Name of author: Harrison Esam Awuh

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Abstract

Mindful of the significance of human behaviour as a major driver of most environmental problems, it is increasingly becoming acknowledged that efforts to promote positive global environmental outcomes must now include attempts to understand local attitudes concerning environmental issues. These attitudes are influenced by worldviews which people hold. Nevertheless, environmental attitudes in Africa have not received much attention. To date, most research on environmental attitudes has been western-centric.

An analysis based on questionnaire surveys in Cameroon, Egypt and Ghana revealed that environmental attitudes are largely influenced by utilitarian values. People are less reluctant to make pro-environmental changes in their lives if these changes are going to threaten their ability to fulfil basic needs such as food. On the other hand, people are more willing to make pro-environmental changes in their lives in the domain of broader issues which do not have direct impacts on their abilities to fulfil basic needs. The findings also show that basic needs are not solely financial. A basic need can also be a cultural factor such as religion and this accounts for regional differences in environmental attitudes in Africa.

This research amplifies calls for the framing of pro-environmental knowledge in Africa either within the utilitarian domain (with the provision of ecosystem services which address basic needs such as the food and water), or the socio-ecological systems approach which is consistent with holistic framings of nature and culture as one in several conventional African societies.

Key words: Environmental knowledge; pro-environmental attitudes; Africa; basic needs

Biography of Author

Harrison Esam Awuh

Food and Healthy Living Group, Aeres University of Applied Sciences Almere. Stadhuisstraat 18, 1315 HC, Almere, The Netherlands.

Harrison Esam Awuh holds a PhD in Human Geography (political ecology) from Katholieke Universiteit (KU) Leuven, Belgium. He is currently a senior researcher in healthy and sustainable food systems transitions at Aeres University of Applied Sciences, Almere (The Netherlands). He is also a guest researcher at the African Studies Centre, Leiden (The Netherlands). He holds two Masters degrees in Natural Resource Management and Human Geography; and a Bachelor of Science (hons) degree in Geography. His research interests focus on power relations, exclusion, inclusion, discourse, and sustainability. In addition, he serves as a senior research partner in the HORIZON 2020 Healthy Food Africa European Union funded project. He is originally from Cameroon and currently resides in the Netherlands.

Introduction

Research on environmental knowledge has a long and rich history within the social sciences. This environmental knowledge constitutes worldviews which people hold. A worldview can be defined as a comprehensive set of assumptions and beliefs about the universe, causality and nature (Myers and Russell, 2003). In other words, a worldview represents a basic way of seeing the world. Therefore, seeing the world ecologically often leads to taking on pro-ecological roles, and affiliating oneself with environmentalists, nature, and ecological systems. Consistently engaging in a variety of pro-ecological behaviours and practices allows a person to express, verify and reinforce his or her ecological identity (Burke and Stets, 2009). The stronger a person endorses an ecological worldview, the stronger ecological identity he or she will have (Walton and Jones, 2018).

Based on an analysis of the relationship between environmental attitudes and behaviour, an ecological worldview and the awareness of the consequences of environmental conditions (attitudes) will positively influence environmentally responsive behaviour (Ogunbode and Arnold, 2012). Tarrant and Cordell (1997) found that these two measures (worldviews and attitudes) positively predicted pro-environmental behaviour. Also, studies within western socio-cultural contexts strongly suggest that positive attitudes are important antecedents of pro-environmental behaviour (see Fielding et al., 2008). In this paper, environmental attitude is understood as the evaluative tendency or disposition to respond in a favourable or unfavourable manner towards environmental problems (Milfont et al., 2010). Environmental attitudes consist of the collection of beliefs, effects, and behavioural intentions that a person holds about environmentally-related activities or issues (Schultz et al., 2005).

Hence, a proper examination and understanding of environmental attitudes is arguably essential for the promotion of pro-environmentalism (Milfont and Duckitt, 2004). It is important to note that attitudes do not determine behaviour directly. Attitudes influence behavioural intentions which in turn shape our actions (Kollmuss and Agyeman, 2002). In its simplest form, there is assumed to be a linear progression of environmental knowledge leading to environmental awareness and concern (environmental attitudes), which in turn was thought to lead to pro-environmental behaviour.

However, this simplistic assumption has been proven to be oversimplistic because research has shown that increases in environmental knowledge did not lead to pro-environmental attitudes or behaviour (Owens, 2000). At least 80 percent of the motives for pro-environmental or non-environmental behaviour seem to be situational factors and other internal factors (Fliegenschnee and Schelakovsky, 1998) and only a small fraction of pro-environmental behaviour can be directly linked to environmental knowledge. Therefore, there is a discrepancy between knowledge, attitudes and behaviour.

Generally, environmental attitudes vary across societies and cultures (Sarigollu[®], 2009), and although there has been an extensive debate on the subject (Brechin, 1999; Fairbrother, 2012), and, while the incidence of overarching environmental issues, such as climate change and global warming, and related issues such as Covid-19 have driven many societies around the world to reconsider and adjust their relationships with nature, there has been little systematic study of contemporary environmental attitudes in Africa. According to Kim (1999), environmentalism in developing regions is rooted in multiple diverse factors and is qualitatively (and quantitatively) different from Western environmentalism. Even within Africa significant difference in contextual factors exist and these shape pro or anti-environmental attitudes. The question is: what drives people to develop pro or antienvironmental attitudes in Africa? Or, what determines environmental attitudes in Africa? It has long been established that the answer to these questions is extremely complex (Kollmuss and Agyeman, 2002). Answers to these questions will help increase our understanding of environmental knowledge and specifically, attitudes in this relatively underexplored context. Several models have been developed to explain why people make the choices they make in life. The ones with the most relevance to this paper will be explored in the next section.

Conceptual framework

Altruism, Empathy, and Prosocial Behaviour Model is a framework for analysing pro-environmental behaviour. Prosocial behaviour is defined by Eisenberg and Miller (1987) in this model as, 'voluntary intentional behaviour that results in benefits for another: the motive is unspecified and may be positive, negative, or both (Lehmann, 1999: 33). Altruism is a subset of prosocial attitude. Borden and Francis (1978) and Lehmann (1999:34) hypothesize that:

1. Persons with a strong selfish and competitive (and survival) orientation are less likely to act ecologically;

2. People who have satisfied their personal needs are more likely to act ecologically because they have more resources (time, money and energy) to care about bigger, less personal social and pro-environmental issues.

To support the hypotheses above, this paper makes reference to Geller's 'actively caring' hypothesis (in Allen and Ferrand, 1999). In the 'actively caring' hypothesis, Geller hypothesized that in order to act pro-environmentally, individuals must focus beyond themselves and be concerned about the community at large (Allen and Ferrand, 1999). Geller suggested that this state of 'actively caring' can only occur if basic needs have been satisfied.

These aforementioned assumptions of Geller, Eisenberg and Miller reflect other studies and models such as Maslow's hierarchy of human needs. Abraham Maslow suggests that people are motivated to fulfil basic needs before moving on to other more advanced needs (Maslow and Lewis, 1987). Maslow believed that people have an inborn desire to be self-actualized, that is, to be all they can be. In order to achieve these ultimate goals, however, a number of more basic needs must be met such as the need for food, safety, love, sex, and sleep. Once these basic needs have been met, people can move on to the next level of needs. The top of the level of needs is characterized by growth needs (what Maslow refers to as self-actualisation). He defines self-actualization as a process of growing and developing as a person in order to achieve individual potential. Although Maslow's pyramid of hierarchy needs was not specifically designed to explain pro or anti-environmental attitudes and behaviours, its distinction between basic needs and more advanced needs offers insight into the hierarchy of environmental needs.

Our basic needs are our priorities over more advanced needs. Most important to us as people is our own well-being and the well-being of our families. When pro-environmental expectations are in alignment with these personal priorities, the motivation to do them increases. If they contradict the priorities or threaten our means to achieve these personal priorities, our attitudes are less likely to change. Festinger (1957) states in his theory of dissonance that we unconsciously seek consistency in

our beliefs and mental frameworks and selectively perceive information. Information that supports our existing values and mental frameworks (need for survival) is readily accepted whereas information that contradicts or undermines our beliefs (need for survival through satisfying our basic needs) is avoided or not perceived at all. Festinger's theory implies that we tend to avoid information about environmental problems because they contradict or threaten some of our basic assumptions of quality of life, economic prosperity, and material needs. In other words, when pro-environmental expectations or norms are in alignment with personal priorities, the motivation to abide by them increases (e.g. buying organic food). If they contradict the priorities, pro-environmental action will less likely be taken. Additionally, Rokeach (1973) also suggested that when a subset of values is activated in a specific situation, the values that are perceived as relevant to the salient actions may favour various behaviour depends on the importance of the value in the person's hierarchy. Values that address basic needs rank higher in a person's hierarchy than values which address much higher aesthetic needs. See Figure 1 for an illustration of the conceptual framework for this paper.

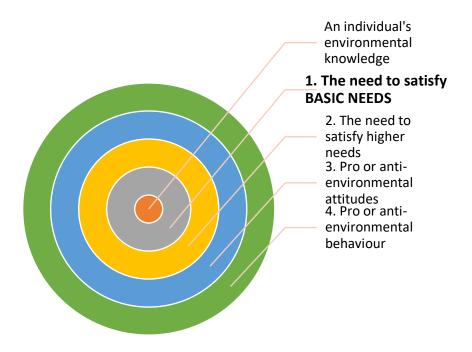


Figure 1: Overview of conceptual framework

However, there has been criticism of this needs-based approach to motivation for behaviour. For example, Wahba and Bridwell (1976) and Hofstede (1984) while acknowledging that human beings do have needs to be met, questioned the existence of a rigid order of needs for every individual and society. Cianci and Gambrel (2003) have criticised the needs-based approach as too simplistic and suggest that it does not account for societal needs at critical times such as recession and war (and a pandemic such as Covid-19 this study adds). However, Maslow (1954) acknowledged that the needs pyramid does not need to be considered as rigid because needs are not mutually exclusive and may overlap based upon which need dominates and motivates the individual at any one time dependent upon individual psychological and physical circumstances. Therefore, this study acknowledges that depending on the situation, the importance or definition of what constitutes basic human needs may be lower/higher/different from place to place. Any kind of food will be considered a basic need in

some places, whereas, in other places any kind of food is not a basic need - it might need to be healthy and sustainable. To some people, just having a roof over their heads might be a basic need. To others, a house as a basic need needs to be a nice house in a good neighbourhood. Just having a place to sleep could be a basic need to some, but, to others a basic need will be ensuring that the mattress has good quality. So, in the context of this study, basic needs refer to the bare minimum required to survive. For analytical purposes, anything more than the minimum required is considered as a higher-level need.

Despite criticism of Maslow's basic needs approach, a study put the hierarchy of needs to the test in different countries all over the world. The researchers analysed surveys on food, shelter, safety, money, social support, respect, and emotions taken in 123 different countries between 2005 and 2010 (Tay and Diener, 2011). The findings of this study revealed that despite notable differences with some aspects of the order of needs, Maslow's theory is largely correct (Tay and Diener, 2011). Therefore, does the need to satisfy basic needs before higher or self-actualised needs as projected by Maslow influence pro or anti-environmental attitudes in Africa? The main themes developed from the conceptual framework above and applied in the findings section will be basic needs and non-basic needs or higher needs. Indicators for basic needs centre around food (willingness to eat vegetarian food to save the environment; willingness to eat only free-range chicken to save the environment, willingness to become a member of an environmental NGO, willingness to read or hear about environmental issue, willingness to recycle). Willingness is an indicator of people's behavioural intentions (da Costa Diniz, 2016). Before the presentation of the findings, the next section will explain how data were collected.

Methodology

The study was conducted between November 2019 and October 2020. Survey data generated in this paper was collected from participants in Ghana (Winneba), Cameroon (Buea) and Egypt (Cairo). Due to the Covid-19 pandemic, with the exception of two focus groups which were conducted in Ghana before the outbreak of the pandemic, only online questionnaire surveys were administered. Participants were randomly selected from a cross-section of the population and included men and women with different occupational backgrounds. There were eighty questionnaires in each of the three countries listed above. Therefore, in total 240 questionnaires were completed. The questionnaires were in English (the official or widely used language in the three countries).

Indicators for measuring the needs framed in the conceptual framework were adapted from the General Ecological Behaviour (GEB) scale. The original version of the GEB scale is a composite of 50 performances proposed by Kaiser and Wilson (2004). This study used a modified version of the GEB scale composed of items written as 'intention' items, describing ecological actions that the participants are willing to engage in or not. Another modification was composed of items written as 'actual' items, describing ecological actions that the participants actually engaged in or not. The items were answered on a 6-point Likert scale ranging from 1 (not at all willing) to 5 (extremely willing). Before running these experiments, a pilot study was conducted in Ghana in November/December 2019 examining the reliability of the measure and on-the-ground feasibility of the measures. In the actual

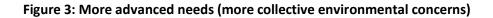
survey, a total of 60 percent females and 40 percent males composed the sample with the average age of 27. The youngest respondent was 19 and the oldest was 91.

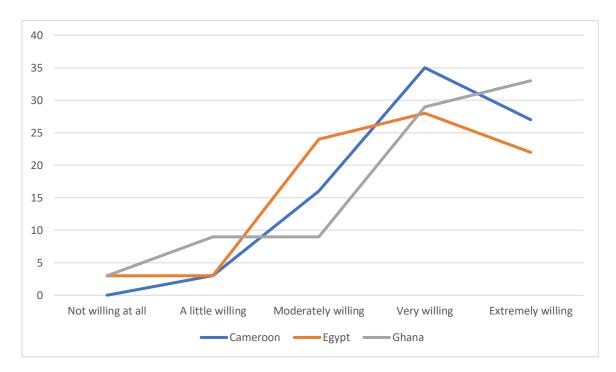
The data were entered into an excel spreadsheet in order to organise them in a specific format to relate measurement scales with variables. Descriptive statistics (univariate analyses) were linked to encapsulate available data. Such data is presented in tables and graphs. Tables and graphs can provide basic information about variables of interest. When presenting plenty and complex data, tables and graphs are suitable to use because they are easily interpreted. Graphs make it easier to compare and visually see the difference between one or more values. They easily show the relationship between changes even to a non-expert audience.

Findings

Basic needs come first

In the cases in this study, people are more willing to change attitudes about environmental issues which have less immediate and direct impacts on their day-to-day life (more advanced or higher needs), such as recycling, reading or hearing about environmental issues (See Figures 3a and 3b). Conversely, people are less willing to change attitudes concerning other issues (basic needs) such as eating only free-range chicken and boycotting food products from companies that have a poor ecological background that have more immediate and direct impacts on their lives (See Figures 4a and 4b). To put these findings in to perspective, for example, not eating factory raised chicken and only eating free range chicken could save the environment but it comes with a heavier financial cost to the consumer. See Table 1 for a comparative presentation of the differences in costs between free-range and factory raised chicken. Therefore, people are less reluctant to consume only free-range chicken especially if there is the worry that adopting such pro-environmental changes could threaten their ability to satisfy their basic need (the need to have any food to eat). A decision to eat only free-range chicken to save the environment is perceived as one which could reduce chicken options for the consumers. For that reason, some respondents did not really care if the chicken had a good life or not. In Ghana they said, 'Charly! chicken na chicken' (chicken is chicken in pidgin English). This means it does not matter if environmental concerns were taken into consideration in raising the chicken or not. This is a suitable demonstration of basic needs having more importance over environmental concerns. On the other hand, other needs such as recycling and reading or hearing about environmental issues do not have a direct impact on people's ability to satisfy their basic needs. These are seen as higher order or non-essential needs. Figures 3a and 3b show that in all three countries, people are very willing or extremely willing to change their behaviour with regards to these higher needs or non-essential needs.





a. Willingness to read about environmental issues

b. Willingness to recycle

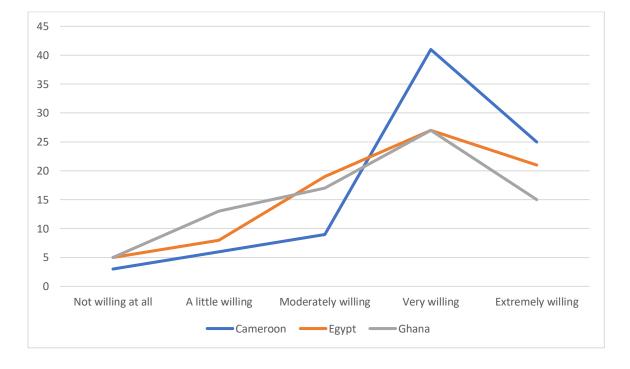
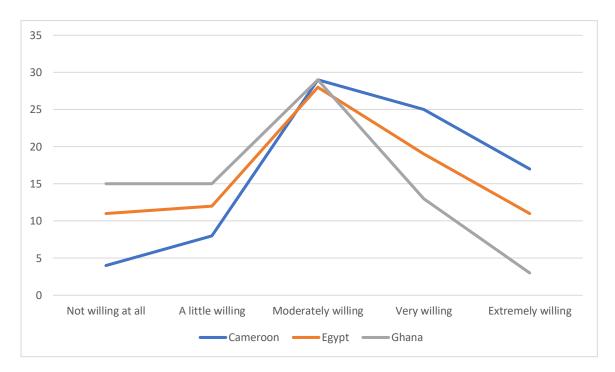
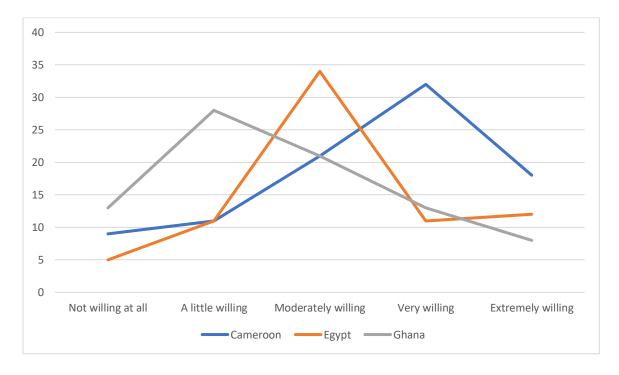


Figure 4: Basic needs (food-related)



a. Willingness to eat free-range poultry for environmental reasons

b. Willingness to boycott food from companies that have a poor ecological background



	Cameroon (price per unit) in Franc CFA BEAC	Egypt (price per kilo) In US Dollars	Ghana (price per unit) in Ghana Cedis
Free-range chicken	6,000FCFA	2,29\$	40GHC
Factory raised or imported chicken	3,400FCFA	1,27\$	30GHC

Table 1: Average costs of chicken in urban areas in Cameroon, Egypt and Ghana

Basic needs are not necessarily financial or material

Economic factors (costs of basic needs) are clearly very important and could influence and change environmental attitudes. Nevertheless, predicting people's environmental attitudes on purely economic grounds will not reveal the whole picture. Economic factors are intertwined with social, infrastructural and psychological factors. Basic needs do not comprise only material wealth or tangible needs. Environmental attitudes may be determined not only by the need to fulfil needs, but also by cultural norms which are independent of economic benefits. Cultural norms play a very important role in shaping people's behaviour. If the dominant culture propagates a lifestyle that is unsustainable, pro-environmental behaviour is less likely to occur and the gap between knowledge and attitude will widen. Empirical support for the significance of cultural norms as a determinant of environmental attitudes has been found in comparative studies of middle-income Latin and North American populations where the former demonstrates higher levels of environmental concern as a result of culturally derived pro-ecological values and traditions (Schultz et al., 2000). In this study, cultural norms accounted for some of the regional differences in environmental attitudes between Egypt, Cameroon and Ghana. In the survey, the question was asked about the willingness of people to switch to a vegetarian diet in order to save the environment. Answers to this question showed that Africa is not a country indeed and it is a continent with diverse views informed by diverse cultures. The results revealed that people in Ghana and Cameroon showed more willingness to eat vegetarian food than people in Egypt. Figure 5 below shows that more people in Egypt are not willing at all to switch to a vegetarian diet in order to save the environment. Although the issue of food (a basic necessity) generally created a more varied response than the higher or more advanced needs responses on Figure 4a and 4b above, there is even a greater discrepancy with regards to willingness to eat meat or not for environmental reasons. Over half of the sample in Egypt expressed no willingness at all to eat vegetarian food for the sake of the environment.

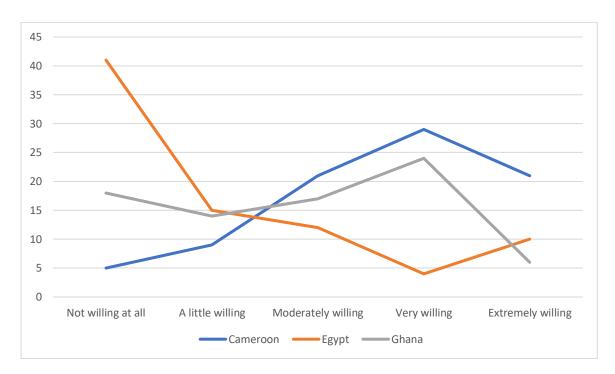


Figure 5: Willingness to eat vegetarian food for environmental reasons

This introduces the issue of meat and Islam in the discussion in order to understand the findings in Figure 5. Religion is one of the most influential cultural forces that shape consumer behaviour (Ali et al., 2018). Similarly, according to Assadi (2003), consumers' food choices and tastes could be developed by their surrounding religion and the degree to which people interpret and respect the commands of their religion. Meat is an important feature of culinary traditions across Muslim communities globally. As the central focus of Islamic dietary laws, halal meat consumption functions as a marker of Islamic communal identity, and is a distinct demonstration of faith (Adams, 2018). Explicit and divinely-decreed teachings found in the Koran underpin the imperative for a Muslim to consume licit meat (Adams, 2018). Consequently, there is considerable heated debate about whether or not one can be Muslim and vegetarian or vegan. According to some Islamic readings, to avoid meat for health reasons or for matters of taste and preference may be acceptable. However, abstaining from meat for any other reason (including environmental reasons) can be considered sinful by some interpretations of the faith (Adams, 2018). Adams also added in her survey in Egypt that nearly all vegetarian participants had their Islamic correctness or legitimacy questioned because of their vegetarian choices. These ranged from benign curiosity to vehement resistance and hostility, with accusations of being counter to Islam (Adams, 2018). This could explain why compared to Cameroonians and Ghanaians, more Egyptians expressed an extreme unwillingness to become vegetarians for environmental reasons. It is worth noting that the data in Cameroon and Ghana were collected from the predominantly Christian Southern parts of the two countries. Considering that both countries also have significant proportions of Muslims in their Northern parts, the results could have been different if conducted in the Muslim regions. Likewise, the results of this survey from Egypt could have been different if data were collected from the Coptic Christians who are a significant minority group in Egypt.

Discussion

Recommendation for promoting pro-environmental knowledge based on the findings of this paper

Knowledge institutions in the domain of pro-environmentalism (i.e., academic institutes, nongovernmental organisations and governments etc.) can potentially play roles in the general process of enhancing pro-environmental attitudes. This paper contributes to how such knowledge outreach initiatives can be designed based on the findings presented before. The survey found out that the mass media played the greatest part in generating pro-environmental knowledge. The mass media according to the survey referred to the internet, radio and television. Figure 6 shows a full outlook on the classification of main sources of environmental knowledge across the three countries.

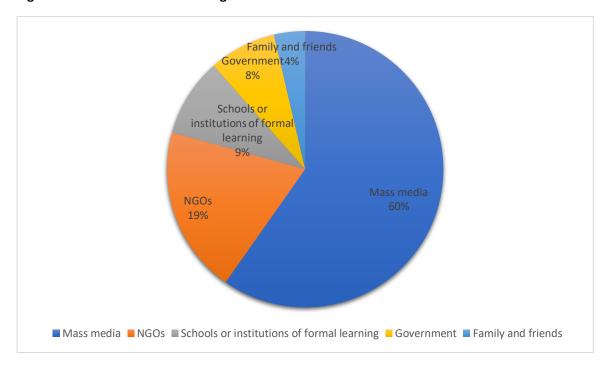


Figure 6: Main source of knowledge on environmental issues

Figure 7: Government pro-environmental education in Ghana



Based on Figure 6, this paper argues that the mass media (particularly the internet) is an effective tool for knowledge dissemination. However, as society is changing and rules and norms that inform pro and anti-environmental knowledge are not or no longer generally accepted, the role of knowledge and knowledge institutions is not unambiguous. Traditionally, people have turned to science for certainty and confirmation. But in a sea of social media and allegations of fake news especially during Covid-19, it has become increasingly harder for people to distinguish fact from fiction (see Khadiagala, 2020). This observation calls for further exploring how academia can position itself in the production and diffusion of pro-environmental knowledge in mass media in the face of increasing misinformation. While it does not recommend any specific knowledge institution per se, this study provides a key consideration for knowledge institutions in imparting pro-environmental knowledge in Africa based on findings from Cameroon, Egypt and Ghana. This refers to the need to consider that the fulfilment of basic needs (socio-economic) is fundamental to achieving any pro-environmental goals.

Yes, education can assist individuals and institutions in developing and improving environmental attitudes by providing an in-depth understanding of the environment and our relationship with the environment. However, education does not mean everything concerning environmental attitudes and behaviour. People could know what is best to do (based on knowledge from being formally educated), but have broader responsibilities and often have to deal with basic needs. The common person sees the next meal before the number of plastics in the sea and how much effect that can have on their ability to have a meal in 20 years, or the negative health impacts in later years. Therefore, for environmental knowledge institutions in Africa to have real impact and to garner more widespread support in Africa, the case for environmental needs to be re-evaluated and repositioned to offer more meaning than, 'protect the environment for the common good or because it is a moral imperative'. There is the need for the pro-environmental knowledge institutions to convince people that they can benefit instantly and individually from being pro-environmental. Ecosystem services-centric approaches may offer such platforms for knowledge institutions in Africa to propagate proenvironmental attitudes. Ecosystem services provide added value in terms of tangible benefits, and are thus, potentially more widely acceptable. Ecosystem services-based approaches ensure ecosystems remain healthy, allowing local populations to benefit from the provided environmental services such as provision of clean water, improved habitat for fish supplies and, protection from extreme weather events (UN-Habitat, 2015).

Another approach which deviates from the aforementioned utilitarian approach is to frame the concept of the environment in socio-ecological terms. The concept of socio-ecological system (SES) was developed based on theories about the co-evolutionary nature of human and biophysical systems. The SES framework provides a powerful analytical frame for understanding the interlinked dynamics of ecological and societal change. Social and ecological systems cannot be conceived in isolation, as human systems are a component of, and in turn shape, ecological ones. Therefore, the concept of the environment requires appropriate consideration of three interrelated sub-elements: ecological, economic, and social (cultural and institutional). The SES approach emerged in opposition to mainstream utilitarian views in natural resource management. The approach emphasizes that humans are a part of nature, not external to and dominant over it. Thus, '.... replacing the view that resources can be treated as discrete entities in isolation from the rest of the ecosystem and the social system' (Berkes and Folke 1998:2). In other words, using a critique of dualist depictions of nature and culture as a springboard to move towards a more holistic conception of nature and culture (Castree and Macmillan, 2001). However, from the surveys conducted in this study, people still largely view the

environment as a physical construction (e.g forests, lakes, mountains) or anything not made by man, independent of social and the economic and aspects (the human dimensions).

A socio-ecological framing of the environment will be consistent with a holistic framing of nature and culture as one in several traditional African societies which have long emphasized the interrelatedness or interconnectedness of everything in nature (Behrens, 2010). Such indigenous knowledge has long been pivotal in sustainable resource use (Agrawal, 2014) in Africa. There is a growing body of literature which argues that the exploration of probable ecological roles of different sociological mechanisms of people belonging from different cultural backgrounds expressed by their traditional resource practices should open a new prospect on pro-environmentalism and sustainable development (Diawuo and Issifu, 2015; Ghosh et al., 2017) even when some of these sociological practices are not necessarily designed for sustainability purposes per se. Traditional beliefs and practices which demonstrate the close relationship between humans, animals and the lived environment have been a universal phenomenon among several societies. In many indigenous societies, this relationship has been highlighted by belief in totems and taboos. Totems are considered as an emblem consisting of an object such as an animal or plant that serves as the symbol of a family or clan. In Africa for instance, where the use of animal totems was and is quite widespread, it is often the duty of each community member to protect and defend the community totem (Diawuo and Issifu, 2015). An obligation which ranges from not harming that animal, to actively feeding, rescuing or caring for it as needed, and treating the habitat of the totem with respect.

Future research avenues

Future research could look at a higher-level analysis of the intercontinental differences between middle, low and high-income countries in the strength of the association between environmental knowledge, attitudes and behaviour considering socio-economic indices. This could provide global scale data to test the traditional idea that personal and national economic growth is at odds with protecting the environment. Previous research has found that citizens in nations with lower GDP (Gross Domestic Product) and HDI (Human Development Index) have a lower level of willingness to make sacrifices for the environment (Haller and Hadler, 2008). However, in the meta-analysis conducted by Hurst and colleagues (2013), countries such as Chile, with low a GDP and HDI, did not show negative correlations between materialism and environmental attitudes. Further investigation of these contradictory results would be useful in shedding light on this issue.

Also, one demographic factor that has been found to influence environmental attitude and proenvironmental behaviour is gender. Some authors have stated that although women usually have a less extensive environmental knowledge than men, they are more emotionally engaged, show more concern about environmental destruction, believe less in technological solutions, and are more willing to change (Fliegenschnee & Schelakovsky, 1998; Hofstede, 2001). However, there is little empirical evidence from Africa to justify this assumption. Further research along gender lines will shed more light on this too.

Lastly, environmental attitudes have been found to have a varying, usually very small impact on proenvironmental behaviour (Kollmuss and Agyeman, 2002). This is unexpected because there is the assumption that people live according to what they believe. However, these assumptions are often not true because there is also a gap between what people believe and what they do. This paper has examined the gap between environmental knowledge and environmental attitudes and how basic needs play a role in shaping people's attitudes. Many factors are also responsible for the gap between environmental attitudes and pro-environmental behaviour and these warrant investigations too in the African context.

Conclusion

The main finding of this research - that people face the need to satisfy basic survival needs first - could be misunderstood to conform with a contentious proposition about wealth and pro-environmental attitudes and behaviour. This contentious proposition is that the expression of environmental concern is confined to wealthy western societies and has been strongly refuted by many environmental social science scholars (e.g., Brechin and Kempton, 1997; Dunlap and York, 2008). Nonetheless, this paper contends that material wealth does provide individuals with a wider range of choices, consequently increasing the opportunity to choose a particular lifestyle or not. Hence, people use their resources to explore basic needs first before focusing on higher-order need. So, YES perhaps we really do have other priorities in Africa when it comes to pro-environmental attitudes and behaviour. However, this paper also argues that basic needs of Africans are not predominantly economic or material. For instance, this paper shows how cultural norms such as religious beliefs (Islam in Egypt) can play a central role in determining what basic needs are. To religious people, a spiritual connection with a supreme being is a basic need. This further complicates the meaning of basic needs and shows that basic needs vary according to context.

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