EnPRO 358 Innovative Fishing Hook

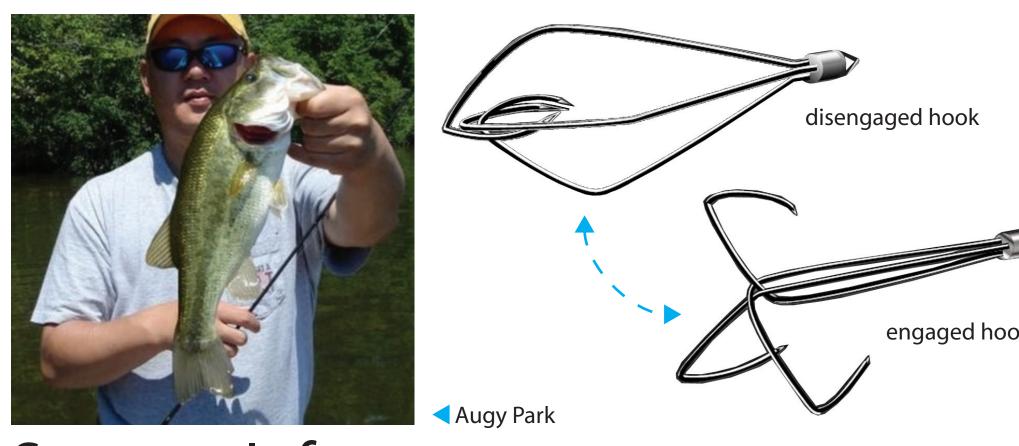
Problem

Mission Statement

Create a prototype using Delta Hook Technology (DHT) that is safe, snag free, durable, and efficient to present to Sparrowhawk, LLC. In addition, conduct market research and develop a viable business plan that will bring DHT to the market.

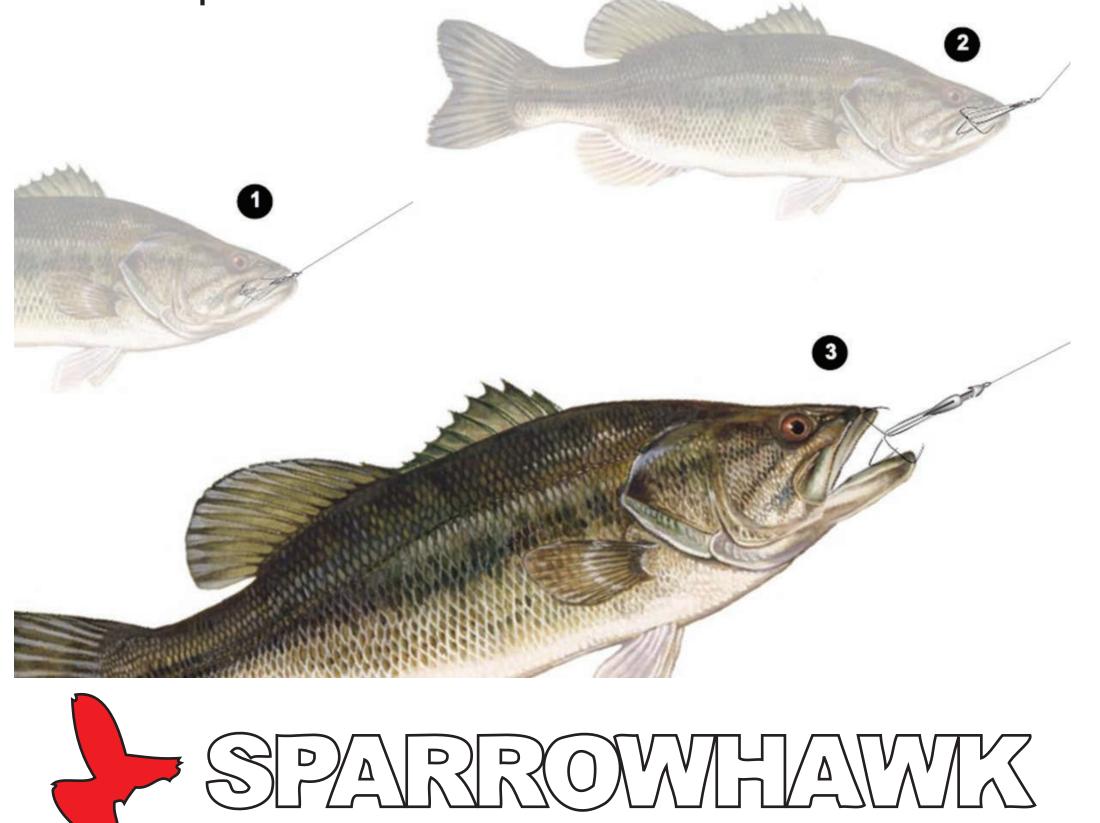


Background



Sponsor Info

Sparrowhawk was founded in 2008 by Taylor "Augy" Park. Augy recognized that there is great potential for a company that can produce a more effective fish hook. The company was originally founded with the sole intent of producing and marketing the Delta Hook Technology. In 2009, Augy partnered with the Illinois Institute of Technology's Inter-professional project to develop Delta Hook Technology and a business plan.



Methodology

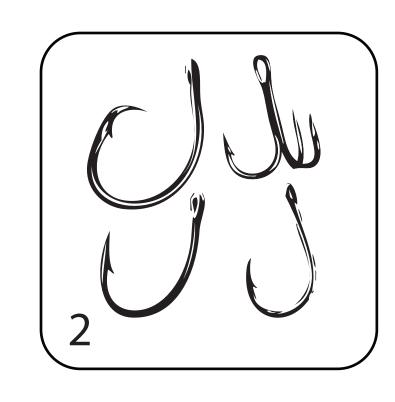
Divide and Conquer

To achieve the goal of delivering the DHT to the consumer market, EnPRO 358 split into two teams—a business team and a product development team. Both teams worked in parallel assessing the unique needs of this EnPRO.

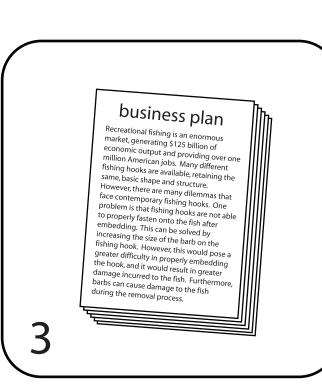
Business Team

Responsibilities

- 1. Research current market and supply chain
- 2. Assess and create promotional materials
- 3. Compile a business plan for Sparrowhawk



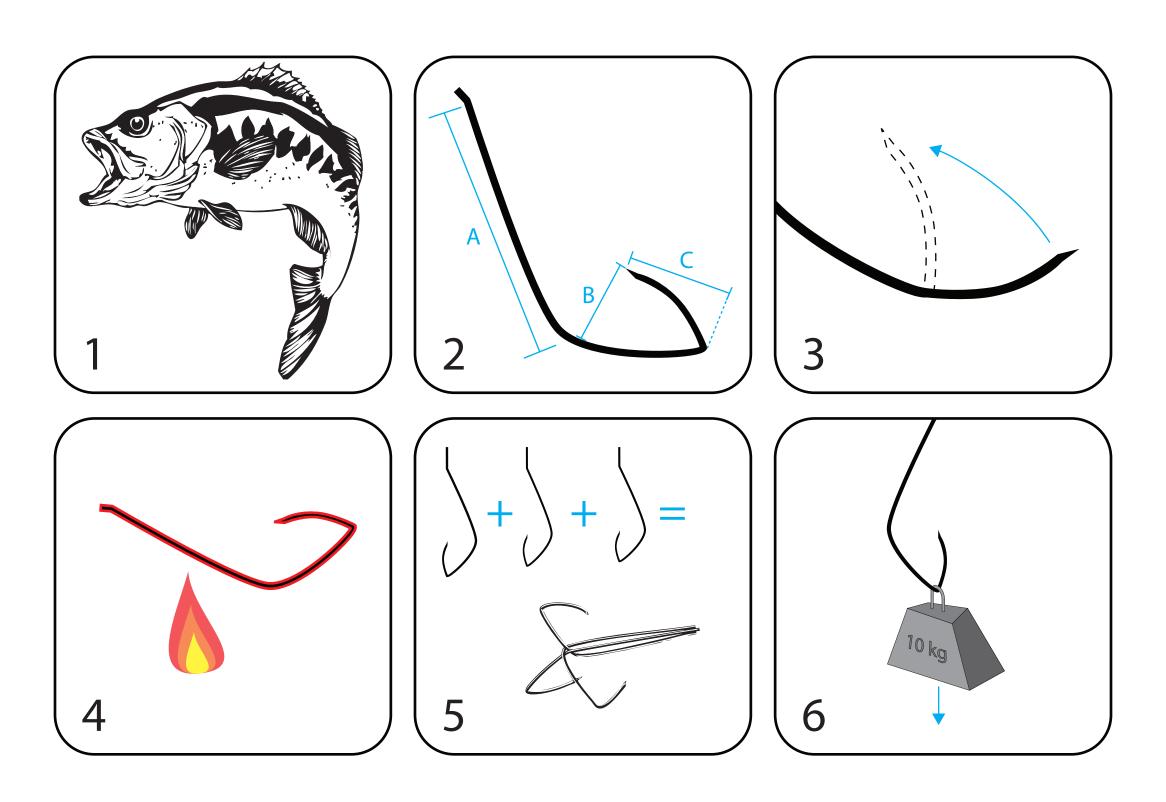




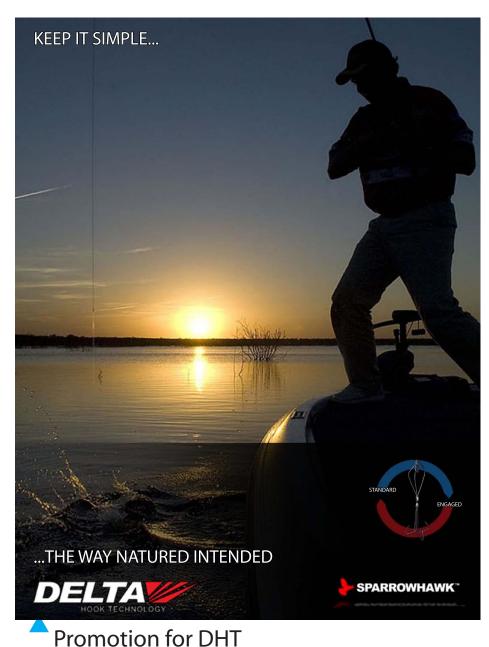
Product Team

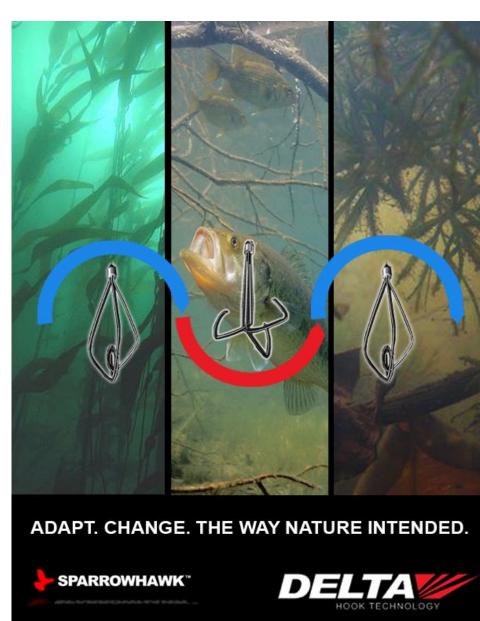
Responsibilities

- 1. Study bass biomechanics
- 2. Refine geometry of the hooks
- 3. Find an efficient way to bend the hooks
- 4. Heat treat hooks to optimize strength and flexibility
- 5. Determine flexible and joining mechanisms
- 6. Test our prototypes



Results





▲ Promotion for DHT

Business Team

The business team communicated with vendors and possible buyers to gain information about the current fish hook market. A business plan was created for Sparrowhawk, LLC containing all pertinent information for the success of the company. The plan contains marketing strategies, pricing recommendations, and a thorough growth rate analysis.

Product Team

The sizing of the Delta Hook was re-evaluated and wire was bent to match the profiles of the hooks. The hooks were heat treated and tested for strength and flexibility. Attempts were made to increase flexibility using different mechanisms, and multiple joining strategies were attempted. Several prototypes were assembled and tested in the water for their effectiveness at catching real fish.

Conclusions

Almost there...

From our work this semester, we now have a more accurate plan for the future of the Sparrowhawk company. We have a very realistic business plan and have made great progress with our prototype. The Delta Hook is almost ready to present to investors. As a transformative technology, this fishing hook will change the fishing industry for the better, making a name for itself as the safer, more reliable and effective hook on the market.