Building Wetlands for Rare Species of Amphibians

©Thomas R. Biebighauser
tombiebighauser@gmail.com
www.wetlandsandstreamrestoration.org

Northern red-legged frog
Wood Frog
*Lithobates Rana* sylvatica
Bluegill

Largemouth bass
Chiricahua leopard frog
*Lithobates [Rana] chiricahuensis*
Chiricahua Leopard frog range

MAP. Solid circle marks the type-locality; open circles indicate other localities.
It is estimated that Chiricahua leopard frogs are absent from >75% of their historical localities.
Adult Home Range

- Male home range
  - Dry season mean = 161.0 m$^2$
  - Wet season mean = 375.7 m$^2$

- Female home range
  - Dry season mean = 57.1 m$^2$
  - Wet season mean = 92.2 m$^2$
Belostomatids
(giant water bugs)

Dytiscids
(predaceous diving beetles)

Notonectids
(backswimmers)

Anisopterans
(dragonflies)
Build a variety of wetlands in one area
Northern Red-legged Frog  (Rana aurora)
Bluegill sunfish
N. Red-legged frog breeding site on Vancouver Island

2640 m² (0.26 ha)
- Low canopy cover
- Relatively shallow (< 1.5 m in early spring)
- Mix of open water and emergent vegetation
- Low amount of large woody debris (< 10%)
- Ephemeral, dries by September
- No fish
Marginal N. Red-legged frog breeding site

153 m² (0.015 ha)

- Smaller
- Canopy cover
No Red-legged Frog breeding site
371 m² (0.037 ha)
- Hardhack (Spiraea) growing into wetland

Marginal Red-legged Frog breeding site
750 m² (0.075 ha)
- Dense hardhack (Spiraea) swamp
- Dries quickly
Great Basin Spadefoot

*Scaphiopus intermontanus*
Range of the Great Basin Spadefoot in the United States
Range of the Great Basin Spadefoot in Canada
Long Pasture Wildlife Sanctuary
Presents:
A Hands-On Wetland Restoration Workshop for Professionals

Part of the Long Pasture Wetland Restoration Project

Hosted by: Mass Audubon
In collaboration with:
- Center for Wetlands and Stream Restoration
- Partners in Amphibian and Reptile Conservation
- Grassroots Wildlife Conservation
- USFWS Partners for Fish and Wildlife Program

Dates: June 25-26, 2013
Location: Long Pasture Wildlife Sanctuary, Barnstable, MA
Wetland Restoration and Creation Workshop
June 11 & 12, 2013
Flagstaff, Arizona
Become involved in the restoration of a wetland from an impacted spring to benefit rare species of wildlife
For more information, e-mail: dtaylor@batcon.org