Objective: Interpret an exponential function from an algebraic, numerical, graphical, and verbal perspective and extract information relevant to the phenomenon modeled by the function.

Example A. Consider the data which represents the total number of COVID cases at the end of each month in one Southern US State from March 2020 - August 2020.

March	April	May	Jun	Jul	Aug
2267	11811	23327	43877	105278	154512

1. Using your calculator, enter this data to create a scatterplot.
   Rewrite this data using a table where March (x =1), April (x=2) and so forth.

Month (Using March x =1)	Total Number of Covid Cases in one Southern US State
1	2262
2	11811
3	23327
4	43877
5	105278
6	154512

2. Adjust your window appropriately. Using only the points (1, 2262) and (2, 11811), find an exponential model for this data.

3. Using only the points (2, 11811) and (6, 154512), find an exponential model for this data.

4. Using your calculator and the entire data set, determine an exponential function that best models this data. Write this in function notation allowing inputs, months, to be represented by x, and outputs, cases, to be represented by C(x).

5. Based on the predicted model, what is C (10) and interpret these results?

6. Based on the predicted model, could a prediction be made as to when the number of cases were 0?