

got to put it somewhere else and they put it at the bottom, running it down. As soon as they get to the bottom and can't go any farther, they swarm. If you keep supplying them at the bottom with comb, they don't swarm as long as it is there.

I might say that I have not been practicing the method of preventing swarming in these artificial ways or what they call "shook swarms," or by division. Not that I condemn it or find fault with it, but I have never been in a position where I have been forced to do it, or thought it advisable to do it. I am glad Mr. Miller has presented it to us to-day in the way in which he has. It is easily managed with the sectional hive in the way he describes. I was interested in what he had to say. One object I had here to-day was to learn something about these "shook swarms" and dividing colonies, so that one can go and leave an out-yard and have nobody there and be assured they will be all right. I have always advocated that one can produce brood at a time so as to put it into the field in time to catch the honey flow, and that very thing will do it. But unless you can do it in time to do that I would rather not do it, because you are producing a lot of bees to be consumers rather than producers.

Mr. Miller—My paper as given, made that clear I think. It is done in the spring as soon as the queen is being crowded. That never occurs until after bloom and a week following apple bloom. There is always a period between apple bloom and white clover which if not, in many cases, supplied the bees will stop brood rearing to a large extent. This interchange being made, the honey is forced into the centre of the brood nest which acts as a stimulant and by that means when the white clover opens my brood chamber is a solid mass of brood without any labor.

Mr. Hoshal—I agree with Mr. Miller

in that. I only gave the illustration of crowding the brood chamber; that only takes place just before the honey flow. I don't put on the surplus case until the honey flow comes. From the beginning of spring up until honey flow begins I do everything I can to force the brood, but once the honey flow comes then I cut it off.

Mr. Pettit—Mr. Chairman, I did not fully catch Mr. Miller's method of preventing swarming, and I would like if Mr. Miller in a few words would state again what he does when he finds queen cells in the brood chamber going through the yard. I understand he has those two cases in the brood chamber; he raises the upper ones and looks on the bottom bars of the combs in the upper ones and finds the queen cells. What does he do next?

Mr. Miller—I simply make a division by setting that top chamber to one side on a bottom board and placing on the top of it a chamber of the same description either of empty comb or foundation. I then put on a queen excluder on the other one, the parent colony, with another chamber but with empty comb, returning the supers to the colony on the old stand. The queen is then in the division and she will never swarm. You can leave your cells there in perfect safety. She will not swarm. I have tried this for the last five years purposely in my three yards. At the next visit we prove she is there by the drones at the entrance. You do not need to open either the division or the colony on the next visit in five cases out of six, because the entrance diagnosis gives you the conclusion. But on the return trip in eight days, the cells in the bottom chamber must be removed only on the eight combs. You will notice up until the time when swarming generally takes place we guard against it by adding supers. I never allow supers to contain more than from five to