

for single slit, the angular position is given as :-

$$\sin \theta = \frac{n\lambda}{d}$$

$$\Rightarrow n = 2 \quad \therefore \sin \theta = \frac{2 \times \overset{50}{\cancel{580}} \times 10^{-9}}{\underset{1}{\cancel{21}} \times 10^{-7}} = \frac{50}{100}$$

$$\sin \theta = \frac{1}{2}$$

$$\therefore \theta = \frac{\pi}{6}$$