

DOCKETED

Docket Number:	08-AFC-08A
Project Title:	Hydrogen Energy Center Application for Certification Amendment
TN #:	201689
Document Title:	Hydrogen Energy California Jurisdictional Delineation Update
Description:	N/A
Filer:	URS
Organization:	URS Corporation
Submitter Role:	Applicant Consultant
Submission Date:	2/10/2014 10:32:26 AM
Docketed Date:	2/10/2014



February 7, 2014

Mr. Jason Deters
Project Manager, California South Branch
U.S. Army Corps of Engineers
Sacramento District, Regulatory Division
1325 J Street, Room 1350
Sacramento, California 95814-2922

Re: Hydrogen Energy California Jurisdictional Delineation Update

Dear Mr. Deters:

The enclosed update to the Hydrogen Energy California Jurisdictional Delineation is submitted on behalf of Hydrogen Energy California, LLC. Based on your discussion with URS on December 20, 2013, the Jurisdictional Delineation has been updated to exclude the California Aqueduct from the study area. The tables that summarize the area of each feature have been revised for consistency with the updated delineation and our current understanding of the jurisdictional status of the features. The enclosed tables and maps supersede the information previously submitted on September 9, 2013. We understand that the updated jurisdictional delineation will be verified following USACE review of the enclosed information.

Please contact Steve Leach, at (510) 874-3205 or Jan Novak at (510) 874-1733 if you have any questions regarding the enclosed documents.

Sincerely,

URS Corporation

Dale Shileikis
Vice President, Project Manager
URS Corporation

Enclosures:

- JD Maps Mapped Wetland and Waters of the U.S. within the Study Area
- Table A Area of Delineated Features within the HECA Study Area
- Table B Area of Delineated Features within the OEHI Study Area
- Table C Summary of All Delineated Features within the HECA and OEHI Study Areas

cc: Marisa Mascaro, HECA
John Heiser, CEC

Table A
Area of Delineated Features within the HECA Study Area

Feature ID	Feature Area (square feet)	Feature Area (acre**)
WUS 54 (Kern River, Flood Control Channel)	11,826	0.27
Total Area of Potential Waters of the U.S.	11,826	0.27
NJ 01 (Westside Canal)	2,247,865	51.60
NJ 02	1,135	0.03
NJ 05	734	0.02
NJ 07	726	0.02
NJ 08	1,517	0.03
NJ 09	1,369	0.03
NJ 10	2,352	0.05
NJ 11	22,484	0.52
NJ 12	1,808	0.04
NJ 13	16,654	0.38
NJ 14	29,049	0.67
NJ 15	2,940	0.07
NJ 16	551	0.01
NJ 17	2,346	0.05
NJ 18	15,714	0.36
NJ 19	9,173	0.21
NJ 20	14,014	0.32
NJ 21	10,032	0.23
NJ 22	13,731	0.32
NJ 23	1,359	0.03
NJ 24	13,601	0.31
NJ 25	63,222	1.45
NJ 26	16,889	0.39
NJ 27	3,635	0.08
NJ 28 (Outlet Canal)	207,865	4.77
NJ 29	31,771	0.73
NJ 30	46,857	1.08
NJ 31	78,742	1.81
NJ 32	122,443	2.81
NJ 33	34,970	0.80
NJ 34	30,703	0.70
NJ 35	7,754	0.18
NJ 36	832	0.02

Feature ID	Feature Area (square feet)	Feature Area (acre**)
NJ 37	17,057	0.39
NJ 38	2,202	0.05
NJ 39	61,703	1.42
NJ 40	8,696	0.20
NJ 41	30,523	0.70
NJ 42	1,592	0.04
NJ 43	8,304	0.19
NJ 44	5,516	0.13
NJ 45	100	0.00
NJ 46	1,887	0.04
NJ 47	1,660	0.04
NJ 50	4,558	0.10
NJ 51	841	0.02
NJ 52	1,727	0.04
NJ 54 (Eastside Canal)	29,978	0.69
NJ 55	17,123	0.39
NJ 56	9,052	0.21
NJ 60	10,881	0.25
NJ 62	38,672	0.89
NJ 63	180	0.00
NJ 64	107	0.00
NJ 65	464	0.01
NJ 66	4,624	0.11
NJ 67	3,213	0.07
NJ 68	354	0.01
NJ 69	2,108	0.05
NJ 70	1,121	0.03
NJ 71	810	0.02
WL 1*	51	0.00
WUS 01*	5	0.00
WUS 05*	892	0.02
WUS 06*	2,140	0.05
WUS 07*	1,105	0.03
WUS 24*	1,096	0.03
WUS 25*	5,530	0.13
WUS 26*	842	0.02
WUS 27*	373	0.01
WUS 28*	648	0.01
WUS 29*	4,521	0.10

Feature ID	Feature Area (square feet)	Feature Area (acre**)
WUS 30*	743	0.02
WUS 31*	4,552	0.10
WUS 32*	2,619	0.06
WUS 33*	4,407	0.10
WUS 34*	291	0.01
WUS 35*	8,918	0.20
WUS 36*	5,334	0.12
WUS 37*	1,724	0.04
WUS 38*	12,083	0.28
WUS 39*	3,169	0.07
WUS 40*	1,608	0.04
WUS 41*	660	0.02
WUS 63*	5	0.00
WUS 64*	132	0.00
Total Area of Other Delineated Features	3,383,338	77.67

Notes:

* Pending review by the USACE, these features are anticipated to be determined to be isolated and not jurisdictional.

** Acreage totals are rounded from square feet. Totals less than 0.005 are rounded to 0.00.

Table B
Area of Delineated Features within the OEHI Study Area

Feature ID	Feature Type	Feature Area (square feet)	Feature Area (acre*)
NJ OEHI 01	ephemeral drainage	100	0.00
NJ OEHI 02	ephemeral drainage	336	0.01
NJ OEHI 03	ephemeral drainage	295	0.01
NJ OEHI 04	ephemeral drainage	209	0.00
NJ OEHI 05	ephemeral drainage	167	0.00
NJ OEHI 06	ephemeral drainage	149	0.00
NJ OEHI 07	ephemeral drainage	486	0.01
NJ OEHI 08	ephemeral drainage	775	0.02
NJ OEHI 09	ephemeral drainage	5,103	0.12
NJ OEHI 10	ephemeral drainage	942	0.02
NJ OEHI 11	ephemeral drainage	3,319	0.08
NJ OEHI 12	ephemeral drainage	2,273	0.05
NJ OEHI 13	ephemeral drainage	674	0.02
NJ OEHI 14	ephemeral drainage	1,329	0.03
NJ OEHI 15	ephemeral drainage	3,826	0.09
NJ OEHI 16	ephemeral drainage	606	0.01
NJ OEHI 17	ephemeral drainage	382	0.01
NJ OEHI 18	ephemeral drainage	353	0.01
NJ OEHI 19	ephemeral drainage	237	0.01
NJ OEHI 20	ephemeral drainage	70	0.00
NJ OEHI 21	ephemeral drainage	167	0.00
NJ OEHI 22	ephemeral drainage	59	0.00
NJ OEHI 23	ephemeral drainage	239	0.01
NJ OEHI 24	ephemeral drainage	1,344	0.03
NJ OEHI 25	ephemeral drainage	1,118	0.03
NJ OEHI 26	ephemeral drainage	569	0.01
NJ OEHI 27	erosional feature	2,081	0.05
NJ OEHI 28	erosional feature	2,005	0.05
NJ OEHI 29	erosional feature	735	0.02
NJ OEHI 30	erosional feature	789	0.02
NJ OEHI 31	erosional feature	222	0.01
NJ OEHI 32	erosional feature	187	0.00
NJ OEHI 33	erosional feature	696	0.02
NJ OEHI 34	erosional feature	335	0.01
NJ OEHI 35	erosional feature	800	0.02
NJ OEHI 36	erosional feature	858	0.02
NJ OEHI 37	erosional feature	506	0.01

Feature ID	Feature Type	Feature Area (square feet)	Feature Area (acre*)
NJ OEHI 38	erosional feature	1,037	0.02
NJ OEHI 39	erosional feature	1,343	0.03
NJ OEHI 40	isolated wetland	276	0.01
NJ OEHI 41	isolated wetland	27	0.00
NJ OEHI 42	isolated wetland	85	0.00
Total Area of Other Delineated Features		37,109	0.85

Notes:

*Acreage totals are rounded from square feet. Totals less than 0.005 are rounded to 0.00.

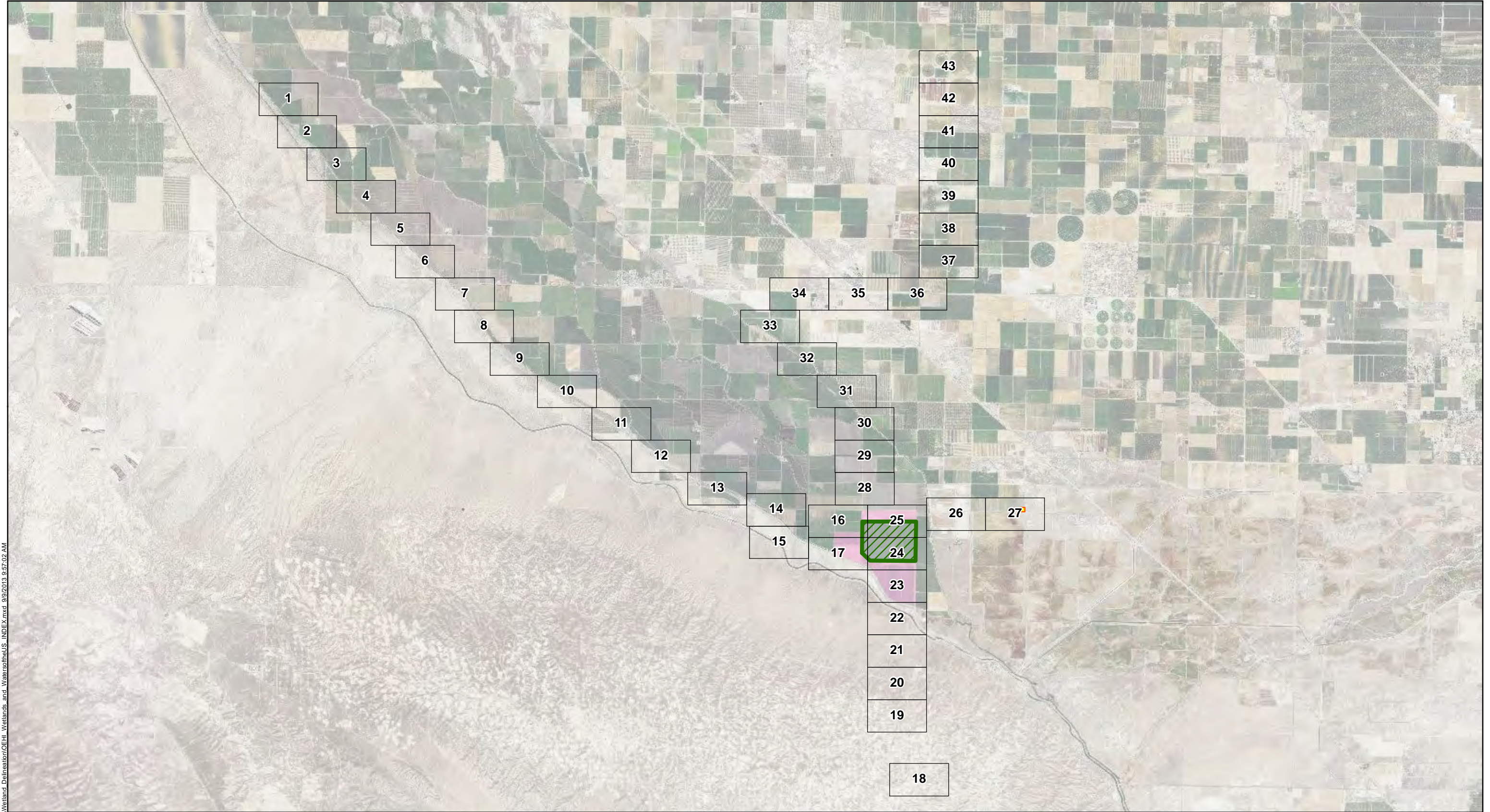
Table C
Summary of All Delineated Features Within the HECA and OEHI Study Areas

Feature Jurisdiction*	Project Study Area	Area (square feet)	Area (acre**)
Potential Waters of the U.S.	HECA (see Table A)	11,826	0.27
	OEHI	--	--
TOTAL AREA OF POTENTIAL WATERS OF THE U.S.		11,826	0.27
Other delineated features	HECA (see Table A)	3,383,338	77.67
	OEHI (see Table B)	37,109	0.85
TOTAL AREA OF OTHER DELINEATED FEATURES		3,420,447	78.52

Notes:

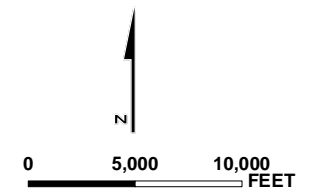
* Jurisdictional status pending review by the USACE; some features may be determined to be isolated and not jurisdictional.

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- Project Site
- Controlled Area
- PG&E Switching Station



MAPPED WETLANDS AND OTHER WATERS OF THE UNITED STATES WITHIN THE STUDY AREA

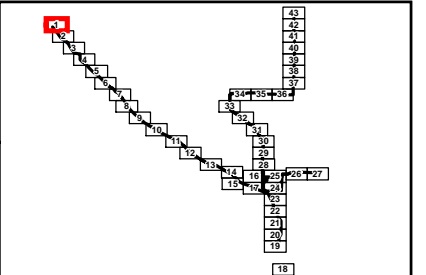
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Hydrogen Energy California (HECA)
Wetland Delineation
Kern County, California



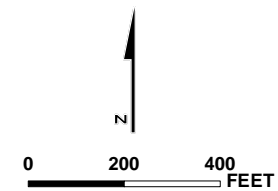
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| Delineation Study Area | EOR Processing Facility | Waters |
| Project Site | EOR Satellite Gathering Station | Wetland Waters of the U.S. (WL) |
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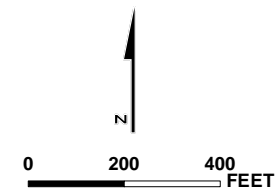


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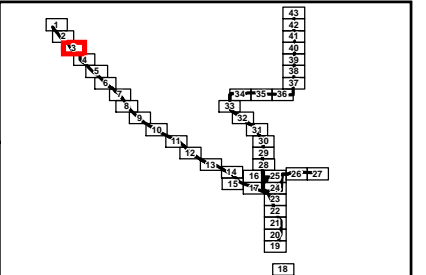
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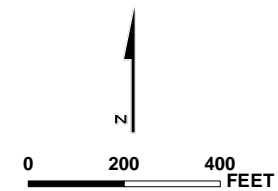
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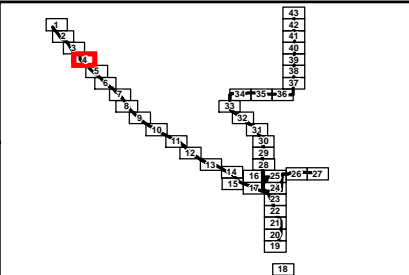
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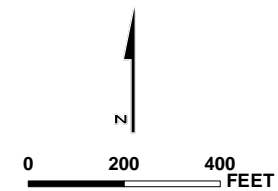


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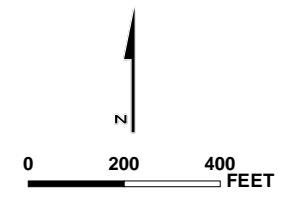
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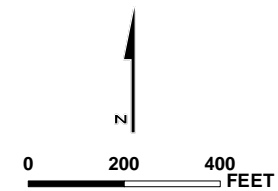


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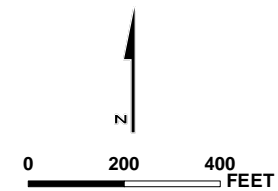
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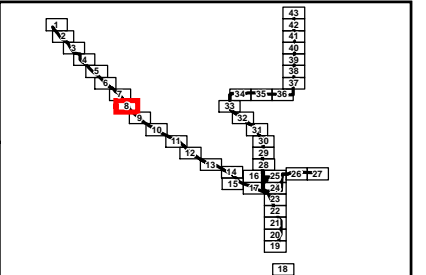
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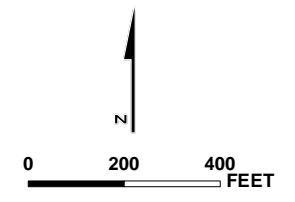
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NJ 1 (WESTSIDE CANAL)



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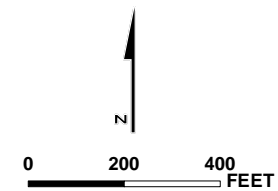
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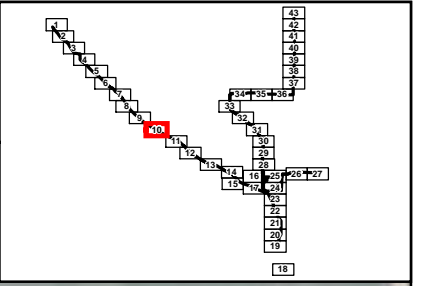


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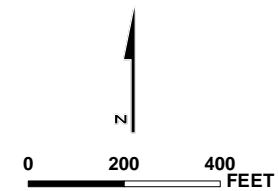


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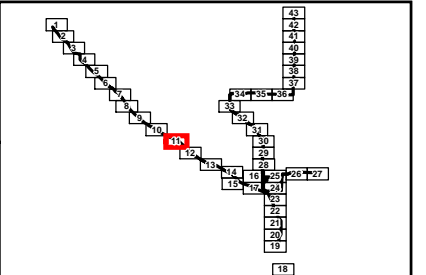
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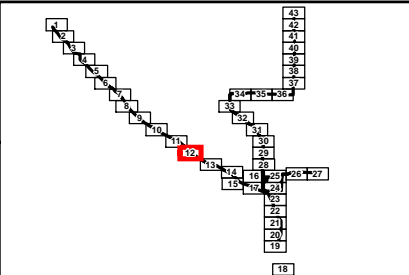
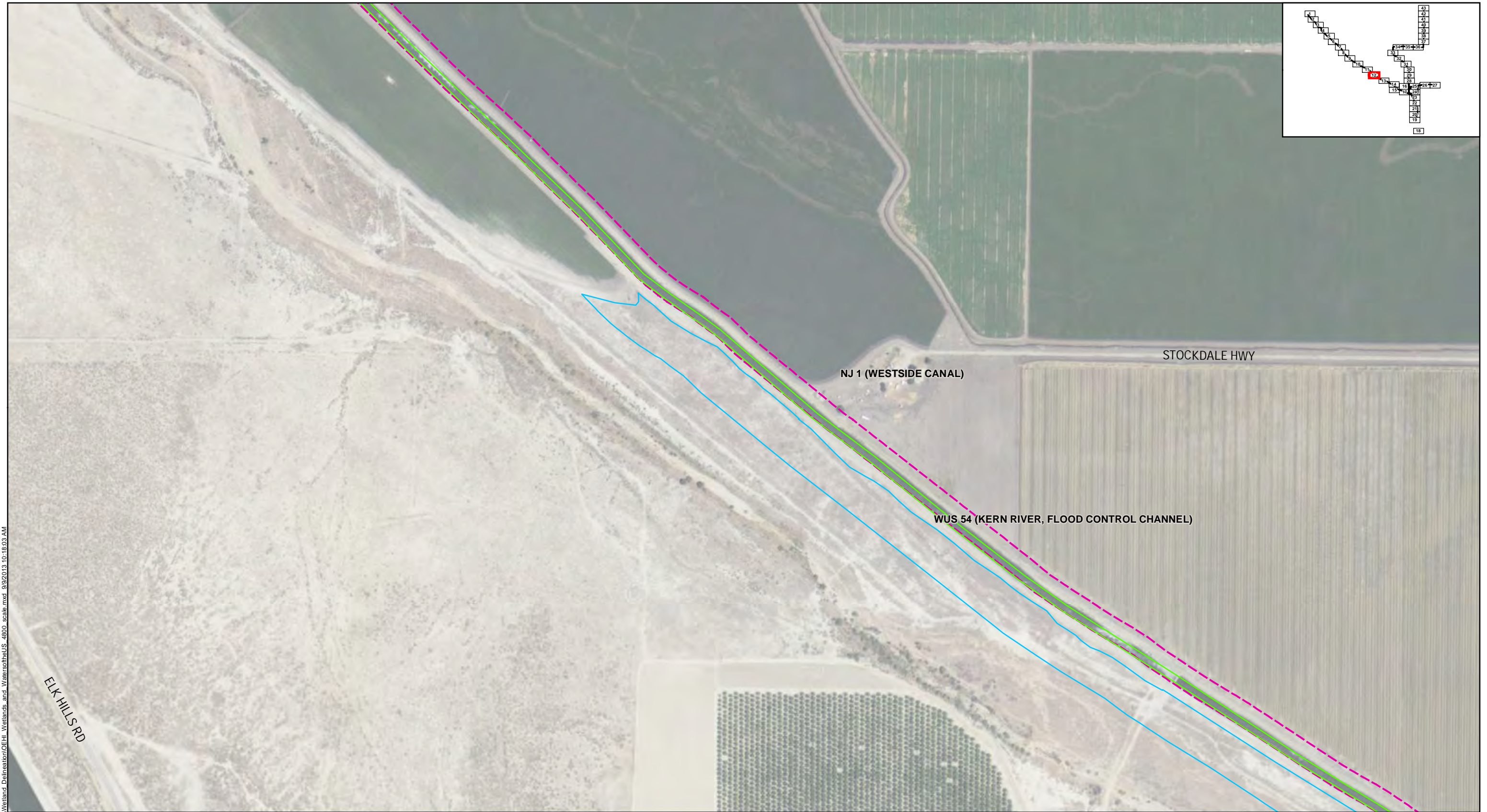
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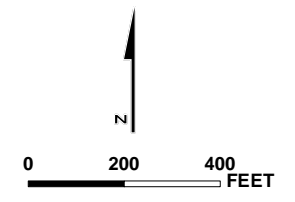


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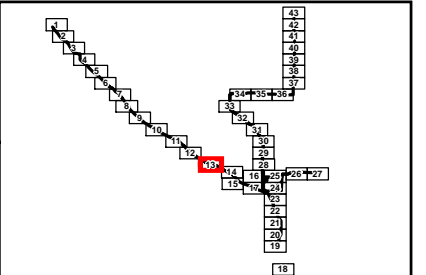


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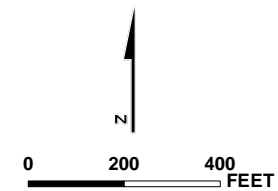


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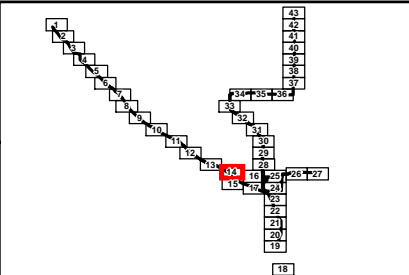


MAPPED WETLANDS AND OTHER WATERS OF THE UNITED STATES WITHIN THE STUDY AREA

January 2014
 28068052
 Hydrogen Energy California (HECA)
 Wetland Delineation
 Kern County, California

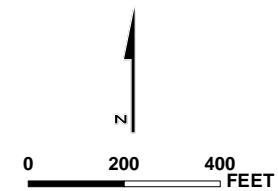


Source: Aerial Imagery, USDA, NAIP, 2012.



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| Delineation Study Area | EOR Processing Facility | Waters |
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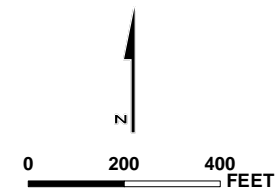


WUS 54 (KERN RIVER, FLOOD CONTROL CHANNEL)

NJ 1 (WESTSIDE CANAL)

NJ 10

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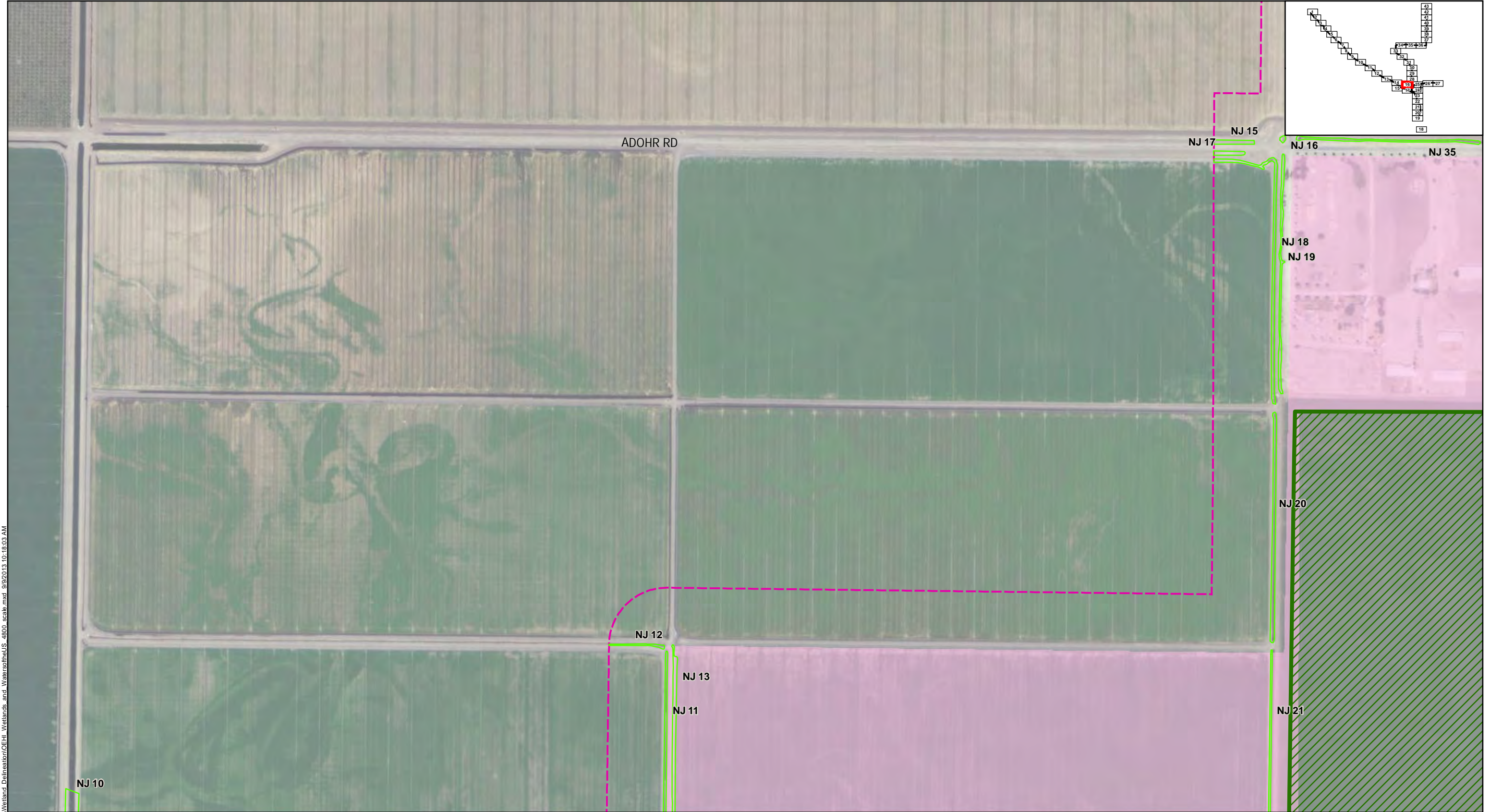
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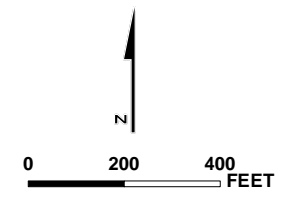
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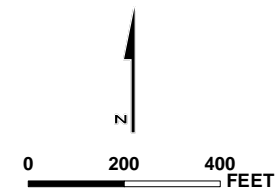


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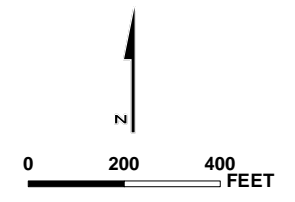
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Source: Aerial Imagery, USDA, NAIP, 2012.



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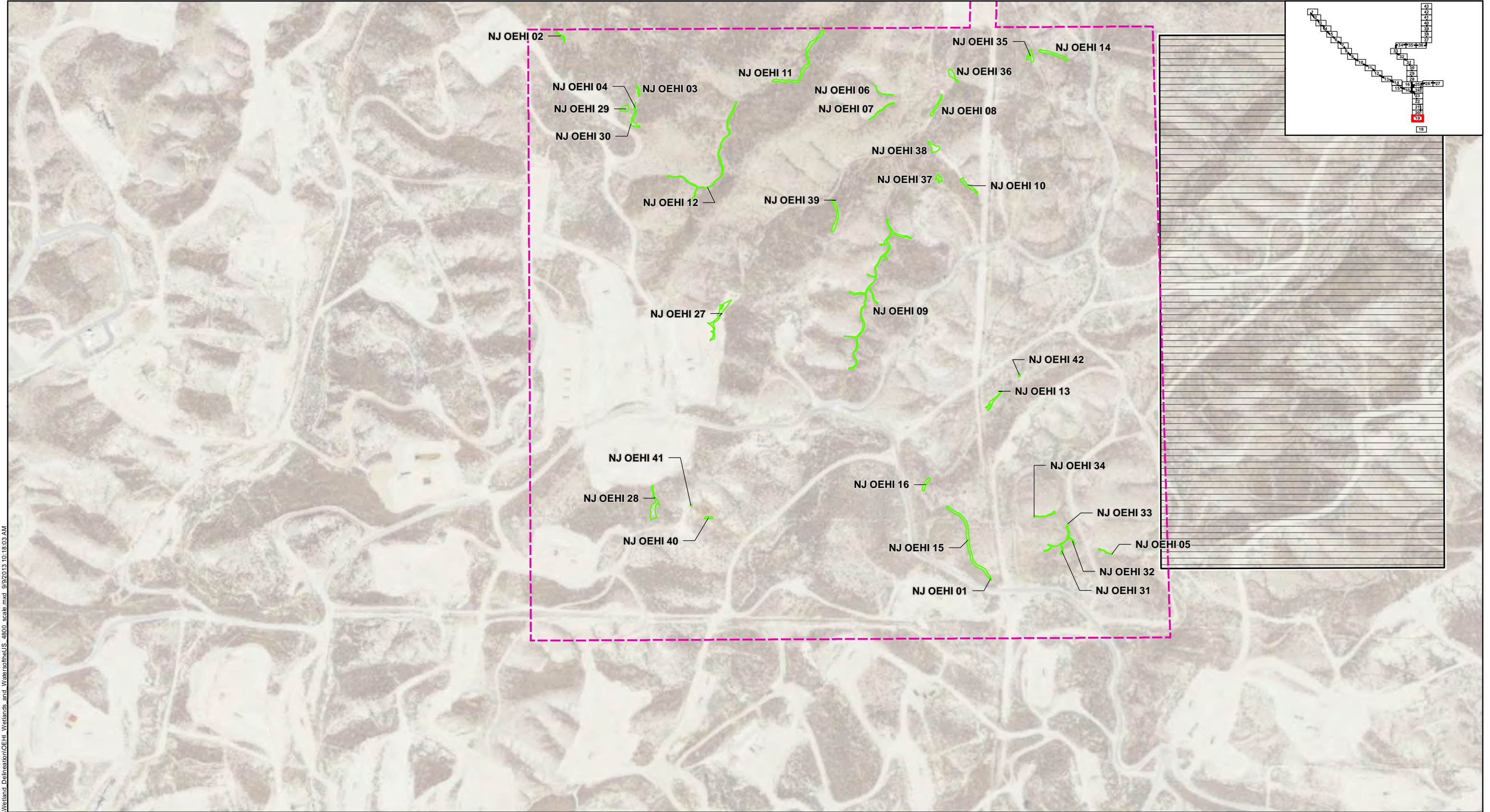
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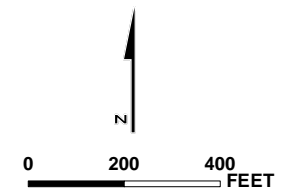
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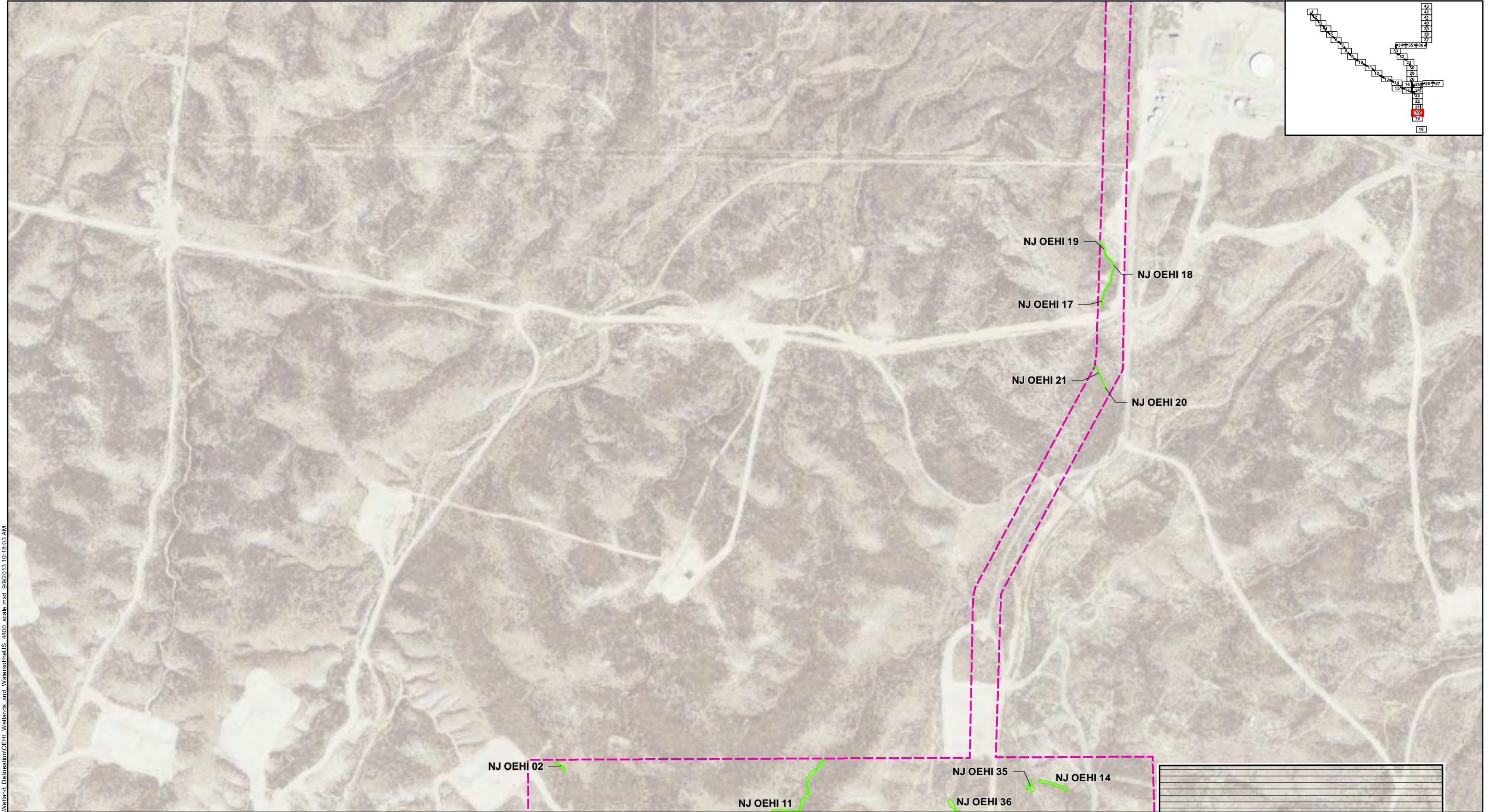


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 Wetland Delineation
 Kern County, California

January 2014
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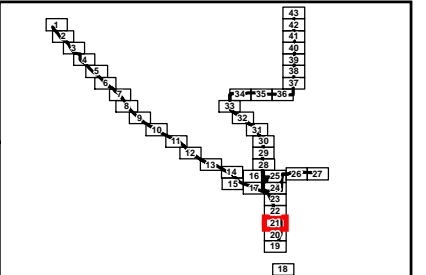
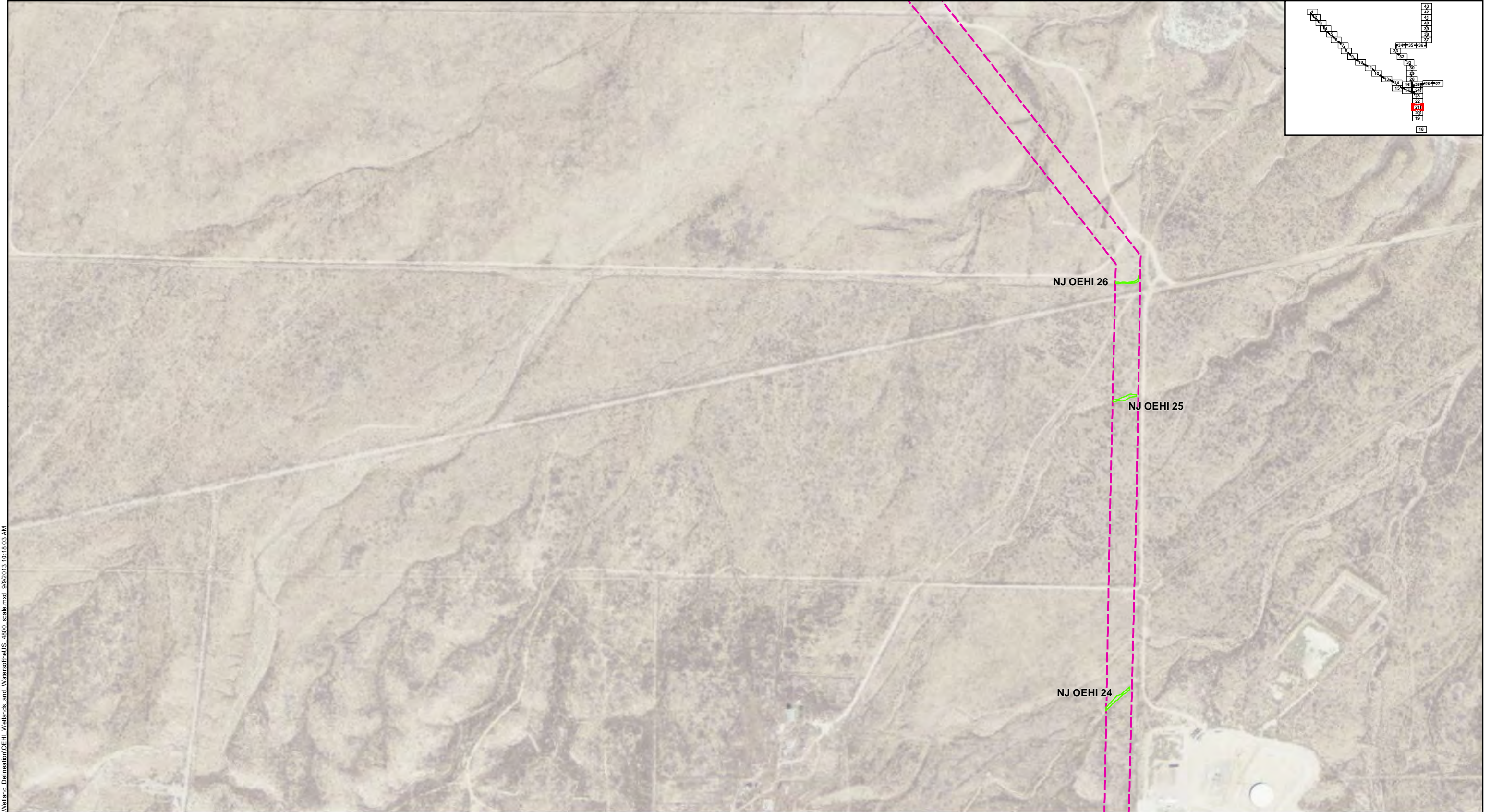
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 Wetland Delineation
 Kern County, California

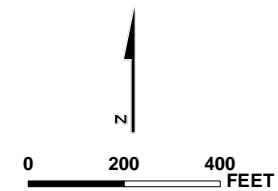
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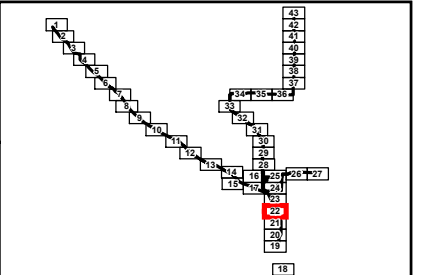
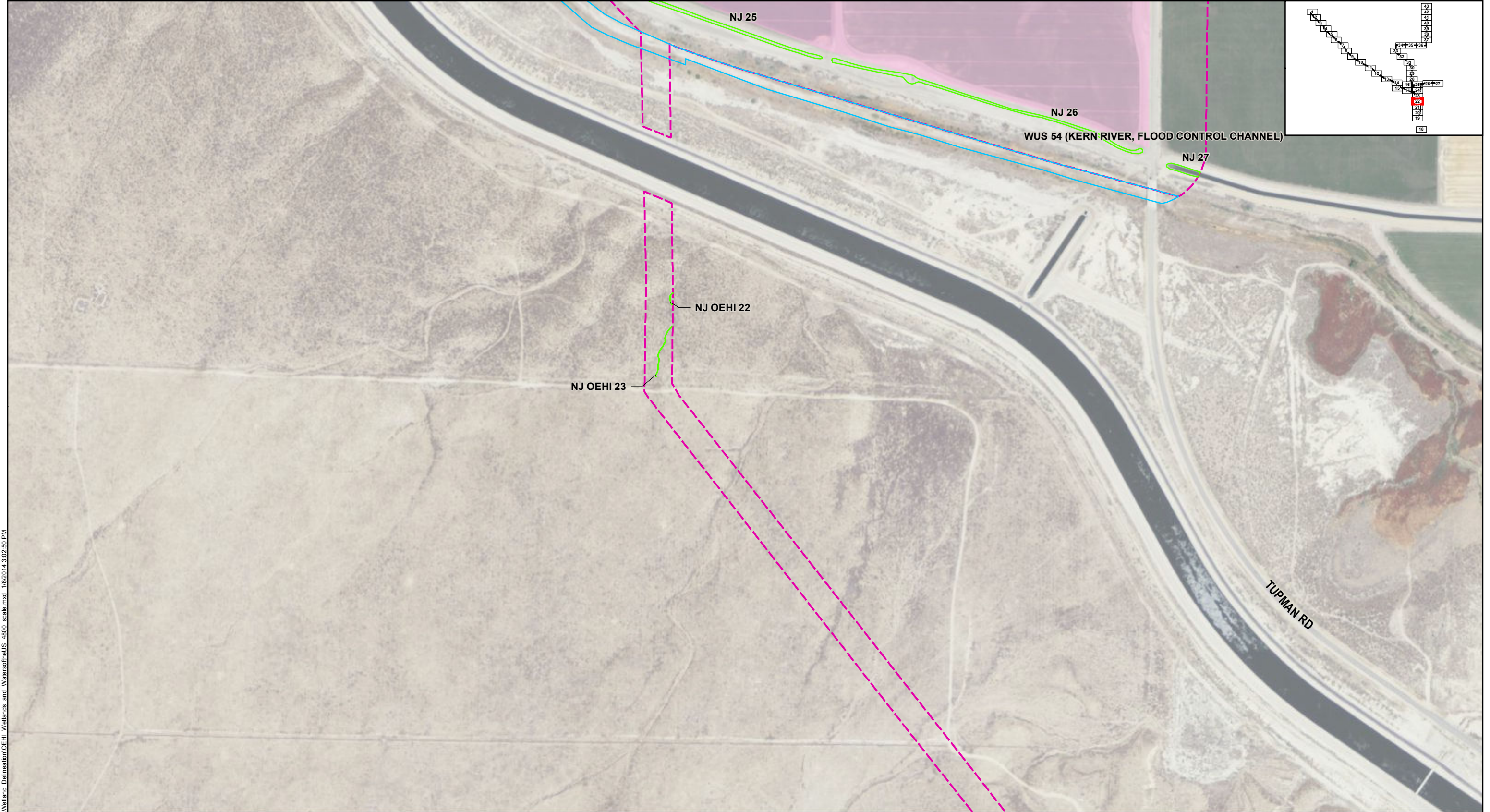
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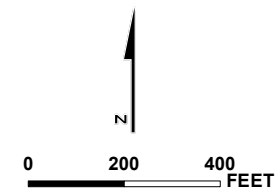
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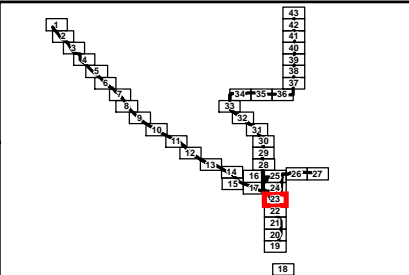
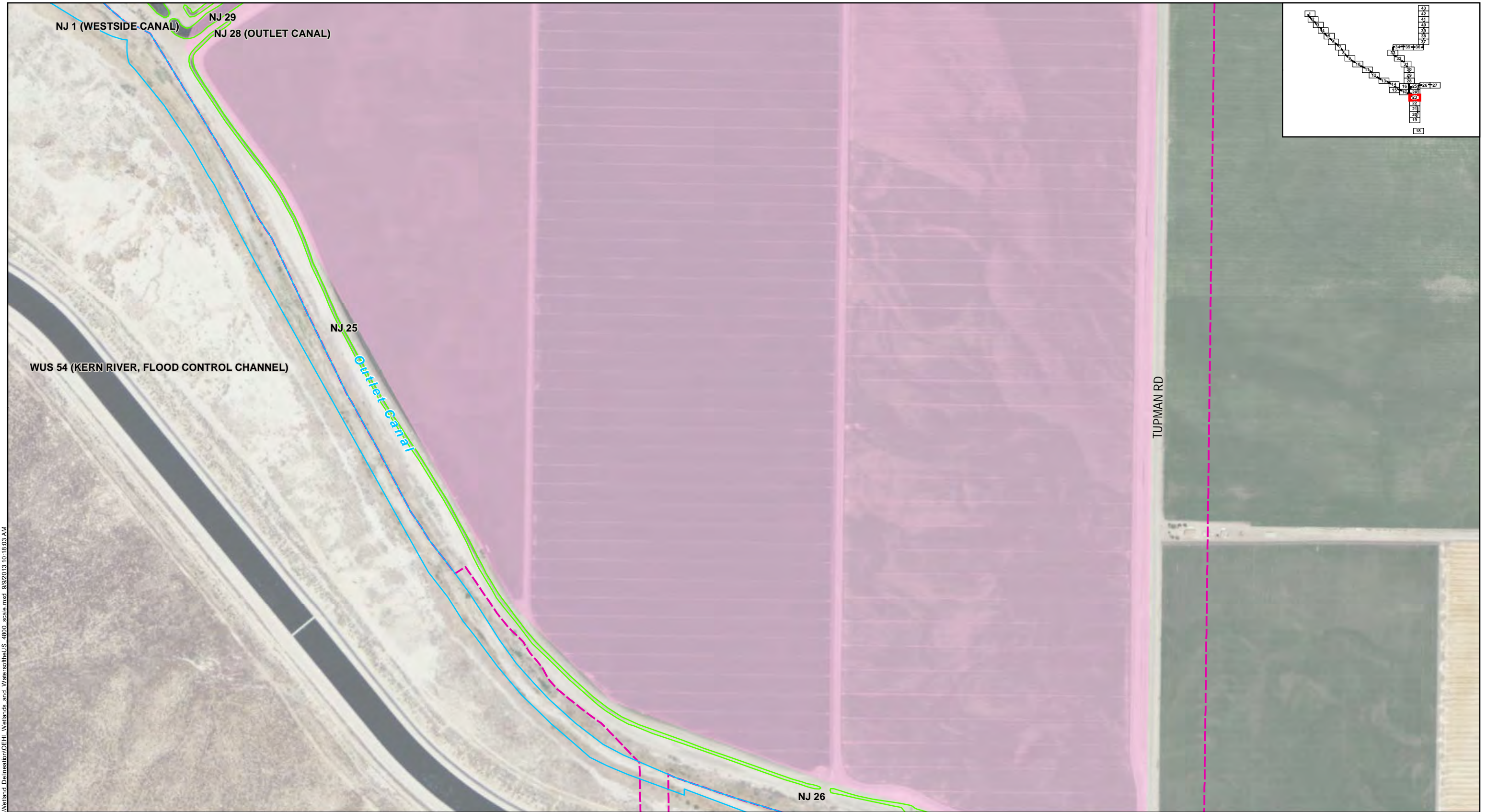


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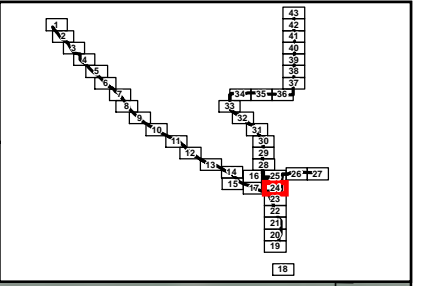
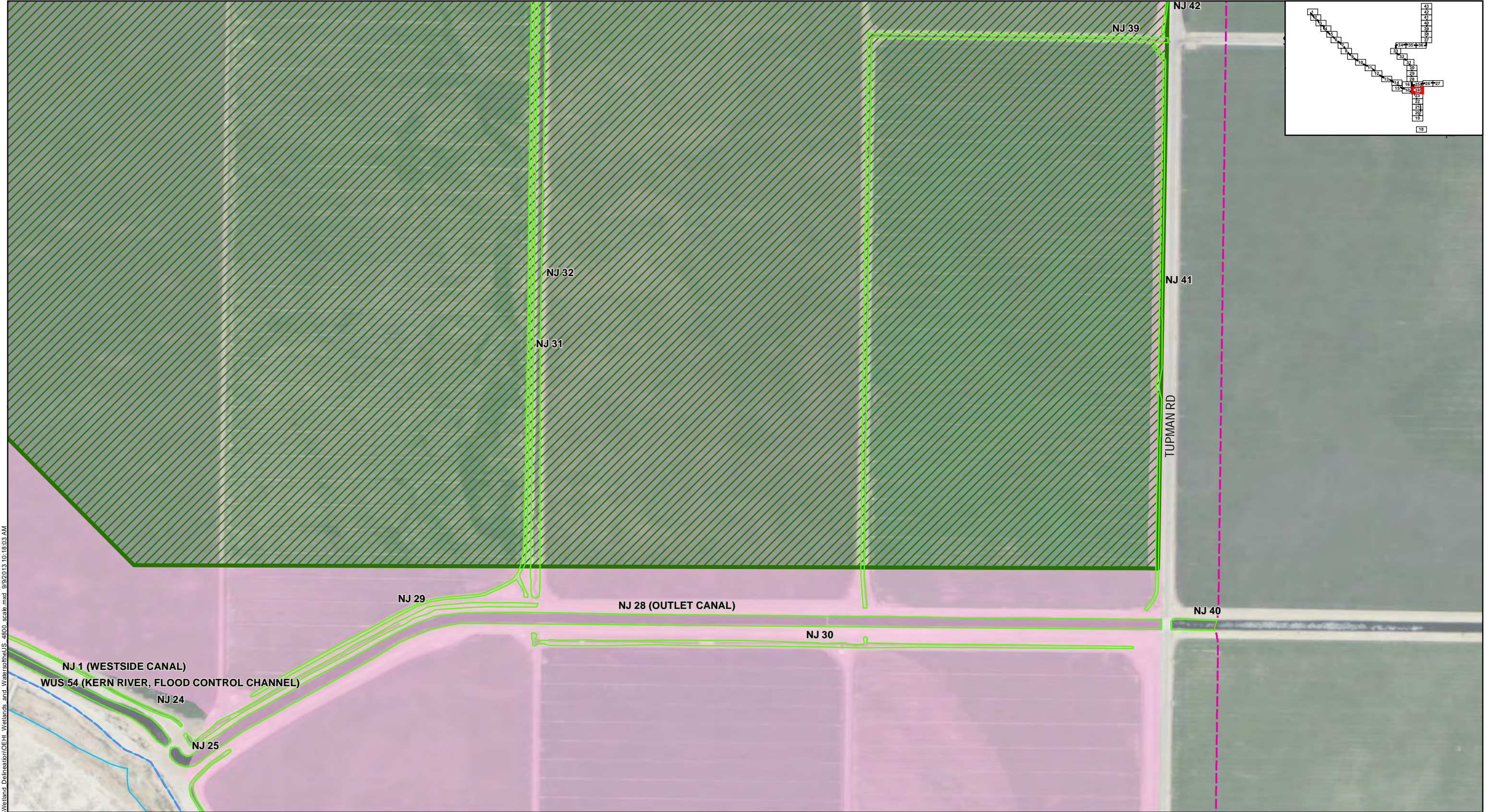
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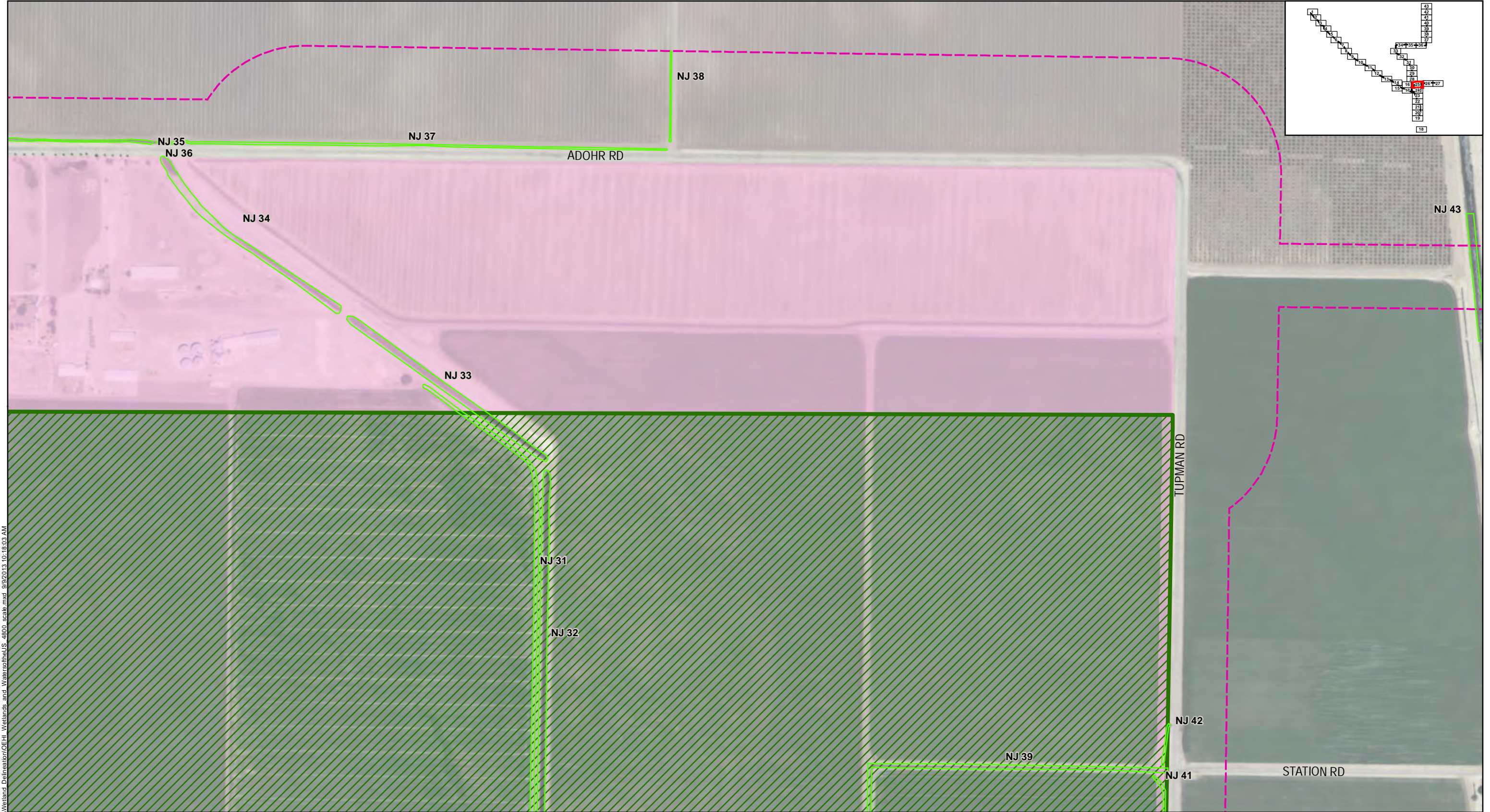
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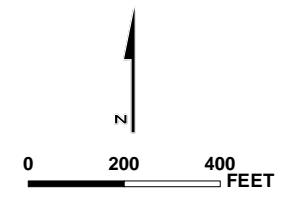


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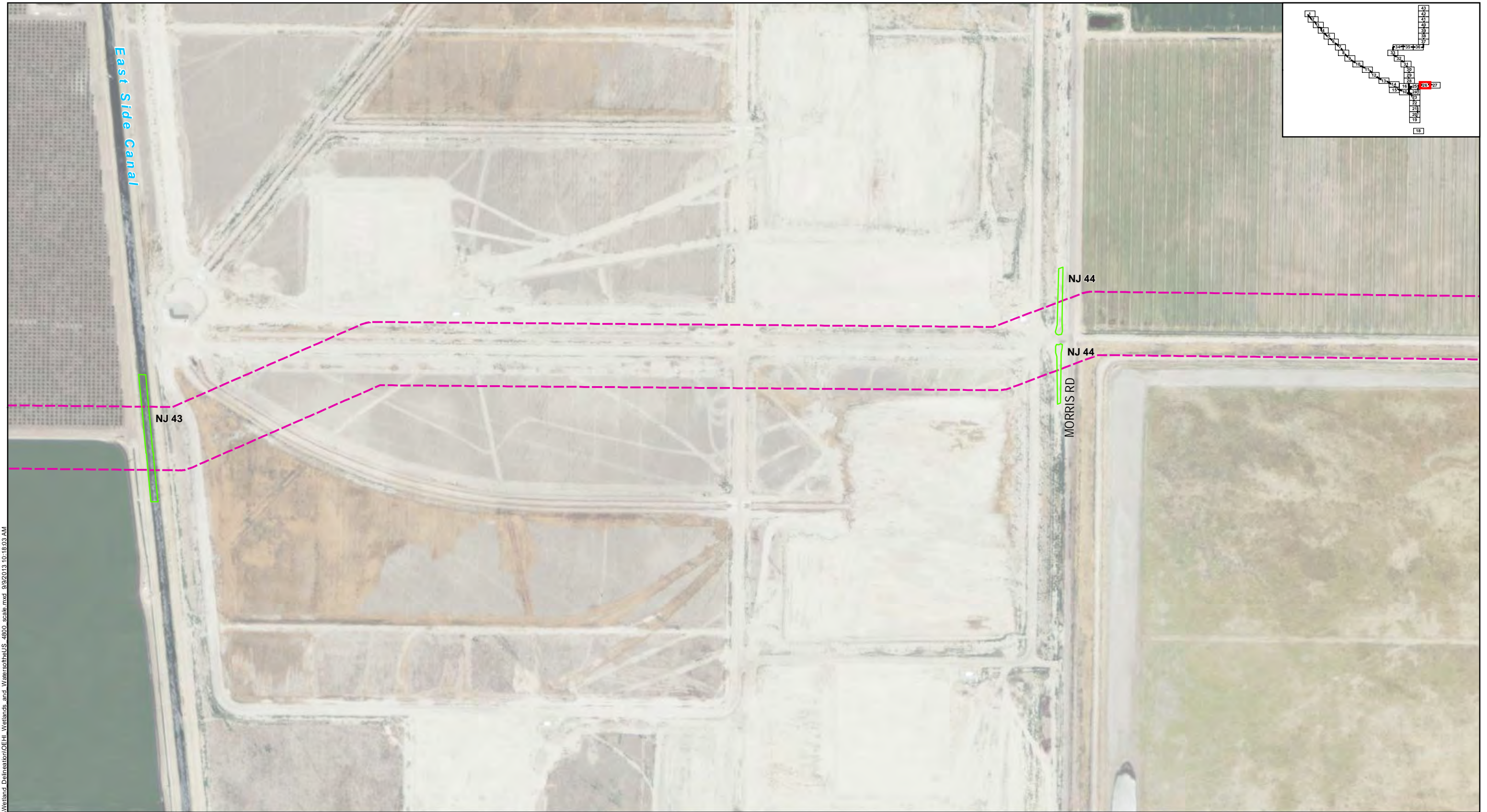
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Hydrogen Energy California (HECA)
 Wetland Delineation
 Kern County, California

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Source: Aerial Imagery, USDA, NAIP, 2012.



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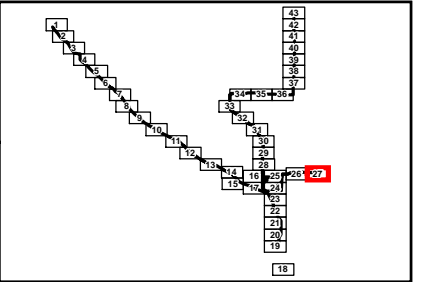
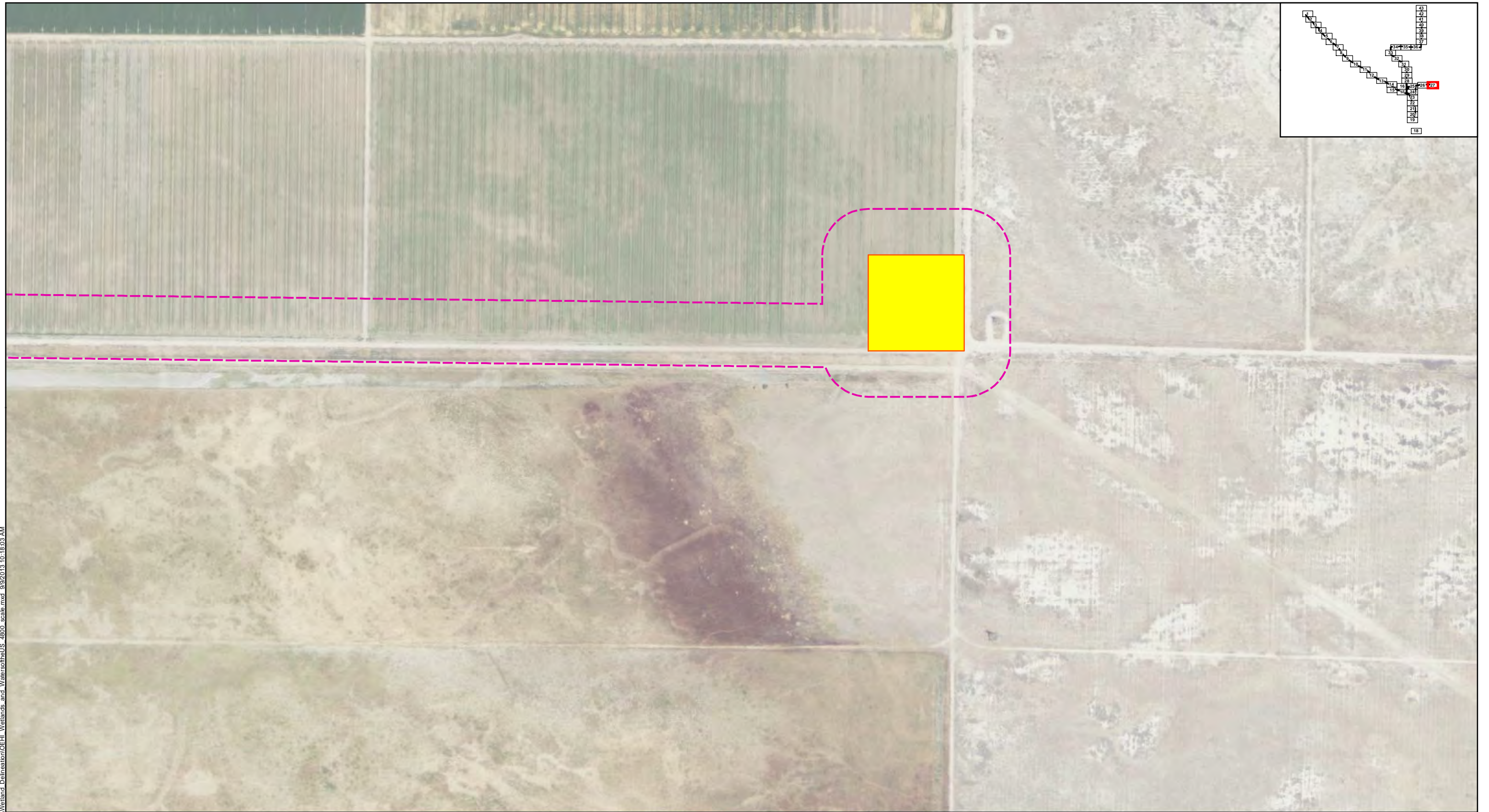
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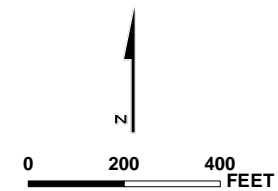
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- Delineation Study Area
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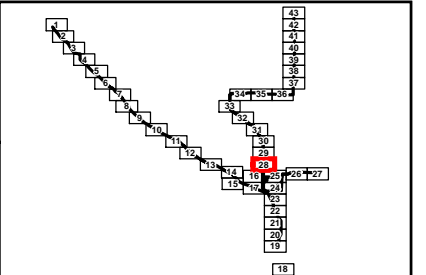
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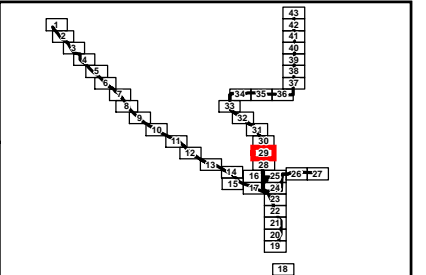
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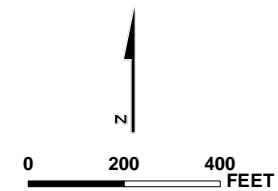


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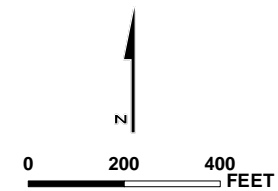


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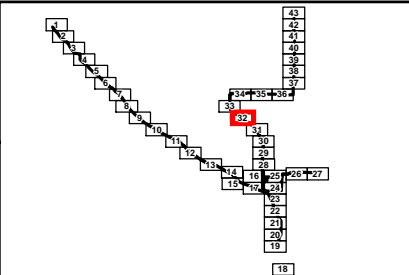
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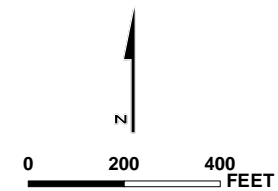


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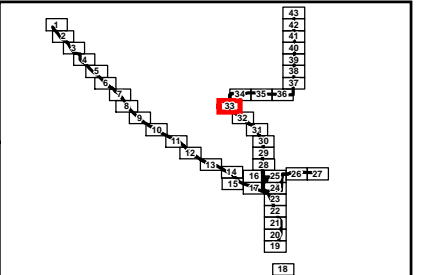


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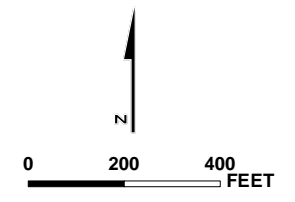
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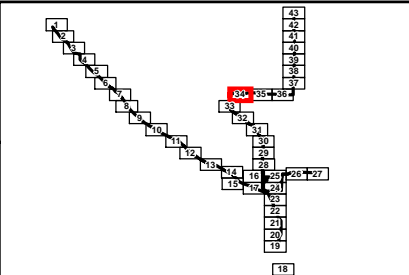


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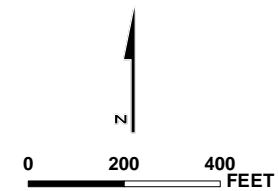


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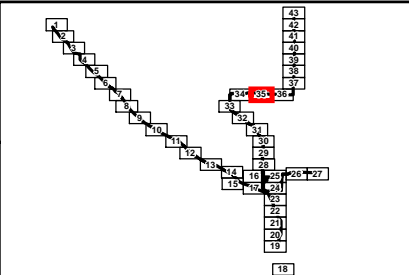
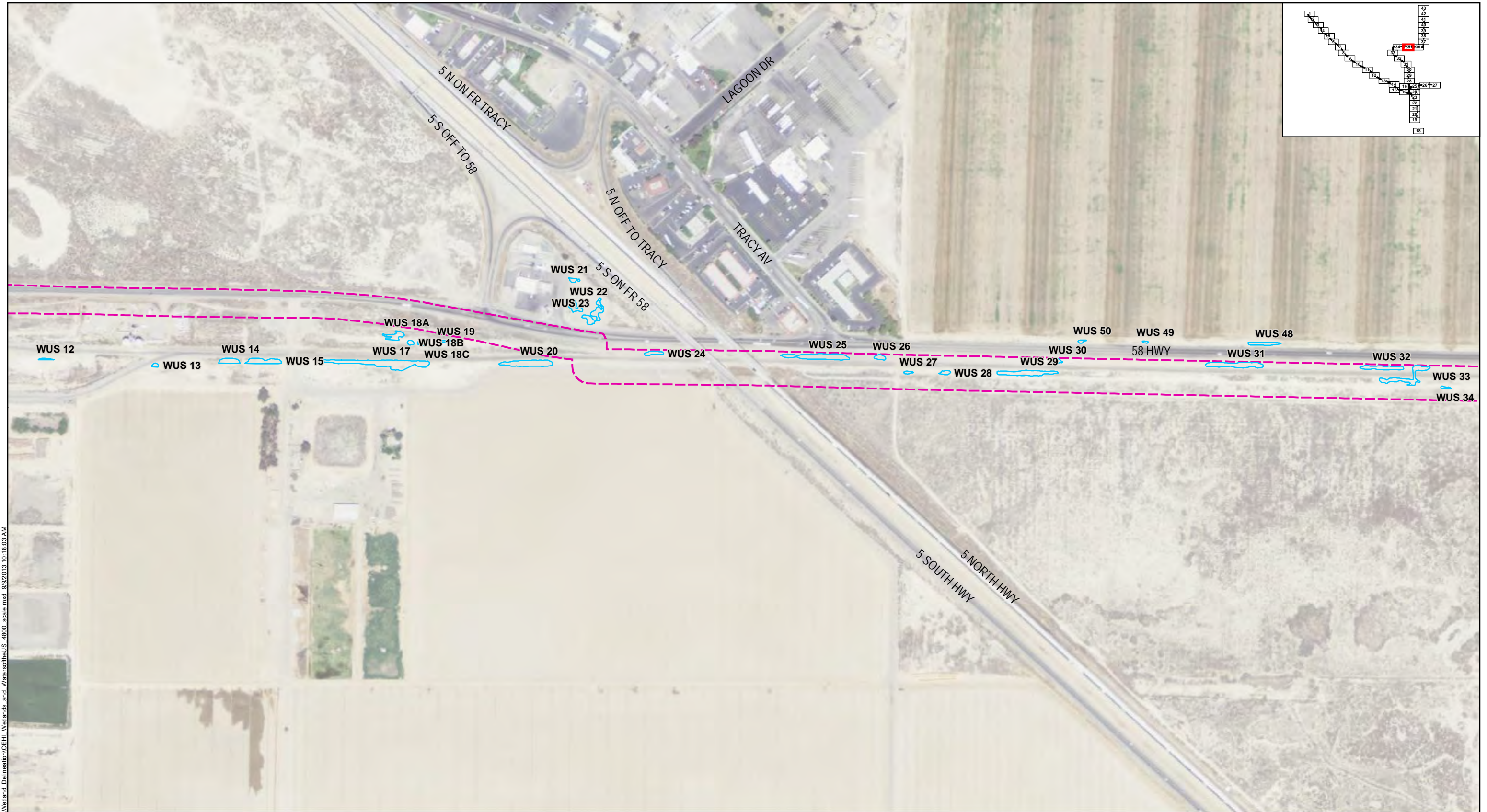


MAPPED WETLANDS AND OTHER WATERS OF THE UNITED STATES WITHIN THE STUDY AREA

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 Kern County, California

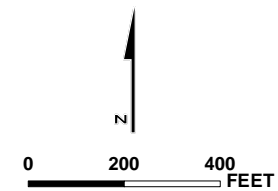


Source: Aerial Imagery, USDA, NAIP, 2012.



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|------------------------|---------------------------------|---------------------------------|
| Delineation Study Area | EOR Processing Facility | Waters |
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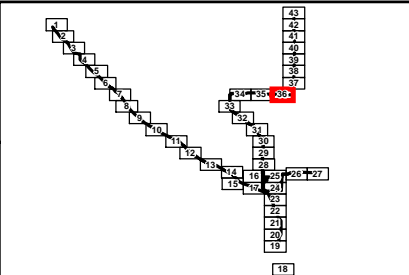


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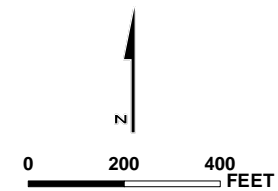


Source: Aerial Imagery, USDA, NAIP, 2012.



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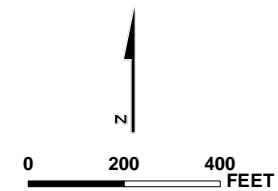


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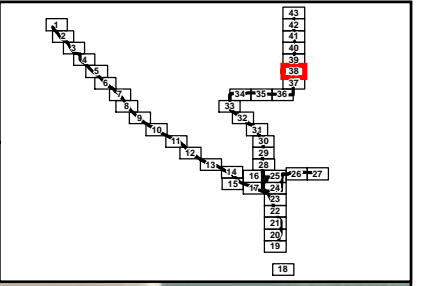
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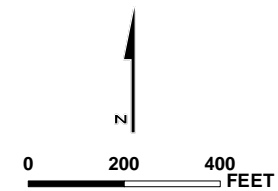
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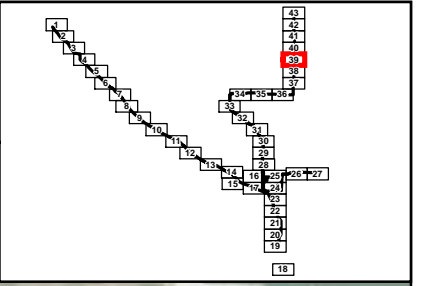
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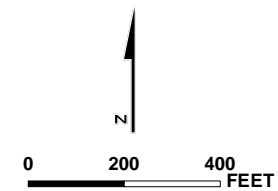
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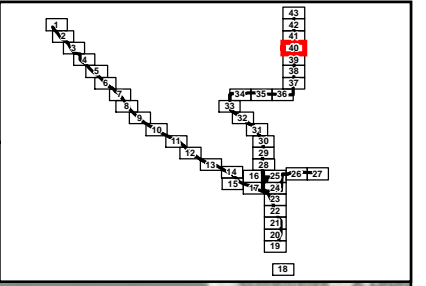
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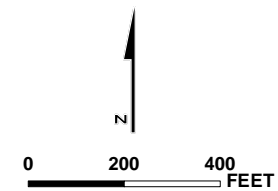
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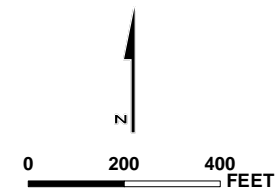
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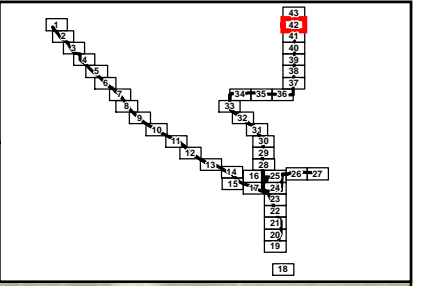
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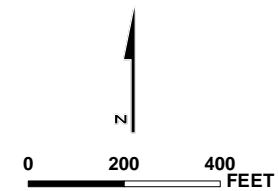


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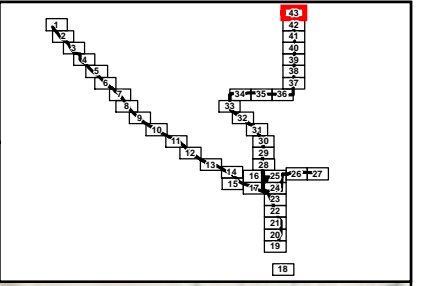


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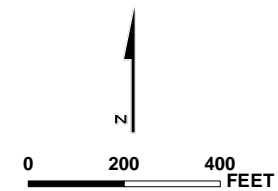
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Source: Aerial Imagery, USDA, NAIP, 2012.