

Student: Kushal Kumar R

Score: 2/11 (18.18%)

Code: 4875

1. Which affects the centre of gravity of the object?

- A) Weight
C) Density (Incorrect)
- B) **Mass**
D) Shape

A) $4r/5$ C) $3r/4$ B) **$3r/8$** D) $r/2$ (Incorrect)

2. What is the name of the point at which all the weight of the body concentrated?

- A) Initial point
C) Centroid (Incorrect)
- B) **Centre of gravity**
D) Central point

7. What is the centre of gravity of a sphere?

- A) **At the centre (Correct)**
C) At the diameter
- B) On the circumference
D) At the radius

3. Where the centre of gravity of a circle lies?

- A) **At its centre**
C) Any where on its circumference
- B) Any where on its radius
D) Any where on its diameter (Incorrect)

8. Which state of equilibrium's example is A cone resting on its tip?

- A) Stable
C) **Unstable**
- B) Neutral
D) Horizontal (Incorrect)

4. What is the centre of gravity of a right circular cone from its base?

- A) $h/2$ (Incorrect)
C) **$h/4$**
- B) $h/3$
D) $h/5$

9. Which one of the following geometrical shapes centre of gravity lies from its base is $1/3$ of its height?

- A) Square
C) **Triangle**
- B) Rhombus (Incorrect)
D) Cone

5. What is the centre of gravity of a rectangular body?

- A) Longer side of rectangle
C) **At the point of intersection of its diagonals (Correct)**
- B) Shorter side of rectangle
D) At the corners

10. Which state of equilibrium's example is, A cone resting on its base?

- A) Un-stable
C) **Stable**
- B) Neutral (Incorrect)
D) Both A and B

6. What is the centre of gravity of a solid hemisphere from its base?

11. What is the centre of gravity of a semi circle of diameter 12 cm?

- A) 2.24 cm (Incorrect)
C) 3.25 cm
- B) **2.54 cm**
D) 2.75 cm