

Healthy Schools Act of 2010 (D.C. Law 18-209) Farm-to-School and School Gardens Report

as Required by Sections 303 and 503: Mandatory Reporting Reporting Period: July 1st, 2012 - June 30th, 2013

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As required by Sections 303 and 503 of the Healthy Schools Act of 2010 (HSA), the Office of the State Superintendent of Education (OSSE) is pleased to report to the Mayor, the Council, and the Healthy Youth and Schools Commission on:

(1) The District's farm-to-school initiatives and recommendations for improvement; and (2) The District's school gardens, plans for expanding them, and recommendations for improvement.

Section 1:

The District's farm-to-school initiatives and recommendations for improvement

HSA Requirements - Local Food Sourcing

Under section 301 of HSA, public schools and public charter schools shall serve locally-grown, locally-processed, and unprocessed produce from growers engaged in sustainable agricultural practices whenever possible. Preference shall be given to fresh, unprocessed agricultural products grown and processed in the District of Columbia, Maryland, and Virginia.

HSA Requirements – Education Programs, Technical Assistance, and Annual Celebrations

Under section 302 of HSA, OSSE, in conjunction with other District government agencies, community organizations, food service providers, public schools, and public charter schools shall develop programs to promote the benefits of purchasing and eating locally-grown and unprocessed foods that are from growers engaged in sustainable agricultural practices. In addition, OSSE is required to conduct at least one program per year (such as an annual flavor of the week or a harvest of the month program) in collaboration with other District agencies and non-profit organizations.

Results – Compliance with HSA Farm-to-School Requirements

Local Food Sourcing

OSSE's Wellness and Nutrition Services Division (WNS) monitors school menus monthly for compliance with HSA. These menus are either submitted to WNS by the schools or retrieved from the schools' websites. In order to quantify the frequency with which local foods are served in the schools, the inclusion of local items on the menus is tracked along with the food name, food category, state of origin (DC, MD, VA, DE, PA, NJ, WV, and NC), farm name, and school name and ward. Using a sample of 140 schools for which WNS received menus for all months between September, 2012 and April, 2013, these various components of local procurement were tracked and analyzed.

Based upon the information gleaned from this sample, schools in all eight wards procured local foods throughout the school year and local foods were served at both breakfast and lunch, however local foods were more commonly served at lunch. On average, 89% of schools served local apples one or more times per month. Other local items that were commonly served included collard greens, tofu, kale, and sweet potatoes (Figure 1). Local pears, cucumbers, butternut squash, corn, and peppers were also served in schools.



Figure 1. Percent of Schools Serving Local Items at Least Once per Month, SY 2012-2013

The largest variety of local items served in the schools in the sample occurred in September (16 different items), followed by November and October. March contained the least variety of local items however eight different types of local foods were still served during that month (Figure 2). It is likely that variety was lower during the spring months due to seasonality and the

requirements of HSA. As part of HSA, schools are required to follow the HealthierUS School Challenge program requirements at the Gold Award level for fruits and vegetables, which places an emphasis on serving dark, leafy greens. As kale and collard greens are cold weather crops they are one of the few food items that are available locally during the colder months. In addition, HSA allows for minimal processing of local foods such as chopping and freezing, so schools and foodservice vendors are able to have locally grown produce available well into the winter. As spring approaches, these stores of vegetables may have been depleted while the new spring crops have not yet reached full maturity.



Figure 2. Variety of Local Food Items Served in Schools Each Month, SY 2012-2013

Foodservice vendors supplying the schools in our sample purchased local items from 38 farms in MD, VA, PA, NJ, WV, and NC. The highest number of farms was in Pennsylvania followed by Maryland (Figure 3). Although 38 farms provided local foods to schools in our sample, 52 farms provided local foods to schools throughout the city, including farms in Delaware. While there are no production farms in DC that provide locally grown items to the schools, there are teaching farms in DC that serve as a field trip sites for students.

Education Programs and Technical Assistance

In order to provide technical assistance and education programs in schools and to consolidate the District's farm-to-school initiatives, OSSE hired a full-time Farm-to-School Specialist in December of 2012. Prior to this time, OSSE staff collaborated with external partners in order to begin disseminating farm-to-school concepts throughout the District. OSSE's Farm-to-School Specialist, Erica Steinhart, Registered Dietitian (RD), was previously a Regional Manager with the District of Columbia Public Schools (DCPS) Office of Food and Nutrition Services, where she assisted with vendor operations in schools. There she worked with vendor dietitians to create menus that were compliant with all federal meal patterns, HSA regulations, and DCPS contracts. Prior to working at DCPS, Erica managed an education program in the Philadelphia public schools as part of the Supplemental Nutrition Assistance Program.



Figure 3. Number of Farms per State Providing Local Items to Schools, SY 2012-2013

During her first six months at OSSE, Erica familiarized herself with the farm-to-school landscape in the District by visiting farm field trip sites, meeting with local community-based organizations involved in farm-to-school efforts, and developing relationships with school administrators and foodservice vendors. In order to elicit input from stakeholders, she convened a Farm-to-School Advisory Board in April of 2013. Members include representatives from community-based organizations, foodservice vendors, and schools (Appendix A).

During the 2012-2013 school year, various organizations provided guidance and education to students and school staff related to growing and consuming local fruits and vegetables, the nutritional benefits of eating fruits and vegetables, and serving local foods in school meals. These organizations also conducted hands-on food, farming, and nutrition education activities. These activities are described below:

- Mobile Market School Visits The Arcadia Center for Sustainable Food & Agriculture's Mobile Market is a 28-foot farmers'-market-on-wheels. The Mobile Market visited a number of elementary and middle schools during the 2012-2013 school year. Through the Mobile Market, hundreds of students were engaged in hands-on demonstrations about where food comes from and taste tests of local foods, prepared right on the bus. Students also participated in lessons about food origins, seasonality, and global and local food systems. Based upon pre- and post-test data collected by Arcadia from 358 students, students' knowledge of where and why to purchase local foods and their understanding of USDA's MyPlate, with its emphasis on filling half of the plate with fruits and vegetables, increased.
- *Farm Field Trips* During the 2012-2013 school year, approximately 2,400 students from over 45 schools across all eight wards visited working and teaching farms within the local area. There they were given the opportunity to see where food is grown and to learn about plants, growing cycles, pollination, climate, and wildlife. Students harvested herbs to taste, planted new vegetables, weeded garden beds, and explored for bugs. These experiences allowed them to take the science and social studies concepts learned in the classroom and

apply them in hands-on situations, while problem solving and answering questions about life on the farm.

- *DC Central Kitchen Truck Farm* In partnership with the USDA, DC Central Kitchen constructed a mini-garden in the bed of a pick-up truck. The Truck Farm travels to youth serving organizations and schools to provide hands-on lessons about growing and consuming nutritious produce. During the 2012-2013 school year, the Truck Farm visited eight schools, spent a total of 23 hours at those schools, and interacted with 825 students.
- *DC Central Kitchen's Fresh Feature Friday* DC Central Kitchen provides meals to eleven schools in the District. In each of these schools, they host Fresh Feature Fridays, a monthly program that introduces students to different ways of preparing fresh fruits and vegetables. Students are able to taste three different preparations and vote on their favorite, which is then incorporated into an upcoming menu.
- *Farm-to-School 101 Training* In conjunction with the DC Farm-to-School Network, OSSE's Farm-to-School Specialist hosted a training for teachers, school administrators, and principals. Participants received an overview of the farm-to-school landscape at both the local and the federal level, and participated in breakout sessions. During the breakout sessions, teachers were shown specific ways to incorporate farm-to-school messages into classroom lessons and administrators participated in a discussion about incorporating farmto-school messages into the school environment.

Annual Celebrations

The annual Strawberries & Salad Greens Day exposes students throughout the District to the messages of eating local produce and consuming more fruits and vegetables through tasting a locally grown fruit and vegetable along with their peers across the city. This year, the event took place on May 29th. As part of this celebration, 176 schools served local strawberries and salad greens as a part of their school lunch and 49 also conducted educational activities to reinforce the messages of this special day (Appendix B). These activities included classroom lessons, visits to school gardens, morning announcements, and informational tables during lunch and at pick-up and drop-off times. OSSE strategically coordinated the framework of the day and made lettuce plants and "What's Growing around Here?" seasonality chart posters (Appendix C) available to all of the participating schools. Schools were encouraged to take ownership over the educational component of the day by providing their own volunteers and working with community-based organizations. OSSE partnered with ten local organizations to provide assistance to schools during the educational component of the days' events (Appendix D). For example, two of the District's foodservice vendors, Chartwells and DC Central Kitchen, sent their chefs and RDs to schools to speak to students about the importance of eating fruits and vegetables and to reinforce the messages of Strawberries & Salad Greens Day.

Recommendations for Improvement/Plans for Expanding the District's Farm-to-School <u>Initiatives</u>

Updates on Areas for Improvement as Reported in the 2012 Farm-to-School Report

Much of the farm-to-school activity that took place during the 2012-2013 school year was smallscale and initiated by community-based organizations. The WNS Farm-to-School Specialist was hired in December of 2012 to bring these initiatives together. She is working on expanding the farm-to-school program to include more District-wide events and creating more uniformity in the message and delivery methods across the city.

During the 2012-2013 school year, the following progress was made on the areas for improvement as outlined in the 2012 Farm-to-School Report:

- Expose students to more seasonal, local food through garden education, taste tests, and special events to excite students about healthy eating and sustainable agriculture.
 - Strawberries & Salad Greens Day
 - Truck Farm and Mobile Market
 - Fresh Feature Fridays
 - Growing Healthy Schools Week (described in Section 2, page 14)
 - School garden education (described in Section 2)
- Tie school gardens to local procurement efforts in the cafeteria, to strengthen students' connections between local food items in their school meals and how they are grown.
 - Truck Farm and Mobile Market
 - o Strawberries & Salad Greens Day
- Highlight farm-to-school programs regularly, for example, through a program that features a unique local food each month, in order for students to truly grasp the concepts of seasonality and locally-grown.
 - Fresh Feature Fridays
- Role models such as chefs, farmers, school staff, Registered Dietitians, and garden educators play an important role in shaping students' acceptance of farm-fresh food. More of these professionals should be represented in the District's farm-to-school programs.
 - Head Chefs and RDs from Chartwells and DC Central Kitchen interacted with students during Strawberries & Salad Greens Day.
 - o Farm field trips
- Train cafeteria staff to encourage students to select fresh produce items.
 - As part of the Community Voices for Health project (funded by a USDA Team Nutrition grant), Howard University will be delivering training to foodservice staff in multiple middle schools in September, 2013. Training will be focused on the NUDGE technique which is a process by which school foodservice attempts to nudge kids toward good diets by putting the healthiest foods at the front of the serving lines and encouraging them to choose those foods.

During the 2013-2014 school year, the District's Farm-to-School Specialist plans to:

- Increase collaboration with OSSE's School Garden Specialist in order to integrate farmto-school messages learned in the garden and the local foods served in the cafeteria into classroom lessons;
- Work with OSSE's School Garden Specialist and community-based organizations to engage teachers and administrators in professional development around connecting school gardens, local foods in the cafeteria, and classroom lessons;
- Collaborate with the DC Farm-to-School Network on developing and increasing farm field trip sites, as well as support DCPS and charter schools in taking advantage of these types of educational field trips;
- Work with stakeholders to develop a more robust data collection system around local procurement in order to better quantify the amount, types, and variation in local products being served in the District's schools;
- Assist schools in procuring local products at affordable prices through developing cooperative relationships between schools, vendors, and farms; and to
- Increase participation in Strawberries & Salad Greens Day and increase the number of schools offering educational activities which reinforce the key messages of the day, and utilize this day as a way to bring local chefs, and culinary and nutrition professionals into the schools to interact with students.

Section 2:

The District's school gardens, plans for expanding them, and recommendations for improvement

HSA Requirements - School Gardens Program

Under section 503 of HSA, OSSE is to establish a School Gardens Program which shall:

- Coordinate the efforts of community organizations and District agencies, as well as the District of Columbia Public Schools and the Public Charter School Board to establish gardens as integral components of public schools and public charter schools;
- Establish and convene a Garden Advisory Committee composed of community organizations, District government agencies, and other interested persons;
- Collect data on location and types of school gardens;
- Provide horticultural guidance and technical assistance to schools;
- Coordinate curricula for school gardens and related projects;
- Provide training, support, and assistance to school gardens;
- Assist schools in receiving certification as U.S. Department of Education Green Ribbon Schools;
- Work with UDC to provide technical expertise, curricula, and soil testing for schools gardens; and
- Establish a demonstration compost pile when feasible.

HSA Requirements – School Garden Grants

Under section 102 of HSA, OSSE shall make grants available to support school gardens through a competitive process to schools and other organizations.

Results – Compliance with HSA School Gardens Program Requirements

Coordinate Efforts of Community Organizations and District Agencies to Establish Gardens as an Integral Component of the Schools

OSSE's School Garden Specialist, Sam Ullery, coordinates the efforts of community organizations and District agencies towards the goal of establishing school gardens as an integral component of the schools. These efforts are apparent in the activities described below.

Establish a Garden Advisory Committee

The School Garden Program has established and convened a Garden Advisory Committee comprised of representatives from community organizations, District government agencies, and schools (Appendix E). Approximately 20 active members attend quarterly meetings.

Collect Data on Location and Types of School Gardens

Data on school gardens was collected using multiple methods including: 1) site visits to 58 schools, 2) a web-based School Garden Snapshot completed by 57 schools (Appendix F), 3) a

School Garden Assessment Tool completed by 24 schools (Appendix G), 4) HSA School Health Profiles, 5) partner organizations including the DC Schoolyard Greening Committee, 6) DCPS, and 7) the DC Department of the Environment RiverSmart Schools Program. Collecting data using these methods has proven successful in ensuring that the most accurate and up-to date information is available. As a result, a comprehensive database of DC school gardens by ward and type was developed (Appendix H) and used to compile the data reported below.

School gardens are considered active when host schools or organizations report their garden as active. Unless otherwise noted, data reported in this document will reflect only the active school gardens. Based upon this definition, there are currently 93 active school gardens covering a total of 3.3 acres, the equivalent of three football fields, and 18 of these gardens were started between July 1st, 2012 and June 30th, 2013. In addition, four inactive school gardens were successfully re-established and are now classified as active gardens. School gardens are located across all eight wards and over 11,000 students received garden-based instruction during the 2012-2013 school year. Ten schools (at least one in each ward) have been identified as model school gardens (Appendix H) and are being used to convey best practices, promote school gardens, and serve as venues for professional development. The largest percentage of the District's school gardens are in public schools (58%), followed by public charter schools (PCSS, 31%) and private schools (11%). Most school gardens are in elementary schools, and the number of school gardens decreases at the higher grade levels. There are many fewer school gardens in middle and high schools indicating a need for school garden development focused on the higher grade levels (Figure 4).



Figure 4. Number of School Gardens by Grade Level, SY 2012-2013

School gardens are utilized before, during, and after the school day, however, most garden activity occurs during the school day. There are a variety of types of school gardens in the District, with the most common being edible gardens, followed by pollinator gardens (Figure 5), and many schools have more than one type of garden. Each of these types of gardens is described below:

Grade Level

- <u>Edible Gardens</u>: include raised and in-ground beds growing a wide range of edible seasonal crops
- <u>Pollinator Gardens</u>: include plants that attract pollinators such as butterflies and bees
- <u>Schoolyard Greening</u>: includes projects such as tree planting, beautification projects, and flower plantings
- <u>Stormwater Gardens</u>: include features that capture rainwater such as rain barrels, rain gardens, ponds, and replacing impermeable surfaces with permeable surfaces
- <u>Native Gardens</u>: include plants that are native to the DC area
- <u>Wildlife Gardens</u>: include features that attract wildlife such as forests, birdhouses, bat houses, and bug houses
- <u>Greenhouses</u>: enclosed spaces that allow for year-round growing and activities

100 90 80 80 70 Number of School Gardens* 60 44 50 40 31 31 29 30 21 20 5 10 Galu-Politiator Garden Schoolvard Greening 0 Edible Galden Greenhouse Wildlife Stormwaler Rathe Carden

Figure 5. Number of School Gardens by Type, SY 2012-2013

Garden Type

*these numbers add up to more than the 93 active school gardens because some schools have more than one type of garden

To date, 40 school gardens have designated School Garden Coordinators who ensure that the gardens are integral components of the school by overseeing the programing, instruction, and garden maintenance. SGCs are essential to the success of school gardens and serve as the main point of contact for the school garden. Based upon the data provided by the 54 schools that responded to the budget question on the School Garden Snapshot (Appendix F), school gardens operate on a wide range of budgets, with an average annual budget of \$6,300 (Figure 6).

Provide Horticultural Guidance and Technical Assistance

The School Garden Assessment Tool (Appendix G) has been extremely helpful in collecting data about the functionality of school gardens, and in determining the greatest areas of need in relation to school gardens. This has allowed the School Garden Specialist to provide relevant trainings and meaningful technical assistance. Based upon the school gardens that were assessed using the School Garden Assessment Tool, a large number of schools were in need of assistance with teacher involvement and garden committees. There were no technical assistance requests related to circulation, seating, meeting areas, security features, accessibility, or maintenance (Figure 7).



Figure 6. Number of School Gardens by Annual Budget, SY 2012-2013

Schools and organizations are able to request horticultural guidance and technical assistance from the School Garden Specialist through an online form that includes descriptions of the various types of technical assistance (Appendix I) and allows for the tracking of requests. The School Garden Specialist responds to requests and works closely with the school garden contact to ensure support is provided either directly, or through partner groups such as the UDC Master Gardener Program. During the 2012-2013 school year, 58 technical assistance requests were received, all of which were addressed with a site visit in which specific support was provided. For example, three greenhouses (Eastern High School, Wilson High School, and McKinley Technical High School) were awarded School Garden Grants to re-establish greenhouse programs and OSSE is working with DCPS to ensure that the modernization at DCPS-Roosevelt High School includes the greenhouse and gardens. School garden programs have varied technical needs. The most frequent technical assistance request was program management followed by systems design and modeling of garden instruction (Figure 8).



Figure 7. Number of School Gardens with Technical Assistance Needs, SY 2012-2013

Figure 8. Frequency of Technical Assistance Requests by Type, SY 2012-2013



Technical Request Types

Coordinate Curricula for School Gardens and Related Projects

The School Garden Specialist is involved in a variety of projects related to curriculum coordination around the school gardens. Some of these activities are described below:

- Growing Healthy Schools Week The first annual Growing Healthy Schools Week took place from October 15th 20th, 2012. This week is the fusion of the former DC School Garden Week and DC Farm-to-School Week and it included a wide variety of activities designed to reinforce school garden and farm-to-school concepts throughout the District. Activities included taste tests, farm field trips, and garden-based activities. Details of the week are described below:
 - 62 schools and 10,000 students participated
 - 34 chef demonstrations reached over 1000 students
 - Best School Garden Awards were given to Prospect Learning Center and Janney Elementary School
 - Three teacher trainings (*How to Build a Hoophouse*, *Pests in the Garden*, and *Greening the Core Curriculum*) were offered
- Recommended Curriculum Resources for School Gardens (Appendix J) The School Garden Specialist reviewed and compiled garden-based curricula that can be utilized in grades pre-K through 12. These tools provide teachers with the resources necessary to integrate school garden concepts into English language arts, math, science, and social studies.
- DC School Gardens Program Service Providers List (Appendix K) Through an online form, organizations working in the area of school gardens can become part of the DC School Gardens Program Service Providers List. This directory is made available to schools and outlines the various organizations and the type(s) of assistance that they provide. This resource list continues to grow as more organizations become involved in school gardens.

Provide Training, Support, and Assistance to School Gardens

Based on data collected using the School Garden Assessment Tool (Appendix G), professional development opportunities were created to address the needs of School Garden Coordinators, community members, and school staff. Numerous technical documents were developed to support these trainings. To date, 26 training sessions have been provided to almost 400 school staff and community partners (Appendix L). Ninety-one percent of School Garden 101 participants and 93% of School Garden 201 participants indicated that these trainings were either useful or very useful. The various trainings are described below:

• School Garden 101 – This training provides an overview of school gardens and the services offered by the OSSE School Gardens Program. It introduces school gardeners to the steps in developing a successful school garden and to organizations and agencies that can support school gardens through funding, materials, or technical assistance (Appendix J).

- School Garden 201 This training examines the nitty-gritty of managing a school garden program and engages participants in small group discussions around three areas of school garden programs: management, instruction, and gardening techniques.
- Seasonal Trainings Seasonal trainings included How to build a Hoophouse, Getting Ready for Spring, and a Summer School Garden Bike Tour in partnership with DC Schoolyard Greening, BicycleSPACE, and Slow Food DC.
- *Growing Healthy Schools Week Trainings* These trainings engaged the broader community as part of a week-long event focusing on healthy school environments.
- *LEA Based Trainings* Individualized trainings were developed and implemented at four LEAs that requested support with teacher buy-in around the school garden. These trainings included modeling garden instruction, classroom management, and identifying curricular resources.
- Growing Garden Teachers Training Program DC Greens, in collaboration with OSSE, administers the Growing Garden Teachers Training Program. This program is a year-long commitment including 11 monthly sessions, four of which are either full-day or multiday commitments. OSSE School Garden grantees are required to attend these four trainings.

Assisting Schools in Receiving Certification as U.S. Department of Education Green Ribbon Schools

During the 2012-2013 school year, OSSE assisted schools in applying for the U.S. Department of Education Green Ribbon Schools (GRS) award. OSSE developed the District's application for the GRS program, facilitated GRS application informational sessions, provided ongoing support to schools in developing their applications, convened an intergovernmental support network, reviewed applications, and nominated three schools for the award. All three schools that were nominated, Wilson High School (DCPS), Mundo Verde PCS, and Washington Yu Ying PCS, received the 2013 Green Ribbon School award. Education Secretary Arne Duncan announced the winners of the awards in May at a press conference at Mundo Verde Public Charter School and representatives of the winning schools later attended an awards ceremony with award winners from around the nation at the U.S. Department of Agriculture. In addition, the three awardees will be recognized at the Mayor's Sustainability Awards banquet. A description of each of the award winners is provided below:

- Mundo Verde Bilingual Public Charter School Mundo Verde Bilingual Public Charter School is Washington's first "green" public charter school. It has clerestory windows to allow for more natural sunlight, a backyard play space built with recycled deck material, a raised-bed vegetable garden, and high-efficiency toilets and low-flow faucets that meet the Environmental Protection Agency (EPA) WaterSense standards. Mundo Verde's evidence-based wellness curriculum includes developmentally appropriate and participatory garden and food-centered activities, and outdoor play and learning, to prepare students to become global stewards in an increasingly complex world.
- *Washington Yu Ying Public Charter School* Washington Yu Ying Public Charter School's nature center, constructed with the help of partners at Earth Day Network, includes trails, a pond, and an observation deck. The center provides opportunities for hands-on outdoor learning, including a large school garden, which is used to teach

students about sustainable agriculture, nutrition, and the environment. The school's use of the International Baccalaureate Primary Years Program curriculum allows for the incorporation of environmental and sustainability topics into many subject areas. In particular, the "Sharing the Planet" theme explores how to share finite resources with other people and living things.

• *Woodrow Wilson High School* – Woodrow Wilson High School's new building is LEED Gold certified and features two green roofs and a 30,000 gallon rainwater collection sistern. The new building serves as a teaching tool for students and the community. Wilson is the only DC school to offer career education in environmental science, which encompasses courses in environmental science, sustainable earth, marine sciences, urban ecology, and sustainable cities. Wilson is one of only a handful of schools across the nation with a fully operational greenhouse.

Work with UDC to Provide Technical Expertise, Curricula, and Soil Testing for School Gardens

If school garden produce is to be consumed by students, the garden soil must be tested using laboratories recommended by OSSE and the University of the District of Columbia (UDC, the UDC soil testing laboratory is not currently functional) to ensure that the produce grown in the garden is safe to consume. The School Garden Specialist works with schools to ensure that the procedures regarding serving garden produce to students are clearly understood and followed.

Establish a Demonstration Compost Pile

A composting pilot program has been developed by the District's Department of General Service in collaboration with UDC Cooperative Extension Service, partner organizations, and OSSE. Tubman Elementary in Ward 1 was the first school to receive a bin (pictured below). This bin is constructed from cedar and is designed to prevent rodents from disturbing the contents. Future composting sites will be located in each ward at existing school gardens that have demonstrated capacity and the need for such a system.



School Garden Grants

In January of 2013, OSSE solicited applications for the 2013-2014 School Garden Grants. Grants were awarded to support 23 school gardens for a total of \$200,005.00 (Appendix M). Each grantee's project is monitored and evaluated through at least two site visits per grant year during which a School Garden Assessment (Appendix G) is conducted. In addition, the grantees must submit a mid-project and an end of project report that include pre- and post- student and teacher data, observations from the SGC and administration, and evidence of student participation in garden activities. Grantees also use garden logs to track class-time and after-school use. Technical support is provided to grantees to ensure projects are successfully implemented.

Final reports from the 2012-2013 School Garden grantees were collected and analyzed. Twentytwo garden programs (located in all eight wards) were supported and 4,700 students received 1500 hours of garden-based instruction. One hundred and forty-three teachers used the garden to teach 800 lessons in nutrition, science, and math. Schools partnered with 17 garden-based organizations that provided technical support and all SGCs were supported through technical assistance visits.

Recommendations for Improvement/Plans for Expanding the District's School Gardens Program

Updates on Areas for Improvement and Plans for Expanding School Gardens as Reported in the 2012 School Garden Report

During the 2012-2013 school year, the following progress was made on the areas for improvement as outlined in the 2012 School Garden Report:

- Strengthen the existing support network for schools interested in applying for the U.S. Department of Education Green Ribbon School (GRS) program to ensure that four District schools are recognized as Green Ribbon Schools in school year 2012-2013.
 - Advisory Committee members and OSSE supported schools in the application process.
 - Three schools were nominated and received GRS recognition.
- Establish a DC Green Ribbon School Award as a component of the Mayor's Sustainability Awards. Recipients of this award will be nominated for the U.S. Department of Education Green Ribbon School Award.
 - The three GRS awardees will be recognized at the Mayor's Sustainability Awards banquet.
- Collaborate with the Environmental Protection Agency (EPA) Regional Office to provide resources to schools that align with the U.S. Department of Education Green Ribbon School Program.
 - The EPA provided resources to assist the 2013 GRS awardees.
- Develop and facilitate a "School Garden 201" training to support well established school gardens.
 - To date, 80 teachers have participated in the School Garden 201 training.

- Explore the possibility of establishing a centralized marshaling yard for wood waste, compost, mulch, and other bulk materials that can be accessible by school garden stakeholders.
 - OSSE has a partnership with a local company, C&D Tree Services, which provides wood waste to schools free of charge.
- Explore the possibility of establishing a centralized tool shed for school gardens to access during garden build and maintenance days.
 - OSSE has partnered with Washington Parks and People, an organization that coordinates tool loans from its tool bank to support school garden building and maintenance days.
- Ensure that every school garden is overseen by a School Garden Coordinator.
 - Currently 43% of school gardens have School Garden Coordinators.
 - 2012-2013 School Garden Grant funding supported 22 School Garden Coordinators
- Combine the efforts of the Farm-to-School and School Gardens Programs to provide comprehensive nutrition education to DC schools.
 - Growing Healthy Schools Week
 - Strawberries & Salad Greens Day
 - Growing Garden Teachers Training
- *Return to service the six underused greenhouses in the public schools.*
 - Three greenhouses (Eastern High School, Wilson High School, and McKinley Technical High School) were awarded School Garden Grants to re-establish greenhouse programs.
 - OSSE is working with DCPS to ensure that the modernizations at DCPS-Roosevelt High School include the greenhouse and gardens.
- *Reinvigorate inactive school gardens by supporting and strengthening partnerships between schools, garden-based organizations, and stakeholders.*
 - Four inactive gardens were successfully re-established and are now classified as active school gardens.
- Develop one model school garden in each ward that can serve as hubs for teacher professional development, student field trips, and to promote DC school gardens.
 - Ten schools (at least one in each ward) have been identified as model school gardens (Appendix H). These sites have been used to convey best practices, promote school gardens, and serve as venues for professional development.
- Support active school garden programs by providing four "Growing Garden Teacher" workshops, six monthly meetings and two "School Garden 101" trainings annually.
 - Trainings included the Growing Garden Teachers Training Program, School Gardens 101 and 201, seasonal trainings, and individualized instruction to LEAs (Appendix L).
- Integrate Farm-to-School and School Garden Week into one week to further align the school garden and farm-to-school programs.
 - Growing Garden Schools Week
- Develop a set of Schoolyard Design Guidelines that will be integrated into existing DCPS facility guidelines and recommended to the Public Charter School Board as best practices when considering school garden construction.

• An existing set of guidelines from San Francisco Unified School District and Oakland Unified School District were identified as model Schoolyard Design Guidelines by the School Garden Advisory Committee. Further discussion is required with DCPS and the Public Charter School Board.

During the 2013-3014 school year, the District's School Garden Specialist plans to:

- Increase collaboration with OSSE's Farm-to-School Specialist in order to integrate farmto-school messages learned in the garden and the local foods served in the cafeteria into classroom lessons;
- Work with OSSE's Farm-to-School Specialist and community-based organizations to engage teachers and administrators in professional development around connecting school gardens, local foods in the cafeteria, and classroom lessons;
- Continue to ensure that active gardens are sustained by providing ongoing resources and support;
- Expand a web-based platform that provides resources for school gardens as well as a database of school garden programs;
- Explore and develop new innovative partnerships that will support existing school gardens, and establish new school gardens;
- Expand upon the Best School Garden Award to also recognize School Garden Coordinators;
- Work towards having 100% of school gardens overseen by School Garden Coordinators; and to
- Continue to work on returning greenhouses to service.

Conclusion

OSSE will continue to implement and support the Farm-to-School and School Gardens Programs authorized by the Healthy Schools Act. With our many partners invested in improving the health and wellness of our students, we will continue to promote lifelong healthy eating habits.

HEATLHY SCHOOLS ACT FARM-TO-SCHOOL AND SCHOOL GARDENS REPORT

APPENDICES

APPENDIX A Farm-to-School Advisory Board Members, SY 2012-2013

Organization	Name
DC Greens/DC Farm-to-School	
Network	Karissa McCarthy
Chartwells	Megan Geiger
DC Central Kitchen	Katie Nash
DC Bilingual PCS	Sofia Bustos
Washington Youth Garden	Anna Benfield
Arcadia Center	Morgan Maloney
Parent (Mundo Verde PCS)	Sharona Shuster
Revolution Foods	Alex Dobbs
Parent (DCPS)	Vacant

APPENDIX B Schools that Participated in Strawberries & Salad Greens Day, 2013

Achievement Preparatory	Inspired Teaching Demonstrations				
Appletree Early Learning - Douglas Knoll, Lincoln Park, Oklahoma Ave, Parkland	Kingsbury				
Arts and Technology Academy*	KIPP DC – AIM, Discover, Grow, Key, Heights, Leap, Promise, Will				
Bridges	LAMB				
Capital City*	LAYC Career Academy				
Center City – Petworth, Shaw, Trinidad	Mary Mcleoud Bethune*				
Cesar Chavez - All Campuses*	Mundo Verde*				
DC Bilingual*	National Collegiate Prep				
DC Prep – All Campuses	Next Step - El Proximo Paso				
DC Scholars	Paul				
DCPS** - All Campuses	Potomac Lighthouse				
E.L. Haynes - Georgia Ave, Kansas Ave*	Richard Wright				
Eagle Academy	St. Columbo Nursery School*				
Education Strengthens Families – Ontario Rd	Thurgood Marshall Academy*				
Elsie Whitlow Stokes	Village Academy				
Excel Academy*	Washington Latin				
Hope Community – All Campuses	Washington MST				
Howard Road Academy – All Campuses	Washington Yu Ying*				
Howard University Middle School*	William E.Doar				
Imagine Southeast	Youthbuild LAYC				

*Public Charter School that hosted an educational activity

**All DCPS schools participated. The DCPS schools that hosted an educational activity were: Bancroft, Beers, Brent, Bruce-Monroe, Burroughs, Burville, Capitol Hill Montessori, C.W. Harris, Eastern, Hyde Addison, JO Wilson, Janney, Kelly Miller, Key, Langdon, Luke C Moore, Mamie D Lee, Maury, McKinley Technology, ML King, Orr, Peabody, Powell, Raymond, Roosevelt, School without Walls, Thomas, Tubman, Turner, Tyler, Walker Jones, Watkins, West.

APPENDIX C What's Growing Around Here? Seasonality Chart



APPENDIX D

Community Partner	School
Sweetgreen	Capital City PCS
DC Greens	Turner ES
City Blossoms	DC Bilingual PCS
U.S Environmental Protection	
Agency	J.O.Wilson ES
Whole Foods (Tenleytown)	Janney ES
One Love Massive	Mamie D. Lee School
Daniela Guillen	DC Bilingual PCS
	Walker Jones EC, Thomas ES, C.W.
DC Central Kitchen	Harris ES, Kelly Miller MS
Chartwells	Turner ES
Arcadia Center	Langdon EC

Community Partners that Collaborated with Schools on Educational Activities for Strawberries & Salad Greens Day, 2013

APPENDIX E
School Garden Advisory Board Members, SY 2012-2013

Organization	Name
21st Century School Fund	Nancy Huvendick
Action For Healthy Kids	Steve Green
Anacostia Watershed Society	Ariel Trahan
Casey Trees	Josh Singer
City Blossoms	Lola Bloom, Rebecca Lemos
Concern International	Susan Boyd
D.C. Environmental Education Coalition	Rebecca Davis
DC City Council	Andrew Laine
DC Greens	Lauren Biel, Sarah Bernardi
DC State Board of Education	Kamili Anderson
Department of General Services	Beth Gingold
District Department of the Environment	Grace Manubay, Patricia Doan
District of Columbia Public Schools	Melina Hong, Rebecca Newman, Rebecca Helgerson
Earth Day Network	John Maleri
Food Educator	Ibiti Vincint
Kid Power	Katie Harvey
Parent (DCPS-Murch ES)	Lisa Burke
Public Charter School Board	Richard Fowler
REAL School Gardens	Jeanne McCarty
School Garden Coordinator	Kate Lee
University of the District of Columbia	Sandra Farber
Washington Youth Garden	Anna Benfield, Kaifa Anderson Hall
Watkins Elementary	Barbara Percival

APPENDIX F

School Garden Snapshot

- 1. What is the full name of the school(s) where the garden is planned/currently located? (If the same garden serves more than one school, please include the names of both schools.)
- 2. What year was this garden established? If this garden is currently being planned, please enter the planned completion date.
- 3. Has this school garden been used and maintained in the past year? YES/NO
- 4. What is the name of this garden?
- 5. How many students were impacted by the garden during the 2011-2012 school year?
- 6. What is the location of the school garden? Please provide details on where the garden is located at the school.
- 7. Which of the following best describes the type(s) of garden you have at your school? Select all that apply:
 - Edible Garden
 - Schoolyard Greening Project
 - Stormwater
 - Pollinator/Butterfly Garden
 - Wildlife Habitat Garden
 - Native Garden
 - Greenhouse
 - None
 - Other:
- 8. What is the name of the primary contact for the school garden? This may be the School Garden Coordinator, or a parent, teacher, administrator, etc...
- 9. What is the email of the primary contact for the garden?
- 10. What is the role of the primary contact in the school?
- 11. Is there a dedicated School Garden Coordinator who is paid for their work in the school garden? This could be either a teacher who has school garden responsibilities as part of their official job description, or a contracted service provider. Teachers that are taking on garden responsibilities as an unpaid duty should select "No". YES/NO
- 12. When do activities happen in this school garden?
 - Classroom instruction (during the school day)
 - Extracurricular instruction (outside the school day)
 - Lunch-time activities (during lunch)
 - Summer time

- 13. What is the estimated annual operating budget for your school garden?
 - \$1-\$999
 - \$1,000-\$3,999
 - \$4,000-\$6,999
 - \$7,000-\$9,999
 - \$10,000-\$12,000
 - >\$12,000

14. What grades are impacted by the school garden?

- PS-PreK
- K-5
- 6-8
- 9-12
- 15. What partners did you work with during the 2011-2012 school year? Please select all the partners you worked with on garden-based initiatives.
 - Washington Youth Garden
 - University of the District of Columbia Master Gardening Program
 - DC Greens
 - Natural Partners/Monarch Sister School Program
 - Earth Day Network
 - Farm-to-School Network/Arcadia Center for Sustainable Food & Agriculture
 - Neighborhood Farm Initiative
 - Kid Power
 - Casey Trees
 - D.C. Smart Schools
 - District Department of the Environment (DDOE) RiverSmart Schools Program
 - Project Learning Tree GreenSchools! Program
 - D.C. EnvironMentors
 - D.C. Greenworks
 - City Blossoms
 - None
 - Other:
- 16. What is the approximate size of growing space in your garden in square feet? Please try to be as accurate as possible, and please enter the total square footage.

APPENDIX G School Garden Assessment Tool

	School Name:	Date:	Contact Name:	
Indicator	Exceeds	Working Towards	Does not Meet	Missing
Design				
Circulation	Walkways allow students to experience the garden through the use of all senses. The width, materials used, and placement of walkways should reflect the intended use. (5)(*)	Walkways allow students to experience the garden through the use of some senses OR the width, materials used, and placement of walkways somewhat reflects the intended use. (3)	Walkways allow students to experience the garden through the use of few senses AND/OR the width, materials used, and placement of walkways does not reflects the intended use. (1)	This component is missing (0)
Seating	Seating is age- appropriate and is available for the expected number of students that will use the garden at one time. Seating is shaded, multi- purpose and promotes reflection, observation, and conversation. (5)	Seating is somewhat age- appropriate OR is not available for the expected number of students that will use the garden at one time. OR Seating is not multi- purpose OR seating is not shaded OR does not promote reflection, observation, and conversation. (3)	Seating is not age- appropriate AND is one the following: Is not available for the expected number of students that will use the garden at one time; Is not multi-purpose; Is not shaded; Does not promote reflection, observation, and conversation. (1)	This component is missing (0)
Signage	Signage is age-appropriate and student-centered. Bulletin board is a permanent, multi- use structure that is clearly visible and actively promotes vision, open hours, current happenings, maintenance tasks, contact information, and upcoming events. Bulletin board reflect the culture of the school garden. (5)	Signage is somewhat age- appropriate and student-centered. Bulletin board is either not a permanent OR multi-use structure OR it is not clearly visible OR does not and actively promotes vision, open hours, current happenings, maintenance tasks, contact information, and/or upcoming events. OR the bulletin board reflect the culture of the school garden. (3)	Signage is not age-appropriate and/or student-centered. Bulletin board is either not a permanent OR multi-use structure OR it is not clearly visible OR does not and actively promotes vision, open hours, current happenings, maintenance tasks, contact information, and/or upcoming events. AND the bulletin board reflect the culture of the school garden. (1)	This component is missing (0)
Meeting Area	The central meeting area is a multi-use space that supports the maximum number of students that will use the garden at one time. There is a white/chalkboard clearly visible. Class supplies such as; notebooks, writing utensils, and teaching materials are easily accessible. Systems are in place for students to efficiently transition in and out of this space. (8)	The central meeting area is a somewhat multi-use space or it does not support the maximum number of students that will use the garden at one time. OR there is no white/chalkboard clearly visible. OR class supplies such as; notebooks, writing utensils, and teaching materials are not easily accessible. OR systems are somewhat in place for students to efficiently transition in and out of this space. (6)	The central meeting area is not a multi-use space or it does not support the maximum number of students that will use the garden at one time. Two of the following are true: There is no white/chalkboard clearly visible. OR class supplies such as; notebooks, writing utensils, and teaching materials are not present. OR systems are not in place for students to efficiently transition in and out of this space. (3)	This component is missing (0)
Tool Storage	Tools storage is in a weather proof structure, is easily accessible, well organized, and contains appropriate tools. Tools are organized for maximum efficiency and systems are in place to ensure for proper tool care and use. (8)	Tools storage is in a somewhat weather proof structure, OR is not easily accessible, OR is not well organized, OR does not contain appropriate tools. AND/OR tools are not organized for maximum efficiency OR systems are somewhat place to ensure for proper tool care and use. (6)	space. (3) Tools storage is not in a weather proof structure, OR is not easily accessible, OR is not well organized, OR does not contain appropriate tools. AND tools are not organized for maximum efficiency OR systems are not in place to ensure for proper tool care and use. (3)	This component is missing (0)
Security Features	Garden is highly visible from nearby public spaces. Tools are secured safely. No hazards area present. (10)	Garden is somewhat highly visible from nearby public spaces. OR tools are not secured safely. No hazards are present. (7)	Garden is not highly visible from nearby public spaces. AND tools are not secured safely. OR hazards are present. (3)	This component is missing (0)

Accessibility	The garden is readily accessible to the target audience including those with disabilities. Regular open hours are maintained. (9)	The garden is somewhat accessible to the target audience OR those with disabilities do not have garden access. OR regular open hours are not maintained. (7)	The garden is not accessible to the target audience AND/OR those with disabilities do not have garden access. AND/ OR regular open hours are not established. (4)	This component is missing (0)	
Systems					
Soil	Soil tests and observations show the soil has sufficient macro and micro nutrients, proper structure and pH to meet plant needs. A detailed plan is in place to ensure that soil health is maintained. (10)	Soil tests and observations show the soil has insufficient macro and micro nutrients, proper structure and/or pH to meet plant needs. OR an under developed plan is in place to ensure that soil health is maintained. (7)	Soil tests and observations show the soil has severely insufficient macro and micro nutrients, proper structure and/or pH to meet plant needs. OR no plan is in place to ensure that soil health is maintained. (3)	This component is missing (0)	
Biologic	Plants are diverse and appropriate for the intended use of the garden resulting in high yields and vigorous growth. Planting areas are weeded/cared for regularly. Plants are properly sowed, maintained, and harvested. (10)	Plants are somewhat diverse and appropriate for the intended use of the garden resulting in moderate yields and growth. OR planting areas are weeded/ cared for irregularly. OR Some plants are not properly sowed, maintained, and/or harvested. (7)	Plants are not diverse and inappropriate for the intended use of the garden resulting in poor yields and growth. OR planting areas are not weeded/ cared for. OR many plants are improperly sowed, maintained, and/ or harvested. (3)	This component is missing (0)	
Pest and Disease Management	Plants are healthy and no serious pest or disease problem exists. An organic management plan is in place that effectively manages pests and diseases by first keeping pest away from plants (ex: row covers), then using biological controls (ex: attracting beneficial insects), and lastly using organic sprays and dusts	Plants are somewhat healthy and no serious pest or disease problem exists. OR an organic management plan is in place that somewhat effectively manages pests and diseases by first keeping pest away from plants (ex: row covers), then using biological controls (ex: attracting beneficial insects), and lastly using organic sprays and dusts (ex: neem oil).	Plants are unhealthy and serious pest or disease problem exists. OR an organic management plan is not in place. (3)	This component is missing (0)	
Wildlife	(ex: neem oil). (10) Wildlife is regularly spotted in the garden. It is a sanctuary for wildlife with pollinator plants, plants that attract beneficial insects, and homes for native birds. (10)	(7) Wildlife is not regularly spotted in the garden, however attempts have been made to create a sanctuary for wildlife with pollinator plants, plants that attract beneficial insects, and homes for native birds. (7)	Wildlife is not regularly spotted in the garden, AND no attempts have been made to create a sanctuary for wildlife. (3)	This component is missing (0)	
Water	The garden employs an effective watering system that is appropriate for the scale, type, and purpose of the garden. Students are trained in proper watering techniques and are responsible for the watering. A plan is in place for watering over school breaks. (10)	The garden employs a somewhat effective watering system that is appropriate for the scale, type, and purpose of the garden. OR students are somewhat trained in proper watering techniques and are responsible for the watering. OR an ineffective plan is in place for watering over school breaks. (7)	The garden employs an ineffective watering system that is inappropriate for the scale, type, and purpose of the garden. OR students are not trained in proper watering techniques . OR no plan is in place for watering over school breaks. (3)	This component is missing (0)	
Compost	The garden has a well- designed, maintained, effective compost system that produces high quality finished compost. The system minimizes rodent issues. The compost system is appropriate for the size and type of garden. Students are trained on proper composting methods and are responsible for composting. (10)	The garden has a somewhat well- designed, maintained, effective compost system that produces finished compost. The system attempts to minimize rodent issues. OR the compost system is somewhat appropriate for the size and type of garden. OR students are not fully trained on proper composting methods and are not responsible for composting. (7)	The garden has a poorly designed, maintained, ineffective compost system that produces little finished compost. OR the system has rodent issues. OR the compost system is inappropriate for the size and type of garden. OR students are not trained on proper composting methods and are not responsible for composting. (3)	This component is missing (0)	
Community Participation	The program is highly effective in involving community members through regular well planned events. Communications are effective at reaching the community and are frequent and regular. (15)	The program is somewhat effective in involving community members through regular well planned events. OR Communications are somewhat effective at reaching the community. (10)	The program is not effective in involving community members. Events are not regular and\or well planned. AND Communications do not reach the community. (5)	This component is missing (0)	

Program Organization					
Vision Statement	A vision and mission aligns with that of the school. (5)	ŸA vision and mission somewhat aligns with that of the school.(3)	ŸA vision and mission that does not align with that of the school. (1)	This component is missing (0)	
Funding	Y A reliable funding source has been identified and a the school's budget includes a line item for the school garden. The school regularly matches funds to support the garden program. (15)	Y A somewhat reliable funding source has been identified OR the school's budget does not include a line item for the school garden. OR the school does not match funds to support the garden program. (10)	Funding source have not been identified AND the school's budget does not include a line item for the school garden. AND the school does not match funds to support the garden program.(5)	This component is missing (0)	
Institutional Support	The garden is well-supported from the top down. The garden is a part of the school's vision/ mission. (15)	The garden is somewhat well- supported from the top down. OR the garden is loosely a part of the school's vision/ mission. (10)	The garden is not supported from the school staff. OR The garden is not a part of the school's vision/ mission. (5)	This component is missing (0)	
Garden Coordinator	 Ŷ A highly skilled dedicated garden coordinator is responsible for the day-to day operations of the school garden and record keeping. This person is compensated for this time, receives training, and is supported by the school staff. (15) 	 Ŷ A skilled garden coordinator is responsible for the day-to day operations of the school garden and record keeping. This person is sometimes compensated, OR does not receive training, OR is unsupported by the school staff. (10) 	 Ŷ A garden coordinator is responsible for the day-to day operations of the school garden and record keeping AND This person is unskilled OR is not compensated, OR does not receive training, OR is unsupported by the school staff. (5) 	This component is missing (0)	
Garden Committee	A garden committee is established with a vibrant school wellness committee and includes diverse representation that establishes and upholds the garden purpose, vision, and goals. (10)	A garden committee is established and includes somewhat diverse representation that establishes and upholds the garden purpose, vision, and goals. (7)	A garden committee is established but does not meet OR does not include diverse representation. (3)	This component is missing (0)	
Student Involvement	All students are involved in various aspects of the garden. (10)	Greater than 50% of the student body is involved in various aspects of the garden. (7)	Less than 50% of the student body is involved in various aspects of the garden. (3)	This component is missing (0)	
Maintenance Plan	Ý A year-long maintenance plan is in place that clearly defines responsibilities, work assigned, and tasks. Regularly scheduled work days are productive and well attended by the community. (15)	YA year-long maintenance plan is in place that defines responsibilities, work assigned, and tasks. OR work days are productive and well attended by the community. (10)	Ý A year-long maintenance plan is not place that clearly defines responsibilities, work assigned, and tasks. OR work days are irregular an/ or not well attended by the community. (5)	This component is missing (0)	
Instruction					
Curriculum and Instruction	A standards-based garden curriculum is used to teach garden lessons. Teachers use a wide range of instructional techniques in the garden. (25)	A standards-based garden curriculum is used to teach most garden lessons. Teachers do not use a wide range of instructional techniques in the garden. (17)	A standards-based garden curriculum is used to teach few garden lessons. AND Teachers do not use a wide range of instructional techniques in the garden. (10)	This component is missing (0)	
Teacher Involvement	Many teachers use the garden across subject areas. Professional development is available to all teachers; in which all teachers participate. The garden is used throughout the year. (25)	Some teachers use the garden across subject areas. Professional development is available to some teachers OR The garden is not used through the entire year. (17)	Few teachers use the garden or teachers from only one subject area use the garden OR limited professional development is available OR the garden is used for a very short period of the throughout the year. (10)	This component is missing (0)	
Student Impact	The program has an overwhelming positive impact on student's attitudes and or behavior in a measurable way. (25)	The program has a somewhat positive impact on student's attitudes and or behavior in a measurable way OR the program has an overwhelming positive impact on student's attitudes and behavior but this impact is not	The program has a negative impact on student's attitudes. (10)	This component is missing (0)	

	measurable. (17)				
Improvement Plan					
Goals					
Improvement Areas					
Technical Support Needed					
	*Numbers represent scoring points for	or each category. All rul	brics were not worth equal	points.	

Active School Gardens Listed by Ward and Type							
School Name	Edible Garden	Pollinator Garden	Schoolyard Greening	Stormwater	Native Garden	Wildlife	Greenhouse
W	ard 1 So	chools					
Bancroft ES	Х	X	X	X		X	
Bruce-Monroe ES	Х						
Cleveland ES	Х	X					
Columbia Heights Education Campus	Х						
Cooke, H.D. ES	X	X					
Marie Reed ES	X	X					
*Tubman ES	X	X	X		X		
Briya PCS	X						
Cesar Chavez PCS- Chavez Prep Campus	X						
*DC Bilingual PCS - 14th Street Campus	Х	X					
DC Bilingual PCS - Columbia Road Campus	X	X			X		
E.L. Haynes PCS - Ga. Avenue Campus	X	X	X		Х		
Meridian PCS			X				
Mundo Verde Bilingual PCS	Х	X			Х	Х	
Jubilee JumpStart Preschool	Х						

APPENDIX H Active School Gardens Listed by Ward and Type

School Name	Edible Garden	Pollinator Garden	Schoolyard Greening	Stormwater	Native Garden	Wildlife	Greenhouse
	Vard 2 S	chools					
*Hardy MS	X			Х			
Thomson ES	X						
Georgetown Day			X				
The British School of Washington	X						
Washington International School			X				
,	Vard 3 S	chools					
Deal MS	X						
Eaton ES	X	X		X	X	X	
Hearst ES	X						
*Janney ES	X	X	X	X	X		
Key ES	X	X			X	X	
Mann ES	X	X	X	X		X	
Murch ES	X	X	X		X		
Oyster-Adams Bilingual School			X				
*Stoddert ES	X	X			X	X	X
Wilson HS		X	X	X			X
Community Preschool of the Palisades	X						
St. Columba's Nursery School	X	X	X	X		X	
Lowell School	X						

School Name	Edible Garden	Pollinator Garden	Schoolyard Greening	Stormwater	Native Garden	Wildlife	Greenhouse
Maret School	Х						
Sidwell Friends		Х		X			
	Ward	l 4 Schools					
Barnard ES	X						
Coolidge SHS	X	Х	X		X		
Lafayette ES	X	X		X			
Powell ES	Х				X		
Sharpe Health School	X	X				X	
Shepherd ES	X		X				
Takoma EC							
Bridges PCS	X						
*Capitol City PCS	X	X		X	X		
Community Academy PCS- Amos I	X		X				
E.L. Haynes PCS - Kansas Avenue Campus	X	Х					
Latin American Montessori PCS	X				X		
Roots PCS	X				X		
	Ward	l 5 Schools				<u>.</u>	<u> </u>
Burroughs EC	X	Х					
Langdon EC			X		X		

School Name	Edible Garden	Pollinator Garden	Schoolyard Greening	Stormwater	Native Garden	Wildlife	Greenhouse
Mamie D Lee School			X				
Marshall EC	X						
McKinley Technology HS	X						Х
*Center City PCS-Trinidad Campus	Х	Х			X		
DC Prep PCS Edgewater Elementary Campus	Х	X		x	X		
Elsie W. Stokes PCS	X	Х	X	X		X	
Mary McLeod Bethune PCS	X						
Paul PCS	X	Х			X		
Washington Yu Ying PCS	X		X	X	X	X	
	Ward	l 6 Schools					
Amidon-Bowen ES	X	Х					
Brent ES	X	Х					
*Capitol Hill Montessori @ Logan School	X		X	X	X		X
Eastern SHS	X	X	X	X	X	X	X
Eliot-Hine MS			X				
Jefferson MS	X	X			X		
Maury ES			X	X	X	X	
Miner ES	X	X	X	X		X	
*Peabody ES (Capitol Hill Cluster)	X	Х	Х	X			

School Name	Edible Garden	Pollinator Garden	Schoolyard Greening	X Stormwater	Native Garden	Wildlife	Greenhouse
Prospect LC	Х			Х	Х		
School Within a School	X						
Seaton ES	X	X	X	Х		X	
Stuart-Hobson MS							
Tyler ES				X	X	Х	
Walker-Jones EC	X	X	X	X		X	
Watkins ES	X	X	X	X		X	
KIPP/ DC Academy PCS- WILL Academy	X						
St. Coletta of Greater Washington PCS	X				X	X	
St. Peter's Interparish	X						
	War	rd 7 Scho	pols	<u> </u>	1	<u> </u>	
Beers ES	X	Х			Х	Х	
Kelly Miller MS	X						
Kimball ES	X	X	X	X		X	
Nalle ES		X					
Smothers ES	X			X			
Arts & Tech Academy PCS	X	X	X	X		X	
*DC Prep PCS- Benning Academy Campus	X	X					
School Name	Edible Garden	Pollinator Garden	Schoolyard Greening	Stormwater	Native Garden	Wildlife	Greenhouse
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SEED PCS	X			X			
)	Ward 8 Sc	hools				
Anacostia SHS	Х	Х					
King ES	Х						
Orr ES	X						
Excel Academy PCS	X						
Imagine Southeast PCS	X						
*Thurgood Marshall Academy PCS	х	X	X	X	X		

*Indicates model school gardens based on assessment scores and site visits. Model gardens demonstrate best practices in garden design, systems, program management, and curriculum/instruction.

**School gardens are considered active when host schools or organizations report their garden as active through the School Health Profile which is then verified through a site visit, on-line survey, or direct communication with school garden staff. Information was self-reported.

Appendix I School Garden Technical Support Online Request Form

Please fill out this form to request on-site technical assistance for DC schools. You will receive a followup email to confirm the visit. Please be as specific as possible in your request. (* Required)

1. Name *

2. Email *

3. Position at school *

4. Name of school *

5. School type *

6. What grade level(s) will most directly benefit from technical support? *

7. Please indicate which grades will use the garden in which technical support is being provided.

8. Are you requesting GARDEN DESIGN support? * YES/NO

This includes support with: creating seating, paths, garden beds, signage, meeting areas, tool storage areas, or improving security or accessibility.

9. Are you requesting SYSTEMS support? * YES/NO

This includes support with: soil assessments, planting, pest and disease management, attracting wildlife, improving water access and delivery, or composting.

10. Are you requesting PROGRAM support? * YES/NO

This includes support with: securing funding, improving community participation and institutional support, supporting a garden coordinator, sustaining a garden committee, improving student involvement, or developing a maintenance plan.

11. Are you requesting INSTRUCTION support? * YES/NO

This includes support with: identifying garden-based curricula, improving teacher involvement, or measuring student impact.

12. Please provide more details on the support you are requesting- be as specific as possible. *

13. Please indicate the top preferred date and time that you are requesting this site visit. *

14. Please indicate the second preferred date and time that you are requesting this site visit. *

	Recommended Curriculum Resources for School Garden	
Grade	Curriculum Description	Subject
K-4	Botany on Your Plate introduces the world of plants through the foods that we eat. Children explore edible roots, stems, leaves, flowers, fruits, and seeds through observation, dissection, journaling, discussion of findings, and, of course, tasting! Supports standards in nutrition, math, language arts, and social studies. Every lesson includes plant snacks that spark curiosity, interesting questions, and social dialogue to fuel the learning process. <u>http://www.gardeningwithkids.org/books.html</u>	ENGLISH LANGUAGE ARTS MATH NUTRITION SOCIAL STUDIES
K-8	<u>Math in the Garden</u> uses a mathematical lens to take children on an education-filled exploration of the garden. Dozens of hands-on activities hone math skills and promote inquiry, language arts, and nutrition. All lessons were developed to support mathematics and science standards and were extensively trial-tested by educators and youth leaders nationwide. <u>http://www.gardeningwithkids.org/books.html</u>	МАТН
K-8	<u>PLT curriculum</u> resources in the classrooms help today's educators teach tomorrow's decision makers about the environment. The goal is to teach students <i>how</i> to think, not <i>what</i> to think about the environment. Contact Grace Manubay at grace.manubay@dc.gov for information on professional development opportunities. http://www.plt.org/curriculum	ENVIRONMENT SCIENCE SOCIAL STUDIES
1-5	<u>Growing Healthy Habits: Grow It, Eat It!</u> curriculum provides nutrition education through gardening at your educational site. This curriculum was developed specifically for educators in Maryland reaching low-income youth who wish to use gardening as a tool for improving nutrition-related behaviors. <u>http://md.nutrition-ed.org/</u>	ENGLISH LANGUAGE ARTS SCIENCE HEALTH
1-6	Five Minute Field Trips activities have been grouped into three sections: Awareness, Understanding, and Action. We feel that sequencing activities in this order is a natural flow for learning about our world. These are the "classics" of Environmental Education. <u>http://www.geoec.org/lessons/5min-fieldtrips.pdf</u>	ENVIRONMENT
2-6	<u>The Growing Classroom</u> was developed by the Life Lab Science Program and revised to meet current science standards and educator needs. This bestselling teacher's manual features strategies for managing garden-based science instruction — including planning a garden laboratory, facilitating investigative lessons on ecology and nutrition, and involving the community. <u>http://www.gardeningwithkids.org/books.html</u>	SCIENCE
4-8	LiFE Series Curriculum Set engages students in hands-on investigations of our complex food system and how to use scientific evidence to make healthy food and activity choices. The three curricula, <i>Growing Food, Farm to Table & Beyond,</i> and <i>Choice, Control & Change,</i> were developed by educators at Teachers College at Columbia University. Although the modules are ideally used in consecutive years, each is a strong, stand-alone curriculum. <u>http://www.gardeningwithkids.org/books.html</u>	SCIENCE

APPENDIX J Recommended Curriculum Resources for School Gardens

	French Fries and the Food System provides kids from varied backgrounds a fertile	
5-12	environment to develop an appreciation for the links between farming and food systems. Seasonal lessons include practical, hands-on activities to introduce students to the social and economic aspects of the food cycle. The lessons and activities are organized by seasons. This book is an excellent resource for classroom and community educators. <u>http://www.gardeningwithkids.org/books.html</u>	SCIENCE SOCIAL STUDIES
	Nourish Middle School Curriculum Guide offers a rich set of resources to open a	ENGLISH LANGUAGE ARTS
6-8	meaningful conversation about food and sustainability. Beautifully designed and brimming with big ideas, the materials contain a viewing guide, six learning activities,	HEALTH
	action projects, student handouts, a bibliography, and a glossary. http://www.nourishlife.org/teach/curriculum/	SCIENCE
	Life Learning Academy's Organic Opportunities uses food as a tool to engage	
	students in academic learning, vocational training, and personal development. By involving students in every component of the food system, Organic Opportunities also	BUSINESS
9-12	aims to alter students' relationship with food, inspiring them to develop healthy lifelong eating habits.	MATH
	http://www.lifelearningacademysf.org/pdf/curricula/6.5_EarthCurricula_OrganicOpport	NUTRITION
	<u>unties.pdf</u>	
	Dig Art! Cultivating Creativity in the Garden is a new project guide for educators working with youth that integrates gardening with the arts. The arts activities in this	ART
K-12	guide will help to teach ecological literacy and inspire new enthusiasm for garden-based	HEALTH
	learning. Dig Art! activities support youth in creatively expressing themselves through gourd art, printmaking, time-lapse photography, and other creative projects. http://blogs.cornell.edu/garden/get-activities/signature-projects/dig-art/	
	Teaching the Food System offers a curriculum, comprised of eleven classroom-ready	
	modules, that spans issues in the food system from field to plate. The material is focused on issues in the U.S. food system but also touches on some of their global	
K-12	implications. Each module includes lesson plans, slides, handouts, vocabulary builders, and other materials that help educators deliver compelling lessons with minimal	VARIES
	preparation. <u>http://www.jhsph.edu/research/centers-and-institutes/teaching-the-food-</u> system/curriculum/	
	<u>ROOTS</u> (Restoring Our Own Trees Through Service) is an education initiative that aims to provide teachers and students with methods to connect with their schoolyard	
	environment. ROOTS utilizes familiar academic disciplines, such as math, reading, and science, to encourage teachers and students to use their backyard forest as their outdoor	
K-8	classroom. Lessons are aligned with DCPS standards.	MATH SCIENCE
1X-0	http://caseytrees.dreamhosters.com/wp-content/uploads/2012/02/roots-2012- curriculum.pdf	

3-4	The Great Garden Detective Adventure allows students to discover what fruits and vegetables are sweetest, crunchiest, and juiciest through a series of investigations and fun experiences connecting the school garden to the classroom, school cafeteria, and home. This eleven-lesson curriculum for 3rd and 4th grades includes bulletin board materials, veggie dice, fruit and vegetable flash cards, and ten issues of Garden Detective News for parents/caregivers. http://teamnutrition.usda.gov/Resources/gardendetective.html	NUTRITION
Pre-K and K	Our First Harvest is a garden-based early childhood curriculum by City Blossoms, Inc. http://cityblossoms.org/what-we-offer/#curriculum	NUTRITION

APPENDIX K School Gardens Program Service Providers List, 2013

School Gardens Program Service Providers List, 2013* *Information was self-reported	Design, construction, and maintenance	School based in class lessons	School based after school lessons	Summer lessons	Materials	Teacher PD	Technical support	Field trip
DC Schoolyard Greening (DCSG)								
http://www.dcschoolyardgreening.org/index.html								
Grades: K-12 th								
DCSG aims to increase and improve schoolyard green spaces to promote ecological literacy and environmental stewardship among students, teachers, parents, and the surrounding community. DCSG sponsors Growing Healthy Schools Week and teacher trainings, and promotes DC school gardens on the regional and national stage.								
University of the District of Columbia Master Gardening Program								
http://www.udc.edu/causes/ces/environment.htm								
$\underline{\text{Grades:}} 3^{\text{rd}} - 12^{\text{th}}$								
The Master Gardening Program is open to teachers and garden coordinators. This program teaches all aspects of gardening including soil sampling and interpretation, design, plant selection, and disease and insect detection.								
Contact: Sandy Farber (sfarber@udc.edu)								
Washington Youth Garden (WYG)								
http://www.washingtonyouthgarden.org/								
<u>Grades:</u> 3^{rd} - 6^{th}								
YWG works intensively with a select group of partner schools, teaching garden- based curriculum and installing and maintaining school gardens. WYG supports schools in maximizing their school garden through assisting with the development of school garden teams, facilitating teacher trainings, and co- hosting community events.								
Contact: Anna Benfield (abenfield@fona.org)								

School Gardens Program Service Providers List, 2013* *Information was self-reported	Design, construction, and maintenance	School based in class lessons	School based after school lessons	Summer lessons	Materials	Feacher PD	Fechnical support	Field trip
DC Greens								
http://dcgreens.org/								
Grades: K-12								
DC Greens offers a yearlong training series called Growing Garden Teachers that includes four major workshops designed for School Garden Coordinators. DC Greens also coordinates an internship program that places college level interns with School Garden Coordinators and manages a model teaching garden at Stoddert Elementary.								
Contact: Sarah Bernardi (sarah@dcgreens.org)								
Natural Partners/Monarch Sister School Program				Г				
http://www.npartners.org/programs.htm								
<u>Grades:</u> PreK-8								
Natural Partners/Monarch Sister School Program offers design & construction of pollinator gardens. The organizations will provide professional development for teachers and lead lessons centered on Monarch butterflies.								
Contact: William Dent (wdent@npartners.org)								
Earth Day Network								
http://www.earthday.org/								
Grades: K-12								
The Earth Day Network offers small grants and labor to build school gardens in the DC metro area. Grants are available at various times throughout the year as the Earth Day Network secures funding.								
Contact: John Maleri (maleri@earthday.net)								

School Gardens Program Service Providers List, 2013* *Information was self-reported	Design, construction, and maintenance	School based in class lessons	School based after school lessons	Summer lessons	Materials	Teacher PD	Technical support	Field trip
Arcadia Center for Sustainable Food & Agriculture								
http://arcadiafood.org/								
Grades: K-12								
Arcadia offers educational field trips at Arcadia Farm to complement school garden programs. The organization also holds a food and farm-based summer camp for kids ages 6-10. Scholarships are available.								
Contact: Liz Whitehurst (liz@arcadiafood.org)								
Neighborhood Farm Initiative (NFI)								
http://neighborhoodfarminitiative.org/								
<u>Grades:</u> 6-12								
NFI builds and maintains DC school gardens in partnership with the students, teachers, parents, and community-based organizations. In addition to introducing students to hands-on activities like planting, weeding, digging, and harvesting, NFI facilitates opportunities to integrate classroom lessons with the garden by offering extra-curricular activities, curricula, lesson plans, and project ideas.								
Contact: Brenda Estrella (bstar73@gmail.com)								
Kid Power								
http://www.kidpowerdc.org/								
Grades: 3-8								
Kid Power is an after-school program running 4 days per week and serving about 20 students at each school site. Their Veggie Time program teaches students about nutrition, cooking, and growing their own food in the school garden.								
Contact: Katie Harvey (<u>katie@kidpowerdc.org</u>)								

School Gardens Program Service Providers List, 2013* *Information was self-reported	Design, construction, and maintenance	School based in class lessons	School based after school lessons	Summer lessons	Materials	Feacher PD	Technical support	Field trip
Casey Trees								
http://www.caseytrees.org/								
<u>Grades:</u> K-12								
Casey Trees provides free trees including fruit trees to any DC school. They will also provide design and planting support and free tree walks around DC or at your school campus.								
Contact: Priscilla Plumb (pplumb@caseytress.org)								
District Department of the Environment (DDOE)								
http://ddoe.dc.gov/service/riversmart-schools								
Grades: K-12								
DDOE's RiverSmart Schools Grant creates outdoor classrooms with the dual function of reducing stormwater runoff. It incorporates training for teachers. DDOE also conducts workshops for the Project Learning Tree (PLT) national environmental education curriculum. Participants become eligible for funding and additional resources through National PLT's GreenSchools! Program.								
DC EnvironMentors		-						
http://ncseonline.org/programs/education- careers/environmentors/chapters/dc-chapter Grades: 9-12								
DC EnvironMentors is an environmental mentoring program that guides high school students through research projects. They will pair students up with mentors and facilitate a garden-based research project.								
<u>Contact:</u> Jacklyn Krisch (jshafir@ncseonline.org)								

School Gardens Program Service Providers List, 2013* *Information was self-reported	Design, construction, and maintenance	School based in class lessons	School based after school lessons	Summer lessons	Materials	Teacher PD	Technical support	Field trip
DC Greenworks								
www.dcgreenworks.org								
Grades: PreK-12								
DC Greenworks currently offers a variety of design, installation, and								
maintenance services related to green roofs, gardens, and rain barrels. They are								
developing resources to do more in-class presentations to teach students about								
storm water management, low impact development, and sustainable gardening.								
Contact: Dan Triman (dan@dcgreenworks.org)								
Yellow Tractor Program (YT)								
www.yellowtractorprogram.org								
Grades: PreK-12								
YT creates and facilitates widespread fruit and vegetable gardening for all ages								
as a solution to both urban and rural challenges. YT provides gardening beds,								
professional development, a bilingual book entitled Our Generous Garden for								
grades K-5, and can provide consulting regarding curriculum for grades K-12.								
Contact: Amelia Tonkin (amelia@yellowtractorprogram.com)								

APPENDIX L

School Garden Trainings Offered To Date with the Number of Participants

Training	# of Sessions	Audience	Total # of Participants		
School Garden 101	5	Stakeholders planning to build new school gardens	128		
School Garden 201	3	Stakeholders currently involved with active school gardens	80		
Seasonal Trainings	8	8 Teachers, School Garden 8 Coordinators, community members			
Growing Garden Teachers	3	School Garden Coordinators	45		
Growing Healthy Schools Week Trainings	3	Teachers, School Garden Coordinators, community members	40		
LEA Based Trainings (Pilot)	4	Teachers and other school staff	15		

School Name	Туре	Ward	Sponsor Organization	New/Existing School Garden
Cleveland ES	DCPS	1	City Blossoms	Existing
DC Bilingual PCS	PCS	1	City Blossoms	Existing
Tubman ES	DCPS	1	Kid Power	Existing
Hardy MS	DCPS	3	DC Greens	Existing
Murch ES	DCPS	3	DC Greens	Existing
Stoddert ES	DCPS	3	DC Greens	Existing
Wilson HS	DCPS	3	DC Greens	Existing
Capitol City PCS	PCS	4	Capitol City PCS	Existing
EL Haynes PCS	PCS	4	EL Haynes PCS	Existing
Burroughs ES	DCPS	5	Friends of the National Arboretum	Existing
Center City PCS	PCS	5	Friends of the National Arboretum	Existing
Cesar Chavez Prep PCS	PCS	5	Kid Power	New
Mary McLeod Bethune PCS	PCS	5	Mary McLeod Bethune PCS	Existing
Peabody Primary Campus	DCPS	6	Capitol Hill Cluster School PTA	Existing
Capitol Hill Montessori @ Logan	DCPS	6	Capitol Hill Montessori @Logan	Existing
Eastern HS	DCPS	6	City Blossoms	Existing
Seaton ES	DCPS	6	Community Resources Chesapeake, Inc.	Existing
Watkins ES	DCPS	6	Freshfarm Market, Inc.	Existing
School Within School	DCPS	6	Friends of School Within School	New
Miner ES	DCPS	6	Kid Power	Existing
Anacostia HS	DCPS	7	Anacostia HS	Existing
Randle Highlands ES	DCPS	8	Campaign for Environmental Literacy	New
Thurgood Marshall Academy PCS	PCS	8	Thurgood Marshall Academy PCS	Existing

APPENDIX M School Garden Grant Recipients, 2013-2014