

## ASSIGNMENT

### PHYSICS

### CLASS XI

#### ➤ **THEORETICAL QUESTIONS :**

Q1. Find out the dimensions of the following:

- (a) Acceleration
- (b) Kinetic Energy
- (c) Potential Energy
- (d) Linear Momentum
- (e) Time period
- (f) Work
- (g) Pressure
- (h) Surface Tension
- (i) Frequency
- (j) Thrust

Q2. Using Principle of Homogeneity of dimensions check the correctness of the three kinematical equations of motion.

Q3. Discuss in short, how errors propagate in sum, difference, product, division & raised to a power of quantities.

#### ➤ **CONCEPTUAL UNDERSTANDING :** (Think it over)

Q4. Answer the following with suitable reasons (maximum two sentences) :

- (a) Which speed is measured by the speedometer of a scooter?
- (b) Can an object have constant speed but, variable velocity?
- (c) Can the speed of an object be negative?
- (d) Under what condition will the distance & displacement of the same object have the same magnitude?
- (e) Draw position-time graph for a stationary object.

#### ➤ **NUMERICALS :**

Do the following exercises from NCERT textbook part 1 :

3.14, 3.18,

**Note:** Assignment to be submitted by 23 July 2014.