

### Question 37112

We are given  $\frac{I_1}{I_2} = 64$ . Since intensities are proportional to square of amplitudes ( $I = C \cdot E^2$ ), so  $\frac{E_1^2}{E_2^2} = 64$  and  $\frac{E_1}{E_2} = 8$  - this is the ratio of amplitudes.