

colony found in that condition was dead. But we had a number of colonies in which the oil-cloth was partly gnawed away by the bees, large holes having been cut into it by them. These colonies almost invariably wintered safely, but the leaves in the upper story were soaked with moisture, and in some instances mouldy. The larger the holes were, in the enamel cloth, the better the condition of the bees. This was an eye-opener to us, and from that time on we have uniformly removed the enamel cloth for winter. We place over the frames a mat of what is commonly called here "slough-grass." It is a very coarse grass which grows on the Mississippi lowlands, and is used in some places as hay. This is tough and wiry, and lasts longer than straw, for straw-mats are easily broken when dry. This mat allows the moisture through it into the upper story, which we still fill with leaves as formerly. We do not think that anything surpasses the straw-mat in usefulness, both as winter and summer shelter. While it acts as a very warm cover for frames during the cold days, it is the very best shelter against the rays of the July sun during the hot summer days. Here, in Illinois, we cannot leave our hives exposed to the direct rays of the sun in the hottest weather, as they do in countries where the altitude gives a relief from the scorching heat, or where the sun's rays are less perpendicular. Cool summers, like the one just past, are an exceptional occurrence.

Now as to the outside shelter: I am very free to say that although we have used our method for years, there are some better ways, though perhaps more expensive, of sheltering the hives. We simply wrap up each hive on the three cold sides—north, east and west—with forest leaves held together by a frame-work of lath and

twine, which is tied around the hive, like a cloak. Some people use corn-stalks for the same purpose. Others use this same slough-grass already mentioned by me, and make each hive look like a little hay-shock, the front only being open.

If all the other conditions are complied with—good food, plenty of bees, sufficient amount of stores, and absorbents in the super—the bees will be likely to winter well, if not too much exposed to the high, northern winds. But the additional shelter is not to be disdained, whether it is of leaves or corn-fodder, or simply a tight board-fence, or in snow countries a big pile of loose snow around and over the hive.

But by all means, I would give the bees a fair opportunity of taking flight as often as the weather will permit during the winter.

Feed! feed! feed! This should be the watchword of every bee-man at the present time. If it has not been attended to, the sooner the duty is performed the better. not only is there no surplus worth naming at the end of this sunless summer but a very large percentage of colonies will require less or more feeding to preserve them for another season's work. Let it be remembered that every colony now short of stores is a certain loss, whereas a few pounds of sugar given to each may save them to do excellent work next year. In other words, a shilling spent now may secure one or two pounds in 1903. No time should be lost either, as late feeding does not give the bees a chance of sealing and properly arranging the stores, so that bees goes into winter quarters in bad form. A large Canadian feeder containing from 5 to 10 lb. of syrup does the work very expeditiously—and nothing but rapid feeding should be done at this late period.—British Bee Journal.