

first nearly white, but they become greenish and brown. When full grown, they adhere by a glutinous secretion to the leaf, the body hardens and contracts, forming a half cylindrical puparium, from which, after a time, the adult emerges.

We have ourselves seen an outbreak of the plum aphid overcome by the larvæ of *Syrphus ribesii*, Fab. In cases where the aphid causes the leaf to curl, it is almost impossible to reach them with insecticides, and these parasites are then of the greatest value, and we cannot estimate the vast importance of their services, because we do not observe them at their work. In fact, they are supposed by some people to be the cause of this curling of the leaves, as it sometimes occurs that the larvæ will be the only living things found on these leaves, they having made a clean sweep of the true depredators.

The Tachina flies and closely allied species are shaped and coloured much like our common house fly, but are usually larger and heavier bodied. They attack other insects in a different manner from the *Syrphus* flies, the female placing her eggs on the surface of the skin of caterpillars and many other larvæ which feed in exposed positions. The eggs are somewhat elliptical in outline, flattened, and of a whitish colour, adhering tenaciously when once stuck upon the victim, and as the parent fly takes especial pains to place them on parts of the body of the larva where it cannot reach them, the eggs are probably seldom displaced. From these eggs young maggots soon hatch, eating their way downward through the shell of the egg and through the skin of their host into the fatty parts of the body, upon which they subsist, after the manner of the young hymenopterous larvæ. The empty shells cover the wounds caused by the maggots eating through the skin, thus saving the life of the victim for a still worse fate. Usually, only a limited number of these eggs are placed upon each larva, the number varying from about four to eight or ten. A case, however, came under our observation where the astonishing number of 228 eggs had been placed upon a single caterpillar of the handmaid moth, *Datana angustii*, Drury. The caterpillars of this species are some years very abundant, and defoliate our shade trees, especially the walnut. They are often attacked by myriads of a species of Tachina, and pursued on the ground and among the grass and weeds in the vicinity, often four or five flies being engaged in chasing a single caterpillar. These last are frequently a sight to behold, and from five caterpillars we have reared over fifty adults.—*Insect Parasites*, F. M. Webster.

The following are some of the beneficial insects found in the Province:—

APHELINUS: FUSCIPENNIS (How.).

Is a common enemy of armoured scales. The general characteristics of *fuscipennis* are well shown in the accompanying figure of a closely allied species. (Fig. 1.) This parasite has been raised in large numbers in California. Mr. Alex. Craw reports it as doing very effective work in the neighbourhood of Los Angeles.