

Bee paralysis is not a common disease in cool climates, but there are a few reports of its occurrence in the Province. The sick bees look black and greasy, and have a very swollen abdomen. They generally stagger around as if paralysed. The disease is supposed to be constitutional, so the usual remedy is to destroy the old queen and introduce another from a healthy stock.

Spring dwindling is a term that may cover a multitude of troubles. There is undoubtedly a germ disease affecting the intestines that sometimes develops in the spring months, but not much is definitely known about it. Dwindling may, however, be due to lack of bees—that is, not a sufficient number to keep the hive warm enough for brood raising, or from want of stores—either honey or pollen.

#### BROOD DISEASES.

The diseases that attack the larvæ are American foul brood, European foul brood, and pickled brood. Both of the forms of foul brood are very deadly, and once they get a foothold in a district they will, if unchecked, wipe out every colony. The bees themselves are unable to cope with them; hence it is utterly futile for a bee-keeper to conceal the fact that there is something wrong with his bees, in the hope that the trouble may disappear. If left alone, a slight case of infection, once it gets headway, will spread, not only over every colony in that apiary, but in the district. The writer cannot speak too strongly on this subject, especially since at the time of writing, the Province is probably free of these diseases. But continued immunity will be got by vigilance only, for in the older settled regions of the Dominion and in some parts to the south of us a fierce fight is being carried on with foul brood. This Province is free because it is young. To keep it free, the introduction of contagion must be prevented as far as possible. Every bee-keeper can help by following two simple rules: First, not to bring into the Province any hives of bees, empty hives, or used appliances of any kind; second, never to feed honey to his bees unless he knows for certain that it was produced in an apiary free of disease. The germs of foul brood are present in the combs and honey, so that the reasons of the above recommendations are very apparent. Furthermore, at the slightest hint of diseased larvæ being found in his own hives or those of another, every bee-keeper is earnestly urged to at once notify the Department of Agriculture, so that steps may be taken for its eradication.

#### AMERICAN FOUL BROOD.

American foul brood has been so named because the germs that cause it were first isolated on this continent. The symptoms of the disease are thus described by an authority:—

"Some of the brood fails to hatch. Cappings here and there are sunken and perforated at the centre. On opening one of these cells there will be found a dead larva lying on one side of the cell, somewhat shrunken, and of a brownish colour, varying all the way from a light pale brown to a dark brown. In the more advanced stages the brown is of the colour of a coffee-berry after being roasted. In the incipient stages the brown is of the colour of the coffee we drink, when greatly diluted with milk. But so far all these symptoms may be present as the result of chilled, over-heated, or pickled brood. But to determine whether it is the real rosy foul brood, run a toothpick into the dead larva and then draw it slowly out. If the matured mass adheres to the end of the pick like spittle, stretches out from one-half to one inch, and finally the fine thread breaks when the pick is drawn back, it is probably a case of foul brood. With all other forms of diseased brood, with perhaps the exception of European foul brood, where the roping is never more than slight, this ropiness does not appear; but with foul brood it is invariably present. There is another symptom