



### Equations:

**Frequency & Wavelength:**  $v = f \cdot \lambda$

**Frequency & Period:**

$$f = \frac{1}{T} \quad \text{OR} \quad T = \frac{1}{f}$$

**Period of a Pendulum:**  $T_p = 2\pi \cdot \sqrt{\frac{L}{g}}$

$T$  = time period

$L$  = length

$g$  = acceleration of gravity

**Frequency of Beats:**

$$f_{beat} = |f_1 - f_2|$$

### **Speed of Sound:**

$$v = 331 + .6 \cdot T$$

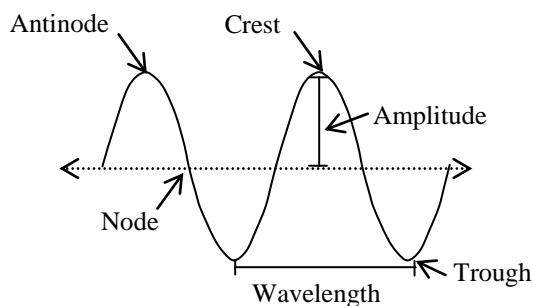
( $T$  = temperature in  $^{\circ}C$ )

OR

$$v = 340 \text{ m/s}$$

(velocity at average temperatures)

### Wave Vocabulary Terms:



<u>Name</u>	<u>Symbol</u>	<u>Unit</u>	<u>Notes</u>
Time Period	$T$	seconds	
Length	$L$	meters	
Wavelength	$\lambda$	meters	
Frequency	$f$	Hertz	