

Some Experiences of a British Bee-keeper in India

By L/Sgt. MORRISSEY, J. W. T.,

Southern Army A. A. School, Guindy, Madras.

When our first Indian beehive, complete with bees was delivered to us in February, I must say that at first sight of the hive I was very disappointed. It hardly seemed to be bigger than an English nucleus box, although I was very pleased with the neat finish of the hive itself. Now that I have got to know a little about Indian bees I realize the enormous advantage they have over the larger hives used in Britain. The size of the frames (to be tiny in comparison with the ones I have been used to work with (Langstroth—17 $\frac{5}{8}$ in. length and 9 $\frac{1}{8}$ in. depth).

As for the Indian bee itself (*Apis indica*), I think now that they compare very favourably in all aspects with their Italian and German cousins, who work in a much more favourable climate with hardly an enemy beyond an occasional hornet or wasp. When I consider the enemies of *Apis indica*, I often wonder how they manage to thrive the way they do.

The worst of these pests is the lesser Bee Hunter (*Ptilanthus Rama-krishnae*). Its lightning flight even the bees themselves do not seem to be able to follow. The Yellow Banded Hornet (*Vespa cincta*) also seems to be able to produce a state of panic even in the strongest hives, although he is comparatively easy to kill when once seen. Lizards, frogs and toads I have chased from the hives many times and spiders on more than one occasion have been seen by me taking away protesting workers even when hotly pursued by the guards.

Although I have read in one Indian book on pests etc. of the hive in India describing small ants as doing very little appreciable damage in the hive, I lost a small wild colony that I had hived in an home-made nucleus box consequent on the invasion of these small pests. When I opened the box, they were thick everywhere and the bees had deserted, not even waiting for the brood to hatch out. I recaptured this small colony, but was fated to lose it again. This time they deserted as a result of the very minor trepidations of the lesser wax moth. I tried to locate them but was unsuccessful.

Another experience I had about a month ago—I noticed that the bees from one hive (a large home-made affair—not too strong or weatherproof) were behaving as prior to swarming; they were flying thick in front of the hive, and as the time was mid-day, it was no play-flight. I decided to investigate. On opening the hive I found the super frames empty of bees and the brood frames not much better. I caught the queen as she came out of the entrance and placed here in a match box leaving the box on the alighting board. After this I searched the hive and found the source of worry to be a large cockroach fully two and a half inches in length. It was

very quick in its movements, yet I killed it eventually. Then I released the queen, replaced frames and super etc., and within five minutes all the colony was normal. This incident shook me considerably, as I know in England bees very seldom desert for a cause so small as the above, and this colony is one of the strongest I have seen in India containing at that time at least 40,000 workers. The size of this hive is roughly $1\frac{1}{2}$ times the length of the ordinary seven frame Newton hive, much deeper and contains ten frames. As these frames contained brood and honey etc., and were all well covered both in the brood chamber and the super it can be seen it was very strong in population.

A rather pleasing feature that I have found with *Apis indica* is its very mild temper. I hived a swarm about two months ago from a high tree about half a mile from our own hives. I discovered it by accident. On seeing a small boy poking up into the branches of a tree, I jumped off my cycle to investigate and found that he was allowing bees to cluster on a bough and then hitting the cluster—the damage he had done was large as was testified by the large amount of dead and dying bees on the ground. I chased him away and searched the floor to see if the queen had been harmed, and on not seeing her I decided to hive the swarm fully prepared to be stung quite a lot as they were in a very bad temper. I have no veil and never have had; so I could not take any precautions in that direction. I climbed up the tree and placed a brood comb full of brood and honey gently above the cluster; then I gently wafted a lit cigarette underneath them and slowly but surely they did the expected and moved slowly up on to the comb. My arm was just getting numb when Her Highness walked on, so gently I lowered myself to the ground and placed the comb complete with frame in the empty hive I had. In about fifteen minutes the whole swarm was hived, and despite the fact that they had been walking all over me I did not get stung at all.

From three hives in production since about February, we have extracted over 30 lb. of honey and have now a total of six hives. This figure would be seven but for the hive mentioned previously which deserted on account of the wax moth. All these six hives should be in production by next honey season, no doubt by the end of next year with the collection of swarms etc., the number of hives could be doubled easily.

The only fault I have to find with bee-keepers out here is the same as that in England, namely, that bee-keepers are too reserved about their activities, and whenever apiculture is mentioned the ignorant always look upon the bee-keeper with a kind of pitying tolerance at his apparent weakness in the head. This attitude amongst non-bee-keepers in both India and England should be stamped out and non-bee-keepers made to realise that thousands of trees, plants and bushes would become extinct, were it not for the activities of the honey-bee. I have in mind as I write this, an advertisement in the *Madras Mail*, some months ago. I quote—"Grand Dance will be held at..... on.....and if you can't dance to ??? and His Band—Try Bee-keeping."

However, to sum up, I think the Indian Bee (*Apis indica*) has very many good points and I would very much like to be able to introduce and experiment with it in England. I have found that they guard their hives well against robbers, although once the invader is in they seem to lose their morale. They are very mild in temper, although when they do sting the pain is as acute as that of the Italian or German. They do not fall off the combs during manipulation, and they are the easiest bees I have ever 'taken' when swarming. Their honey yield, when one weighs up their enemies and the lack of pasture, hot climate etc., is I think excellent, and on the whole I think that after, and if *Apis indica* could be acclimatized to the British climate it would seriously rival the all-famous Italian in all its good traits.

Before I close this short resume of my very minor activities in India I would like to mention a word or two about the new so called radio location which has been invented in England to prevent swarming.

We cannot afford to sneer at the idea when we know that its inventor is a man of some standing in the inventive and engineering world, but we must think that he is amongst the veriest amateurs in bee-keeping.

The plan is worked out in this manner. The Queen has special ray paint on her back. This paint throws a ray so that when she approaches the hive entrance it closes automatically. She then goes to another entrance which is automatically opened as the proper entrance closes. She goes through this into the new hive. This is all very nice in theory, but the inventor (Mr Gilbert A. R. Tombs) seems to forget that the majority of the bees are already out of the hive awaiting the queen. What happens to them? They can't get back into the hive as the entrance is closed. Again the ray from this special paint is so powerful that it will ring or cause to ring a bell at 200 miles distance. So presumably every time the queen goes anywhere near the entrance as she must on occasions - the bell rings a false alarm. I think that appliances like the above are better forgotten, after all even despite the fact that taking a swarm is one of the things that adds zest and spice to bee-keeping, it is also in my humble opinion the best way of getting to know your bees and the man who has never taken a swarm can hardly lay claim to know his bees.

The Rat Menace - It is calculated that 100 rats eat about a ton of food a year, which in India will amount to about four million tons. All of this is not edible food, but even if a quarter of it were, the loss in grain totals up to 1,000,000 tons, which is the quantity recommended by the Food Grains Policy Committee, that should be annually imported into India to help the country to tide over the food crisis. The rat is also a prolific breeder, a scientific estimate being that one pair of rats can produce 800 descendants a year! *Indian Information*, Sept. 15, 1944.