## HAUSTELLATE ORDERS.

MANDIBULATE ORDERS.

6. Diptera.
7. Lepidoptera

8. Homoptera.

- 10. Hymenoptera.
- 11. Neuroptera.
- 12. Orthoptera.

9. Hemiptera.

13. Coleoptera.

With regard to the characters of these Orders :

Order 1.—The Aphaniptera (Flea, Chigoe) are apterous and parasitic, but differ from the Order of Parasites by undergoing a metamorphosis. They connect the Suctorious Parasites with the Diptera.

Order 2.—The Homaloptera (Forest-fly, &c.) called also Pupipara, because their eggs are hatched in the matrix of the mother, where they pass their larve state, and are not excluded till they have become pupes. Most of them have two wings, but one genus is apterous:\* these seem intermediate between certain Acaridans, as the bat-mite and the Diptera; they seem also, in some respects, to connect with the Arachnidans, whence they have been called spider-flies.

Order 3.—The Trichcptera (Caseworm-flies) have four hairy membranous wings, in their nervures resembling those of Lepidoptera, the under ones folding longitudinally. The mouth has four palpi, but the masticating organs are merely rudimental. Their place seems to be somewhere between the saw-flies and those moths whose caterpillars clothe themselves with different substances.

Order 4.—The Dermaptera (Earwigs) have two elytra and two wings of membrane, folded longitudinally, and their tail is armed with a forceps. They appear to be between the Coleoptera and Orthoptera.

Order 5.—The Strepsiptera (Wild bee-fly, Wasp-fly), parasitic animals, that have two ample wings, forming the quadrant of a circle, and of a substance between coriaceous and membranous, and two elytriform subspiral organs,

\* Melophagus. The Sheep-louse.