1. [14 points] Note: No work or explanation is required on this page.

The graph of a sinusoidal function \( g \) is shown below.

\[
y = g(x)
\]

(a) [6 points] Find the period, amplitude, and midline of \( y = g(x) \).

Period: 
Amplitude: 
Midline: 

(b) [8 points] Below are the graphs of several transformations of \( g(x) \). For each of these graphs, write the letter of the one function from the “Answer Choices” whose graph is shown. (Clearly write the capital letter of your choice on the answer blank provided.)

**Answer Choices**

A. \( g(\pi x) \)  
B. \( \pi g(x) \)  
C. \( \frac{1}{2}g(x) \)  
D. \( 2g(x) \)  
E. \( g(2x) \)  
F. \( g\left(\frac{1}{2}x\right) \)  
G. \( g(x) - 1 \)  
H. \( g(x + 1) \)  
I. \( g(x - 1) \)  
J. \( g(x) + 1 \)  
K. \( g(x) - 2 \)  
L. \( g(x + 2) \)  
M. \( g(x - 2) \)  
N. \( g(x) + 2 \)  
O. \( 2g(x) - \frac{1}{2} \)  
P. \( \frac{1}{2}g(x) + \frac{1}{2} \)

Answer: 

Answer: 

Answer: 

Answer: 

Answer: 