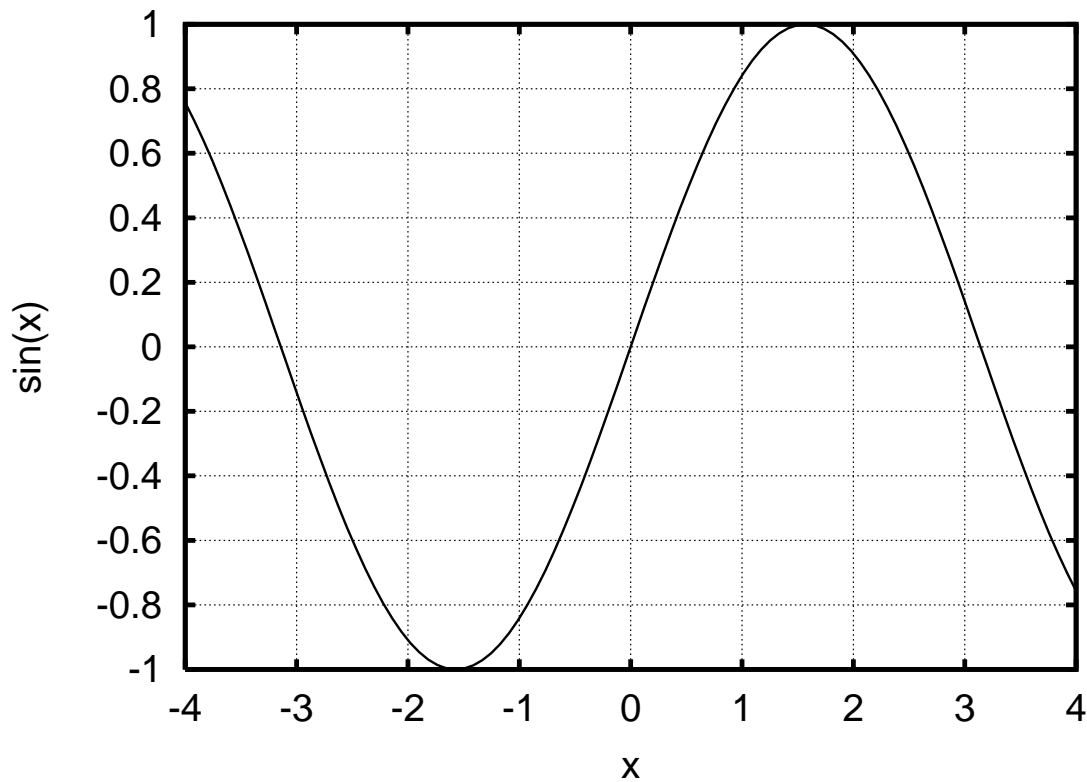


**Chapter 2.2: The Derivative at a Point:  
Determining the Derivative Graphically and Numerically  
Calculus I**

College of the Atlantic. Fall 2021

1. Consider  $g(x) = \sin(x)$ . Using the graph below, estimate  $g'(0)$ .



2. Numerically estimate  $g'(0)$ . That is, start with the definition of the derivative. Then use your calculator to numerically evaluate the limit: see what happens as  $h$  gets smaller and smaller. **Use radians.** Do your answers for  $g'(0)$  agree?