SCHOOL
Augsburg College is a private four-year liberal arts college located in Minneapolis, Minnesota. There are approximately 4,054 students (as of Fall 2009), with 35 departments and programs and over 50 majors to choose from, including Environmental Studies and Metro-Urban Studies. The college is a member of the Associated Colleges of the Twin Cities (ACTC), a collaboration of Twin Cities colleges which focuses on academic exchange and is committed to sustainable urban development, as well as a signatory of the Presidents’ Climate Commitment.

Augsburg’s urban setting and affiliation with the Evangelical Lutheran Church in America, as well as its commitment to accessible education for all, have created a strong sense of community involvement in the school. Within the past few years, students, staff, and faculty have been making a concerted effort to promote sustainable and environmentally responsible practices on campus, including using 100 percent wind-generated electricity, double-sided printing on recycled paper, the Re-Use Table located in the student union, a new Environmental Studies program with a focus on urban environmental justice, promoting energy and water conservation, recycling and waste reduction, trayless dining, a community garden, a new bike-share program, and the organics collection program.

ABSTRACT
Augsburg College began collecting organic materials (food scraps, food-soiled paper, and non-recyclable paper) from the dining areas in the fall of 2008 in an effort to reduce waste produced by the school. With active support and collaboration with our food service provider, A’viands, collection stations were set up in the main dining commons, the coffee shop in the student center, and the two restaurants on campus. As part of this initiative, the dining service switched to using all compostable, plant-based disposable food containers and flatware. Currently, roughly 1,500 lbs. of organics are collected each week. The organic material is then transported to Resource Recovery Technologies, which is located in the outskirts of the Twin Cities, about 25 miles from our campus. There, it is composted and used in public landscaping projects, such as parks and grassed areas on roadsides, or purchased by professional landscapers.

The main costs connected with organics collection are collection and transportation services, as well as the compostable bags and food containers. Still, the project is allowing us to cut our spending on trash collection because an average of 4 cubic yards of organics is being removed from the trash stream and thus saving valuable trash container space for real trash. The school has therefore been able to reduce one weekly trash pickup (8 cubic yards of compacted trash), a savings of $6821/year on garbage collection.

GOALS
The goals of this program are to reduce the waste produced by the campus kitchen and dining areas and to incorporate green practices into the daily functioning of the school and to educate the campus population about how and why the organics collection program was implemented. An intermediate goal, already in progress, is to expand organics collection to catered events. The final stage will include the collection of organics from athletic events, office suites, public spaces and/or residence halls.
Ongoing tasks related to the program include educating current and future incoming students, along with staff and faculty members, on the composting project and encouraging school-wide participation in this effort. Other related tasks include purchasing a collection station in the coffee shop in order to make organics collection in that area more efficient.

Accomplishments and Outcomes
During the first year of the organics program (2008) we reduced our trash volume by at least 82 cubic yards and 30.75 tons, which met our expectations. In September 2009 we held a week-long education campaign (part of a “Sustainability Awareness Month”) to expand the program to all dining facilities and to initiate the program and familiarize students, faculty, and staff about the organics program. In the second year, our collections doubled to at least 164 cubic yards and 65.5 tons of organics collected. Included in the education program was a game to show people what to recycle, what to put in organics collection containers, and what to put in trash containers. New signs were used for the organics collection containers, and several informative posters were staged at key collection spots to help the campus population understand the organics collection process.

The organics collection program has had a significant impact on the school’s waste reduction within the first two years. Collection began in the main dining commons alone, but soon grew to include the other dining areas- we now have four collection sites instead of just one. A trash audit conducted in the spring of 2008, before the program was implemented, showed that compostable materials made up 34.5 percent of the weight of garbage collected. As of Spring 2010, a year and a half into the project, that number decreased to 13.6 percent, and we are working on reducing that percentage even further, so that eventually all organic materials will be composted rather than thrown away. We are working with the composting facility to purchase an amount of compost equivalent to the volume of organics waste we send to them each year, to be used in our community garden and grounds, thus “closing the loop” on our food waste.

Challenges and Responses
There have been several areas in which the project has run into the greatest challenges. Paramount has been the implementation cost and achieving a significant level of community support. The compostable collection bin liner bags and corn-based food containers and flatware are significantly more expensive than plastic bags and Styrofoam containers, an expense which is shouldered by A’Viands, our food service company. The A’Viands directors were eager to have the organics collection program work but were disappointed that the cost of compostable bags, food containers, and utensils could not be reduced.
significantly. A’Viands and the Director of Purchasing are continuing to research better prices for compostable items that may include the use of large group purchasing contracts. In addition, construction of a new organics station would cost upwards of $4000, and the program presently has a very limited budget.

The other major issue has been maintaining the participation of the campus community. Initially, there was considerable enthusiasm for composting food waste, but it has been difficult to keep that level of interest, in particular among the students. Some are apathetic about the project and pay little attention to the signage posted near the organics and trash receptacles, inappropriately disposing of their waste. We are currently working on finding new ways to educate community members about the program and its purpose, as well as training them on proper waste disposal. One way to achieve this is clearer signage on or near collection bins, including posters with pictures of compostable materials to give a visual example. We have also worked with students interested in the program to improve outreach to and education of other students. It is a challenge having many different kinds of containers and packaging, some of which are compostable, some recyclable, and some trash.

We did realize some breakdown in operational support at various times, and that required close monitoring of staff to make sure they did not just throw away the organics into the trash instead of the special containers provided. We had to educate and monitor their actions until they got it right. Our collections of organics would have been higher than the number mentioned above if we hadn’t experienced the operational difficulties. As a result of the operational difficulties, we put specific individuals in charge of making sure their departments were supporting the collections.

**Campus Climate Action: Your School’s Carbon Footprint**

All of our trash and recycling was only 1 percent of our 2007 campus carbon footprint, so the small amount of organics collected would not change our carbon footprint appreciably. The program does not directly address climate change, but it allows the school to reduce the amount of trash burned in the downtown Minneapolis incinerator, thereby decreasing the air pollution released by that facility. The trash burned at the incinerator produces approximately 800 lbs. of CO2 equivalent per ton of solid waste. The carbon footprint of composting is difficult to calculate, but is significantly less than this. By sending 30.75 tons of solid waste to be composted rather than burned, we estimate we are reducing our carbon footprint by about 10 tons of CO2 a year, a miniscule proportion of our total GHG emissions. Increasing our organics (and recycling) program could increase this number. We will be able to further reduce the carbon footprint of transporting our organic waste if we participate in the Seward neighborhood composting program sometime in the near future. Seward plans to build an aerobic digester with the help of Hennepin County sometime in the next year or two. We would supply our organics to them and thus reduce the travel miles from around 30 miles to 2 miles per hauling trip.

**Commentary and Reflection**

The success of our organics collection program is the result of good teamwork on many levels. Students, staff, and faculty worked on all aspects of implementing this program. First, we have the student enthusiasm and initiative to suggest we start the program; then there was the encouragement of the Student Government, Environmental Stewardship Committee, Director of Purchasing, and A’viands catering management. We also could not have succeeded without the support of Hennepin County, who organized the region-wide program, and our trash hauler, Allied Waste, who provided intermediate collection containers and hauled our organics to the processing point. Finally, the composting site managed by RRT (Resource Recovery Technologies) was greatly appreciated. It took a lot of
coordination and shared responsibility to organize and conduct the initial education week and finally on-
going monitoring and supervision of the operation to make sure the program was working as intended.

**ENGAGEMENT AND SUPPORT**

**Leaders and Supporters**
The composting initiative was implemented after a group of students in a Summer 2008 course, Sustainable Cities in North America, went on a trip to Portland, Oregon, and Vancouver, British Columbia to learn about sustainable practices and environmental policy in those cities. Upon their return, the students were inspired to apply what they learned to the campus, and a group of them began discussions with A’Viands to collect organics from the cafeteria. This student effort, led by Kjerstin Hagen (’10, American Indian Studies major), grew over the next year to include the other dining areas.

The Environmental Stewardship Committee, a group of Augsburg community members dedicated to sustainable practices formed in 1999, has also been a leading force in this work. The committee includes faculty, students and staff from a wide variety of departments, such as custodial services, purchasing, political science, and study abroad. It is one of only two committees to which the President of the College belongs. The Environmental Stewardship committee advises the President on all campus sustainability matters. This group has been instrumental in facilitating conversation between the necessary groups and taking care of logistical matters.

Our food service provider, A’Viands, is another major player in the organics collection program. As mentioned before, they are responsible for purchasing compostable bags and food containers, as well as disposing of the organic materials collected. The participation and leadership of both the directors and the staff have been essential to the effort.

We received significant support and technical assistance from Hennepin County’s Organics Recycling Program- they helped to design the organics collection system for the school and various education materials to aid in our outreach to the campus community. Allied Waste our hauler has also been a valuable partner in the program.

**Funding and Resources**
The estimated total cost for the implementation of the program in FY 2010 was $11,827.

This cost includes:

- Construction of the organics collection station in the dining commons: $4,200
- Hauling of organic materials: $3,271/year for pickup twice a week
- Compostable bags: 5,000 bags a year @ $0.85/bag
- Corn-based food containers, plates, cups, utensils:
  - (difference between organics & standard non-compostable containers)
- Labels for the new food containers:
- Education/outreach materials (posters, displays, speakers, etc.):

The program is funded mainly by two departments: Custodial Services and A’Viands. There has been some money contributed by the Environmental Stewardship Committee and student government as well, in particular for graphics on educational materials and for labeling.
Education and Community Outreach
Posters and signs have been a simple but effective method of education of the student body. Waste receptacles are all labeled with what type of waste should be placed there. In the coffee shop, there is a large poster with pictures of what items should be composted. We also have removable signs to be placed on receptacles used for events.

Articles on the program have been published in various campus news sources, including the school newspaper, the *Echo*, the Inside Augsburg homepage, and *Augsburg Now*, a triannually published campus magazine.

Student-organized events are essential to promote student interest in and understanding of organics collection. In September of 2009, Kjerstin Hagen and other students organized Sustainability Awareness Month, which highlighted the composting program as well as other campus sustainability projects.

National Wildlife Federation’s Campus Ecology Program
Augsburg has had a relationship with NWF for 10 years, and they have been a useful resource, providing encouragement for our own sustainability programs through the examples of other schools.

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MORE ABOUT YOUR SCHOOL
Campus Sustainability History
Augsburg is currently working on a number of efforts to green the campus, many of which are student initiatives. In 2008, Student Government conducted a referendum to purchase wind power for the school through a yearly student fee, and the campus now uses 100 percent wind energy. The Environmental Task Force of Augsburg’s chapter of the Minnesota Public Interest Research Group (MPIRG) has worked on projects from educating students about green transportation options to petitions for an improved citywide recycling ordinance to putting together a group of students who will work to reduce energy wasted in offices and classrooms. Environmentally focused classes have also played a large role in promoting green practices on campus, in particular the Integrated Term (a semester of multidisciplinary classes compiled into the course Fate of the Earth 101) and the Environmental Studies program. These programs have been
involved with campus projects such as rain gardens, which capture water runoff, potential use of solar energy, and purchasing more local food.

The Environmental Stewardship Committee is the school’s main force behind the implementation and continuation of sustainability initiatives. More information can be found at http://www.augsburg.edu/green.