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The Role of Social Well-Being in Sustainability

By:

Rachel Abele

A Thesis Submitted in Partial Fulfillment
of the Requirements for the
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The University of South Dakota
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The members of the Honors Thesis Committee appointed
to examine the thesis of Rachel Abele
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ABSTRACT

The Role of Social Well-Being in Sustainability

Rachel Abele

Director: Meghann Jarchow, Ph.D.

The concept of sustainability combines environmental, social, and economic factors to ensure the survival and prosperity of future generations for the Earth. People most often associate only environmental issues with sustainability rather than economic issues or social equity movements. The purpose of this thesis was to determine if people associated social equity movements with sustainability. This is important because social equity movements move towards creating an overall greater social well-being of individuals which is necessary for prosperity of the future; a key concept in sustainability.

To test this, I interviewed twelve individuals: three faculty with expertise in sustainability, three faculty outside of sustainability, three students with expertise in sustainability, and three students outside of sustainability. They were asked to provide a definition of sustainability, asked who can participate in sustainability activities, and then asked if they thought specific social equity movements were related to sustainability. I hypothesized that the sustainability experts, faculty, and women would associate more social equity movements with sustainability. The results showed that women, sustainability experts, and students had higher association rates of social equity movements to sustainability than the other groups.

Key words: sustainability, well-being, pillars of sustainability, social issues

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CHAPTER ONE

Introduction

Sustainability is a relatively new term, and there are a large number of definitions of sustainability. The most commonly used definition of sustainability is from the United Nations World Commission on Environment and Development, which is: “Development that meets the needs of the present without compromising the ability of future generations to meet their own needs” (World Commission on Environment and Development, 1987, pp. 15). This definition focused on development, specifically improving the conditions for people in developing countries, while protecting the environment (Berlin & Adams, 2017). A broader concept of sustainability would be creating a better world for the current and future generations through improving humans’ quality of life and ensuring conservation of the planet and its ecosystems. One of the most important factors of sustainability is ensuring a better future for generations to come and this includes creating intra- and intergenerational equity (Berlin & Adams, 2017). However, the concept of sustainability has developed into three pillars: environmental, social, and economic (Hansmann, 2012). These pillars suggest that in order to sustain the Earth for future generations, these three aspects need to interact because they represent the people, planet, and profit (Hansmann, 2012). Sustainability is often only associated with environmental issues such as climate change and endangered species. Although these issues play an important role in sustainability, in order to have a truly sustainable world we must look at all three pillars of sustainability.

The importance of economics to sustainability is not recognized as much as the environment but more often than the social pillar (Berlin & Adams, 2017; Kuhlman &

Farrington, 2010). In 1994 John Elkington coined the term the “triple bottom line” to highlight how business must consider the environment and social well-being in addition to profitability (Kuhlman & Farrington, 2010). This concept has been expanded to include the concept of corporate social responsibility, which is well known by businesses and corporations (Kuhlman & Farrington, 2010). Many view the economic pillar of sustainability as being necessary because of money’s importance in society and because money is needed to provide for basic human needs that contribute to well-being and make environmental change.

It is less clear, however, how social well-being fits within the concept of sustainability (Washington, 2015). Some argue that human well-being is needed within the concept of sustainability because people who do not have their needs met cannot protect the environment (Washington, 2015). For example, if a group of people in Africa is worried about getting resources such as wood and water, they are not going to worry about the water use and amount of deforestation they are causing. Others argue that social well-being plays a more fundamental role in sustainability (Washington, 2015). As in the definition of sustainability, it is about improving the quality of life for humans, making it its own pillar and not just a means to the ends of environmental protection. Some major aspects of social sustainability are the availability of education, distribution of power and resources, basic freedoms for all, and social justice (Berlin & Adams, 2017). These aspects are important to sustainability overall because they contribute to the well-being of individuals.

Well-being includes the conditions that make people happy, the livability of an environment, and what policy needs to enhance the happiness of the people (Kuhlman & Farrington, 2010). Well-being is an important aspect of sustainability because it is often

linked to non-material things such as compassion, trust, and the ability for one to reach their potential (Kuhlman & Farrington, 2010; Barrington-Leigh, 2016). Inequality is one of the main factors harming well-being because it lowers an individual's dignity and creates a negative identity of themselves (Barrington-Leigh, 2016). Ensuring equality helps to ensure dignity which increases happiness and well-being of society overall. If there is more focus on well-being, there is more pro-social thinking and behavior contributing to a more equitable and desirable society (Barrington-Leigh, 2016).

The purpose of this study was to evaluate whether gender, amount of academic training, and field of study affected people's perceptions of the relationship between social equity movements and sustainability. I had three hypotheses.

1. I hypothesized that women would be more likely to identify social equity movements with sustainability than men because women are one target group that is striving for social equity (Taylor, 1999).
2. I hypothesized that faculty would be more likely to identify social equity movements with sustainability than students because many of the faculty members are often older than students which leads to them having more real-world knowledge and having experienced more.
3. I hypothesized that sustainability-trained people would be more likely to identify social equity movements with sustainability than people not trained in sustainability because of their greater knowledge of the field of sustainability.

CHAPTER TWO

Materials and Methods

This research involved the participation of twelve individuals. These individuals were selected from four different groups: three students with majors other than sustainability, three students with sustainability majors, three faculty members who do not teach in the Sustainability Program, and three faculty members who teach in the Sustainability Program. Individuals were chosen based on whether they met these requirements and were emailed to ask if they would participate in this research. Faculty were chosen from the school's website or from previous classes that I took, and students were chosen from previous classes as well. Individual email addresses were retrieved from prior contact or from the University of South Dakota faculty website. Once individuals agreed to be interviewed, the time and location of the interviews was set based on the individual preference.

The research was approved through the Human Subjects Office before interviewees were contacted or interviews were conducted. All interviews were recorded, and interviewees were offered a \$10 gift card for participating in the research. The student interviews were all conducted in a private room in the I.D. Weeks Library on the second floor. All faculty interviews took place within their respective offices. The interviews began with the interviewees reviewing the informed consent document (Appendix B). The interviewees then completed a form with demographic information before the interview began including gender, ethnicity, age, city population of where they grew up, and their major or department (Appendix C; Table 1). The oral part of the interview began with questions about what their idea of sustainability was and whose

responsibility it is to take action related to sustainability. I then listed eleven social movements and asked interviewees whether or not they thought that each movement related to sustainability (Appendix D). The movements were Me-Too, Black Lives Matter, Pro-Life and Pro-Choice, climate change, reduce-reuse-recycle, Supreme Court nominations, the wage gap, the Occupy movement, feminism, Net Neutrality, and LGBT equality. If an interviewee had little or no knowledge about any of the movements, I would provide a short description of the movement (Table 2).

After the interviews were complete, I transcribed each interview and deleted the audio recordings to de-identify the interviews. I analyzed the data qualitatively in order to understand interviewee perceptions and used basic descriptive statistics to evaluate interviewee demographics and beliefs about relationships between social movements and sustainability. I did not analyze the data using inferential statistics due to the small sample sizes.

As described in Chapter 1, sustainability is often described as relating to the environment, society, and the economy. For each interview, I recorded whether the environment, society, and the economy were identified in the interviewees' definitions of sustainability. The subsequent question asked whether individuals, businesses, non-profit organizations, and government have a role to play in taking action related to sustainability, and I recorded the interviewees' responses for each of these groups.

For the questions asking about the different social movements, I summarized the data by identifying the percentage of interviewees who indicated that each social movement was associated with sustainability. I then aggregated the eleven social movements into three categories: movements focused on environmental protection, movements focused on social equity, and movements not directly related to

environmental conservation or social equity. In the environmental protection category, I included the climate change and the reduce-reuse-recycle movements. These were included in this category because the goal of the movements is to protect the environment through advocacy about environmental issues. In the social equity movements, I included Me-Too, Black Lives Matter, recent Supreme Court nominations, the wage gap, the Occupy movement, feminism, and LGBT equality. These movements are in this category because the goal of all them is to achieve equality for certain groups of people. And finally, I included Pro-life/Pro-choice and Net Neutrality as non-equity social movements. These movements are not directly related to equity but are still striving to enhance society.

CHAPTER THREE

Results

The first question was “How do you understand the concept of sustainability? What role does environment, social, and economics play in it?” (hereafter referred to as Question 1). All interviewees said the environment played a role in sustainability in their definitions (Table 3). All of the faculty and students with sustainability training and all females included social equity within their definition of sustainability, whereas 67% of the non-sustainability faculty members and students and 63% of the males included society in their definition of sustainability (Table 3). Overall, the economy was identified the least frequently among interviewees in their definitions of sustainability (Table 3).

The next question was “Who can ‘do’ sustainability? What are the roles of/for individuals, businesses, non-profits, governments?” (hereafter referred to as Question 2). All participants identified the government as being able to take action towards sustainability (Table 4). All of the women, faculty members, and people with sustainability training stated that individuals play a role in doing sustainability, and most of the men, students, and people without sustainability training also saw a role for the individual in doing sustainability (Table 4). Compared to the government and individuals, fewer people believed that business and non-profit organizations had a role in doing sustainability (Table 4).

In Question 3, I listed eleven social movements and asked the interviewees to tell me whether each one was related to sustainability and if yes, why. All of the interviewees associated the environment movements with sustainability (Figures 1, 2, 3).

Sustainability trained interviewees were more likely to associate social equity movements

with sustainability than the non-sustainability trained interviewees and the non-sustainability trained interviewees identified the non-equity social movements as being associated with sustainability slightly more often than they identified the social equity movements (Figure 1). Students were more likely than faculty members to associate both the equity and non-equity social movements as being related to sustainability (Figure 2). Females had higher rates of association for both equity and non-equity social movements than males (Figure 3).

CHAPTER FOUR

Discussion

The environment is a central idea to people's understanding of sustainability. All of the interviewees included in the environment in their definition of sustainability and all the interviewees identified the two environmental movements as being related to sustainability. This is consistent with the findings of others. Kagawa found in his study of students' perceptions of sustainability that the environmental dimension was strongly acknowledged within their conceptions of sustainability (Kagawa, 2007). Kagawa also found that environmental key words were associated with sustainability some of which are included in the fundamentals of the environmental movements (Kagawa, 2007).

An interesting finding from this study was that people at USD were more likely to attribute responsibility for sustainability action to the government. This is in contrast to the findings of the OECD Development Communication Network (DevCom) which found 90% of the citizens surveyed thought businesses have the most responsibility for sustainable action (DevCom, 2017). Another sharp contrast between these groups was the role of individuals for sustainable action. Those at USD put individuals right behind government to take action whereas DevCom found only 4% thought private individuals have responsibility (DevCom, 2017).

Social well-being and social equality aspects of sustainability are less well understood based on this sample. There was much more variability and overall lower responses to the roles of social well-being/equity in sustainability. Fumiyo also found the association of social dimensions were minimal compared to the environmental factors but were still identified as a key factor for sustainability alongside the environment (Kagawa,

2007). My findings supported the hypothesis that women would be more likely to identify social equity movements as being related to sustainability. All women interviewed also thought society was part of sustainability and most women thought all groups were responsible for taking sustainable action. This is consistent with other studies that women are more likely to be involved in social movements (Taylor, 1999). One study about women's involvement in social movements found this may be because social movements often involve women fighting for their rights but also because they are more likely to form a collective and speak out due to women being more involved and socially connected (Taylor, 1999). Since women are thought to be more in-tuned to what is going on in the social side of things, it makes sense that women had a higher association of social aspects to the idea of sustainability. Some of these movements address the gender hierarchy granting men more rights or better treatment than women (Taylor, 1999). Compared to men, women also take on more responsibility and are more concerned for not only social movements, but also environment movements and, therefore, are more likely to make these correlations between social equity movements and sustainability (Zeleny, et. al., 2000).

My findings did not support the hypothesis that faculty would identify more social movements with sustainability. Students were more likely to identify social equity movements as being related to sustainability – in fact, they were more likely to say all of the movements listed were related to sustainability. Students also put more emphasis on the role of government and business to address sustainability. Others have found students are more likely to be involved in social movements and have a broader understanding of sustainability because they are younger (McMillan, et. al., 1997). Having more education is also correlated to more involvement with social movements and a belief that relate to

sustainability (Kagawa, 2007; McMillan, et. al., 1997). Combining age and amount of education does make it unsurprising that students had the higher correlation since lower age and higher education are important to involvement and understanding of social movements and sustainability.

My findings supported the hypothesis that sustainability-trained interviewees would associate more social equity movements as being related to sustainability. All interviewees identified society as being an important aspect of sustainability (but not economics). Sustainability-trained interviewees also believed individuals, governments, and business were in a better position than non-profits to address sustainability. The sustainability-trained individuals were also the ones who had the highest association of the social equity movements to sustainability. This is consistent with Kagawa's study that those with more education in the field are also thought to hold more sustainability beliefs and identify more key ideas to what sustainability is (Kagawa, 2007). This aligns with McMillan's study as well that those with more education in the subject are open to these ideas and able to make these connections between the social movements and the environment (McMillan, et. al., 1997).

Overall, this preliminary study explored association of social issues and responsibility with sustainability by demographic group. For future research in relation to this study, one could include more participants and conduct statistical analyses on the data retrieved, instead of interviews use this as a preliminary study and using these results. This thesis showed the relation between gender, age, sustainability backgrounds, and education level with the relationship between sustainability and social movements. All participants related environmental movements with sustainability and while fewer

people associate social equity movements with sustainability, many of my participants made this connection.

APPENDICES

APPENDIX A

FIGURES AND TABLES

Table 1. A table showing the demographics of each individual that participated in the study.

Interviewee	Gender	Major/Department	Faculty or Student	City Population Size
01	Female	English & Psychology	Student	50,000+
02	Male	Medical Biology	Student	10,000-50,000
03	Female	Nursing	Student	50,000+
04	Female	Psychology	Faculty	<1,000
05	Female	Sustainability	Student	10,000-50,000
06	Male	Sustainability	Faculty	50,000+
07	Male	Sustainability	Faculty	10,000-50,000
08	Male	Sustainability	Student	1,000-10,000
09	Male	Sustainability	Student	1,000-10,000
10	Male	Chemistry	Faculty	1,000-10,000
11	Male	Political Science	Faculty	50,000+
12	Male	Sustainability	Faculty	50,000+

Table 2. A brief description of each of the social movements listed in the third part of the interview “I am going to list recent social campaigns and please tell me if you think they relate to sustainability and why.” If the interviewees did not know what the movement was, this was the approximate description given to them.

Movement	Description
Me-Too	A movement against sexual assault and violence
Black Lives Matter	A movement seeking to end violence and racism towards black individuals
Climate Change	A movement trying to reduce and reverse the effects of climate change or global warming by affecting change in human activity
Pro-Life/Pro-Choice	Movements that are either for elective abortions being legal and provided to women (pro-choice) or against abortions of most or all kinds for women (pro-life)
Reduce-Reuse-Recycle	A movement to get more people to reduce their waste, reuse items more, and recycle what they can in order to reduce amount of waste in the environment
Recent Supreme Court Nominations	The last two Supreme Court nominations (Brett Kavanaugh and Neil Gorsuch) sparked movements for women being able to speak out against sexual harassment because of accusations against the nominees
Wage Gap	This movement addresses the difference in wage that women get compared to men, with women’s wage being approximately only 78% of men’s total pay for the same or similar occupations
Occupy Movement	A movement to address income inequality with most of the wealth being owned by the top 1% of the world’s wealthiest people and the rest distributed among 99% of the world
Net Neutrality	A movement seeking to keep the internet free to everyone regardless of provider and without paying fees for more use or better speed
Feminism	Movement for getting women’s rights to be equal to those of males
LGBT Equality	Getting equal rights for those who are gay, transgender, etc. (in the LGBT+ community) to have equal rights as straight, cisgender individuals

Group	Environment	Social	Economic
Male (n=8)	100%	63%	63%
Female (n=4)	100%	100%	75%
Sustainability (n=6)	100%	100%	67%
Non-sustainability (n=6)	100%	67%	83%
Faculty (n=6)	100%	83%	83%
Student (n=6)	100%	83%	67%

Table 3. Responses to the question “How do you understand the concept of sustainability? What role do environment, social, and economics play in it?” Results are shown in percentage of interviewees who identified environmental, social, and economic factors as being part of the definition of sustainability.

Group	Individual	Business	Non-Profit	Government
Male (n=8)	88%	75%	63%	100%
Female (n=4)	100%	100%	75%	100%
Sustainability (n=6)	100%	83%	33%	100%
Non-sustainability (n=6)	83%	83%	67%	100%
Faculty (n=6)	100%	67%	33%	100%
Student (n=6)	67%	83%	67%	100%

Table 4. Responses to the question “Who can ‘do’ sustainability? What are the roles of/for individuals, businesses, non-profits, governments?” Results are shown in percentage of interviewees who believed that action toward sustainability should be completed by the individual, businesses, non-profit organizations, and the government.

	Male	Female	Sustainability	Non-sustainability	Faculty	Student	Overall
Climate Change	100%	100%	100%	100%	100%	100%	100%
Reduce-Reuse-Recycle	100%	100%	100%	100%	100%	100%	100%
Me-Too	63%	50%	83%	33%	50%	67%	58%
Black Lives Matter	63%	75%	83%	50%	50%	83%	67%
Recent Supreme Court Nominations	88%	100%	100%	83%	83%	100%	92%
Wage Gap	75%	100%	100%	67%	67%	100%	83%
Occupy Movement	88%	100%	100%	83%	83%	100%	92%
Feminism	63%	75%	83%	50%	67%	67%	67%
LGBT Equality	50%	75%	83%	33%	50%	67%	58%
Pro-Life/Pro-Choice	50%	100%	67%	50%	50%	67%	58%
Net Neutrality	50%	100%	50%	83%	50%	83%	67%

Table 5. Interviewees were asked “I am going to list recent social campaigns. Please tell me if you think they relate to sustainability and why” followed by a list of the eleven social movements shown in the first column. The results are shown in the percentage of interviewees who answered affirmatively that the social movement was related to sustainability.

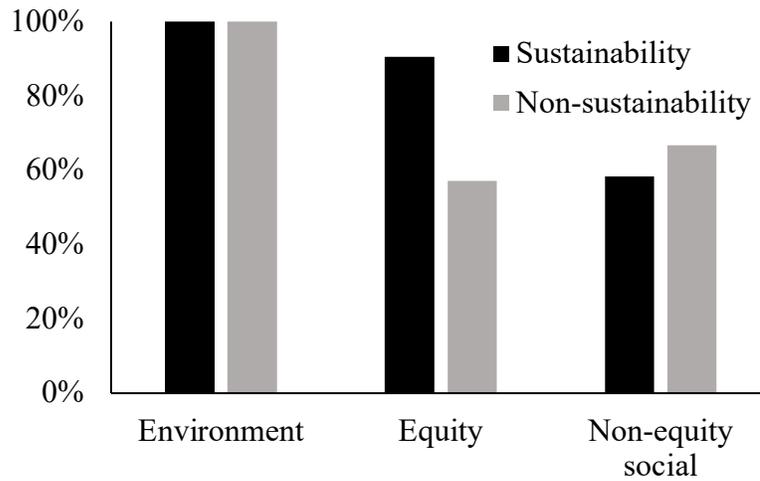


Figure 1. Percentage of sustainability and non-sustainability trained interviewees who identified environmental, equity, and non-equity social movements as being related to the field of sustainability.

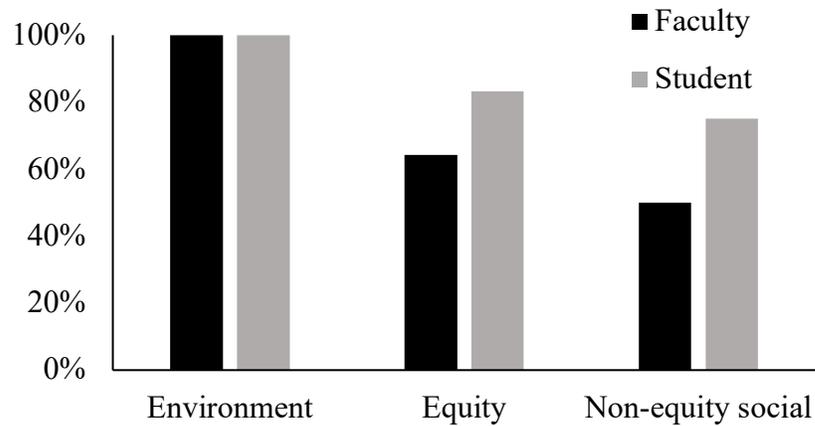


Figure 2. Percentage of faculty member and student interviewees who identified environmental, equity, and non-equity social movements as being related to the field of sustainability.

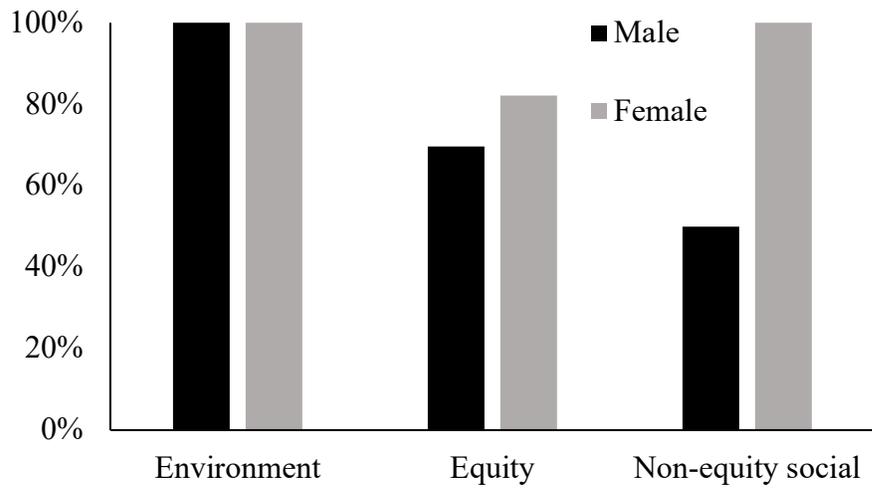


Figure 3. Percentage of male and female interviewees who identified environmental, equity, and non-equity social movements as being related to the field of sustainability.

ARE MY RECORDS CONFIDENTIAL?

The records of this study will be kept confidential to the extent permitted by law. In any report about this study that might be published, you will not be identified. Your study record may be reviewed by government agencies, Office of Human Subjects Protection and The University of South Dakota- Institutional Review Boards.

Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained by keeping the recorded data in a locked cabinet and by means of a de-identified code associated to your interview. The transcription process will take place on a password protected computer and the audio files will not be available to anyone else. All audio files will be deleted immediately after being transcribed.

If we write a report or article about this study is written, we will describe the study results will be described in a summarized manner so that you cannot be identified. Participant quotes may be used in publication, but you will not be identified since there will be no information linking your identity to your responses.

WHAT ARE THE BENEFITS OF THIS STUDY?

You will not benefit personally from being in this study. However, we hope that, in the future, other people might benefit from this study because others will see how social well-being values play a role in sustainability and what some of those values are.

WILL I BE PAID FOR PARTICIPATING?

You will be paid for being in this research study. You will receive a \$10 gift card for participating in the study.

IS THIS STUDY VOLUNTARY?

Your participation is voluntary. You may choose not to participate, or you may discontinue your participation at any time without penalty or loss of benefits to which you are otherwise entitled. Your decision whether or not to participate will not affect your current or future relations with The University of South Dakota.

WHOM MAY I CONTACT IF I HAVE QUESTIONS?

You may ask any questions you have now or later.

The researchers conducting this study are:

Rachel Abele, Rachel.Abele@coyotes.usd.edu (712) 348-1859

Meghann Jarchow, Meghann.Jarchow@usd.edu (605) 677-6122

- You may call these numbers if you have questions, concerns, or complaints about the research.

If you need to change your appointment, please contact Rachel Abele at (712) 348-1859 or by email at Rachel.Abele@coyotes.usd.edu.

If you have questions regarding your rights as a research subject, you may contact The University of South Dakota- Office of Human Subjects Protection at **(605) 677-6184**.

- You may also call this number about any problems, complaints, or concerns you have about this research study.
- You may also call this number if you cannot reach research staff, or you wish to talk with someone who is independent of the research team.

YOUR CONSENT

Before agreeing to be part of the research, please be sure that you understand what the study is about. We will give you a copy of this document for your records. If you have any questions about the study later, you can contact the study team using the information provided above.

APPENDIX C

Demographics Questionnaire

Demographics Questions

- What is your gender/gender identity?
 - Male
 - Female
 - Prefer not to answer
 - Other (please specify): _____
- Please specify your ethnicity.
 - White
 - Hispanic or Latino
 - Black or African American
 - Native American or American Indian
 - Asian/Pacific Islander
 - Other (please specify): _____
- What is your age?
 - 18-24
 - 25-34
 - 35-44
 - 45-54
 - 55-64
 - 65+
- What is the population of the town/city you grew up in?
 - <1,000 people
 - 1,000-10,000 people
 - 10,000-50,000 people
 - 50,000+ people
- Please state your major for students and department for faculty.
 - Major: _____
 - Department: _____

APPENDIX D

Interview Questions

Interview Questions

1. How do you understand the concept of sustainability?
 - a. What role do environment, social, and economics play in it?
2. Who can 'do' sustainability?
 - a. What are the roles of/for individuals, businesses, non-profits, governments?
3. I am going to list recent social campaigns and please tell me if you think they relate to sustainability and why.
 - a. Me Too
 - b. Black Lives Matter
 - c. Climate change
 - d. Pro-life/pro-choice
 - e. Reduce-reuse-recycle
 - f. Recent Supreme Court Nominations
 - i. For example: Brett Kavanaugh, Neil Gorsuch
 - g. Income issues
 - i. Wage gap
 - ii. Occupy movement
 1. Example: we are the 99%- the wealth is concentrated at the top 1% of people.
 - h. Net Neutrality
 - i. Feminism
 - j. LGBT Equality

LITERATURE CITED

- Barrington-Leigh, C. (2016). Sustainability and Well-Being: A Happy Synergy. *CrossMark*, vol. 59 (pp. 292-298).
- Berlin, C., Adams, C. (2017). Social Sustainability. In *Production Ergonomics: Designing Work Systems to Support Optimal Human Performance*. (pp. 241-257). Ubiquity Press.
- DevCom. (2017). What People Know and Think About the Sustainable Development Goals. *OECD Development Communication Network*.
- Fabbrizzi, S., Maggino, F., Marinelli, N., Menghini, S., Ricci, C. (2016). Sustainability and Well-being: the Perception of Younger Generations and their Expectations. *Agriculture and Agricultural Science Procedia*, (pp.592-601).
- Hansmann, R. (2012). Principal sustainability components: empirical analysis of synergies between the three pillars of sustainability. *International journal of sustainable development and world ecology*, vol. 19:5 (pp.451-459).
- Kagawa, F. (2007). Dissonance in students' perceptions of sustainable development and sustainability: Implications for curriculum change. *International Journal of Sustainability in Higher Education*, vol. 8:3 (pp. 317-338).
- Kuhlman, T., Farrington, J. (2010). What is Sustainability? *Sustainability*, vol. 2 (pp. 3436-3448).
- McMillan, M., Hoban, T., Clifford, W., Brant, M. (1997). Social and Demographic Influences on Environmental Attitudes. *Southern Rural Sociology*, vol. 13:1 (pp. 89-107).
- Taylor, V. (1999). Gender and Social Movements: Gender Processes in Women's Self-Help Movements. *Gender and Society*, vol. 13:1 (pp. 8-33).
- World Commission on Environment and Development. (1987). *Our common future*. Oxford: Oxford University Press.
- Washington, H. (2015). *Demystifying Sustainability: Towards Real Solutions*. New York: Routledge.
- Zelezney, L., Chua, P., Aldrich, C. (2000). Elaborating on Gender Differences in Environmentalism. *Journal of Social Issues*, vol. 56:3 (pp. 443-457).