

In locations where the last half of July and all of August have a sufficient flow to store surplus it is safe to shake a whole apiary from May 25 to June 10 (vary the time as conditions vary), making, perhaps, from 75 to 100 per cent increase, and seeing to it that all increase have a young laying queen as soon as possible.

You may expect such an apiary in such a locality to come up to the close of the season with as much surplus honey as though there had been no increase, and you have the increase, and, besides, the plan will enable you to place such yards "hors de combat" through the swarming season and enable you to give your entire attention to yards where the main flow of honey is earlier. Where you wish to control swarming, or increase rather, this can be done completely by the so-called shook swarming method. With me, shook swarming is the most feasible route I have found to the absolute control of increase. Any plan that requires any subsequent fussing with is not practicable with the man who is caring for hundreds of colonies and running on schedule time and visiting every colony every six days. I think many who have tried shook swarming and have condemned the plan have mistaken superseding for swarming in some cases, and in such a case it will always fail. It is surprising sometimes what a large percentage is found superseding during the months of June, July and August, where the go-as-you-please plan is followed with regard to queens.

I am not going to try to cover the ground under the title "Short-cuts in Bee-keeping," for I believe that the most satisfactory and effective work in bee conventions comes from the batteries that are always trained upon the question box.

In recapitulation, I will say that preparedness, alertness and a complete mind-picture, as it were, of all conditions in each apiary, this, together with uniformity of fixtures and a complete knowledge of your field and its flora, constitute the short-cuts in bee-keeping, and all this means work.

## QUERIES AND ANSWERS

Q—How would you judge my cellar to be for wintering bees? Temperature very even, between 35 and 40 most of the time; never goes above 45 or below freezing point. Cistern (large) in cellar, open at top and in constant use. Cement floor.—E. A. C., Colpoys Bay, Ont.

Answer.—Bees should winter fairly well in a cellar of the above description if it is dry and dark, but I would prefer a cellar that would maintain an average temperature of at least five degrees higher. While a drop in the temperature to the freezing point may not do much harm if it does not last long, we have found that a range of from 40 degrees to 50 degrees gave the best results. The open cistern in the cellar would help to equalize the temperature, but should be covered in some way to keep the bees from dropping into it.

Q—Would you be kind enough to give me the best method of keeping down swarming and not interfere with honey-gathering. My bees swarm very rapidly. They always commence in May, sometimes on the 15th.—C. P. Glen Major, Ont.

Answer.—It is a good sign when all colonies in normal condition are ready to swarm in May. If the honey flow is good, or the hive small, they soon become crowded, and preparations for swarming are commenced by starting queen-cells.

Swarming may be controlled in various ways. There are few apiaries in which all the colonies will be up to their full strength in May, and just before they are filled up a frame of brood may be taken from the strongest and given to the next weaker, and the vacancy filled up with an empty comb. This may be repeated in a week or ten days if the weather is favorable. When all the hives are filled, a super or upper storey, with frames filled with comb, may be given.

The best non-swarming hive in use is the 10-frame or 12-frame Langstroth, and if a super be given just before they commence to build queen cells they will rarely swarm during the honey season, and the bees keep working all the time, with corresponding profit.

St. Thomas, Ont. R. H. SMITH