



Cryophoenix

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Keywords: Sustainability

Measurements: Body measurements for wearing body garment = Bust 33.5", waist 23", 9" hip 34".

Note: Body garment is a tight fit; garment and body are same measurements.

"Glacier" measurements = Width at top 36", width at bottom 18", top to floor 79",  
additional floor train length of 24"

#### Mentor Statement:

Mentoring is about relationships, process and learning. Mentoring design students holds the unique challenge of providing guidance and direction while fostering students' creativity. Such relationships must be based on trust. We trust they will put in their best efforts and they trust that we will give them formative, nonjudgmental feedback and will respect their efforts and ideas. The process starts because we have had the student in a previous class. Next, when a student approaches us about mentoring for an undergraduate research study, we negotiate the future steps of the process. We ask questions, she shares ideas, and together we formulate a plan that addresses the student's interests, the department's requirements and our knowledge/skill set. As we mentor students, we want them to develop their own design style but we also want them to practice skills they have learned in class and push their development of new skills and acquisition of new knowledge.

The purpose of this mentor relationship was for the student to explore design ideas beyond the traditional role of product development for a consumer. Having the student in previous courses, we evaluated that we all met our criteria for relationship trust and that this activity would help combine her interests in design with an exploration of environmental issues, definitely new learning beyond the scope of any previous class. The quality of the project is excellent, and the student clearly met our expectations for growth in skills and knowledge.

#### Design Statement:

Inspiration for this project came from two documentaries, one about earth's melting glaciers entitled *Chasing Ice* and the second on the Great Pacific Garbage Patch called *Plastic Paradise*. Both films are thought-provoking, showing issues related to global warming and damage to the earth's environment through plastic waste. Drawing on the imagery in the films, I designed my piece to look and feel as if a glacier were melting, which highlights the environmental issues of global warming and plastic waste.

The first film, *Chasing Ice*, shows images of glaciers using time-lapse photography presenting evidence of glacial melting due to global warming. The second film, *Plastic Paradise*, sheds light on the mysterious global garbage patch and the issue of plastic usage and waste. Every three minutes 85 million plastic bottles are used, and approximately every minute one million plastic bags are used (Orlowski, 2013). I incorporated recycled disposable plastic water bottles as part of the design to heighten attention to the excessive use and continued growth of plastic waste. I created the piece to generate greater

awareness of the earth's environmental condition and to have a visual impact similar to the powerful messages in these films.

Materials used for the "glacier" or train of the design were natural aluminum screen with an 18 X 16 mesh count and a 0.011 gauge wire. This mesh was bent and crimped to give a glacial or sculptured mountain look. To add height and dimension to the glacier, it was hung via a plastic harness on the model's shoulders and back. The harness was configured from two sets of mounts created from four candy cane shaped pieces of 24" X 18" X 0.080" Plexiglas, cut with a scroll saw. A rounded tip soldering iron was used to melt holes in the Plexiglas to attach the pieces together with long strips of "wire" created by melting and drawing out the waste plastic from the cut outs. The plastic wire was used to tether the harness pieces together using recycled plastic bottle cap spacers. The same wire process was used to attach the aluminum glacier to the harness.

To further emphasize the world's usage and dependency on bottles (especially water bottles), disposable water bottles were collected from one person's use over a one week time span. The collection resulted in numerous bottles, which were cut into spirals by cutting each bottle in a continuous circle from top to bottom. Using staples, the plastic spirals were attached to the wire mesh to represent ice melting from the glacier. The cascading spirals of the cut bottles provide a repeating rhythm that visually creates the movement and flow of the melting glacier and enhances the persuasive message of the design. After attaching the bottles, the glacial train was finished with tulle in selected areas to help catch the light and to augment the message that the glacier is melting. A clear vinyl dress for the model was made from recycled plastic industrial packing materials. A purchased silver bodysuit is worn beneath the plastic dress. Both sheath and body suit add support to the look of the glacial ice shimmering and melting.

This design was an innovative way to generate awareness of the issue of plastic refuse and the problems of global warming. By using the unique materials of disposable plastic bottles and industrial plastics, both of which are contributing to environmental problems, I made a distinctive garment design using unique methods of construction.

#### References

- Orlowski, J. (Producer/Director). (2012). *Chasing Ice* [Documentary film]. United States: Exposure Production. Retrieved from: Netflix Documentary.
- Soto, T. L., & Sun, A. (Director). (2013). *Plastic Paradise: The Great Pacific Garbage Patch* [Documentary film]. United States: Sunshine Films. Retrieved from: Netflix Documentary.



Image-Front



Image-Back

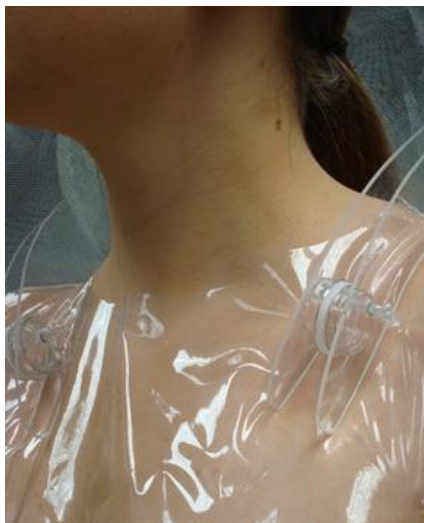


Image-Detail Harness



Image-Detail Melting Train