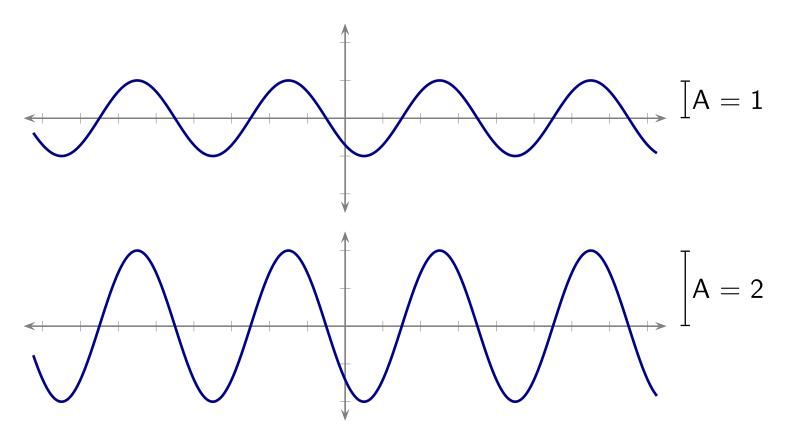
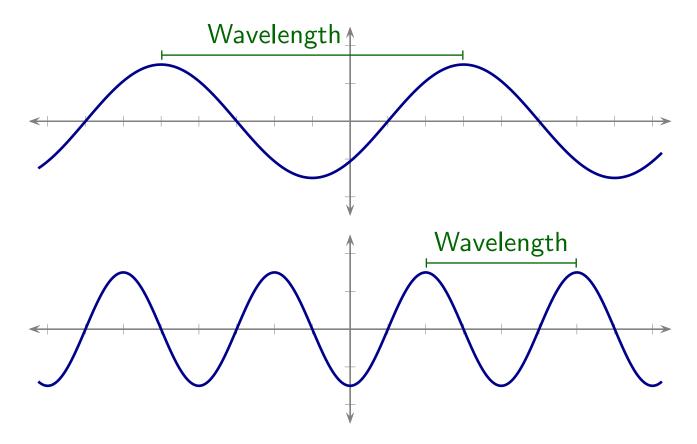
Continuous Waves: Amplitude

Snapshots of continuous waves.



Continuous Waves: Wavelength

Snapshots of continuous waves.



Question 1

Snapshots of three waves on strings are illustrated.

Case A $\xrightarrow{}$ Case B $\xrightarrow{}$ x

Rank the waves in order of wavelength.

- 1. B same as C, larger than A.
- 2. A same as B, larger than C.
- 3. A same as B, smaller than C.
- 4. B largest, C middle, A smallest.
- 5. A largest, C middle, B smallest.

Question 2

The PhET "Waves on a String" demonstration is set up as follows:

Mode	Oscillate
D	
Damping	0
End	no end
Amplitude	0.50
Tension	medium
Frequency	1

Which of the following is true regarding the wavelength:

- $1. \ 0.5 \, \mathrm{cm}$
- 2.1 cm
- 3. 2 cm
- 4.4 cm
- 5.7 cm

Question 3

The PhET "Waves on a String" demonstration is set up as follows:

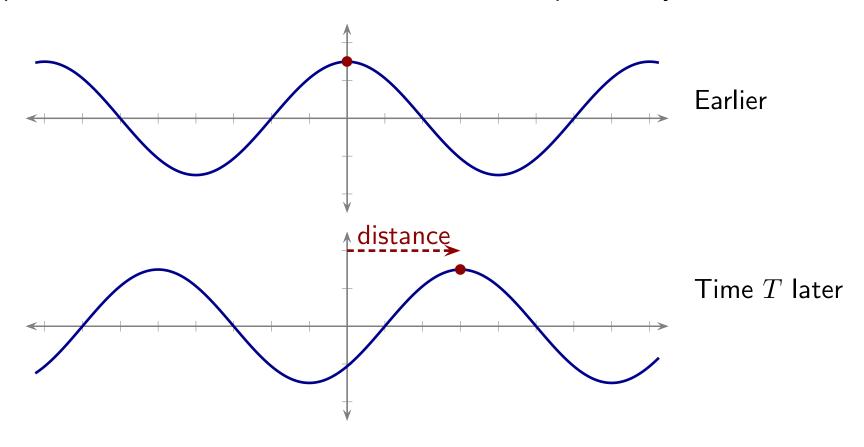
Mode	Oscillate
Damping	0
End	no end
Amplitude	$1.00\mathrm{cm}$
Tension	medium
Frequency	$0.66\mathrm{Hz}$

Which of the following is true regarding the period:

- 1. 0 s
- 2. 1 s
- 3. 1.5 s
- 4.2s
- 5. 7 s

Continuous Waves: Speed

Snapshots of continuous waves and two intervals separated by time T.



$$Speed = \frac{distance}{time T}$$