



# Nature's Second Chance

Restoring the Ecology of Stone Prairie Farm

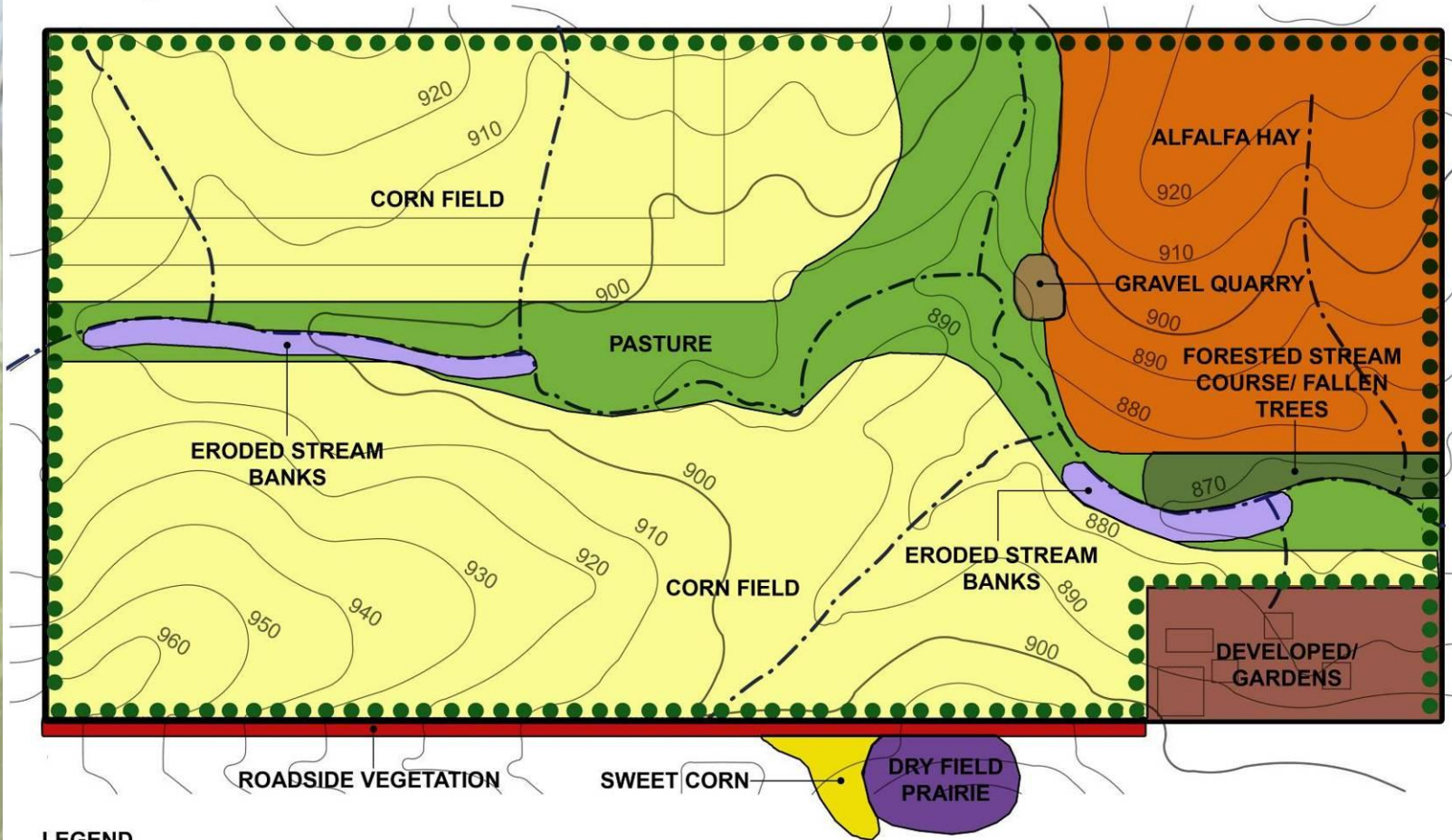
Steven I. Apfelbaum

Foreword by Nina Leopold Bradley

A photograph of a two-story house with solar panels on the roof, partially obscured by tall grass and trees. The house is yellow with a brown roof. The background shows mountains under a blue sky with white clouds. The text "The Restoration Process" is overlaid in a black, cursive font.

# *The Restoration Process*

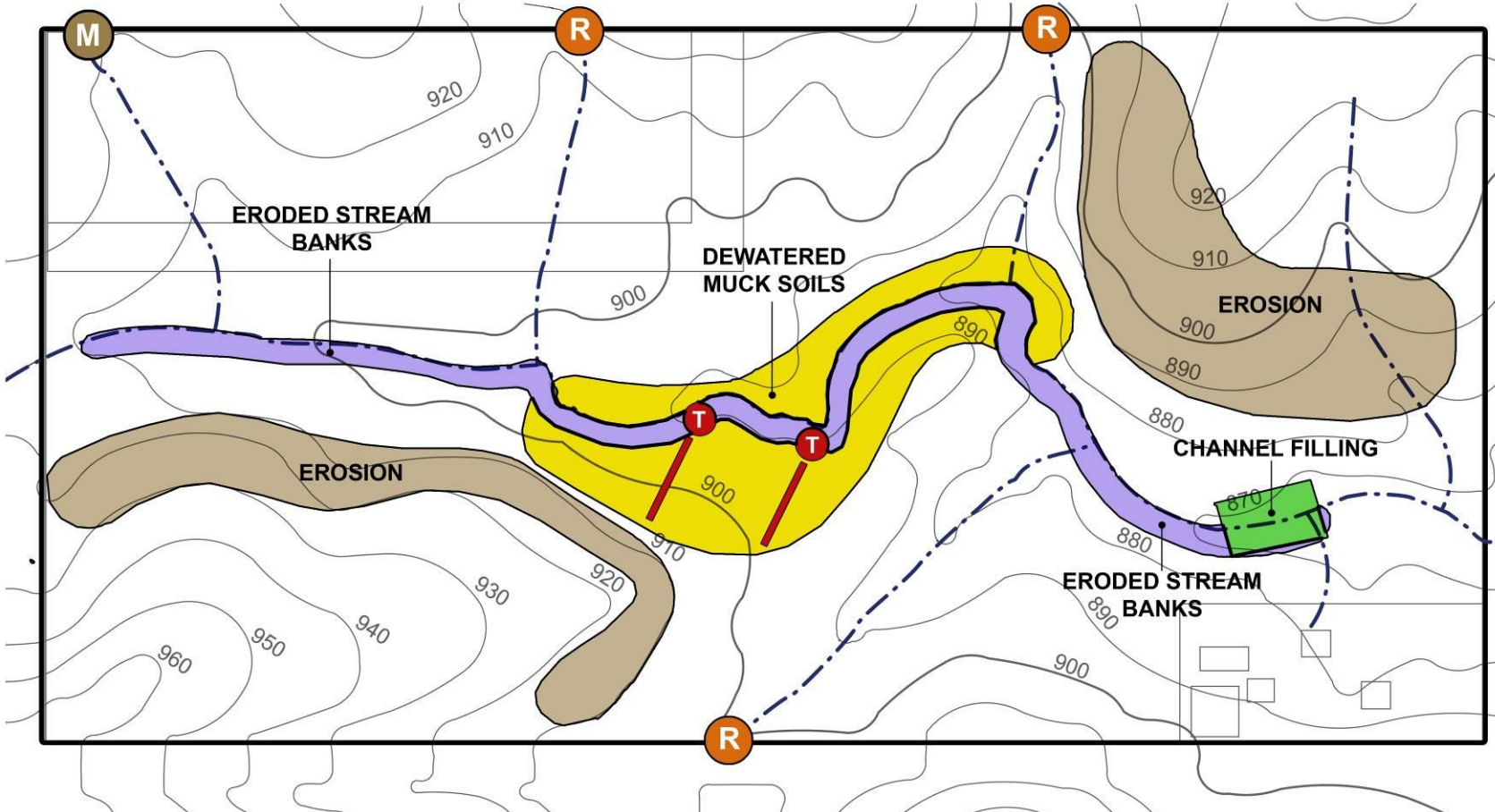
# Existing Conditions












## LEGEND

- |   |   |  |  |
|---|---|--|--|
|  Corn Field  |  Roadside Vegetation |  Dry Field Prairie   |  Forested Stream Course<br>Fallen Trees |
|  Sweet Corn  |  Developed/ Gardens  |  Eroded Stream Banks |  Tree Row                               |
|  Alfalfa Hay |  Gravel Quarry       |  Pasture             |  Stream Course                          |

# Stressors & Land Change (1981)



## LEGEND

- |  |   |  |
|--|---|--|
|  Erosion              |  Eroded Stream Banks |  Manure Runoff   |
|  Dewatered Muck Soils |  Tile Course         |  Enriched Runoff |
|  Channel Filling      |  Tile End            |  Stream Course   |

# Spring Creek Reserve Plans

Green County,  
Wisconsin

## Existing Conditions

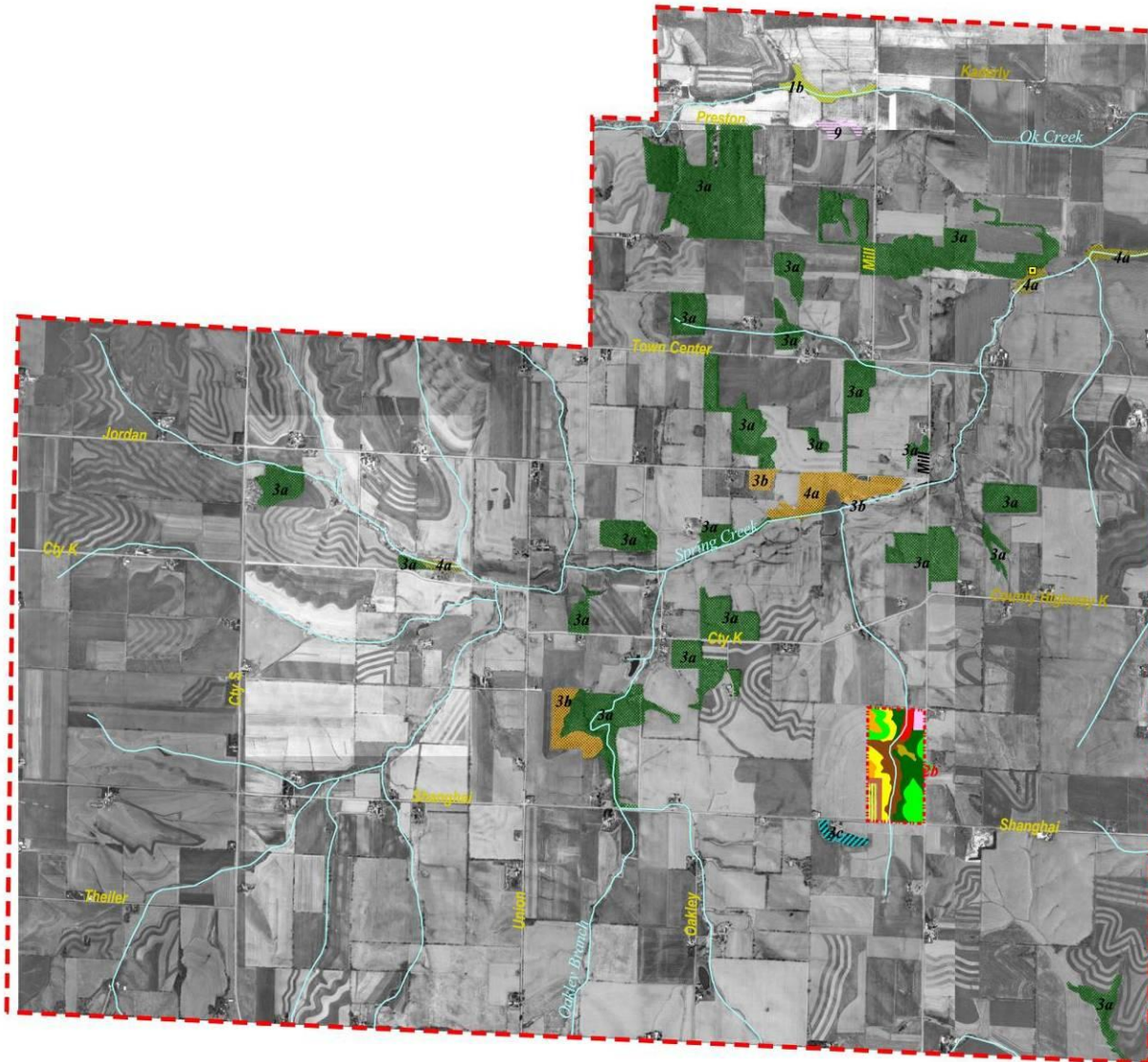
### Legend

- Spring Creek Reserve Boundary
- River or Creek
- Apfelbaum Farm
- Land Cover (Apfelbaum Farm)**
- Barley
- Big Bluestem
- Corn
- Garden, Buildings
- Indian Grass
- Little Bluestem
- Phragmites
- Savanna
- Sedges, Savanna, Grasses
- Spartina
- Land Cover**
- 1: Developed
- 2a: Ag
- 2b: Prairie
- 2c: Old-Field
- 3a: Mesic Forest
- 3b: Savanna
- 3c: Plantation
- 3d: Fence Row
- 4a: Floodplain Forest
- 4b: Reed Canary Grass
- 4d: Sedge Meadow
- 4e: Lawn
- 6: Open Water
- 1b: Disturbed Forest
- Bed rock Out Crop

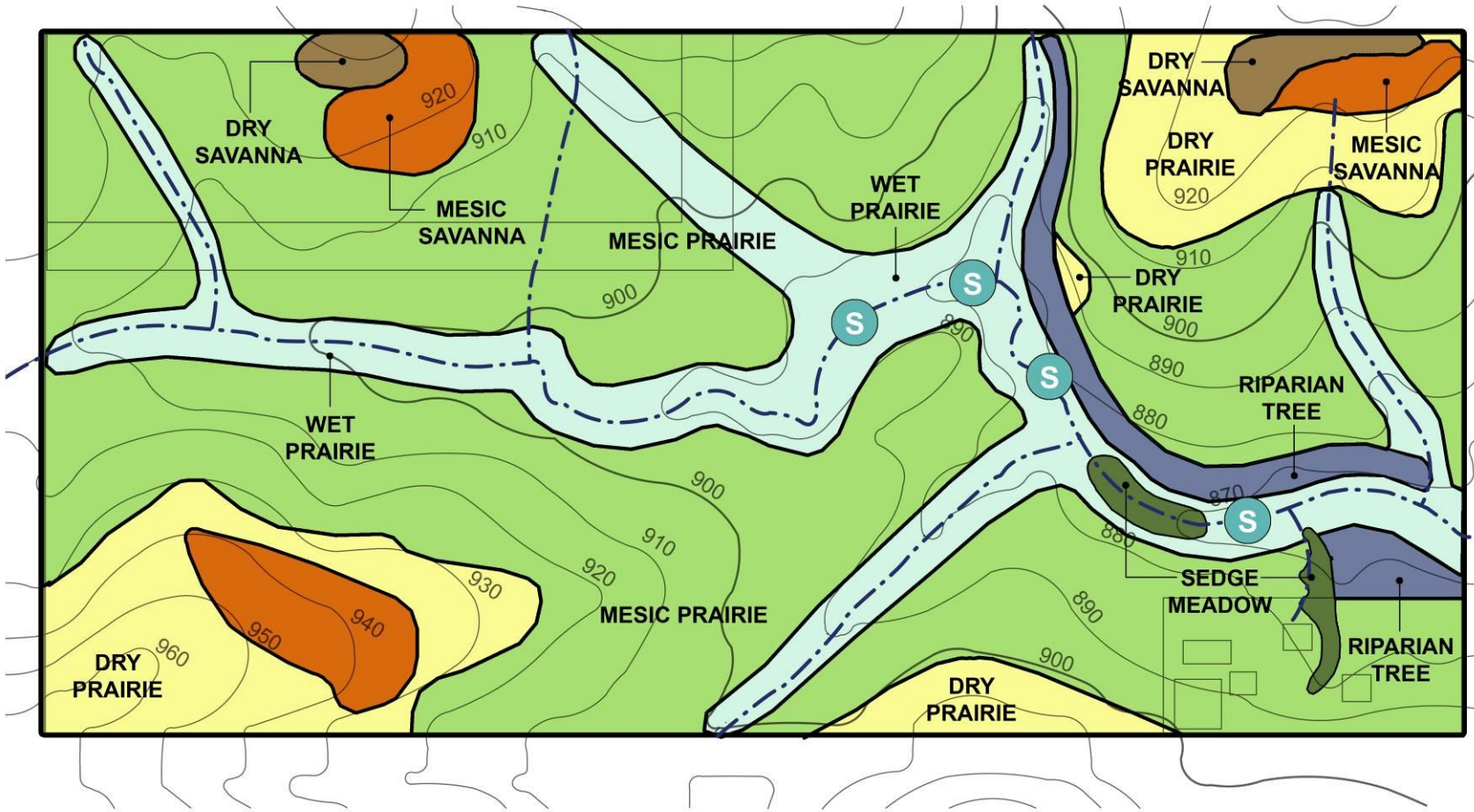


Mapped by: j.l.c.  
Date: 11.03.02  
AES: 02-627  
Source: USGS

Applied  
Ecological  
Services, Inc.



# Refined Restoration Plan



## LEGEND



A photograph of a house with solar panels on the roof, partially obscured by tall grass and trees. The house is a two-story structure with a brown roof and light-colored siding. The solar panels are mounted on the roof, and the house is surrounded by lush greenery. The text is overlaid on the image in a black, cursive font.

*Learned About Ourselves  
and Neighbors*









A photograph of a house with solar panels on the roof, partially obscured by tall grass and a large tree. The house is a two-story structure with a brown roof and light-colored siding. The solar panels are mounted on the roof. The foreground is dominated by tall, green grass and a large, leafy tree on the right side. The background shows a blue sky with white clouds and a range of mountains.

*Worked with the Land*

# *Seed Collections*



# Gardening



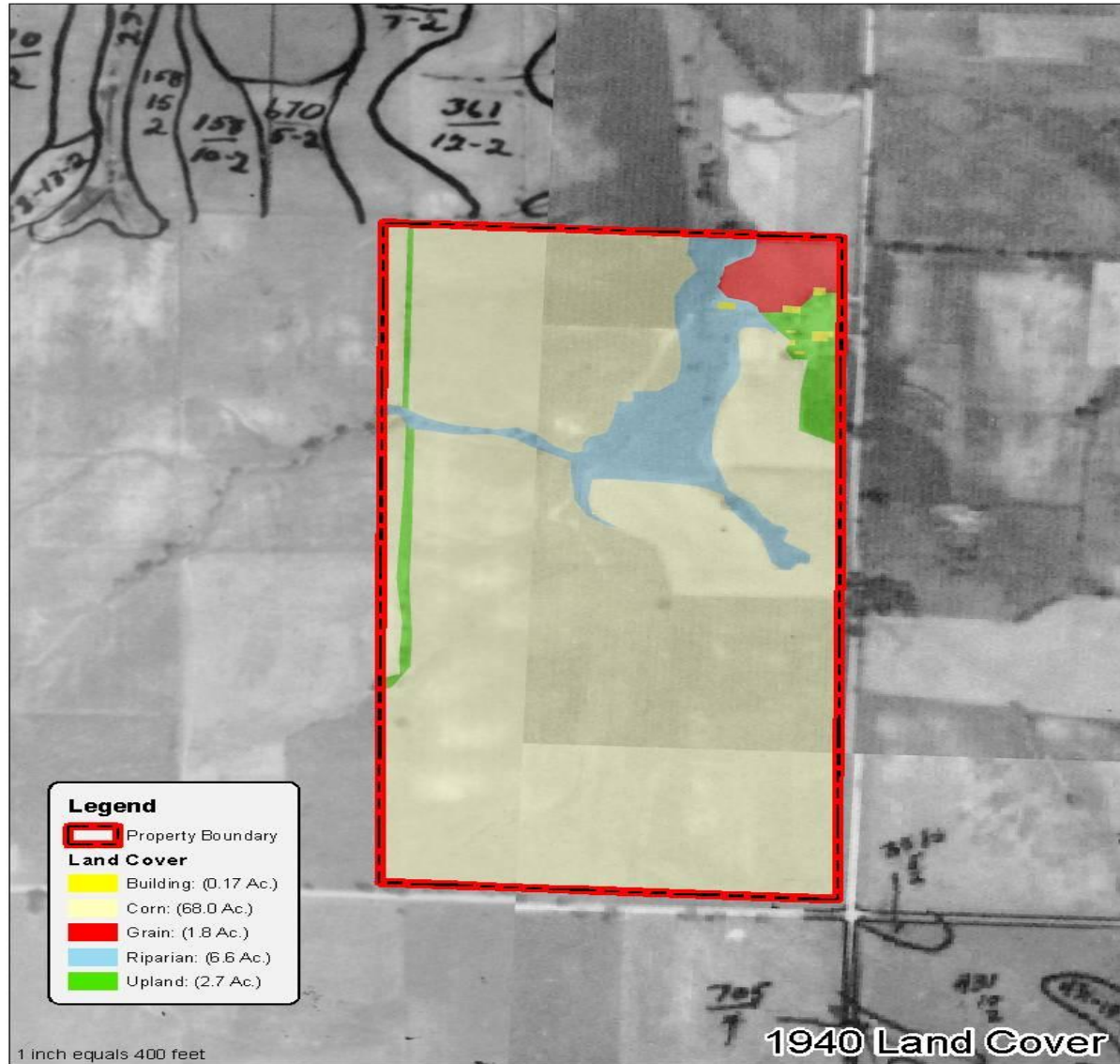
# Root Cellar



A photograph of a two-story house with solar panels on the roof, surrounded by tall grass and trees, with mountains in the background. The image is semi-transparent, allowing the text to be overlaid.

*... and the Land Responded*

# 1940 Land Cover





*October 2008*



# 2001 Land Cover



# *Prescribed Burning*



# *Prescribed Burning*

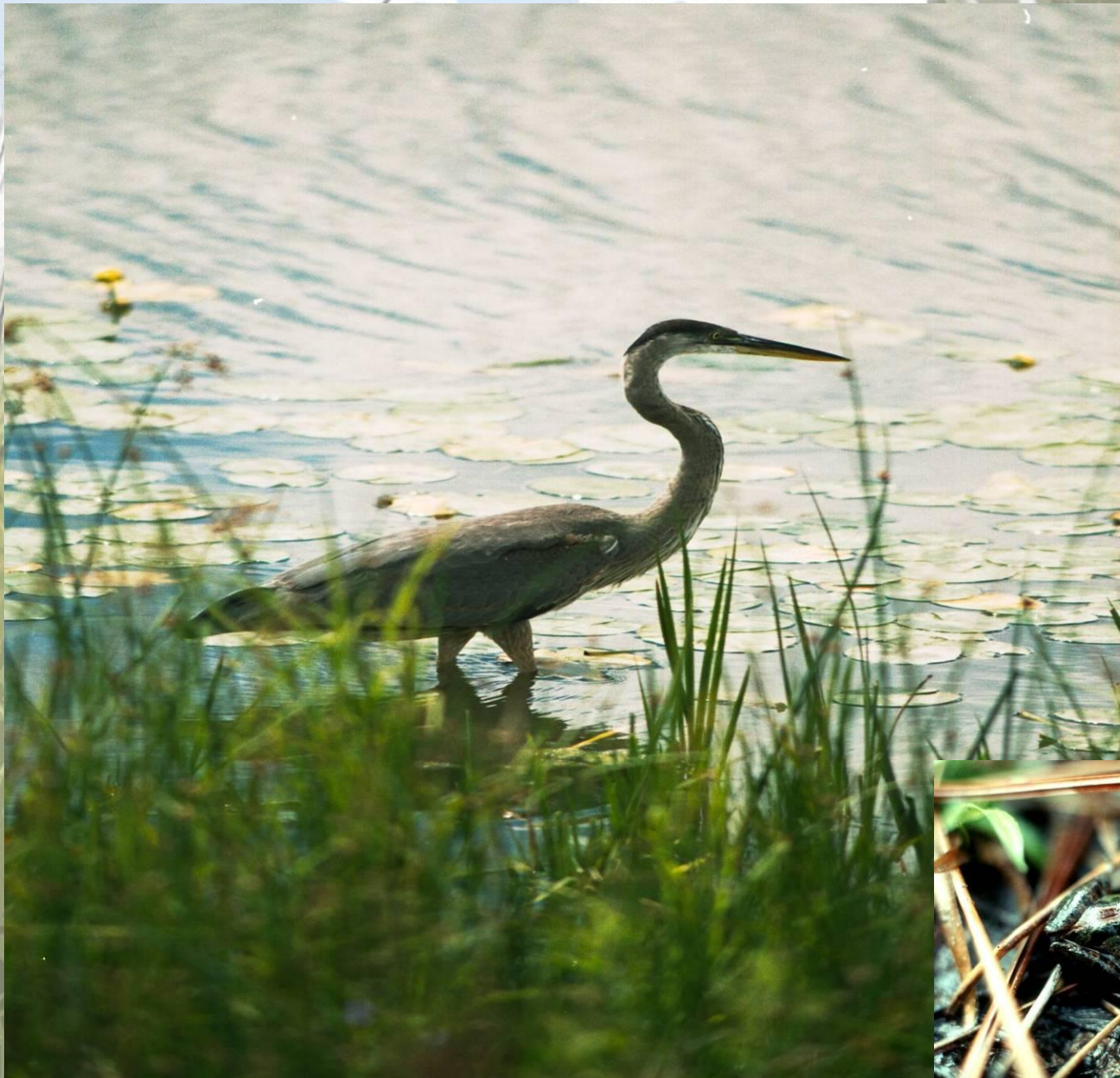


# *Prescribed Burning*



A photograph of a house with solar panels on the roof, partially obscured by tall grass and trees. The house is a two-story structure with a brown roof and light-colored siding. The solar panels are mounted on the roof. The house is surrounded by lush green vegetation, including tall grasses in the foreground and trees on the right. The sky is blue with some white clouds.

*... and Wildlife and Vegetation  
Responded*





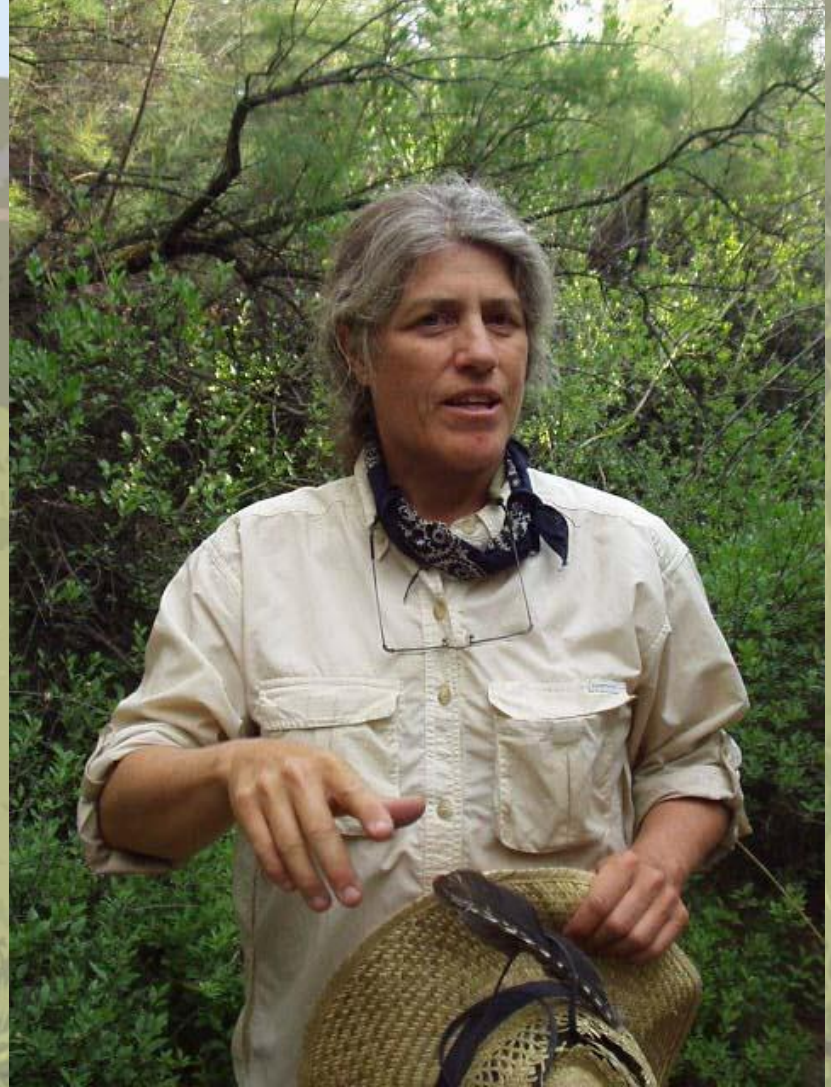






**Whooping cranes Returning Home**

# *We've Aged*

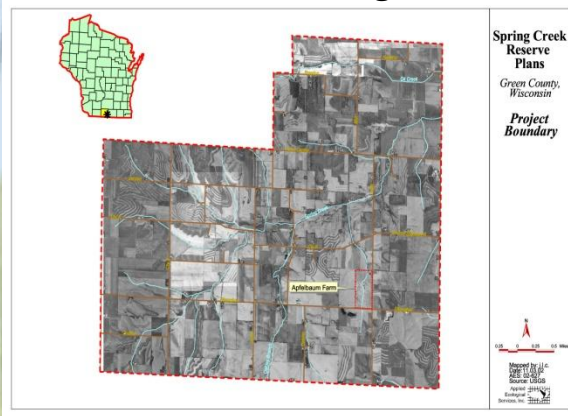


# Response of Life—Number of Species

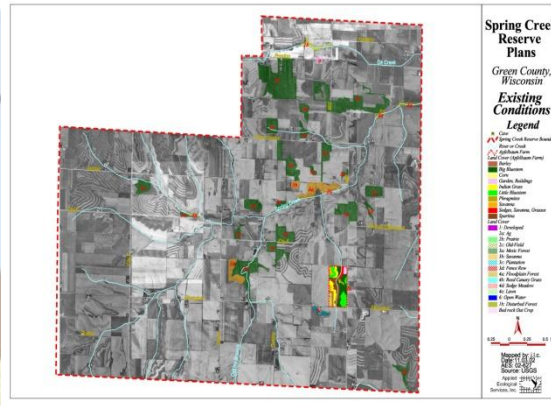
Species	Historic	1981	2008
Vegetation	>300	131	324
Amphibians*	>8	3	7
Birds*	>103	39	115
Reptiles*	11	0	5
Mammals*	>23	18	25
Fishes*	26	1	10

\*Present during Nesting and Breeding Seasons

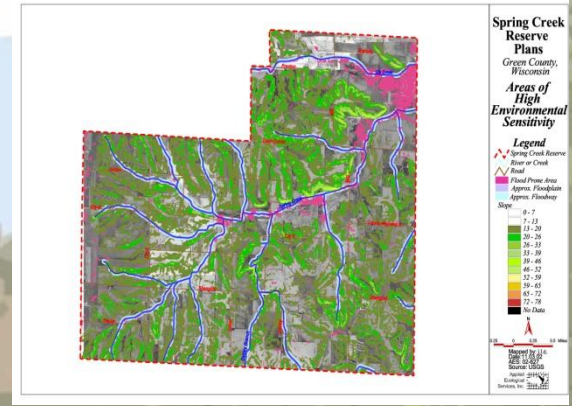
# Ecological Restoration GIS Model, Spring Creek, Green County, Wisconsin



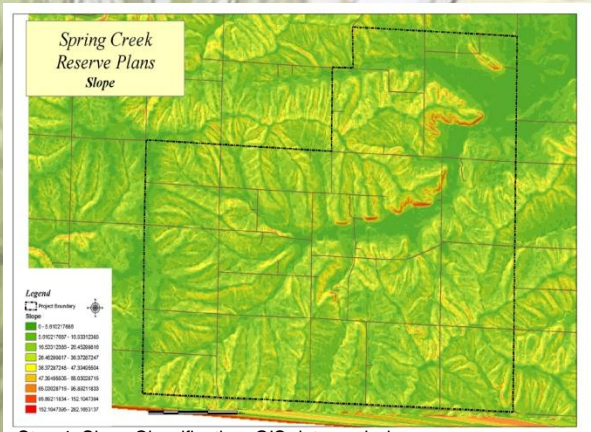
Step 1: Location Map, GIS data base development



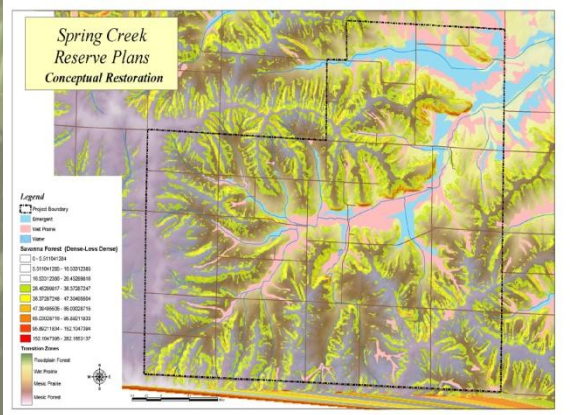
Step 2: Existing Conditions Map, GIS data creation



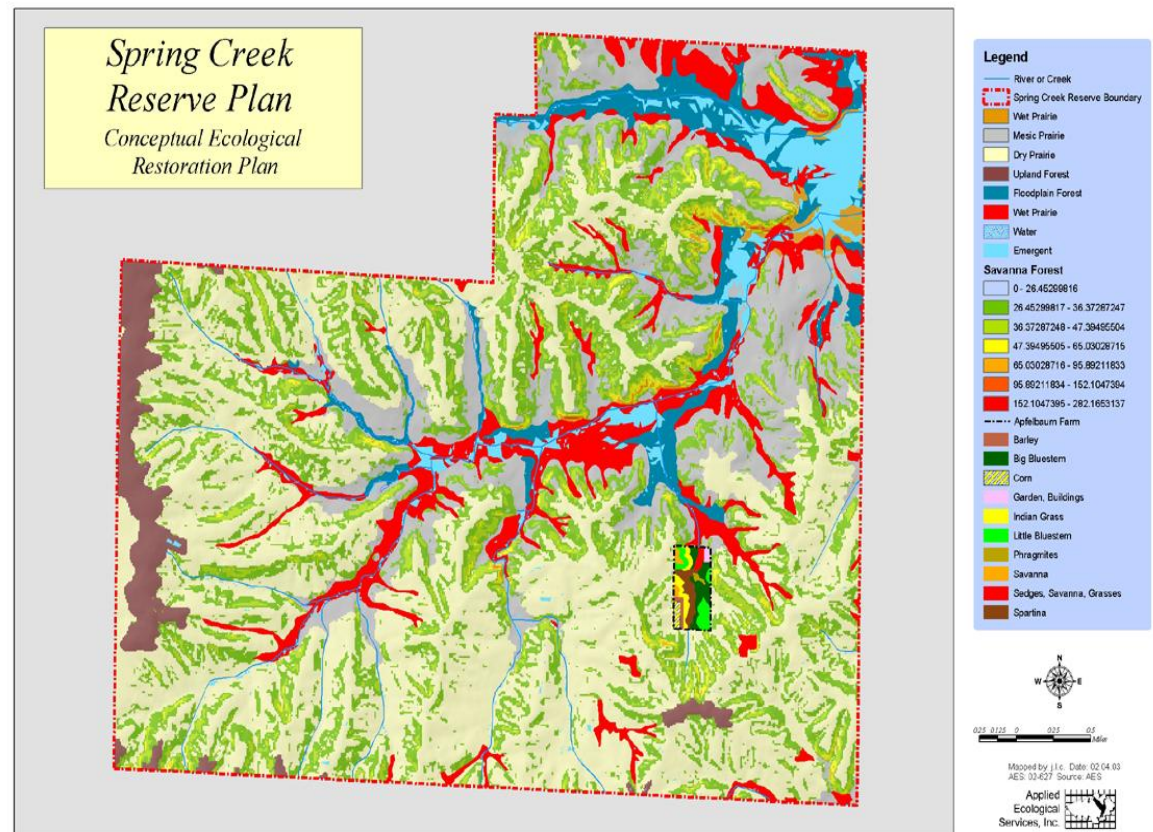
Step 3: Environmental Sensitivity Map, GIS data organization and overlay



Step 4: Slope Classification, GIS data analysis



Step 5: Preliminary Concept Map, GIS data analysis and model development



Step 6: Conceptual Ecological Restoration Map, GIS data analysis and model execution

Mapped by J.L.C. Date: 02/04/03

AES: 10/02/07 Source: AES

Applied Ecological Services, Inc.

A photograph of a two-story house with a brown roof and solar panels. The house is partially obscured by tall grass in the foreground and trees on the right. The sky is blue with some clouds. The text "What's Become of AES, Inc.?" is overlaid on the image in a black, cursive font.

*What's Become of AES, Inc.?*

# *Applied Ecological Services, Inc*

## *Durient Creations*



From our five offices in the United States, we have managed and/or worked on projects in 37 states and the District of Columbia, plus three Canadian Provinces, seven foreign countries and one US commonwealth.

# Taylor Creek Restoration Nursery

- Seed
- Plants
- Trees & Shrubs
- Custom Seed Cleaning
- Contract Growing
- Genetic Radius Species



*Taylor Creek Restoration Nursery Greenhouse;  
Brodhead, WI*



*Taylor Creek Restoration Nursery Seed Barn;  
Brodhead, WI*





# Consulting

- Design Collaboration
- Ecological Assessment
- Engineering
- Expert Witness



- ~30 million acres of projects at this time

# Contracting

- Design – Build
- Bid - Build
- Bioengineering
- Eco - Construction
- Seeding
- Planting
- Erosion Control
- Woodland Brushing
- Ecological Management
- Value-Added Engineering
- Maintenance



*Fort Sheridan Ravine Restoration; Highland Park, IL*

A photograph of a two-story house with solar panels on the roof, set in a rural landscape with tall grass and trees. The background shows a range of mountains under a blue sky with white clouds. The text "Thank You!" is overlaid in a black, cursive font.

*Thank You!*