Science Questions – The Skeleton

Card 1: Skeleton

What are three of the main functions of bones?

Card 2: Skeleton

What group of bones includes tarsals, metatarsals and phalanges?

Card 3: Skeleton

Other than bones, what are two other tissues of the skeletal system?

Card 4: Skeleton

What are the scientific names for the bones in a human skull?

Card 5: Skeleton

What is *cartilage*?

Card 6: Skeleton

What is the function of skeletal muscles?

Card 7: Skeleton

What is the name given to a place where two types of bone meet?

Card 8: Skeleton

What is the main element needed for healthy bones?

Card 9: Skeleton

What is the scientific name for the shin bone?

Card 10: Skeleton

Name two places in the human body with cartilage.

Card 11: Skeleton

What is the function of the cartilage between our vertebrae?

Card 12: Skeleton

Which bone is the largest in the human body?

Card 13: Skeleton

Where is the smallest bone in the human body?

Card 14: Skeleton

The forearm consists of what two bones?

Card 15: Skeleton

What are the three main types of joints?

Card 16: Skeleton

What is a *tendon*?

Card 17: Skeleton

What is the scientific name for the knee cap?

Card 18: Skeleton

What part of the bone creates blood cells?

Card 19: Skeleton

Explain the similarities and differences between ligaments and tendons.

Card 20: Skeleton

Where are fixed joints located in the human body?

Card 21: Skeleton

Give two examples of a ball-and-socket joint.

Card 22: Skeleton

The lower leg consists of what two bones?

Card 23: Skeleton

What are the three main types of bones in the human hand?

Card 24: Skeleton

What are the main functions of the vertebrae?

Card 25: Skeleton

What is the scientific name for the shoulder blade?

Card 26: Skeleton

What is the main advantage and disadvantage of a ball-and-socket joint?

Card 27: Skeleton

Explain how muscles work.

Card 28: Skeleton

In what part of the femur would you expect to find spongy bone? Why?

Card 29: Skeleton

How many bones are in an adult human body?

Card 30: Skeleton

When a baby is born, its head often looks more cone-shaped than round. Why is this?

Answers – The Skeleton

Card 1:	To protect and support the body's organs, to enable movement, to make blood cells, to store minerals and fat, to detoxify the body, to balance acids and bases in the blood
Card 2:	The foot
Card 3:	Muscles, tendons, ligaments, cartilage
Card 4:	The neurocranium (or brain case), the vicerocranium (or facial skeleton) and the mandible (or jawbone)
Card 5:	A type of connective tissue that provides structure and support to the other tissues
Card 6:	To produce movement, provide stabilisation and generate heat (regulation of body temperature)
Card 7:	A joint
Card 8:	Calcium
Card 9:	The tibia
Card 10:	Nose, ears, ribs (anywhere two bones meet that isn't a fixed joint)
Card 11:	To cushion the vertebrae to prevent them from rubbing together and wearing down
Card 12:	The femur
Card 13:	The stirrup (or stapes) in the inner ear
Card 14:	The radius and the ulna
Card 15:	Fixed, hinge and ball-and-socket
Card 16:	A strong band of fibrous tissue that attaches muscle to bone
Card 17:	The patella
Card 18:	The marrow
Card 19:	Both are strong bands of fibrous tissue; however, a ligament connects two bones, and a tendon connects a bone to a muscle.
Card 20:	In the skull
Card 21:	The shoulder and hip joints, the joint between the phalanges and metatarsals/metacarpals
Card 22:	The tibia and the fibula
Card 23:	The carpals, metacarpals and phalanges
Card 24:	To protect the spinal cord, anchor the ribs, stiffen the body (help us to stay upright) and transmit body weight in walking and standing
Card 25:	The scapula
Card 26:	Advantage – a fuller range of movement than a hinge joint; disadvantage – much easier to dislocate
Card 27:	Long fibres of muscle cells are attached to the bone by tendons. One muscle set contracts, pulling the bone in one direction, while another set of muscles relaxes, controlling the speed.
Card 28:	The centre and the ends; to allow the blood to pass through into the bones and pick up new blood cells
Card 29:	206
Card 30:	A newborn baby's head is more cone-shaped because the pieces of bone that make up the skull are soft and unfused. This enables the baby to be squeezed out through the mother's cervix. Later, the bones will harden and fuse together.