

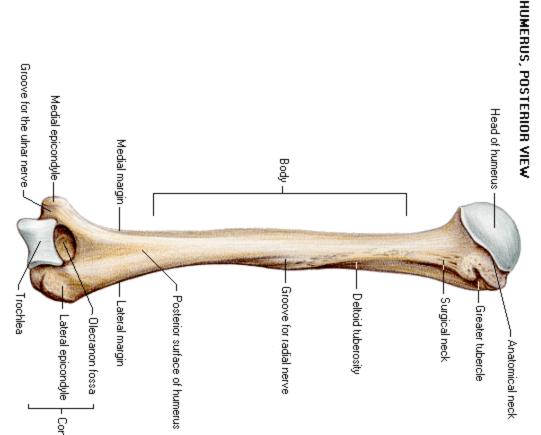


"Surgery went well, Mr. Moore. I had a lot of fun rebuilding your knee joint."

Bones and Joints

Bone Structure

- Bones have several parts
- Bones have bumps and pits so muscles can attach to them

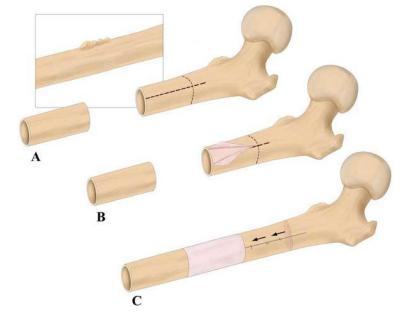


Bone covering

 The surface of bones are covered in a tough membrane called periosteal

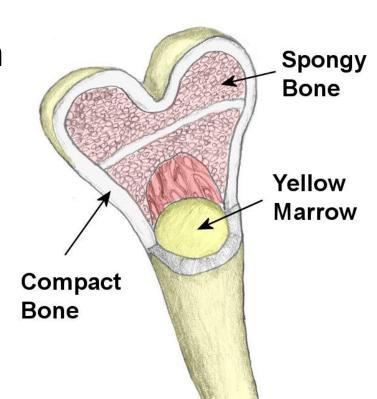
Small blood vessels in the periosteal carry

nutrients into the bone



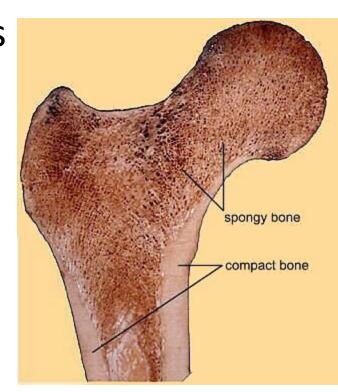
Compact bone

- Hard strong layer of bone underneath the periosteal
- Gives bones strength
- Contains deposits of calcium



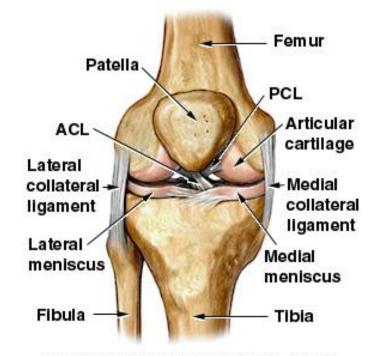
Spongy Bone

- Has many small, open spaces to help make bones lightweight.
- In the center of spongy bone is a cavity called marrow
- Marrow produces red blood cells



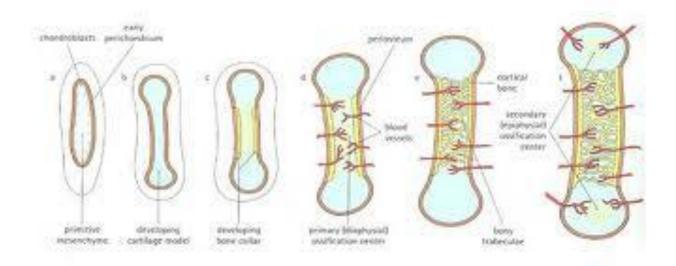
Cartilage

- Smooth slippery, thick layer covering the end of bones
- It is flexible and acts as a shock absorber
- Reduces friction



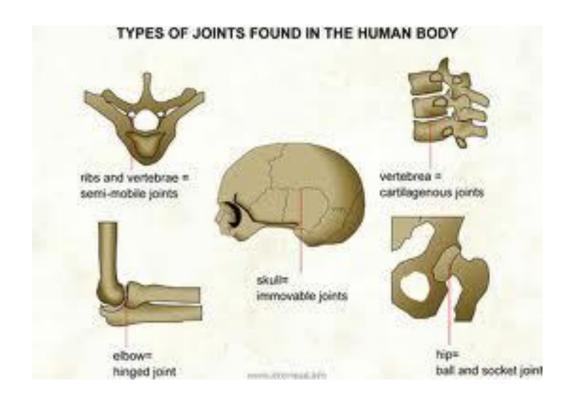
Bone Formation

- Before birth our skeletons are made of cartilage
- Bone forming cells deposit calcium and phosphorous to create bones



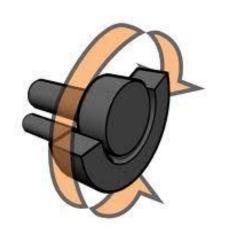
Joints

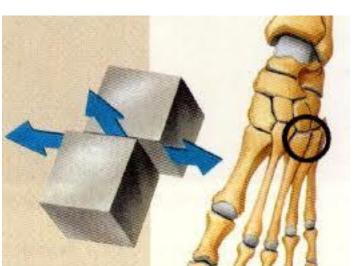
- A place where two or more bones meet
- Held together by ligaments

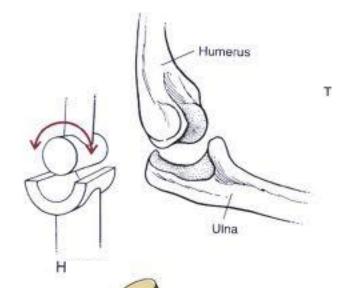


Different types of joints

- Pivot top of neck
- Hinge knees and elbows
- Ball and socket shoulder
- Gliding vertebrae









Juvenile Idiopathic Arthritis

- No known cause
- Joints swell up, hurt, and get stiff
- Affects kids

