

C) Power - _____

Equations

Ex 1) A force of 40 N is exerted on a mass, causing it to move with a constant speed of 5 m/s. What power is used?

$$P = W/t = Fd/t = Fv$$

Ex 2) A girl weighing 500. newtons takes 50. seconds to climb a flight of stairs 18 meters high.

Her power output vertically is

$$P = W/t = Fd/t = Fv$$

Ex 3) A 95-kg student climbs 4.0 m up a rope in 3.0 seconds.

What is the power output of the student?

$$P = W/t = Fd/t = Fv$$