

**Semi-Annual Report for GL-00E00466
For time period 10/31/2011 thru 05/31/2012**

Barrens Habitat Restoration for Endangered/Threatened Species

I. Restoration Work Accomplished

Table 1: Six-month accomplishments

Property	Project Activity	Previous	New	Total
Emmons Creek W.A.	Logging slash reduction	14 ac.	16 ac.	30 ac
	Invasive plant control		7 ac.	7 ac.
	Seeding		2 ac.	2 ac.
Greenwood W.,A.	Brush and tree removal	12 ac.	20 ac.	32 ac.
Greenwood W.A.	Prescribed burning	18 ac.	60 ac.	78 ac.
White River W.A.	Tree removal	3 ac.		3 ac.
	Prescribed burn	28 ac.	58 ac.	86 ac
Hartman Creek S.P.	Brush removal		2 ac.	2 ac.
	Invasive plant control			
Greenwood W.A.	Firebreak construction	2 mi.	2 mi.	4 mi.
All treatment sites	Pre-mgmt vegetation surveys	980 ac.		980 ac.
Reference sites	Karner butterfly surveys	79 ac.		79 ac.
Restoration sites	Karner butterfly surveys	40 ac.		40 ac.
Total Ac. Treated		75 ac.	172 ac.	240 ac.
Percent restored		5%	12%	17%
Total Ac. Surveyed		1099 ac.		1099 ac.

This grant project involves four Wisconsin DNR properties located within the high probability range of the federally endangered Karner blue butterfly (*Lycaeides melissa samuelis*). It is intended to restore and enhance 1390 acres of barrens habitat that supports the Karner blue and more than fifty other state and federal SGCN's (species of greatest conservation need).

During the seven month period ending May 31, 2012.

II. Object Class Category Changes

None

III. Corrective Actions

None

IV. Projected New Work through November, 2012

Table 2: Six-month projected work plans

Property	Activity	Amount Planned
Emmons Creek W.A.	Invasive Control	20 Ac.
	Seeding	20 Ac..
Hartman Creek State Park	Invasive Control	20 Ac.
	Seeding	20 ac.
Greenwood W.A.	Brush removal	10
White River W.A.	Invasive Control	5 Ac.
	Seeding	10 Ac.
All Properties	Monitoring	300 acres
Total Treatments Planned		105 Ac.

V. Percent Completion of Scheduled Work

Table 3: Percentage of project completed to date

Activity	Projected Ac.	Target Date	Completed Ac.	Percent Completed
Tree/brush removal	120	07/30/2012	67	56
Invasive plant control	132	Not Established	7	5
Prescribed burn	1253	06/30/2013	164	13
Seeding	180	11/30/2012	2	1
Monitoring phase 1	1685	08/31/2011	1099	66

Tree and Brush Removal: Over half of the tree canopy reduction goals have been reached through the winter of 2011-2012, including burning of slash from 5 acres of pine plantation that was removed for barrens restoration in the winter. Other canopy reduction was accomplished using mechanized grinders that reduce small trees and logging slash to chips and by chain saws and rotary brush saws. This work was done on the Greenwood

and White River Wildlife Area, the Emmons Creek Fishery Area, and Hartman Creek State Park.

Prescribed Burning: Two miles of firebreak were refreshed on the Greenwood Wildlife Area. Greenwood conducted one prescribed burn of 60 acres and White River burned 58 acres.

Seeding: A small 2 acres site was seeded to native grasses and forbs on the Emmons Creek Fishery Area.

Volunteer Network: In May, 2012 thirty volunteers were trained to conduct Karner butterfly abundance surveys and habitat assessment surveys for work within the project area of this grant. They will also be watching selected recovery sites for the start of the second Karner flight in late June so that population estimate surveys can be conducted on schedule.

Karner population monitoring: A student crew from the University of Wisconsin – Stevens Point was trained in May for the annual population counts of Karner blue butterflies on designated recovery sites within the project area. The data from their second flight surveys will give absolute estimates of Karners present on each site during second flight, and will be used as the basis of comparison for abundance surveys done by volunteers on restoration sites included in this grant.

VI. Budget Expenditures

Table 4: Percent of Budgeted Amount Spent to date

Amount of GLRI grant	\$ 109,431
Expended to date	\$ 34,416
Percent expended	31.4 %

VII. Change in Principal Investigator

No change

VIII. Changes Needed in Project Period

This grant expires in late 2013. Completion of restoration activities by that date will not be possible due to delays at the start of the grant period and ongoing staff shortages at the property level. Final surveys to measure vegetative response to management will most likely require an extension of at least one year past the implementation of on-site restoration activities.

IX. Delays or Adverse Conditions

The project is running behind schedule for several reasons

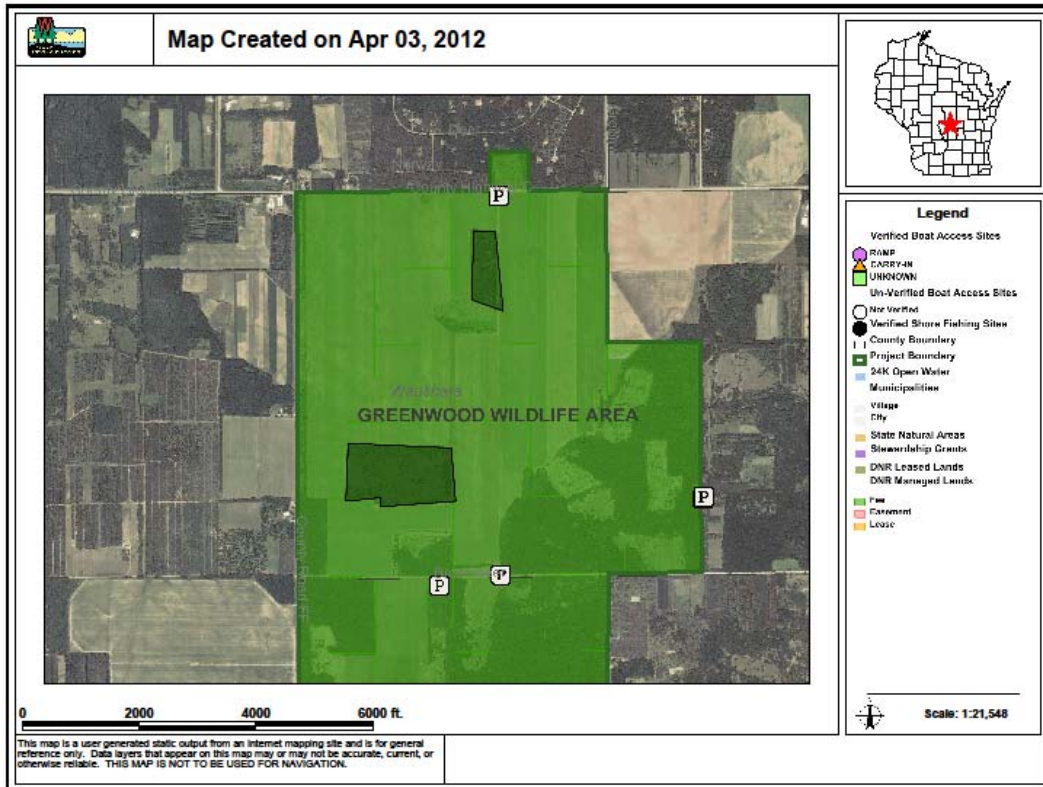
- The greatest single factor in delaying the implementation of this grant was the development of the mandatory QAPP which turned out to be far more complicated and difficult than anticipated. It required the development of a new vegetation survey method that collects quantitative data measuring vegetative composition and structure on treatment sites. This challenge was described in more detail in the previous six month report.
- The project continues to move slowly because of staff vacancies and staff reductions on several of the participating properties.

Photo Gallery

Before/after photos of brush reduction project on White River Wildlife Area



Map of mowing completed for Greenwood Wildlife Area Winter, 2012



Prescribed burn on White River Wildlife Area Spring, 2012

Burn in Progress



Completed Burn

