IMPORTANCE AND MEASURES OF THE PROTECTION OF HONEY BEES FROM TROPILELOSIS (WITH A SPECIAL FOCUS ON MONTENEGRO)

Mirjana Bojanić Rašović[1*]

[1]Biotechnical faculty, University of Montenegro, Mihaila Lalića 1, 81000 Podgorica, Montenegro
[*]e-mail: bojanic.m@t-com.me

Abstract

Tropilelosis is an ectoparasitic disease of bee brood and adult honey bees caused by four types of mites of the genus *Tropilaelaps*: *Tropilaelaps clareae, Tropilaelaps mercedesae, Tropilaelaps koenigerum* and *Tropilaelaps thaii*. Parasites are transmitted by direct contact of bees within one bee colony or contact of bees between bee colonies.

During the feeding with hemolymph of bee larvae and puppets, these mites transmit viruses, such as virus of deformed wings (DWV) and black queen cell virus (BQCV). Tropilelosis is on the list of dangerous infectious diseases of the International Organization for Epizootics (OIE). Infestation with this mite causes the death of up to 50% of the bee larvae. It is most commonly found in tropical areas, where throughout the year there is a bee brood that is necessary for the development of parasites. Due to the increasing impact of climate change, uncontrolled imports and the movement of bees and bees' products, there is a great danger that this parasite will spread to Europe. Poor management in beekeeping, microclimate in beehives and weak bee colonies increase the spread of tropilelosis. In order to prevent the occurrence of this disease in Montenegro, special measures for protecting bees should be defined by adopting new regulations. By removing the bee brood from colony, destruction of all mites in just three days is achieved.

Chemical treatment is not recommended for the fight against tropilelosis. During the first occurrence of tropilelosis, destruction - the burning of infected beehives is recommended.

***Key words**: Tropilaelaps spp., Tropilelosis, bee diseases, Apis mellifera, Montenegro.*