Gaston County Beekeeper's Association

Next Meeting May 28th

Speaker: Don Hoskins N.C. State Inspector speaking on CCD & general beekeeping 7 pm Citizens Resource Center Dallas, NC



7 pm Citizens Resource Center Dallas, NC

Making Increase

By Don Lam

Learn more at <u>www.donlambees.com</u>.

If you are like most beekeepers, you have often said to yourself, "I really ought to have just two or three more colonies—and raise a few queens besides." I think we all have. And why not?

There are a couple of questions you should ask before you start. The first is the "why" question. Why do you want to increase the number of colonies you have? Is it only for fun to see if you can do it? Do you perhaps need more colonies to fill a pollination contract? Were you short of honey last season or are covering winter losses this spring? How many do you need and how many can you handle?

Once you have answered the "why" question, and have come up with real needs and numbers, you can ask the next question: "how" do I get there? Part of the "how" answer can be easy. You can buy a package or a nuc, or catch a swarm.

But raising your own bees (and saving money) is not that difficult. It's involves splits, planning, schedules, and queen introductions. More complicated but very rewarding.

The easiest way to increase your colonies is to split the ones you have into smaller nucs. There are several approaches to these, all of which can work.

Walkaway Split

The first is the Walkaway Split. The beekeeper takes a frame of eggs, two frames of emerging brood and two frames of pollen and honey covered with nurse bees, puts them into a five-frame nuc box and then walks away. Check back four weeks later to see if the new queen is laying.

Typical Split

The second is the Typical Split, the same as the Walkaway, except that the beekeeper is much more proactive and introduces a queen cell or queen to the new split, or nuc. This action puts the nuc three weeks ahead of the Walkaway Split. One approach is to divide the bees evenly between two colonies, face them porch to porch, and let the returning bees select one or the other. In a day or two take the queenless hive offsite and add a queen.

Swarm Control Split

The third is the Swarm Control Split. Ideally, a beekeeper tries to prevent swarms and not have to split. In this case, to decrease the overpopulation, the beekeeper removes every frame that has a queen cell and puts it into a nuc of its own along with appropriate frames of brood and honey. Putting more than one frame with queen cells into a nuc increases the chances of success.

Mite Control Nuc

A master beekeeper from Michigan has been creating splits as a way of controlling mites with significant success. Mel Disselkoen times his splits to interrupt the mite's own brood cycle and often overwinters at 80% or more. His method incorporates a timed broodless period while the bees make their own queen. For more details go to <u>www.mdaspiaries.com</u>.

In order to survive, an ideal split should have 2-3 frames of eggs and sealed and emerging brood covered with nurse bees, plus two frames of honey and pollen. A shake or two of additional bees at startup time adds needed foragers and bees to keep the eggs and brood warm. A beekeeper can add a new queen or let the bees raise their own at this point. Since most of the nuc bees are nurse bees who haven't flown yet, moving the nuc offsite is not always necessary. Moving the parent colony offsite and putting the nuc in the original parent location will build it up with the returning foragers.

When is the best time to start a nuc? Although splits can be done at different times during the season, usually late spring/early summer works the best for most beekeepers. The parent hive must be strong enough to be divided without undue stress on either the parent or the nuc. The weather must be warm enough day and night for the cluster to maintain proper brood temperatures. Commercial queens must be available, or if the bees are to raise their own queen, drones must be available for complete mating. And enough season must be left to permit both the parent and the nuc to build up in numbers and food stores.

What about the queens? Is there a best approach to requeening? Here are some interesting numbers: your method will reflect the season, purpose, and budget.

Using the existing queen	brood in 21 days with no interruptions
Introducing a mated, laying queen	brood in about 26 days
Using a virgin queen	brood in about 29 days
Queen cells will produce brood	in about 32 days
A queen from brood	takes about 41 days

Split Insights

By Cleo Hogan

I would never let my hives swarm and attempt to catch swarms for a variety of reasons. First, the parent hive will very nearly split evenly, leaving as many bees behind as leaves. This gives you two even hives, but, one has an old queen most often at the end of her productive life, not a good situation, and the other hive has no queen, only queen cells waiting to hatch, not a good situation. Both bad options.

A far better hive management solution is to make a split, even if you do a bad job. This opens up the brood nest for the queen to lay more eggs, reduces the urge to swarm, (because there are fewer bees in the hive), and leaves a good strong hive to produce honey. I like to move the old queen with the split, that way, she and the bees are already familiar (the bees are all her daughters and sons), she is already actively laying, (so there isn't a lot of delay in the buildup of the split), and any urge to swarm is gone because the split is too small to swarm. I highly recommend placing a new, bred, queen in the parent hive, because you lose 40-50 days at the parent hive if you let them make a queen to replace the one you moved with the split. At the end of this cycle your hive has been reduced and has to build back up. Normally a new, bred, queen will start replacement in 20-25 days not 40-50.

Don't be alarmed if you see queen cells in the parent colony after the introduction of a new queen. The bees will recognize very quickly that they are queenless after you make your split. The parent hive should still be very strong, and they will attempt to make a queen quickly, because, they have limited time to start making a queen, (they need a viable egg, normally less than five days old), and the new queen is still in a cage, (not able to lay eggs), and they need a queen to survive.

If the new queen gets out of the cage, and if the bees plan to keep her, they will destroy the queen cells, or kill any virgin queens. It is not uncommon for the bees to replace a new queen, (which costs you money) but, it is more risky to chance just letting the hive make their own new queen, and lose 40-50 days in the middle of a honey flow when they need to be making honey for you.

One additional benefit of a split is its effect on mite control. Mite control is an ongoing battle. Make your mite counts and take action as required. Making a split is one way to help with mite control; Oxalic Acid (OA), miticides, (several brand names), powdered sugar, are others. Some highly respected beekeepers tout the effectiveness of screen bottom boards, but recent data casts some doubt as to the effectiveness of screen bottom boards and mite control.

There is nothing magic about a split. Simply:

- 1. Find the queen.
- 2. Take her and a couple of frames of chocolate colored brood, (this brood will hatch quickly, building the split rapidly.) The brood cap darkens with age; chocolate-colored brood is closer to hatching than freshly capped brood.
- 3. Insert a new queen in the parent colony, or leave new brood for the hive to make a queen.
- 4. Add 2-4 frames containing bees and some honey.
- 5. Feed the split until it has built back to 7-9 frames.

6. Manage the parent colony to ensure that the new queen is laying, or they have replaced her. Most important aspect of the parent hive management is, don't let that hive become queenless.

Beek Hint

To light a smoker, crumple a handful of (preferably all-natural) fuel, stuff it loosely in the bottom of the smoker, light it. Puff the bellows to fuel the flames and, when the fuel is good and hot, add more fuel, gently puffing all the time. Always be sure there is nothing flammable around you before starting the smoker (like is your hair tucked away? Bee suit not in the way?)

Díd you know GCBA has a líbrary?

The following books are available to check out one month at time, please see Rennie Mace

Why Do Bees Buzz? Eilzabeth Evan	s The Beekeeper's Handbook
	Diana Sammataro
The Hive Detectives:Chronicles of a	Honey Bee Catastrophe Loree Griffin Burns
Honey Bee Diseases and Pests ?	Starting Right with Bees
	Kim Flottum et al.
Queen Rearing Essentials	The ABC & XYZ of Bee Culture
Lawrence John Connor	A.I. Root
Natural Beekeeping Ross Conrad	The Honey Bee Inside Out
	Celia Davis
First Lessons in Beekeeping Ke	ith S. Delaplane
The Compleat Meadmaker	Ken Schramm