Ruminations on Pollination *by Adrian Jones, Wide Bay Branch QBA*

I drifted into paid pollination. In the early nineties I was approached by the then local mayor, who was branching into zucchini growing, to pollinate his crops. By that stage I had also locked up many of the local avocado farms as an excellent place to build hives coming out of winter into spring.

The mayor ended up with blocks of over 20 hectares, requiring a large number of hives. Within a few years, and a new 2 tonne 4 wheel drive truck later, during the season, which lasted from late March until very early November, we used to have, on average, 200 hives on paid pollination.

Hive losses? None, but we used to see dead bees out the front of hives occasionally. We placed our hives in small numbers not only around, but actually IN the blocks. At times (although we weren't happy about this) the spray booms used to be switched off and lifted over the hives. Of course, the drivers always sprayed in the late afternoon or night when bees were inactive or in the hive. Ironically, hives being paid for are always treated better than Ã¬freebiesÃ®.Â

It was simpler, better world. It was before weakened our hives, it was before pumpkins, watermelons, passionfruit etc were added to our repertoire. It was before small crop pollination now goes on 12 months a year.Â

Funny memories? Placement and access!! We never owned a fax machine. At one stage I actually bought one, but returned it unopened. This is because of that unique rural factor called 'mud maps'. Words I have come to dread from farmers are 'It's not far'; 'You can't get lost' and, by far the absolute worst, 'You can't miss it!'. The last thing I needed was an alleged map sent by a now irate farmer after I unloaded on his neighbour's place. I learned, very early on, to actually go, in daylight, meet the farmer and be shown where to place the bees.

These are actual events. 'No need to come visit. Follow the road up past the house until you come to the block. Drop half the bees near the drum (20 litre empty chemical container Ã± farmers have heaps of them) on one side then half on the other. You can't miss it.' Against my better judgement, I turned up after dark, found the block and about 12 white drums. He also used them to mark hydrants, anchor points, the burial place of his pet budgie - I then had to ring him.

Or the verbal mud map, before I learned better.Â

Before: 'Piece of cake, mate; you can't get lost. Go down Smith's Rd until you come to the mailbox, made out of a 44 with Reingarth on it. Turn in. Take the third left, the third one mate, then go to the end, turn right, go to the end, then left, then about another 5 chain, then turn right again. You can't miss it.'

After (like next morning after an hour driving through 8 feet high cane before finding a 4 acre zucchini block): 'Get lost? How did you do that? You didn't take the winch track did you?' Hehe. 'People are always doing that. There's about 7 left turns in there, mate, but most of them are winch tracks. You needed to take the third TRACK left, not the third track, because that's one track, and, lemme see, 2 winch tracks. Oh mate, oh mate, you musta got lost!' hehe! (In my defence I should make clear there was NO difference in appearance in the tracks!!)

But even checking out the site didn't always work. Mobile call about 9 pm. 'Hey Pete, I can't get down the track you showed me. There's a winch coming the other way and it's flooded.' 'Oh (deleted) mate. I clean forgot you were coming. (He actually had the winch behind the tractor when I'd met him that very afternoon.) Gosh, how else am I going to get you in there?' How indeed?

My worst experience? One grower had changed his agronomist and had zucchini plants as high as hedges. He was packing quality fruit at home and, by the time it hit Sydney, the stuff was rotten. Zucchinis not pollinated properly are like one of those narrow balloons that entertainers use to make animals, with one end inflated and the other a narrow point. They are very easy to pick. His fruit had a narrow, soft point.) The bees were the first suspect and our hives were checked by the DPI for strength. They were actually vigorous for the time of year (middle of winter) so the first solution was to simply bring in more. We normally placed about one per acre. This was doubled, then quadrupled. This meant, at one stage, we had about 160 hives around 40 acres. It was a lot of work and cost him a small fortune.

The actual problem? Well, it took a while to figure out, and there were several. The new agronomist had the brew fed through the trickle incorrect. (Background: Although the crop is grown in soil, to all intents and purposes the plants are grown hydroponically. The nutrients are fed through the trickle, as are some chemicals. Rain, for example, upsets the delivery, moving the fertilizer etc from where it has been placed around the plants' roots to elsewhere. In fact, rain can retard or even kill a crop by concentrating unused fertilizer into the wrong place.) Ideally, you want minimal plant growth and maximum CROP yield. The bushes would have been just dandy in the Grand National as obstacles in the steeple jump. Shame about the fruit though. Secondly, the chemicals used as sprays had been changed to include Rogor (which repels bees for several days). Thirdly, the spraying routine had been changed. Spraying now occurred all during the day, not just in the afternoon. Bees pollinate mainly in the morning. I'm not sure why you'd pay for bees to pollinate your crop, then spray them. Lastly, to get more use out of the block, the planting distance had been narrowed from 18 to 16 inches. In this case, the plants grew into each other. This restricted not only bee access, but air. Parts of the plants did not dry appropriately, leading to all kinds of interesting, but unwanted, diseases. Replacing the agronomist, the whiz bang new spray, the spraying routine and returning to the original planting distance for the next crop solved the problems. We also returned to the1 hive per acre ratio.

Avocados: In the beginning, I placed small numbers of hives in orchards, and they built magnificently. The avocado growers, however, realising the increase in fruit set, wanted better pollination. This meant more hives. This also meant the hives no longer did as well. They didn't build as much. I also didn't get as much honey, so growers, realising the advantages of the bees, began to pay. Today over a thousand hives are used in pollination of avocados in our area alone. Most of this is paid pollination. Spraying is kept to a minimum while the hives are there, and done at night.