2012-2013 School Nominee Presentation Form

PART I - ELIGIBILITY CERTIFICATION

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 one or more of grades K-12. (Schools on the same campus with one principal, even a K-12 school, must apply as an entire school.)

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.

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.
GreenRibbon

U.S. Department of Education Green Ribbon Schools 2013

For Public Schools only: [ ] Charter [X] Title I [ ] Magnet [ ] Choice

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

Official School Name  Harriet W. Gwin Elementary School
(As it should appear in the official records)

School Mailing Address  1580 Patton Chapel Road
(If address is P.O. Box, also include street address.)

Hoover  Alabama  35226

City  State  Zip

County  Jefferson  State School Code Number*  0365

Telephone  (205) 439-2600  Fax  (205) 439-2601

Web site/URL  http://gwinelem.al.hcre.schoollnsites.com  E-mail  kwhite@hoover.k12.al.us

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

Dr. White  Date  2/8/13
(Principal's Signature)

Name of Superintendent*  Mr. Andy Craig
(Specify: Ms., Miss, Mrs., Dr., Mr., Other)

District Name*  Hoover City Schools  Tel. (205) 439-1000

I have reviewed the information in this application and certify that to the best of my knowledge all
information is accurate. This is one of the highest performing green schools in my jurisdiction.

Craig  Date  2/8/13
(Superintendent's Signature)

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

ED-GRS (2012-2013)
PART II – SUMMARY OF ACHIEVEMENTS

Instructions to School Principal

Provide a concise and coherent "snapshot" that describes how your school is representative of your jurisdiction’s highest achieving green school efforts in approximately 800 words. Summarize your strengths and accomplishments. Focus on what makes your school worthy of the title U.S. Department of Education Green Ribbon School.

Gwin Elementary School is located in Hoover, Alabama and is part of the Hoover City Schools District. Gwin has a reputation for leading the community in developing programs that help to academically and socially shape the minds of children. Our school, named for Harriette W. Gwin, a former local school board leader and activist, is rich in diversity. Our population represents more than 30 nationalities and is a safe and welcoming learning environment for students from many different socio-economic and ethnic backgrounds. Located in the heart of Hoover, Gwin sits adjacent to the Moss Rock Preserve. The Moss Rock Preserve is a 350 acre nature preserve that reminds our students each day of the beauty of our planet and the importance of protecting and maintaining a healthy environment.

The students and teachers at Gwin are honored to have the opportunity to apply to become a U.S. Department of Education Green Ribbon School (ED-GRS). Our efforts to improve the environment and health conditions in our school building and outside community have led to our desire to now move forward to broaden the impact we have on other schools and on the education that is provided to children throughout the state of Alabama.

A group of students have formed a club at Gwin called Eco-Brains. The Eco-Brains, organized in 2011, are committed to changing the world one community at a time beginning with their own. The students, led by our school Enrichment Specialist, Traci Knight Ingleright, began by conducting research about environmental education and have participated in the Smithsonian Institution Global Tree Banding Project System and the Environmental Protection Agency’s Air Quality School Flag Program. Gwin has already been certified as an American Wildlife Federation Outdoor Classroom School and a National Wildlife Federation Backyard Habitat. Through the efforts made by the Eco-Brains and students and teachers in our school, Gwin Elementary School strives to uphold the goals and ideals set forth in the ED-Pillars.

Pillar I: Reducing environmental impact and cost

Gwin Elementary School has implemented a strategy to conserve water that can be used as a resource on our school campus. Based on the results of a student led water audit, rain barrels have been installed all around the exterior of the school building. Water from the fifteen barrels is collected by students and teachers to nourish plants in beds and gardens around the school. Also in an effort to eliminate harmful toxins in the air, Gwin has a well publicized no idling policy and participated in the National Walk to School Day event.
**Pillar II: Improve the health and wellness of students and staff**

Gwin has gained national recognition by earning the Bronze Award from the Alliance for a Healthier Generation. This award recognizes schools that promote healthy living. Our school prohibits smoking on campus, sponsors a running club, and has dance and unicycle teams. Gwin is a Wellness Academics and You (WAY) school and includes health education in daily lessons. Our district exercises safe options for cleaning and grounds maintenance by using products that are less harmful for indoor cleaning and pesticides are not used within eight hours of students being in the building. It should also be noted that our school and district work closely with Energy Star and our school has even undergone testing for radon gas and other indoor air quality risk factors.

**Pillar III: Provide effective environmental and sustainability education, incorporating, STEM, civic skills and green career pathways**

Teachers and students at our school are involved in learning that fosters positive attitudes and teaches information about the environment. Students throughout our school participate in reading instruction that includes environmentally themed literature that helps them to learn about recycling, the protection of animal habitats, and other ideas related to the well-being of the environment in which we live. As our teachers walk nearby trails, it is clear that our teachers and students value our school as an outdoor classroom school. Many of our teachers have been trained in Project WILD and use it as a framework for teaching science while hiking, and inside as well. Our school-wide fundraiser each year, sponsored by the Parent Teacher Organization (PTO), is a walk, and we also participate in an Arthritis Foundation walk led by our physical education teachers.

Gwin Elementary School is a school that focuses on the present and future lives of our students. We strive for excellence and to broaden the scope of influence our students will have on their communities and environment. Our students strive to make Hoover, Alabama and our world “greener” places to live.

**PART III – DOCUMENTATION OF STATE EVALUATION OF NOMINEE**

**Instructions to Nominating Authority**

The Nominating Authority must document schools’ high achievement in each of the three ED-GRS Pillars and nine Elements. For each school nominated, please attach documentation in each Pillar and Element. This may be the Authority’s application based on the Framework and sample application or a committee’s written evaluation of a school in each Pillar and Element.

The Alabama State Department of Education created the Alabama Green Ribbon Schools Committee consisting of eighteen representatives from various public and private institutions, each with expertise in one or more of the three Green Ribbon Pillars. The committee evaluated each applicant using the recommended scoring rubric. The committee determined that Gwin Elementary should be nominated for the National Green Ribbon Schools Award for the following reasons:

- Achieved benchmarks or received awards in each of the three Green Ribbon Schools Pillars
- Integrated environmental education through all subjects at all grade levels and included fiction and non-fiction children’s literature books in the school’s library
- Implemented student audits in transportation, water usage, energy usage, and waste management
- Engaged students in authentic learning through local, national, and global environmental education projects
• Implemented Indoor Air Quality Tools for Schools Program and became the first school in Alabama to display Air Quality flags
• Engaged students, teachers, and community in multiple recycling initiatives
• Eliminated the need for the irrigation system with the rainwater collection barrels
• Developed partners with community, local, state, and national institutions, both public and private

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 one or more of grades K-12. (Schools on the same campus with one principal, even a K-12 school, must apply as an entire school.)

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
Alabama State Department of Education

Name of Nominating Authority
Thomas R. Bice
(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.

(Date 2/12/13)

The nomination package, including the signed certifications and documentation of evaluation in the three Pillars should be converted to a PDF file and emailed to green.ribbon.schools@ed.gov according to the instructions in the Nominee Submission Procedure.
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.
AL & ED-GRS Application

Thank you for your interest in completing the Alabama application for nomination to U.S. Department of Education Green Ribbon Schools (ED-GRS). In order to complete this application, you will need to collect data about your school's facility, health and safety policies; food service; and environmental and sustainability curriculum.

ED-GRS recognizes schools taking a comprehensive approach to greening their school. A comprehensive approach incorporates environmental learning with improving environmental and health impacts. Becoming a U.S. Department of Education Green Ribbon School is a two-step process. The first step is to complete and submit this form to be selected as a nominee by an eligible nominating authority. The second step of the process requires signatures for the nominee package that will be sent to the U.S. Department of Education (ED).

ED selects honorees from those presented by eligible nominating authorities nationwide. Selection will be based on documentation of the applicant's high achievement in the three ED-GRS Pillars:

Pillar I: Reduce environmental impact and costs.
Pillar II: Improve the health and wellness of students and staff.
Pillar III: Provide effective environmental and sustainability education, incorporating STEM, civic skills and green career pathways.

Schools demonstrating exemplary achievement in all three Pillars will receive highest rankings. It is important to document concrete achievement. It will help you to assemble a team to complete the application. This team might include: a facilities manager, physical education director, food services director, curriculum director, finance department representatives, teachers and students. You should consult the ED-GRS resources page for standards, programs and grants related to each Pillar, Element and question. This is an excellent clearinghouse of resources for all schools, not just those who apply.

The questions in this application will help you demonstrate your high achievement in these Pillars as well as provide space for you to include pertinent documentation. You will receive points when you provide documentation for your answers. E-mail completed applications to sfarrell@alsde.edu on or before the deadline of December 21, 2012. Any application received after December 21, 2012, will not be accepted. If you have any questions regarding the application process, please contact Mrs. Shirley J. Farrell at 334-242-8317 or Martha Anne Allison at 334-353-1258.

Note that if selected for nomination to ED-GRS, the school principal and district superintendent must be prepared to certify that each of the statements below concerning the school’s eligibility and compliance with the following requirements is true; however, 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 one or more of grades K-12. (Schools on the same campus with one principal, even a K-12 school, must apply as an entire school.)
2. The school has been evaluated and selected from among schools within the Nominating Authority’s jurisdiction as 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. 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.

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.

School Contact Information

School Name:  Gwin Elementary
Street Address:  1580 Patton Chapel Road
City:  ___Hoover             State:  AL             Zip:  35226
Website:  _______________________________Facebook page:  ____________________________________________

Principal Name:  Kimberly White
Principal Email Address:  Kwhite@hoover.k12.al.us       Phone Number:  205-439-2600

Lead Applicant Name (if different):  Traci Knight Ingleright
Lead Applicant Email:  tingleright@hoover.k12.al.us      Phone Number:  205-439-2600
<table>
<thead>
<tr>
<th>Level</th>
<th>School Type</th>
<th>How would you describe your school?</th>
<th>District Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>[x ] Elementary (PK - 5 or 6)</td>
<td>(x) Public</td>
<td>( ) Urban</td>
<td>Hoover City</td>
</tr>
<tr>
<td>[ ] K - 8</td>
<td>() Private/Independent</td>
<td>(x) Suburban</td>
<td>(x) Largest 50</td>
</tr>
<tr>
<td>[ ] Middle (6 - 8 or 9)</td>
<td>( ) Charter</td>
<td>( ) Rural</td>
<td>Districts</td>
</tr>
<tr>
<td>[ ] High (9 or 10 - 12)</td>
<td></td>
<td></td>
<td>Total Enrolled:</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>564</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Does your school serve 40% or more students from disadvantaged households?</th>
<th>% receiving FRPL</th>
<th>% limited English proficient</th>
<th>Other measures</th>
</tr>
</thead>
<tbody>
<tr>
<td>( ) Yes (x) No</td>
<td>32%</td>
<td>6.4%</td>
<td>GES serves students from 39 countries</td>
</tr>
</tbody>
</table>

**Application Outline:**

**ED-GRS Pillars and Elements**

<table>
<thead>
<tr>
<th>Cross-Cutting Question: Participation in green school programs</th>
<th>Points</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Pillar I: Reduce environmental impact and costs: 30%</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Element 1A:</strong> Reduced or eliminated greenhouse gas (GHG) emissions</td>
<td>15 points</td>
</tr>
<tr>
<td>Energy</td>
<td></td>
</tr>
<tr>
<td>Buildings</td>
<td></td>
</tr>
<tr>
<td><strong>Element 1B:</strong> Improved water quality, efficiency, and conservation</td>
<td>5 points</td>
</tr>
<tr>
<td>Water</td>
<td></td>
</tr>
<tr>
<td>Grounds</td>
<td></td>
</tr>
<tr>
<td><strong>Element 1C:</strong> Reduced waste production</td>
<td>5 points</td>
</tr>
<tr>
<td>Waste</td>
<td></td>
</tr>
<tr>
<td>Hazardous waste</td>
<td></td>
</tr>
<tr>
<td><strong>Element 1D:</strong> Use of alternative transportation</td>
<td>5 points</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Pillar II: Improve the health and wellness of students and staff: 30%</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Element 2A:</strong> Integrated school environmental health program</td>
</tr>
<tr>
<td>Integrated Pest Management</td>
</tr>
<tr>
<td>Contaminant controls and Ventilation</td>
</tr>
<tr>
<td>Asthma control</td>
</tr>
<tr>
<td>Indoor air quality</td>
</tr>
<tr>
<td>Moisture control</td>
</tr>
<tr>
<td>Chemical management</td>
</tr>
<tr>
<td>Element 2B: Nutrition and fitness</td>
</tr>
<tr>
<td>----------------------------------</td>
</tr>
<tr>
<td>Fitness and outdoor time</td>
</tr>
<tr>
<td>Food and Nutrition</td>
</tr>
</tbody>
</table>

**Pillar III: Provide effective environmental and sustainability education, incorporating STEM, civic skills and green career pathways: 35%**

| Element 3A: Interdisciplinary learning about the key relationships between dynamic environmental, energy and human systems | 20 points |
| Element 3B: Use of the environment and sustainability to develop STEM content, knowledge, and thinking skills | 5 points |
| Element 3C: Development and application of civic knowledge and skills | 10 points |

**Total** 100 points

**Summary Narrative:** Provide an 800 word maximum narrative describing your school’s efforts to reduce environmental impact and costs; improve student and staff health; and provide effective environmental and sustainability education. Focus on unique and innovative practices and partnerships.

Harriette W. Gwin Elementary School (GES), named for a Jefferson County Board of Education member, opened in January 1976. It had sixteen classrooms for grades one through seven. In 1992, an addition doubled the size of the school. We currently have an approximate enrollment of 564 students. Gwin is proud to serve students from 39 different countries. In addition to offering state and district curriculum, we encourage students to explore their interests through clubs and organizations. These clubs, such as Gwin Ovation Choir, Garden Club, and Dance Club, offer hands on experiences for all students and opportunities to explore other cultures. Gwin Elementary places an emphasis on outdoor, project-based, and hands-on learning, as well as physical fitness and nutrition. Gwin Elementary features a comprehensive nutrition education program that spans in-cafeteria education, in-class lessons, and daily classes in wellness and sustainability. All teachers participate in sustainability professional development through the WAY program.

Educators integrate environmental education (EE) into the curriculum throughout all grade levels and in all subject areas. Educators and students have access to the wide variety of environmental fiction and non-fiction books in our library. Our art teacher promotes using art materials made from reused materials on projects. Students engage in the hands-on application of the recycling efforts in each classroom and are responsible for ensuring paper and co-mingled recycling is implemented. Our outdoor gardens are used both as outdoor learning labs and as community service projects. Fifteen rain barrels eliminate the need for irrigation systems for the school’s native species gardens. Gwin has many other water-reduction techniques, such as using low-flow water faucets and fixtures, and native, drought-resistant landscaping that survives on rainwater. Many students have engaged in activities such as working in the gardens, carrying out campus clean-up days, making pet toys from reusable material and restoring habitats on the school grounds. Gwin Elementary actively promotes and practices reducing the amount of paper used: e-mail and web-based communications are the norm with parents and staff, paper is reused, and staff is encouraged to reduce the number of classroom...
photocopies. In addition, we recycle crayons, bottle tops, inkjet and toner cartridges, cell phones, laptops, and batteries.

Gwin Elementary works closely with an Energy Star Specialist to reduce our use of energy. She assists the school with energy audits and helps identify ways to conserve energy. Students conduct their own audits and report findings to classrooms teachers and administration. The staff and students are focused on turning off unnecessary lights and unplugging and/or turning off electronic items. Due to our efforts, we hope to become an EPA Energy Star Building soon. Gwin is the first school in our district to implement the Indoor Air Quality (IAQ) Tools for Schools program and the first in the state to fly the Air Quality (AQ) flags outside our school. With the help of the Alabama Department of Public Health (ADPH), EPA, and Alabama Clean Air Campaign, we are making strides towards healthier IAQ at Gwin Elementary. Students have also partnered with Recycle Across America to launch the new and improved student-lead recycling initiative.

A biodiversity audit conducted by students focused on surveying the school grounds to assess the biodiversity level of flora and fauna found at the school. Other student-lead audits include a transportation audit, water audit, energy audit, and waste management audit. Students have worked diligently to develop an action plan for each audit and to monitor, as well as evaluate, the progress. Community, local, state, and national partners have joined with Gwin Elementary to educate students so that they can make balanced, educated decisions about wildlife and our related natural resources.

1. Is your school participating in a local, state or national school program which asks you to benchmark progress in some fashion in any or all of the Pillars?

(x ) Yes ( ) No Program(s) and level(s) achieved:

National Wildlife Association Eco-Schools – Silver; Energy Star (ES) – working on meeting ES status

2. Has your school, staff or student body received any awards for facilities, health or environment?

(X) Yes ( ) No Award(s) and year(s) Alliance for Healthier Generation Healthy School Program bronze medal; Health Officer’s seal of approval award (Jefferson County Health Dept.) 2010, 2011; USDA-best practices award 2008, 2009; Brenda Butters employee of the year 2012 – cafeteria manager GES; 2012 Teachers Rock Award; PLT teacher of the year 2003; Environmental Education Association of Alabama (EEAA) Best Environmental Educator of the year 2004, 2013; EEAA Best Environmental Education Program (BEEP) 2004, 2007; Eco-Schools Bronze and Silver award 2012; Celebrate Birds Audubon Youth Art Contest 1st and 2nd place winners 2012; Alabama Wildlife Federation (AWF) William R. Ireland Youth Art contest 3rd place 2012
Pillar I: Reduced Environmental Impact and Costs

Energy

1. Can your school demonstrate a reduction in Greenhouse Gas emissions?
   (x ) Yes ( ) No Percentage reduction: 37% Over (m/yy - m/yy): 6/2011 – 6/2012
   Initial GHG emissions rate (MT eCO2/person): 18%
   Final GHG emissions rate (MT eCO2/person): .06
   Offsets: 12% How did you calculate the reduction? Difference in 1 year

2. Has your school received EPA ENERGY STAR certification or does it meet the requirements for ENERGY STAR certification?
   ( ) Yes (x ) No Year(s) and score(s) received: actively working towards certification goal now

3. Has your school reduced its total non-transportation energy use from an initial baseline? (x ) Yes ( ) No
   Current energy usage (kBTU/student/year): 3693
   Current energy usage (kBTU/sq. ft./year): 2.5
   Percentage reduction: 8.4% over (mm/yy - mm/yy): 6/2011-6/2012
   How did you document this reduction? Energy Star Portfolio Manager

4. What percentage of your school's energy is obtained from:
   On-site renewable energy generation: 0 Type N/A
   Purchased renewable energy: 0 Type N/A
   Participation in USDA Fuel for Schools, DOE Wind for Schools or other federal or state school energy program: N/A

5. In what year was your school originally constructed? 1976

   What is the total building area of your school? 98,077 sq ft

6. Has your school constructed or renovated building(s) in the past ten years? ( ) Yes (x ) No
   For new building(s): Percentage building area that meets green building standards: N/A
   Certification and level: N/A Total constructed area: N/A
   For renovated building(s): Percentage of the building area that meets green building standards: N/A
   Certification and level: N/A Total renovated area: N/A
Water and Grounds

7. Can you demonstrate a reduction in your school's total water consumption from an initial baseline?

   Average Baseline water use (gallons per occupant): 98.7

   Current water use (gallons per occupant): 96.7

   Percentage reduction in domestic water use: 2%

   Percentage reduction in irrigation water use: N/A

   Time period measured (mm/yyyy - mm/yyyy): 8/2011-7/2012

   How did you document this reduction (ie. ENERGY STAR Portfolio Manager, utility bills, school district reports)?: Energy Star Portfolio Manager

8. What percentage of your landscaping is considered water-efficient and/or regionally appropriate?: 90%; Types of plants used and location: GES has been working towards all native species landscaping. Currently, plants around building are shrubs and trees that survive on rain water.

9. Describe alternate water sources used for irrigation. (50 words max)

    GES has been engaged in an aggressive strategy to conserve water on campus. Therefore, rainwater harvesting has become a priority. Fifteen rain barrels constructed by students and the community collect rain water which is then used by our students to water their native plant beds.

10. Describe any efforts to reduce stormwater runoff and/or reduce impermeable surfaces. (50 words max)

    The major projects undertaken at GES to reduce storm water runoff include installing native plant gardens and rain barrels. Strategic placement of rocks and trees are also used as part of an ongoing effort to improve GES green infrastructure.

11. Our school's drinking water comes from: (x) Municipal water source ( ) Well on school property ( ) Other: Birmingham Water Works Board

12. Describe how the water source is protected from potential contaminants. (50 words max)

    A watershed protection policy is in place to help protect land areas surrounding water sources. Envirolabs collect water samples regularly to test for contaminants. The water treatment plant is equipped with back flow preventers.

13. Describe the program you have in place to control lead in drinking water. (50 words max)

    We have no copper pipes, and water is tested routinely by Birmingham Water Works Board.
14. What percentage of the school grounds are devoted to ecologically beneficial uses? (50 word max)

76% - Vegetable gardens, wildlife and native plant habitats, rain garden, amphitheater, gazebo, playgrounds, nature trail, bird sanctuary, walking track, raised gardens, greenhouse, and theme gardens provide hands-on learning opportunities, and allow students to utilize multi-disciplinary skills in a fun and exciting environment. “No child is left inside.”

Waste

15. What percentage of solid waste is diverted from landfilling or incinerating due to reduction, recycling and/or composting? Complete all the calculations below to receive points.

A - Monthly garbage service in cubic yards
(garbage dumpster size(s) x number of collections per month x percentage full when emptied or collected): 20,000

B - Monthly recycling volume in cubic yards
(recycling dumpster size(s) x number of collections per month x percentage full when emptied or collected): 9,600

C - Monthly compostable materials volume(s) in cubic yards
(food scrap/food soiled paper dumpster size(s) x number of collections per month x percentage full when emptied or collected): N/A no schoolwide composting program is in place at this time

Recycling Rate = ((B + C) ÷ (A + B + C) x 100): 32.43

Monthly waste generated per person = (A/number of students and staff): 31

16. What percentage of your school's total office/classroom paper content is post-consumer material, fiber from forests certified as responsibly managed and/or chlorine-free? GES uses Strickland Companies for purchasing paper. Strickland paper products are manufactured in an environmentally responsible manner. They are chain-of-custody certified with the Forest Stewardship Council (FSC).

17. List the types and amounts of hazardous waste generated at your school:

<table>
<thead>
<tr>
<th>Flammable liquids</th>
<th>Corrosive liquids</th>
<th>Toxics</th>
<th>Mercury</th>
<th>Other:</th>
</tr>
</thead>
<tbody>
<tr>
<td>none</td>
<td>AF79 Concentrate</td>
<td>AF79 Concentrate</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Betco 256</td>
<td>Betco 256</td>
<td>None</td>
<td>Household batteries</td>
</tr>
</tbody>
</table>

How is this measured? Material Safety Data Sheets and purchase orders

How is hazardous waste disposal tracked? For the last several years, the City of Hoover has hosted a Household Hazardous Waste Day each April. During this event, Hoover schools are allowed to bring items that normally are not accepted in their regular trash for disposal.
Describe other measures taken to reduce solid waste and eliminate hazardous waste. (100 word max)

GES is implementing several aggressive approaches to help reduce solid waste and eliminate hazardous waste. IAQ Tools for Schools, suggestions from recent Integrated Pest Management (IPM) assessment, and strict adherence to state EPA and ADPH best practices and guidelines are successfully being implemented. Green products for custodial use are currently being researched for future use in the Hoover City Schools system.

18. Which green cleaning custodial standard is used? **Hepa filters in all vacuums**

What percentage of all products is certified? **Unknown**

What specific third party certified green cleaning product standard does your school use? **None at this time**

**Alternative Transportation**

19. What percentage of your students walk, bike, bus, or carpool (2+ student in the car) to/from school? (Note if your school does not use school buses) 184 students ride in cars; 375 students ride the bus; no data has been collected to indicate which students carpool

How is this data calculated? (50 word max)

Transportation information is collected through parent registration information and informationNOW school district database. Student surveys of each classroom indicate 16 children walk or bike to school on a regular basis.

20. Has your school implemented?

[ ] designated carpool parking stalls.

[x] a well-publicized no idling policy that applies to all vehicles (including school buses).

[x] Vehicle loading/unloading areas are at least 25 feet from building air intakes, doors, and windows.

[x] Safe Pedestrian Routes to school or Safe Routes to School

Describe activities in your safe routes program: Students conducted walkability and bikeability surveys, tallied results, and shared with administrators. Local School Resource Traffic Safety (SRTS) officer provided prizes for participants in GES Walk To School day. GES will also participate in Bike To School day. A SRTS grant is providing GES and Simmons Middle School with sidewalks students.

(50 word max)

21. Describe how your school transportation use is efficient and has reduced its environmental impact. (50 word max) GES buses follow the idling guidelines set by State Department of Education Pupil Transportation which limits idling to 5 minutes. New buses are also equipped with diesel particulate filters. No vehicles are permitted to load or unload near air intakes.
22. Describe any other efforts toward reducing environmental impact, focusing on innovative or unique practices and partnerships. (100 word max)

GES partners with ADPH, EPA, Clean Air Campaign, Alabama Department of Transportation (ADOT) and GES stakeholders to promote the GES No Idling program. GES was also the first school in Alabama to raise their flags promoting Indoor Air Quality (IAQ) awareness. Students report the IAQ status to the principal each day. It is then reported to the entire school community raising awareness about IAQ. Quarterly newsletters are sent home reminding parents of the no idling policy. Several local and state articles have been published on students’ efforts to raise awareness about IAQ and children’s health.

**Pillar 2: Improve the health and wellness of students and staff**

**Environmental Health**

1. What is the volume of your annual pesticide use (gal/student/year)? Describe efforts to reduce use: GES recently completed their first Integrated Pest Management inspection as part of the Tools for Schools program. Currently, an IPM plan that eliminates pesticides indoors and outdoors is still being designed. No record of the volume of pesticide use could be identified. Pesticides are not used within 8 hours of students being in the building.

2. Which of the following practices does your school employ to minimize exposure to hazardous contaminants? Provide specific examples of actions taken for each checked practice.

[x] Our school prohibits smoking on campus and in public school buses.

Students shall not be allowed to smoke, possess, or use tobacco in any form on the school grounds, in school buildings during, before, or after the school day, at or around any school-sponsored activities, or when riding school buses to and from school or on a school-sponsored trip. Parental permission to smoke or otherwise use tobacco does not exempt a student from this policy. Students caught smoking, using tobacco in any form, or possessing tobacco in any form, will be subject to suspension or other appropriate disciplinary action. (Hoover City Schools Handbook – 2012-2013)

[ x] Our school has identified and properly removed sources of elemental mercury and prohibits its purchase and use in the school. 48 thermometers, 25mL liquid elemental mercury and 250g of zinc-mercury amalgam, were removed from HCS, and turned over to Hoover City Fire Department’s HAZMAT for proper disposal. GES follows code 380.1274b.

[ ] Our school uses fuel burning appliances and has taken steps to protect occupants from carbon monoxide (CO) N/A
Our school does not have any fuel burning combustion appliances.

Our school has tested all frequently occupied rooms at or below ground level for radon gas and has fixed and retested all rooms with levels that tested at or above 4 pCi/L OR our school was built with radon resistant construction features and tested to confirm levels below 4 pCi/L.

GES has recently conducted a radon test as part of the Tools for Schools program. Test results are within limits.

Our school has identified any wood playground or other structures that contain chromate copper arsenate and has taken steps to eliminate exposure.

No chromate copper arsenate was found during the Tools for Schools inspection.

3. Describe how your school controls and manages chemicals routinely used in the school to minimize student and staff exposure. (100 word max)

School policy mandates that all custodial closets and carts must be stored in a safe place or locked at all times. Chemicals are not used while students are in the building. Policies are in place that encourage proper purchasing, labeling, storage, and disposal of chemicals and other products. Custodial staff is trained on the potential dangers posed by chemicals, and keeps Materials Safety Data Sheets on all chemicals in the building.

4. Describe actions your school takes to prevent exposure to asthma triggers in and around the school. (100 word max) GES is aggressively working to prevent exposure to possible asthma triggers. An asthma action plan is in place for all students and faculty with asthma. Listed are the areas of focus: controlling animal allergens, controlling cockroach and pest allergens, controlling moisture, controlling indoor air pollutants, and reducing exposure to dust mites. New Camfil Farr filters have been installed to help control dust. IPM is under construction. Humidity and moisture is monitored by mechanical means and immediately recognized if levels are too high. Parents of children with asthma are provided with asthma education information from the CDC and ADPH.

5. Describe actions your school takes to control moisture from leaks, condensation, and excess humidity and promptly cleanup mold or removes moldy materials when it is found. (100 word max) The first step taken is eliminating sources of moisture by reducing indoor humidity. GES prevents moisture and condensation through the proper use of insulation and inspects the building for signs of mold, moisture, leaks or spills. Signs of moisture and/or mold are reported immediately.

6. Our school has installed local exhaust systems for major airborne contaminant sources. (X)Yes ( )No
7. Describe your school’s practices for inspecting and maintaining the building’s ventilation system and all unit ventilators to ensure they are clean and operating properly. (100 word max)

GES has a preventative maintenance plan that includes schedules for periodic maintenance checks and a work order system to track work orders, maintenance performed, and costs for each piece of equipment. All maintenance staff has proper Operation and Maintenance manuals. Spare parts are kept in stock and are easily accessible, if needed. Maintenance staff is trained in proper care and maintenance of ventilation systems.

8. Describe actions your school takes to ensure that all classrooms and other spaces are adequately ventilated with outside air, consistent with state or local codes, or national ventilation standards. (100 word max)

GES follows the state regulations for outdoor air requirements: 403.2 The minimum outdoor airflow rate shall be determined in accordance with section, and 403.3 Ventilation supply systems shall be designed to deliver the required rate of outdoor airflow to the breathing zone within each occupiable space.

9. Describe other steps your school takes to protect indoor environmental quality such as implementing EPA IAQ Tools for Schools and/or conducting other periodic, comprehensive inspections of the school facility to identify environmental health and safety issues and take corrective action. (200 word max)

GES is implementing the Tools for Schools program designed to help schools create and maintain healthy indoor learning environments by identifying, correcting, and preventing common issues. Poor indoor environmental quality can impact the comfort and health of students and staff, which can affect concentration, attendance, and academic performance. We also participate in the National Wildlife Federation (NWF) Eco-Schools USA holistic program. It strives to make environmental awareness and action an intrinsic part of the school life and culture, impacting students, teachers, administrative staff, non-teaching staff and parents, as well as the local community. Eco-Schools USA works to extend learning beyond the classroom and develop responsible environmental attitudes and commitments, both at home and in the wider community.

Nutrition and Fitness

10. Which practices does your school employ to promote nutrition, physical activity and overall school health? Provide specific examples of actions taken for each checked practice, focusing on innovative or unique practices and partnerships. (100 word max each)

[X ] Our school participates in the USDA’s HeathierUS School Challenge. Level and year:

2008-2009 GES received silver awards – Representatives from GES were invited to the White House to visit with Michelle Obama about their accomplishments and success with HeathierUS School Challenge.

[ ] Our school participates in a Farm to School program to use local, fresh food.
Our school has an on-site food garden.

Our school garden supplies food for our students in the cafeteria, a cooking or garden class or to the community. Sustainable gardens for our English as a Second Language (ESL) community – herbs used by school cafeteria when available.

Our students spent at least 120 minutes per week over the past year in school supervised physical education.

At least 50% of our students' annual physical education takes place outdoors.

Health measures are integrated into assessments.

Physical fitness presidential assessments

At least 50% of our students have participated in the EPA's Sunwise (or equivalent program). Community service projects and broadcast helps educators raise sun safety awareness by addressing the science of the sun, the risk of overexposure to its ultraviolet (UV) radiation, and what students and their families can do to protect themselves from overexposure.

Food purchased by our school is certified as "environmentally preferable"

Percentage: _______ Type: ________________________________

11. Describe the type of outdoor education, exercise and recreation available. (100 word max)

Our students have a wide variety of outdoor time. For many teachers, part of their everyday instruction utilizes our woodland trails, gardens, or outdoor classrooms. In addition to the general PE and recess time, our students enjoy their Environmental Education time outdoors as often as possible. The teachers have integrated our natural campus into the curriculum. Classes are often found outdoors taking nature walks, collecting data for creating field guides, or mapping tree surveys. They may use the data to incorporate leaves, animals, trees, bugs, etc., into their current core subjects. Environmental education often becomes the focus for lessons in math, science, and literature. Our students also make frequent use of our fitness course that promotes good health practices and team building skills.

12. Describe any other efforts to improve nutrition and fitness, highlighting innovative or unique practices and partnerships. (100 word max)

Our students participate in outdoor experiences such as Jingle Bell Run, Mercedes Marathon, and Walk to School Day. We also participate in the HealthierUS School Challenge and World School Milk Day, and are partners in the WAY school program. Children perform plays about healthy eating habits for the school. Students, also, have the opportunity to join many fitness clubs, although these clubs are not limited to students. Yoga and fitness classes are offered to faculty and staff, as well. GES has recently partnered with Southeastern Dairy Industry Association to participate in the Fuel Up To Play program.
Pillar 3: Effective Environmental and Sustainability Education

1. Which practices does your school employ to help ensure effective environmental and sustainability education? Provide specific examples of actions taken for each checked practice, highlighting innovative or unique practices and partnerships.

[ ] Our school has an environmental or sustainability literacy requirement. (200 word max)

[ ] Environmental and sustainability concepts are integrated throughout the curriculum. (200 word max)

The Tools for Schools, Eco – Schools, and AWF Outdoor Classroom curricula are the heart of our teaching and of students’ EE learning. These programs ensure that all students attain an age-appropriate level of environmental literacy. By using the garden and the surrounding preserve and woods, our students are in the classroom even when they are not in a building. Many literature selections from our required reading and writing curriculum have an environmental theme from which teachers plan and teach all subjects. The curriculum for school-wide enrichment provides students with hands-on activities that demonstrate the sustainable features of green buildings, energy efficiency, water conservation, zero waste, and ecological restoration.

[ ] Environmental and sustainability concepts are integrated into assessments. (200 word max)

Assessments take many forms: portfolios, observations, projects, book reports (our students often read environmental trade books rather than the typical basal readers), teacher-generated tests, science and outdoor journals, and the state required Science assessments. Because of its real-world, project-based application, environmental and sustainability education offers excellent opportunities for authentic assessment.

[ ] Students evidence high levels of proficiency in these assessments. (100 word max)

While we do not have testing data supporting environmental and sustainability literacy, we do have state assessment data for reading, science and mathematics. Reading, science, and mathematics are essential building blocks to success in sustainability and environmental education. The successes of our students regarding these subject areas, and the on-going environmental engagement and learning they are experiencing during their six years at GES, ensures they will be prepared for the remainder of their schooling, including achieving environmental and sustainability literacy.

[ ] Professional development in environmental and sustainability education are provided to all teachers. (200 word max)

All (100%) of our teachers are encouraged to take the following courses: Project Wild (all areas), Project Wet (all areas), and Project Learning Tree (all areas). Many of our teachers are certified as facilitators. Two teachers serve on the board of EEAA, and one has been instrumental in the planning and writing of Alabama Alive! A State Environmental Literacy Plan for the state of Alabama. Four teachers were invited to attend the first Audubon Nature Camp sponsored by Birmingham Audubon Society and Whele Wildlife Center. Professional development money is always available for educators to attend trainings of their choice, including
environmental education. In addition, on-going professional support and on-the-job training is provided to staff as needed throughout the school year.

2. For schools serving grades 9-12, provide:

Percentage of last year's eligible graduates who completed the AP Environmental Science course during their high school career: ____________ Percentage scoring a 3 or higher: _________________

3. How does your school use sustainability and the environment as a context for learning science, technology, engineering and mathematics thinking skills and content knowledge? (200 word max)

As part of our curriculum, scientific learning across all grade levels is approached based on scientific practices which emphasize the scientific process. Students engage in inquiry-based learning models where they form hypotheses and actively plan and carry out hands-on investigations while analyzing and interpreting data. Using developmentally appropriate mathematical and computational thinking, students construct their own explanations and defend their positions and findings based on evidence. In addition to the scientific process, 21st learning skills are emphasized as a dynamic value-added set of skills to daily lessons. Critical thinking, communication, collaboration, and creativity are emphasized throughout all subject areas in our curriculum.

4. How does your school use sustainability and the environment as a context for learning green technologies and career pathways? (200 word max)

Field trips act as a spring board for learning about green career pathways. Additionally, community partners and programs such as the Recycle Stars and Tools for Schools provide experiences for learning about career pathways and green technologies.

5. Describe students’ civic/community engagement projects integrating environment and sustainability topics. (200 word max)

Light Bulb Projects are presented by our enrichment students and impart to the school community what the students have learned about sustainable living. Our outdoor Bird-Fest and science camp community event features exhibits, tours, presentations, and student-lead service learning projects that demonstrate the sustainable features of green living, water conservation, zero waste, wildlife habitat restoration, ecological restoration, and the 4 Rs (Reduce, Reuse, Recycle, and Recover).

6. Describe students’ meaningful outdoor learning experiences at every grade level. (200 word max)

Primary grades can learn to count and sort natural objects such as seeds, nuts, and cones. They can match colors and go on nature alphabet hikes. In addition to writing in language arts, upper elementary students use the outdoors for building observation skills, mapping the schoolyard, and planning and planting a schoolyard habitat. GES is concerned about our students and the on-going trend of nature deficit disorder. Reconnecting with nature in a suburban landscape can be a challenge, but is a priority to our staff and administration. We have many different gardens that students use as places to explore natural habitats, such as the native bird sanctuary. This is just one example of an outdoor project, but many others have been utilized. In addition, off-site learning experiences to venues such as Southern Environmental Center, Baker’s Farm, Camp McDowell, Birmingham
Zoo, Chattanooga Aquarium, and McWane Center occur annually at different grade levels. These off-site experiences include pre- and post-lessons, activities, and projects that set the context and deepen the nature based learning, while also extending the learning into the classroom to ensure the students can apply what they experienced and learned.

7. Describe how outdoor learning is used to teach an array of subjects in contexts, engage the broader community, and develop civic skills. (200 word max)

Teachers and administrators are working with local, state, and national organizations to adapt environmental education lessons to fit our schools and systems standards. While students are not mandated to conduct service learning projects at every grade level, we do provide many opportunities for students at all age levels to engage in civic and community engagement projects. Often these projects are selected by student groups and classrooms, and vary from collecting and donating gently worn coats to charity (reusing products); to raising money for healthy meals for families in need; to promoting, collecting, and donating gently used books to schools in need of library books. The enrichment students selected and interviewed students in different grade levels asking them to identify their top environmental concerns at the school. The environmental concerns were explored with peers across different grade levels, and they collaboratively identified creative solutions to the problems. The solutions and tips were shared with the administration and the entire school through morning announcements and family electronic newsletters. GES also participates in the Magic City Harvest program that donates extra food to local food banks.

8. Describe your partnerships to help your school and other schools achieve in the 3 Pillars. Include both the scope and impact of these partnerships. (Maximum 200 words)

We have a very good working relationship with Mr. Charles Brookins and Mrs. Melissa Dean of ADPH. They are huge supporters of the environmental planning within our school. The Environmental Education Association of Alabama, Birmingham Audubon Society, Hoover City Schools Foundations, and Home Depot have supplied funding to our school in order to advance our EE projects. GES has also partnered with Energy Star, AWF and NWF to create meaningful outdoor experiences for students and valuable professional development for teachers. We are partners with the Eco-Team at Hoover High, and work with the University of Alabama Multiple Abilities Program (MAP) students training them in the WILD curricula. In return they help conduct an EE camp for the students at GES.

9. Describe any other ways that your school integrates core environment, sustainability, STEM, green technology and civics into curricula to provide effective environmental and sustainability education, highlighting innovative or unique practices and partnerships. (Maximum 200 words)

The buildings and grounds of Gwin offer hands-on opportunities to advance STEM learning by: (a) engaging younger children’s fascination with wildlife as a way to capture and secure an enduring interest in science, and (b) using the energy, water, and carbon footprint aspects of buildings and school grounds as educational tools.

10. Submit up to five photos that illustrate your green practices.

Photos are added to the next five pages.
Students gardening ...

exploring nature trail and

journaling.
Students work with Mr. Larry to design and create a rain garden to stop a serious erosion problem close to the playground. Community members helped to build and install rain barrels to irrigate the native plants used in the rain garden.
Students design and make better bird bags for researchers at Wehle Wildlife Preserve.
Students fly the Air Quality Flags for school and community. Each flag represents a different level of air quality.

Student audits led to schoolwide energy conservation, IPM planning and radon testing. A healthy cafeteria is always a priority at Gwin Elementary too.

Students help to reduce the amount of air pollutants by walking or riding bikes to school.
“Band of Brothers” students participate in the Smithsonian Global Tree Banding Project.

Students call Smithsonian researchers for back up when there trees are “bandalized.”

SOLUTION! Students attach a brief explanation of their project and no more “bandalism” has occurred.