CATSKILL MOUNTAIN Beekeepers Club

FEBRUARY 2012

A MESSAGE FROM THE CLUB PRESIDENT

Greetings fellow beekeepers,

It's February, and while it may seem like an eternity to beekeeping season, the reality is it will be here all too soon. This is a great time of year to take advantage of some downtime and address those little tasks we have been putting off all winter as well as thinking ahead to the upcoming season.

What will we do different than last year? Maybe try making a split this year?

It's easier than you think! Maybe you've gotten proficient at making nucs and you're feeling confident. Try rearing a batch of your own queens this year. It's easier than you think! Will you be feeding pollen patties this spring? It's a great way to build 'em up early and strong, but it will mean closer management in April/May.

Maybe your goal is to finally, after keeping bees for 2 or 3 years, to just get a honey crop. Whatever your goals might be, now is the time to get started because one of the golden rules of beekeeping is 'stay ahead of the bees'. That's easy to do now, not so easy to do later.

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TO DO FOR FEBRUARY

SUGGESTIONS BY RJ RONCONI

- When any warm weather shows up, check out your hives. You can lift inner cover, or just knock on the front of the hive and see if you hear buzzing.
- If hive is dead this is a good time to take apart, clean out dead bees, clean up frames and store in mouse-proof place.
- Determine reason for loss. Sign of starvation is many bees with butts sticking out of cells. There may be honey in other parts of hive. Save to fortify other hives that might need it later.
- You may want to sprinkle a bit of granulated sugar around the oval hole in inner cover for insurance. It is too early in the Catskills to start feeding syrup.
- Order new packages.
- Work on a plan to keep better records than you did last year.
- Are you going to feed pollen patties? If so, read up to see which ones are the best. In fact read up on everything, you never know enough.
- If snow is deep make sure bees have an open exit.
- Weigh down outer covers with bricks so they don't blow off in wind.

Notice Board

FEBRUARY MEETING

Tuesday, February 14, 7:00pm

LAURIE HERBOLDSHEIMER

She is treatment-free beekeeper and co-author of "The Complete Idiot's Guide to Beekeeping", the first treatment-free beekeeping book since beekeeping treatments.

SABA SEMINAR IS COMING!

Saturday March 31, 2012 - 9:30 am- 5 pm

Huxley Theater, NY State Museum, Albany NY

Speakers: Maryann Frazier of Penn State University and Randy Oliver of Scientific Beekeeping will enlighten us with six consecutive presentations.

Vendors: Betterbee, Brushy Mountain Bee Farm and Dadant will have booths. Check with them for pre-orders.

Raffles: As usual, a fundraiser will be held with many many beekeeping prizes donated by vendors and friends.

Lunch break: SABA has arranged a lunch this year, so there won't be any need to dash out to drive and find a restaurant. The new seminar venue is in downtown Albany, and there are only a few places close by for lunch.

Cost: If pre-registered by March 24:

$38 for SABA member. Lunch is included in the fee.
$43 for non-SABA member. Lunch is included in the fee.

Remember, if we don't receive your registration by March 24, you will not get the SABA lunch.

To register see attachment in this email or visit www.adirondackbees.org. Contact Anne Frey with questions: annef@capital.net or 518-895-8744

HONEYBEELIVES WINTER CLASSES

Intro to Organic Beekeeping: Planning a New Hive for Spring & Understanding and Caring for Your Honeybees

February 18 & 19 and March 10 & 11 - Two-day class registration $175 per person, one-day registration $95 per person. Contact Grai at www.honeybeelives.org

February Recipe

SESAME HONEY CANDY [PASTELI]

A traditional Greek confection, sesame honey candy combines the simplest of ingredients – gently toasted sesame seeds, unrefined sea salt and honey – for natural treat. An alternative to overly sweet candies, sesame honey candy is a wholesome treat.

Ingredients

olive oil, for greasing the baking sheet

3 cups hulled sesame seeds

1 cup honey

unrefined sea salt to taste

Directions

Generously grease a baking sheet with olive oil and set aside.

Heat a well-seasoned cast iron skillet over medium-high flame until it becomes hot to the touch.

Pour three cups sesame seeds into the hot pan and stir them continuously with wooden spoon until they're well-toasted and golden-brown in color – about four to six minutes.

Stir honey and a generous dash of unrefined sea salt into the toasted sesame seeds until they become well-coated and the mixture stiffens.

Pour the mixture of honey and sesame seeds onto your greased baking sheet and pat down and smooth out the mixture with a wooden spoon.

Score the candy into pieces of 1/4-inch by 1-inch and set the pan aside until the candy is cool enough to handle comfortably.

When cool to the touch, but still warm enough to be malleable, grease your fingers with olive oil and roll the pieces of honey candy into small small, round logs.

Allow to cool completely before serving.

Yield: approximatley 96 candies.

Courtesy: nourishedkitchen.com

Honeybee Corner

BY DICK JOHNSON

HONEY GRANULATION

Honey is a super saturated water solution containing the disaccharide sugars fructose and glucose. This means that it has far more solids than water and it is inherently unstable in liquid form. The sugar solids account for 82%, leaving the water content at only 18%. Over a period of time all honey will granulate but the beekeeper can help to delay granulation by several methods. There is a wide variation in speed of granulation of honey depending on the floral source. Canola honey may granulate one day after collection and must be extracted immediately. Clover honey is less likely to granulate as fast. The most important attention needs to be given to ambient temperature while extracting and storing if good quality honey is to be produced.

Raw honey is defined as honey that has been processed with as little heat as possible. For example, substituting a non-heated fork to uncap the ripened honey, instead of the practice of using a heated knife will maintain the best flavor and volatile components of raw honey. It is normal to warm the extracted honey to allow wax and other particles to rise to the surface for skimming before packaging or filtering honey. Heating to below 120 degrees is considered still in the raw honey range. Raw honey tends to granulate on it's own in a short period of time. Standard practice for store bought honey is to heat the honey much higher for two purposes. Heating to 160 degrees will change the nature of the sugars and will delay granulation for several months. Of course this process removes some of the natural, delicious flavor expected in raw honey.

Granulation is also accelerated by the presence of other solid particles such as the suspended pollen particles normally part of raw honey. much of the honey sold by commercial packers remove the pollen by a "micro filtration process" in order to extend shelf life. Chinese honey is "micro filtered" to conceal the true origin of poor quality product. In the US, natural, unprocessed honey as sold by a small beekeeper always contains suspended pollen and many folks claim that this local pollen helps to relieve hay fever symptoms. In Europe there is a new regulation that requires labeling of honey that contains pollen The other reason for heating honey to 160 is to destroy any yeast spores that may cause fermentation in the honey. Overheating to 167degrees will darken the honey and will seriously damage the flavor.

When honey granulates it is the glucose fraction that crystallizes rather than the fructose that stays in liquid form. The glucose solids are glucose oxalate and during formation will release water to the honey as they form. Any increase in water content above 18% will allow yeast to grow resulting in fermentation or spoilage of honey. During storage of honey keep it in a closed container at room temperature. Do not keep honey in the refrigerator. It is necessary however, to keep maple syrup in the refrigerator because it only has about 65% sugar which is not high enough to prevent fermentation. For long-term storage, honey may be kept at any temperature below 60 degrees. Honey keeps liquid and granulation free in a freezer or even on the front porch for sale at zero degrees.

Of course honey that has started to granulate can be easily reliquifided by heating in a warm pan with water at 110 to 120 degrees. Leave it there for a few hours, as the time is more important than a high temperature. In summer honey jars can be reliquidfided by laying them (tightly closed) on the dashboard. in bright sun. Be careful that they don't leak!

Our February Speaker:

LAURIE HERBOLDSHEIMER

"When we learn to live by creating a better world rather than using up the one we have, keeping bees without treatments will be easy. Until that time, methods like those that Dean and Laurie describe are necessary, and worth every bit of struggle. It"s the best way."

-Kirk Webster, Vermont Beekeeper

Laurie and Dean are treatment-free beekeepers and the authors of "The Complete Idiot's Guide to Beekeeping", the first treatment-free beekeeping book since beekeeping treatments. They live in Leominster, Massachusetts where they own and operate Golden Rule Honey, produce The Queen of Chocolate, and run the annual Northeast Treatment-Free Beekeeping Conference.

The Complete Idiot's Guide to Beekeeping has all the information a beginning beekeeper needs to know to start a hive and keep it buzzing. Expert beekeepers Dean Stiglitz and Laurie Herboldsheimer, owners of Golden Rule Honey, take readers step by step through the entire process-from information on the inhabitants of a hive and how it works to collecting bees, keeping them healthy, raising a queen, harvesting honey and wax, and storing hives for the off-season.

Double Your Pleasure

HOW TO MAKE A DOUBLE NUC BOX

Thinking about making some splits this year? Then this double nuc box is just the thing for you. It's simple to construct using a standard hive body, makes a perfect 5 frame standard or mating nuc and is also a very efficient way to overwinter nucleus colonies if you make summer splits. The two small colonies cluster on either side of the divider and share warmth in much the same way as one large colony does.

3/4" plywood is set into a dado groove cut into the frame and a 5/8" strip is glued and stapled down the center. This will keep the plywood from warping and the bees from going under the divider. Cut out a small defendable size entrance on opposite sides of the bottom board.

A 1/4" groove is cut down the center of the front and back pieces of a standard hive body before assembly. Attach body to bottom board using hive staples

Cut a masonite divider so that it protrudes above the hive body 1/4" and slide it into the dado groove. (Hint) If you cut it a little shorter than snug it will slide better and won't tend to bow.

Cut 1/4" plywood inner covers and butt them against the protruding divider.

Now you're ready for 4 frames of bees and a division board feeder per side and a telescoping outer cover to keep 'em dry.

BOTTOM BOARD WITH ENTRANCE ON OPPOSITE SIDES.

Honeybee News

ZOMBIE BEES: FLY PARASITE CAUSES ZOMBIE-LIKE STUPOR

The researchers also discovered fly pupae near dead bees at the bottom of their laboratory hive, suggesting that A. borealis can multiply within a hive and potentially infect a pregnant queen bee.

If deadly viruses and fungi weren't enough, honeybees in North America now must also deal with a fly parasite that causes them to leave their hive and die after wandering about in a zombie-like stupor, a new study shows.

Scientists previously found that the parasitic fly, Apocephalus borealis, infects and ultimately kills bumblebees and paper wasps, while the "decapitating fly," an insect in the same genus, implants its eggs in ants, whose heads then pop off after the fly larvae devour the ants' brains and dissolve their connective tissues. Now researchers have discovered honeybees parasitized by A. borealis in 24 of 31 sites across the San Francisco Bay area, as well as other commercial hives in California and South Dakota.

Genetic tests revealed that some of the bees and flies were infected with deformed wing virus and the fungus Nosema ceranae, both of which have been implicated in colony collapse disorder (CCD). The scientists believe that more research into the parasitized bees and their behavior could yield new insights into the devastating disorder.

"Understanding causes of the hive abandonment behavior we document could explain symptoms associated with CCD," the researchers write in their study, published today (Jan. 3) in the journal PLoS One.

AN INFECTIOUS FLY

The female A. borealis flies will inject their eggs into a honeybee's abdomen soon after coming into contact with the bee, the researchers saw in their laboratory. About seven days later, up to 25 mature fly larvae emerge from the area between the bee's head and thorax. In the wild, no more than 13 larvae were observed busting from a single honeybee.

The researchers found that parasitized bees in the wild abandon their hives and congregate near light sources, where they begin to behave strangely. A bee near death typically will sit in one place and curl up, but these infected bees walked around in circles, appearing disoriented and with little equilibrium, often not being able to stand up.

"They kept stretching [their legs] out and then falling over," Andrew Core, biology graduate student at San Francisco State University and co-author of the study, said in a statement. "It really painted a picture of something like a zombie."

Core and his colleagues found that the honeybees most likely to become infected by the parasite were the ones that left their hives to forage at night, rather than the daytime foragers. The researchers also discovered fly pupae near dead bees at the bottom of their laboratory hive, suggesting that A. borealis can multiply within a hive and potentially infect a pregnant queen bee.

MANY QUESTIONS STILL REMAIN

It's currently unclear how the flies are changing the bees' behavior, though the researchers hypothesize that the flies somehow affect the bees' circadian rhythm, or natural day/night cycle. The researchers also don't know whether infected bees are leaving the hive to protect other bees, or whether hive mates sense the infection and force the dying bees out.

"A lot of touching and tasting goes on in a hive," lead researcher John Hafernik said in a statement. "And it's certainly possible that their co-workers are finding them and can tell that there's something wrong with them."

Perhaps most important, scientists don't yet understand the role, if any, that the parasitic flies play in the transmission of the CCD pathogens. Are the flies further harming the bees by spreading deformed wing virus and N. ceranae, or do they actually prevent the pathogens from multiplying by quickly killing their hosts?

Whatever the case, the researchers believe A. borealis is likely a new threat for the honeybees. "Honeybees are among the best-studied insects in the world," Hafernik said. "So at one level, we would expect that if this has been a long-term parasite of honeybees, we would have noticed."

By Joseph Castro, LiveScience Staff Writer / January 5, 2012
http://www.csmonitor.com/Science/2012/0105/Zombie bees-Fly-parasite-causes-zombie-like-stupor

PESTICIDE COST-SHARE

Dr. Maryann Frazier at Penn State received funding from Project Apis mellifera (PAm) to run pesticide samples for interested beekeepers at a 50% discount of $80 for each samples for miticides or $142 per sample for the full screen of 171 pesticides, compared to $160 for miticides or $284 for the full 171 pesticide analysis without the cost-share. Beekeepers can send samples of wax, pollen, adult bees, brood, or nectar for analysis. In two to three weeks after the samples are sent in, the beekeeper will be provided with a report of the pesticides in samples, along with information about how those levels compare to the rest of the country. All the data generated will be stored in a large and confidential database at Penn State.

If you are interested in participating, contact:

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Provided by: http://beeinformed.org