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THE LEVEL OF STUDY OF THE BIOLOGY, FAUNA AND ECOLOGY OF COCCINELLIDS

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Annotation: The article presents information on the biology and ecology of the khanqiz in the Bukhara region. It talks about the importance of species belonging to the Coccinidae family in nature and in farms.

Key words: Biology, classic, parasite, pathogen, insect, weevil, entomophagous, seven-pointed, eleven-pointed, ladybird, larva, spider mite.

Relevance of the topic: The interest in coccinellids, or coccinellid beetles, dates back to the great European biologist Carl Linnaeus, who recommended coccinellid beetles and goldeneyes in the fight against plant aphids. And Erasmus Darwin advised to use beetles to clean greenhouses from plant lice. In England, in order to eliminate plant aphids, it was proposed to spread the pest control beetles in the fields and greenhouses. But in 1888, Rhodolia Sardinalus Muls from Australia against the spiny worm in California. introduced, the extremely high and positive effect obtained due to their use on citrus plants, a fundamental change was made in the biological protection of plants.

Later, the introduction of the Rhodalia beetle to many countries, including Egypt in 1890 and the Hawaiian Islands in the same year, and about 30 other countries, the Rhodalia beetle's control of the Yceria beetle proved again and again that it is an important natural compound.

In Russia, the first scientific works on the use of biological control methods against harmful insects are directly related to the name of the famous Russian scientist I.I. Mechnikov. In the late 70s and early 80s of the 19th century, he identified fungal and bacterial pathogens of the grain beetle - Anisoplia austriaca, and a number of successful experiments on the use of muscardine pathogens. spent I.M. Krasilshik continued the work of I.I. Mechnikov and for the first time in the world carried out many mushroom cultivation works.

The Rodalia cardialis beetle was brought to the former CCCR from Cairo in 1831 and bred at the Institute of Plant Protection (Leningirat, now Sang-Peterburg) in laboratory conditions, and was used against the hookworm in and around Sukhumi, and as a result got rid of the pest for a long time.

In world practice, Rhodalia and other species of coccinellids, in particular, Lindorus lophanthae Blaisd; Cryptogunus orbiculus var. nigripennis Wse; Orcus

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chaybeus Boisd; Extensive research has been conducted in the field of introduction and acclimatization of effective beetles such as Chilocorus perniciosa Comst.

In addition, many of our scientists have also conducted research on khanqizi beetles. V. V. Yakhontov, Z. K. Adilov explained a lot of information about the importance of Khanqizi beetles in the biological control of plant pests, their distribution in the area, protection of local species; L. S. Ulyanova studied the issue of introduction and acclimatization of khanqizi beetles; V. V. Yakhontov, Z. K. Adilov, A.K. Mansurov, A. Sh. Hamroyev, Y.Q. Babanov studied the wintering characteristics of many khanqizi species; C. A. Mangutova on the biology, ecology, composition and trophic relationships of the khanqizi beetle of orchards of Karakalpakstan; The importance of coccinellids in reducing the number of pests of fruit trees was explained by H.H. Murotov, A.G. Those who analyzed state documents; T. Vokhidov on the biology of some beetles of apple trees of the Fergana Valley; A. K. Mansurov studied the species composition of biogeocenoses of Jizzakh region in depth. From the history of biological protection of plants. Attacks of pests and various diseases are considered a huge disaster on earth, they cause damage to a large part of the crop during the period of development of agricultural plants and storage of products. In some years, harmful organisms not only kill 60-80 percent of crops, but also cause dangerous infectious diseases in plants, animals and humans. That is why various methods, especially chemical control, are widely used against the most dangerous pests. Although the chemical method is widely used in the world experience in the fight against pest insects and other arthropods, it was found that such insectacaricides do not have sufficient selective effect, that is, biological agents of pesticides are primarily natural compounds that prevent the mass development of pests. considered entomophagous destroys insects, insectivorous birds and others

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