

divinity during the day may be different one day from that of another. The average shows a maximum activity near the middle of the forenoon, and then a gradual decline during the rest of the day. But on May 20 their activity reaches a second maximum in the evening. May 20th and 21st were exceptionally hot days, and this may account for both the early decline in activity in the morning and the second increase in activity in the evening. More observations will have to decide the relation between the amount of their activity and the temperature.

The average gives some idea of the amount of work the individual bee does in the line of pollen gathering, assuming that they all do an equal amount. Upon the basis of this average the probable total number of trips made by the hive in a day for pollen is 274. With 1,800 workers in the hive this gives a little over 1.3 (one and three-tenths) trips per day for each worker. If the few observations on

individual bees were any indication at all of the truth, this suggests that not nearly all of the workers assist in gathering pollen. For according to their records the total activity of the hive should be higher. It must be remembered, of course, that the degree of activity varies over a wide range, and that the hives observed possibly represent considerably less than the average degree. Yet, a little figuring indicates that if their work were equally distributed the individual bee would have to do very little in order to make a very busy-looking hive. Cook estimates that a hive has from 1,500 to 40,000 workers. Assuming a hive of 20,000, and having each worker making five trips a day for pollen, gives a steady stream of bees with pollen entering the hive at the rate of 2.3 bees per second, for twelve hours of the day. This would make a quite active-looking hive.—"American Beekeeper."

Bee-keeping as a Business

(By E. W. Alexander.)

When our attention is called to some new line of business, usually our first thoughts are, "How much money can I make out of it?" or "How many dollars can be made annually clear of all expenses from a given amount of capital invested?" While I will admit that these are questions of much importance—questions worthy of due consideration—there is still one question which is of particular importance. They are all others, which, I am sorry to say, we seldom think of. That is, am I naturally qualified for that kind of business? If so, then I have the principal requirements of success.

If not, then no amount of hard study or labor can fully take the place of my inability to fulfil its requirements." Oh how many of us spend our whole lives like water seeking its level, and never find the business that God fitted us best to follow? My young friend, if you have any thought of taking up bee-keeping as a business, then think this business over carefully before you invest much money. My advice would be to work one summer, at least for some successful honey producer—one who would take pains to teach you all he could in regard to rearing queens, forming nuclei, increasing