Citizen science and its role in entomological research: study in Teatinos Campus (University of Málaga)

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Abstract

Climate crisis implies large-scale accelerated changes which research groups can't tackle on their own. That's why citizen science has become a tool with the potential to generate useful data that helps to reduce uncertainty about these dynamics. Citizen science is the scientific research that includes the collaboration of the non-specialized public, along with scientists and professionals. This research compares data obtained through citizen science with other experimental ones to verify their quality to be used in entomological biogeographic studies.

Experimental data was obtained through seasonal sampling in different areas of the Teatinos Campus from University of Málaga, identifying the entomofauna at the family taxonomic rank. Citizen science data was obtained through the participation of the university community using the iNaturalist platform.

Citizen science is limited by the size of the organisms and the quality of the photographs. The statistical test showed that no significant differences were found between the abundance data obtained experimentally and those that have the contribution of citizen science. However, Citizen Science provided interesting data in the presence/absence study that was not obtained with the experimental one. This can be very useful in detecting the presence of invasive species.

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