

Sustainable Agriculture at Cincinnati Hills Christian Academy

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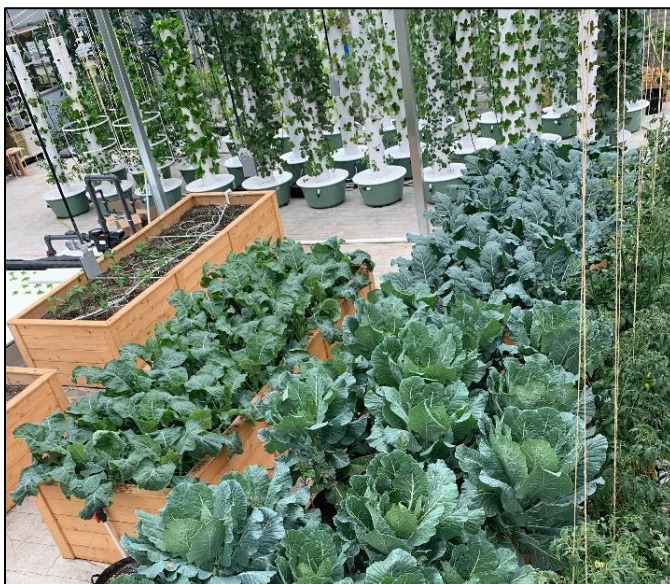
Rough Brothers Inc. has always taken pride in providing our customers with sustainable growing solutions. As the world celebrates Earth Day, we would like to put a spotlight on a recent project we completed at Cincinnati Hills Christian Academy. Not long ago, CHCA decided to upgrade their growing systems. They now utilize an on-campus 4,000 square foot greenhouse as an innovative, hands on experience for

“Here at CHCA we are engaging students with the hands-on learning that comes with growing sustainable produce—students learn about hydroponics, aeroponics, and soil-based growing while testing pH, monitoring plant health, and preparing produce for sale. The experience culminates in the student-run entrepreneurship endeavor of directly selling our produce to consumers through an e-commerce platform, giving students the ability to manage a business while still in high school.”

- Stephen Carter, Head of Entrepreneurship and Sustainability

educating their students on sustainable growing techniques, while tying in the aspects of consumer distribution through their Entrepreneurship and Sustainability Program. A student enrolled in the program at CHCA will encounter each step of the process for food production, from planting seeds and harvesting produce, to preparing meals and managing nutrition. Students make use of the fully equipped commercial kitchen, built onto the back of the greenhouse where they can learn different methods of preparing and cooking the produce grown in the greenhouse. CHCA is empowering their students to apply hands on learning in a new and innovative way.

Students working in the greenhouse experience a variety of different growing techniques, from deep water culture to aeroponics to traditional drip irrigation. The



Raised soil beds using a drip irrigation system

different growing systems within the greenhouse consist of a deep-water culture pond, commercial style tomato grow gutters, propagation tables, tower gardens and raised soil beds. The growing systems in use allow CHCA to maximize their food production while reducing their water footprint and utilizing their limited growing space. Irrigation discharge from the tomato gutter system is recycled and used to irrigate the gardens outside of the greenhouse. Produce grown at CHCA is never touched with any form of pesticide. CHCA is leading the way by teaching its students the importance of sustainable agriculture.



Commercial Tomato Grow Gutter to maximize crop yield



Wood fired pizza baked in school's oven. Made with Tomatoes and Basil grown in the Greenhouse



Different variety of Lettuces grown vertically in Tower Gardens to effectively use available space