

# [Influence of location on ecology views](https://assignbuster.com/influence-of-location-on-ecology-views/)

City, rural and Costal backgrounds: Does Location Influence our outlook on ecology?

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Summary

Conservation has gradually gone from being an issue to a select few, to now a global phenomenon. The widespread harmful aspects of human activity on the biophysical environment have reached catastrophic levels. The amount of greenhouse gas in the atmosphere is already above the threshold that can potentially cause dangerous climate change. “ We are already at risk, it’s not next year or next decade, it’s now.” Report from the UN Office for the Coordination of Humanitarian Affairs (OCHA). Although the damage up until now is largely irreversible, conservation is the key to limiting any further damage to the global environment. If these issues are not urgently addressed the list of animals on the endangered species list will exponentially increase at an alarming rate. The future welfare of the planet, flora and fauna depends on how the world responds to the current global crisis. Human beings are guilty of robbing the world of its natural resources, impacting ecosystems and habitats of wild animals. Re-education of how we manage the earth and its resources, and the animals and planets which live in it, is vital for future generations. With this in mind, this study will look to see if location, either urban, rural or coastal, has a direct effect on one’s knowledge and understanding of the natural world around them, and whether or not this impacts their attitudes towards conservation and animal welfare issues. This will hopefully make way for future research in order to raise awareness of what communities are more likely to be lax about environmental issues, and could benefit from more information/conservation schemes to improve the world in which we inhabit.

Research Background

Much of the previous research in this area has focused largely on cross-cultural studies, which observed the relation between how people conceptualise nature and how they act in it. “ Tragedy of the commons” is a theory proposed by Garrett Hardin, according to which individuals, acting independently and rationally according to each one’s self-interest, behave contrary to the whole group’s long-term best interests by depleting some common resource (Hardin, 1968). The concept is often cited in connection with sustainable development, meshing economic growth and environmental protection, as well as in the debate over global warming. “ Commons” can include the atmosphere, oceans, rivers, fish stocks, national parks and any other shared resource. The tragedy of the commons occurs when individuals neglect the well-being of society in the pursuit of personal gain and thus it is this attitude, which varies largely across cultures, which has become one of the most central, yet diverse, problems in environmental welfare decision making. A number of researchers have however noted many examples in which commons have been and are being successfully managed (Atran, 1986; Berkes, Feeny, McCay, & Acheson, 1989; Deitz, Ostrom, & Stern, 2003; Ostrom, 1999). Key factors in these successes include a closed-access system and having social institutions in place to monitor use and punish overusers. This again shows that depending on the measures in a particular location, the outcome of people’s attitudes towards conservation and ecology can be influenced.

Lo´pez, et al, (1997) found that US undergraduates and Itza’ Maya of Guatemala showed a different pattern of responding on a category-based inductive reasoning task involving mammals, indicating a clear difference in knowledge and understanding the essential nature and underlying properties of animals ranging across two very different cultures.

In a two part study carried out Schultz, results showed that participants instructed to take the perspective of an animal being harmed by pollution scored significantly higher in biospheric environmental concerns than participants instructed to remain objective (Schultz 2000). This implies that concern for environmental issues is fundamentally linked to the degree to which people view themselves as part of the natural environment. This implies a potential link between location and knowledge of nature, and levels of concern for both environmental and animal welfare which is what this future investigation aims to distinguish.

Hypothesis

In relation to the previous research carried out, which illustrated that there is a link between location and understanding the essential nature and underlying properties of plants and animals, it will be expected that [1] urban dwellers will have less experience of country, shore and sea life and will therefore have a lesser knowledge of the essential nature- and the underlying properties of both plants and animals, meaning they will score less than country and coastal dwellers on the ‘ knowledge of nature’ section of the questionnaire. [2] This will therefore lead to urban dwellers being less enthusiastic about conservation issues, due to rural/coastal dwellers witnessing, first hand, the effects of environmental issues damaging their surrounding areas more obviously than in less ‘ green’ urban areas- (oil covered birds, woodlands destroyed etc). [3] Urban dwellers will also be less passionate regarding issues to do with the treatment of animals, due to reduced contact with them, and more physical distance from many animals, compared to living in the countryside or coastally, meaning they will also score less on both ‘ attitudes towards conservation of the environment’ and ‘ attitudes towards the treatment of animals’ sections. The null hypothesis would be that participant’s location does not directly impact their knowledge of the essential nature and underlying properties of plants and animals, nor does it directly influence their attitudes towards conservation and animal welfare.

Method

Equipment

Participants will be briefed and a consent form will be completed online. Participants will then be asked to fill in an online questionnaire which should take no longer than half an hour to complete. The software platform for this online questionnaire will be TypeForm.

Participants

Participants will most likely be both male and female university and college students around the age of 18-25, with varying races and socio-economically backgrounds. Participants will be mostly self-selected to participate; having chosen this study to fulfil a research participation requirement scheme (STREP) enforced By Heriot Watt University. The questionnaire may also be sent to several other students at different university and college campuses in and around Edinburgh.

Data Collection

Data will be collected using an online survey. The questionnaire will be organised to ensure that questions are grouped into 4 categories. Participants will receive a ‘ score’ for each section- [1] Location of the participant- including previous locations, location preferences, how often they visit coastal/country areas if they aren’t coastal or country dwellers etc [2] Attitudes towards conservation of the planet- such as recycling, which environmental issues they are concerned with, how green they consider their lifestyle to be etc [3] Attitudes towards how animals are treated- views on vegetarianism, hunting, animal testing, free range, animals as pets, animals in captivity etc [4] \*Still developing a way in which I can assess participants knowledge of essential nature- and the underlying properties of both plants and animals\*

Variables

Due to this study being observational, no manipulation of variables has occurred. The predictor variable for this study will be location of the participants, and the three outcome variables will be [1] knowledge of the essential nature and underlying properties of plants and animals, [2] attitudes towards conservation, [3] attitudes towards animal welfare.

Measures

No ‘ scales’ or ‘ measures’ exist for either the predictor variable nor the outcome variables of this study, therefore the questionnaire will be tailored to attain sufficient information from each section to allow a score to be allocated to each participant for each of the four sections. Each section will have between ten and fifteen questions. Firstly the questions will be assessing the location of the participant- most importantly whether they consider themselves to live in an urban, country, coastal or suburban area. Also included in this section will be questions to do with the length of time the participant has lived in Great Britain, how often the participant engages with the outdoors, if they have any access to parks or country walks nearby, if they have a job that involves working outdoors for extended periods of time, and also basic factors such as gender, age and ethnicity. Secondly, questions will be asked about attitudes towards energy conservation. This encompasses recycling, travel, lifestyle choices etc, which all could be seen to negatively impact global warming and conservation. Thirdly, questions about attitudes towards the value of animals will be asked- dietary choices, opinions on animal testing, hunting sports and keeping animals in captivity.

The fourth element of the questionnaire is going to be a picture match (similar to that previously conducted in “ Cultural Diï¬€erences in Children’s Ecological Reasoning and Psychological Closeness to Nature: Evidence from Menominee and European American Children” (Unswortha et al). TypeForm Software allows a picture match, so 4 pictures will be presented, two will be matched somehow- ie. Same diet, both give birth to live young, both live underground, both young are called ‘ kits’ etc, the participant scores 1 point for every pair correctly selected. There will be other multiple choice questions in this section to further assess the participant’s knowledge and understanding of nature, animals, plants and the planet. Again, the point scoring will continue- 1 point for every correct answer. For all questions there will also be an option to pass on the question, this will be in place to minimise participants randomly guessing, or cheating in order to avoid feeling embarrassed by selecting the wrong answers.

Sections will be scored using a point system: for example one question could be “ Which do you use more- bath or shower”- due to a shower conserving water, if this answer was selected the participant would receive 2 points, if they selected bath they would receive 1 point and so on. Participants will end up with 4 scores- one for location, one for conservation, one for animal treatment and one for knowledge of nature.

ie. Rural participant may score 32 out of a possible 50 for conservation, whereas an urban participant may only score 19.

Procedure

Participants who chose to take part in this study by either signing up on the STREP system or through email, will be sent a brief if the study and a consent form. The brief will outline what the study will entail and stated that the participants will remain anonymous, with the exception of providing information regarding their age and sex, and will explain that participants have the option to withdraw from the study and ask for the data t not be used at any point. Once the consent form is signed, the participants will be asked to complete the online questionnaire. The participants will then be given a debriefing and, if applicable, be awarded their STREP credits.

Analysis

The data will be analysed using SPSS. (\*\*\*Unsure which tests to use\*\*\*)

Limitations

There could be many problems and limitations to this study. With time and funds restrained sample size will be limited and not representative of the entire population raising questions of the validity and ability to generalise the findings of the study. Many of the students asked to fill out the question may answer the questions untruthfully or may ‘ skip’ some questions, and some may drop out the study leading to missing data.

## References

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SCHOOL OF LIFE SCIENCES ETHICS COMMITTEE

Application Form (click on the grey boxes to insert text)

Section A: Project Overview

1. Project Title:

City, rural and Costal backgrounds: Does Location Influence our outlook on ecology?

2. Approval sought: Full approval Re-Submission In principle

Contact Information

3. Responsible Staff Member:

a) Name: Thusha Rajendran

b) Telephone: +44 (0)131 451 3456

4. Investigator (if different from Responsible Staff Member):

a) Name:

b) Telephone:

c) Email:

5. Duration of Proposed Project: February 2014 – ????

6. Anticipated Start Date: February 2014

7. Does the proposed research involve human participants or living animals in any way?

Yes No

Note. Involvement of human participants includes obtaining information from people through methods such as experiments, observation, surveys or interview, or any use of previously obtained personal data, or any use of human tissue samples.

If your answer to Question 7 is ‘ yes’ complete the rest of the form; if it is ‘ no’, simply sign the declaration at the end of the form.

8. Please provide a brief summary of the proposed study (if possible, in less than 300 words. Include an overview of the design, variables, and other ethically-pertinent considerations). Feel free to attach a document if convenient.

Section B: Administration

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| --- | --- |
|  | YesNo |
| 1. Will participants be appropriately informed of: the aims of the study; their ethical rights; their expected contribution; and their subsequent debrief? For example, their right to withdraw, any deception employed or potential consequences of the study. |  |
| 2. Will consent be obtained from all appropriate parties? |  |

Section C: Ethical Considerations

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|  | YesNo |
| 1. Will the study require participants to potentially experience stressful or unpleasant situations? |  |
| 2. Will the data collection and management (storage & disposal) potentially compromise the interests of the participants? For example, body fluids, tissue samples or other personally identifiable materials, such as, visual, auditory or other data? |  |
| 3. Will payment or non-payment of participants have potentially negative implications in the study? |  |
| 4. Are there potential negative outcomes from the study for the participant? For example, compromise to or damage of, their physical, psychological, financial or social wellbeing. |  |
| 5. Are there any other potential negative outcomes from the study? For example, damage to property or risk of criminal or civil liability. |  |
| 6. Would you identify any other issues that may have potential ethical implications for your study? |  |

Section D: Further Information Regarding Ethical Considerations

If you responded ’No’ to any questions in section B, or ‘ Yes’ to any questions in Section C, please provide further information, indicating how you would address this issue. Please be as comprehensive as possible, as this will speed the process for the referees and may avoid the need to contact you for further information or clarification.