## Impacts of the EARTH Program on Student Perceptions of Sustainability

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#### EARTH

## Education and Resiliency Through Horticulture







- Founded spring 2010
- Donor funded collaboration
  - Iowa State University Ames, Iowa
  - Gifft Hill School St. John, U.S. Virgin
    Islands
- 2 interns per semester
- Educating Youth Through Horticulture (Hort 282)



## **Program Goals**







- Sustainable food production
- Teach horticulture and environmental science
- Design attractive landscapes
- Create positive perceptions
- Integrate ISU interns and GHS students
- Connect students to nature

#### **Intern Activities**





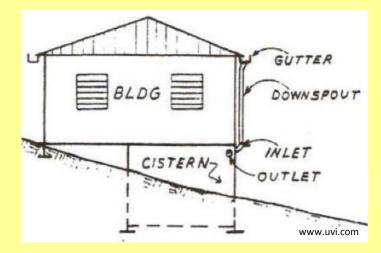






# Sustainability Issues

- Limited food production
- High cost of food and living
- Scarcity of fresh water
- Waste disposal
- Erosion
- Sedimentation
- Invasive species



#### Objective

# Record changes in ISU student perceptions of sustainability after participation with EARTH.











#### Questionnaire

- Tailored Design Method (Dilman, 2009)
- 23 ISU students who have participated as an intern, graduate student, or Hort 282 student
- Sent March 5 with reminders March 7 and 12<sup>th</sup>
- The ISU Institutional Review Board deemed exempt

#### 91% response rate (N=23, n=21)



Demographic	Ν	n		
Male	8	7		
Female	15	14		
Sophomore	5	5		
Junior	8	7		
Senior	8	7		
Graduate	2	2		



<b>1</b> = highly disagree - <b>4</b> = highly agree	1	2	3	4	Mean
I learned a lot about conserving resources while visiting St. John	0	1	8	12	3.52







1 = highly disagree - 4 = highly agree	1	2	3	4	Mean
I practice sustainability more often at home because of my visit					3.05
, I look for ways to limit wasteful uses of resources like water because of my visit to St. John.	0	3	13	5	3.10



<b>1 = highly disagree - 4 = highly agree</b>	1	2	3	4	Mean
I look for ways to reduce or recycle resources more frequently because of my visit to St. John.	0	4	13	4	3.00
I reduce, reuse, and recycle the same now as I did before my visit	0	10	8	3	2.67





#### Student Comments

- "I certainly find myself looking for ways to not waste or to produce with less available product."
- "it was educational to see how the people there have to adapt to the landscape, water shortage, and pests in order to have a successful crop."
- "I have a better idea of conservation and how important resources are."

#### Summary





- Students believe their participation in the EARTH program has made them more aware of sustainability issues
- Students believe they use resources more conservatively after their participation in EARTH

# what questions do you have?