

will go from a purely white head of clover to another which is rose-colored; for there are hardly two plants of white clover whose flowers have exactly the same tint.

Having watched bees working on a patch of differently-colored blue-bottles, I saw one bee stick to the white variety and pass by the other colors without paying any attention to them; while another bee visited, one after another, the white, the blue, the purple, etc. I noticed the same when watching bees on the asters, the knot-weeds, etc.

There is consequently, no wonder to see bees visiting several kinds of apple-trees during the same trip. This reminds me of something unusual that I noticed in France long ago. There was an apple-tree loaded with apples, very similar to the kind known here as "Bell-flower." Some of the apples, instead of being entirely white, had ribs like muskmelons, colored in gray. Not far from it was another tree of a variety known in France as "Gray Requette." No doubt the bees of an apiary placed in the same orchard had brought the pollen of the gray apple to the flowers of the white, and the fecundation had not remained confined to the seed alone, but had extended through the pulp to the part of the skin corresponding to the heterogeneously-fecundated kernel.

When the crop of honey is scarce, bees visit all kinds of nectar-yielding flowers, passing from one to another, without seeming to mind the difference. But we do not think that they act the same when they are in quest of pollen, if we notice the regular color of the lumps that they bring to the hives.

#### HOW THE TOADS EAT.

In reply to Mr. Hovis in regard to toads eating bees, on I would say that, although the toad eats small insects, its mouth is very large. To get its prey it does not act like the ant-eaters, whose heads are elongated, and which thrust their tongues—that are coated with a viscid saliva—among the ants, and retract them in their narrow mouths.

As soon as an insect is within the reach of the toad, its tongue is thrown out by a kind of springing motion, the back part of it forward, and returned as quick as lightning; as the tongue is coated with a viscid substance, the lightest contact suffices. This motion is so quick that it is about impossible to notice it, except by the swift opening of the mouth, and the smack which is heard when the tongue jumps back and the mouth shuts up.

CHAS. DADANT, in A. B. J.

Hamilton, Ills.

## QUERIES AND REPLEIS.

UNDER THIS HEAD will appear Questions which have been asked, and replied to, by prominent and practical bee-keepers—also by the Editor. Only questions of importance should be asked in this Department, and such questions are requested from everyone. As these questions have to be put into type, sent out for answers, and the replies all awaited for, it will take some time in each case to have the answers appear.

### Sugar or Honey for Brooding

QUERY No. 230.—Other conditions being equal, which will produce most heat for brooding in spring: a pound of granulated sugar, or a pound of clover honey? Do you guess, or do you speak from experience?

EUGENE SECOR, FOREST CITY, IOWA.—I don't know.

H. D. CUTTING, CLINTON, MICH.—Guess I don't know.

DR. C. C. MILLER, MARENGO, ILL.—I guess the sugar.

A. B. MASON, AUBURNDALE.—A pound of granulated sugar.

G. A. DEADMAN, BRUSSELS, ONT.—No experience. I would guess that honey would.

MARTIN EMIGH, HOLBROOK, ONT.—I guess I would take chances on the clover honey.

G. M. DOOLITTLE, BOROHINO, N. Y.—I guess there would not be difference enough to amount to the trouble of ascertaining.

J. K. DARLING, ALMONTE, ONT.—Have not tested the merits of the two, side by side, but I guess the honey is best and will cost the most.

R. MCKNIGHT, OWEN SOUND, ONT.—A pound of granulated sugar. Maybe the questioner wants a scientific answer. If so let him consult some good work on chemistry.

G. W. DEMAREE, CHRISTIANBURG, KY.—Honey all the time. I do not guess. Use it yourself and listen to the hum of bees when taking the honey, and after it has been stored. Bees hum loudest when the heat is raised the highest.

JAS. HEDDON, DOWAGIAC, MICH.—I guess the sugar would produce the most heat, but as heat production is by no means the only favorable condition sought the pound of honey would, in my mind, be worth the most as a bee food after the bees could fly.

PROF. A. J. COOK, LANSING, MICH.—From a wide experience in feeding I should say the sugar, and have no doubt of it in case the sugar is fed, and the honey is in the brood-chamber. The carrying in of the honey does stimulate the bees to greater activity in our apiary, whatever may be true elsewhere.

J. E. POND, NORTH ATTLEBORO, VT.—Speak-