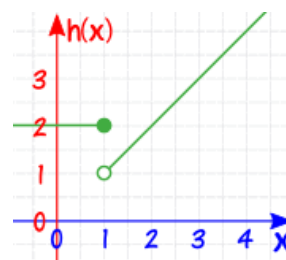
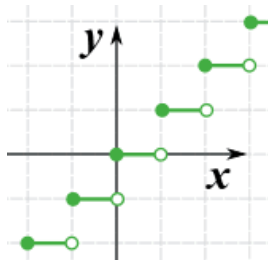
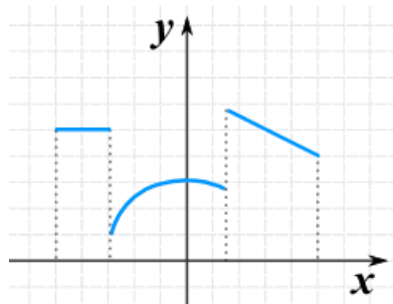


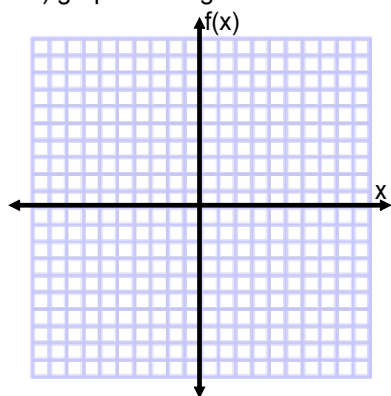
4.3 A – Introduction to Piecewise Functions

A piecewise function is pieces of more than one function on the same graph. How much is graphed of each function depends on the function (output) defined by different x (input) values.



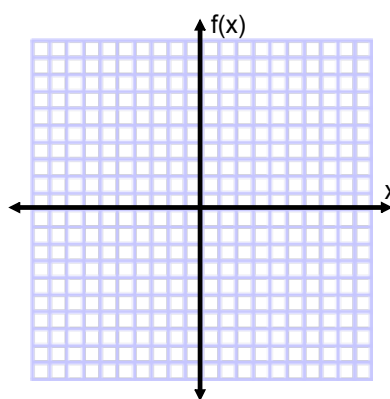
Steps to graphing piecewise functions:

1) graph the original function



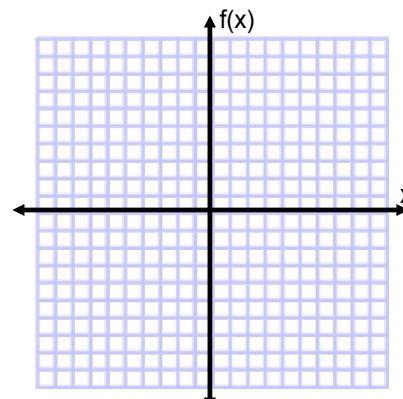
$$f(x) = 2x + 1$$

2) go to the x value for the given domain and determine if the graph requires an open circle (o) or a closed circle (●) and place it on the graph.



$$f(x) = 2x + 1, \text{ when } x > 0$$

3) erase the portion of the function not in the given domain.



$$f(x) = 2x + 1, \text{ when } x \leq 0$$

4.3A - Intro to Piecewise functions.notebook

