

For ASU student group, good bikes do grow on trees

May 8 2012, By Natasha Karaczan



Both the hand-cycles and standard bicycles are made out of bamboo and recycled bike parts. Credit: BooGood Bicycles

(Phys.org) -- Imagine being unable to attend work or school, simply because mobility and rugged terrain prohibits you from leaving your front door. A student group, BooGood Bicycles, is seeking to find an end this problem by providing sustainable hand-cycles to disabled individuals living in Africa.

While an undergraduate student in the Ira A. Fulton Schools of Engineering at Arizona State University, Derrick Loud was first introduced to the idea of designing a hand-cycle by a non-profit group called Sustainable Resources, a company that offers start-up assistance to projects and industries that provide basic needs, education or jobs to

those in [developing countries](#).

Due to the [rough terrain](#) in Malawi, [Africa](#), a 10-year-old boy was not able to maneuver his [wheelchair](#) through the roads to his school, inevitably making it impossible for him to receive an [education](#). When Loud heard about this, he was inspired to create a hand-cycle for his senior capstone project that would easily attach to the wheelchair that the boy currently had.

After completing the capstone and having his design sent to Africa, Loud realized that he didn't want to stop there, but instead make a universal design using sustainable materials that could potentially help those with disability across the developing world. After being accepted into the biomedical engineering master's program, Loud went about recruiting ASU seniors Kris Saunders and Salim Zeitoun, and BioScience High School senior Doug Liu to join the endeavor.

The group decided to call their business “BooGood [Bicycles](#)” as a play on words since the team uses bamboo to make their products – hand-cycles, as well as standard bicycles they plan to sell. With funding, the group is hoping to open a workshop in Kenya where workers will be trained to build the hand-cycles using only bamboo and recycled bikes parts. This in turn will also provide jobs and stimulate the local economy. And since bamboo is a local and widely available material in Africa, the team will not have to worry about importing or exporting costly building materials.

Implementing their “buy one, build one” model, the team plans to have one hand-cycle built in Africa and donated to someone in need for every bamboo bike they sell here in the United States.

“We want to be able to help empower another persons life through educational resources and by giving them a job, so that is why we

adopted the buy one, build one model,” Liu explains. “We are also doing this sustainably and socially responsibly.”

BooGood is currently is a semi-finalist in the Dell Social Innovation Challenge. The competition supports university entrepreneurs nationwide who seek to solve the world’s toughest challenges.

This year the grand prize is \$50,000 for the taking, which Loud says would be the perfect opportunity to set up both the bike business in the United States, and the hand-cycle work shop in Africa. The group will find out their fate out May 14 when the finalists for the Dell Innovation Challenge are announced.

Looking down the road, the team would like to be the number one selling bamboo bike company in the U.S. With competitive prices from under \$500 a bike and the added bonus of helping those in need, the team feels college students would not mind giving BooGood Bicycles business.

“Many college students are short on cash, so we are giving them another to donate to charity while providing them with a product they would probably buy anyway,” said Loud.

More information: [BooGood Bicycles](#)

Provided by Arizona State University

Citation: For ASU student group, good bikes do grow on trees (2012, May 8) retrieved 26 April 2024 from <https://phys.org/news/2012-05-asu-student-group-good-bikes.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private

study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.