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Class: I V **Sub.tec: Naina paswan**

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BASED ON N.C.E.R.T PATTERN

CHAPTER : 11 FORCE, WORK AND ENERGY

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ANSWERS:

Ans 1There are many examples of forces in our everyday lives:

- **weight force (i.e. the weight of something)**
- **the force of a bat on the ball.**
- **the force of the hair brush on hair when it is being brushed.**
- **the force of your foot pushing on the pedal when you ride your bike.**

Ans 2. Types of Forces

Contact Forces	Action-at-a-Distance Forces
Frictional Force	Gravitational Force
Tension Force	Electrical Force
Normal Force	Magnetic Force
Air Resistance Force	

Ans 3. The gravitational force is a force that attracts any two objects with mass. We call the gravitational force attractive because it always tries to pull masses together, it never pushes them apart. In fact, every object, including you,

is pulling on every other object in the entire universe .

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ANSWERS:

Ans 1. The transfer of energy from one object to another, especially in order to make the second object move in a certain direction. Work is equal to the amount of force multiplied by the distance over which it is applied.

Ans 2. The work done on a body depends upon two factors:

B. **Magnitude of the force (F), and.**

C. **The displacement through which the body moves (s).**

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ANSWERS:

Ans 1. Simple machines that are widely used include the wheel and axle, pulley, inclined plane, screw, wedge and lever.

Ans 2. Nutcrackers are also an example of a second class lever. With third class levers the effort is between the load and the fulcrum, for example in barbecue tongs. Other examples of third class levers are a broom, a fishing rod and a woomera..

Ans 3. A wheelbarrow is a compound machine that is popularly used to carry heavy loads. It has two simple machines, the wheel and axle and the lever that helps to make the load lighter and simpler to move around.

Ans 4. Wheelbarrows have a wheel at the fulcrum with a smaller, cylindrical axle at the center. The wheelbarrow's wheel and axle help it move without friction, making it easier to push and pull.