**ONE VARIABLE DATA**

Histograms –

1. Open a list/spreadsheet.
2. Name the list
3. Enter the data into the list
4. Having one data point highlighted, push:

Menu🡪

3. Data🡪

 8 Summary Plot 🡪

 X list (choose your data name); Summary list, choose your data name; Display on (I prefer to change this setting to “New Page”.

Fixing the histogram

1. Frequency Plot :

 Menu🡪

2. Plot Properties🡪

 A. Remove Y-variable

1. Alignment (to start at a different number than your first data value):
2. Bin Width:

Menu🡪

 2. Plot Properties 🡪

2. Histogram Properties 🡪

2. Bin Settings 🡪

1. Equal Bin Width🡪

Equal Bin Width Settings : Width – enter your desired bin width; Alignment – Enter the value at which you want to start your graph.

1. Change Window:

Menu🡪

5. Window Zoom🡪

2. Zoom Data

One-Variable Stats

1. Starting from the spreadsheet page, be sure one data point is highlighted.

Menu🡪

4. Statistics🡪

1. Stat Calculations🡪

One-Variable Statistics🡪

1 list🡪

 x list (push the center of the touchpad to get the variables, choose your variable)🡪↓↓↓ 1st result column: the next empty column, or you can name that column first and choose it. Enter.

**NORMAL DISTRIBUTION**

Area under the normal curve:

1. From Scratchpad or Calculator page:

 Menu🡪

6. Statistics🡪

5. Distributions🡪

2. Normal CDF 🡪

|  |  |  |
| --- | --- | --- |
| with z-score, output area |  | without z-score, output area |
| Lower Bound | -4, or lowest z-value |  | Lower Bound | -∞, or lowest X value |
| Upper Bound | 4, or highest z-value |  | Upper Bound | ∞, or highest X value |
| μ | 0 |  | μ | mean of the data set |
| σ | 1 |  | σ | SD of the data set |

Values, given % area

2. 1. From Scratchpad or Calculator page:

 Menu🡪

 6. Statistics🡪

5. Distributions🡪

3. InvNorm 🡪

|  |  |  |
| --- | --- | --- |
| Output z-score |  | Output X |
| Area | as a decimal |  | Area | as a decimal |
| μ | 0 |  | μ | mean of the data set |
| σ | 1 |  | σ | SD of the data set |

**TWO VARIABLE DATA**

Scatterplots

Enter data into two columns and name the columns.

1. Press Home (On)🡪

choose add graphs at the bottom of the screen🡪

 Menu🡪3.

Graph Entry🡪

5. Scatterplot

1. At the bottom of the screen, there are two fields to fill in: 
2. Press VAR🡪

(choose your x-list) VAR🡪

(choose your y-list🡪 Enter.

1. Adjust the window:

Menu🡪

4. Window/Zoom🡪

9. Zoom Data

Linear Regression

From the Spreadsheet, with one data point highlighted:

1. Menu🡪
	1. 4. Statistics🡪
		1. 1. Stat Calculations🡪
			1. 3. Linear Regression (mx+b)🡪

xlist and ylist (press center of touchpad to choose variables)🡪

↓↓↓↓ First result column🡪

next available or c[].

1. Your equation is of the form , with *m* = slope, and *b* = *y*-intercept, and Correlation Coefficient = r.