U.S. DEPARTMENT OF EDUCATION

GreenRibbonSchools

# School Nominee Presentation Form

## ELIGIBILITY CERTIFICATIONS

### School and District's Certifications

The signatures of the school principal and district superintendent (or equivalents) on the next page certify that each of the statements below concerning the school's eligibility and compliance with the following requirements is true and correct to the best of their knowledge. *In no case is a private school required to make any certification with regard to the public school district in which it is located.*

1. The school has some configuration that includes grades early learning to 12.
2. The school has been evaluated and selected from among schools within the Nominating Authority's jurisdiction, based on high achievement in the three ED-GRS Pillars: 1) reduced environmental impact and costs; 2) improved health and wellness; and 3) effective environmental and sustainability education.
3. Neither the nominated public school nor its public school district is refusing the U.S. Department of Education Office of Civil Rights (OCR) access to information necessary to investigate a civil rights complaint or to conduct a district wide compliance review. The Department of Defense Education Activity (DoDEA) is not subject to the jurisdiction of OCR. The nominated DoDEA schools, however, are subject to and in compliance with statutory and regulatory requirements to comply with Federal civil rights laws.
4. OCR has not issued a violation letter of findings to the public school district concluding that the nominated public school or the public school district as a whole has violated one or more of the civil rights statutes. A violation letter of findings will not be considered outstanding if OCR has accepted a corrective action plan to remedy the violation.
5. The U.S. Department of Justice does not have a pending suit alleging that the public school or the public school district as a whole has violated one or more of the civil rights statutes or the Constitution's equal protection clause.
6. There are no findings of violations of the Individuals with Disabilities Education Act in a U.S. Department of Education monitoring report that apply to the public school or public school district in question; or if there are such findings, the state or public school district has corrected, or agreed to correct, the findings.
7. The school meets all applicable federal, state, local and tribal health, environmental and safety requirements in law, regulations and policy and is willing to undergo EPA on-site verification.

## U.S. Department of Education Green Ribbon Schools

Name of Principal: Mr. Eric Hale
(Specify: Ms., Miss, Mrs., Dr., Mr., etc.) (As it should appear in the official records)

Official School Name: The Academies of Bryan Station High School
(As it should appear on an award)

**Private Schools: If the information requested is not applicable, write N/A in the space*

I have reviewed the information in this application and certify that to the best of my knowledge all information is accurate.

________________________________________ Date: March 1, 2021
(Principal's Signature)

Name of Superintendent: Dr. Marlene Helm
(Specify: Ms., Miss, Mrs., Dr., Mr., etc.) (As it should appear in official records)

District Name: Fayette County Public Schools

I have reviewed the information in this application and certify that to the best of my knowledge all information is accurate.

reviewed the information in this appli

______________________________________ Date: March 1, 2021
(Superintendent's Signature)

**Nominating Authority's Certifications**
The signature by the Nominating Authority on this page certifies that each of the statements below concerning the school's eligibility and compliance with the following requirements is true and correct to the best of the Authority's knowledge.

1. The school has some configuration that includes grades Pre-K-12.
2. The school is one of those overseen by the Nominating Authority which is highest achieving in the three ED-GRS Pillars: 1) reduced environmental impact and costs; 2) improved health and wellness; and 3) effective environmental and sustainability education.
3. The school meets all applicable federal civil rights and federal, state, local and tribal health, environmental and safety requirements in law, regulations and policy and is willing to undergo EPA on-site verification.

Name of Nominating Agency: Kentucky Environmental Education Council

Name of Nominating Authority: Mr. Billy Bennett
(Specify: Ms., Miss, Mrs., Dr., Mr., Other)
I have reviewed the information in this application and certify to the best of my knowledge that the school meets the provisions above.

Billy Bennett
________________________________________________Date: March 1, 2021
(Nominating Authority's Signature)

## SUBMISSION

The nomination package, including the signed certifications, narrative summary, documentation of evaluation in the three Pillars, and photos should be submitted online according to the instructions in the Nominee Submission Procedure.

OMB Control Number: 1860-0509
Expiration Date: December 31, 2023

**Public Burden Statement**

According to the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless such collection displays a valid OMB control number. The valid OMB control number for this information collection is 1860-0509. Public reporting burden for this collection of information is estimated to average 37 hours per response, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. The obligation to respond to this collection is required to obtain or retain benefit P.L. 107-110, Sec. 501, Innovative Programs and Parental Choice Provisions. Send comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to the U.S. Department of Education, 400 Maryland Ave., SW, Washington, DC 20202-4536 or email ICDocketMgr@ed.gov and reference the OMB Control Number 1860-0509. Note: Please do not return the completed ED-Green Ribbon Schools application to this address.

## Executive Summary

The Academies of Bryan Station High School in Lexington, Kentucky is situated on the north side of the city where rolling horse farms meet modern urban communities. Our school has a wonderfully diverse student population and dedicated faculty and staff members who care about each student as an individual. Our rich tradition and vibrant community, family, and alumni create a learning environment designed to help every student achieve excellence. As part of this learning environment, we are committed to becoming a Green Ribbon School and have focused intentional efforts in the areas of environmental education, health and wellness, and energy usage.

While focusing on ways to improve water quality in our city, The Academies of Bryan Station High School and our community joined forces to create a rain garden and outdoor classroom. The project, which was first conceptualized in 2015, joined students, community members, and local partners in a collaborative effort. Our local partners include the University of Kentucky Agriculture Sustainability Program, the College of Education at the University of Kentucky, Lexington-Fayette Urban County Government, Lexington Fayette County Health Department, Greentree Plastics, and Bluegrass Greensource. The final product, funded by a grant acquired through the Lexington-Fayette Urban County Government, resulted in a frequently used and practical outdoor space that is utilized by The Academies of Bryan Station High School and our neighboring Bryan Station Middle School.

The University of Kentucky's College of Education staff worked with our students to research ways to improve the water quality around the city. Students learned about the EPA consent decree, constructed maps of our watershed, participated in multiple lessons, and tested water quality at Lexmark and the Kentucky Horse Park. These tests included chemical tests such as nitrogen, dissolved oxygen, pH, and phosphorus as well as physical tests such as turbidity and counting populations of macro-invertebrates in the water.

In 2018, we partnered with the University of Kentucky's College of Education in a water quality study that focused on comparing water quality in Lexington, KY to the water quality in Kolkata, India. Students completed a pre and posttest regarding their knowledge of concepts related to water. In addition, they completed a series of assignments which led them to complete a research proposal. After, they conducted water quality tests around the city and compared that data to the data in India. This data was used in their final project that summarized their findings.

Bluegrass Greensource has been one of our partners since the establishment of the rain garden. Each year, they educate students about several important components of environmental education including solid waste, water quality, and air quality. Through participation in their program, students conducted recycling and solid waste audits and visited the recycling center three times, including a virtual tour during Covid-19 virtual learning. In addition, students have tested carbon dioxide emissions from various sources and tested the water quality around the city.

In 2017, The Academies of Bryan Station partnered with the University of Kentucky's Office of Sustainability to explore ways to increase fresh food accessibility in urban areas. The Empower Ag Kentucky program was a three-component program focusing on sustainability education, community education, and professional development of participating students. The goal was to make students aware of innovation in our world and for them to experience the benefits of it through hands-on applications while learning about community structure and how to apply it conceptually to an aquaponics system. Lastly, the grant was designed to expose our students to young leaders in the University of Kentucky community and mentoring through career-exploration and personal succession planning. Students attended community field trips including a trip to *Food Chain, a* large aquaponics system that produces and provides fish and vegetables to local restaurants and food banks. This experience enabled students to build and manage a classroom system. They worked in teams and competed to see which team could maintain and implement the most efficient system.

Another successful initiative has been the decrease of energy consumption within the school. Students conducted energy audits each month to increase awareness. Over the past four years, our energy consumption has decreased by 17% which is a reduction of approximately $60,000 annually for utility bills and 549 metric tons of carbon dioxide emissions which equates to removing 119 cars from the road for a year.

While on a quest to find ways to reduce environmental impact, our Green Team began the rigorous and daunting bottle cap recycling initiative. This initiative partnered us with Green Tree Plastics, LLC. based in Evansville, Indiana. Green Tree manufactures recycled plastic products using 100% recycled plastics, no hazardous chemicals, non-organic fillers, and uses non-organic color concentrates. We initially collected 400 pounds of bottle caps resulting in enough recycled material for two benches. With increased communication, signage around the school and word of mouth, our efforts paid off significantly. Through our outreach to the community, we accepted bottle caps from a variety of locally owned businesses, churches, doctors' offices, pharmacies, alumni and even other schools. With these efforts, we were able to collect 2,000 more pounds of bottle caps that were used to make two picnic tables and four more recycled benches.

Our Medical Academy and Wellness Committee work together to bring awareness and increased engagement for students and staff members to improve health and wellness. The Medical Academy hosts a health fair for students and community members, exposes students to careers through health related field trips and organizes Med Talks from individuals in the medical field. In addition, the Medical Academy students partner with the University of Kentucky Dance Blue Program which raises money and awareness for childhood cancer research.

The Wellness Committee has focused on increasing physical activity among students and staff. Faculty and staff weight loss challenges are implemented each year. Signage depicting walking distances and routes around the school have been added to promote walking and running, and the cafeteria began using local produce.

Mindfulness and social emotional learning have been implemented into the school curriculum. Students are encouraged to participate in these activities and lessons to better manage their stress and health. During Covid-19 virtual learning, these lessons have been needed more than ever. They are vital for students to understand that mental health is just as important as physical health.

Students in Advanced Placement Environmental Science partnered with the Adopt a Tree program in 2017 and 2019. Students explored the surrounding area of the campus and chose a tree that they would like to adopt. As part of the program, they measured the diameter of the tree to calculate how much carbon dioxide was being removed from the atmosphere. This data continues to be monitored by current students and can be monitored for years to come.

Overall, several of our long-term projects such as recycling and energy reduction have played a vital role in environmental education and sustainability. Through these hands-on projects, students have engaged in the importance of taking care of the environment for themselves and their communities. These projects made it possible to be recognized as a Kentucky Green and Healthy School in 2018 and 2019. In the future, The Academies of Bryan Station will remain dedicated to increasing knowledge and awareness of environmental issues while improving the health and wellness of our students and community.

## Pillar 1 Narrative

The Academies of Bryan Station High School has taken several measures to reduce our environmental impact and costs for our school and community. EUI (Energy Usage Intensity) measures how much energy is used per square foot of building area. It is measured in kBtu/square foot. Over the past 4 years, our numbers have decreased by 17%. In 2016 our EUI was 56.6 kBtu/sq.ft. This was higher than the desired number and changes were made so that we could reduce that number. In 2017, 51.3 kBtu/sq.ft. was the EUI which was a decrease of 9.4 %. This decline continued in 2018 with a EUI of 49.2 kBtu/sq.ft. and again in 2019 to 47.1 kBtu/sq.ft. with an overall decrease of 17% which is a reduction of approximately $60,000 annually for utility bills. This is a decrease of 549 metric tons of carbon dioxide emissions which equates to removing 119 cars from the road for a year.

To accomplish these decreases in energy use, the students completed several tasks. Energy audits were completed monthly as suggested by the efforts of Fayette County Public Schools, but in addition we sent emails to teachers before and after the audit each month. We left positive notes for teachers who were conserving energy and ways to improve for others. We also sent the data of the audit to everyone and offered rewards to the academy that had the best data. We focused on the times of day that teachers were often not in their rooms, but still in the building. Making the teachers aware and accountable improved our audit numbers dramatically.

Bryan Station is an active member of the Bluegrass Youth Sustainability Council, a coalition of student leaders from all of Lexington's public and private high schools. Bryan Station High School makes it a priority to serve in leadership BYSC roles, and in 2020 our student representatives are spearheading partnerships with local electric utility (KY Utilities), local Sierra Chapter (Bluegrass Chapter), and other local sponsors to purchase and install campus solar benches and solar bricks for library checkout. Enthusiasm for solar energy is high among our students, but the current financial and political structure around rooftop PV (net meterings, seasonal occupancy, low energy prices) makes it difficult to pursue. So, our students are doing the next best thing: pursuing solar benches and solar bricks that students may use to charge devices.
Our high school was strategically designed with ample and carefully oriented windows and the ability to lower light levels to leverage daylighting to reduce the use of overhead lighting. Through student schoolwide encouragement, teachers with exterior windows are encouraged to use daylighting. The lights are only used when necessary on overcast days. This aids in the conservation of energy and our overall energy use.

Streamlining our recycling program has improved our ability to positively impact the amount of waste produced by our school. The program is student-centered allowing them to lead and implement the collections and audits. Once a week, students collect recycling, remove the contamination, and provide feedback to teachers about their bin. With the help of Bluegrass Greensource, a local non-profit organization that focuses on environmental education, resources, and outreach, we also conducted a recycling and solid waste audit. After conducting the audits and posting posters around the school, students also made a recycling video that was shared with the school, the district and Bluegrass Greensource. These efforts awarded us a Kentucky Green and Healthy Schools award.

In Fayette County Public Schools, there is no mandate to recycle and custodians are not required or even incentivized to support the efforts. Our students partner with our custodial staff to educate, inspire, and build an effective collaboration and protocols to ensure correct classroom, office, and cafeteria collection and seamless delivery to our recycling dumpster. In Fall of 2019, our municipal recycling center stopped accepting paper, a significant setback to school recycling. As a result, many schools' recycling programs paused. We understood that pausing our recycling program may result in long-term loss of protocols, awareness, and partnerships we established to develop. Despite the loss of paper recycling, we continued to recycle aluminum, cardboard, and glass from classrooms and offices.

When paper recycling resumed, it was no longer accepted with the other recyclable products. Paper had to be placed in specific bins around the city. Despite the inherent formidable challenges associated with gathering, collating, and delivering our office paper to an off-site recycling receptacle, our students made it a priority. While 85% of FCPS schools (and all other high schools) chose to terminate their paper recycling until curbside resumed, The Academies of Bryan Station procured, designed, and instituted "paper only" bins, sorted paper tossed in other recycling bins, and delivered it to the off-site community paper dumpster at a local public park. This could not have been done without the teamwork between teachers, students, and staff.

Although paper historically makes up the highest percentage of our recycling, many teachers have implemented a zero-paper classroom, often at the encouragement of students who have calculated and illustrated what an impact classroom paper has on our overall waste stream. Teachers have implemented innovative strategies for moving instruction and formative/summative assessment online, which we estimate reduces our paper waste stream by 25%.

Our Green Team also began a bottle cap recycling initiative in partnership with Greentree Plastics. We collected 400 pounds for two benches initially and used those along with flyers around the school to increase the number of bottle caps the community and school were bringing in for recycling. With these efforts, we were able to collect 2,000 more pounds of bottle caps that were used to make 2 picnic tables and 4 more recycled benches. These benches do not require any type of treatment and will remain at the school for as long as the school exists.

Environmental science and biology students participate in data collection on light levels, temperature, plug loads, and carbon dioxide levels within the school. They also share any concerns with our administration and head custodian to find solutions when needed.

Water quality and conservation have also been a focus for our school. We have seen significant reductions in our water usage over the last five years. From 2015 to 2019 we reduced our water usage by 30%. In 2015 we used 3,038,000 gallons of water costing approximately $26,000. By 2019 we reduced that number to 2,096,000 gallons costing approximately $18,000 that year with a savings of 1,000,000 gallons of water and $8,000. We have carried out these gains by implementing several initiatives.

We started with the first storm drain mural in Fayette County highlighting the fact that pollution that goes into the storm drain can affect our watershed. This was completed by art students and is an illustration of the name of our school's watershed. Environmental science classes have been a part of numerous projects related to watersheds and water quality. The University of Kentucky's education department along with members of the science department and Lexington Fayette Urban County Government have worked with our students to educate them on the importance of water conservation and quality. We conducted stream quality studies at the Kentucky Horse Park, Lexmark, and various streams in the surrounding areas of our school and community.

Bluegrass Greensource partnered with us for the last five years and educated students on water pollution, water testing, a virtual field trip to the wastewater treatment plant, and recently a career panel with several members of the Division of water quality. Students met and had a question-and-answer session with the capacity assurance manager, the water quality manager, and the director of water quality. This provided them with insights into career options as well as the importance of water quality and conservation.

In 2016, a rain garden and outdoor classroom was established as a shared space between the middle and high schools. The funds were acquired through a Lexington-Fayette Urban County Government grant to improve water quality around the city. High school students led a community education event in which they taught the community and middle school students about water quality testing, conservation, and watersheds. In our outdoor classroom which is also a rain garden, we also compost the weeds and grass during maintenance. Composting is also being utilized in one of our cooking classes.

Through the work of our green team, we were able to acquire three water refilling stations that students can utilize in place of the water fountains. These efforts allow students to reuse water bottles instead of disposing of them.

Alternate transportation to school is also encouraged. Bike racks have been installed and students can get free public transportation passes for their use for after school activities. These initiatives reduce our carbon footprint related to transportation.

Our school cafeteria began using some local produce to promote healthy eating through the Farm to School program. This also decreases carbon dioxide emissions by reducing the distance the produce must travel to get to the school.  In addition, students in our culinary arts program use fresh vegetables and herbs in which they grow and support throughout the year in the dishes that they create. They utilize these ingredients by offering teachers lunch once a month to raise money for their competitions.

We have also formed a plan for the reduction of mini refrigerators in our school. A survey was conducted for the staff to determine how many refrigerators were in the school as well as how many people were willing to consolidate if a new, energy-efficient refrigerator was provided for them. This will be completed when we are permitted to return to school.

Although we have made significant gains in energy and water efficiency, we will continue to work as a school and community to continue to improve and grow as a Green Ribbon School.

## Pillar 2 Narrative

At the Academies of Bryan Station High School, we are committed to increasing the health and wellness of our students, staff, and community. Our Medical Academy and Wellness Committee play a huge role in this long-term goal.

The Medical Academy hosts a wellness fair each year and invites community members to educate the school and community about health-related topics. Anyone in the community and/or school can participate and can get their flu vaccine, samples of fresh, healthy food, health screenings, and information about important wellness topics. The health department attended the fair among many other community members. They also taught students about the opioid epidemic and other aspects of the health department.

In addition, students in the medical academy are either certified pharmacy technicians or Certified Nursing Assistants by graduation. They participate in rigorous instruction and many times end up working in our community. The medical academy also hosts regular Med Talks that utilize community members that work in the medical field. They have hosted talks which include topics such as the brain, prosthetics, and ethics.

An Anti-Vaping initiative has been started by our Medical Academy in partnership with the University of Kentucky. They offer prizes and rewards for students who are willing to turn in their vaporizer. This encourages students to learn the facts about vaping educationally and positively.

Field trips are also used to educate students on the importance of health, wellness, and medicine. Students have attended places such as The Outreach Center for Science and Health Career Opportunities in the University of Kentucky where they learned about the various jobs in the medical field. Other students visited Food Chain, a local aquaponics business that provides food for local restaurants and food banks.

We also have a student-led club, HOSA or Future Health Professionals which has been active for three years. Students participate in competitions related to the health field as well as attend state and national conferences. Students won second place in physical therapy and first place in personal assisting in 2019 at the state conference. In 2020, students won second place in research persuasive writing and speaking and third place in dental science at the state conference.

The Medical Academy also hosts an annual Dance Blue event in partnership with the University of Kentucky. Dance Blue is a fundraising organization raising funds for children's cancer research. Students from the University as well as BSHS share their cancer experiences and participate in dances throughout the evening while getting pledges from sponsors. In 2019, the students raised $3,254. Not only does this promote physical activity, but it is also a community service that aides in the health of children in Kentucky.

Our cafeteria's use of local produce through the Farm to School Program also helps to educate and promote healthy living. Because fresh food is not always available in our community and most students are free and reduced, this is many times the only way that they have access to fresh, healthy ingredients.

The wellness committee has sponsored several health initiatives. Signs are posted around the school highlighting the best routes for walking as well as the distances around the school. After school workouts were designed so that people at all levels of fitness could participate.  These included Zumba, yoga, and group walking and running. Our school nurse has also implemented a weight loss challenge program each year after winter break. Participants pay a fee and weigh in each week. Winners are awarded for weekly weight loss percentages as well as an overall winner.

Mindfulness and social-emotional learning have been implemented into the school curriculum. Students are encouraged to participate in these activities to better manage their stress and health.  During Covid-19 virtual learning social emotional learning has been taught each week. These lessons are vital for students to understand that mental health is just as important as physical health.

Material safety lessons are incorporated into science and theatre classes. In science laboratory safety is taught to every student. Students must understand material safety data sheets, appropriate use of chemicals, and must follow all laboratory safety rules. In theatre classes, students learn about toxic materials, when to wear a mask and safety glasses, fire hazards, safety hazards, and protocols for emergencies. They work with a variety of materials, so it is important for them to know which are hazardous, flammable, and flame retardant.

Our chemical products purchased for school use must be low or no-VOC, be stored and labeled appropriately, new employees must be trained, and expectations for staff are communicated by the lead custodian.

Our building is inspected monthly to ensure safety from mold, moisture, and water leakages. Classrooms are monitored for carbon dioxide and RH levels. Remediation protocols are in place if levels exceed the healthy limits. Classroom receptacles are provided for dissection of waste and other hazardous materials. These are collected by district officials and are disposed of in a medical waste incinerator. There is an annual inspection of all cleaning products and air fresheners in the school. Any product that is not approved is removed and disposed of properly. Radon levels are monitored regularly and following district safety regulations, our school remediated the presence of radon in our school. Special ventilation pipes were placed in the school to remove any radon that is present in the school. Our ventilation system and filter status are monitored regularly, and an alert is sent to maintenance personnel when the unit is not functioning properly. This ensures that we have healthy air quality in our schools.

Teachers, custodians, and maintenance personnel all work together to ensure that our students, faculty, and staff are learning and working in a safe learning environment.

## Pillar 3 Narrative

Environmental and sustainability education is at the center of our efforts at the Academies of Bryan Station High School. All core science classes have an earth and space component and we also offer an advanced environmental science and AP environmental science course. Our biology classes focus on human impact on the environment. All chemistry courses complete a project on alternative energy sources and physics students design energy-efficient homes. Other classes also utilize environmental education in their curriculum. Our geography classes complete a project on the interactions between humans and the environment. AP human geography includes topics such as sustainable agriculture, human population dynamics, and the history of agriculture and farming. AP world history includes content related to pollution and land usage. Other social studies classes study the impact of policy on the environment and humans. In our English classes, a climate crisis study was conducted to strengthen our students' research and writing skills in conjunction with data on climate change. In a combined effort, all students at the Academies of Bryan Station learn about the importance of protecting our environment now and in the future.

In 2016, a rain garden and outdoor classroom was established as a shared space between the middle and high schools. The funds were acquired through a Lexington-Fayette Urban County Government grant to improve water quality around the city. A community event was implemented to educate the middle school and community about the importance of water quality, conservation, and usage. The high school students led the education portion of the event and were highlighted in the district newsletter. Each year since students have participated in clean-up of the garden as well as lessons about the importance of water quality and how the rain garden helps to maintain the quality of water in Lexington.

The University of Kentucky's College of Education also worked with our students to research the improvements to water quality around the city. Students were taught about the EPA consent decree, constructed maps of our watershed, participated in multiple lessons, and tested water quality at Lexmark and the Kentucky Horse Park. These tests included chemical tests such as nitrogen, dissolved oxygen, pH, and phosphorous as well as physical tests such as turbidity and the populations of macro-invertebrates in the water.

In 2017, we partnered with the University of Kentucky's Office of Sustainability. The Empower Ag Kentucky program was a three-component program that focused on sustainability education, community education, and professional development of participating students. The goal was to make students aware of innovation in our world and for them to experience the benefits of it through hands-on applications. They learned about community structure and how to apply it conceptually to an aquaponics system. Lastly, the grant was designed to expose our students to young leaders in the UK Community and mentoring them through career-exploration and personal succession planning. Students went on several community field trips including Food Chain which provided them with insight into a large aquaponics system so that they could build and manage a classroom system. They worked in teams and competed to see which team could maintain and implement the most efficient system while producing the most produce.

In 2018, we partnered with the University of Kentucky's College of Education in a water quality study that focused on comparing water quality in Lexington, KY to the water quality in Kolkata, India. Students completed a pre and posttest regarding their knowledge of concepts related to water. In addition, they completed a series of assignments which led them to complete a research proposal. After, they conducted water quality tests around the city and compared that data to the data in India. This data was used in their final project that summarized their findings.

Bluegrass Greensource has been one of our partners since the establishment of the rain garden. Each year, they teach students about several important components of environmental education. These include solid waste, water quality, and air quality. Through participation in their program students have conducted recycling and solid waste audits, have visited the recycling center three times including a virtual tour during virtual learning, have tested emissions from various sources, and tested the water quality at various places around the city.

Students in AP environmental science partnered with the Adopt a Tree program in 2017 and 2019. Students walked the campus and chose a tree that they would like to adopt. They measured the diameter of the tree to calculate how much carbon dioxide was being removed from the atmosphere from the tree that they decided to "adopt."

In 2020, we won second place in a district-wide Earth Week competition. Students from around the district competed to complete earth day activities which included topics such as watersheds, energy usage, consumption and waste, Earth Day history, and Arbor Day. In addition, we participated in Tree Week 2020 in which students planted trees in their community.

Several of our long-term projects such as recycling, and energy reduction have also played a vital role in environmental education. Through these hands-on projects students have engaged in the importance of taking care of the environment for themselves and their communities. These projects have also made it possible to be recognized as a Kentucky Green and Healthy School in 2018 and 2019. We hope to earn the distinction so we can proudly say that we are a Green Ribbon School.