



Frequently Asked Questions

How do vaccinated queens work?

The vaccine works through Transgenerational Immune Priming (TGIP), whereby the maternal insect passes immunity to her offspring. The vaccine, containing a killed pathogen, is administered orally to queen bee via workers. As she ingests it, pieces of the vaccine are transported to her ovaries where it is deposited in the eggs. The developing larvae are exposed to the vaccine and start to build up immunity before they hatch.

What diseases do vaccinated queens protect against?

The vaccine is conditionally licensed by the USDA and CFIA to prime larvae against mortality from *Paenibacillus larvae*. This bacteria is the causative agent of American Foulbrood Disease (AFB), a highly contagious and devastating disease that destroys the developing bee larvae.

Learn more about new experimental data showing how vaccination significantly reduced DWV-B in a large commercial yard in [American Bee Journal](#).

Does the vaccine contain mRNA technology?

No, the vaccine does not contain mRNA technology. The vaccine contains inactivated (dead) *Paenibacillus larvae* bacteria, the causative agent of American Foulbrood Disease. The vaccine does not contain any chemicals or harmful preservatives and is suitable for use in organic agriculture.

Is the vaccine safe?

The USDA and CFIA have approved the vaccine for use and reviewed Dalan's data indicating that the vaccine is safe. After over 5 years of study using thousands of doses of vaccine, immune priming has never indicated a negative impact on queen fitness or honey composition.

How long does the immunity last?

The immunity lasts up to one generation. We recommend requeening annually with vaccinated queens.