Niagara River Greenway Commission  
Consultation and Review Form

Type of Review Required:  
___X___Mandatory Consultation  
_____Voluntary Review and/or Endorsement

PROJECT SPONSOR INFORMATION

Name:  Buffalo Museum of Science ____________________________________________
Mailing Address:  1020 Humboldt Parkway ______________________________________
State:  New York ___________________  Zip Code:  14211-1208 ______________________
Federal Id#  16-6000178 ____________ Charities Registration #  03-51-04 _________________

PROJECT TYPE

Check all that apply:  
___X___Environmental  _____Cultural/Heritage  ___X___Land or Water Public Access

_____Cultural  _____Trail  ___X___Educational/Interpretive

___X___Waterfront or Land Based Development  ___X___Signage

___X___Recreational  _____Other

Project Name:  Green Infrastructure & Native Landscape at Tifft Nature Preserve
Location:  Tifft Nature Preserve ________________________________________________
Site Address:  1200 Fuhrmann Boulevard _________________________________________
State:  New York ___________________  Zip Code:  14203 ___________________________
Minor Civil Division(s):  City of Buffalo _________________________________________
County:  Erie _________________________________________________________________
Project Proponent Property Interest (own, lease, easement or other):  Lease from the City of
Buffalo with management authority and responsibility ________________________________
AUTHORIZED OFFICIAL

Name: Mark Mortenson
Title: President & CEO

Business Address: 1020 Humboldt Parkway

State: New York Zip Code: 14211-1208

Telephone Number: 716-896-5200 ext. 332 Cell Number: 

Fax Number: 716-897-6723

E-Mail Address: mmortenson@sciencebuff.org

PROJECT POINT OF CONTACT

Name: David Spiering
Title: Ecologist

Organization/Firm: Buffalo Museum of Science – Tifft Nature Preserve

Business Address: 1200 Fuhrmann Boulevard

State: New York Zip Code: 14203

Telephone Number: 716-896-5200 ext. 202 Cell Number: 

Fax Number: 716-897-6723

E-Mail Address: dspiering@sciencebuff.org
PROJECT NARRATIVE

1. In a brief paragraph, describe the project and its purpose, how and when it will be accomplished, and why it is important.

Brief Narrative

The Buffalo Museum of Science is working on a project to design and install green infrastructure features, improve access to the Tifft Nature Preserve visitor center and trails, control invasive species and plant native landscaping, and expand interpretation of sustainable features of the facility. When fully implemented the project will improve access for the tens of thousands of visitors to the preserve each year, manage stormwater onsite in an environmentally responsible manner, and expand native habitat. The project includes four main components.

1. Green infrastructure practices to manage stormwater around the Tifft Nature Preserve visitor center that will include wet and dry swales, bioretention, rain gardens, disconnecting rooftop drains into rain barrels, tree plantings and preservation of nature undisturbed areas.

2. Improved access and safety for school children, families, visitors with special needs, and the general public by installing an enhanced bus drop off area and providing smooth and level surfaces within the access drive, parking lot, and walkways to the visitor center. All improvements for access are incorporated into the green infrastructure design for the site.

3. Following the control of invasive species in the project area, native plants will be used in vegetated green infrastructure practices and for landscaping within the project area. Native vegetation that enhances habitat for birds, butterflies, pollinators and other wildlife were selected for use in this project.

4. Through a demonstration project of permeable pavement and interpretive signage on bioretention, rain gardens, downspout disconnection, rain barrels and native landscaping, visitors will learn about the many possibilities and practices for managing stormwater and enhancing habitat.
Detailed Narrative

**Project Need**

Tifft Nature Preserve is a 264-acre urban nature preserve, operated by the Buffalo Museum of Science visited by tens of thousands of people each year. Visitors enjoy hiking five miles of trails, fishing, picnicking, bird watching, snowshoeing, or just getting outside, all of which are free of charge to the public. In facilitated school and public education programming, Tifft Nature Preserve serves 10,000 students and lifelong leaners annually. With this demand for environmental education and outdoor recreation the current facilities at the preserve are inadequate.

Over the past five years, the Buffalo Museum of Science has invested funds, staff time and resources to plan, finance, and implement improvements and expand the existing visitor center. To fully achieve the capacity of the expanded visitor center and preserve, the exterior site immediately surrounding the facility needs improvements.

The existing parking lot and entry drive are dirt and gravel surfaces that are messy in spring and wet weather, require significant annual maintenance, and do not provide sufficient access for school children, families, or visitors with special needs (Fig. 1). Over thirty years of vehicle traffic has compacted the dirt and gravel so much that it is no longer a permeable surface and there is significant runoff of stormwater during heavy rainfall events and spring snowmelt. The uneven gravel covered paths to the building are not suitable for visitors with special needs and cannot accommodate large groups of school children. A smooth and even surface on the access drive, parking lot, and walkways would make access safer and accommodate a wider range of visitor needs. These access improvements were planned in conjunction with green infrastructure practices to manage stormwater and eliminate potholes, puddles, muddy and slick areas, and reduce untreated runoff into adjacent water bodies.

Existing vegetation on the site is primarily mowed grass with few planted trees. Japanese knotweed and *Phragmites*, are invasive species that grow and are spreading within the area. These species compete with native vegetation and reduce the habitat potential of the site. Following the control of these species, native vegetation will be planted to enhance habitat for butterflies, pollinators, birds and other wildlife.
Project Components

Green Infrastructure Design & Improved Visitor Access

These two project components were designed together to effectively manage stormwater runoff generated by access improvements. Green infrastructure uses vegetation, soils, hydrologic features, and natural processes to manage storm water to create healthier urban and built environments (US EPA). Green infrastructure practices in this project include wet and dry swales, bioretention, rain gardens, disconnecting rooftop drains into rain barrels, tree plantings and preservation of natural undisturbed areas. The green infrastructure practices in this project were selected to effectively manage stormwater and considering the constraints imposed by the industrial history of the site. Green infrastructure features will function alongside access improvements that will replace the existing dirt and gravel access drive, parking lot, walkways with smooth and even surfaces. This will improve access for all visitors, especially student groups, families, and people with special needs. See Figure 2 for a conceptual drawing of a potential site plan scenario.

Native Landscaping to Enhance Habitat

The project will also enhance habitat for native species around the Tifft Nature Preserve visitor center. The invasive species Japanese knotweed and *Phragmites* will be controlled using a combination of methods such as mechanical cutting, weed barrier fabric, and small amounts of herbicide which are currently being successfully used for control of these species within the wetland and woodland areas of the preserve.

To replace the invasive species and enhance habitat, a planting plan for native species of grasses, flowering plants, shrubs, and small trees will be developed. Features of the green infrastructure design such as bioretention basins and rain gardens will also include native species to increase habitat value. A “pollinator meadow” of native grasses and flowering plants will be planted areas in front of and around the building to attract butterflies, pollinators and grassland birds. Native shrubs and small trees with dense growth forms such as willows and dogwoods will be planted along the shore of Lake Kirsty to prevent establishment of new stands of Japanese knotweed,
reduce access to unsafe areas of riprap, and improve shoreline habitat. Conifers will be planted near the bird feeding station to provide cover and nesting sites. These project aspects will not only create aesthetically pleasing native landscaping around the visitor center, but will also address challenges and habitat improvements identified in the Tifft Nature Preserve Management Plan (http://www.sciencebuff.org/tifft-nature-preserve/about-tifft/). See Appendix A for an example of native plantings.

**Education, Interpretation & Demonstration Site**

The Buffalo Museum of Science and Tifft Nature Preserve are committed to educating the public about the environment and the need to make sustainable choices. When implemented, this project will serve as a demonstration site for education and interpretation of green infrastructure for stormwater management, renewable energy, invasive species control, and landscaping for wildlife with native plants. This will be accomplished by interpretive signage of sustainable features around the building, hands-on interactive exhibits within the building, and through direct facilitation by preserve staff during student and public programs.
**Project Benefits**

This project will provide several benefits including enhanced public access to the Tifft Nature Preserve visitor center and the preserve trails. Improved local water quality through the use of green infrastructure to manage stormwater is a major ecological benefit for a site hydrologically connected to a Lake Erie and so close to the Buffalo River. Also, the enhanced habitat by eradicating invasive species and the planting of native vegetation will benefit local populations and public viewing opportunities of butterflies, pollinators, and grassland birds. These benefits will extend beyond Tifft Nature Preserve since all aspects of the project will be used to educate students and the public about nature and the environment, and demonstrated sustainable design solutions that can be implemented at other sites. Finally, the implementation of the site plan designed for this project will allow Tifft Nature Preserve to increase its capacity and grow its 33 year history of providing high quality environmental education and access to nature in Western New York.

**Project Timeline**

**July 2015**
Apply to the Green Innovation Grants Program (GIGP) through the NYS Environmental Facilities Corporation (EFC)

**Summer 2015**
Invasive species control in project area

**Fall 2015**
Funding decision on GIGP application

**Winter 2016**
Complete final design and construction documents

**Summer 2016**
Begin project construction, continue invasive species control in project area

**Spring 2017**
Complete project construction and native plantings
2. Referring to the Niagara River Greenway Plan, clearly document and describe how the proposed project will advance the Niagara River Greenway vision including the principles, goals, and criteria that define that vision.

The Green Infrastructure and Native Landscaping at Tifft Nature Preserve Planning project advances the vision of the Niagara River Greenway and is well in line with the principles, goals, and criteria of that vision.

**Principles – Excellence, Sustainability, Accessibility, Ecological Integrity, Public Well-Being, Connectivity, Restoration, Authenticity, Celebration, Partnerships, Community Based**

**Excellence** – The proposed project will allow for the continuation of over 30 years of quality environmental education at Tifft Nature Preserve and build upon the 152 year history of research and science education at the Buffalo Museum of Science.

**Accessibility** – The planned project will include accessible features such as smooth and even surfaces to access the visitor center and preserve trails. The trails at Tifft Nature Preserve are open to the public during daylight hours every day of the year and the Tifft Sustainability Center is open Wednesday through Sunday, all at no cost.

**Ecological Integrity** – The goal of the planning process is to improve the ecological integrity and sustainability at Tifft Nature Preserve. Specific features to be designed include green infrastructure for storm water management, renewable energy and energy conservation technology, solid waste reduction, invasive species control and native plantings to enhance wildlife habitat.

**Public Well-Being** – Tifft Nature Preserve provides a location for students and the public to expand their knowledge and understanding of their environment, as well as a place to relax and unwind on a peaceful walk in a natural setting.

**Connectivity** – Tifft Nature Preserve functions as the southern gateway to the Niagara River Greenway and is well connected to the Lake Erie waterfront and Buffalo Outer Harbor.

**Restoration** – Educational displays and interpretation of the onsite restoration of an industrial brownfield into a nature preserve will be highlighted and on display in the Tifft Environmental and Sustainability center.

**Authenticity/Celebration** – A major mission of Tifft Nature Preserve is to promote the environment and natural resources of the Niagara River Greenway. At the same time, we interpret the rich industrial history of the area and make connections between environments of the past and present.

**Community Based** – Tifft Nature Preserve serves the entire community of the Niagara River Greenway including: school children, youth groups, families, bird watchers, seniors, and nature lovers of all types.
**Goals** – Improve Access, Make Connections, Protect and Restore Environmental Systems, Spark Revitalization and Renewal, Promote Long Term Sustainability, Extend the Legacy of Frederick Law Olmsted, Celebrate History and Heritage

**Access** – The Tifft Environmental and Sustainability Center accommodates heavy visitation and is extensively used for school, public, and scout programs. Planning to improve access for visitors, including those with special needs, is a major component of this project.

**Make Connections** – Tifft Nature Preserve provides a valuable site to connect students and the public with the environment and natural resources of the Niagara River Greenway. This project will allow the Museum to further expand and develop those connections.

**Protect and Restore Environmental Systems** – Water quality in Lake Kirsty on the preserve which is directly connected to Lake Erie will be protected and improved through a properly designed storm water management system. A plan for non-native invasive species control and the planting of native plants to provide habitat for birds, butterflies and pollinators will also be developed.

**Celebrate History and Heritage** – Tifft Nature Preserve has a rich history as a commercial and industrial site. How this history and past land uses affect the current environment and management of the site will be communicated to students and the public through interpretive signage and facilitated programs.

**Spark Revitalization and Renewal** – Tifft Nature Preserve provides valuable natural and recreational amenities that add greatly to the quality of life of area residents, as well as attracting tourists and new investment to the area. Planned improvements to the site will complement and enhance recent developments along the Lake Erie waterfront.

**Promote Long Term Sustainability** – Planning for storm water management, renewable energy technology, energy conservation, and solid waste reduction are all included in this project. When implemented, these technologies and practices will be on display to the thousands of visitors to the preserve. Improvements to the site will also allow the Museum to pursue additional uses and revenue sources to maintain and operate Tifft Nature Preserve.

**Criteria** – Consistency with the NRG Principles, Priority Status, Focus Area, Environmental Soundness, Implementable, Economic Viability, Availability of Local Sponsors or Partners, Ability to Match or Leverage Funds, Consideration of Other Planning Efforts, Clear Benefits

**Consistency with the Principles** – The Green Infrastructure and Native Landscaping at Tifft Nature Preserve project is consistent with all of the principles of the Niagara River Greenway and makes significant contributions to improving the Ecological Integrity, Accessibility, Public Well-Being, and Restoration of the Niagara River Greenway.
**Priority Status** – This project incorporates several priorities identified in the Niagara River Greenway Plan including: providing access to waterfront resources, interpretation and education about the region’s cultural, natural and historic resources, and revitalization of urban centers. Tifft Nature Preserve is used as an example of an ‘Ecological Center’ in the plan. With its location only three miles from downtown Buffalo and also functioning as the southern gateway to the Niagara River Greenway, Tifft Nature Preserve is a strategic location in an ‘Interpretive Center Network’.

**Focus Area** – Tifft Nature Preserve is within the focus area delineated in the plan and functions as the southern gateway to the Niagara River Greenway.

**Environmental Soundness** – Planning for green infrastructure and native landscaping at Tifft Nature Preserve is environmentally sound and includes storm water management, renewable energy and energy conservation technology, solid waste reduction, invasive species control and native plantings. This will not only reduce our ecological footprint, but the preserve itself will be used as a teaching tool and model for environmental sustainability.

**Implementable** – Planning for green infrastructure and native landscaping improvements at Tifft Nature Preserve is implementable and feasible as outlined in this proposal.

**Economic Viability** – Improvements to the site will allow the Museum to pursue additional uses and revenue sources to maintain and operate the preserve.

**Availability of Local Sponsor or Partners** – The Buffalo Museum of Science has managed and operated Tifft Nature Preserve since 1982 as a high quality natural and educational resource for the region.

**Ability to Match or Leverage Funds** – The Buffalo Museum of Science will provide half of the cost of this project from other sources including grants, foundation support, donations, or general funds.

**Considerations of Other Planning Efforts** – Planning for improvements at Tifft Nature Preserve are consistent with, and would help achieve, the vision and goals of many other planning efforts including: City of Buffalo Comprehensive Plan, Local Waterfront Revitalization Plan, New York State Significant Coastal Fish & Wildlife Habitat, and the South Buffalo Brownfield Opportunity Area (BOA) Plan. See below for more detail on how Tifft Nature Preserve is mentioned in these documents.

**Clear Benefits** – Clear benefits of this project include a plan to expand access to environmental education and recreation, improve local water quality, increase sustainability and energy efficiency on the preserve, control invasive species, enhance native species habitat, and expand revenue sources to maintain and operate Tifft Nature Preserve.
3. Define the budget for the proposed project and include costs for the following:

<table>
<thead>
<tr>
<th>Expense Category</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Planning</td>
<td>$ 43,814.32</td>
</tr>
<tr>
<td>Construction</td>
<td>$ 470,008.11</td>
</tr>
<tr>
<td>Acquisition</td>
<td>$</td>
</tr>
<tr>
<td>Administration</td>
<td>$ 19,915.60</td>
</tr>
<tr>
<td>Operation and Maintenance/Year</td>
<td>$</td>
</tr>
<tr>
<td>TOTAL PROJECT COST</td>
<td>$ 533,738.03</td>
</tr>
</tbody>
</table>

Of the Total Project Cost, the Buffalo Museum of Science is seeking $30,000 from the Niagara River Greenway Ecological Standing Committee for the purchase of plants to be used in green infrastructure features and native landscaping, as well as funding for invasive species control. The estimated cost of these items is below.

<table>
<thead>
<tr>
<th>Expense Category</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Native Plants for Green Infrastructure &amp; Landscaping</td>
<td>$25,000</td>
</tr>
<tr>
<td>Invasive Species Control</td>
<td>$5,000</td>
</tr>
</tbody>
</table>

Other funding to implement this project will be pursued from the following sources:

- The Green Innovation Grant Program (GIGP) through the New York State Environmental Facilities Corporation (EFC) - The green infrastructure practices utilized in this project are within the scope of the GIGP and we believe the Buffalo Museum of Science will be very competitive for GIGP funding due to the large number of visitors and educational potential of the project.
- Niagara River Greenway Erie County Standing Committee
- A capital campaign organized by the Buffalo Museum of Science

Although the property of Tifft Nature Preserve is owned by the City of Buffalo, The Buffalo Museum of Science receives no financial or in-kind support from the city for planning, operations, or capital improvements at the preserve.
4. Describe the measures taken at the local level to gain community and government support for this project (hearings, petitions, public surveys, resolutions of support, etc).

See attached letters of support from the following:

Christopher P. Scanlon, South District Common Council Member, City of Buffalo
Dave Stebbins, Vice President, Buffalo Urban Development Corporation

See attached Determination of Consistency and comments from the Niagara River Greenway Commission

If this project has been cited or described in a local planning document or some equivalent thereof, attach copies of that documentation highlighting the sections that are relevant to the proposed project.

Tifft Nature Preserve is mentioned several times in the Niagara River Greenway Plan and this project incorporates several priorities identified in the plan (pg. 29-31) including: providing access to water front resources, interpretation and education about the region’s cultural, natural and historic resources, and revitalization of urban centers. Tifft Nature Preserve is even used an example of an ‘Ecological Center’ (pg. 100) in the plan. With its location only three miles from downtown Buffalo and also functioning as the southern gateway to the Niagara River Greenway (pg. 102), Tifft Nature Preserve is a strategic location in an ‘Interpretive Center Network’ (pg. 100). Tifft Nature Preserve is also mentioned and highlighted in the following local and statewide documents:

- **City of Buffalo Comprehensive Plan** – Tifft Nature Preserve is cited as part of the city’s “Green Infrastructure” (Fig. 32) and as a “Destination Park” (Fig. 35), a distinction given to only 16 of Buffalo’s 120 parks.
- **Local Waterfront Revitalization Plan** – In this plan, Tifft Nature Preserve is highlighted for its Public Access and Recreation (Map 2-8, p. II-44).
- **New York State Significant Coastal Fish & Wildlife Habitat** – Tifft Nature Preserve is designated by the Department of State as a Significant Coastal Fish & Wildlife Habitat with an extremely high significance score of 84 points (the highest in Western New York). The rating form also states, “[the preserve] is the most
heavily used environmental education center in the region.” This project will enhance the site around the education center and allow for continued quality environmental education to be provided to a large segment of the population. Rating form available at [http://www.nyswaterfronts.com/index.asp](http://www.nyswaterfronts.com/index.asp).

- **South Buffalo Brownfield Opportunity Area (BOA) Plan** – The South Buffalo BOA plan is the most recent local planning effort. This plan highlights the importance of Tifft Nature Preserve as an asset to the region and an integral piece of the revitalization of South Buffalo that includes an enhanced interpretive center for Tifft Nature Preserve. (Map 5.2, p. 129; p. 160-161, p. 174)

Describe the role of municipal agencies, stakeholder groups, consultants, volunteers, or others who will be involved in the proposed project.

**Tifft Nature Preserve Ecologist** – The Tifft Nature Preserve ecologist will be the project coordinator and involved in managing the project through design, construction and maintenance. The ecologist will also lead the work on invasive species control, native landscaping and habitat improvements, and assist with educational program development.

**Consulting & Engineering Firms** – EDR (Environmental Design & Research) completed the conceptual project design and will contracted for finally design and construction documents. A firm with expertise in environmental remediation will be hired to conduct soil testing during construction.

**Buffalo Museum of Science Staff** – Operations Department staff will assist with ongoing project maintenance. Education Department staff will work to develop interpretative signage and provide facilitated programming on all aspects of this project.

**Tifft Nature Preserve Standing Committee of the Buffalo Society of Natural Sciences** – This committee is dedicated to managing and supporting Tifft Nature Preserve. Committee members provide volunteer services with expertise in construction, fund raising, and legal affairs.
5. Describe and document the environmental setting and existing conditions at the proposed site. If you are not the owner of the property include a letter(s) or resolution(s) evidencing support for the project by the owner.

Tifft Nature Preserve is a 264-acre urban nature preserve, operated by the Buffalo Museum of Science. Located in South Buffalo, the area was formerly used as a transshipment facility and dump until it was designated a nature preserve in the early 1970s. Despite the industrial history of the site, it provides valuable wildlife habitat and greenspace within the city limits. Major habitats on the preserve include: a 75-acre remnant cattail marsh, woodlands, grasslands, and three ponds. The cattail marsh, which is the largest remnant wetland in Erie County, provides nesting habitat for rare marsh birds and the woodlands are an important stop-over site for migrating birds.

Tifft Nature Preserve is owned by the city of Buffalo and leased by the Buffalo Society of Natural Sciences (i.e. Buffalo Museum of Science) for operation of the nature preserve. The museum has management authority and responsibility for the property and works collaboratively with the City of Buffalo. All maintenance of facilities at Tifft Nature Preserve is conducted by the preserve ecologist or the Buffalo Museum of Science’s Department of Operations.

Describe how your project will comply with the State Environmental Quality Review Act (SEQRA). The existence of wetlands, significant upland and aquatic habitats, and plant or animal species that are classified as rare, threatened, or endangered should be noted. Explain how such natural resources will be protected and/or enhanced.

Through the planning process, all relevant environmental regulations and permits will be identified. This proposed project site is not within or adjacent to the designated wetland on the preserve and is well outside the 100-foot wetland buffer protected by Article 24 of the Environmental Conservation Law. Also, the project is not located within or would negatively impact the habitat of any state listed wildlife that occurs on the preserve. Due to the industrial history and dumping on the site, all soil disturbed tested and managed accordingly.
Provide photographs, conceptual plans, and drawings that show the site as it presently exists and how the site will change with the addition of the proposed project.

Fig. 1 – 2011 Aerial photo showing existing site conditions including: visitor center prior to expansion, gravel parking lot and access drive
Fig. 2 – Conceptual drawing of access improvements, green infrastructure and native landscaping site plan for Tifft Nature Preserve
Appendix A – Native Plantings and Landscaping

Native landscaping to attract and provide habitat for birds, butterflies and pollinators will be planted around the building, parking lot and access drive. Stock seed mixes that are suitable for these types of plantings include Northeast Native Wildflower Mix (ERNMX-153) from Ernst Conservation Seed, Inc. in Meadville, PA or the Tallgrass Exposed Clay Subsoil Mix from Prairie Moon Nursery in Winona, MN. These and similar seed mixes will be the starting point for the exact mix of species to be planted at Tifft Nature Preserve, but the species and relative amounts of each species will be adapted to account for local soil and sunlight conditions, habitat potential, resistance to deer browsing, desired vegetation height, maintenance requirements, and aesthetics. Seed mixes are usually planted in the range of 10-15 lbs. of seed per acre and will be planted on the heavy side of this range to ensure the establishment of a robust stand of vegetation. A list of potential species is below, but species may be added or removed from this list throughout project design.

Native Grasses & Sedges

- **Bouteloua curtipendula** – Side-Oats Grama
- **Carex pensylvanica** – Pennsylvania Sedge
- **Elymus canadensis** – Canada Wild Rye
- **Panicum virgatum** – Switchgrass
- **Schizachyrium scoparium** – Little Bluestem
- **Sorghastrum nutans** – Indiangrass

Flowering Plants that Attract Pollinators

- **Agastache foeniculum** – Anise Hyssop
- **Allium cernuum** – Nodding Onion
- **Aquilegia canadensis** – Columbine
- **Asclepias tuberosa** – Butterfly Milkweed
- **Asclepias syriaca** – Common Milkweed
- **Baptisia alba** – White Wild Indigo
- **Chamaecrista fasciculata** – Partridge Pea
- **Coreopsis lanceolata** – Lance-Leaf Coreopsis
- **Echinacea** spp. – Purple Coneflowers
- **Liatris aspera** – Button Blazing Star
- **Monarda fistulosa** – Wild Bergamot
- **Rudbeckia** spp. – Black-Eyed Susans
- **Solidago speciosa** – Showy Goldenrod
- **Symphyotrichum laevis** – Smooth Blue Aster
These plant species provide food and habitat for a wide variety of butterflies and moths as adults and larvae including the Eastern tailed blue, American lady, Monarch, Pearl crescent, several species of Skippers and Sulphurs, and the Milkweed tussock moth, as well as pollen and nectar sources for a wide variety of native bees. Columbine, Purple coneflowers, and Wild bergamot are also known nectar sources for the Ruby-throated hummingbird. In addition to the flowering plants, native grasses also provide excellent habitat for insects. Indiangrass supports populations of grasshoppers, leafhoppers, and caterpillars. These insects are important food sources for songbirds which also feed on the many seeds of Indiangrass.

**Lawns and Grassy Walkways**

In higher use areas that will receive some amount of foot traffic, non-invasive sod forming low stature grass species or cultivars will be used an alternative to a conventional turf lawn. The advantages to these alternative lawns are that they require less water and maintenance, while still providing an inviting and useful green space with a more natural character. Products such as Eco-Grass (#ECOG) and Buffalo Grass (#BUC02G) sold by Prairie Moon Nursery in Winona, MN will be considered along with other similar alternatives to turf lawns.
January 23, 2014

Mr. Mark Mortenson
Buffalo Museum of Science
1020 Humboldt Parkway
Buffalo, NY 14211-1208

Dear Mr. Mortenson,

As the City of Buffalo South District Common Councilmember, I am pleased to offer my full support to the Buffalo Museum of Science for the Tiffi Sustainability Center Landscaping Plan submitted to the Niagara River Greenway Commission.

Tiffi Nature Preserve serves a large segment of the public with environmental education and outdoor recreation. This project helps achieve the goals and vision of the not only the Niagara River Greenway Plan, but also the City of Buffalo Local Waterfront Revitalization plan and the South Buffalo Brownfield Opportunity Area Nomination Study.

This project will benefit visitors by improving access and amenities at Tiffi Nature Preserve in an environmentally sustainable manner. Tiffi Nature Preserve is not only reducing its own ecological footprint, but also serving as a demonstration site to educate others about green infrastructure to manage storm water, planting native plants as landscaping to enhance wildlife habitat, utilizing renewable and energy efficient technologies, and waste reducing practices.

I strongly encourage you to consider the application of the Buffalo Museum of Science for the Tiffi Sustainability Center Landscaping Plan.

Sincerely,

Christopher P. Scanlon
South District Councilmember
Mr. Mark Mortenson  
Buffalo Museum of Science  
1020 Humboldt Parkway  
Buffalo, New York 14211-1208  

Dear Mr. Mortenson,  

On behalf of Buffalo Urban Development Corporation (BUDC), I am pleased to offer my support to the Buffalo Museum of Science for the Tift Nature Preserve Green Infrastructure and Landscaping Project submitted to the Niagara River Greenway Commission.

Tift Nature Preserve serves as the environmental and sustainable education hub of the region and this project will help continue and expand that work. The green infrastructure components to manage storm water, the native landscaping to benefit wildlife, and sustainable technologies to reduce energy use and waste will improve the environment and quality of life of area residents. This project will additionally help improve local water quality and accessibility to the preserve and visitor center as well as the adoption of plans to oversee invasive species control, landscaping with native plants to enhance wildlife habitat, sustainable energy technologies, and waste reduction practices.

In compliance with the City of Buffalo’s Local Waterfront Revitalization plan, the Tift Nature Preserve is an integral piece of the implementation of the South Buffalo Brownfield Opportunity Area (SBBOA). An enhanced interpretive center at Tift Nature Preserve is included as an initiative of the SBBOA and this project will help fulfill part of that goal. This project will benefit visitors by improving access and amenities at Tift Nature Preserve in an environmentally sustainable manner. Tift Nature Preserve is not only reducing its own ecological footprint, but will also serve as a demonstration site to educate others about green infrastructure to management storm water, using native plants for landscaping, utilizing renewable and energy efficient technologies, and waste reducing practices.

I strongly encourage you to consider the application of the Buffalo Museum of Science for the Tift Nature Preserve Green Infrastructure and Landscaping Project.

Sincerely,

David A. Stebbins  
Vice President
May 21, 2014

Mark Mortenson, President & CEO
Buffalo Museum of Science-Tiff Nature Preserve
1200 Fuhrmann Boulevard
Buffalo, New York 14203

Dear Mr. Mortenson:

The Niagara River Greenway Commission is pleased to support the Buffalo Museum of Science’s “Project Consultation and Review” package for the following project:

Green Infrastructure & Native Landscaping Planning at Tiff Nature Preserve

This project was deemed consistent to the Niagara River Greenway Plan as determined by the Niagara River Greenway Commission. The subjective evaluations were based on the principals, goals and criteria that define the Niagara River Greenway Plan. I have attached the Commission’s comments and questions as well as public comments received on the projects submitted during the deliberation timeframe for your use. The Commission is pleased to support the Buffalo Museum of Science’s project proposal and wish you great success.

Respectfully,

Rob Belue

R.A. Belue
Executive Director

Cc:  Erie, Buffalo, Olmsted Standing Committee
     David Spiering