The Inclined Plane
Pre-lab Test 5 (10 Points)

Print Name _____
Lab Section _____**Date**_____

Staple your work sheet to this pre-lab test. You are required to show your calculations! Points will be taken off if your work is not neat and well organized. Be sure to print your name on both sheets.

Please note that you do not need an expensive graphing calculator for this course. You are required to have one that does statistical functions and linear regression.

1) A Glider of length 10 cm slides down an air track. It passes through the upper photogate in 0.5 sec. A little later it passes through the lower photogate, 100 cm down the track, in 0.25 sec. Calculate the initial velocity. Calculate the final velocity. Calculate the acceleration of the glider.

2) A glider accelerates from a velocity of 0.5 cm/ sec up to a velocity of 0.75 cm/sec in 4 seconds. The error in the measurements of the velocities is 0.05 cm/sec. The error in the time measurement is 0.1 seconds. Calculate the acceleration of the glider and the error in our calculation of it.