

- 22** Two waves X and Y have the same frequency. The amplitude of X is $1.5A_0$ and the amplitude of Y is $2.5A_0$. The waves meet at a point and superpose to form a resultant wave.

For the resultant wave, what is the ratio $\frac{\text{maximum possible intensity}}{\text{minimum possible intensity}}$?

A 1.7

B 2.8

C 4.0

D 16