

Bureau of Recreation and Conservation Green Principles for Park Development and Sustainability

Principle #2: Connect People to Nature

The National “Sustainable Sites Initiative Standards and Guidelines Report”¹ address the concept “human well-being” that should be considered when parks are renovated or new ones built. Parks should be developed to enhance the natural environment, designed to create safe and fun places that encourage “high tech” oriented children to play outside, and accessible to all user groups including those with disabilities. Such facilities will stimulate creativity, provide mental and emotional health benefits, and provide an atmosphere where children can develop certain social skills such as, sharing, defining roles and responsibilities, problem-solving, and peer negotiation. Listed below are several ideas taken directly from the Report¹. The Department of Conservation and Natural Resources (DCNR) *iConserve* program also provides for the connection of human well-being to outdoor recreation, conservation, and stewardship. Learn more about *iConservePA* at <http://iconservepa.org/>.

1. **Provide opportunities for interaction with nature.** Provide a diverse landscape to support a broad range of users and activities; including spaces for physical activity, nature/discovery trails, access paths to streams, way-finding features, and “cues to care”, which are design devices (such as mowed edges or low fences) that communicate a naturalistic landscape welcomes users.
2. **Design spaces that address children’s needs.** Provide pedestrian-only areas so children and youth can play without concern for traffic. Provide parks and open spaces that serve several residential areas giving children a sense of place and belonging. Provide interesting landscape places (designed and naturalistic) that enable exploratory and imaginative play. For example boulders for climbing, streams for discovery, open meadows with trails, sensory gardens (where children can touch, smell, and even taste plants), water features where children can manipulate sand and water, and large trees and other natural features for hide-and-seek and unstructured activities.
3. **Provide opportunities for passive experiences with nature.** Maintain all possible trees on-site. Optimize water views or provide fountains. Place and configure plantings to achieve ecosystem services (such as rain gardens for infiltration and stormwater management) and provide visual amenities. Establish nature trails, wildlife viewing areas, bridges over waterways, access to streams, benches, vegetative mazes, labyrinths, etc.
4. **Educate site users.** Create demonstration gardens that allow visitors to observe biodiversity and learn how they can establish the same type of garden on their property. Protect wetlands and other natural areas and provide interpretive materials to education about the benefits provided by these features. Facilitate wildlife viewing and learning, by establishing bird boxes, observation areas/structures and stationary viewers with educational exhibits about the types of wildlife visitors might see. Provide interpretive materials or stations that inform about local ecosystems and their functions. Incorporate signs along an interpretive trail through a native wildflower and grass meadow that explain how these habitats are beneficial for humans and wildlife. Allow access to water features onsite for discovery opportunities.
5. **Provide spaces for social interaction.** Create small theme gardens (such as color, texture, smell, butterfly, etc.). Create “community greens” that can serve as outdoor meeting rooms, break or study spaces, and spaces for organizational events and celebrations.
6. **Support on-site food production.** Establish a community garden for local residents to enjoy growing their own vegetables on a designated plot of land. See DCNR’s community garden page for more information
<http://www.dcnr.state.pa.us/brc/grants/greening/communitygardens/index.htm>.

7. **Consider local cultures/communities and their needs.** Identify local groups of potential users and provide amenities that address the needs or support the culture of the community.
8. **Plant Trees.** Trees are beneficial additions to any site. Planting trees should be considered during the planning and developing of all recreational sites. Trees have direct human benefits such as creating effective sound barriers; producing oxygen, absorbing and locking away carbon dioxide, and cleaning the air by intercepting airborne particles, reducing heat, and absorbing such pollutants as carbon monoxide, sulfur dioxide, and nitrogen dioxide. Trees shade and cool reducing the need for air conditioning in the summer and break the force of winter winds, lowering heating costs in the winter. Trees fight soil erosion and reduce water runoff and sediment deposition after storms.

References:

1. Sustainable Sites Initiative. Standards and Guidelines: Preliminary Report. November 1, 2007. <http://www.sustainablesites.org/report.html>

Additional Resources:

Penn State University, College of Agricultural Sciences- Cooperative Extension. From the Woods. Community Forests. <http://pubs.cas.psu.edu/FreePubs/pdfs/uh173.pdf>

Arbor Day Foundation. Nature Explore. <http://www.arborday.org/explore/classroom/index.cfm>

Recreation Management. Nature and Nurture, Trends in Play Design. http://www.recmanagement.com/feature_print.php?fid=200907fe02

National Wildlife Federation. Be Out There. <http://www.nwf.org/Get-Outside/Be-Out-There.aspx>

Children & Nature Network. <http://www.childrenandnature.org/movement/naturalfamilies/clubs>

Get Outdoors PA. <http://www.dcnr.state.pa.us/getoutdoorspa/index.html>

TreeVitalize. A Partnership to Restore Tree Cover in Pennsylvania Communities. <http://www.treevitalize.net/>

North Carolina State University. Natural Learning Initiative. <http://www.naturalearning.org/>