BPRACTICES

New indicators and on-farm practices to improve honeybee health in the Aethina tumida era in Europe

Challenge

European beekeeping suffers significant regional differences in colony losses due to external impacts on beekeeping, including climate and prevalence of diseases. This situation is likely to worsen with the spread of Aethina tumida (Small Hive Beetle – SHB). Together with other bee diseases, this new parasite may play an important role in colony losses and to beekeeping economy.

Objectives

This project aims to develop Good Beekeeping Practices adopting new clinical methods, and biomechanical and innovative biomolecular techniques respecting the natural behaviour of bees.

Expected results

The research activities will focus on developing new biosensors from honey to monitor SHB presence and PCR techniques to diagnose honeybee diseases from debris, in collaboration with the EURL for Honeybee Health. Another goal will be to accelerate and raise efficiency of the clinical inspection of hives to detect SHB. At the apiary level, a bee-friendly management strategy will be developed to monitor and control honeybee diseases, protecting their health and avoiding the application of chemical treatments guaranteeing quality and safety of hive products.

Potential Impact

Innovations will be validated in the daily apiary activities and disseminated internationally in collaboration with TECA/FAO, APIMONDIA and EPBA. The economical impact on the beekeeping industry will be quantified. Consumers will be aware of the positive environmental impact of beekeeping and the ecosystem services provided, thanks to a cutting-edge traceability system using QR-code/RFID technology.

EUROPEAN RESEARCH AREA ON SUSTAINABLE ANIMAL PRODUCTION

ERA-NETSUSAN

BPRACTICES CONSORTIUM

Country	Consortiumpartners	Funded by
IT	Instituto Zooprofilattico Sperimentale del Lazio e della Toscana 'M. Aleandri'	MoH
	Instituto Zooprofilattico Sperimentale delle Venezie	
AT	Austrian Agency for Health & Food Safety	BMLFUW
SL	Agricultural Institute of Slovenia	MKGP
ES	Centro de Investigación Apícola y Agroambiental de Marchamola	INIA
TR	University of Namik Kemal	TUBITAK
US	Mississippi State University	other

RUNNING TIME

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FUNDING

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