

5. [10 points] The graph of a piecewise linear function  $f(x)$  is shown below. On the axes provided, sketch a well-labeled graph of an antiderivative  $F(x)$  of  $f(x)$  satisfying  $F(0) = -1$ . Be sure to make the concavity of  $F$  clear and to label the  $y$ -coordinates of the local minima and maxima of  $F$  and the  $y$ -coordinates of  $F$  at  $x = 5$  and  $x = -5$ .

