HEAD OF INSECTS -- AK (SSCASC)

Head of insect is hard, highly sclerotized capsule bearing a feeding Appendages , sensory organs and main centre for neuroendocrine co-ordination .

The surface of the head has several sclerites separated by grooves (sutures).

Sclerites of Head

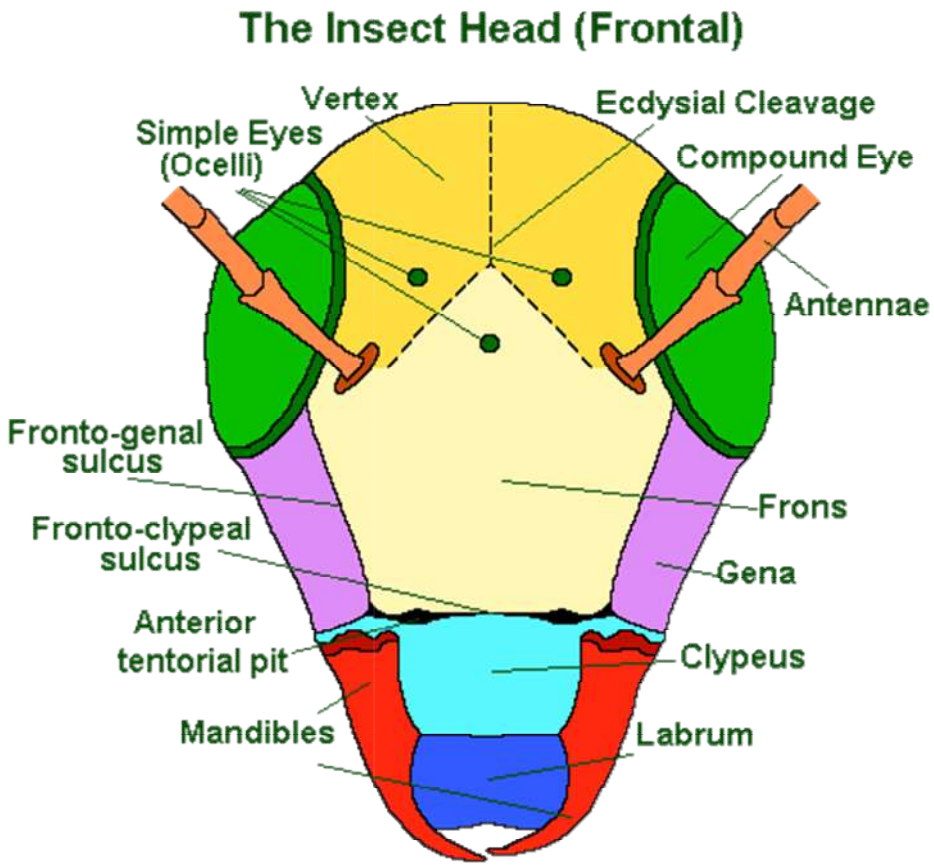
1.Vertex : summit of the head between compound eye .

2. Frons: facial area below the vertex and above clypeus.

3.Clypeus: cranial area below the frons to which labrum is attached .

4.Gena : lateral cranial area behind the compound eyes .

5.Occipital: upper cranial area .



SUTURES OF HEAD

1.Epicranial suture:(Ecdysial line) inverted 'Y' shaped suture found medially on the top of head.

2.Epistomal suture:(Fronto clypeus suture) found between frons and cylpeus.

3.Cylpeus labral suture: Found between clypeus and labrum.

4.Post occipital suture: Groove bordering occipital foramen.

TYPES OF HEAD

1.HYPOGNATHOUS : The long axis of the head is vertical. It is in line with long axis of the body. Mouth parts--- ventrally placed and projected downwards.

2.PROGNATHOUS: Long axis and horizontal. Mouth parts --- Directed foreward.

3.OPISTHOGNATHOUS: Head is deflexed. Mouth parts---directed backward and held in between the fore legs.

PARTS OF HEAD :

Compound eyes , typically three ocelli and a pair of antennae and Mouth parts (trophi)

2. Antenna use for sense of smell.

FUNCTIONS OF HEAD :Food ingestion,Sensory perception.,Co-ordination of bodily activities

Protection of the coordination centers.

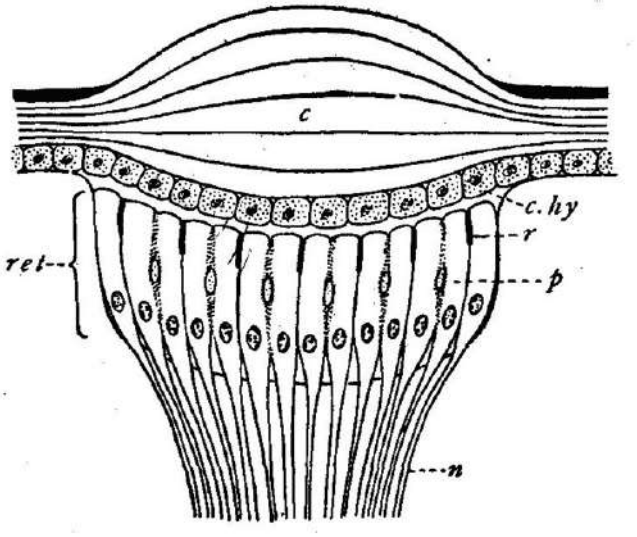


Fig. 154.—A diagram illustrating the structure of a primary ocellus; *c*, cornea; *c. hy*, corneal hypodermis; *ret*, retina; *n*, ocellar nerve; *p*, accessory pigment cell; *r*, rhabdom.