.00	52.00	2.00	110.00	60.00	YES
CASE 3	193.00	38.00	58.00	12.00	101.00	101.00	YES
CASE 4	162.00	35.00	62.00	12.00	105.00	37.00	NO
CASE 5	189.00	35.00	46.00	13.00	155.00	58.00	NO
CASE 6	182.00	36.00	56.00	4.00	101.00	42.00	YES
CASE 7	211.00	38.00	56.00	8.00	101.00	38.00	YES
CASE 8	167.00	34.00	60.00	6.00	125.00	40.00	NO
CASE 9	176.00	31.00	74.00	15.00	200.00	40.00	NO
CASE 10	154.00	33.00	56.00	17.00	251.00	250.00	NO
CASE 11	169.00	34.00	50.00	17.00	120.00	38.00	NO
CASE 12	166.00	33.00	52.00	13.00	210.00	115.00	NO
CASE 13	154.00	34.00	64.00	14.00	215.00	105.00	NO
CASE 14	247.00	46.00	50.00	1.00	50.00	50.00	YES
CASE 15	193.00	36.00	46.00	6.00	70.00	31.00	YES
CASE 16	202.00	37.00	62.00	12.00	210.00	120.00	YES
CASE 17	176.00	37.00	54.00	4.00	60.00	25.00	NO
CASE 18	157.00	33.00	53.00	11.00	200.00	60.00	NO

Row: Column: Filter Status:

In the filter variable, the cases that have been selected have a YES while those not selected have a NO entry. Procedures will know if the filter variable is to be used by checking the Filter Status which is shown on the main form above.

E. Load A Sub File (not yet implemented)