

POLICY REPORT
April 2018

# Good Food Purchasing for the Buffalo Public Schools

Jessica Gilbert



#### Introduction

Good food is vital for our students and our community. Recognizing the important connections between the amount and quality of food that students receive, their behavior, and their academic performance, numerous stakeholders within Buffalo Public Schools (BPS) and the community have taken strides to improve school food. This report provides an initial overview of the current status of school food at BPS and many of these school food improvement initiatives. Based on interviews with local school food stakeholders, experiences from other school districts across the United States, and various other studies analyzing school food, this report documents the successes thus far and assesses where there is room for improvement. The analysis is framed within the Good Food Purchasing Program's (GFPP) core values: local economies, nutrition, labor, environmental sustainability, and animal welfare.

Between the 1980s and early 2000s, the quality of school food witnessed a decline across the United States. In 2012, the Healthy Hunger-Free Kids Act was introduced, and the nutritional value of school food immediately began to improve. However, some of the regulations within this Act were rolled back in 2017 by the current presidential administration. The full impact of these changes has yet to be seen. Some will be negative, while others might be positive. For example, the 2017 rules allow for flavoring of low-fat milk instead of requiring flavored milk to be non-fat. While the added fat calories might be detrimental to some children, for others, this might help them to fill up at lunchtime and thus avoid unhealthy snacking.

In addition to shifting regulations, the current status of school food throughout the country has primarily been the result of declining food budgets: as of 2011, the average American school had only one dollar to spend on ingredients per meal served.<sup>2</sup> Schools districts are often forced to give preference to cost rather than to quality, meaning an increase in highly processed foods and a decrease in fresh and

This policy report was drafted by Jessica Gilbert, research associate at PPG and PhD Candidate in the University at Buffalo's Department of Geography.

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Special thanks to all of those willing to contribute their experiences, views, and expertise during the interview process and beyond.

healthier foods.<sup>3</sup> Since highly processed food has become the norm, schools, kitchens and commissaries have adjusted accordingly, and many no longer possess the equipment and expertise necessary to transition back to scratch cooking. However, numerous efforts are being undertaken by groups throughout the country to improve school food, which include the creation of Farm to School programs, planting school gardens, and lobbying for policy change.<sup>4</sup> While some of these efforts address school food at a national level, the majority occur at the school district level.<sup>5</sup>

This report examines the current status of school food in the Buffalo Public Schools and efforts to improve it. While recognizing the importance of increasing food quality from a nutritional standpoint, it also assesses the impact of school food on other aspects of the food system, including labor conditions, local economies, animal welfare, and the environment. Using these five supply chain elements, the report seeks to identify where school food improvement initiatives have been successful, and where more work can be done to improve school food for all those that it impacts.

#### Food in Buffalo Public Schools: Current Status

Buffalo Public Schools (BPS) serves 28,000 lunches, 25,000 breakfasts, and 5,000 snacks per day during the school year, as well as 14,000 lunches per day during the summer. In order to produce and serve this amount of food, BPS spends over \$13.8 million on food and over \$7 million on school food service staff (SFS) every year. Much of the funding for these expenditures comes from the United States Department of Agriculture (USDA), which provides food, primarily proteins, through the Government Commodity Program (GCP) and through meal reimbursements. Due to the large percentage of students eligible to receive free or reduced price meals, BPS qualifies to have all meals reimbursed by the USDA. The resulting funds are dedicated to the purchase and processing of foods that are not provided free by the GCP.

While the quality of school food has greatly improved in the past several years, more progress is possible. BPS strictly adheres to

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USDA regulations; however, even with these regulations, including those implemented by the Healthy Hunger-Free Kids Act, many stakeholders both within BPS and throughout the Buffalo community see room for new and expanded initiatives and policies.

Figure 1: BPS 2018 Menu



As a result, these stakeholders have started to implement numerous initiatives aiming to improve school food, although significant barriers remain. While BPS is able to avoid some of the budgetary constraints that other school districts face, they remain extremely limited by the facilities in the school kitchens and the District Commissary, as well as by local and national policy. As a result, although the amount of local and fresh food served throughout the District is gradually increasing, most BPS food is still non-local and often highly processed.

#### USDA REGULATIONS

The United States Department of Agriculture administers both the National School Lunch and Breakfast Programs, through which regulations are set determining the components of school meals. While there are numerous facets to this program, there are a few basic requirements that we should mention here. First, students are divided into three age groups (grades K-5, 5-8, and 9-12), and each is assigned a minimum and maximum caloric intake per meal. This caloric range differs from breakfast to lunch, as well. Portion sizes of each meal component are based on the number of calories that each age group should consume per day. In addition, there are several food groups that each meal must include: fruit, vegetables, grains, proteins, and fluid milk. Table 1 below outlines the portion requirements for each of these food groups based on the students' age.<sup>8</sup> Please note that this diagram pertains to the Lunch Program, and that portion and component requirements differ for the Breakfast Program. Finally, Table 2 lists the foods that qualify as each of the required food groups.

"The Commissary is really working to improve school food... but it is hard to make really good food to scale... Those in charge really care about the kids and are doing their best to make changes, but there are so many very real barriers that they face."

BPS Parent and Community Advocate

**Table 1: USDA School Lunch Requirements** 

Mod pottors	Lunch meal pattern		
Meal pattern	Grades K-5	Grades 6-8	Grades 9-12
	Amount of food a per week (minimum per day)		
Fruits (cups) b Vegetables (cups) b Dark green c Red/Orange c Beans and peas (legumes) c Starchy c Other cd Additional Veg to Reach Total c Grains (oz eq) f Meats/Meat Alternates (oz eq)	2½ (½) 3¾ (¾) ½ ¾4 ½ ½ ½ 1e 8–9 (1) 8–10 (1)	2½ (½) 33/4 (3/4) ½ 3/4 ½ ½ ½ 1/2 1 = 8–10 (1) 9–10 (1)	5 ( 5 ( 1 10–12 ( 10–12 ( 5 (
Fluid milk (cups) 9	5 (1) verage for a 5-Day	5 (1) Week	
Min-max calories (kcal) <sup>h</sup>	550–650 <10 ≤640	600–700 <10 ≤710	750–8 < ≤7
Trans fat h	Nutrition label or manufacturer specifications must indicate zero grams of <i>trans</i> fat per serving.		

a Food items included in each group and subgroup and amount equivalents. Minimum creditable serving is ½ cup.

b One quarter-cup of dried fruit counts as ½ cup of fruit; 1 cup of leafy greens counts as ½ cup of vegetables. No more than half of the fruit or vegetable offerings may be in the form of juice. All juice must be 100% full-strength.

c Larger amounts of these vegetables may be served.

d This category consists of "Other vegetables" as defined in § 210.10(c)(2)(iii)(E). For the purposes of the NSLP, the "Other vegetables" re-

quirement may be met with any additional amounts from the dark green, red/orange, and beans/peas (legumes) vegetable subgroups as defined in §210.10(c)(2)(iii).

any vegetable subgroup may be offered to meet the total weekly vegetable requirement.

Beginning July 1, 2012 (SY 2012–2013), at least half of grains offered must be whole grain-rich. Beginning July 1, 2014 (SY 2014–15), all grains must be whole grain-rich.

Beginning July 1, 2012 (SY 2012–2013), all fluid milk must be low-fat (1 percent or less, unflavored) or fat-free (unflavored or flavored).

h Discretionary sources of calories (solid fats and added sugars) may be added to the meal pattern if within the specifications for calories, saturated fat, *trans* fat, and sodium. Foods of minimal nutritional value and fluid milk with fat content greater than 1 percent are not allowed.

i Final sodium targets must be met no later than July 1, 2022 (SY 2022–2023). The first intermediate target must be met no later than SY 2017–2018. See required intermediate specifications in § 210.10(f)(3).

Table 2: USDA Required Meal Components9

Food Group	Qualifying Foods	s/Requirements	
	Meat (such as beef, chicken and turkey) & Meat alternates:		
Meats/meat alternates	Enriched macaroni	<ul> <li>Tofu and soy products</li> </ul>	
	Nuts and seeds	<ul> <li>Beans and peas (legumes)</li> </ul>	
aiterriates	Yogurt	• Eggs	
		• Cheese	
	Processing method:	·	
F:4a	• Fresh	• Dried	
Fruits	Frozen without added sugar	<ul> <li>Pasteurized, full-strength fruit juice</li> </ul>	
	Canned in light syrup, water, or juice		
	Processing method:	Vegetable Subgroups:	
	• Fresh	Dark Green	
\/agatables	• Frozen	• Red-orange	
Vegetables	<ul> <li>Canned (including tomato paste)</li> </ul>	• Legumes	
	Dried (legumes)	• Starchy	
	<ul> <li>Pasteurized, full-strength vegetable juice</li> </ul>	• Other	
Graina	All must be enriched and whole grains		
Grains	Deserts may count up to twice per week		
	At least two different types must be offered daily		
	Must be either low-fat or fat-free		
Fluid milk	• Can be flavored		
	Milk must be pasteurized and contain Vitamins A and D		
	Fluid milk substitutes must provide the same nutritional components as fluid milk		

#### GOVERNMENT COMMODITY PROGRAM

Much of the food served by BPS is obtained through the Government Commodity Program (GCP), which provides the District with almost \$1 million of free food per year (this number is based upon the number of students served). Food provided by the GCP includes chicken, beef, peanut butter, cheese, eggs, and canned and frozen fruits and vegetables. In order to take full advantage of this free food, District menu cycles are heavily influenced by the foods currently available from the GCP. While the District can direct the GCP funds to purchase food from New York State, food items produced closer to Buffalo sometimes cost more than the same food from farther away, depending on the season and availability. Therefore, BPS tries to give preference to local farmers, but they are not always able to do so. In addition, if the District desires any further processing of the food obtained from the GCP, they must send it elsewhere. For example, if they receive free beef and want it made into pre-cooked burger patties, they must pay to have a

company do this processing. By taking the food offered by the GCP and only paying for processing, BPS saves a significant amount of money and stays within its food budget.

#### FOOD PROCESSING

Food processing can be defined as any deliberate change to food before it is consumed. Such alterations include freezing, cutting, canning, packaging, adding preservatives, combining numerous foods into one food product, and creating "ready-to-eat" food products. There are many benefits to processing food, such as preserving food to delay spoilage, thus allowing food to be stored or shipped over long distances. Food processing techniques can also prevent disease-spreading organisms from contaminating food, thus making food safer to consume. In addition, mixing numerous foods together through processing adds significant variety to the food supply.

The effects of processing on a food's nutritional value vary immensely depending on the *type* of processing used. For example, cutting and/or freezing vegetables is a type of processing that does not impact the nutritional value, whereas many food *refining* techniques significantly decrease nutritional content. For example, refining grains removes the bran and germ, which include nutrients such as Vitamin B, iron, and fiber. The process of *enriching* can reinsert the nutrients, and *fortification* adds nutrients that were not part of the original product.

Therefore, it is important to differentiate between processed foods, which typically do not have significant alterations made to their nutritional content, and *highly* processed foods, which often contain large amounts of added sugars, salt, and unhealthy fats, have little or no nutritional value, and/or no longer resemble the plant or animal from which they originated.<sup>11</sup> Examples of highly processed foods include soda and many grain-based deserts.<sup>12</sup> Highly processed meats such as deli meats, meatballs, and chicken nuggets, are associated with an increased risk of heart disease, diabetes, cancer and other dietary diseases.<sup>13</sup> Some experts also consider many packaged foods

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to be highly processed; these include breakfast cereals, jarred tomato sauces, and various yogurt products with added sugars and artificial flavors.

BPS must send much of the meat obtained from the GCP to private companies for processing into foods such as chicken patties, breaded chicken drumsticks, turkey sausage links, beef hamburgers, beef sloppy joes, etc. This is primarily because the individual school kitchens and the Commissary (the central cooking facility for the District) are not equipped or staffed adequately to prepare the necessary quantities from scratch. The Commissary is too small to house all of the equipment needed to cook, cool, and store all meat that must be sent to the schools on a regular basis. The other option for cooking meat rather than having it processed by third party companies is to have the schools themselves prepare it. However, there are several barriers to this. First, SFS are not skilled for such preparation, and while the District does train its SFS, the training does not include the skills needed for scratch cooking. Therefore, the staff would need constant oversight to ensure proper preparation and food safety, but there are not enough managers to provide it. BPS currently has 25 managers for 66 school buildings. Second, not all school buildings are equipped with a kitchen. Instead, there are three types of school cafeterias: 1) Cafeteria schools, where they do all of their own cooking and storage on-site; 2) Bulk schools, which have some Commissary support but do all of their cooking on-site; and 3) Pre-pack schools, which are only equipped with facilities to reheat food, so all meals must be completely prepared at the Commissary and then shipped to these schools daily.

Finally, having meat prepared at individual schools would limit the Commissary's ability to control food safety and product quality. Hamburgers, for example, used to be ordered raw, and were cooked either at the Commissary or at the cafeteria schools. However, one of the cafeteria schools had a food poisoning scare from hamburger meat many years ago, and although it was eventually proven that it could not have been the burgers, the Commissary decided that they

"The District is so large that it's hard to buy stuff to scale... It is easier for the District to get preprocessed food because the labor is already taken care of."

Youth Educator in Buffalo

could not risk being unable to control the cooking process and has since switched to pre-cooked patties, which are much safer. Other meats, like turkeys, are cooked and stored by the Commissary. According to Commissary management, this has only proven the need to have the preparation of raw meat controlled by a central facility: there have been times when management discovered that the meat was not cooked thoroughly or cooled properly, and had to be thrown out. Such instances were discovered because of the strict oversight at the Commissary, but might been left undiscovered if the preparation had happened at individual schools.

#### THE BIDDING PROCESS

According to federal and state law, all BPS purchase contracts, including food, that are over \$10,000 must be awarded to the lowest responsible bidder through a competitive bidding process. <sup>14</sup> If BPS wants to award a bid to a competitor charging a higher price, they must get approval by justifying the benefits of spending the additional money. This includes both the purchase of food from sources other than the GCP, as well as the processing of GCP-obtained food. Therefore, food contracts are generally awarded on cost, clean label (meaning limited additives), and appearance of food (because students tend to avoid eating food they find to look unappetizing). Based on these qualifications, bids are often awarded to Tyson and Pilgrim's Pride; there are very few processing companies that compete with them.

Recently, the USDA expanded bidding rules to consider geographic preference, as well, meaning that BPS is now able to place preference on contracts from producers within New York State. <sup>15</sup> However, because of the large quantities of food that BPS must purchase, it is extremely difficult for the District to source directly from farmers. Therefore, a third party is necessary to aggregate the produce of many farms, and BPS enters into a formal bidding process to select this third party (who is also responsible for processing raw produce). <sup>16</sup> There are no allowances within the current bidding process enabling BPS to factor in labor conditions, animal welfare, and environmental

"The Board is required by law to award all purchase contracts for supplies, materials and equipment involving expenditures in excess of ten thousand dollars (\$10,000) ... to the lowest responsible bidder after advertising for public sealed bids."

BPS Purchasing Guidelines

sustainability when awarding contracts. There is, however, bidding language that requires contracts to be awarded based on "best value," which, in addition to optimizing cost, quality, and efficiency, may include preferences for small businesses, certified minority- or women-owned businesses or service-disabled veteran-owned businesses.<sup>17</sup>

In the future, bidding laws, policies, and practices need to be changed in order to allow BPS to award contracts based not only on price, geographic proximity, and minimal quality standards, but on the GFPP's five values, as well. This should include language facilitating the process determining how farmers sell produce to the District. The GFPP can help BPS to change its procurement language within existing laws and policies, as well as to identify laws and policies that should be amended to allow greater freedom for good food procurement.

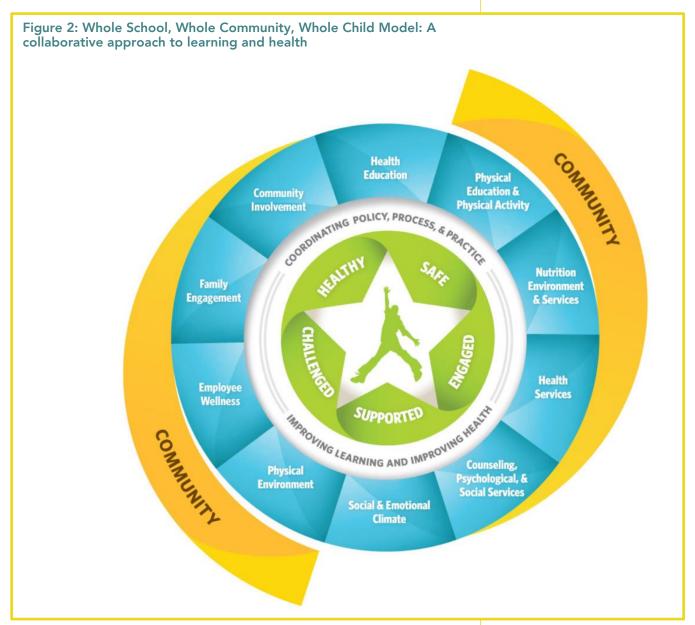
#### BUFFALO PUBLIC SCHOOLS WELLNESS POLICY

In 2004, the USDA mandated that all school districts participating in the National School Lunch Program write a wellness policy. Today, the USDA requires that the public participate in the writing process of school wellness policies, that this process and the policies themselves be transparent, and that policies have implementation and evaluation mechanisms and guidelines. <sup>18</sup> In 2016-2017, a revision of districts' wellness policies was required, and the Buffalo community capitalized on that opportunity to pass a wellness policy that embraced the Whole School, Whole Community, Whole Child Model, recognizing that, "parent, community, District and school-level engagement and coordination are essential and strategically aligned to the success of school, community and student health and wellbeing."19 As such, the wellness policy emphasizes 1) comprehensive health education and sexual health education; 2) physical education and physical activity; 3) nutrition environment and services; 4) health services; 5) counseling, psychological and social services; 6) social and emotional climate; 7) physical environment; 8) employee wellness; 9) family engagement; and 10) community involvement and

"Wellness policy implementation is still an issue... there is not enough staff to do what needs to be done, and the staff that they do have don't always get the support that they need for their projects."

Local Health Expert

engagement. Therefore, while there are many facets of the BPS wellness policy that are not directly related to improving school food, there are many parallels and shared goals between school food improvement initiatives and wellness, which are important to keep in mind.



#### Efforts to Improve School Food

Currently there are several efforts to improve school food in Buffalo, many of which are led by community stakeholders such as Cornell Cooperative Extension, Massachusetts Avenue Project, Grassroots Gardens, Say Yes to Education, and the Food Bank of WNY, as well as community health workers, parents, and local institutions such as D'Youville College and the University at Buffalo. There are many faculty and staff within BPS that are working to improve school food, as well. While these initiatives have achieved varying degrees of success, a more comprehensive approach will be helpful to pinpoint and address areas that need improvement.

The Good Food Purchasing Program (GFPP) can be used to recognize all the actors that are impacted throughout the school food supply chain of production and consumption. <sup>20</sup> The GFPP evaluates a school food system with five core values: local economies, nutrition, valued workforce, environmental sustainability, and animal welfare. <sup>21</sup> One of the main tenets of the GFPP is that institutions have the power to shift how their food is produced because they purchase such large quantities and wield significant market pressure on their suppliers. The following sub-sections use these five values to indicate where efforts to improve BPS food have been successful and where the current initiatives can be expanded.

"Changing the food system means creating a system based on values, understanding relationships, and increasing transparency along the entire supply chain. Every year, public institutions... spend billions of dollars on food. They have the opportunity to lead the movement for food system change and express their community's values while influencing supply chains."

GFPP: Why Procurement

**Table 3: Good Food Purchasing Values** 

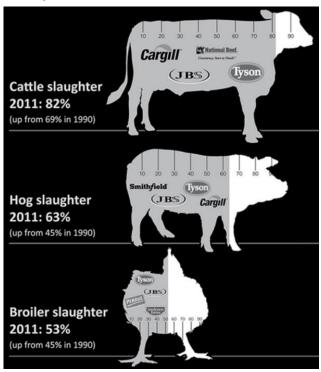
GFPP Value	Description
Local Economies	Support robust regional economies by sourcing from locally-owned small and mid-sized agriculture and food processing operations
Nutrition	Foster health and well-being by increasing portion sizes of fruits, vegetables, whole grains, and minimally-processed foods while reducing the amount of meats, saturated fats, and foods containing added sugars and salts, and eliminating artificial additives
Valued Workforce	Provide safe and healthy working conditions and fair compensation for all food chain workers and producers from production to consumption
Environmental Sustainabiity	Promote sourcing from producers who use sustainable production practices focused on preservation, conservation, and protection
Animal Welfare	Encourage healthy and humane care for farm animals

#### Local Economies

As defined by the GFPP, a focus on local economies means supporting small- and mid-sized agricultural and food processing operations within a specific area or region. At BPS, this translates into supporting food producers within New York State, as permitted by New York State's regulations regarding bidding exemptions for direct purchase.<sup>22</sup> As nearly all farmers throughout New York meet

the definition of "small- or mid-sized" farmer, simply purchasing more food from New York State growers adheres to the GFPP farmsize recommendations.

Figure 3: Percentage of sales earned by the four largest corporations in their respective industries.<sup>23</sup>



Earnings from animal slaughtering and meat processing have become concentrated among a small number of powerful businesses. In the U.S. beef slaughtering and processing industry, the four largest corporations earn 82 percent of the sales. These corporations have a heavy influence on working conditions and how things are done in the animal slaughtering and processing industries.

#### CURRENT EFFORTS

Thus far, efforts to support the local economy at BPS have occurred primarily through the Farm to School (F2S) program, which is the largest food improvement initiative at BPS. This program began in 2015, when the District was awarded a grant from the USDA. With aid from the publicity garnered from the grant, the commencement of the F2S program was faster and more successful than anticipated. Twelve schools throughout the district volunteered to pilot the program during the 2015-2016 school year (a year earlier than expected), which included all three types of schools (bulk, pre-pack, and cafeteria) and represented all income levels and ages. As a result, the District experienced an immediate increase in the amount of food purchased from local producers, as well as in the amount of fresh produce bought and served to students, without significantly

increasing costs. BPS went from having 9% of their produce purchases come from NYS to 20% just in one year of implementing the F2S program. Due to these successes, the District is in the process of expanding the F2S program to all schools beginning in the 2017-2018 school year.

One of the largest barriers in F2S is gaining student acceptance of the new foods. Students are heavily influenced by the appearance of food: they often refuse to eat food that looks unappetizing or food that they do not recognize. Therefore, because students are often unfamiliar with meals produced using fresh, rather than highly processed foods, BPS and its partners have had to devise ways to encourage students to try and learn to like the new F2S meals. Giving out samples and using positive peer pressure have proved to be successful methods. For example, students in the pilot schools were very receptive when Taste Test Thursdays were implemented in the cafeterias. Volunteers and staff passed around samples of a new meal, such as Shepard's Pie, and the students were encouraged (and encouraged their friends) to try what was being handed out. Students were then given stickers of a "thumbs-up" or a "thumbs-down" that they could place in a bucket, thus casting their vote as to whether they liked or did not like the dish. Those dishes receiving a "thumbsup" majority of the votes cast were added to the BPS meal menus.

As Taste Test Thursdays indicate, education is critical to students' acceptance of new food. However, such education should not exclusively occur at schools; it is equally important that the families of students become informed as to the importance of a healthy diet, as well. Therefore, another component of the F2S program is the Harvest of the Month, which is a local, seasonal fruit or vegetable chosen by the school. The Harvest of the Month selection is served in school meals during the designated month, and is featured on posters and the school website. Flyers detailing growing conditions, nutrition information, and easy recipes are also sent home to further educate and engage families as well as students.

In addition to benefiting BPS students by improving the quality of

"Like any program, one of the biggest challenges that they [the F2S program] face is buy-in from everyone. Bridget and her team have been great and have really invested in this, but not everyone else in the District has."

F2S Advocate

the food, the F2S program has provided area farmers with a new, large outlet for their produce. Supplying BPS also provides farmers with a reason to maintain a diversity of produce, so that they can grow more food, such as vegetables, for direct consumption. Diversification can serve as an insurance policy by improving soil quality and increasing the likelihood than even during a poor growing season some crops are likely to survive. In addition, the F2S program encourages farmers to diversify their market channels, thus enabling them to sell to more places and increasing opportunities for profit.

#### WHAT REMAINS TO BE DONE

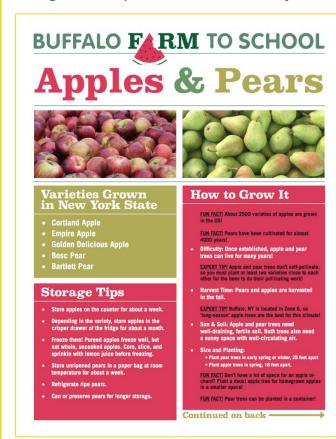
There remain numerous challenges with F2S. Logistically, obtaining and preparing the necessary quantities of fresh food can be a challenge, especially as F2S is expanded district-wide. First, it has been difficult for BPS to find farmers within New York who produce enough of the desired food for 28,000 lunches. Therefore, in order to increase the amount and variety of produce available to BPS, the District needs to help educate area farmers so that they are aware that BPS is a viable market and further encourage farmers to diversify their produce. Obtaining the needed quantity of protein products is even more difficult. For example, the combined amount of beef available from beef producers in New York is less than the quantity needed by BPS, so while the District can purchase some local beef, they must supplement it with meat bought elsewhere. In addition, BPS would need new central cooking facilities because the current Commissary is not equipped to handle the preparation of the large quantities of meat needed to feed all of the students. Therefore, BPS is waiting to expand the protein portion of F2S to all schools (as noted below, reducing the amount of beef served might help BPS overcome this challenge in addition to providing other benefits).

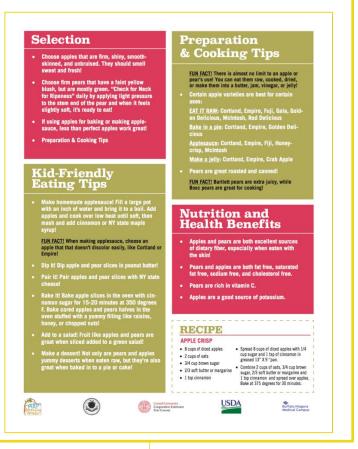
Seasonality and variable growing conditions further jeopardize supply. Winters shorten the growing season, and rain and temperature variability, which climate change is intensifying, significantly impacts production. For example, one year BPS wanted "I am so hoping to get into the schools... nothing would make me happier, but so far nothing has been successful. Those kids look like me... they are the children of my people. You can't possibly love them more than I do."

Buffalo Urban Farmer

to use asparagus as the Harvest of the Month vegetable, but weather conditions prevented farmers from being able to produce the amount of asparagus needed by the district. As a result, BPS was forced to take asparagus off of the menu and exchange it with a different seasonal vegetable.

Figure 4: Sample BPS Farm to School Flyer





It remains difficult for farmers to sell to the schools. BPS has awarded an exclusive produce bid to a distributor called Latina Boulevard Produce. Therefore, farmers must sell to Latina Boulevard Produce if they wish to connect with the BPS F2S program. Connecting with this distributor can be a challenge for farmers, but Cornell Cooperative Extension is working with area farmers to facilitate and encourage this connection. However, the District's use of a distributor may serve as a disincentive for farmers to participate in the F2S program because the distributor must keep some of the profit that would otherwise go directly to the farmers. In addition, distributors often have regulations that farmers must follow. For

example, many distributors require that farmers be GAP (Good Agricultural Practices) certified, which can add expense. Yet BPS itself does not require specific certifications for farmers; therefore, future work should examine if there are ways for the District to purchase directly from the farmers. This would eliminate the extra cost incurred through the use of a distributor, and would remove the need for farmers to obtain expensive certifications. As a result, more farmers might be interested in partnering with the F2S program.

In addition, if BPS wants to use GCP funds to purchase from a specific farmer in New York, that farmer must be included in the NYS GCP. Many farmers are not part of this program, so BPS and the farmer have to work to convince the State to add the farmer to the GCP, which creates a significant amount of work for the farmer. Many farmers do not consider dealing with such bureaucracy worth their effort and so opt not to sell to schools. Another way to increase the use of New York State crops would be to specify in the bidding language varieties that are only or mostly grown in New York State – certain types of apples or onions, for example.

These barriers, needs, and possibilities extend beyond traditional area farmers. Urban farming is growing in popularity throughout Buffalo, and some of these farmers want to sell their produce to BPS. For many, BPS is not only a new and viable market, but it is also a way to improve the health of these farmers' communities, especially the children and youth. As one minority farmer stated, "these are the children of *my* people- you can't possibly love them more than I do!"

While there are few minority farmers in the region, advocacy organizations see the BPS F2S – a potentially large and stable market – as a way to grow their numbers. Minority populations experience disproportionate levels of unemployment, and agriculture can help reverse this trend. There are a few exceptions where urban farmers have been able to sell produce to BPS; for example, the District bought cabbage from Journey's End. As long as these farmers can get their produce to Latin Boulevard Produce, BPS will purchase their produce. However, there are few urban farmers that use this conduit to sell to BPS.

Figure 5: Farm to School Champion Flyer







The Buffalo Public School **FARM TO SCHOOL (F2S)** initiative brings healthy, local, and fresh food to schools in Buffalo. The initiative connects schools, farms, and community partners to improve student nutrition through agriculture, health, and nutrition education; and to strengthen our economy by supporting local farmers and food producers.

## FARM TO SCHOOL CHAMPION

To help with *Taste Test Thursdays* on the last two Thursdays of each month **During Lunch Periods At Your School** 

For more information or to sign-up to help,

VISIT: www.BuffaloFarmtoSchool.org

TASTE TEST THURSDAYS are a required activity for the Buffalo Public Schools in 2016-2017. Established through a grant award from the New York State Department of Agriculture and Markets, the purpose of TASTE TEST THURSDAYS is to establish F2S in your school, engage with students and encourage them to try healthy, local menu items, and gather information on student food preferences that we can share with your school and the district.

#### Responsibilities

As a F2S Champion, you would:

- Try Farm to School menu items and encourage students to try them;
- Be "a cheerleader" for Farm to School in your school by serving students samples of Farm to School menu items in your school cafeteria;
- Collect and count thumbs-up / thumbs-down votes, report tally to cafeteria staff, and hand out "I tried it!" stickers to students.

#### **Perks to Volunteering:**

- Meet passionate folks who love good food;
- · Sample Farm to School menu items;
- · Get involved in a positive initiative within your school community; and
- Get a Buffalo Farm to School t-shirt!

There are also several barriers within the schools that must be overcome if F2S is to reach its full potential. The first relates to the limitations of the physical cooking space. Much of the food obtained through the F2S program needs to be prepared by SFS in the Commissary. However, it is a challenge to prepare the needed quantities in the current space available in the Commissary: while they find ways to prepare the produce, they cannot introduce proteins to the F2S program until they have a large space. For example, they made kale salad for the students, and the amount of kale that they had to use occupied a space the size of a conference room. As this amount of space was required for a side dish, the space needed for an entrée, especially for cooking meat, would be much larger. Furthermore, while trainings are held once a month to teach the SFS how to implement F2S, mistakes in F2S food preparation still occur. This is another reason why F2S menu items are served as side dishes only, rather than entrees: this ensures that students are still able to eat a meal, even if the F2S dish is not made properly and cannot be served.

Some also note a general hesitancy throughout BPS to become engaged with F2S. While there are many strong proponents throughout the District, there are others who verbally support the program but who do not strive to promote or participate in it. For example, it has been a challenge to conduct the voting in cafeterias on Taste Test Thursdays. At first, the voting relied on outside stakeholders and volunteers, who are not always able to dedicate their time. Now, the role of lunch monitors is being expanded to include conducting these votes twice a month (See Figure 5). This change has been a process, but the BPS Food Services Department continues to build relationships with the individual schools, explaining how to implement the various elements of the F2S program and why the program is important. As a result, the ease with which new initiatives are implemented, such as conducting the votes, is increasing. Buy-in and participation continues to be a challenge in school classrooms, where F2S information could be combined with other lesson topics, thus furthering students'

"When you're introducing new food, it really helps when everyone lives and breathes the same thing. We need to get the administration and teachers on board with the same habits that they're trying to teach the kids."

Local Health Expert

"Those in the Commissary are awesome, but they aren't connected with all of the issues. There are many issues of health and wellness that are in different parts of the school... and there doesn't seem to be a lot of coordination between the different departments."

Local Health Expert



education as to the importance of diet, health, and wellbeing. Engaging with and teaching this information could be educational for faculty and staff, as well, because they might not engage in these healthy behaviors themselves. Such participation might influence faculty and staff to partake, thereby setting an example for students. In sum, if BPS could find more ways to encourage further participation in F2S from those working within the schools, the program would be wider reaching and more successful.

#### Nutrition

The GFPP interprets nutrition to mean promoting health and well-being through generous portions of vegetables, fruit, and whole grains, while minimizing consumption of highly processed foods, salt, added sugars, saturated fats, and red meats, and eliminating artificial additives.<sup>24</sup> BPS and its community stakeholders also promote these goals, but there are many structural constraints that inhibit their full implementation.

#### CURRENT EFFORTS

While there were numerous reasons for initiating F2S at BPS, one of primary goals was to enhance the nutritional content of school meals. The 12 pilot schools for F2S have seen a swift improvement, which BPS is hoping will be experienced by the other schools as the program is expanded. Side dishes are the primary method for serving F2S food. Examples include sides of potatoes, kale, or tomatoes. Salad bars are also installed in all high schools, and they incorporate fresh F2S produce whenever possible. In addition, students are permitted to take unlimited amounts of fresh fruits and vegetables, such as corn, snow peas, broccoli, and carrots, from the serving line. The fruits and vegetables served here come either frozen or canned, and are then served reheated. There is a daily vegetarian option, which varies every day and includes items such as veggie burgers and grilled cheese, in addition to peanut butter and jelly sandwiches that are available daily. Finally, BPS maintains some of the stricter regulations of Healthy Hunger-Free Kids Act that were relaxed in 2017, such as ensuring that all bread products served are whole wheat.

"Some Buffalo Public school students will now have a healthier option in their cafeteria... One of the salad bars was unveiled at School #81 located at Tacoma Avenue in north Buffalo. Students gathered in their cafeteria to help cut the ribbon... Other schools to receive the salad bars in their cafeterias include West Hertel Academy, Bilingual Center and Public School #18... 'It's good that the salad bar is here because when we have like tatter tots, it's good for kids to have a salad too to get healthy,' noted [a studentl."

WBFO News Article, March 18, 2016

Nutritional intake goes beyond what is contained in a school meal to include the *amount* of food being consumed. As is reflected by the number of students qualifying for free and reduced price meals at BPS, a large percentage of the student population are food insecure. This means that they experience times when they do not have sufficient access to safe and nutritious food needed for normal growth and development and an active and healthy life.<sup>25</sup> The prevalence of food insecurity throughout BPS students means that most likely do not have breakfast at home in the morning. Recognizing the positive relationship between breakfast and educational achievement, the District has implemented a Breakfast in the Classroom program, which ensures that all students are fed a breakfast adhering to USDA nutrition guidelines before class commences each morning. Serving free breakfast and lunch to each student every day of the school week ensures that those who might not have a guaranteed food source at home are at least able to eat two full meals a day.

However, some students at BPS often throw out the menu items that they either don't like or do not recognize. While many food service workers would prefer to serve the students food that they do like, they cannot because such foods would violate federal regulations, or because the Commissary is not equipped to prepare such food. This is particularly true either 1) when a new F2S item is introduced, which is why Taste Test Thursdays are so important; or 2) for students who are used to consuming specific cultural or tradition foods. BPS has been working to add more cultural variety to its menu, but this continues to be a challenge both due to facility limitations and federal regulations.

Shifting meat consumption patterns has been another entry point for improving school food. Red meat is associated with numerous chronic diseases, such as heart disease, stroke, and certain cancers. Regular consumption of processed red meats, such as hot dogs, salami, and sausage, further increases these risks. <sup>26</sup> BPS has recognized the dangers of consuming too much red meat, as well as recognizing that a portion of the student population would prefer to

"Our goal is to provide a feeding program over the weekend for kids who are at risk of going hungry during that time... We try to give the kids food that they will like but that are also nutritionally-dense and shelf-stable... they also have to be easy to prepare."

Employee at the Food Bank of Western New York

have more meatless options served at school. Beef is now served only once a week, and hot dogs have been removed from the menu. Finally, in an effort to improve students' health and decrease their risk of chronic disease, BPS has implemented Meatless Mondays, a program in which all menu options are vegetarian on Mondays.



In addition to the F2S program, the salad bars, Breakfast in the Classroom, and Meatless Mondays, there have been many initiatives by BPS partners to increase students' intake of healthy food both in and outside of school. The Food Bank of WNY offers a Backpack Program, which sends bags of food home with elementary students, and a School Pantry Program, which sets up a pantry in high schools from which students can choose food to bring home. Thus, the Food Bank is able to provide students with sufficient food for their families over the weekend, when these students are most likely to go hungry. However, it is important to note that much of the food sent home with students is not fresh, but processed in some way. For example,

frequent items are boxed macaroni and cheese or packaged fruit cups. Other Food Bank programs, such as the Kids in the Kitchen program, include cooking/education programs for students, during which facilitators and volunteers teach youth how to prepare their own fresh, homemade meal. Participants then get to eat what they cook during the program, as well as bring home a meal for their families. Thus, they are provided with two healthy meals and the knowledge of how to prepare the meal again.

The incorporation of school gardens, particularly in community schools, has served as another way to increase students' access to and education about healthy food. There are now between 25 and 30 school gardens throughout the District, which are organized through the BPS Garden Committee. Grassroots Gardens WNY is a co-chair of this committee and provides resources and technical assistance for the gardens. Lead Gardeners have been trying to find ways of connecting their gardens with the school salad bars and F2S. Such connections have proven difficult because the gardens do not produce the quantities needed by the school salad bars or the F2S program. In addition, more communication is needed between the F2S coordinators and Lead Gardeners in order to promote more collaboration between these two initiatives.

Participation in the garden is completely voluntary, and is open to both school and community members. Therefore, while not all students are directly involved in the gardens, those who do participate are there because they enjoy it, and thus benefit from the gardens much more than if they were forced to be there. All of the gardens grow different things, according to what the garden participants decide they want to grow, meaning that those working in the garden are excited about what they are growing. Food produced in the garden is given to participants or donated to the community or local food pantries; therefore, the gardens serve as an optional source of fresh and healthy food for students and their families.

"We do a lot of surveys with the kids who like trying new activities and new foods. Even if they don't like a specific food, their overall experience always tends to be positive."

BPS Garden Coordinator and Parent

"The BOE was really excited about the gardens when we first started, and we have a good working relationship with Bridget and her team... our goal is to better connect the gardens and the F2S program."

BPS Garden Coordinator and Parent

Table 4: USDA regulations that apply to (and might limit) many culturally-appropriate foods<sup>28</sup>

	Group I ages 1-2 preschool	Group II ages 3-4 preschool	
Food components and food items	Minimum quantities		
Fluid milk (as a beverage)	6 fluid ounces	6 fluid ounces.1	
Meat or Meat Alternates:			
Lean meat, poultry, or fish	1 ounce	1½ ounces.	
Alternate Protein Products <sup>2</sup>	1 ounce	1½ ounces.	
Cheese	1 ounce	1½ ounces.	
Large egg	1/2	3/4.	
Cooked dry beans and peas	1/4 cup	3/8 cup.	
Peanut butter or other nut or seed butters	2 tablespoons	3 tablespoons.	
Yogurt, plain or flavored, unsweetened or sweetened	4 ounces or ½ cup	6 ounces or 3/4 cup.	
The following may be used to meet no more than 50% of the require-			
ment and must be used in combination with any of the above:			
Peanuts, soy nuts, tree nuts, or seeds, as listed in program guid-	½ ounce = 50%	3/4 ounce = 50%.	
ance, or an equivalent quantity of any combination of the above			
meat/meat alternate (1 ounce of nuts/seeds = 1 ounce of			
cooked lean meat, poultry or fish).			
Vegetable or Fruit: 2 or more servings of vegetables, fruits or both	½ cup	½ cup.	
Grains/Breads (servings per week): Must be enriched or whole grain.	5 servings per week 3—minimum	8 servings per week3-minimu	
A serving is a slice of bread or an equivalent serving of biscuits,	of ½ serving per day.	of 1 serving per day.	
rolls, etc., or ½ cup of cooked rice, macaroni, noodles, other pasta			
products or cereal grains.			

#### WHAT REMAINS TO BE DONE

While these efforts have made a significant difference in the nutritional content of school meals, much work remains to be done. One vital step is already happening – the expansion of the F2S program to all of the schools in the District. However, the amount of locally purchased fresh food served to students could be increased. For instance, instead of serving Harvest of the Month items four times per month, they could be served eight times per month. In addition, it would be ideal if the F2S program could be expanded to include entrees, as well as side dishes, but the current facilities at the Commissary prevent this.

Similar constraints face the Meatless Monday program. Because of the limited facilities at the Commissary and the seasonal variation in access to locally produced fresh produce, the District is unable to consistently carry out the goals of Meatless Mondays in a healthy manner. For example, many vegetarian dishes require sautéing, which cannot currently be done at the Commissary or in the cafeteria schools. As a result, most Meatless Monday meals end up being pizza. While pizza meets the USDA requirements for whole

<sup>&</sup>lt;sup>2</sup> Must meet the requirements in Appendix A of this part.
<sup>3</sup> For the purposes of this table, a week equals five days.

wheat (dough), vegetable (tomato sauce), and dairy (cheese), all aspects of it are processed, and its nutritional benefits are limited.

Food quality is not interpreted in the same manner by all populations. As Buffalo is a very diverse city, not all students are used to eating the same foods, and many face dietary restrictions. While BPS does cater to diagnosed food allergies (annual proof from a doctor is required), the District does not account for cultural preference beyond not serving pork. Therefore, there are many populations within the student body who desire more variation in the menu, such as serving rice more frequently and including more traditional and culturally diverse dishes. However, as has frequently been mentioned, the Commissary is not equipped to handle such diversification. For example, the Humane Society offers a simple bean fajita recipe that is both vegetarian and USDA compliant, but it requires sautéing, which the Commissary cannot do.<sup>29</sup>

Officials at BPS noted that two of the populations who are particularly impacted are immigrants/refugees and vegetarians. While BPS offers a vegetarian option every day, there is limited variety of options because the District has trouble obtaining the needed ingredients that make a meal both vegetarian and compliant with USDA regulations, particularly the protein regulations (See Table 4). This is even more difficult for culturally appropriate food, which may require not only different ingredients but also modes of preparation that require facilities beyond what the Commissary has. In addition, due to skills and time restrictions, menu items need to be extremely easy to prepare, with no more than four to six ingredients and four to six simple steps to make them. Many vegetarian recipes are more complicated. And yet other school districts, such as those in Los Angeles and Oakland, are succeeding in using various types of beans to fill the protein requirements.<sup>30</sup> With the correct facilities and some time and effort, the creation of simple yet nutritious and protein-rich vegetarian foods seems possible. There are many online resources that contain USDA approved menu items that might be adapted to Commissary restrictions,<sup>31</sup> and the youth at Massachusetts Avenue Project are working now to create vegetarian, culturally-appropriate menu items for BPS.

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Figure 7: Menu from Oakland Unified School District

Page 1	Oakland Unified School District High School Lunch HHFKA - 9-12 April 2018			Mar 7, 2018	
Monday Apr - 9	Apr - 10	Wednesday Apr - 11	Apr - 12	Friday Apr - 13	
Grass Fed Beef Hot Dog Buffalo Chicken Salad Combo Pizza (P) BBQ Chicken Sandwich Sriracha Beans Mini Baby Carrots Salad Bar Pink Lady Apple Raisins MILK: Non - Fat & 1% Chocolate Milk	Chicken Tikka Marsala W/ Rice Grilled Chicken Salad W Roll Pepperoni Pizza (P) Spicy Chicken Tender W/ Roll Peas and Carrots Mini Baby Carrots Salad Bar Tangerine Raisins MILK: Non - Fat & 1% Soy Butter n Jelly Sandwich (V)	BBQ Chicken Wings w/ Roll Cobb Salad All Beef Cheeseburger Chili Cheese Fries Mini Baby Carrots Salad Bar Shape-Up Raisins MILK: Non - Fat & 1% Soy Butter n Jelly Sandwich (V)	Beef Tacos Chicken Cesear Salad BRC Burrito Broccoli Slaw Mini Baby Carrots Salad Bar Fuji Apple Raisins MILK: Non - Fat & 1%	Turkey Nachos (FP) Grilled Chicken Salad w Roll Cheese Pizza (V) Grilled Cheese (V,FP) Romaine Salad Mini Baby Carrots Salad Bar Pear Raisins MILK: Non - Fat & 1%	
Apr - 16  Managers Choice Buffalo Chicken Salad Combo Pizza (P) Meatball Sub Romaine Salad Mini Baby Carrots Salad Bar Fuji Apple Raisins MILK: Non - Fat & 1% Chocolate Milk	Apr - 17  Thai Chili Chicken with Rice Grilled Chicken Salad w Roll Pepperoni Pizza (P) Spicy Chicken Sandwich Stir Fry Vegetables Mini Baby Carrots Salad Bar Tangerine Raisins MILK: Non - Fat & 1% Soy Butter n Jelly Sandwich (V)	Apr - 18  BBQ Chicken Wings w/ Roll Cobb Salad Grass Fed Beef Hot Dog Sriracha Beans Mini Baby Carrots Salad Bar Shape-Up Raisins MILK: Non - Fat & 1% Soy Butter n Jelly Sandwich (V)	Apr - 19  Kung Pao Chicken w/ Rice (FP) Chicken Cesear Salad Grilled Cheese (V,FP) Asian Slaw Mini Baby Carrots Salad Bar Strawberries Raisins MILK: Non - Fat & 1%	Apr - 20  Chicken Enchilada Casserole w Rice Grilled Chicken Salad w Roll Cheese Pizza (V) Grilled Turkey Ham & Cheese Sandwich California Carrot Salad Mini Baby Carrots Salad Bar Pear Raisins MILK: Non - Fat & 1%	

At the national level, the USDA subsidized products available through the GCP should be expanded to include access to more fresh fruits and vegetables, so that BPS can take advantage of this funding without having to decrease the quality of the food that they serve. But while advocating for those changes, there are many other ways for BPS to work on nutrition.

#### VALUED WORKFORCE

One aspect of school food that is not often discussed is labor. However, it is labor- from farmer, to processor, to SFS- that makes school food possible. Therefore, as the GFPP argues, it is necessary to ensure that a safe and healthy working environment with fair compensation is provided for all food chain workers.<sup>32</sup> The GFPP provides several labels indicating employers certified for treating their workforce well (See Figure 8).<sup>33</sup>



#### **CURRENT EFFORTS**

BPS food service workers experienced a wage increase several years ago. While BPS food service workers, as well as bus aides, were once payed poverty-level wages that did not reflect the important roles that they take on for the District, both groups are now paid a living wage, thanks in part to a campaign by the Coalition for Economic Justice in 2010. As designated by the City of Buffalo, a living wage in 2018 without health insurance is \$13.24 per hour. As of July 2017, food service workers in bulk and cafeteria schools are paid \$13.92 per hour, and food service workers in pre-pack schools receive an additional stipend, thus making \$14.92 per hour.<sup>34</sup> Those in management positions, specifically pre-pack leaders and food service workers managers make more. It is important to note that at the time of this writing, AFSCME, the union representing the SFS, was in the process of negotiating a new contract with BPS.

As mentioned in previous sections, SFS at the Commissary and in the schools are trained to do only simple preparation and re-heating tasks, unless they are closely supervised. This has limited the types of meals that the students are served and helps to explain the use of processed foods. However, BPS hired a new head chef this year at the Commissary, who will add to the oversight of the Commissary SFS. With the help of the new chef, the SFS might be able to expand their cooking capabilities. In addition, while the recipes must remain simple, the new chef will bring imagination and expertise to the Commissary, thus enabling BPS to serve a more varied menu to students.

#### WHAT REMAINS TO BE DONE: SCHOOL FOOD SERVICE STAFF

Despite the improvements noted above, SFS at BPS remain in many ways undervalued and overworked – regardless of the fact that they are some of the few employees at BPS who see each student in the school every day. They get to know and care about the students, and in many ways act as community health workers disguised as food service workers.<sup>35</sup> But their potential remains unfulfilled due to poor pay, benefits, and work conditions.

Figure 8: GFPP-Approved Labels Indicating the Promotion of a Valued Workforce













"All SFS except for cook managers are technically part-time, which means that they don't get a medical package. Getting medical is their priority... They worry about wage increases because many rely on some form of public assistance, and they don't want to lose that."

SFS Representative



All SFS except for managers are part-time, meaning that they are not supposed to work more than 30 hours per week, and they do not receive benefits such as health insurance. In addition, SFS are only allowed three days off and four sick days per year during the first five years working for BPS, and after five years are allowed only four days off. While food service workers are not required to work during school breaks, they are not paid for these days, either. This is true not only of breaks during the school year, but for many SFS, it is true of the summer vacation, as well. BPS says that they ask for volunteers to work during the summers, but less than half of the SFS are employed by BPS for the summer lunch program, meaning that a majority of them are unemployed for over two months every year. However, SFS are not eligible for unemployment during this period. As a result, although this may be by choice, some SFS do not have any form of income for at least two months.

Many SFS search for other jobs over the summer, rather than working for the summer lunch program or remaining unemployed during the summer months. Those who are able to find other employment often do not return to BPS at the end of the summer, preferring instead to retain their new jobs, which may offer a higher income, better benefits, or paid time off. Consequently, there is an extremely high rate of turnover, which contributes to, among other problems, the low rates of training.

An additional cause for the high turnover rate of SFS is the difficulty that many experience getting to work. While BPS says that they try to place SFS within or near their neighborhood, this is not always possible, and SFS may live too far from work to walk. However, many of them are unable to afford cars and are forced to rely on public transit, which is unreliable and takes a considerable amount of time, with stops that are often distant from their homes. As a result, many of these food service workers try to transfer to other jobs closer to home rather than continue working at BPS, thus further contributing to the high rate of turnover.

There are also questions about the part-time nature of their work. While their contract states that they are part-time employees, many SFS apparently clock weekly averages of 35-40 hours a week, with some going as high as 45 hours. It would be ideal if BPS were to hire more food service workers as full-time employees and offer them healthcare, more time off, increased flexibility for sick days, and a more relaxed, less stressful working environment. Healthcare is particularly important, because many SFS currently benefit from the Affordable Care Act and other state-sponsored healthcare assistance programs, whose future is uncertain. In addition, wage increases may force SFS over a benefit cliff, meaning that their increased income may disqualify them from the public assistance (such as healthcare) that they rely upon. This often results in an income gap, where the increased wage is not enough to cover the value of the public assistance that was lost.<sup>36</sup>

Finally, a lack of communication between BPS and AFSCME, the union representing the SFS, causes many questions to arise as to further details of working conditions. For example, the number of SFS enrolled in the union changes regularly, and the union does not understand what is causing such high fluctuations in membership. In addition, little is known about the food budget because that is not part of the yearly public budgetary discussions, as the food budget is USDA funded. Finally, because SFS orientation occurs before they technically become BPS employees, the union is not allowed to attend the new SFS employee orientations, so food service workers often do not know what role the union plays.

#### WHAT REMAINS TO BE DONE: EDUCATION AND BUY-IN

Most, if not all, stakeholders identified that a lack of education has been significantly detrimental to the complete adoption of school food initiatives. Therefore, while BPS has implemented measures to improve school food in various segments of the District, those who are not directly involved in bringing these initiatives to BPS have been hesitant to participate. Such reluctance pervades the SFS, faculty, administration, and even students. Therefore, it is necessary

"We need to get people excited about what is being served to kids at school. especially for kids who don't get served healthy food at home. There is a surprising lack of enthusiasm about this, even though there are clear relationships between food and health, and food and academic performance and behavior."

F2S Program Coordinator

to educate *all* actors throughout the District as to the importance of school food.

For example, some SFS have expressed frustration with the F2S and Meatless Monday programs because they often lead to additional preparation and the students often do not like, or get tired of, the food being served. However, such views might change if SFS were provided more information as to the correlations between fresh and healthy food and physical health, academic achievement, and improved behavior, as well as the benefits along the other aspects of the food chain. While the SFS do receive some of this training, there is much more that can be passed along. If the SFS were made fully aware of the positive impacts resulting from improved school food, they might be more willing to encourage students to try new foods and assist with Taste Test Thursdays, and might even have more job satisfaction.

In addition, while there has been some outreach to engage those throughout the District in the F2S program, the BPS faculty and administration need to hear more about the connections between food access and quality, academic performance, and behavior.<sup>37</sup> Education and buy-in from SFS and other faculty and staff could be fostered through staff- and faculty-specific events that serve good local food. Such events could help faculty and staff learn to like more healthy, fresh food and encourage them to eat it more frequently, thus setting an example for students. Furthermore, serving better food would increase faculty and staff's sense of appreciation, and increase their excitement and motivation to positively influence students' eating habits. Finally, a more engaged faculty and administration might be more willing to connect school food improvement initiatives to other lessons and activities in classes, thus increasing the students' likelihood of trying to eat healthy, both in school and at home.

"A lot of food is thrown out in cafeterias. Lessening this will not only decrease the environmental impact of school food, but will also indicate that students might be eating more of the food being served to them. Food waste can tell us a lot about kids' eating habits and if they are changing. So there is a need for a platewaste study at BPS both before and after F2S is introduced, so we can compare."

Local Health Expert

### WHAT REMAINS TO BE DONE: OTHER WORKERS ALONG THE SCHOOL FOOD SUPPLY CHAIN

In addition to SFS, faculty, and staff, there are other workers involved in school food that need to be considered. One such group is the farmers and farmhands that participate in the F2S program. As previously noted, one of the critical components to realizing success in the BPS F2S program is ensuring that the shift to fresh and local produce does not result in significant cost increases. However, in many market sectors, demands for low-cost products translates into lower earnings for workers. This is particularly true for farmers and farm workers because the cost of production materials (seeds, machinery, fuel, etc.) cannot be adjusted; this means that the only way to grow low-cost food is to reduce workers' pay. Additionally, farmers and farm labor often face dangerous working conditions resulting from the use of synthetic pesticides and fertilizers.<sup>38</sup> Finally, farm workers are often immigrants who are willing to work for lower pay and perform seasonal labor and who may be more vulnerable to exploitation. When seeking to improve the F2S program, BPS needs to consider these labor practices and ensure that their demands for low-cost produce does not translate into the exploitation of farmers and farm workers.<sup>39</sup>

These same considerations should be taken into account when contracting with other parts of the food chain. For example, meat processing plants are notorious for low wages, inadequate benefits, and dangerous working conditions. Tyson Foods and Pilgrim's (both of which have contracted with BPS) are well known for health and safety violations and other horror stories, such as employees wearing diapers to work because they are not allowed to take bathroom breaks. Therefore, BPS should use its institutional purchasing power to ensure that all the employers in its food system have safe working conditions and pay fair wages.

#### Environmental Sustainability

One crucial part of environmental sustainability is maintaining those resources needed for food production, which includes conserving

"Although they are reluctant to talk about it, workers [at Tyson] from across the country report that they and their coworkers have made the uncomfortable decision to wear adult diapers to work. Not only do the diapers absorb accidents, they provide a degree of protection from the danger of asking permission to leave the line. Many workers are afraid of being mocked, punished, or fired."

Oxfam America, 2016

water and soil quality, protecting and enhancing habitats and biodiversity, reducing or eliminating the use of fossil fuels in production methods, and decreasing water consumption. <sup>41</sup> Unfortunately, food production and processing are significant contributors to environmental degradation. For example, agriculture is one of the leading causes of land-cover and land-use change, which impacts biodiversity, surface and sub-surface hydrology, and the nutrients within the soil. <sup>42</sup> Run-off from farmland contains pesticides and fertilizers that end up in water supplies and cause adverse impacts such as the algae blooms in Lake Erie and other bodies of water throughout the country.

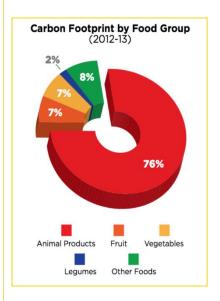
Agriculture is responsible for a large percentage of greenhouse gas emissions (See Figure 9). Livestock farming, in particular, contributes more greenhouse gases to the atmosphere than even transportation, according to the United Nations. Cattle rearing alone accounts for 9% of the carbon, 65% of the nitrous oxide, 64% of the ammonia, and 37% of the methane that humans produce.<sup>43</sup> The average American diet is responsible for 1.5 more tons of carbon emissions than a vegan diet, because Americans consume so many more red meat and dairy products than other cultures.<sup>44</sup>

As the GFPP argues, school food can be instrumental in improving the sustainability of food systems. By purchasing food only from producers and distributors who adhere to environmental preservation practices, schools can help promote the decreased use of harmful pesticides and fertilizers, the protection of natural resources, and the mitigation of climate change. The GFPP website gives several labels that schools can look for when trying to discern what producers use pro-environmental practices (See Figure 10). <sup>45</sup>

#### CURRENT EFFORTS

Food-related environmental concerns are addressed most evidently in the school gardens. Here, participants are able to learn where the food comes from, why maintaining soil quality is so important, why having and conserving water is necessary, the critical roles that insects and other organisms (thus biodiversity) play, and why

Figure 9: Carbon Footprint by Food Group



"Our main challenge is getting the gardens to be used for academic purposes, not just healthy food. People get in theory that gardens can be a classroom, but it is a struggle to get that turned into practice... We need to convince BPS and teachers of the values of the gardens."

BPS Garden Coordinator and Parent pesticides and fertilizers are in fact detrimental to food production. These lessons are reinforced simply by working in the garden, as well as by some of the visiting experts who participate and by some teachers, who include their school garden in certain lessons throughout the year.

Other efforts to decrease the negative environmental impacts of school food are being undertaken by the City of Buffalo through their 34 and More: Buffalo Recycles program. 46 Working with individual schools within the District, program coordinators have created the Environmental Champions Program, which encourages schools to enhance their environmental responsibility and stewardship. This program involves site visits to the schools, a recycling audit to determine what is being thrown out, and various events to draw attention and support for the program. Participating schools that accomplish the program's five steps are awarded \$500 to spend on supplies and resources to further their recycling initiatives. One of the primary areas that this program targets is the waste generated from school food, both in individual school buildings and at the Commissary, where they have also started a recycling program. Thus far, this program has generated significant interest, and at least 36 schools have indicated that they wish to participate. Finally, the 34 and More program has helped BPS to stop using Styrofoam trays for serving meals, which is an important victory.

#### WHAT REMAINS TO BE DONE

Despite the important connections between food and the environment, there are few efforts throughout the BPS school food initiatives that seek to tie the two together. Therefore, there are plenty of opportunities to improve. For the reasons stated above, decreasing the amount of red meat served would make a major environmental impact while also improving the health of the students. Food waste is another promising area. In addition to the 34 and More program, BPS has expressed interest in trying to decrease the amount of food wasted by decreasing the amount of food thrown out by students in cafeterias and starting to compost food scraps.

Figure 10: GFPP-Approved Labels Indicating the Promotion of Environmental Sustainability





















Further action is also needed to continue to address the amount of garbage generated from production, storage, and consumption of food.

In addition, the F2S program does not consider farm production methods. Therefore, much of the food that is purchased through the F2S program is grown using conventional farming practices, which utilize pesticides and fertilizers. Although many of the conventional farmers employ integrated pest management systems that reduce the amount of pesticides spread, negative environmental impacts still result. There are several reasons why BPS does not consider farm production methods. First, current laws make it difficult to award contracts based on farming practices. Second, there are still limited numbers of farms that meet strict environmental standards, and they tend to be too small, and possibly too expensive, to meet BPS' needs.

#### Animal Welfare

The GFPP advocates that school food purchases help promote the healthy and humane treatment of animals. <sup>47</sup> Such efforts can occur in two forms: first, schools can ensure that the animal products they purchase are treated in a healthy and humane manner; and second, BPS can decrease the amount of animal products they use. Addressing animal welfare is additionally important because it serves as a unifying point for the other issues that school food seeks to improve. For example, eating fewer yet higher quality animal products is nutritionally beneficial. Humane treatment of animals also tends to correlate with better working conditions, because employees have a cleaner and healthier working environment. Finally, there are numerous environmental benefits that stem from raising free range or organic animals and from using fewer animal products. <sup>48</sup>

#### **CURRENT EFFORTS**

The District's principal impact on animal welfare has come (intentionally or not) through the Meatless Monday initiative. While no studies have been done at BPS to calculate the exact reduction of

"When first devising the BPS F2S program, we did discuss the possibility of including environmental concerns, but we decided not to. We first needed to ensure that we could get enough produce to support the program... we struggled to get enough as it was. So we decided not to give preference to one type of production over another."

F2S Program Coordinator



meat consumption throughout the District, nor the program's budgetary impact, it is clear that BPS has attained some degree of success simply because meat is served one day less per week.

#### WHAT REMAINS TO BE DONE

Unfortunately, as previously mentioned, the meal most frequently served on Mondays is pizza, which contains a large amount of cheese- another animal product, which, although better than beef, is still tied to poor health outcomes, high greenhouse gas emissions, and poor animal welfare. Pizza is seen as a good alternative option for Meatless Mondays because it is easy to prepare in all kitchen types, and the cheese helps it to meet the USDA's meal requirements for protein. However, there are many meatless meals that would be healthier and more beneficial to animals and the environment. As previously mentioned, BPS has been working to find alternatives that are able to be prepared in their current facilities, meet USDA standards, and that students enjoy, but this process is a work in progress.

In addition, BPS does not ensure that the animal products purchased for school food are produced under healthy and humane conditions. In many parts of the country, conventional meat farming tends to rely on the abnormally swift growth of the animal, which involves unhealthy diet and living conditions. This process is painful for the animal, causes sickness and disease, and often involves the use of hormones and chemicals. In addition, animals are kept in concentrated animal feeding operations (CAFOs), meaning they are confined to extremely small spaces, often indoors. This is particularly true in the case of turkeys, chickens, and beef cattle, who are packed so tightly together that they have no room to move, and are sometimes fattened to such an extent that their legs cannot support their bodies (so they could not walk even if they had the space to).<sup>50</sup> However, many of these inhumane practices, particularly the use of CAFOs for beef cattle, are much less common in New York. Therefore, increasing the District's capability to source protein from NYS farmers would not only have a positive impact on local economies, but on animal welfare, as well.

Figure 11: GFPP-Approved Labels the Indicate the Promotion of Animal Welfare











The GFPP website provides several labels that schools can look for when assessing if a producer or processor promotes animal welfare, just as they do for schools searching for farms using proenvironmental production methods (See Figure 11).<sup>51</sup> Such a labeling process enables institutions to make informed decisions as to how to leverage their purchasing power. However, the current bidding process prohibits BPS from further implementing this value and thus needs to be reformed.

#### Recommendations

As indicated throughout this report, BPS has made many strides towards improving school food while maintaining their priority of food safety, but there is still a long way to go. While the above sections include recommendations to address specific issues within BPS' food improvement initiatives, the recommendations provided below would assist BPS in addressing several of the GFPP's food improvement values simultaneously.

#### SCRATCH COOKING

As mentioned above, BPS does not have the capacity at the Commissary and school cafeterias to prepare many of the F2S meals that it would like to. Therefore, it must still rely heavily on pre- and highly-processed food. One solution that stakeholders both within and outside of the schools strongly support is scratch cooking. This would entail obtaining a cook-chill facility within the Commissary, which would enable BPS to cook, process and store its own food. In doing so, BPS would be able to purchase and serve higher quality products, such as less processed meat (i.e. ground beef rather than pre-cooked burgers) and more fresh produce. Food prepared at the Commissary would still be shipped to the schools in the same manner (packaged and only needing reheating), meaning no additional work for SFS in the school cafeterias. In addition, BPS would be able to better account for cultural preference, by making small alterations in the processing of food before sending it out to the schools. For example, ground meat could be cooked plain, and schools could request to have different seasonings added to it, depending on the

"Community partners want to hold up the voice of parents and kids . . . who actually know from experience what is going on."

Local Health Expert



preferences of their students. As a result, school could get several seasoned meat options, from which their students could choose.

In addition to being able to process their own food and provide more healthy options, a scratch cooking facility would place all food preparation in one place, thus ensuring thorough oversight and food safety. More skilled workers could be placed at the Commissary, while those with less experience worked at the schools. Doing so would decrease the pressure and the workload of those SFS at the schools and at the Commissary because they would not have to account for the different types of cafeterias throughout the District.

However, the current BPS Commissary does not have the proper equipment or storage capacity. In order to implement scratch cooking in the building, intensive renovations would have to take place. Yet the District leases the building; it does not own it. As a result, the landlord would have to renovate it, and BPS would have to pay for the renovations through an increased monthly rent, with the hope of eventually buying the building. While there are some proponents of this idea, others argue that a better option would be to purchase a new building. At the time of this writing, the Commissary's landlord had not provided a rent-to-buy option, and many consider continuing to rent without an option to buy as a waste of money. They would prefer that the District purchase a different building, which could be renovated using the funds available through the school food program.

#### WELLNESS AND COMMUNITY INVOLVEMENT

Several other recommendations have arisen from school food stakeholders, in addition to the needs emphasized above. First, the importance of school food as part of student health and wellness needs to be highlighted through other school policies. In other words, school food cannot be viewed as an issue unto itself, but as one interconnected with other problems that students face at BPS. The BPS Wellness Policy details these connections, but many stakeholders argue that the District still seems to view the issue of school food as separate. As a result of this siloed approach, BPS is unable to

"The parents participating in trying to make changes at BPS are not from all schools. Many of them are from higher performing schools, which have completely different issues than those of kids in struggling schools."

Community advocate and BPS parent

effectively provide for the health and wellness of all of the students in the District.

One way of ensuring that the health and wellness needs of students are being taken care of is through collaboration with parents and the community. However, stakeholders noted that some parents and community members have given up on trying to change things at the district level and instead focus on individual schools, where they feel more welcome. But they are able to make less significant changes at the school level, and many have stopped trying completely.

A great opportunity for engaging parents and the community in school food, as well as students' health and wellness in general, has opened up as more schools throughout BPS become community schools. Through adult programming, after school student and family events, and the family-oriented Saturday Academies, these community schools provide a means for engaging all members of a community. Importantly, these programs and events always include at least a free snack for participants, if not free meals: for example, during the 2016-2017 school year, community schools served over 41,000 free meals to 22,000 participants. Therefore, not only does the food served during these programs and events influence the quality of participants' diets, but community schools also provide a platform for educating students, families, and community members as to the importance of healthy food. However, while community schools do address many aspects of health and wellness, they have not yet taken steps to address food quality beyond what is being done by the Commissary, such as the F2S program and Meatless Mondays. As community schools have access to such a large crosssection of Buffalo's population, this is a significant missed opportunity. It is important to note that it is now mandatory for all community schools to have a school garden, which may start to serve as a way for community schools to address food quality.

#### EFFECTIVE APPROACHES

There are several approaches that stakeholders noted that have greatly contributed to the successes of school food initiatives thus far. One way of ensuring that the health and wellness needs of students are being taken care of is through collaboration with parents and the community.

Importantly, all of these methods include collaboration between BPS and external stakeholders. For example, the ease and speed with which the F2S program was implemented is due in large part to the shared leadership between the BPS Food Services Department and Cornell Cooperative Extension. Other collaborative efforts have proved to be successful, as well, both for F2S events (Taste Test Thursdays) and initiatives such as the school gardens and the Backpack and School Pantry Programs.

Another form of effective cooperative efforts has arisen from partnerships between BPS and outside experts. For example, when the Food Services Department was pushing heavily to bring the Breakfast in the Classroom program to BPS, the Board appeared to particularly value input from an out-of-state Breakfast in the Classroom proponent. After this proponent corroborated the arguments provided by the Food Services Department, the Board agreed to implement Breakfast in the Classroom.

The most important partnership exists between BPS and its students. First, such collaboration is essential because the students should have a say in the food that they eat. Second, students often have a better knowledge of the needs and desires of their fellow students that do other stakeholders. Involving students in school food improvement initiatives will also serve to educate them on the importance of eating heathy, quality food. There are several instances where students have already been instrumental for improving school food. Students played a key role in the fight to gain salad bars in the high schools by convincing the BOE to sign a USDA grant application needed for salad bar implementation. The youth at the Massachusetts Avenue Project are creating Commissary-friendly, culturally appropriate recipes. Finally, students play important roles in garden creation and maintenance. Therefore, it is clear that not only have students been integral thus far, but they have much more to offer, and are a resource that BPS should continue to value.

The most important partnership exists between BPS and its students. Involving students in school food improvement initiatives will also serve to educate them on the importance of eating heathy, quality food.

#### Conclusion

Many factors have created obstacles to good school food over the past several decades. These challenges affect not just nutrition, but also the environment, labor, local economies, and animal welfare, as well. To overcome these barriers, stakeholders both within and outside of school districts throughout the country are working to implement school food improvement initiatives, such as F2S programs, school gardens, Meatless Mondays, and the Good Food Purchasing Program.

While Buffalo Public Schools faces many challenges, recent initiatives undertaken and implemented by both the District and community partners have led to important victories. Yet there is still much work to do. The five values outlined by the GFPP provide a helpful framework to show where gaps persist, which of these are most pressing, and what methods are most appropriate to address them. The District should work with the new Good Food Buffalo Coalition to implement the GFPP in Buffalo in order to make and measure more progress on all five values.

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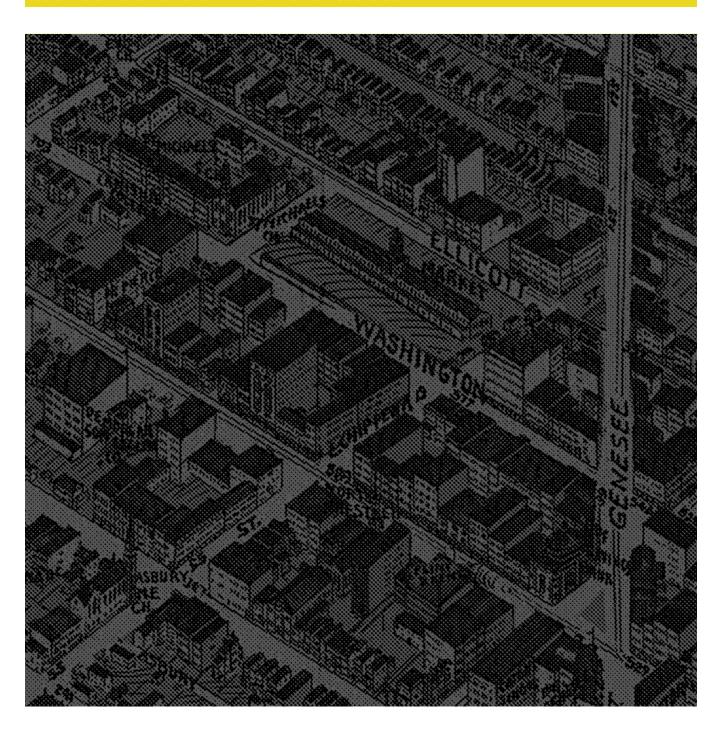
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