SENSATION & PERCEPTION

PSY 101 General Psychology

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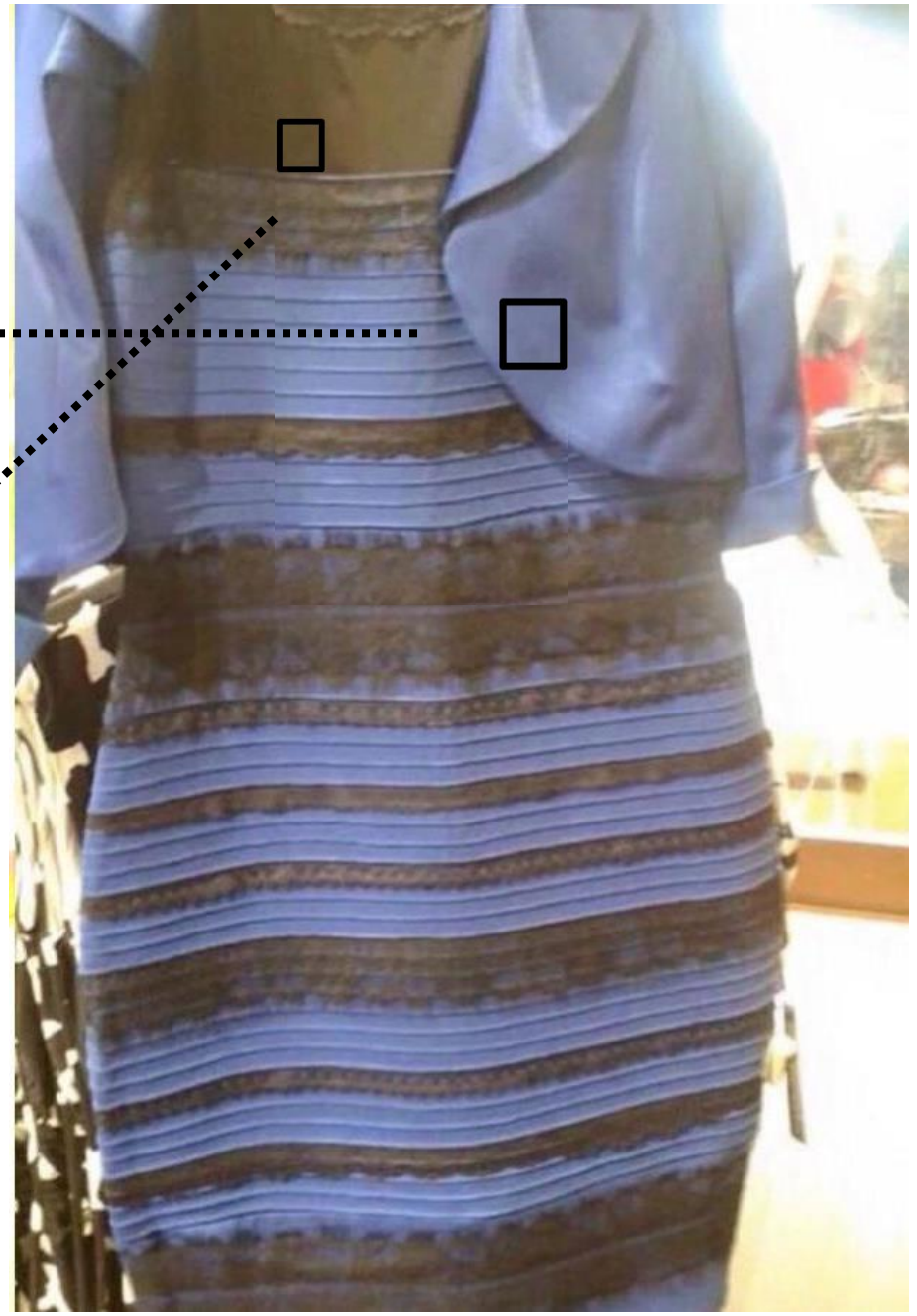
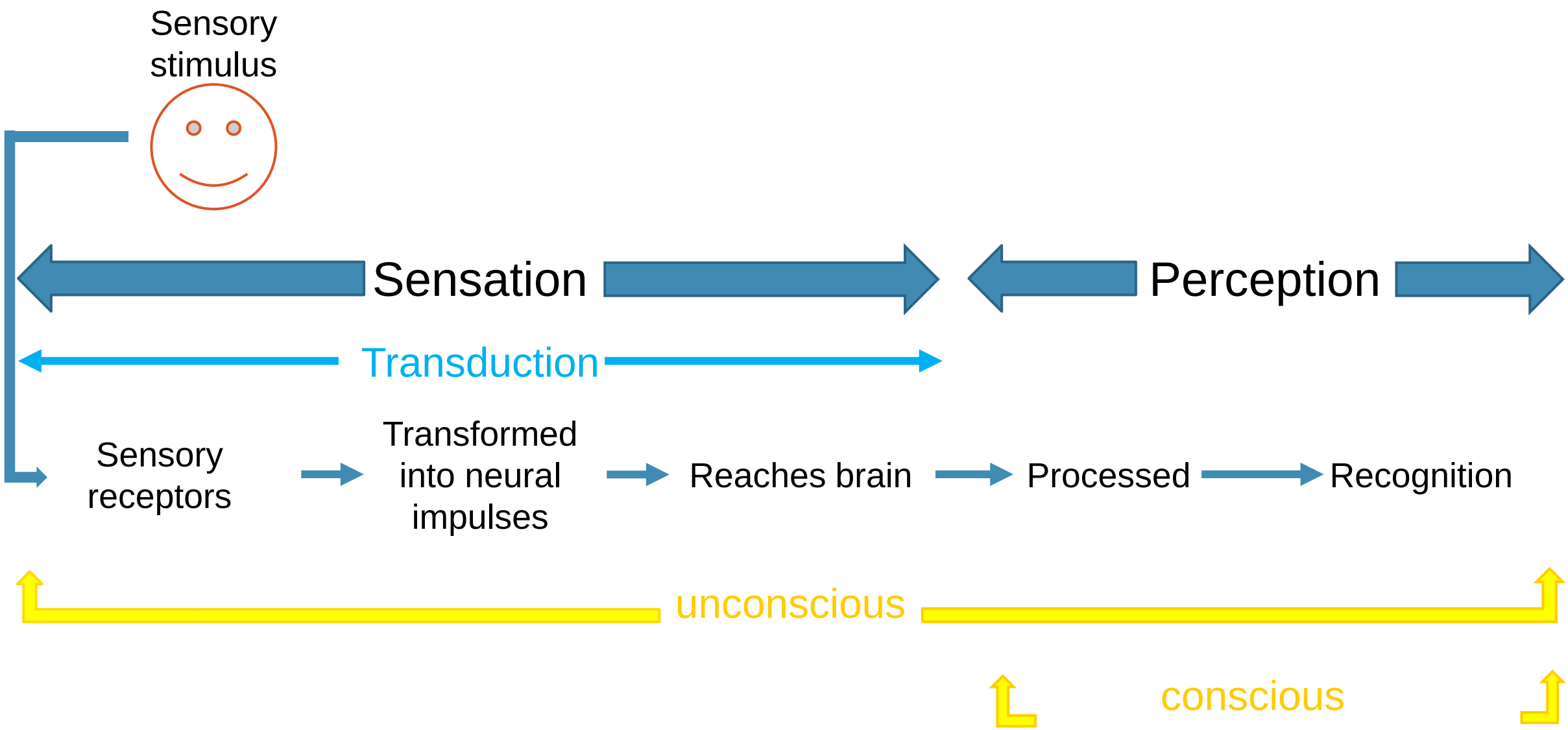


What is sensation?

Sensory input from a stimulus

What is perception?

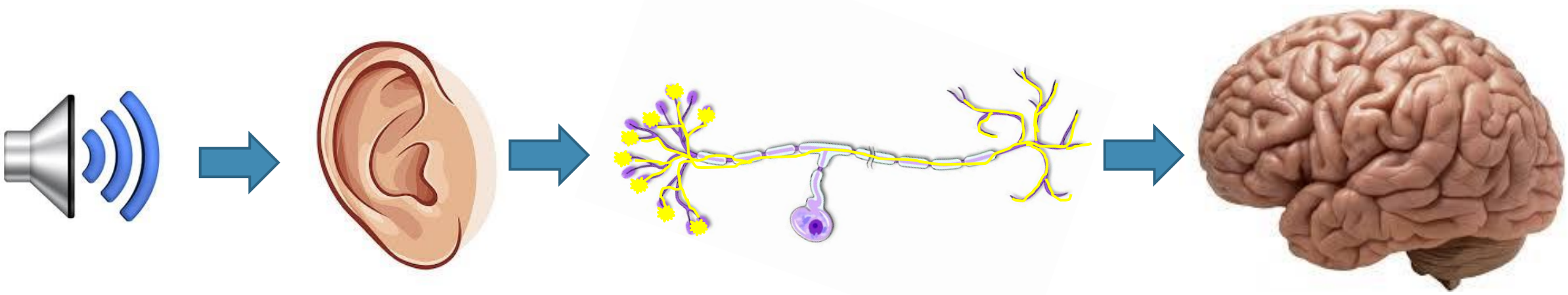
Sensory input organized and interpreted by the brain


Sensory stimulus
Sensation
Perception
Transduction
Sensory receptors
Transformed into neural impulses
Reaches brain
Processed
Recognition
unconscious
conscious

Senses we have (according to sensory experiences):

- Vision
- Hearing
- Touch
- Taste
- Smell
- Kinesthesia
- Vestibular

Auditory sense

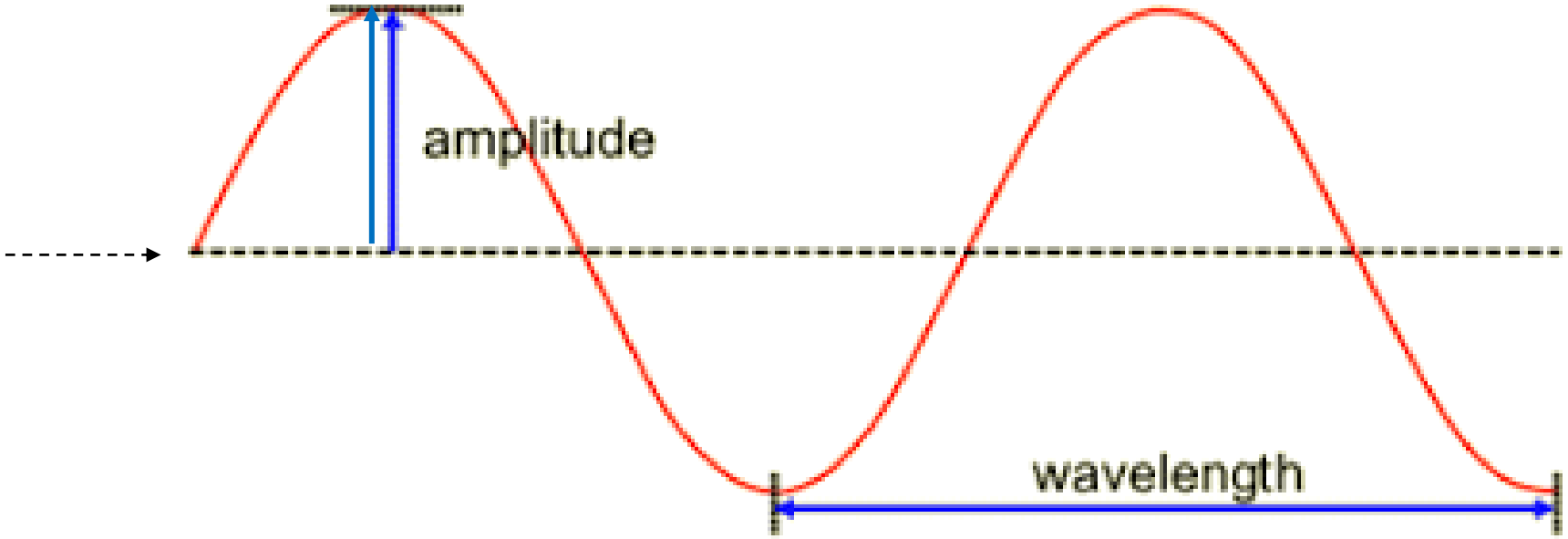


Sound wave

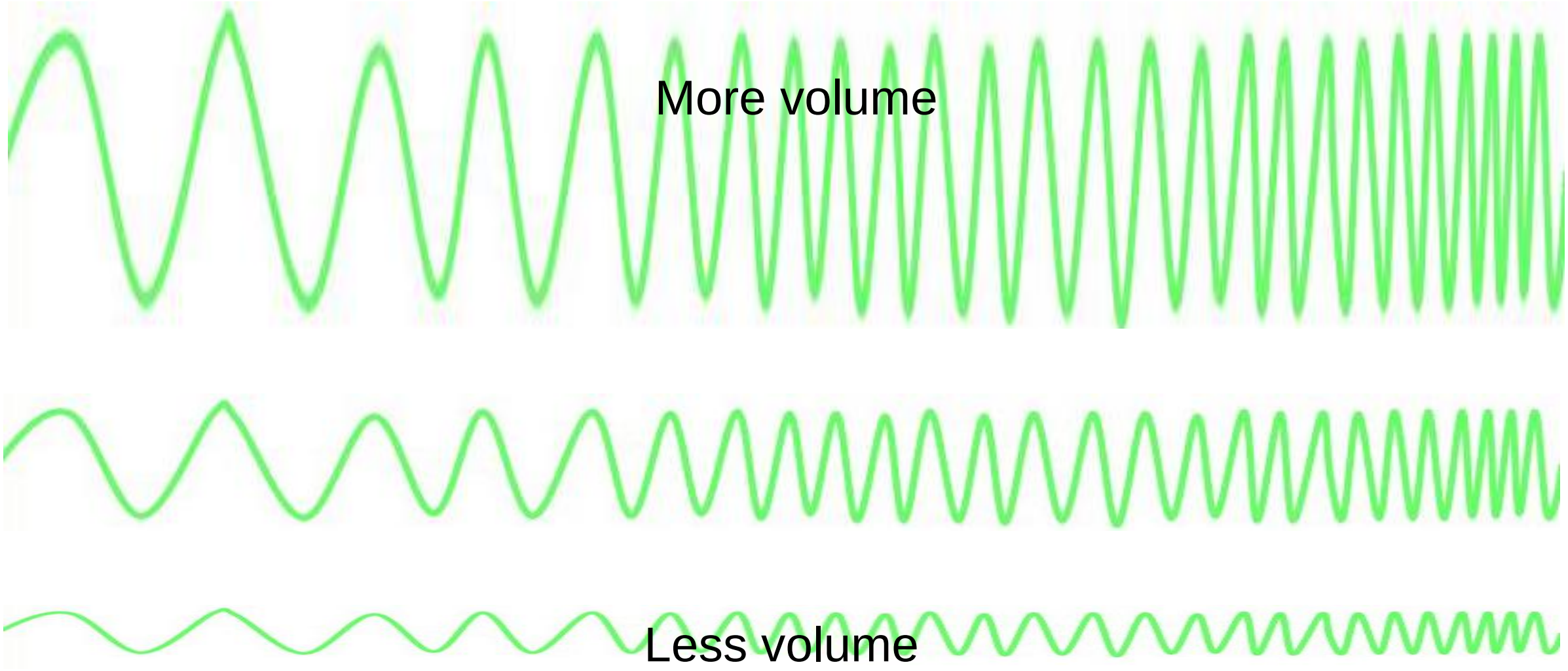
Pattern of disturbance traveling through a medium (e.g., air, water, solid matter, etc).

Described by:

1. Amplitude



Loudness

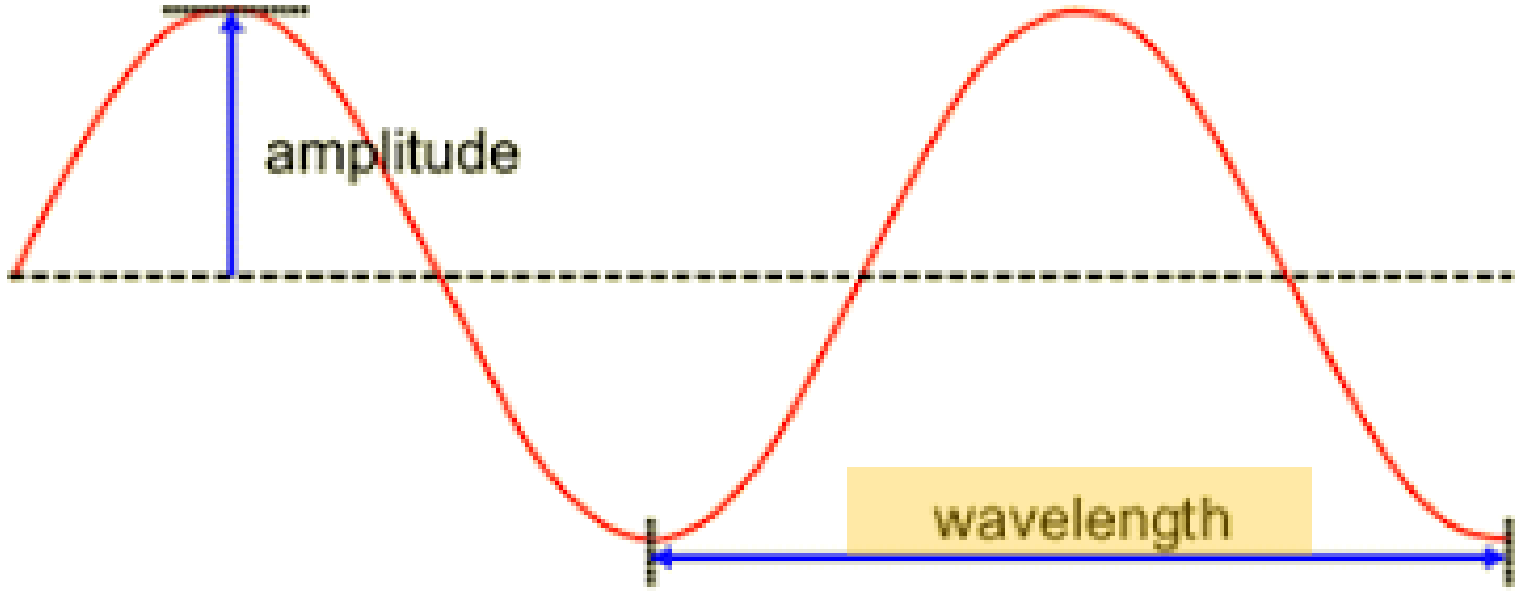


Sound wave

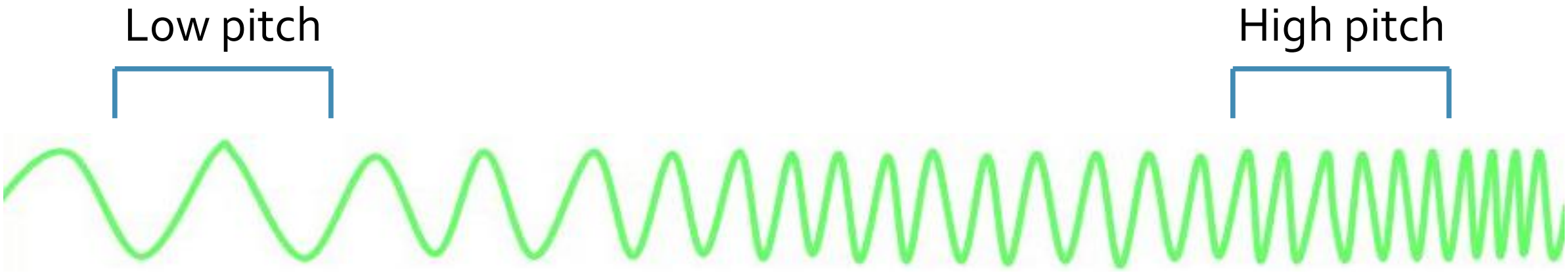
Pattern of disturbance traveling through a medium (e.g., air, water, solid matter, etc).

Described by:

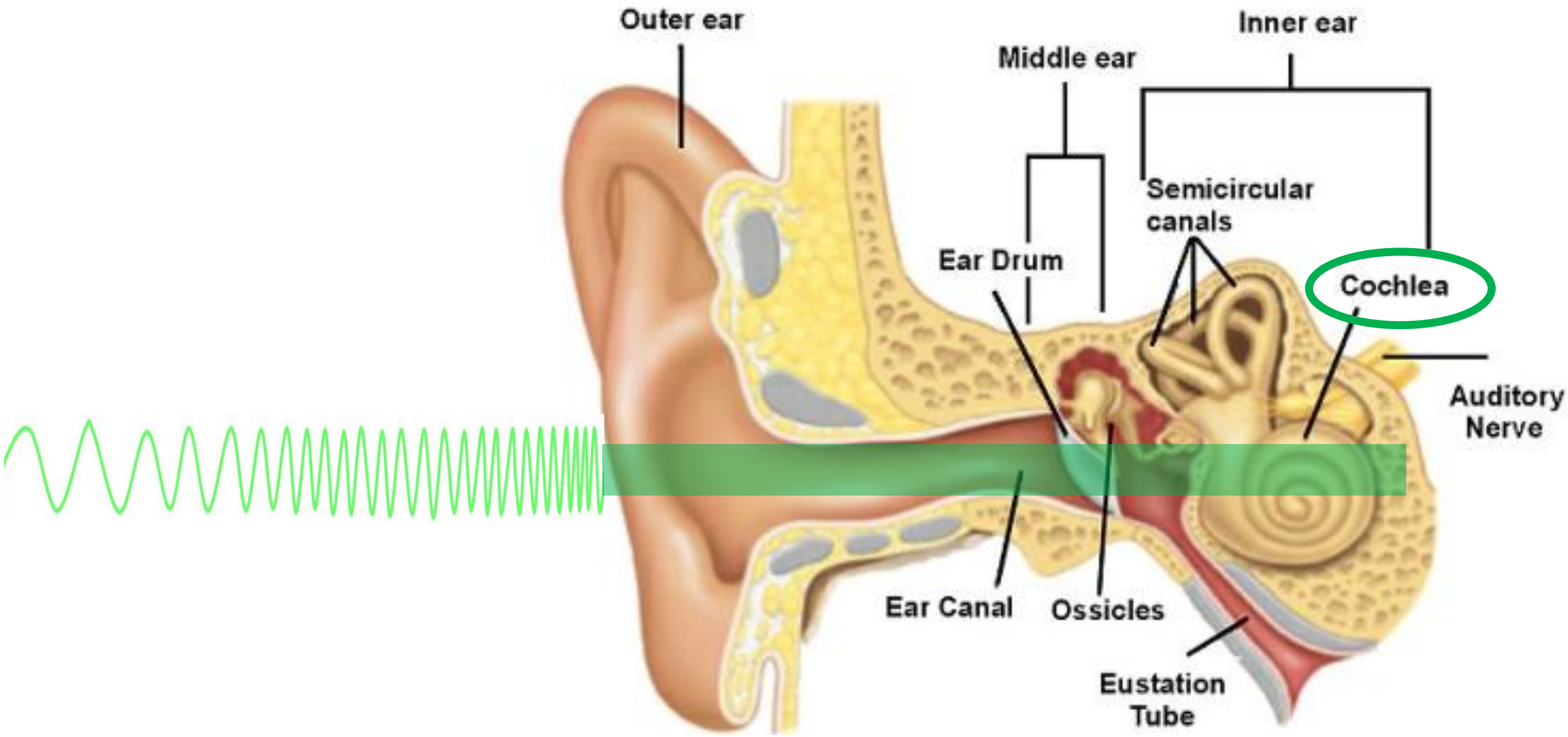
1. Amplitude
2. Frequency



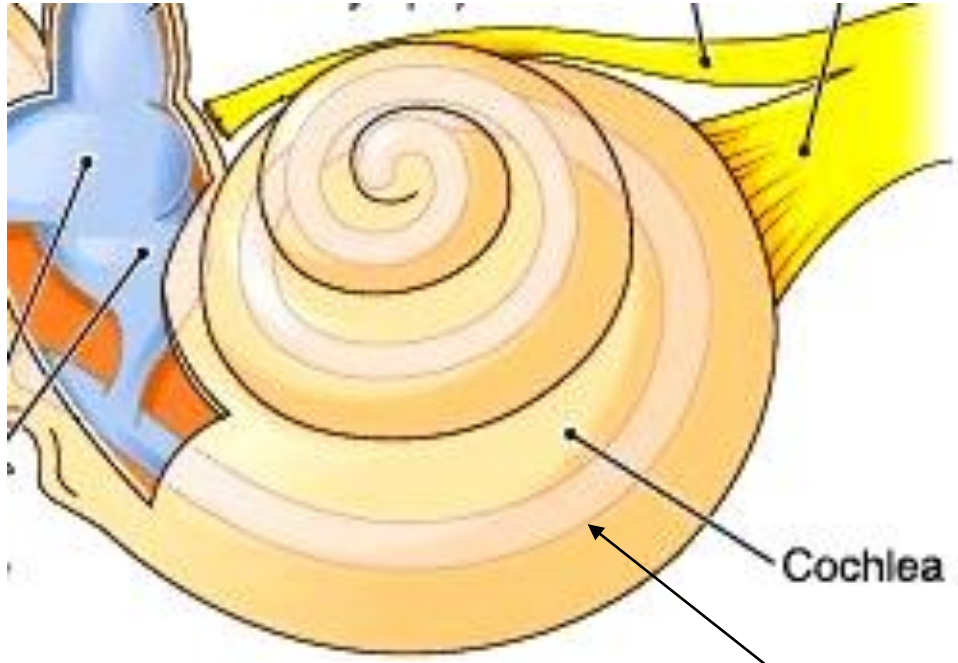
Pitch



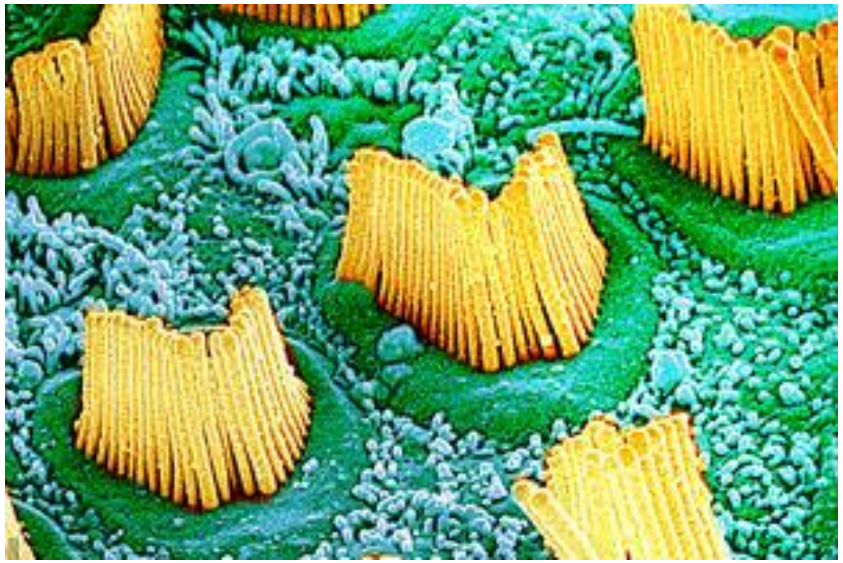
Auditory receptors

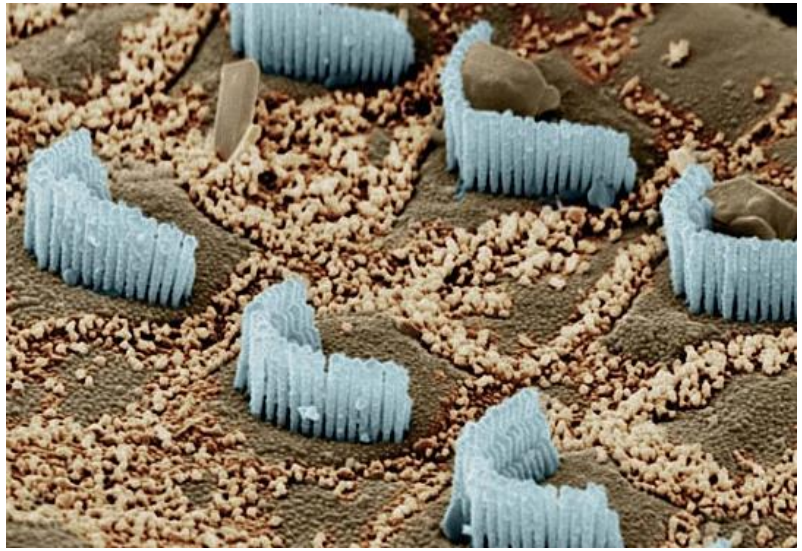


Auditory receptors

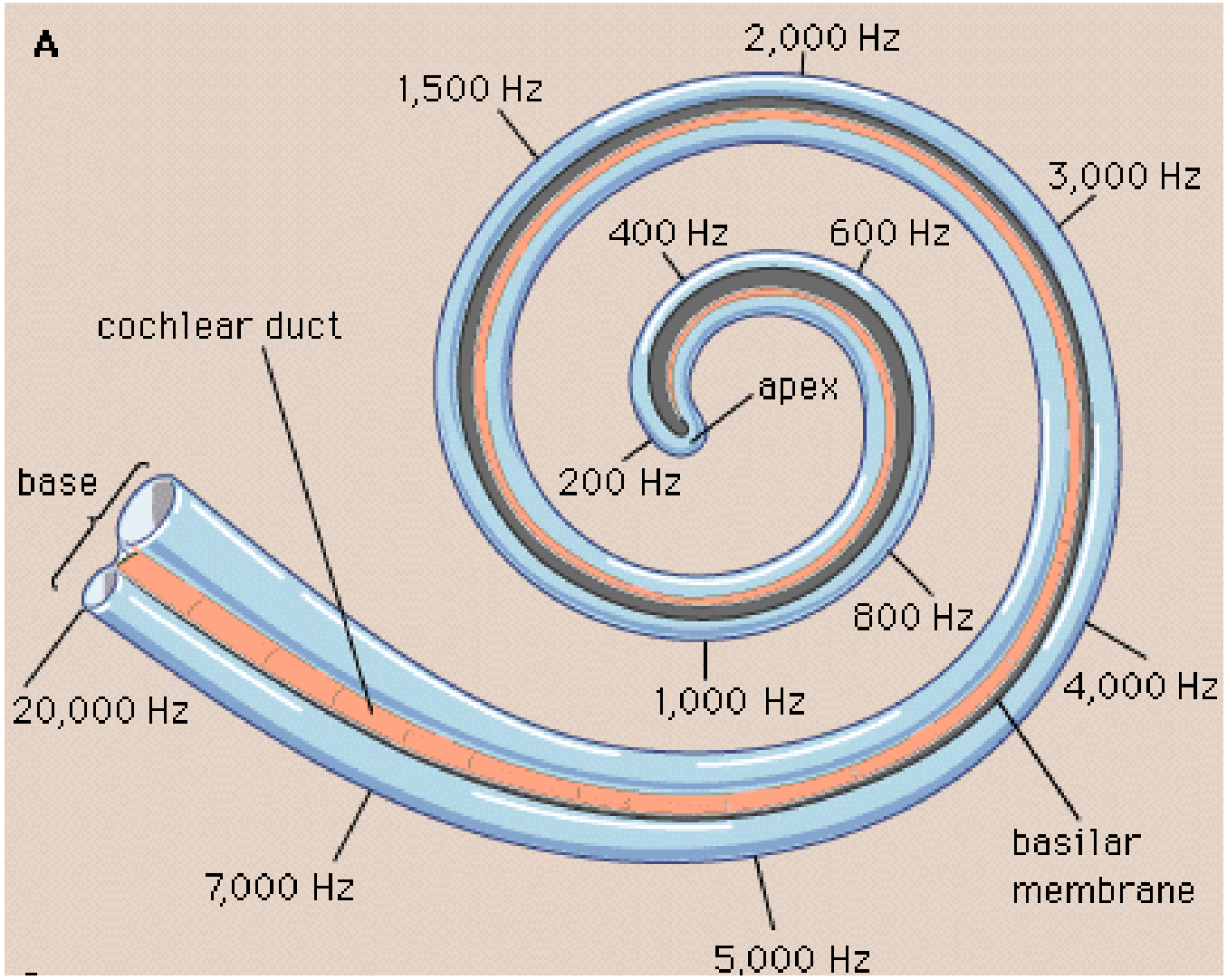


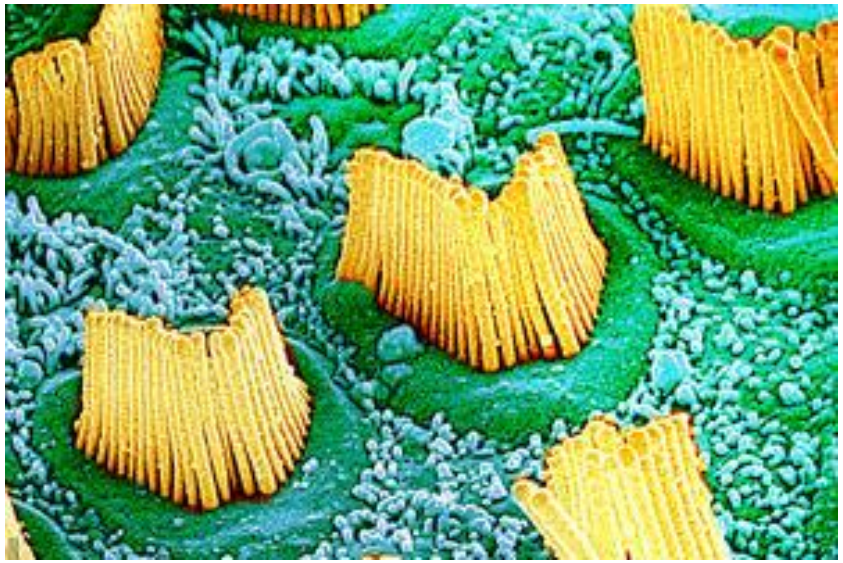
Basilar membrane

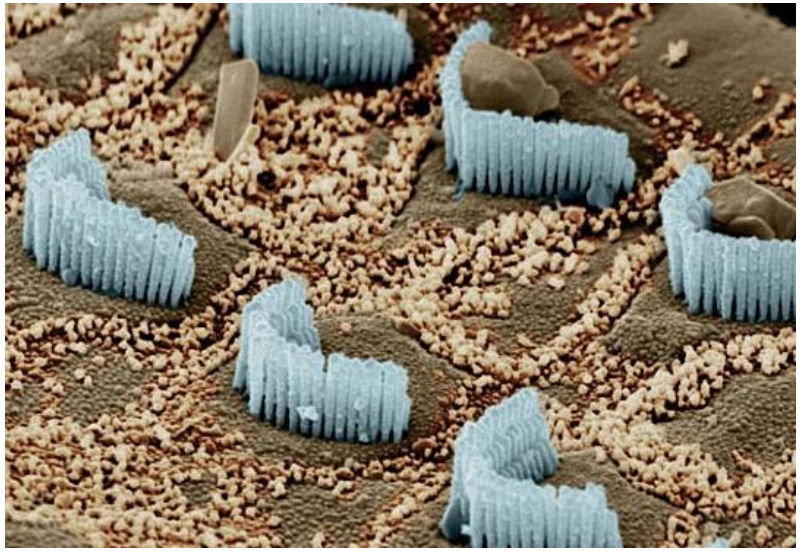




Auditory receptors

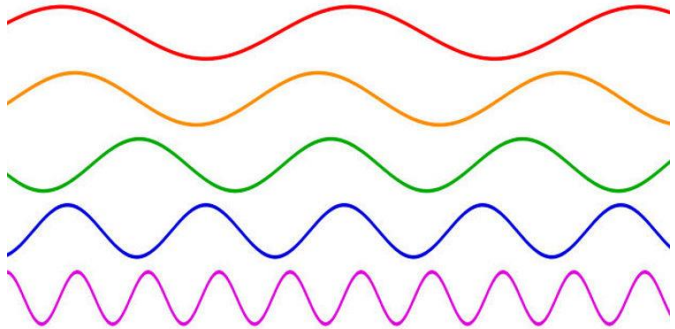


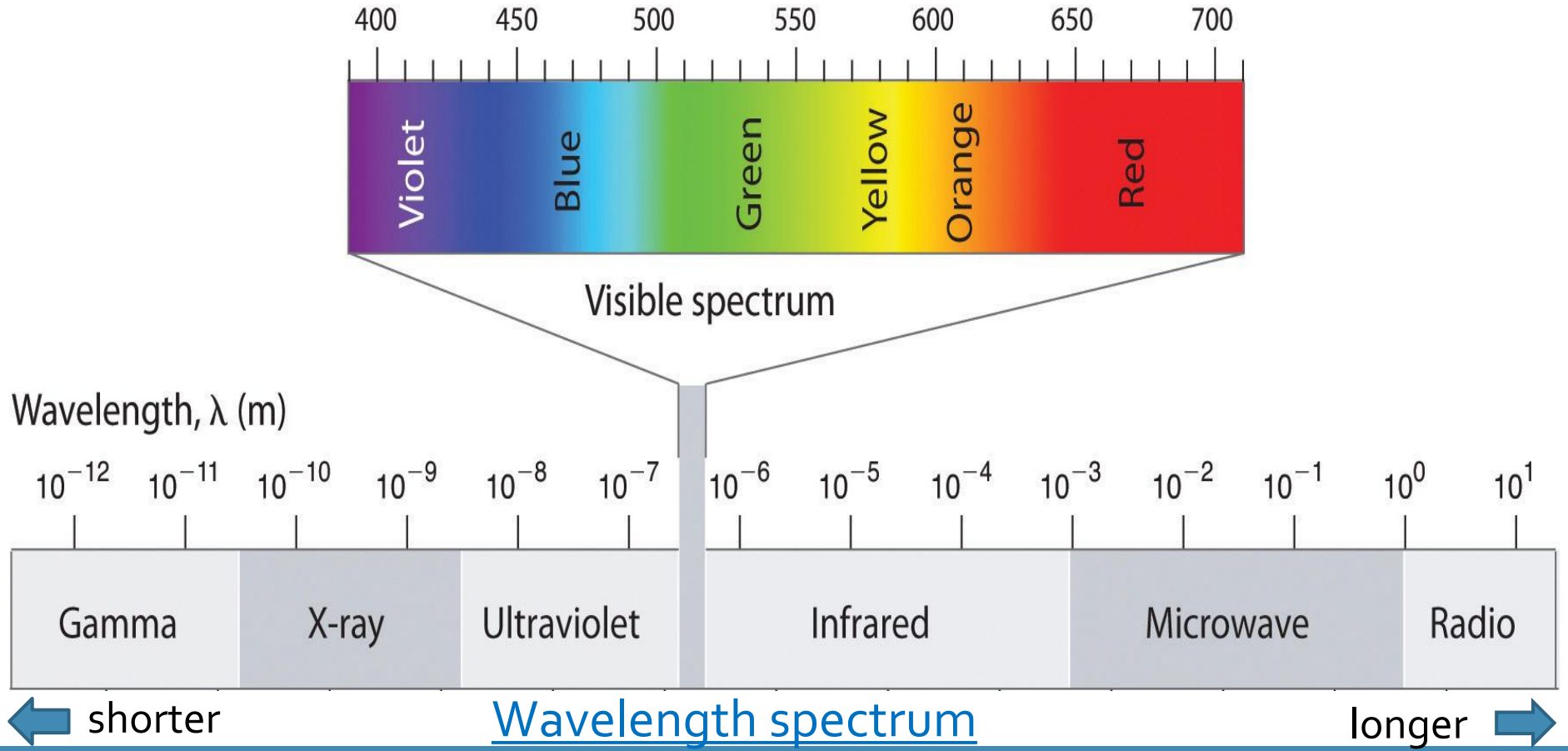




Vision

Electromagnetic radiation





Wavelength spectrum

Vision

Rattlesnake’s infrared vision

Vision

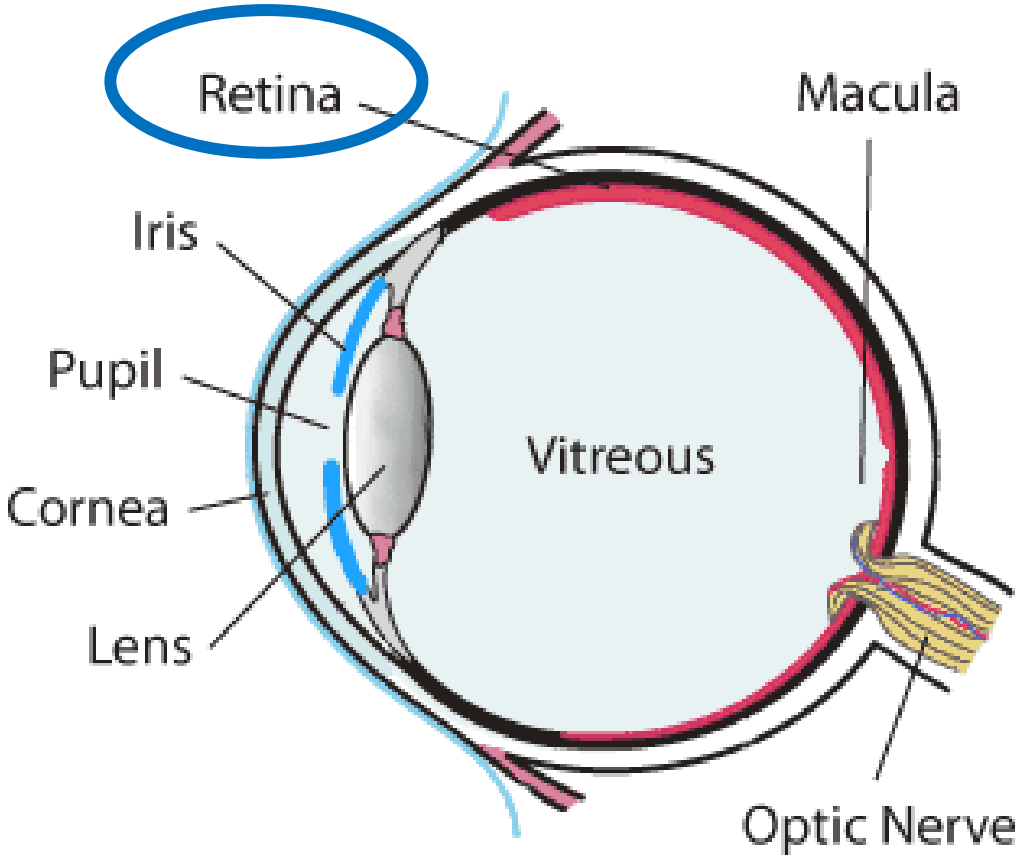
Cones

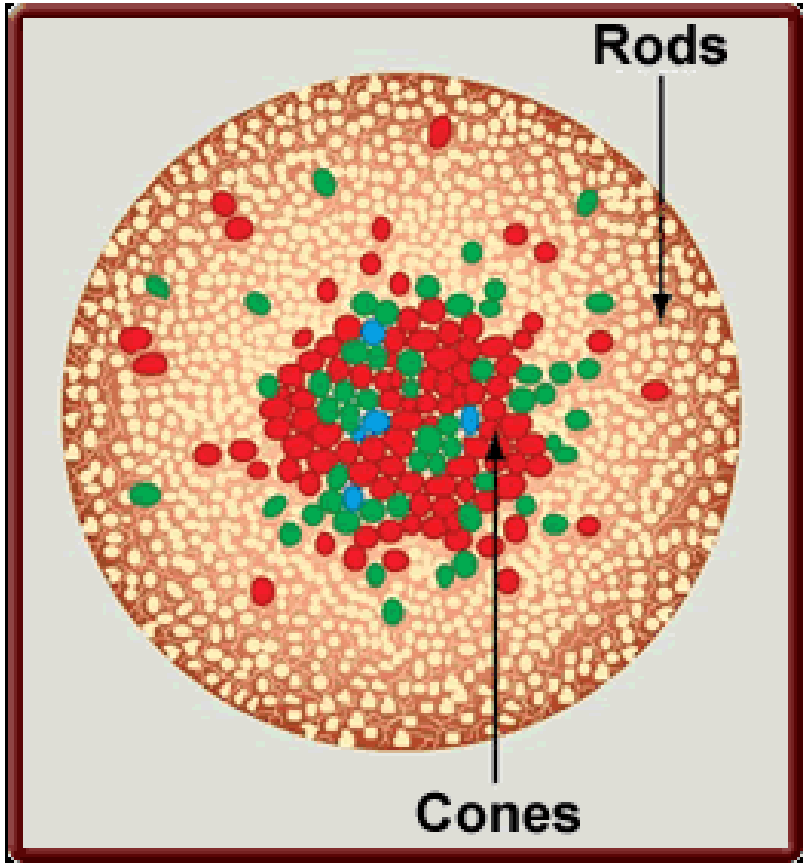
Colors and details

Rods

Greyscale

Brightness scale





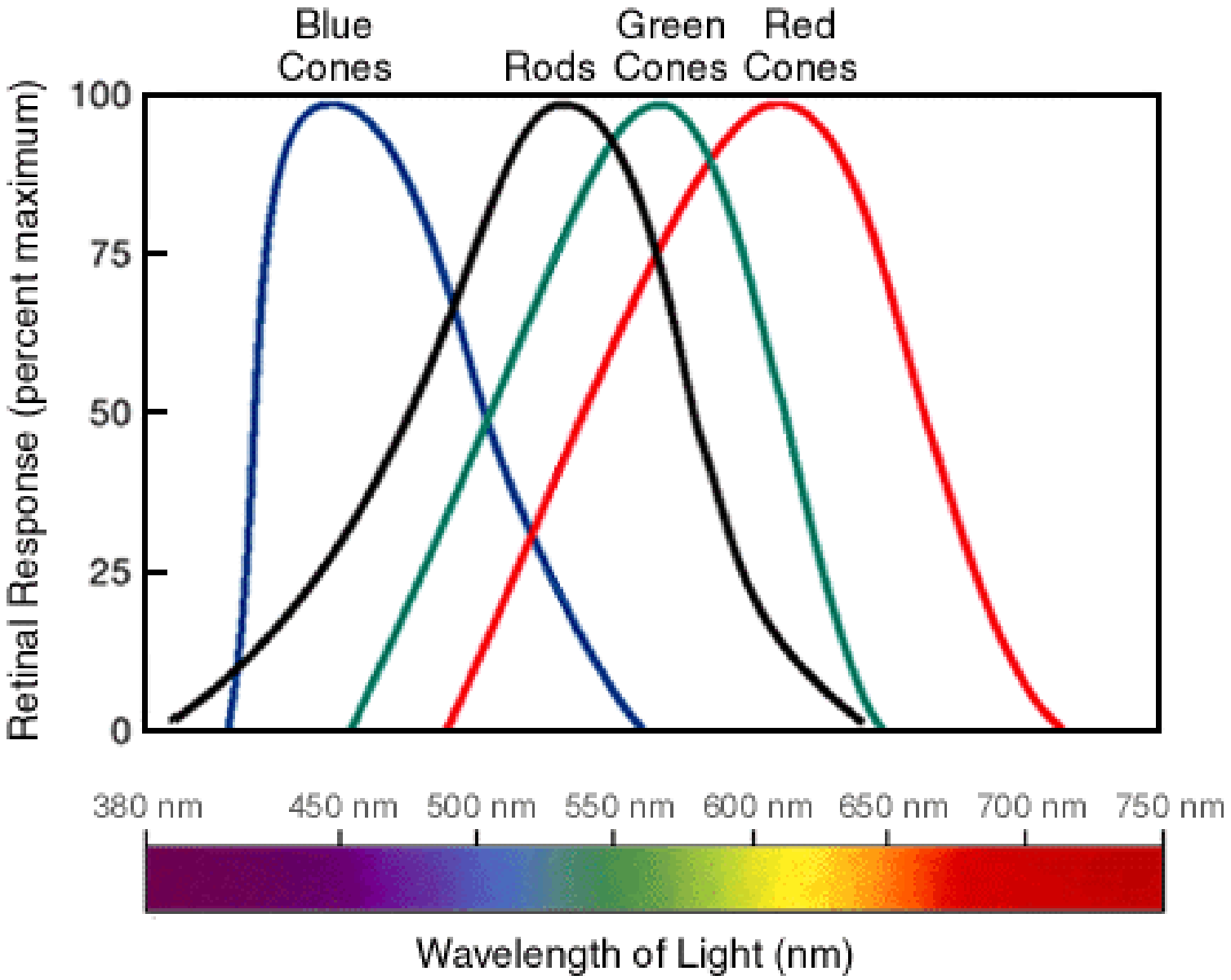
Vision

Young-Helmholtz trichromatic theory

Short WL - blue cones

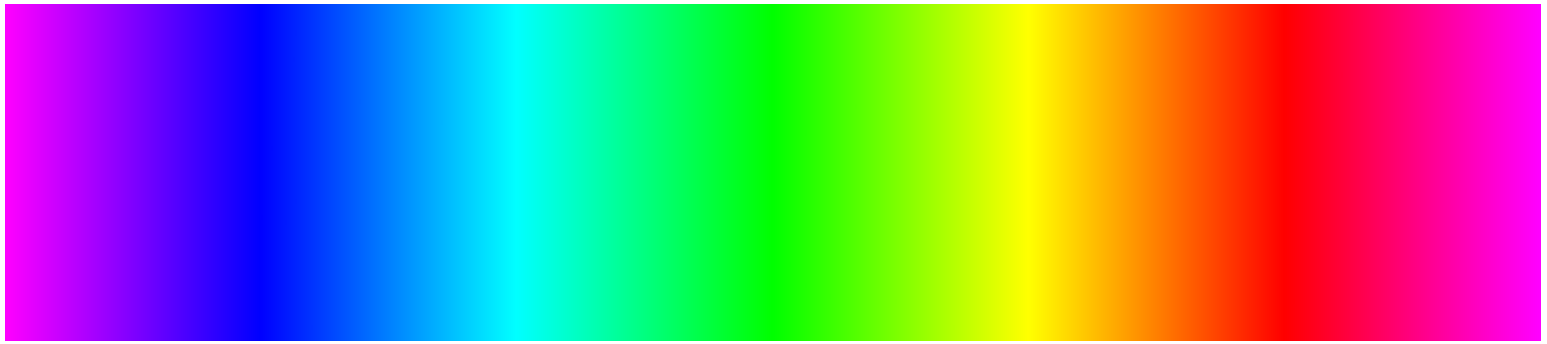
Medium WL - green cones

Long WL - red cones



Vision

Human’s visible color spectrum



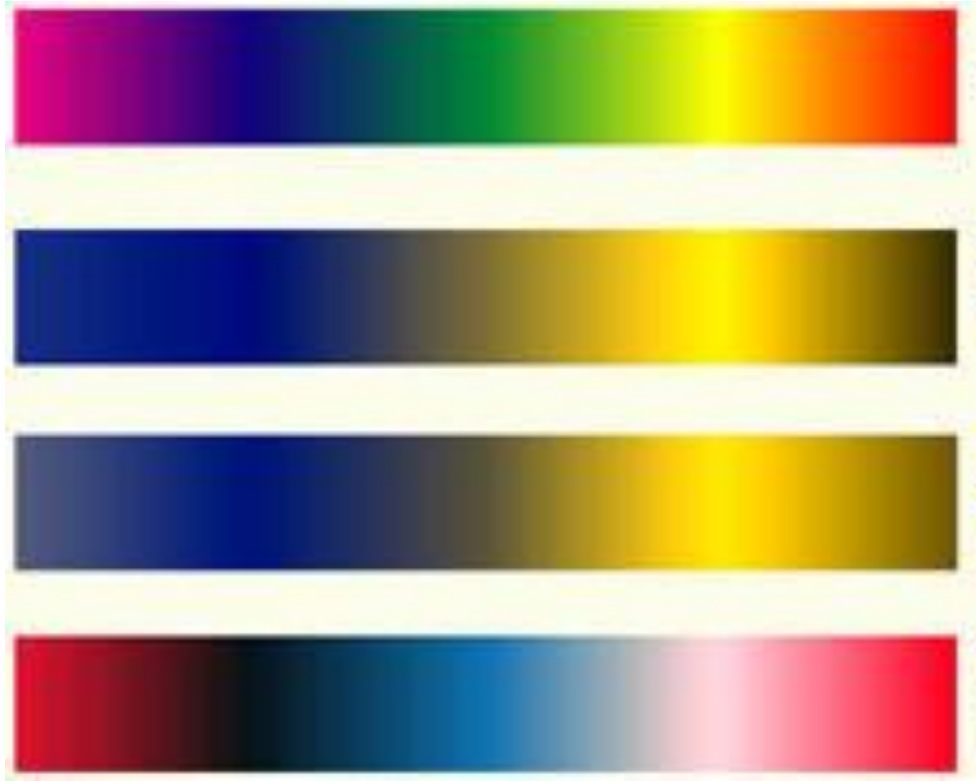
Dog’s visible color spectrum

Vision

Human's view

Dog's view

Vision



Normal vision

Protanope
(defective red cone cells)

Deuteranope
(defective green cone cells)

Tritanope
(defective blue cone cells)