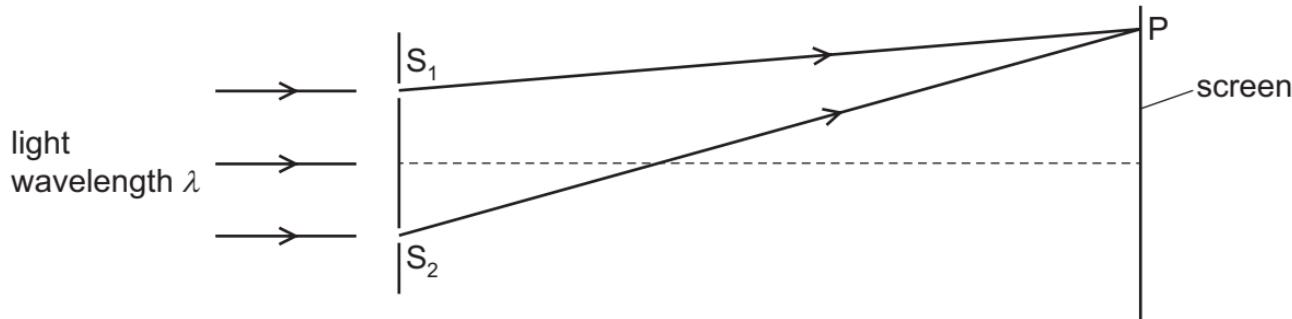


- 28 Monochromatic light of wavelength λ is incident on two narrow slits S_1 and S_2 , a small distance apart. A series of bright and dark fringes are observed on a screen a long distance away from the slits.



The n th **dark** fringe from the central bright fringe is observed at point P on the screen.

Which equation is correct for all positive values of n ?

A $S_2P - S_1P = \frac{n\lambda}{2}$

B $S_2P - S_1P = n\lambda$

C $S_2P - S_1P = (n - \frac{1}{2})\lambda$

D $S_2P - S_1P = (n + \frac{1}{2})\lambda$