Collecting Data With Citizen Science:

Ways to help your researchers make a big impact

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What is Citizen Science?

Public participation in scientific research.

Concept dates back to the 1800s with lighthouse keepers collecting data about bird strikes to share with scientists.

Today, volunteers can participate in citizen science in a variety of ways such as:
Taking pictures of wildlife, observing weather, identifying galaxies, transcribing old records, identifying animals in pictures, and many more!

Why Citizen Science?

The amount of data being produced is growing exponentially!

How much data?

The SSDS project is expected to collect 15-30 TB of data every night by 2022. And that is just one of thousands of projects!

Volunteers help process and collect data!

Some tasks are actually performed better by volunteers than computers.

Other projects are using volunteer responses to help train computers to be able to complete the task in the future.

Benefits for Participants

Encourages students to:

- Pose questions,
- Generate and analyze data,
- Draw conclusions, and
- Communicate findings.

Promotes engagement with the process of science.

Promotes Science Literacy!

Benefits for Researchers In the classroom:

Projects can be incorporated into all levels of courses in or outside of science subjects.

Enhances undergraduate education through inquiry-based learning.

Involves undergraduates in:

- Project design,
- Data collection and management, and
- Independent research.

With their research:

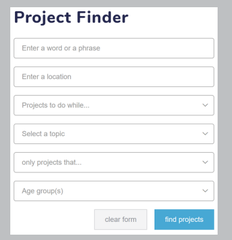
Many projects can benefit from incorporating volunteers into the collection or processing of data.

Exploring many types of citizen science projects will increase your familiarity with the numerous creative ways that others have expanded the scope of their research by enlisting the public.

Where to Start

Scistarter.org

A platform to find, join, and contribute to science through more than 3,000 formal and informal research projects, events and tools.



iNaturalist.org

A platform to record observations of biodiversity that shares data with scientists through research repositories.

References:

Oberhauser, K., & LeBuhn, G. (2012). Insects and plants: Engaging undergraduates in authentic research through citizen science. Frontiers in Ecology and the Environment, 10(6), 318–320. https://doi.org/10.1890/110274

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