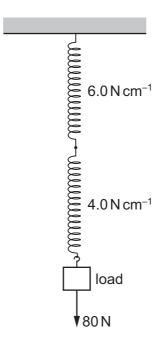
23 A spring has a spring constant of 6.0 N cm<sup>-1</sup>. It is joined to another spring whose spring constant is 4.0 N cm<sup>-1</sup>. A load of 80 N is suspended from this composite spring.



What is the extension of this composite spring?

- **A** 8.0 cm
- **B** 16 cm
- **C** 17 cm
- **D** 33 cm
- 24 The range of frequencies of sound waves emitted by blue whales is 10 Hz to 40 Hz.

The speed of sound in seawater is approximately 1.5 km s<sup>-1</sup>.

What is the approximate range of wavelengths of the sound waves emitted by blue whales?

- **A** 6.7 mm to 27 mm
- **B** 3.8 cm to 15 cm
- **C** 6.7 m to 27 m
- **D** 38 m to 150 m