

# Community Engagement Through Storm Water Management

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False Indigo  
*Baptisia australis*



Hay-scented Fern  
*Dennstaedtia punctilobula*



Coneflower  
*Echinacea purpurea*



Joe Pye Weed  
*Eupatorium dubium*



Dense Blazing Star  
*Liatris spicata*



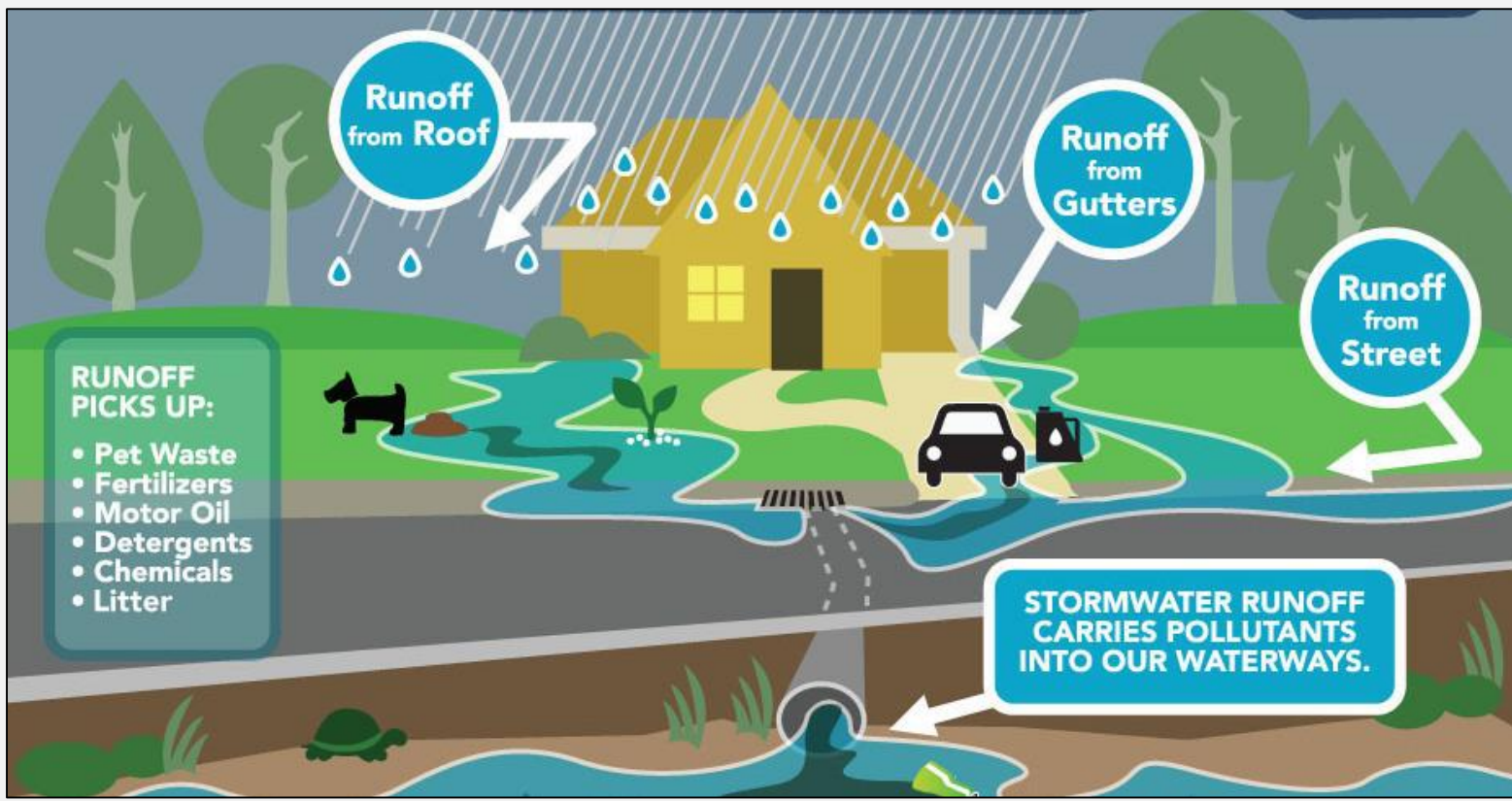
Cinnamon Fern  
*Osmunda cinnamomea*



Switch Grass  
*Panicum virgatum*

## Why manage storm water?

Storm water run off can come in contact with oils and pesticides on road surfaces, pollute waterways.



## Rain gardens

- Used to manage storm water and beautify communities
- Gradual slope and intentional placement attracts water away from gutters, which are frequently overloaded during storms
- Prevents storm water from polluting lakes and streams



## Our goal

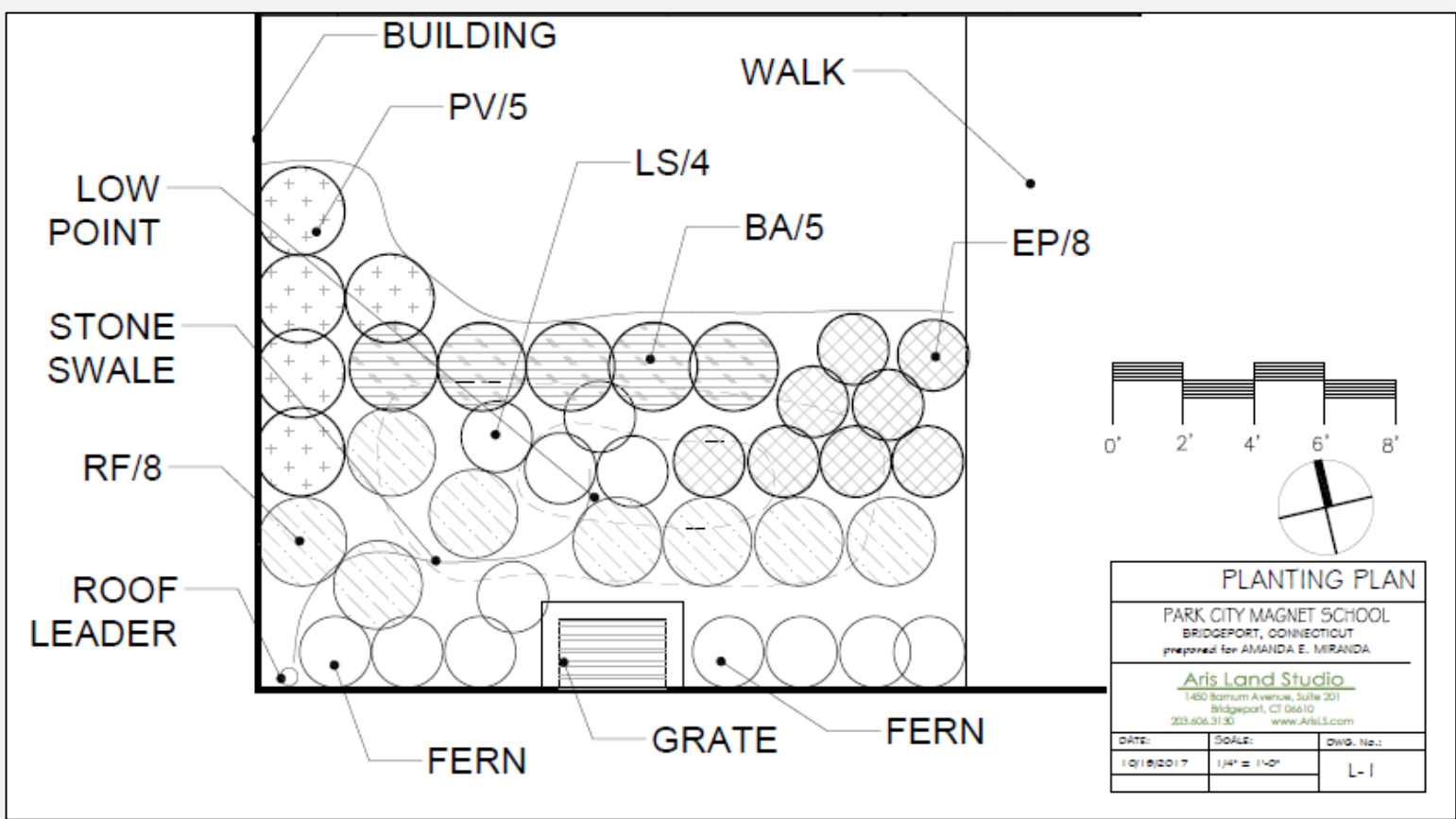
The purpose of this project was to teach a group of students about rain gardens and the benefits they provide the environment. By engaging students in a team project, we wanted to see if creating a garden together would have an effect on the school community environment as well.

## Planning the rain garden

- Several meetings were held with Aris to plan out the garden. We then met with the Lighthouse Club staff since they have afterschool programs where we could have the children help plant the garden.
- Plants were ordered, picked up from Planter's Choice Nursery, and transported to Park City Magnet School



Picking up the plants for the garden at Planter's Choice Nursery



Garden Planned Layout

## Garden installation

- On November 7, 2017, we began the installation by orienting students to the rain garden plans, purpose of the garden, safety, and tools
- A bowl-shaped hole was dug, 1 ft deep
- Following the garden plans, students carefully planted and arranged plants
- Plants used: False Indigo, Hay-Scented Fern, Coneflower, Joe Pye Weed, Densing Blazing Star, Cinnamon Fern, Switch Grass (above; photos from AmericanMeadows.com)
- Students Picked rocks to make a pathway from the gutter to the garden (important for encouraging water to flow into garden)
- Refilled garden with mulch, soil, and cleaned around it



A group of students help by organizing and spacing out plants.



Reading the garden map before starting the planting.

## Outcome

- The garden planting helped the group improve teamwork, confidence, and outgoing skills
- Students now have an awareness of the importance of storm water management
- An unused area of the back of the school is now functional to help with storm water runoff



## Conclusions

Installing the rain garden at Park City Magnet taught a group of 6<sup>th</sup> graders the importance of giving back to the environment and preventing pollution in their community. Inspiring students through hands on education remains an effective tool. The knowledge given could be used at their homes and other places in the community to make Bridgeport a better place.

The rain garden will also prevent future storm water runoff from occurring in that area of Park City Magnet. Every little rain garden can help the overall wellness of our lakes and oceans, and creating a rain garden is just the first step.

## Acknowledgements

Creating this rain garden was a great experience and I enjoyed it very much. It was great to try something new and take on a big task with so much help and support. Thanks to Aris Stalis for helping me so much with the garden and even buying all of the plants for the project. I'd also like to thank Abby Beissinger for helping me plan out my project and complete my project. I'd like to thank Mrs. Petrafera, my mom, aunt, grandpa, nana, and the group of students from 6<sup>th</sup> grade who helped create the garden. A special thank you to United Illuminating and EnergizeCT for their generous scholarship to participate in CAP and support storm water management in CT.