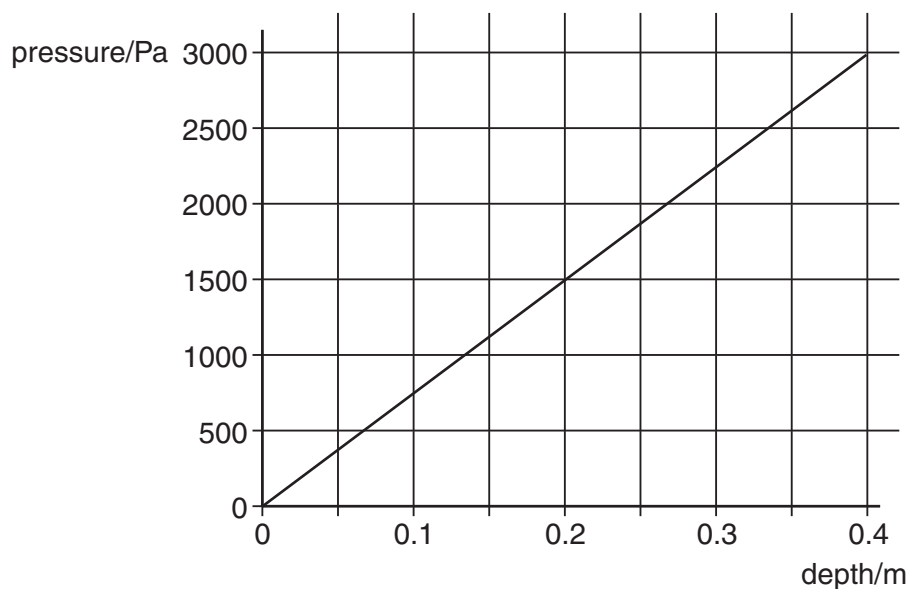


- 18 A boat moving at constant speed v through still water experiences a total frictional drag F .

What is the power developed by the boat?

- A $\frac{1}{2}Fv$ B Fv C $\frac{1}{2}Fv^2$ D Fv^2

- 19 The graph shows how the pressure exerted by a liquid varies with depth below the surface.



What is the density of the liquid?

- A 600 kg m^{-3} B 760 kg m^{-3} C 5900 kg m^{-3} D 7500 kg m^{-3}

- 20 In an experiment to demonstrate Brownian motion, smoke particles in a container are illuminated by a strong light source and observed through a microscope.

The particles are seen as small specks of light that are in motion.

What causes this motion?

- A collisions between the smoke particles and air molecules
B collisions between the smoke particles and the walls of the container
C convection currents within the air as it is warmed by the light source
D kinetic energy gained by the smoke particles on absorption of light