

What I Learned at a Water Reclamation Facility

OWEA's Public Education Grant

by Cooper Tincu, Lori Cox, Chris Clark, and Jason Tincu

Jason

On November 21, 22, 28 and 29, around 350 Beavercreek School 7th grade students (@ 90 per day) had the opportunity to tour the City of Dayton's Water Reclamation Facility as part of OWEA's Public Education efforts and consistent with Beavercreek Schools water quality curriculum. This partnership between OWEA, Beavercreek Schools and the City of Dayton was spearheaded by Cooper Tincu (7th grader), Lori Cox (Science teacher), City of Dayton staff including Chris Clark, Eric Meyers, Tom Dempsey, Karen Tenroe, Jerry Wright, Paul McCallum, and Craig Marshall, OWEA reps Jason Tincu, Kevin Stillwell, Nakita Lancaster, and Sharon Vaughn. OWEA's grant offering offset about half of the transportation costs and offered the opportunity to touch and impact a large quantity of youngsters. The session, part classroom and part tour, focused on the impact of water quality on our lives, how water utilities and water reclamation facilities function, and what type of careers are available in the water industry. This was, no doubt, a group coordination effort and couldn't be pulled off without any of the partners. Please enjoy the event overview below from a number of perspectives.

Cooper



classmates through Dayton's Water Reclamation Facility and we made it happen!

Top 5 takeaways from this event:

Without water reclamation facilities, our communities would be in bad, bad shape. Treating wastewater is one

of the most important things in order for our world to work. Our rivers would be polluted and people would be sick.

We learned about how water reclamation facilities work including mechanical, biological and chemical processes and also details on how long it takes water to move through the process, how much waste each person contributes each day, and how these facilities are funded. Wastewater plants are very cool to see how they work, what the people do, and how much fun it can be to work there.

My classmates and I learned that water reclamation facilities are recycling centers for many, many different resources. Things like clean water, biosolids (fertilizer), nutrients, and bio-gas are all recycled here.

The water industry offers many jobs and opportunities for my classmates and I and it takes a ton of different skills and positions to operate a facility like Dayton's. Jobs like Operators, Engineers, Lab Techs, Mechanics, etc., all give great opportunities to have a career in the water industry and make good money.

We learned how connected that watersheds are and that what we do upstream affects people and communities downstream. Beavercreek is part of the Little Miami River watershed and what we do here affects people all the way down to the Gulf of Mexico.

Being a part of this event gave me the chance to understand how things like this get coordinated and executed. We all worked very closely together to evaluate options, coordinate details, and make the logistics work. My fellow students were very respectful and appreciative of the opportunity. Many said that it smelled, but I would expect that from 7th graders who have never been to a plant before. I look to take this experience, learn from it, and consider using the things I learned to coordinate future events. I also plan to consider a future career opportunity in the water industry. Thank you!
~Cooper Tincu

Lori

Our field trip to the Dayton Water Treatment Plant proved to be an exceptional learning experience. The information obtained during the classroom presentation and the tour followed our curriculum and allowed our students a real life view of the material. The presenters and guides did an amazing job and kept the students interested. The students gained so much by this experience. They are still talking about the information they learned and refer to the information they learned.

I believe many students will be much more aware of the importance of water conservation after this trip.

I appreciate all the efforts of so many that made this valuable learning experience possible. The funding provided by OWEA helped us pay for transportation to and from the site. The time that so many contributed is priceless. Thank you for such an amazing event!

~Lori Cox, Beavercreek Schools



We are very proud of our facility and the people working here. Our personnel enjoy passing on information about their jobs.

We were also able to introduce them to a whole new world of jobs that they never knew about or considered. We showed them that this was a good, and secure, place to work, whether as an engineer, laboratory chemist, maintenance worker, or plant operator. These are jobs that are not going away. The water industry is here to stay and becoming more important all the time. Hopefully some of them will consider a job in the water industry as their career.

The City of Dayton Water Reclamation Facility encourages school tours and educating our youth on environmental programs. Thanks to Jason Tincu for coordinating the event(s).

~Chris Clark, City of Dayton

Chris

We at the City of Dayton Water Reclamation Facility always consider it an honor to show people around our plant, especially students. We introduced them to a very important part of the ecosystem that most of them never knew existed. They spent about 45 minutes learning about our plant, how it works, and what jobs are involved to keep it operating. Another 45 minutes was a walking tour of the plant so they could actually see what plant personnel had talked about. We are a large plant so they were able to see our influent, clarifiers, trickling filters, cogeneration, aeration basins, anaerobic digesters, and effluent.

Some students had very good questions. We attribute that to their teachers who briefed them before arriving.

