

WILDLIFE HABITAT ZONES ADVISORY TEAM (WHZAT) MEETING 2

Date: 2/12/09
Time: 9:00 a.m. – 12:00 p.m.
Place: Horseshoe Farm Park

Attendees:

WHZAT members:

Jacquelyn Wallace, NC Wildlife Resources Commission
John Connors, Wake Audubon Society
Harry LeGrand, NC Natural Heritage Program
Dr. Jon Stucky, NCSU Professor of Wetland Plant Biology
Ivan Dickey, substituting for Wayne Schindler City of Raleigh Parks Maintenance
David Shouse, City of Raleigh Senior Parks Planner
Melissa Salter, City of Raleigh Land Stewardship Coordinator
Facilitator: Stephen Bentley, City of Raleigh Senior Park Planner
Absent: Chris Moorman, NCSU Cooperative Extension Wildlife Biologist
Absent: Dowd Bruton, Wild Turkey Federation
Absent: Dr. James Gregory, NCSU Professor of Forest Hydrology and soils
Also in attendance: Jill Braly, City of Raleigh Parks Planner
Kelsey Obernuefemann, City of Raleigh GIS support
Jamie Loyack, HagerSmith Design

The meeting commenced at 9:15 a.m.

David Shouse began the meeting by updating the committee on the status of the Horseshoe Farm Master Plan: City of Raleigh Public Works will review Master Plan revisions that include a rearrangement of parking. This information is provided to WHZAT and published on the web site. Stewart Engineering has proposed only “potential” bridge locations for the Greenway connection into and out of the park. The WHZAT committee needs to look at practicality and environmental sensitivity issues, balancing impact on the environment, cost and public use. Approach to the bridge could have the greatest site impact. Greenway design will have to address bridge construction impacts and consider various alternatives.

Dr. Jon Stucky will investigate *Microstegium* distribution with a graduate student.

John Connors asked about the canoe launch location?

David Shouse said the canoe launch will be associated with the bridge abutment of the downstream bridge to limit impact. He mentioned the Significant Natural Heritage Areas GIS layers that we are obtaining from the State.

Melissa Salter would like the WHZAT group to note any significant park features (plant communities, etc.) as the team walks around the site.

A map of hydric soils and detailed drainage patterns of Horseshoe Farm were handed out to each Team member. The WHZAT team began their tour on the northwest portion of the property. John Connors pointed out the slope that supports spring ephemerals. Team walked down slope

to floodplain pools and Harry LeGrand noted the pools are not created by beaver impoundments. Native River Oats (*Uniola latifolia*) were common in this area, even though invasive *Microstegium* is also present here. David Shouse noted the attempt by previous landowners to drain the pools, and asked if the drains could be undone. Connors wondered what water sources there are to the floodplain pools, whether primarily drainage from the upland fields. The group studied the drainage map provided. The drainage map of Horseshoe Farm shows the inputs to the wetlands are from the upland areas. (It was also mentioned that these wetlands are remnants from when the river floods.)

David Shouse said the Master Plan proposes controlled access to the wetland, maybe through a boardwalk or viewing area. Harry LeGrand proposed that access not jut out into the wetland, but rather be peripheral. Connors said from an educator standpoint he would want access to the wetland in order to use dip nets.

Jacquelyn Wallace suggested an undisturbed buffer between woodlands and the pools and a boardwalk through the less wooded area.

Connors said there could be a spur from the Greenway leading to the wetlands, as opposed to the main Greenway Trail leading through the wetlands.

Harry LeGrand said don't put any kind of trail or development of any kind between the field and the wetland at the base of the slope east of the wetland pool.

Connors suggested an overlook from the field, anticipating people wanting to come down the slope to view the wetland.

There was evidence of a four-wheeled vehicle near the wetlands in the NE portion of the Park.

Dr. Stucky noted the *Microstegium* will spread with any building in the area and that appropriate management and controls need to be in place.

David Shouse noted opportunities to build with minimum disturbance.

At the northwestern-most proposed bridge site David Shouse noted the Greenway could cross the park at a lower or higher elevation. He said we anticipate HSF to be a trailhead and wondered what impacts the various proposed bridge locations would have. He noted the impact on natural resources, cost and construction need to be considered. He said the Greenway could shoot straight across the park to avoid some of the sensitive areas, and then have additional foot path type trails throughout the park.

Harry LeGrand said it was important to have nothing more than dirt trails following the levees in the interior of the floodplain forest area, and that these trails need to be monitored and managed.

Connors said the Greenway users are often interested in getting from point A to B and suggests a main path straight through with spurs as optional paths. He wondered what has to happen to get a bridge in and how that will impact the wetland. He worries about petrochemicals during the bridge construction phase getting into a static water source.

Harry LeGrand added that sediment from construction is also a concern.

The Team walked to a human-made ditch and Connors asked do we leave it? Plug it? Jacquelyn Wallace wondered whether the ditches, which lead directly to the Neuse River, pull river water into the wetland areas during high water levels. The City of Raleigh will return to HSF to GPS the locations of all the human-made drainage ditches, which appear in other areas of the Park as well.

Harry LeGrand proposed leaving the man-made ditches alone.

Dr. Stucky noted a *Carex* sp. of sedge that was successfully competing with the *Microstegium*. He also pointed out several Black Walnut trees that are rare and would be good to protect. The City of Raleigh will return to HSF to GPS the locations of the black walnut trees.

Connors started a discussion on a lack of understory vegetation and natural tree regeneration at HSF that may be due to large numbers of deer at the Park. Jacquelyn Wallace said the City could consider an urban archery season and Connors urged the group to recognize these large deer populations as an issue that needs to be addressed.

At the forest/field transition area in the southern part of the park, Connor noted the existing trail at the zone change will deter wildlife, highlighting signs of dogs at HSF. He pointed out the area where mowing had been stopped and said some un-mowed areas are very important for wildlife. He wondered about the existing vegetation in this location, and what species are in the seed bank. Should the Park just stop mowing and maintain the existing vegetation, or start from scratch by applying herbicide to the existing vegetation and replanting with a native grass and wildflower mix. Dr. Stucky noted that the existing vegetation is native and appropriate to the site, and should be maintained. Melissa Salter and Dr. Stucky favored maintaining existing vegetation, and enhancing the area by planting plugs of wildflowers or other beneficial plants.

Dr. Stucky talked about a graduate study in the coastal plains on buffer zones and bird diversity. The study found that when mowing ceased, three zones occurred (grassland, shrub and woodland) and this area supporting 3 zones had the greatest bird diversity.

Connors suggested a curving boundary managed as a shrub thicket. Harry LeGrand said it would have to be periodically mowed to limit woody encroachment.

Dr. Stucky noted the broadleaf fescue, which could be eliminated. He suggested the possibility of herbicide application in winter when native plants are dormant. David Shouse said the City is open to that management option. Dr. Stucky said that the Triangle Land Conservancy did this and could be a resource. Jacquelyn Wallace mentioned the McDowell Nature Preserve in Charlotte as a reference.

The team walked through the eastern portion of Horseshoe Farm and Connors pointed out marbled salamander larvae in a quickly-diminishing pool. Jacquelyn Wallace pointed out the need to protect the forest around the pools for the adult-phase of the salamander.

Connors pointed out the start of the native River Cane (*Arundinaria gigantea*). Harry LeGrand noted that three butterfly species feed only on this Cane – two Pearly Eye species and a skipper. LeGrand feels the Cane is a very important resource, in part because of this butterfly habitat.

John Connors said the wetland is draining to the Neuse River right where the eastern bridge location seems to be proposed. Melissa Salter stated we would get that information back to the Greenway design team.

Harry LeGrand says it is important to not have a road through the wetland area, but acknowledges with the proposed bridge location it seems some sort of path or trail will inevitably need to be established in a portion of the Cane area. He feels the City needs to be sure to keep any road/parking out of the Cane area.

David Shouse notes the challenges of constructing the bridge, and providing access to the river. The river access program area (buildings and parking) was taken out of the HSF Master Plan, but trail access to the river is still in the revised Master Plan.

Connors said it is important from both a recreational and environmental point of view to provide access to the river, while still protecting the river.

Jacquelyn Wallace suggested a raised boardwalk. David Shouse said a boardwalk would be an option, but is still a challenge for construction and providing direct water access.

Connors said it has to be safe for people to get their boats into the river.

Stephen Bentley said it is not a primary boat launch, but more of an access point to the Park.

The WHZAT members then had a final review of what was observed during the Horseshoe Farm site tour. A copy of the Horseshoe Farm Revised Draft Master Plan was handed out to each Team member for review. David Shouse said the draft recommendations were given to the Public Works committee today, and plan to minimize impact in the Significant Natural Heritage area. The Revised Draft Plan keeps a 10,000 square foot Environmental Education/Arts Center and proposes a loop road to support trail and shelter access. One shelter has been made smaller and labeled as a program support shelter, and moved closer to the Environmental Education Center building. He notes the butterfly garden and wonders if it is properly oriented for solar/wind consideration. The plan concentrates the facilities on the northern side of the park. The concept plan shows the bridges, but not their exact location. The bridge location will be determined by considering environmental impact, cost, engineering and usage. The Greenway may take a shorter route through the park and be supplemented by informal trails along the system of levees, which could be hand built. He is aware of the potential for on-site stormwater treatment. The parking lot runoff could direct back into the site for treatment before it resumes its natural flow to the river. Connors noted the educational opportunity of on-site stormwater treatments, and said the system can be designed as step-downs, creating environment/habitat that could support wildlife.

David Shouse noted the Master Plan was designed to protect the view of the Park, with the built environment spread to either side. He welcomes comments from the team on the Master Plan next time we get together. He noted the Request for Qualification for phase I has been sent out for this site.

Shouse asked what information the City of Raleigh can bring to the next WHZAT meeting to move forward with WHZAT goals, and noted the City would bring the Significant Natural Heritage data and archaeological data for the site.

Harry LeGrand feels the camping area in the Master Plan should be situated in the less sensitive pine area in the southern portion of the Park. He wants to delineate the pine area with GPS.

Shouse asked the Team to consider how the Park might direct human and animal traffic.

Connors asked about the size and prescription of the Butterfly Meadow area, and Jamie Loyack pointed out that the Master Plan refers to size in the text.

Jacquelyn Wallace requested that a 600 foot buffer around the wetlands be mapped as amphibian and reptile habitat. Melissa Salter asked if Connors would gather information from Prairie Ridge on their grassland habitat, and lessons learned from their project.

The meeting concluded at 12:00 p.m.