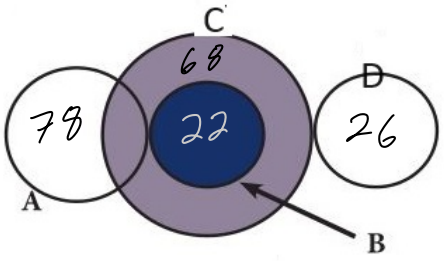
Name: Jai Padhya

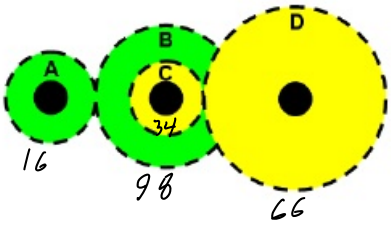
For the system of gears pictured, when gear A = 78 teeth, gear B = 22 teeth, gear C = 68 teeth, and gear D = 26 teeth, and the input torque is 52 N-m, what is the output torque (precision of 0.01)?



$$\frac{22}{78} \cdot \frac{26}{68} = \frac{572}{5304} = 0.1078$$

$$0.1078 \cdot 52 = 5.6 \text{ N-m}$$

For the system of gears pictured, when gear A = 16 teeth, gear B = 98 teeth, gear C = 34 teeth, and gear D = 66 teeth, and the input torque is 76 N-m, what is the output torque (precision of 0.01)?



$$\frac{98}{16} \cdot \frac{66}{34} = \frac{6468}{544} = 11.889$$

$$11.889 \cdot 76 = 903.6 \text{ N-m}$$

Write ONLY answers below this line _____

GRSSet19

a: 5.6

b: 903.6