

Habitat Restoration with Green Team High School Students

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INTRODUCTION: Plaster Creek, though its watershed is home to many potential stewards in Grand Rapids, is the most polluted creek in West Michigan. Plaster Creek Stewards (PCS) grew out of a collaboration of Calvin College faculty, staff, and students working with local schools, churches, and community partners to restore the health and beauty of this problematic watershed. The Green Team, a branch of PCS, focuses on research, education, and working directly to restore the watershed through urban green infrastructure by utilizing native plants to manage stormwater. With funding from The Bernard Klammer Biology Research Fund, and the Wege Foundation, two Calvin summer researchers and eight high school students living in the Plaster Creek watershed were hired by PCS to work and learn together. The high school student teams worked one of two, three week-long sessions, and the Calvin students worked with both teams as full time PCS staff. When not working with the Green Team, the Calvin students participated in ongoing research and restoration with other PCS summer researchers.

PROJECTS: The Green Team worked to install and plant new curb-cut rain gardens, which collect and process street runoff in the Alger Heights and Ottawa Hills neighborhoods. Installation and maintenance was also done on native landscaping at locations ranging from homeowners' back yards to the local Christian Reformed Church world headquarters building. For larger projects, the Plaster Creek Green Team was joined by the Rogue River Green Team, another Green Team organized and funded by Calvin College and Trout Unlimited. These projects included streambank planting, native seed collection, invasive plant removal and native seed sowing on a restored creek bank. When not working on these projects, students learned about greenhouse work and sowing, transplanting, and potting native plants for use in future projects. The Theme of learning through experience was woven into everything that the Green Team did: during these projects students learned about local history, environmentally-minded workplaces, and how individuals motivated hesitant communities toward positive change. Through all projects there was group conversation on topics from social justice, environmental justice, food choices, home life, college life, and career choices to hobbies and favorite genres of music. The students also met with community leaders like our Regional Manager for Debbie Stabenow, the Wastewater/Stormwater Maintenance Superintendent of the City of Grand Rapids, the Environmental Programs Associate for the Lower Grand River Organization of Watersheds, and the Project Coordinator of Trout Unlimited. To conclude the session, Green Team students learned from Calvin's Precollege Programs about attending college and preparing for the college experience. Not only was restoration work accomplished, but the Green Teams learned why their work was important and how they can continue to be involved in restoration efforts beyond their time as a Green Team member.

REFLECTION: The term "restoration" had little meaning to me before this summer, besides a nice ideal that other people were working towards. I just needed to keep studying, attending classes, taking notes in lecture, and then hope one day that I would find myself doing the restoration work that I could see was so badly needed everywhere I looked. This summer I not only was able to join in the restoration work, but I was able to share my passions with other future restoration workers-- the Green Team high school students. I learned so much this summer through my relationships with people of different ages, skin colors, life experiences, passions, and interests. Restoration work brings people together, people from all backgrounds, and gives them a way connect and learn from each other. This has been a wonderful experience, and I can't be more grateful for the chance it has given me to make a difference in this world.