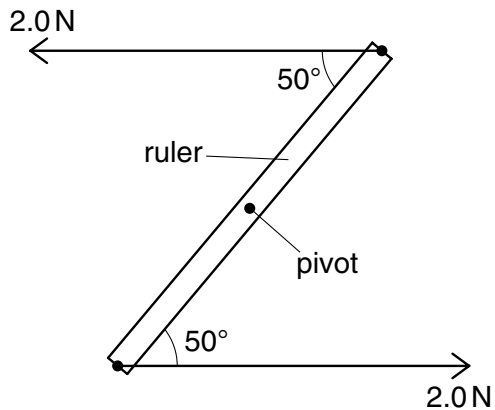


- 13** A ruler of length 0.30 m is pivoted at its centre. Equal and opposite forces of magnitude 2.0 N are applied to the ends of the ruler, creating a couple as shown.



What is the magnitude of the torque of the couple on the ruler when it is in the position shown?

- A** 0.23 Nm **B** 0.39 Nm **C** 0.46 Nm **D** 0.60 Nm

- 14** A cylindrical block of wood has a cross sectional area A and weight W . It is totally immersed in