Understanding how personalities and motivations affect participation in citizen science

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Abstract:

As citizen science projects heavily rely on their members' voluntary participation in contributing ideas, co-creating projects and especially collecting data, it is crucial to understand motivations and factors that affect an individual's decision to take part. This study seeks to understand how people's personality traits affect their appraisal of citizen science projects and their likelihood of participating in them. We selected five typical citizen science projects that represent a broad range of topics, levels of difficulty and execution modes as a basis for our investigation. While other studies only focus on the motivation of participants who already took part in citizen science activities, this study also targets participants without prior experience, who might volunteer in citizen science projects in the future. By using a structured survey that includes questions on personality traits, functional motives and subjective evaluation of the five sample projects, we seek to report respondents' most important intrinsic motivations for citizen science. Apart from these intrinsic motivations, we also explore the use of monetary incentives to encourage participation in citizen science tasks, which might be used in the future to recruit participants and improve data quality. The study participants' expectations regarding monetary rewards can be used to improve existing algorithms and design new methods that fairly and efficiently distribute rewards.