

well established as the law of gravitation. Mr. Pringle did not go so far as Prof. Cook either, though he might quote many scientific authorities to corroborate the Prof.'s statements. It now remains for this "bright and shining light" of the west to go and stop the *American Bee Journal*, and while about it he might as well sue for an injunction to restrain this and the *A.B.J.* from publishing any opinion contrary to his own. Just here we suggest that he stop reading all the newspapers, because he can scarcely pick up one of them without coming across some of the heretical food, which seems to so ill-become his appetite. Why does he not allow his fellow bee-keepers the same rights and liberties he claims for himself? As to Mr. Pringle's desiring to introduce subjects of an irrelevant nature to bee-keeping into the columns of the *CANADIAN BEE JOURNAL*, we positively deny such desire on his part. Mr. Pringle has never yet introduced any subject foreign to bee-keeping into our columns, unless as an argument to assist him in defending some position he has taken relative to subjects pertaining to our pursuit. Oxford bee-keeper cannot point out in all Mr. P.'s writings one item which was not strictly pertinent to the subject in hand, and so long as this be the case this narrow-minded man should not grumble. We do not intend carrying this subject any further, but in justice to Mr. Pringle, and to show how small and opinionated some men are in their views, we take the space. In writing the above we do not admit or oppose Mr. Pringle's, but we do like liberality.

#### OPEN vs. CLOSED SIDE SECTIONS.

IN our reply to friend Root's objections to open sections and supers, we did not attempt to show that *open-sided sections were an advantage*. All that was sought to be explained there was the fact that these open-sided sections were not *necessary* to complete the invention that we had brought out. But we do think that sections open at the sides as well as at the top and bottom *are* an advantage, and a very great one. You might just as well shut each one of your frames in the brood-chamber off in a stall of its own, giving the bees

entrance to them only at the bottom and top instead of at the sides, and through the combs if they were not all built out solid and full. Did any of you ever try the experiment? If it applies in one case, it must certainly apply in the other. Some *very good* arguments in favor of side-opened sections are given in the last number of *Gleanings*, by Oliver Foster, Mt. Vernon, O., which we reproduce:

In 1883 I conceived the idea of opening up communication between these cross-rows by making entrances between the sections at the sides, like those at the top and bottom. I accordingly went back to the 1-lb. section with open sides, and contrived a case especially adapted to their use which has since developed into what I now call the "adjustable" case. The chief object of this change was to combine the advantages of large frames with those of small sections.

One important advantage is, that after work is once started anywhere in the case, the bees gradually work through into the next row, and on to the ends of the case in the direction the combs run, which is the natural way for bees to work; whereas with the closed sides, work must be started in four places, and then progress "across the grain."

Another advantage claimed is that of a more perfect ventilation, facilitating the ripening process. Practice proves that the objects sought are realized. The main object is the same as that sought by the many expensive and complicated contrivances under the heads of "reversible frames," "contraction dummies," "invertible hives," and "divisible brood-chambers" with the queen-excluders, which these things necessitate. In brief, it is to get honey stored in sections rather than in brood-combs. With full 10-frame L., brood-chambers, without contraction, inversion, or queen-exclusion, but with open-side sections above, I have found, throughout a good honey-flow, the queens holding their position up close to the top-bar, leaving always plenty of empty cells below and around the brood. From such colonies I have had good yields of comb honey with but few swarms, and at the close of the season I have found scarcely honey enough in all the ten brood combs to winter the colonies:

I do not claim that the use of open-side section will give us *all* the advantages claimed for contraction and inversion, but with them there is not the necessity for the unnatural extremes of compulsion, to which many are now resorting.

The unfavorable reports from open-side sec-