

PROBLEM:

Suppose that MATLAB is used to plot a sinusoidal signal. The following MATLAB code generates the signal and makes the plot. Draw a sketch of the plot that will be done by MATLAB. Determine the amplitude (A), phase (ϕ), and period of the sinusoid and label the period on your plot.

```
Fo = 50;td=.005
dt = 0.0001;
tt = -.01 : dt : .04;
Z =20;
xx = real( Z*exp( j*2*pi*Fo*(tt + td) ) );
plot( tt, xx ), grid
title( 'SECTION of a SINUSOID' ), xlabel( 'TIME (sec)' )
```