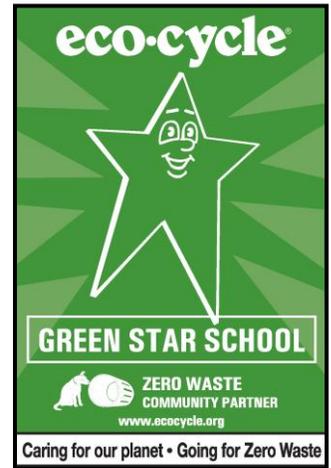


Green Star Schools® Annual Report **2013-2014 School Year**

You never cease to amaze me with the wonderful job that you do. It is really the schools that should be thanking you. We are so lucky to be working with you – your impact on our children, and therefore the future of our earth, is truly meaningful.

--Kent Cruger, Principal, Bear Creek Elementary

Eco-Cycle's Green Star Schools program is the first comprehensive Zero Waste schools project in the nation. The goal of this program is to move each school as close as possible to Zero Waste. This is done by monitoring trash volumes, initiating compost collections, increasing the volume of recyclables collected, implementing multiple waste reduction projects, and conducting extensive training and education.



Eco-Cycle's project is unique because: 1) it targets the collection of compostables from entire school waste streams, including lunchrooms, kitchens, classrooms, offices and restrooms (paper towels), 2) it emphasizes waste reduction in addition to composting and recycling, 3) all students and staff are fully integrated into the program and 4) Eco-Cycle provides extensive and on-going support, feedback, incentives, special projects and rewards to participating schools.

This school year, the Green Star Schools program continued the development of the new high school model. Year-two activities that were created for piloting at New Vista High School included relay-race-style refresher assemblies and a Zero Waste Around the World presentation. Both engaged the entire student population and staff. In addition, we continued to work with the four pilot middle schools: Summit, Southern Hills, Manhattan and Casey.



Until 2010, the Green Star Schools program was primarily focused on the elementary level. The decision to develop a middle school model was the result of a large number of requests from middle school staff, parents and, most importantly, student graduates of Green Star elementaries. In turn, graduates of the pilot middle schools are now entering high school. Our ultimate goal is to have every school and every grade level in Boulder Valley and St. Vrain Valley School Districts enrolled in the program. Achieving this goal will be dependent on adequate funding.

Currently thirty-six Boulder County schools are participating, representing 44% of the public schools in the County. During the 2013-2014 school year, 811 students and 88 staff were added as participants to the project. The total number for the program overall is now 15,442 students and 1,959 staff in the 36 participating schools. In addition, approximately 170 tons of compost was diverted from the landfill during the 2013-2014 school year.

Two new Green Star Schools were launched during the 2013-2014 school year from two different areas of Boulder County: Central Elementary in Longmont and Coal Creek Elementary in Louisville. Hygiene Elementary in Hygiene also began initial start-up activities in preparation for a fall 2014 launch.

The Green Star Schools program began with four pilot schools in February of 2005: Douglass Elementary, Horizons K-8, Boulder Community School of Integrated Studies and High Peaks Elementary. The following schools have been added in subsequent years:

- Spring of 2006: Mesa Elementary, Bear Creek Elementary, Creekside Elementary, Foothill Elementary and Nederland Elementary
- Spring of 2007: Eisenhower Elementary, Heatherwood Elementary, Columbine Elementary, Lyons Elementary and Niwot Elementary
- Spring of 2008: Louisville Elementary, Community Montessori and Summit Middle School

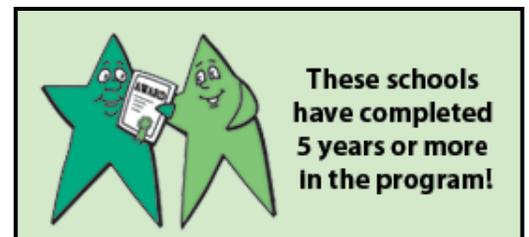
- Spring of 2009: University Hill Elementary, Ryan Elementary, Eagle Crest Elementary and Longmont Estates Elementary
- Spring of 2010: Southern Hills Middle School, Lafayette Elementary and Blue Mountain Elementary
- Spring of 2011: Manhattan Middle School, Fireside Elementary and Crest View Elementary
- Fall of 2011 and spring of 2012: Casey Middle School, Red Hawk Elementary, Flatirons Elementary and Whittier Elementary
- Fall of 2012 and spring of 2013: Burlington Elementary, Jamestown Elementary and New Vista High School

Twenty-one of the 36 Green Star Schools are located in Boulder to create routing efficiencies for the compost collection system. However, as Eco-Cycle has expanded its compost collection routes into new communities, we have been able to work with schools in other areas. Nederland Elementary, Jamestown Elementary, Lyons Elementary and Niwot Elementary represent an expansion into those communities. Longmont Estates, Eagle Crest, Blue Mountain, Burlington and Central Elementaries are the first participating schools in Longmont. Ryan Elementary and Lafayette Elementary are located in Lafayette. Louisville Elementary, Fireside Elementary and Coal Creek Elementary are located in Louisville and Red Hawk Elementary is located in Erie.

We have continued to integrate Hispanic, English-as-a-second-language and lower-income students into the program as we expand into new schools throughout Boulder County. Casey Middle School, Manhattan Middle School and Lafayette, Ryan, University Hill, Columbine, Creekside, Crest View, Eisenhower, Whittier, Burlington and Central Elementary Schools all serve these populations. Overall, 24% of Green Star students qualify for free/reduced price lunch and 26% identify as non-Caucasian.

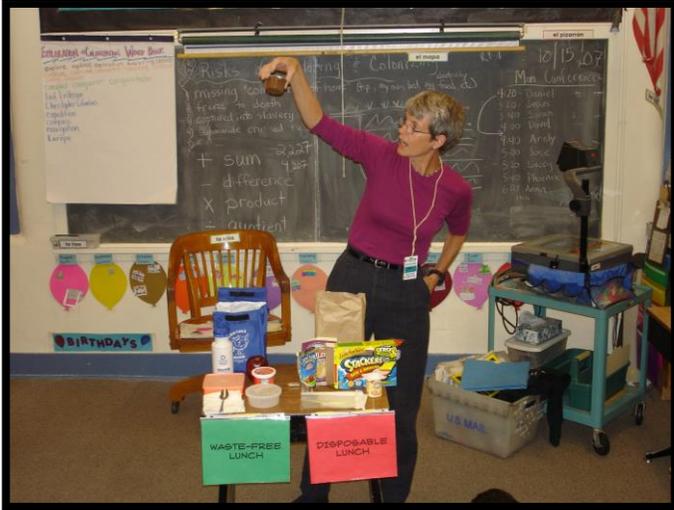


For the fourth year in a row, we conducted Five-Year Celebrations in the fall to acknowledge those schools that recently completed their fifth year in the program. The celebrations included an award assembly for each school at which a certificate of recognition was presented by the Superintendent of Schools and a Boulder County Commissioner. In the elementary schools, following the assembly, four days of reinforcement and retraining activities took place for students and staff including classroom presentations, lunchroom quizzes and cloth-napkin making at recess. Summit Middle School was our first middle school to celebrate five years. Their assembly included waste-station relay races between students and staff. Instead of having napkin making, the middle school students had to bring a waste-free lunch and/or return all their durables to the cafeteria for three days during the celebratory week to enter a prize drawing to win movie passes. They each had a Green Star stamp card with Green Star stamps placed by Eco-Cycle staff during the lunches. This year's Five-Year schools were Community Montessori, Summit Middle School and Louisville Elementary.



Program Training, Education and Reinforcement Activities:

The following describes key project activities for the school year.



1. Activities for the new Green Star Schools:

- a. monitoring of school trash volumes before kick-off
- b. work with each student sponsor group to do a trash audit, and to create posters and give announcements for the kick-off period
- c. work with school staff (principal, custodian, kitchen staff and teachers) in several meetings and site visits to prepare for kick-off
- d. labeling and distribution of all internal and external containers for each school
- e. kick-off assemblies, parent letters sent home to families
- f. classroom training presentations for all individual classes

- g. lunchroom monitoring for six weeks after each kick-off (with aid of student sponsor group and/or parents)
- h. post kick-off monitoring of trash volumes and compost volume to determine project success and the appropriate cut to trash service
- i. end of the year feedback and motivators for each school, including party for the sponsor class, graphs of program progress for the hallway and newsletter, and compost delivery to each school (student sponsor group helps to promote)

2. Activities for schools launched in the previous two school years:

- a. fall parent letters reestablishing the program for the new school year and emphasizing waste-free lunch concepts
- b. tabling at back-to-school events to promote the program and waste-free lunch concepts
- c. fall grade-level assemblies to remind students of the sorting system and to emphasize waste-free lunch
- d. fall cafeteria monitoring to maintain student participation and reduce contamination
- e. ongoing work with student sponsor groups including trash audits, promotional tools such as posters and PA system announcements, and student created skits, blogs or videos to teach other students proper sorting
- f. promotion and implementation of the spring compost delivery with the help of the student sponsor group (first two years of participation)
- g. spring field trip or party for student sponsor groups



3. Schools that have been in the program for more than three years are eligible for any of the above services on request (except compost delivery) to reinvigorate their program. Most schools take a year off, then request a customized set of services to keep their program vital.

4. Our new preschool presentation on recycling and composting is delivered to many Green Star School preschool classes. We developed this in response to the growing number of public schools that now serve this age group.

5. Primary-level Nature's Recycling and Composting presentations are given to kindergarten, first and second grade classes in each new Green Star School and to all kindergartens in all other Green Star Schools every year. This presentation is designed to clear up the confusion younger children have about how composting works and why it is good for the environment.



6. Green Star Schools also have the opportunity to integrate Zero Waste practices into all-school community events. These events are usually held after hours, include food and are often fundraisers. Eco-Cycle works with the planning committee of parents and/or teachers to ensure that all food service items are recyclable, compostable or reusable. We staff the waste station(s) at the event and set

up an information table to educate families about compostable products, Zero Waste and the Green Star Schools program. For some events, we also provide face painting or other fun craft activities to attract families to the table. The following events were Zero Waste during the 2013-2014 school year:

8/21	Red Hawk Elementary	Back to School Night
8/22	Red Hawk Elementary	Back to School Night
9/3	Whittier Elementary	Back to School Night
9/11	Casey Middle School	Back to School Night
9/11	New Vista High School	Back to School Night
10/26	Columbine Elementary	Harvest Fest
12/8	BCSIS	Carnival
3/7	Blue Mountain Elementary	Recycle-A-Ball
3/7	Lyons Elementary	Bingo Night
3/15	Crest View Elementary	Spring Fling
3/20	BCSIS	Spaghetti Feast
4/11	Niwot Elementary	Sock Hop
4/23	Community Montessori	Earth Day
5/2	Coal Creek Elementary	Spring Sock Hop
5/16	Fireside Elementary	Carnival
5/18	University Hill Elementary	End-of-the-Year Fiesta Party
5/22	Louisville Elementary	WISE Dinner
5/27	Lafayette Elementary	5th Grade Continuation



7. Two to three cubic yards of compostables (food waste and non-recyclable paper) are collected weekly from each school and delivered to A-1 Organics, a large-scale composting facility in Keenesburg. As a thank you to participating schools at the end of their first and second years with the program, each receives a truckload of finished compost to benefit the entire school community. It is used for on-site classroom, garden and landscaping projects, and for families and school staff to take home.

Special Green Star Schools Projects:

1. The custodians of both St. Vrain Valley School District and Boulder Valley School District work hard supporting the Green Star Schools program. To show our appreciation, we held a prize drawing for all custodial staff. Principals and Head Custodians were invited to submit the names of the entire custodial staff at their school. Twenty-seven schools entered the contest and winners were randomly drawn. The head custodian at Blue Mountain Elementary won first prize, a \$40 restaurant gift card. Second prize, won by three BVSD custodians, was an Eco-Cycle t-shirt. Winners received their prizes along with a certificate of appreciation signed by the Green Star Schools Coordinator and the principal of their school.



2. To reinforce proper sorting of materials, answer staff questions, discuss custodial concerns and improve the signage at each school, the Green Star Schools Coordinator visited each Green Star school to distribute the newly-developed, color, pictorial school guidelines, depicting what should be composted, recycled and landfilled. These were posted in school workrooms and staff lounges, and distributed to school staff.

3. Last school year, Nineteen Green Star Schools in the Boulder Valley and St. Vrain Valley School Districts signed up for *Eco-Cycle's Stop Junk Mail for GOOD contest*, which ran from January 21 to February 4 of 2013. The competing schools had two weeks to encourage staff and students' families to sign up for a free Stop Junk Mail for GOOD account. University Hill Elementary of Boulder came in first with the largest percentage of contest participants (30%) and received a \$400 cash prize. Second place was a tie between Heatherwood Elementary and Bear Creek Elementary, each with 21% participation. These schools each received a check for \$100. In total, all contest participants' efforts combined decreased carbon dioxide pollution by 41,585 pounds, saved 100,132 gallons of water and eliminated 14,750 pounds of unwanted mail.

4. This was the third year of the *Reusables Rule at Our School! Reusable Water Bottle Project*. The project is funded by the City of Boulder, BVSD and Eco-Cycle. The goal is to eliminate waste from single-use water bottles (from both the trash and recycling streams) and to increase student use of reusable water bottles by bringing attention to the idea of refilling bottles and by making it easier for kids to refill their bottles at school. The project involves retrofits to school water fountains and an education campaign for each school. The two participating schools were University Hill Elementary and New Vista High School.



Building on the success of previous years' retrofits, the same sturdy gooseneck spouts and automatic bottle-filler (with a digital refill counter) were newly installed at both schools. Eco-Cycle staff worked closely with BVSD plumbing and electrical staff to determine correct placements for these installations. Each school had one Elkay EZH2O automatic bottle-filler installed near the front office. Three existing drinking fountains at New Vista and two existing drinking fountains at Uni-Hill were retrofitted with the gooseneck spouts.

To promote this project at each school, Eco-Cycle wrote age-specific announcements for the P.A. system, sent home a parent letter, posted posters above the new equipment, and staffed a table for two days during lunch recess or break times. Students who did not own reusable water bottles were encouraged to enter a drawing to win a reusable City of Boulder water bottle. Uni-Hill students were challenged to bring a reusable water bottle to the table on the first day and receive a sticker. On the stickers they made marks each time they refilled their bottles that week. At Eco-Cycle's second visit (one week later), students returned with their stickered bottles, and, if they showed at least five refills, were entered into a prize drawing. New Vista students stopped by the table to take a shower timer, look at a Boulder watershed map and receive a contest entry form/school map (on which they could mark the locations of the new equipment at their school). The marked maps were later collected and six students won movie passes for their participation.

5. The *Green Star Schools coloring book* was distributed to kindergarten, first and second grade students in our newest elementary schools, and in the Five-Year Celebration schools. The coloring book contains activities that reinforce recycling and composting skills. After completing the six coloring/activity pages, the book unfolds into a large poster that students may color and post at home.



6. We continued to promote the *Green Star Schools Children's Used Book Project*. As a benefit for participation in the program, Green Star Schools have access to our supply of thousands of used children's books collected at the Center for Hard-to-Recycle Materials. The books can be used for fundraisers, student awards and student incentives instead of toys, candy, wrapping paper, etc., reducing garbage generated and promoting literacy. The project is an overwhelming success, with 7,821 distributed this school year.



7. In the fall, we presented four *Composting with Worms Workshops* to families and teachers from Green Star Schools. At each of these 1.5 hour workshops, participants learn about the value of worm bins to the environment, how to start, maintain and troubleshoot their bin, and the biology of red worms. Each teacher or family is given a free worm bin and bedding for their classroom or home, a fruit fly trap and a coupon for a 25% discount on red worms from Uncle Jim's Worm Farm. Eco-Cycle staff is available for the rest of the school year to give advice over the phone as participants develop their bins.

8. The *Zero Waste-Green Star Schools Grants* were implemented again this year. The grants are offered to schools that have been in the program for two or more semesters. This year, they will provide students in four Green Star Schools with compostable plates and cups for their all-school classroom parties (or school-wide events) throughout the 2014-2015 school year. The winning schools, Burlington Elementary, Crest View Elementary, High Peaks Elementary and Summit Middle School were chosen based on their storage and distribution plans for the compostable materials, their participation in the Green Star Schools program and their commitment to furthering Zero Waste activities and behaviors in their building.

9. The Green Star Schools *Zero Waste Party Tips flier* was given to teachers and room parents, providing suggestions for creating less waste during classroom parties. These Zero Waste tips were generated by Eco-Cycle staff, as well as teachers and parents from various Green Star Schools. The tips are emailed to each Green Star School three times during the year (before each all-school party: fall, Valentine's Day and end-of-the-year).

10. Eco-Cycle's *Holiday Zero Waste Guide*, featuring suggestions for specific waste reduction activities, is distributed each December to families in the Green Star Schools. The guide is offered in English and Spanish.

11. Another Green Star Schools project in its fifth year is the end-of-the-year *Classroom Cleanout*. This year, three Green Star Schools, Bear Creek Elementary, Mesa Elementary and Eisenhower Elementary, hosted exchange tables for two days at the end of the school year for unwanted school supplies. Student sponsors advertise the event by making P.A. announcements and through an ad in the parent newsletter (both provided by Eco-Cycle). During the event, teachers and students are able to select items from the "unwanted" table for use during the next school year. At the end of two days, Eco-Cycle staff collect whatever is left over. This year the materials will be sent to four low-income schools in New Mexico.



12. The *Green Star Schools News* was distributed again this year to share ideas between participating schools. This twice-a-year newsletter has been very inspirational for us and for the schools.

13. To help schools spread the word about their Green Star Schools program, a section of *Eco-Cycle's website* (www.ecocycle.org) links to the 36 participating schools' websites. A web button is provided to each school. This helps participating schools publicize their Zero Waste efforts, aiding them in recruiting prospective families for enrollment.

14. Durable *Green Star Schools* banners are distributed to each of the Green Star Schools for display in the school's foyer. These colorful banners are presented to each new Green Star School on kick-off day.

15. *Eco-Cycle* works with Boulder Valley School District Education Center staff to maintain a Zero Waste program in their building that is in keeping with the Green Star Schools program. This year, we helped at their newly-purchased and upgraded waste stations. The Green Star Schools Coordinator answered questions from staff during two days of lunches.

Eco-Cycle also works with the St. Vrain Valley School District custodial staff. The Green Star Schools Coordinator presented at their annual in-service meeting for a second year in a row. However, this year included recognizing all the Green Star Schools custodians and presenting each with a certificate of appreciation. The presentation included a Power Point on recycling to all 180 district custodians. The presentation ended with an eco-fact quiz, where prizes including Eco-Cycle water bottles, Eco-Cycle shopping bags and Wrap n' Mats were given for correct answers.

Program Results and Challenges:

As a result of the activities described above, all 36 Green Star Schools continue to make progress in working toward Zero Waste. By the end of the first semester of participation, each school is able to cut their trash by one third to one half, and we continue to work with them to divert more of their waste from the landfill through recycling, composting and waste reduction projects. Both Boulder Valley and St. Vrain Valley School Districts have received the benefit of this waste diversion through savings in their trash bill. Both have agreed to fund the hauling of the compostables again for the 2014-2015 school year.

The Green Star Schools program provides for the thorough education and involvement of students, staff and school community members. The continuity of program elements from building to building (education, signage, messaging, training, collection containers and procedures) allows for anyone from one Green Star School to transition into another with ease. *Thus, the new middle school and high school models have been successful largely due to the fact that the majority of incoming students came from Green Star Schools, and the operational system remains consistent throughout their Green Star experience.* As we continue development of the high school model, keeping operational elements consistent is very important.

Working with New Vista High School as the first Green Star high school has allowed us to begin experimenting with procedures, messages and activities that are effective for this age group. As New Vista is a small high school with an established ecology club, we were able to capitalize on these elements to create a successful launch. When we expand to a larger mainstream high school, many of the things we have learned will transfer over, but many new procedures and activities will also need to be developed.

In November, a random survey of 150 school principals, key staff and involved parents was conducted to get feedback on the program. Sixty-nine parents, administrators, office staff, custodians and teachers responded. These are key individuals that we work with on an ongoing basis to implement the program. The survey was broken into two parts: general questions and questions about special benefits provided to the school. Some of the results of the survey and how we might improve the program over time include:

- Distribute new signage that emphasizes pictures over lists
- Expand the Classroom Cleanout project to include more schools
- Find new ways to involve more schools in our Waste-Free Events services
- Increase the mini-grant program when funding allows
- Continue the Worm Bin Trainings for more years
- Discontinue the newspaper ads and use funds in more needed areas
- Develop some shorter options for refresher presentations that stressed teachers can opt for
- Develop an in-school paper reduction campaign

The following are the changes we made during the spring semester:

- New signage that emphasizes pictures over lists was posted and distributed to all schools.
- The number of Waste-Free Events we helped to facilitate was increased. We will continue to increase our promotion of this service in the future.
- Worm Bin Trainings will be continued in the fall of 2014.

- The newspaper ads were discontinued and the funds used in more needed areas.
- Relay-race refresher assemblies were offered as a new way to reinvigorate students.

Ongoing education in each Green Star building is necessary to reinforce skills and practices due to the turn-over of staff and students. On-going education and reinforcement for all schools, not just beginning schools, puts increasing demands on Eco-Cycle staff as the number of schools increases. In addition, the number of schools on our waitlist continues to grow, currently to 26. We estimate that the cost to launch an average school is approximately \$15,000-\$16,000 and the cost to maintain each school in the program is \$3,500 per year. As a result, the annual program budget continues to increase, as does the need for funding.

For the second year in a row, we worked with Boulder County, Boulder Valley School District and St. Vrain Valley School District to create a funding partnership that, in combination with Eco-Cycle funding and multiple grants, allows us to stabilize the program and expand it to more schools each year.

We also continued our partnership with Red Apple Recycling. Red Apple Recycling is a Denver-based 501 (C) (3) nonprofit that collects clothes, textiles and shoes for recycling. Red Apple and Eco-Cycle have been working together to place Little Red Schoolhouse collection boxes at Green Star Schools. Part of the proceeds from all materials collected will directly fund the Green Star Schools program. This project is a small revenue source. Its main value is to provide a collection service at participating schools. Eisenhower Elementary was added this year. Other participating locations include Bear Creek Elementary, Mesa Elementary, Heatherwood Elementary, Douglass Elementary, Manhattan Middle, Niwot Elementary, University-Hill Elementary and Southern Hills Middle.

A budget deficit (as shown below) required that we decrease some of our costs this school year. We did so by adding only two elementary schools and by eliminating the end-of-the year newspaper ads (which participants indicated was no longer a benefit they prioritize).

Financials:

Grant funding was provided by the foundations listed in the budget below, along with Eco-Cycle and the public agencies mentioned above. Eco-Cycle is grateful to these organizations for their support and generosity. The monies were used to fund the collection containers, education programs, incentive activities, staff time and materials also listed below.

Eco-Cycle Green Star Schools Program Budget 2013-14

Expenses (through end of school year):	Budget	Actual
posters and banners	\$380	\$74
print materials	\$400	\$498
translation (Spanish)	\$150	\$0
graphic artist/curriculum design	\$4,000	\$0
waste audit/worm bin/other materials	\$400	\$479
compostable food serveware for school parties	\$1,000	\$868
special waste reduction projects and contests	\$1,500	\$70
bus/substitute teacher costs for student field trips	\$200	\$0
compost for giveaway	\$4,500	\$1,107
incentives and acknowledgements	\$300	\$323
newspaper ads to recognize schools and funders	\$1,600	\$0
classroom/hall collection containers	\$4,500	\$1,140
dumpsters/wheeled carts	\$2,200	\$1,110
collection of compostables	\$25,328	\$25,397
mileage	\$2,500	\$2,100
employee labor/benefits		
compensation	\$89,523	\$78,400

