



## Green Site Program Application

Your site's designation as a Groundwater Guardian Green Site is based on the information provided in this application, so please be as accurate and thorough as possible. If you have any questions about any part of the application, please contact The Groundwater Foundation at 1-800-858-4844 or [guardian@groundwater.org](mailto:guardian@groundwater.org).

Completed applications may be submitted to The Groundwater Foundation by mail (P.O. Box 22558, Lincoln, NE 68542-2558), fax (402-434-2742), or email ([guardian@groundwater.org](mailto:guardian@groundwater.org)) any time before December 31 for designation. To maintain Groundwater Guardian Green Site designation, applications must be reviewed for accuracy on an annual basis to provide updates and document any changes in operations, if any have occurred. *All information submitted to The Groundwater Foundation in this application is confidential, and will not be shared without the permission of the site manager.*

Thank you for all you do to safeguard groundwater and other water resources!

### A. CONTACT INFORMATION

**Site Name:** Anytown College

**Site Owner, Leaseholder, or Affiliation:** Anytown College Board of Trustees

**Site Manager Name:** Bill Taylor

**Application Contact Name** (*if different from manager*): Bill Taylor

**Application Contact Job Title or Description** (*please indicate any professional certifications, i.e. Certified Golf Course Superintendent, etc.*): Grounds and Facilities Manager

**Site Address:** 550 1<sup>st</sup> Street

**Community/County:** Anytown/River County

**State:** NE

**Zip Code:** 68000

**E-mail:** [btaylor@anytown.edu](mailto:btaylor@anytown.edu)

**Phone:** 402-555-0246

**Fax:** 402-555-1357

**Website** (*if applicable*): [www.anytown.edu](http://www.anytown.edu)

**Is your site located in a Groundwater Guardian Community?** Yes  No  Don't know

(If you "don't know," visit [www.groundwater.org](http://www.groundwater.org) and jump to the Groundwater Guardian page for a complete *Directory of Current Groundwater Guardians*.)

**Groundwater Guardian Community Name:**

**Local Media Outlets** (*please provide names and addresses*): Anytown Gazette, P.O. Box 156, Anytown, NE 68000

Please indicate whether or not you'd like us to send a news release announcing your designation: Yes  No

**Peak Seasonal Staff Level:** 10

**Brief Description of Staff Responsibilities regarding Site Landscape and Land Management** (100 words or less): Staff care for all grounds, athletic fields, and landscapes, including mowing, trimming, fertilizing, replacing plants, etc.

## **B. SITE INFORMATION**

*Please attach a site map or schematic to this application.*

**Number of Acres:** 175

**Latitude/Longitude** (if known):

**Location Description** (e.g., five miles south of Interstate 80 on Highway 10, on the edge of the city, etc.): Located three blocks north of Highway 1 in Anytown

**Primary Purpose of Site:** Educational campus

**Secondary Purpose of Site** (if applicable):

**Date of Initial Development:** 1900

**Months in Operation per Year** (please note if this amount is equivalent to your local growing season): 12 (growing season is approximately April - October)

**Does your site drain directly to certain water bodies? If yes, please describe** (e.g. in feet, yards, miles or watershed): yes, Anytown College's campus includes two roughly one-acre ponds

**Is your site located near a drinking water source? If so, please describe** (e.g. lake, well, river, etc.): no

**Number and Type of Wells On-site** (e.g., active, non-active or back-up, and abandoned wells): 1 irrigation well, 1 abandoned well

**Brief narrative description of site including unique geological and historic land use conditions that could potentially impact land treatment and water quality** (200 words or less): Anytown College is built on a flat parcel of land that was used as grazing ground prior to 1900

**Local ordinances, if known, that reflect best practices** (i.e. anti-siphon, wellhead protection, etc.): The City of Anytown has a backflow prevention ordinance

## C. INTERNAL EDUCATION EFFORTS

Check as many as apply. Describe how you have educated yourself, staff members, field personnel, and/or other colleagues about the topics reflected in Section E (i.e. fertilizer and pesticide use, water use, potential contaminant source management, water quality protection) and how site management impacts water quality and supply. Please provide details for each item selected. Also include information about other educational resources and environmental stewardship programs with which your site is involved.

- Trade magazines:**
- Local peer group meetings:** Turfgrass Association
- Local extension agents:** Local seminars
- Groundwater basics brochure:**
- Groundwater Foundation, USGS, or other partner websites:**
- Attended groundwater education event:**
- On-line courses:** webinars
- Conferences:** Turfgrass Association
- Other:** Continuing education for certified applicator
- Other:**
- Other:**
- Other:**

## D. EXTERNAL EDUCATION EFFORTS

Check as many as apply. Describe any education efforts about the topics reflected in Section E (i.e. fertilizer and pesticide use, water use, potential contaminant source management, water quality protection) and the site's protection practices (including participation in this program) that have been directed to partners, customers, and/or constituents. Please provide details for each item selected. Also include information about other educational resources and environmental stewardship programs with which your site is involved.

- Worked with students conducting research on:** water and land use
- Hosted educational tours of the site:**
- Hosted peer group meeting(s):** Hosted regional groundskeepers meeting
- Installed signage identifying low water use plants:**
- Printed groundwater protection tips on items given to site visitors:**
- Hosted educational events for youth:** Groundwater festival for local 5<sup>th</sup> grade students
- Hosted educational events for adults:**
- Other:**
- Other:**
- Other:**
- Other:**

## E. GROUNDWATER-FRIENDLY PRACTICES SURVEY AND RELATED MEASURES OF ENVIRONMENTAL IMPACT

*Note: Points are awarded for the answers to questions 1-32. Environmental impact sections are required, but no points are awarded. Exact calculations are preferred, but not necessary; your best estimates of environmental impact are sufficient. Choose only one response unless otherwise indicated.*

### 1. How often is soil tested to determine nutrient requirements?

- Annually (10 points)
- Every other year (5 points)
- Every three years (3 points)
- Not currently testing (0 points)
- Not applicable – soil is not tested because no fertilizer is applied on-site
- Using alternative practice to determine nutrient requirement (10 points), please describe to earn points:

### 2. Is fertilizer applied based on nutrient analysis?

- Yes (10 points)
- At least 75% of the time (5 points)
- No (0 points)
- Not applicable – no fertilizer is applied on-site

#### ENVIRONMENTAL IMPACT FOR ITEMS 1-2

**Estimated amount of fertilizer applied versus the amount recommended by the soil test:** 100% - follow the amount recommended by the soil test

### 3. Are label or agronomist recommended application rates followed during pesticide applications?

- Yes, always (10 points)
- Yes, at least 75% of the time (5 points)
- Less than 75% of the time (0 points)
- Not applicable – no pesticide is applied on-site

#### ENVIRONMENTAL IMPACT

**Estimated amount of pesticide applied versus the amount recommended by the label rate or an agronomist:** 100% - always follow label rate

**4. Does the site have a written integrated pest management (IPM) plan for determining pesticide applications?**

- Yes, and follow plan >75% of time (10 points)
- Yes, and follow plan <75% of time (7 points)
- No written plan, but follow IPM practices (5 points)
- No written plan and do not follow IPM practices (0 points)
- Not applicable – no pesticide is applied on-site

**ENVIRONMENTAL IMPACT**

**Estimated percentage of pesticide reduced by choosing alternate control methods:**  
Roughly 20%. Pesticide usage is kept to a minimum.

**5. When adding or replacing plants (e.g., turf grass, shrubs, trees, etc.) at your site, do you choose species that have a lower input requirement than the current plants?**

- Yes, 90-100% of the time (10 points)
- Sometimes, 50-89% of the time (5 points)
- At times, 20-49% of the time (3 points)
- No, or less than 20% of the time (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Estimated amount of fertilizer saved annually by using lower input plants (*pounds*):**  
100 pounds

**Estimated amount of pesticide saved annually by using lower input plants (*gallons*):**  
3 gallons

**6. Do you select new plants adapted to the climate of your region?**

- Yes, 90-100% of total plant materials (10 points)
- Some, 30-90% of total plant materials (5 points)
- Less than 30% of total plant materials (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Estimated gallons of water saved annually by using low water/maintenance plant materials:** Roughly 1,000. We also utilize rain barrels on many of the campus buildings to water landscape plants.

**7. Do you track irrigation water usage and modify practices to reduce water use?**

- Yes, we track use and modify practices when necessary (10 points)
- Track use only (5 points)
- Modify practices but do not track use (5 points)
- No (0 points)
- Not Applicable – turf is not irrigated

**ENVIRONMENTAL IMPACT**

**Estimated gallons of water saved annually from tracking/conservation practices**  
(subtract current use from pre-tracking/conservation use): 10,000

**8. Are your fertilizers and pesticides stored on an impervious surface in a secured facility capable of containing spillage?**

- Yes, always (10 points)
- Yes, in a secure facility not capable of containing spillage (5 points)
- Yes, in a non-secure facility that is capable of containing spillage (5 points)
- No (0 points)
- Not applicable – no fertilizer or pesticide is stored on-site

**ENVIRONMENTAL IMPACT**

**Monthly average during operation of fertilizer in storage on-site (pounds):** 4000

**Monthly average during operation of pesticide in storage on-site (gallons):** 5

**Average percent of fertilizer and pesticide stored on an impervious surface in a secured facility capable of containing spillage:** 100%

**9. Are your fertilizers and pesticides mixed and loaded on an impervious surface capable of containing spillage?**

- Yes, always (10 points)
- Yes, at least 75% of the time (5 points)
- No (0 points)
- Not applicable – no fertilizer or pesticide is mixed or loaded on-site

**ENVIRONMENTAL IMPACT**

**Monthly average during operation of fertilizer mixed and loaded on-site (pounds):** 1000

**Monthly average during operation of pesticide mixed and loaded on-site (gallons):** 1-2

**Average percent of fertilizer and pesticide mixed and loaded on an impervious surface capable of containing spillage:** 100%

**10. Do you have a written spill containment plan? Is it communicated to staff members?**

- Yes, written and communicated (10 points)
- Yes, written but not communicated (5 points)
- Yes, verbally communicated but not written (5 points)
- No (0 points)

**ENVIRONMENTAL IMPACT**

**Number of spills contained in the last two years:** 0

**Estimated amount of fertilizer contained (pounds):** 0

**Estimated amount of pesticide contained (gallons):** 0

**11. Is application equipment (i.e., sprayers and spreaders) visually inspected by a licensed applicator before each use?**

- Yes, always (10 points)
- Yes, at least 50% of the time (5 points)
- No (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Average monthly number of times application equipment is used during the growing season:** 2-3 times April - October

**12. Is application equipment calibrated at least quarterly during the growing season?**

- Yes (10 points)
- No (0 points)
- Not applicable – no fertilizer or pesticide is applied on-site

**ENVIRONMENTAL IMPACT**

**Average number of applications between calibrations:** 1

**Average percentage adjustment found during calibration:** 2-3%

**13. List the setback or no-application zone distances for applying fertilizer near surface water and wetlands, as set forth in your local and/or state regulations (if there are any), and the pesticides and setback distances, as required by the labels of the pesticides you are using:**

- All distance(s) listed (10 points)
- Do not know (0 points)
- Not applicable – no surface water or wetlands nearby

**14. Do you maintain a setback or no-application zone around surface water and wetlands?**

- Yes (10 points)
- No (0 points)
- Not applicable – no surface water bodies nearby

**15. If you answered “yes” to item 14, is your setback or no-application zone on average:**

- Greater than 50 feet from water and wetlands (10 points)
- 30-49 feet from water and wetlands (7 points)
- 10-29 feet from water and wetlands (5 points)

**ENVIRONMENTAL IMPACT FOR ITEMS 13-15**

**Estimated surface area of the water or wetlands protected from fertilizer or pesticide applications: 2 acres**

**16. List the setback or no-application zone distances for applying fertilizer around active wells, as set forth in your local and/or state regulations (if there are any), and the pesticides and setback distances, as required by the labels of the pesticides you are using:**

- All distance(s) listed (10 points)
- Do not know (0 points)
- Not applicable – no active wells on site

**17. Do you maintain a setback or no-application zone around active wells?**

- Yes (10 points)
- No (0 points)
- Not applicable – no active wells on site

**18. If you answered “yes” to item 17, is your setback or no-application zone on average:**

- Greater than 50 feet from active wells (10 points)
- 30-49 feet from active wells (7 points)
- 10-29 feet from active wells (5 points)

**ENVIRONMENTAL IMPACT FOR ITEMS 16-18**

**Number of wells protected from fertilizer or pesticide applications: 1 active irrigation well**



**19. Do you alter or cease granular fertilizer and pesticide applications when wind speed is great enough to alter distribution?**

- Yes (10 points)
- No (0 points)
- Not applicable – no fertilizer or pesticide is applied on-site

**ENVIRONMENTAL IMPACT**

**Number of days when wind speed altered granular applications during the most recent growing season: 5-7**

**20. Do you alter or cease spray fertilizer and pesticide applications when wind speed is great enough to alter distribution?**

- Yes (10 points)
- No (0 points)
- Not applicable – no fertilizer or pesticide is applied on-site

**ENVIRONMENTAL IMPACT**

**Number of days when wind speed altered spray applications during the most recent growing season: 5-7**

**21. If you have non-active wells on your site, are they properly protected or sealed?**

- Yes (10 points)
- No (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Estimated number of wells protected as a result of proper maintenance: 1**

**22. How do you dispose of water from equipment washing?**

- Contained and treated by a sanitary sewer system (10 points)
- Contained and treated on-site (10 points)
- No containment, but water does not drain to surface water (2 points)
- Solids contained, but water drains to surface water (2 points)
- No containment, water drains to surface water (including storm sewer) (0 points)
- Not applicable – no equipment is washed on-site

**ENVIRONMENTAL IMPACT**

**Estimated daily average amount of water used for equipment washing (*gallons*): 10-15**

**23. How do you dispose of tank rinsate?**

- Contained and disposed of off-site by a certified professional (10 points)
- Applied over an area of similar land use (7 points)
- Disposed into a porous area with dissimilar land use (2 points)
- Dumped onto an impervious area that drains to surface water (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Estimated average monthly volume of tank rinsate (gallons):** 7-10

**24. Do you triple rinse or power wash used 2.5 gallon or greater plastic pesticide containers according to the label directions before placing them in the trash or offering them for recycling?**

- Yes (10 points)
- No (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Estimated average monthly number of 2.5 gallon or greater plastic pesticide containers discarded:** 1-2

**25. If you have a private drinking water well on your site, do you:**

- Test your private drinking water well at least annually (10 points)
- Do not test private well water (0 points)
- Not Applicable

**ENVIRONMENTAL IMPACT**

**Estimated number of individuals benefiting from testing:**

**26. If your site generates wastewater that is treated on-site, do you:**

- Arrange for a certified professional to regularly inspect, pump or otherwise service your on-site wastewater treatment system(s) (i.e., septic system, sewage lagoon, pit toilet) (10 points)
- Arrange for your on-site wastewater treatment system(s) to be regularly inspected, pumped or otherwise serviced, but not by a certified professional (5 points)
- Do not regularly inspect, pump or otherwise service on-site wastewater treatment system(s) (0 points)

- Not Applicable – wastewater generated on-site is treated by a centralized sewer system inspected and serviced by another party
- Not Applicable – no wastewater is generated on-site (please explain)

**ENVIRONMENTAL IMPACT**

**Gallons of waste or wastewater properly treated by your on-site wastewater treatment system(s), also the amount of waste or wastewater kept from negatively impacting area water resources:** unknown

**27. Do you have on-site fuel storage?**

- Yes, above ground with secondary containment (10 points)
- Yes, above ground without secondary containment (5 points)
- Yes, below ground with regular monitoring for leaks (3 points)
- Yes, below ground without regular monitoring for leaks (0 points)
- Not Applicable - no on-site fuel storage

**ENVIRONMENTAL IMPACT**

**Estimated annual on-site fuel use (gallons):** 750 gallons

**Estimated annual on-site fuel storage (gallons):** 500 gallons

**Cumulative size of storage tanks (gallons):** 500 gallons

**28. Are toxic substances, such as batteries, tires, used motor oil and other potentially hazardous waste, disposed of or recycled through recommended channels?**

- Yes (10 points)
- Some, but not all (5 points)
- Not handled on-site (5 points)
- No (0 points)

**ENVIRONMENTAL IMPACT**

**Estimated annual amount of toxic substances disposed of appropriately:** 200 pounds of batteries, 25 gallons used oil for recycling

**29. Are your parking areas designed and managed to minimize run-off and contaminant loading into adjacent or nearby surface water by featuring the following (check all that apply):**

- Porous surfaces (5 points)
- Turf or other green zones between parking areas and adjacent surface water (5 points)
- Engineering the slope so run-off does not drain directly into water areas (5 points)
- Other, please describe (possible 5 points)
- Site contains standard impervious surface lot with no water treatment features (0 points)

**ENVIRONMENTAL IMPACT**

**Surface area of parking lot(s) (acres):** 20

**Percent of each lot that is impervious:** 50% impervious, 50% pervious

**Annual precipitation (inches):** 25

**Width of turf or other green zones between parking areas and adjacent surface water:**  
50+ feet

**What is planted or utilized in the green zone to minimize run-off and contaminant loading:** grass

**30. Do you have a written water management plan to protect groundwater and surface water quality on your site?**

- Yes (10 points)
- No (0 points)

**31. If you do have a plan (i.e., answered “yes” to item 30), does it include the following (check all that apply):**

- Emergency response plan for fuel or other hazardous waste spills (2 points)
- Potential sources of pollution at your site (2 points)
- Ponds, streams, lakes, wetlands etc. that could be impacted by practices at your site (2 points)
- Avenues for storm water runoff or leaching (2 points)
- Pollution prevention practices (2 points)
- A communication strategy for informing local source water managers or users (2 points)

**ENVIRONMENTAL IMPACT**

**Description of changes in water quality (if any) you have documented since implementing plans:** none noted

**32. Describe one or more changes you have made to improve your environmental practices in the past five years.** Examples include using technology to lower fertilizer use, deep soil or leaf sampling to determine nutrient needs, increasing habitat for wildlife, recycling aluminum cans, etc. (2 points awarded for each change described, up to 10 possible total):

1. Campus-wide recycling program
2. Conversion of highly-managed areas to now-mow native grasses
3. Began utilizing recycled landscape materials (i.e. mulch)
4. Installation of rain garden on campus
5. Installation of rain barrels on most of the campus buildings

**Describe one or more changes you *plan* to add in the next one to three years.** (1 point for each change, up to 5 possible points)

1. Finish upgrade of irrigation system to better track water use
2. Learn setback distance for fertilizer/pesticides around surface water
3. Learn setback distance for fertilizer/pesticides around active wells
4. Install signage indicating drought tolerant plants
- 5.

#### **BONUS POINTS**

**Do you have baseline data that can be used to evaluate the environmental benefit of participating in the GGS program?**

- Yes, add 2 points for each of the following:
- Water Quality
  - Pesticide Use
  - Fertilizer Use
  - Waste Practices
  - Water Use
- No (0 pts)

## F. BRAG TO US - OTHER GROUNDWATER-FRIENDLY PRACTICES

Please describe other groundwater-friendly practices or source water protection activities being implemented at the site that have a positive impact on water quality and supply, but are not covered elsewhere in the application. Examples may include support from a local Groundwater Guardian team or neighborhood improvement group, using effluent water for site irrigation, etc. If the application has adequately covered the site's groundwater-friendly practices, please mark as sufficiently covered.

- Application Sufficiently Covered All Our Groundwater-Friendly Practices.**
- Application Did Not Cover All Our Groundwater-Friendly Practices; Others Are:**
  - Use of rain barrels to water landscaping around buildings
  - Rain garden to treat stormwater runoff

## G. SHARE YOUR TALENTS AND BROADEN YOUR SUCCESS - GROUNDWATER-FRIENDLY PRACTICES IN YOUR COMMUNITY

By applying for Groundwater Guardian Green Site designation, you have already demonstrated your interest in maintaining education efforts and groundwater-friendly practices over time. Are you ready to share your talents and broaden your success by working to further groundwater-friendly activities in your community?

- Yes – I'd like to connect the site's effort to an existing Groundwater Guardian team in the area** (for the most current list of Groundwater Guardians, visit [www.groundwater.org](http://www.groundwater.org) and jump to the Groundwater Guardian page).
- Yes – I'd like to explore the possibility of forming a Groundwater Guardian Community team and pursuing Groundwater Guardian Community designation.**
- Yes – I'd like to share my talents and broaden my success by (please describe):**

## H. SIGN AND DATE

If submitting this application as a hard copy, please sign and date below.

If submitting this application electronically, please check the box below in lieu of a signature OR sign and date this page and fax it to 402-434-2742.

**By signing this application, I certify that, to the best of my knowledge, the information contained in this application is current and accurate.**

Signed: \_\_\_\_\_ Applicant/Nominator/Preparer  
\_\_\_\_\_ Site Manager/Owner  
Date: \_\_\_\_\_

**By checking this box, I certify that, to the best of my knowledge, the information contained in this application is current and accurate.**

Typed name: Bill Taylor  
Title: Grounds and Facilities Manager  
Date: 6/1/2010

**How did you hear about the Groundwater Guardian Green Site program?** Online research

## Acknowledgements

The Groundwater Foundation gratefully acknowledges the contributions and assistance provided by the following:

### Groundwater Guardian Green Site Program Committee

- Michelle Bucklin, Cargill Corn Milling
- Mark Johnson, Golf Course Superintendents Association of America
- Mike Kromrey, Watershed Committee of the Ozarks
- Robert Kuzelka, University of Nebraska-Lincoln School of Natural Resources
- Mark Langner, FarmLinks LLC
- Jon Martens, Atlantic Municipal Utilities
- Steve Merkel, Landscapes Unlimited LLC
- Sandra Sattler-Weber, University of Nebraska-Lincoln Department of Agricultural Leadership, Education and Communication

### Groundwater Guardian Green Site Technical Advisory Committee

- Thomas Franti, University of Nebraska-Lincoln Department of Biological Systems Engineering
- Lynn Johnson, City of Lincoln Parks and Recreation
- Allen Krizek, Michigan State University Extension
- Mark Langner, Farmlinks Research Center
- Steve Merkel, Landscapes Unlimited
- Craig Romary, Nebraska Department of Agriculture
- Jason Vogel, United States Geological Survey Nebraska Water Science Center
- Rick Yoder, Pollution Prevention Regional Information Center

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### **COMPLETELY CONFIDENTIAL - For Office Use Only**

#### **Application Processing**

Date Received:

Date Scored:

Date Site Notified of Score:

#### **Application Scoring**

Base Points Earned:

Bonus Points Earned:

Base Points Possible:

Percentage Score (Base Points Earned + Bonus Points Earned/Base Points Possible):

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