

The Glocal Challenge: Food Waste Reduction Kits Team Report

November 16th, 2017

Last fall, the annual Glocal Challenge was held once again in Cambridge Rindge and Latin School (CRLS). The Glocal Challenge is an annual program hosted by CRLS in partnership with the City of Cambridge and EF Education First where CRLS students propose innovative solutions to challenges facing Cambridge residents. The prompt for 2016-2017 challenge was “How can we reduce food waste in Cambridge?” and five CRLS sophomores Anthony Grassi, Philos Kim, Nathan Kolodney, Alex Sadock and Mohamed Shafim proposed to deliver food waste reduction kits to middle to lower income households to prolong the life of their food, saving them money on their groceries as well as reducing food waste.

Methodology

In the spring of 2017, the team surveyed random Cambridge residents about which food waste reducing or food prolonging items they would actually use in their households. With the survey results they collected, they ordered and put together approximately 200 units of food waste reducing kit that held the following items:

- **Bluapple:** a blue plastic apple that reduces ethylene gas, which causes food to ripen, to place in the refrigerator to prolong the life of fresh produce. Two refill filters were also included in the kit.
- **Bag Clips:** plastic clips of different sizes that can be used to reseal opened chip or plastic bags to keep food fresh for longer.
- **Rubbermaid Food Saver:** a specially designed plastic container that regulates humidity and airflow, allowing the food inside it to stay fresh up to 80% longer.

In order to be conscious of income inequality issues, the team chose to focus on middle and lower income households to distribute these kits to. Over their summer internship with the City of Cambridge through the Mayor’s Summer Youth Employment Program, the team visited each residence in 808 and 812 Memorial Drive and offered the kits and asked the residents to fill out the pre-survey they created, which mainly assessed their knowledge of food-prolonging items and willingness to use them. Then, towards the end of their internship in a few weeks, they went back to each residence and asked them to complete a post-survey as well, which addressed the impact of the kit.

Pre-Survey

Among approximately 300 households they went visited, 84 residents filled out the pre-survey. Interestingly, 55 out of the 84 pre-survey respondents (65%) claimed that they already had tools or items to reduce food waste in their homes, although only 31 (37%) stated that they knew of these kinds of tools that help to prolong the life of food. 48 (57%) claimed to have thought of using such tools, but 12 (14%) did not because the items were too expensive. 39 (46%) stated that they did not know enough about the tools and 5 (6%) did not care about using them. 61 (73%) believed they would save more food if they had access to items to reduce wasted food, and 18 (21%) thought they might be able to, while 2 (2%) did not think they would. 38 (45%) thought that the items they already have in their household made an impact on the amount of food they wasted, and 23 (27%) did not think the items made an impact, and 23 (37%) did not know whether or not the items made an impact.

Post-Survey

A few weeks or days after the delivery and the pre-survey, the team went back to the residences that accepted a kit. Out of the 30 respondents for the post-survey, 25 (83% of the total respondents for the post-survey) had used the items by the time the team went back with the post-survey. 19 out of 25 who have used the items (76% of those who have used the items) responded that the items have made an impact on their household food waste and 4 (16%) claimed that the items have somewhat made an impact. 15 (60%) users also responded that the items have helped them save money on groceries, 7 (28%) said they somewhat helped, and 3 (12%) said they did not help.

Conclusion

It seems that most of the residents who received the kit had positive results from it. 76 percent of those who used the items and responded to the post survey claimed that the items have made an impact on their household food waste, and 60 percent observed that they helped them save money on groceries. A few residents made sure to express gratitude for the team's effort and requested more information on how to keep food fresh longer.