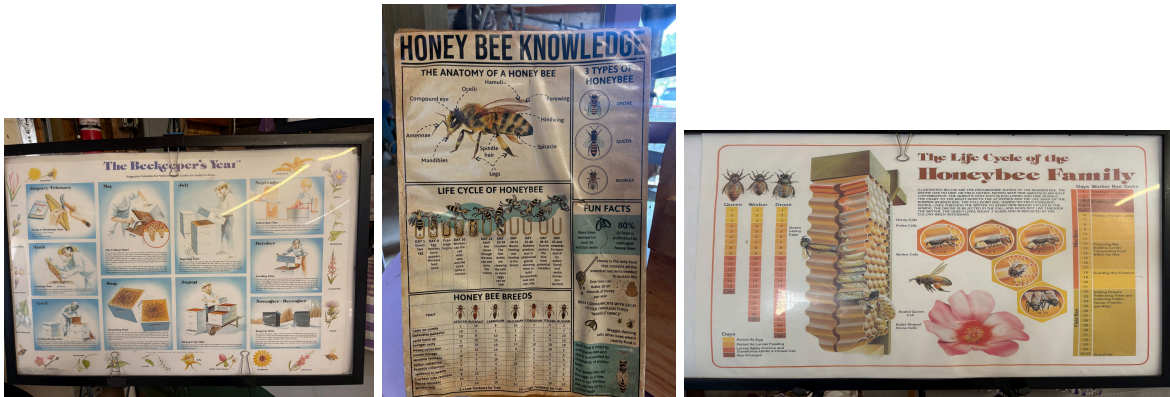


**Notes from Bee Man John Havicon Talk
(vice president of the El Dorado Beekeepers)
Aug. 5th at Bluestone Meadow Lavender Farm**



1 Beehive has boxes layered one on top of another. The big box is the brood box, the smaller box is the food box for the bees to eat their own honey and the top box is for the bee man to harvest.

5 gallons of honey can come from one box. (40 lbs)

Native bees in California are not honey bees. There are 1600 species. They are pollinators.

Honey bees came over from Europe.

Bumblebees only make a small amount of honey. They nest on the ground.

Honey bees' natural tendency is to make their home in trees high up.

Having bees will double your crop due to the extra pollination.

Beeswax can be generated at 5 lbs a box.

You can use it to make candles, soaps, lotions, and chap sticks.

Some people eat pollen for health

Some people also like the bee glue that bees use to seal up any cracks in their hive.

Bees have a 45 day life span. The worker bee works herself to death.

A bee starts out as a nurse bee and cleans the cells for new babies. After a few days she changes jobs and feeds the babies pollen or honey. Then in another few days they get the job of

construction bee and pulls wax off her body to build the frame for the honey. After that she becomes a guard for the beehive. Guard bees will dive bomb you to scare you off. They prefer not to sting you as then they will die. Their final job is to be a forager to collect pollen and nectar and return with it to the hive.

Skunks will knock on the beehive box at night to get the bees to come out so that they may eat them. This bee man raises his boxes off the ground 18" so that if the skunk "knocks" on the box he exposes his tender underarms to stings. This has been effective at keeping the skunks away.

Bears will tear a bee box apart to eat the baby bees because they are high in protein. They do not go after the honey.

John has 6 hives.

There are 30,000 bees in a hive.
There are 60,000 in a double box.

2,000 die off a day so 2,000 eggs are laid a day.

A male bee will mate with the queen. 10% of the hive are males. Males live 6 months. He dies after mating. Boy bees eyes appear much larger than worker bees eyes. Bees have 5 eyes. Boy bees do not have stingers.

A queen can live four years.

Royal Jelly is fed to an infant bee which makes it grow twice the size of a regular bee. Once a queen bee emerges she will sting the other cocoons to kill off any other pupas that were being groomed to be a queen bee. They can only have one. If there are too many bees in a hive the old queen will fly away and take half of the hive with her in a swarm.

A bee man can hold up a used frame that has honey in it and the bees will swarm onto it being attracted to the smell and then he can drop that part of the swarm into a bee box and repeat until he has the whole swarm.

The queen only mates once. She will mate with 10-50 different drones to ensure genetic diversity. She stores the sperm in a special organ to fertilize her eggs for her entire life. Queens don't lay eggs in the winter. Mid Oct. male bees are kicked out of the hive to die.

To extract the honey from the wax frames the beeman must shave off the caps that have sealed the honey inside. He then places the frames in a machine that spins to use centrifugal force to force the honey out of the frames. He harvests spring and fall but this year he has already had 3 harvests and will harvest again in the fall.

Lighter honey in the spring and darker honey is in the fall due to the blackberries.

Bees stay at a similar temperature as our bodies do.

To keep a queen bee from laying eggs in the box he uses for harvesting he places a metal grid between the bees box and his box so the workers can access it to make honey but the queen cannot access it to lay eggs there.

There is a little red dot mite that came from Asia that was destroying hives a few years ago. He keeps an eye to be sure his is not infected with it.

A half cup of bees is about 300 bees.

He checks on his hives every two weeks.

Bees collect both pollen and nectar.

He supplements his bees' food if the hive is new or if it is a hard winter by providing sugar water. This helps them make wax.

A flyer bee "vomits" nectar to the worker bee who "vomits it into a cell frame.

They flap their wings to evaporate the water out of the honey to make it thicker. If you harvest your honey too soon it will be runny. They must evaporate out 18% to thicken it.

He has a harvesting shed that the members of the bee keepers association share the use of.