

CGA/19/51 - The outdoors citizen science project: further development of an App-based platform, and citizen scientist approaches to data collection

Our Outdoors is a citizen science project designed to engage citizens in describing and/or evaluating the quality of public outdoor spaces in terms of its impact on health and wellbeing. Citizen science typically refers to research collaborations between researchers and volunteers, to expand opportunities for data collection and to provide access to the data for community members. It is a method widely used in the environmental sciences, but has been less used in public health. In terms of public health, citizen science or similar approaches may provide better knowledge of a health issue, empower communities, and improve community health.

We have developed a questionnaire (using a citizen science approach) to measure the relationship between health and outdoor space and have piloted it on a small scale in Edinburgh (137 completed questionnaires). The aim of the questionnaire is to enable users and researchers to:

- 1) locate spaces needing investment and improvement;
- 2) promote high quality outdoor spaces linked with wellbeing; and
- 3) evaluate interventions designed to improve outdoor spaces.

We have a lot of interest from organisations such as Sustrans and Edinburgh City Council (and local Government in Australia) that want to use citizen science methods and our questionnaire to evaluate their work (e.g. cycle paths, events such as Open Streets). To make data collection easier, engaging and accessible for citizens, we are currently developing an App (OurOutdoors App) based on the questionnaire. Using the App or a paper-based questionnaire, citizens will answer questions about how they feel in a particular space that can be converted to 'rating' scores. They will also describe some of the attributes of the space (e.g. if there are trees, litter, safety issues).

We are applying for funding so that the scores from survey can be converted to 'ratings' and displayed on electronic maps making the data visually interesting, useful, and engaging. These data can then be used by a variety of stakeholders including citizens, researchers, and public bodies such as local councils. The App, and the most effective methods to involve citizens (in both the project and in using the App and survey), need further development before they ready to be used for research and evaluation.