

1) What are the effects of force?

Ans:- The effects of force are:-

- ① Force can move a object originally at rest.
- ② Force can stop a moving object.
- ③ Force can make a moving body to move faster.
- ④ Force can slow down a moving body.
- ⑤ Force can change the direction of motion of a moving body.
- ⑥ Force can change the shape or size of the body.

2) Differentiate contact and non contact force.

Ans:- Contact force

① The force which acts on bodies by making an actual contact, is called contact force.

② Ex- Frictional force, Muscular force etc.

Non contact force

① Forces which act on bodies with no contact with them are called non contact forces or forces from distance.

② Ex- Gravitational force, Magnetic force etc.

3) Differentiate mass and weight.

Ans  $\Rightarrow$  Mass

① The mass of a body is the quantity of matter contained in it.

Weight  $\Rightarrow$  Weight is

① Force exerted by the mass of any object due to gravitational force is called weight of that object.

4) Define rolling friction with one example.

Ans  $\Rightarrow$  When an object rolls over a surface, the force which opposes the rolling motion of the object is called rolling friction.

Ex - When we ride a bicycle, the force that opposes the motion of the bicycle is the rolling friction.

5) What do you mean by normal force?

Ans  $\Rightarrow$  The normal force is the component of a contact force that is perpendicular to the surface that an object contacts.