

Exp. No. 8

Energy Conservation

Name: Grade:

Student's No.: Day and Date:

Partners Names: Sec.:

Table 8.1

Mass1	h(cm)	Y(cm)	t(sec)	x(cm)	V _{th}	V _{exp}

Table 8.2

$E_A = mgh$	$E_B = \frac{7}{10} m (v_{th})^2$	$E_B = \frac{7}{10} m (v_{exp})^2$

Q1. Compare the values calculated in columns 1 with 2 and 3 in table 8.2.

Q2. Is the energy of the rolling sphere conserved between A and B?

Q3. Calculate **the time** of fall from y= 40 cm, and find the energy E for **x=28 cm** in Ergs (Er) and Joules (J). What is the potential energy at point A in Er and J for **h=7 cm**? What is E at B for this h? (take **m=10 gram**)