

## Storing Your Honey

Recently I have had a number of beekeepers question me about things related to storage of honey. This year I took four samples of honey and put them in different locations. I have been watching the clarity of each bottle as a gauge to the speed at which crystallization takes place. The honey was not heated above 85 degrees during the extraction or processing. I let the honey settle in the sump tank for several days and drew the bottles off the bottom of the tank. The bottles that I drew off were in the middle of a batch of about 75 bottles to eliminate the possibility that something would be different between the first bottle out of the tank (which includes the honey in the valve) and the last (which does not).

I froze one of the bottles in my chest freezer. It is down around minus 10 degrees in there, I don't know for sure but it is a standard chest freezer. What I was trying to do is put the honey in locations that would be (or could be) used by the typical beekeeper. Another bottle I put in the refrigerator set on about a medium setting. I think that it is around 40 degrees there. I put a bottle in the garage. There is no heat in the garage so the temperature has been in the high fifties or low sixties. It is a lot colder this morning in there. I put the honey on a middle shelf where I store all of the extra groceries. The last bottle of honey I put on top of the refrigerator in the kitchen. It has been about a month or so since I put them in their spots. So far, the bottle that is on top of the refrigerator and the bottle that is in the freezer are just as clear as when I put them there. The bottle in the refrigerator is significantly cloudy and the one in the garage is very cloudy. I guess that what it proves is, don't store the honey in the garage and that a warm (or a freezing) location is better than a cool one. I am expecting that the one in the freezer will outlast them all. But time will tell for that one.

So what do we do with the honey that has set up in the bucket, or worse yet set up in the small jars? About the only way that I know of to liquefy honey is to add heat to it. The trick is to add just enough heat to cause it to liquefy and not destroy the integrity of the honey or to melt the bucket that the honey is stored in. Our standard plastic bottles will withstand 130 degrees or so but I have no idea what the critical temperature is for them before they start sending plastics into the honey. I have a tank that I settle honey in prior to filtering it. It has a water bath heater that surrounds the tank with heated water. I have placed honey in this tank while still in the bucket to melt it into liquid honey. Honey does not have to be hot to liquefy. A bucket will be free of crystals and liquid enough to run through a fine mesh filter at only 120 degrees. It takes several days at low temperature to thaw out a full bucket. I suspect that it will crystallize again though I am not sure how long it will remain in the liquid state. Some places that you might try to thaw out some of your bottles would be over a heater vent where the hot air blows over

the bottle. Make sure that you don't block the vent while you do this. I think that Jack Anderson reported that he thawed a bucket in front of his heater one time by letting the warm air blow on it. I have done the same. If you heat with wood it might be an idea to put the bucket behind the stove. I have read that the best warm temperature to store honey without affecting its taste or color is at about 85 degrees. It would be an interesting experiment to put a bottle in a hot tub for a few days to see what happens. Any beekeepers out there with a hot tub that want to give this a go and report back to me I will put the results in next month's newsletter. It would be great if we could justify hot tubs for business expenses and call them honey melters!

Steve Victors

