

**MAX CREEK
WETLAND MITIGATION SITE**

ISGS #80

IL 147

FAS 932

Sequence #8717A

Johnson County, near Simpson, Illinois

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SITE HISTORY

- July 2008: An Initial Site Evaluation was submitted to IDOT.
- December 2008: Water-level monitoring was initiated.
- August 2009: Construction at the wetland mitigation site began.
- Spring 2011: ISGS was notified by IDOT to begin post-construction monitoring.

WETLAND HYDROLOGY CALCULATION FOR 2012

The target compensation area for the Max Creek wetland mitigation site is 0.49 ha (1.20 ac). Using the 1987 Manual (Environmental Laboratory 1987), 0.34 ha (0.84 ac) out of a total site area of approximately 1.20 ha (3.00 ac) satisfied wetland hydrology criteria for greater than 5% of the growing season, and none of the site satisfied wetland hydrology for greater than 12.5% of the growing season. Using the 2010 Midwest Region Supplement (USACE 2010) to the 1987 Manual, 0.77 ha (1.90 ac) satisfied wetland hydrology criteria for 14 or more consecutive days during the growing season. These estimates are based on the following factors:

- The median date that the growing season begins in nearby Anna, Illinois, is March 31 and the season lasts 225 days (MRCC 2012); According to the 1987 Manual, 5% of the growing season is 11 days and 12.5% of the growing season is 28 days. According to the 2010 Midwest Region Supplement, February 16 was the starting date of the 2012 growing season based on soil temperatures measured at the wetland mitigation site.
- Total precipitation at the Cape Girardeau, Missouri, weather station for the period from September 2011 through August 2012 was 89% of normal, and Spring 2012 (March through May) precipitation was 36% of normal.
- In 2012, wells 9S and 10S satisfied wetland hydrology criteria for greater than 5% of the growing season but no wells satisfied wetland hydrology criteria for greater than 12.5% of the growing season, according to the 1987 Manual. According to the 2010 Midwest Region Supplement, wells 9S, 10S, 11S, and 12S satisfied wetland hydrology criteria for 14 or more consecutive days during the growing season.
- Gauge A showed that Max Creek flooded the site once during the 2012 growing season. However, the duration of inundation from this flood did not satisfy any wetland hydrology criteria.

- Gauge E showed that ponded surface water in the mitigation area was at or above 115.61 m (379.29 ft) for greater than 5% of the growing season but did not persist for greater than 12.5% of the growing season, according to the 1987 Manual. Water level at Gauge E was at or above 115.68 m (379.52 ft) for 14 or more consecutive days during the growing season, according to the 2010 Midwest Region Supplement.

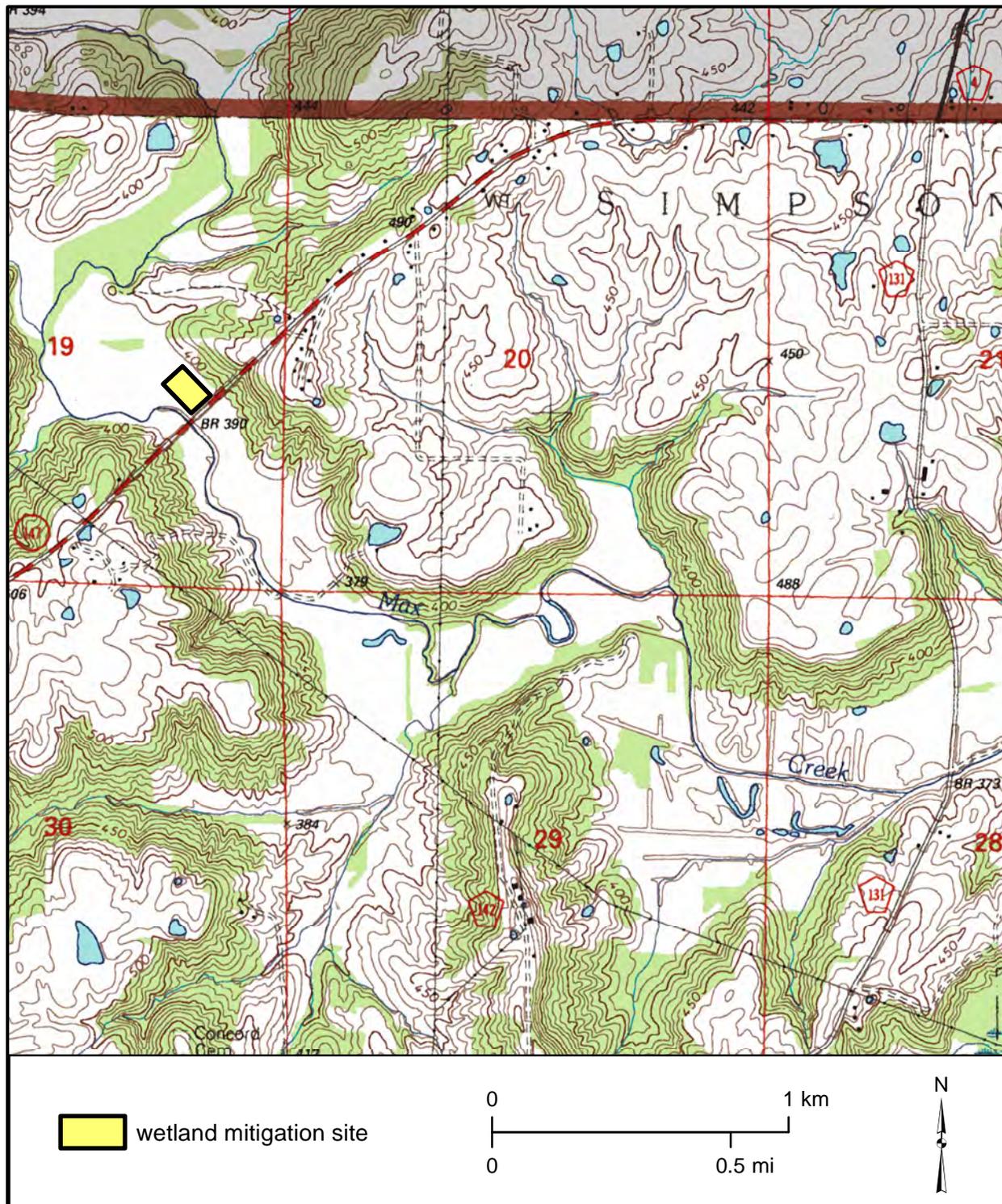
PLANNED FUTURE ACTIVITIES

- Water-level monitoring is expected to continue through 2016 or until no longer required by IDOT.

Max Creek Wetland Mitigation Site (IL 147, FAS 932)

General Study Area and Vicinity

from the USGS Topographic Series, Bloomfield, IL 7.5-minute Quadrangle (USGS 1996)
contour interval is 10 feet



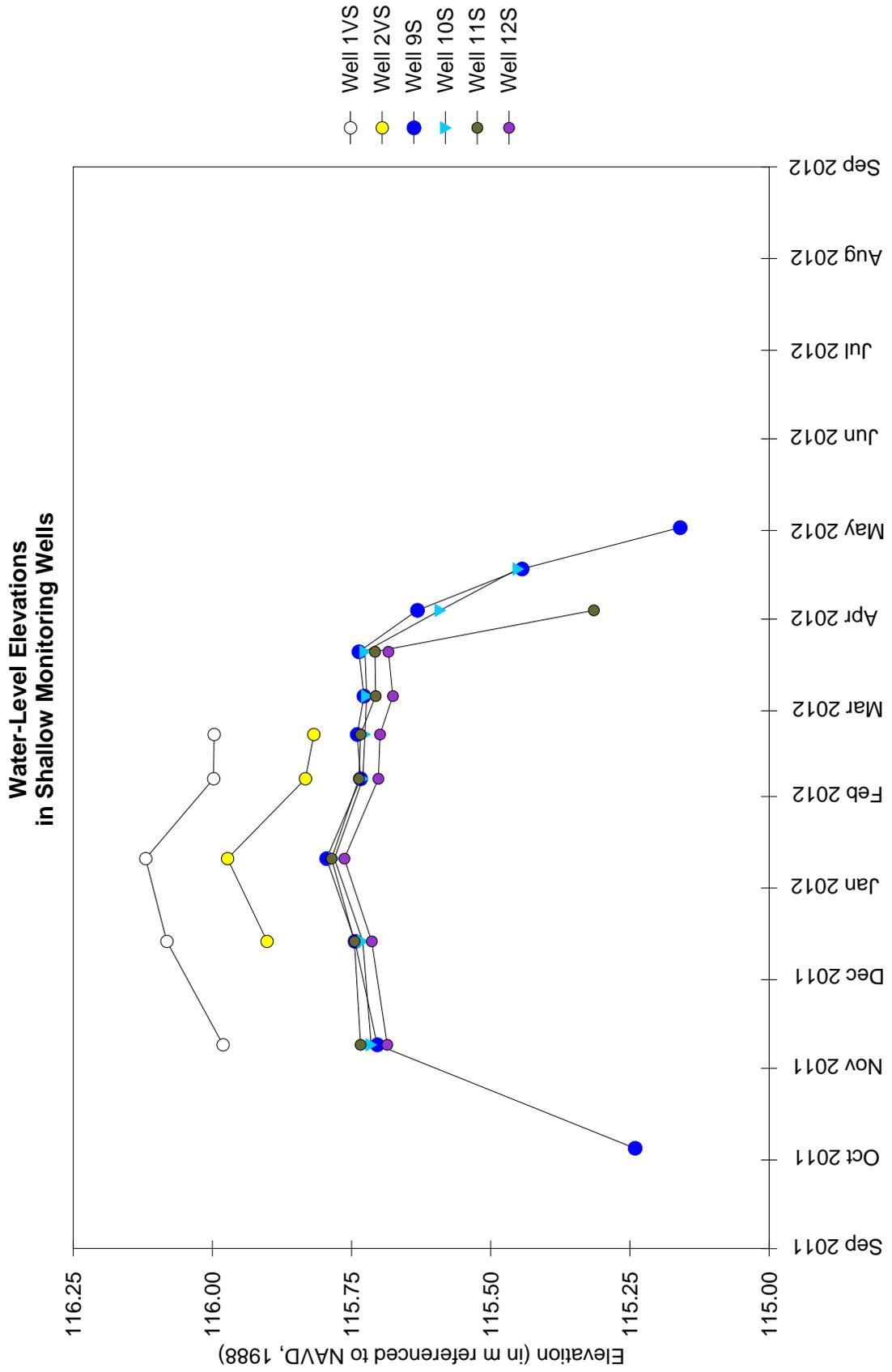
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Estimated Areal Extent of 2012 Wetland Hydrology
September 1, 2011 through August 31, 2012

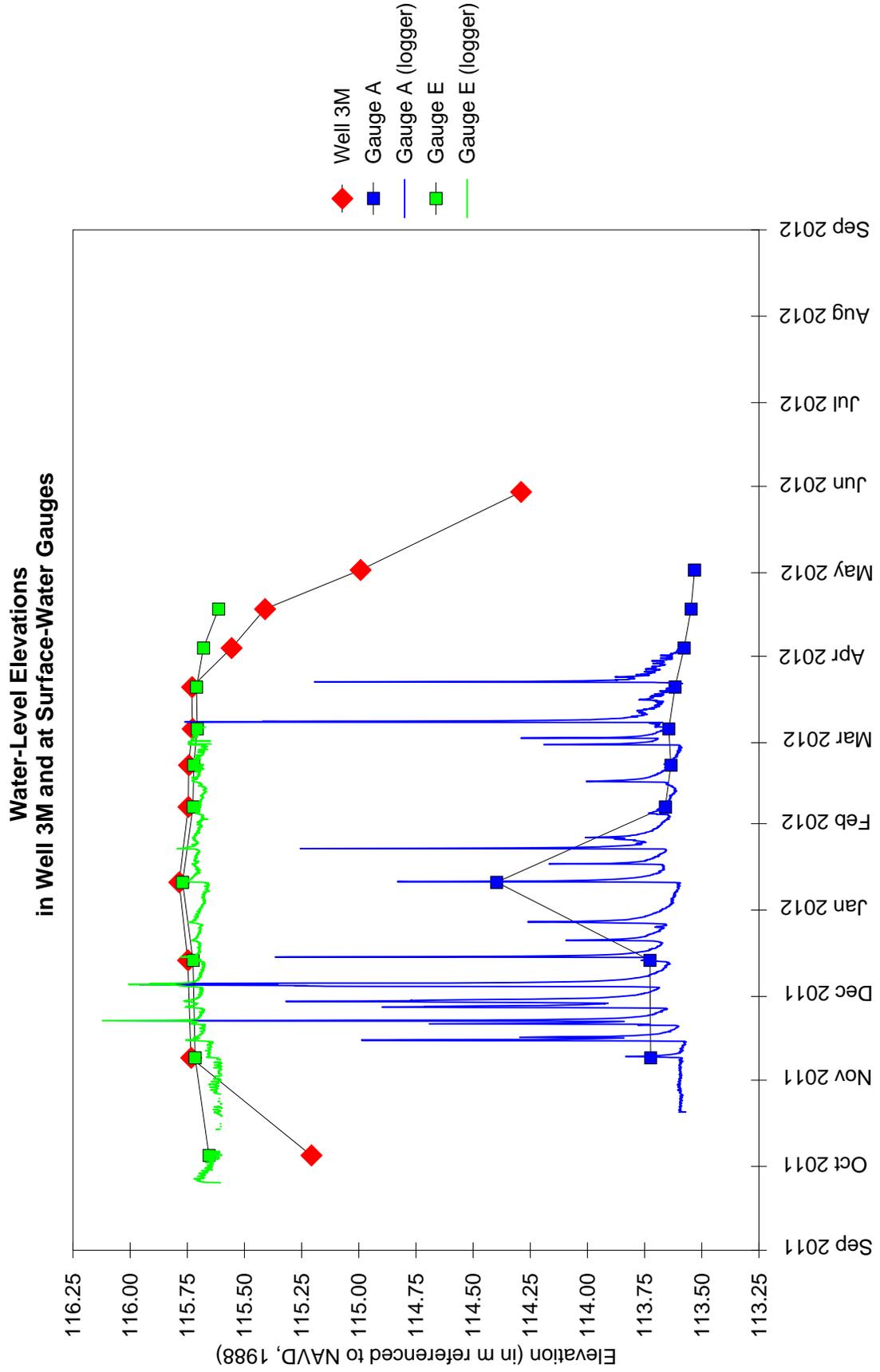
Map based on 2012 Farm Service Agency digital orthophotography, Johnson County, Illinois (USDA-FSA 2012)



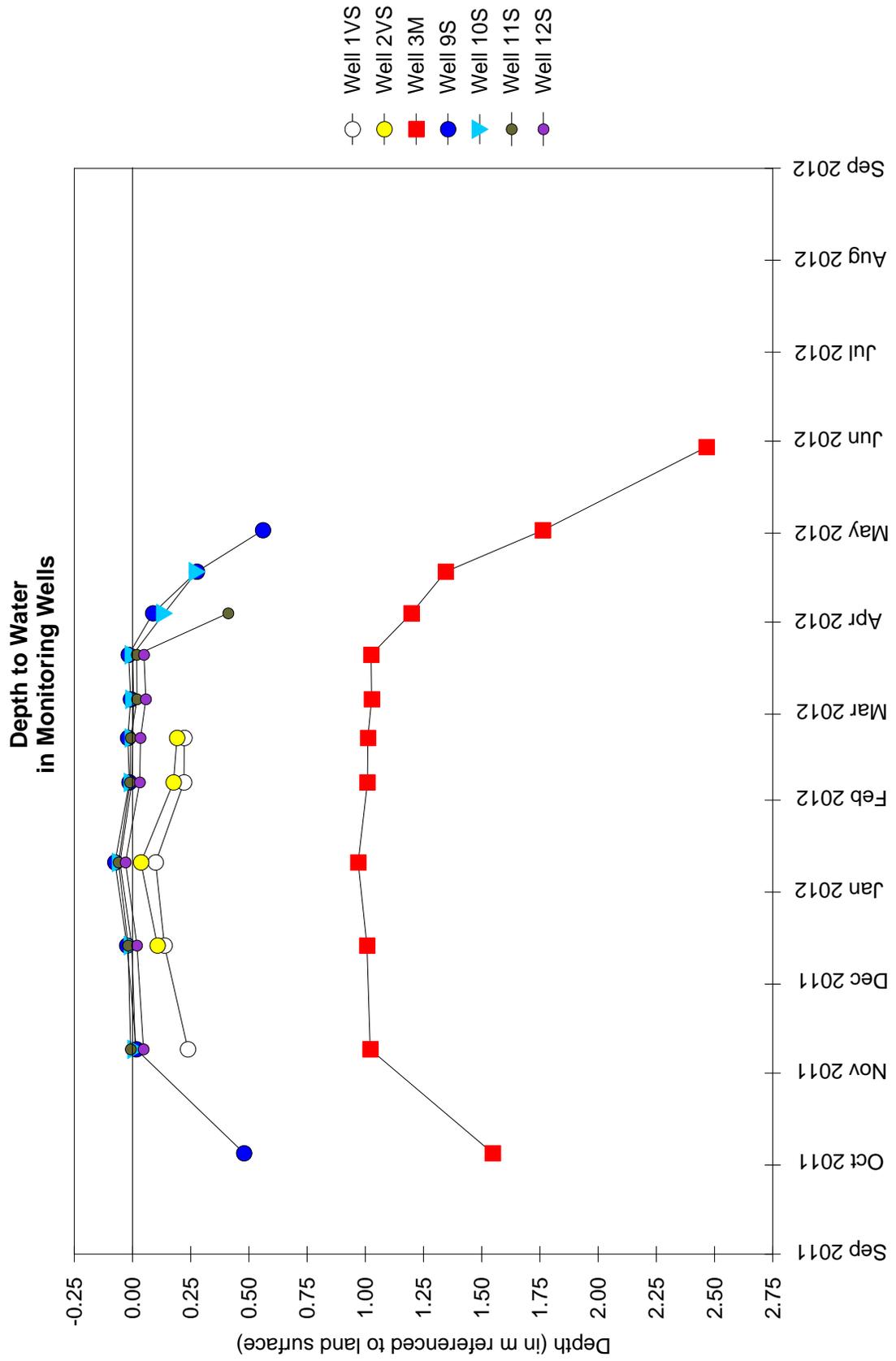
Max Creek Wetland Mitigation Site September 1, 2011 through August 31, 2012



Max Creek Wetland Mitigation Site September 1, 2011 through August 31, 2012



Max Creek Wetland Mitigation Site September 1, 2011 through August 31, 2012



Max Creek Wetland Mitigation Site September 2011 through August 2012

Total Monthly Precipitation Recorded on Site and at the Cape Girardeau Regional Airport, MO

