U.S. Geological Survey and Michigan State University Questionnaire to Land Managers for the Efficacy of Oak Sav

Dear property manager/partner, thank you for agreeing to provide management data for the sites that you mana energy you have already offered to assist our efforts to better understand oak savanna restoration in the upper N field data we collected, we would like to assemble information on the management history of each site we samp exact inferences on the effects of management, and compare the importance of management to pre-managemer allow us to examine the relationships among oak savanna vegetation condition (composition, richness, diversity, actions such as burning, thinning, seeding or other management actions. We have employed dropdown menus for spreadsheet to make your task as easy as possible. Thanks.

Office of Management and Budget (OMB) number: TBD

Geographic scope of study: northeast Illinois, northwest Indiana, lower Michigan, northwest Ohio and southeast W

Three tabs: there are three tabs. The first is the "Data Entry Form" where you will enter your data. The second cont tab lists the menus that populate the dropdown windows in the data entry form. You should not need to change the

Data entry: Go to the tab labeled "Data Entry Form" that has a combination of drop-down menus and manual data "management event" separately for each site we sampled, that is one event per line. *First*, select a site from the dru triangle that appears at the lower right of the cell – we have provided you with a map indicating where each site in ask if you are not sure. *Second*, indicate the management event you are reporting. We are interested in two catego occurrence of specific management events that may encourage restoration - Fire – Prescribed and Wildfire, Thinnin Addition and 2) The data of cessation of intensive management events: Tillage and Grazing. Therefore, if a site was had seed added 1 time, and has both a known tillage and grazing history, that site would have 8 lines of data. *Third*, you know. Fourth, if you only know the year, then please provide the Season that management occurred, if you know own words any additional info you wish to share about the types of management specifically and any other random site you think might be relevant or useful. If the date or year is approximate, please clarify that in the "managemen labeled "Example Data" that gives an indication of what kinds of info should go in each column. Finally, we would lia available institutional) knowledge of management goes at your site(s). For example, if you have detailed records ba 1980, and no records before that – we would love to know. We may follow up with a phone call to clarify those kind summarized below.

Thank you: Eric Behrens, Dr. Tyler Bassett, Dr. Lars Brudvig, Dr. Noel Pavlovic and Dr. Ralph Grundel

If you have questions contact Eric Behrens at eric.g.behrens@gmail.com, (712)330-7189

The questions are:

Question 1: Site – the name of the site is selected, needed to relate site management information to vegetation data

Question 2: Type of management – options include, these items tell us about the management. that has occurred at ea us understand how management has influenced the ground layer vegetation. Each management event will be a separa

Fire - Prescribed (list date it occurred)

Fire - Wildfire (list date it occurred)

Thinning - Canopy (list date it occurred)

Thinning - Shrub (list date it occurred)

Seed addition (list date it occurred)

Tillage (list date it stopped)

Grazing (list date it stopped)

Question 3: Year, the year that the selected management type occurred. If known. Without this information we canno variables such as fire return interval.

Question 4: Month, the month the selected management occurred if known.

Question 5: Day, the day of the month when the selected management occurred, if known.

Question 6: Season – season of the treatment, if known. If the month and day are not known but the manager can tell examine the seasonality of treatment on groundlayer vegetation condition.

Question 7: Describing anything specific about the management: opportunity for manager to provide additional informevent such as partial burn or high intensity burn

Question 8: Additional notes, any other notes that the manager wants to add.

	DROPDOWN MENUS	
Site	Type of Management Year Month Day Season	

<u>MANUAL DATA ENTRY</u> Describing anything specific about the management

Additional notes

D	ROPDOWN MENUS					
Site	Type of Management	Year	Month	Day	(Blank)	Season
SWMLC - Chipman East Woods Burn Only	Fire (Date it occurred)	2007	4	3		
SWMLC - Myers	Thinning - Canopy (Date it occurred)	2006				
SWMLC - Myers	Thinning - Shrub (Date it occurred)	2009	9			
Other	Seed addition (Date it occurred)	2007				Fall
Other	*Tillage (Date it stopped)	1947				
Other	*Grazing (Date it stopped)	1986				
Other	Fire (list date it occurred)	1965				

MANUAL DATA ENTRY

Management Notes

Timber cut - shelterwood, targeted _____ size class

Loppers and herbicide

I will email species list separately

Either occurred in 1964 or 1965

Other Notes

Site never productive

This was a wildfire set by sparks from the Such-andsuch train line

Site ASGA - 126th Ave. Barrens ASGA - 126th Ave. Control ASGA - 126th Ave. Timber Cut ASGA - 46th Ave ASGA - 48th Ave. Dunes State Park - Control Dunes State Park - Burn Dunes State Park - Burn-Thin FCTC - Area 7 SE "mound" FCTC - Hart's Lake West Woods Indiana Nature Preserves McCloskey Burr Oak Savanna Shirley Heinze Land Trust Bur Oak Woods Burn-Thin Save The Dunes Peddicord Property South Control Indiana Dunes - Calumet Burn Only Indiana Dunes - Calumet Control Indiana Dunes - Calumet Thin Only Indiana Dunes - Hobart Prairie Grove Burn Only Indiana Dunes - Howe's Prairie Burn Only Indiana Dunes - Howe's Prairie Burn-Thin Indiana Dunes - Howe's Prairie Control Indiana Dunes - Inland Marsh Control Indiana Dunes - Inland Marsh Burn-Thin Indiana Dunes - Inland Marsh Burn Indiana Dunes - Miller Woods Control Indiana Dunes - Miller Woods Burn-Thin Indiana Dunes - Miller Marguette Burn Iron Creek - Andy's Hill Iron Creek - Coyote Hill Iron Creek - Krause Control Iron Creek - Sybil 001 Burn-Thin Kalamazoo - KVCC Control Kitty Todd - Islands Control Kitty Todd - Karner Burn-Thin Kitty Todd - Schafer Burn Only Kitty Todd - Schafer Burn-Thin Kitty Todd - Schwamberger Burn-Thin LCWM - B.D. White Burn-Thin LCWM - B.D. White Control Lowell - Huck Hills MacCready - Plot 1 Burn Only

Type of Event

Fire - Prescribed (list date it occurred) Fire - Wildfire (list date it occurred) Thinning - Canopy (list date it occurrec Thinning - Shrub (list date it occurred) Seed addition (list date it occurred) Tillage (list date it stopped) Grazing (list date it stopped)

MacCready - Plot 2 Burn-Thin MacCready - Plot UN11 Control Manistee NF - Hayes Thin Only Manistee NF - Hayes Burn-Thin Manistee NF - Hayes Control Manistee NF - Otto Control Manistee NF - Otto Roosevelt East Manistee NF - Otto Roosevelt West Manistee NF - Pines Point Burn Only Manistee NF - Pines Point Burn-Thin Manistee NF - Pines Point Control Manistee NF - Pines Point Thin Only OO Metropark - Eber Thin Only OO Metropark - Old State Line Control SWMLC - Chipman East Woods Burn Only SWMLC - Keka SWMLC - Myers SWMLC - Portman Mud Lake Hill SWMLC - Wolf Tree N Kettle Hill Other

Year	Mon	ith Day	
	2017	1	1
	2016	2	2
	2015	3	3
	2014	4	4
	2013	5	5
	2012	6	6
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