Spring Feeding - Bees

+Purpose	To increase brood March and April.
	Mitigate Winter Loss
	Increase # of capped brood cells to add to Production Hives/Nucs
	Increase bees in production hives before flow ends.
	May help bees outbreed varroa destructor.
	Increase/Speed up the bees creating drawn comb.
Caution	Feeding Pollen Before Trees release pollen/cold spells end MAY cause problems in weak hives.
	Feeding pollen too early MAY cause problems?
	Too much brood, not enough nurse bees, + Cold Snap - frames of dead larva
	Cold Spring reduces cleansing flights, MAY increase dysentery.

Sugar Recipes	Sugar: Water (We do not boil) (Only use white sugar) (old sugar water can grow mold).
1:1.25 to 1:1.50	This mix increases comb and brood production. (as long as there is pollen added. Next to your bees, drawn
	comb is the most valuable product in your bee yard. You need drawn comb to build a strong hive, and to
	'build out' in the early spring.
1:1	Increases the likelihood of bees making honey. Summer
2:1	Fall, build up for winter
	We use freezer bags, and shims when feeding. This keeps the sugar water in the top of a hive.

30 Days till Spring	Schedule for building up maximum brood early in the spring and max brood development.
End Feb/Early	Historically, there is a warm spell. By March, most of our bees are out of food. We feed on warm days with
March	NO wind. This is not the time to take a look – We do not even take time to see if the hive is alive.
	Feed – hive alive fondant patty
	Bees consume 10lb of honey a month to make it through February and March.
	If dry sugar is gone we add more that has hardened. We also spray with a hive alive mixture.
23 Days Till Spring	Hive Alive, Moist Sugar if they have eaten most of their sugar. The 'waste' they will throw out of the hive.
Pollen Map	Pollen Map of North America puts first pollen at March 1 in our region. Maple pollen is very high quality.
March	Trees are budding in our area. In the Kawarthas they are already splitting hives.
	Strong Hives will receive ¼ - ½ pollen patties with 2tsp of raw pollen added. This will help if there is a cold
	snap, and they cannot bring resources in.
	We will track the hive numbers of weak hives.
	Feed – probiotic, and ultra bee home made patty. Feed 1:25 syrup inside the hive (bagged) with hive alive
There is a cold	As soon as this ends, we add pollen and if the hive is a brood hive. We add 1:1.50 sugar water to weak
spell mid March.	hives. (Young bees do not forage. It may be 1 month before you have foragers.)
First Day of Spring	March 20
April 10 -15	Add pollen to increase brood. If it isn't needed, then the bees do not eat it. However, this is not a good idea
	in areas which have hive beetle problems. We will also add sugar water, inside the top of the hive.
	Once you choose a hive as a production hive, stop feeding sugar water.
	IN theory, bees will start drawing out comb now. Putting a box of empty frames
	Feed ultrabee patty if they still take it, probiotic, and water sugar (especially in Nucs)
April 25	Palmer hives will start making queens 3 weeks after the flow starts.
	Start swarm prevention. Early Foragers Should be hatching.
May 1	Production hives – remove all extra food. Move down any frames of honey into lower brood chamber.
	Breeder /Double Nuc/Palmer/Mating hives – keep adding pollen.
June 20,	Summer Solstice – End of Spring feeding strategy.
	Nucs are still fed, only high producing hives are still fed. Probiotic is fed once a month.
Packages/Nucs	½ hive alive, pollen patty, probiotics, sugar water.

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Notes:	
Winter Feed	Bees Need 10lb of honey to make it through the Month of March, when it is cold but they are also flying.
	No Pollen = No Brood
	Assuming your hives have enough foragers to bring back pollen and nectar is a dangerous theory. If you have
	a package, or a nuc, then it is best to assume there are not enough foragers to support the hive
	The cost of 2 hive alive patties vs the cost of replacing the bees, makes hive alive a cost effective preventative feed.
	Bees cannot eat dry sugar. We saw a video where Dancing Bee put 5lb of dry sugar on top, because it will
	have absorbed moisture enough that the bees could eat it by March. We only use about 2 cups in the
	November, and add more 'if needed the end of February/Early March.
Husbandry	"It's all about the heat." When we wrapped earlier, and unwrapped May 15, our hives produced more bees,
	which helped them over winter.
	Condensing hives/Vented Hives – no one is wrong. Each method works if you follow the protocol exactly, and
	you are in the right environmental area.
	Varroa Destructor females will live all winter with your bees. They will probably not reproduce, but they are
	able to live months when not breeding.
	Do not add a queen excluder on new boxes if you want the bees to draw out comb. Bees will not want to go
	through a queen excluder unless there is drawn comb above the excluder.
	If you want the bees to draw out comb, put it right above the brood.
Caution	If you feed using this you will need to start swarm prevention, watch for swarms, late April, or Early May.
	If we open a hive in winter – above zero, sun shining 'hot, NO wind. (Randy Oliveras opens hive in the snow).
	If you feed using this you will need to start swarm prevention, watch for swarms, late April, or Early May.
	Learn About swarm prevention and watch your hives. When you see a capped queen cell it is too late, the
	queen has already left (In theory). You need to be very proactive when feeding for max brood production.
	Why we feed late February. About 20% of our hives are out of feed, 50% are running low. There may not be
	enough foragers to sustain the hive until late April. However – opening a hive in the winter does pose the risk of chilling the hive.

Factors That May Effect Success

- $1. \ We \ overwinter \ singles \ and \ double \ nucs. \ Condensing \ hives \ with \ R24 \ to \ R30 \ value \ on \ top/R7 \ on \ the \ sides.$
- 2. If we need to add another box before May, we add to the bottom to prevent cold shock. (Ian Steppler). This still leaves the feed on the top of the hive.
- 3. If we have a honey super on a box we stop feeding. We do not barrel feed sugar water in the spring.
- 4. We will open hives in the winter because a) our average loss of bees to starvation is much higher than loss of bees to chill of the top when the hive is open. (we never inspect, or disturb the clusters.) and b), in our 2 southern most hives the bees fly almost year-round. They start building up in early March.

Note: This is a generalization of our feeding schedule that was developed over 3 years of trial and error. Most of our hives are in a low snow area with an average of 2-5" of snow. We also have high winds, up to 70kmp. There are many factors that will affect the success of your own feeding schedule. We hope our schedule will save you time developing your own methodology and feeding schedule.

We would like to thank Ian Steppler, Randy Oliveras, Bob Binney, UoG, UoMichigan, PennU, Dancing Bee, Kamon Reynolds, Michael Palmer, David Burns, and others for sharing their knowledge.