

### Answer on Question#39364, Physics, Nuclear Physics

#### Question:

An object of weight 200 N is floating in a liquid. What is the magnitude of buoyant force acting on it?

#### Answer:



where  $mg$  is weight of the body,  $F_b$  is buoyant force.

Newton's first law of motion:

$$mg = F_b$$

Therefore:

$$F_b = 200 \text{ N}$$

Answer: 200 N