Vocabulary Chapter 17 The Human Animal: Coordination

coordination

The integration of several body systems working together

Example: The human muscle system and skeletal system are in coordination for movement to occur.

cardiac

Of or pertaining to the heart

Example: Cardiac muscle is found only in the heart.

body system

A group of related tissues working together in the body Example: muscle system, lymph system, skeletal system

creatine

An energy storage compound (also known as creatine phosphate) Example: Body builders can buy creatine for use as a supplement.

vertebrate

An animal with a backbone

Examples: birds, lizards, humans

cartilage

A very tough elastic material found in animals

Example: The cartilage in our ribs allows for flexibility and the ability to breathe.

ligament

A tough fiber connecting bones to bones

Example: The ligaments in our legs allow for movement and support.

joint

A space between bones allowing for movement Example: Our leg joints allow us to kneel and sit.

muscle tone

A term given to a group of muscles in good shape

Example: It could easily be seen that the runner had excellent muscle tone.

stimulus

A signal from the external environment received by an organism

Examples: heat, touch, light

axon

That part of an individual nerve cell (neuron) which sends signals away from that cell

Example: The neuron's axons transmitted the signal to the next cell.

dendrite

That part of an individual nerve cell (neuron) which sends signals toward that cell. Example: The neuron's dendrites transmitted the signal from the neighboring cell.

synapse

The space or junction between neurons

Example: There are many synapses throughout the nervous system.

receptor

One of many specialized cells in the body designed to receive external signals or stimuli.

Examples: eyes, skin

endocrine glands

Glands that secrete various chemicals (hormones, etc.) directly into the bloodstream *Examples: pituitary gland, adrenal glands, pineal gland*

hormone

A chemical messenger that has effects on other parts of the body

Examples: testosterone, adrenalin, thyroxin

ductless gland

A type of gland that releases chemicals directly into the bloodstream and body without any tubes (ducts)

Examples: thyroid gland, ovaries, testes

fight or flight

A response by the body to chemicals which are released into the body preparing it for action

Example: I could feel the "fight or flight" response when the three big guys saw me and began running towards me.

tolerance

The body's ability to tolerate increasing doses of a drug so that more and more is needed to produce the same effect

Example: The addict's tolerance had increased to the point where a huge amount was required to produce his "high."

stress

A physiological response of the body in reaction to factors that disrupt the body's normal functioning

Example: The hiker was under great stress when a snowstorm unexpectedly hit.

addiction

The continued use of drugs or alcohol despite the detrimental side effects on health and the body

Example: Addiction to methamphetamines is rampant today.

insomnia

The inability to sleep

Example: My insomnia is hurting my health.

stressors

Factors such as lifestyle, drugs, extreme weather, etc. that contribute to stress.