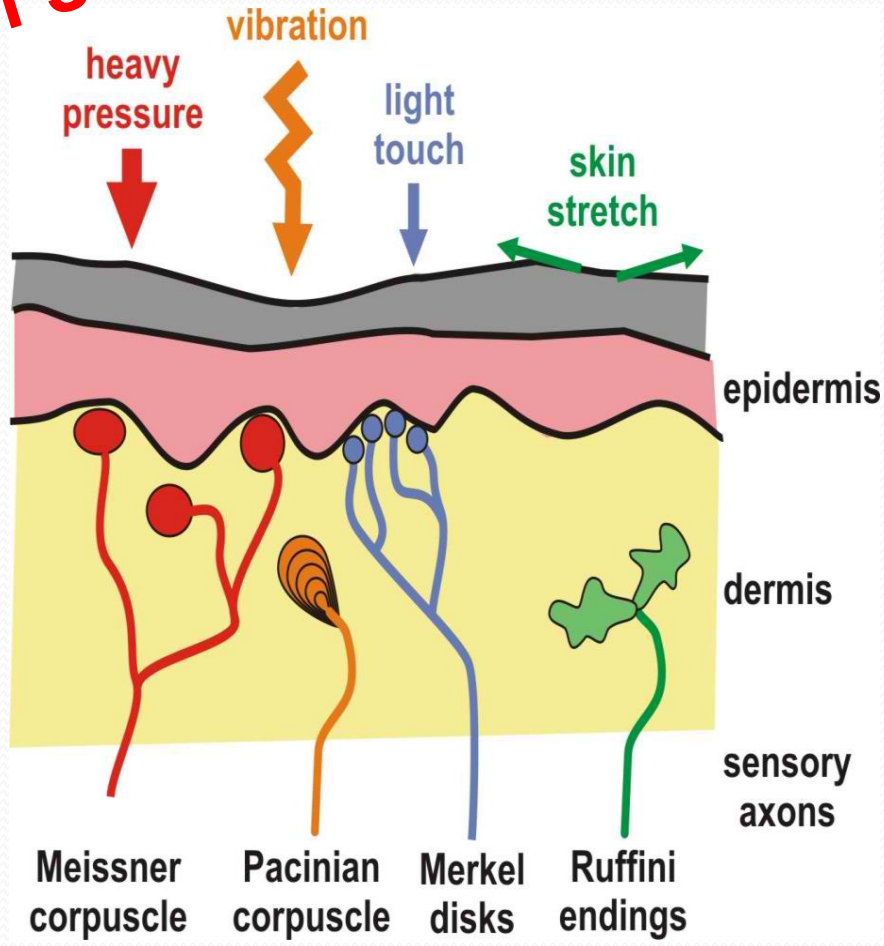
Mechanoreceptors

- Pacinian corpuscle
  - deep, pressure sensitive, fast adapting, large receptive field
- Meissner's corpuscle
  - superficial, sensitive to touch, small receptive field



Classification of receptors

- Mechanoreceptors
  - Cutaneous (touch, pressure, vibration) e.g.. Pacinian, Meissner's corpuscle, free nerve endings
  - Proprioceptors (joint position receptors) e.g.. Muscle stretch receptors, tendon organs
  - Baroreceptors
  - Auditory/vestibular hair cells
- Chemoreceptors
  - Taste buds and smell receptors
  - Visceral chemoreceptors sensitive to Pco2, pH, osmolality etc.
- Thermoreceptors
  - Cold and hot receptors
- Nociceptors (pain receptors)
- Other receptors: Visual (rods and cones): electromagnetic

Taste Buds/ Gustatory buds

– Sensory structures that detect taste stimuli

Each taste cells contain hairlike processes called taste hairs that extend into tiny opening called taste pore.

Balance/Equilibrium

Equilibrium and Balance

- **Equilibrium** sense "responds" to various movements of head
- Equilibrium receptors of inner ear (often called **vestibular apparatus**) can be divided into two functional parts
- One is responsible for monitoring static equilibrium (report on position of head with respect to gravity when body is not moving)
- The other monitors dynamic equilibrium (respond to angular or rotatory movements of head rather than to straight-line movements)