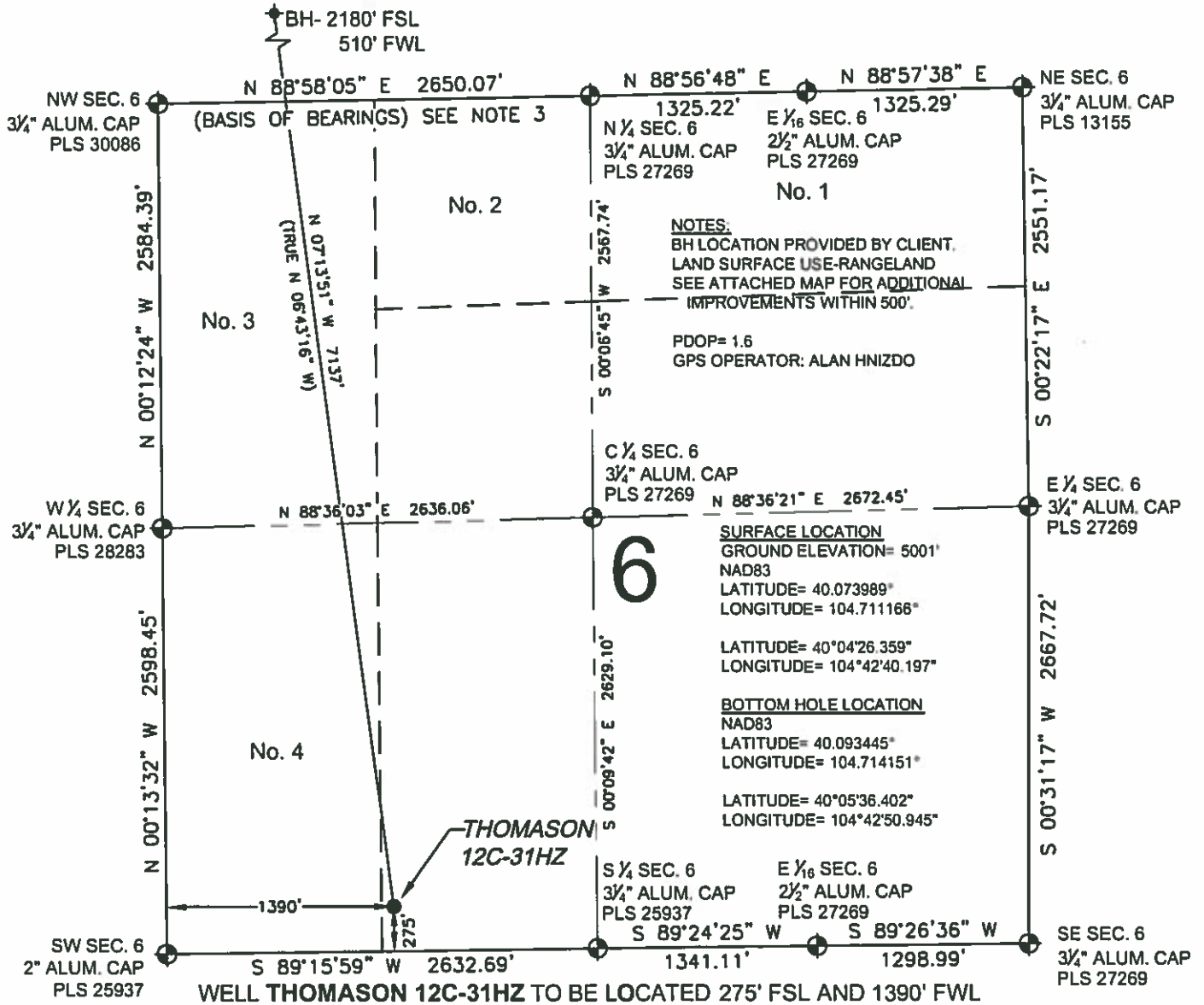


WELL LOCATION CERTIFICATE: THOMASON 12C-31HZ

SECTION 6, TOWNSHIP 1 NORTH, RANGE 65 WEST, 6TH P.M.



NOTES:
 BH LOCATION PROVIDED BY CLIENT.
 LAND SURFACE USE-RANGELAND
 SEE ATTACHED MAP FOR ADDITIONAL
 IMPROVEMENTS WITHIN 500'.

PDOP= 1.6
 GPS OPERATOR: ALAN HNIZDO

SURFACE LOCATION
 GROUND ELEVATION= 5001'
 NAD83
 LATITUDE= 40.073989°
 LONGITUDE= 104.711166°

LATITUDE= 40°04'26.359"
 LONGITUDE= 104°42'40.197"

BOTTOM HOLE LOCATION
 NAD83
 LATITUDE= 40.093445°
 LONGITUDE= 104.714151°
 LATITUDE= 40°05'36.402"
 LONGITUDE= 104°42'50.945"

LEGEND

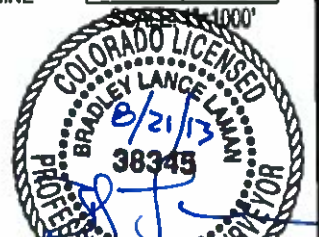
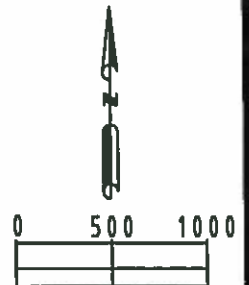
- ⊕ = EXISTING MONUMENT ⚬ = BOTTOM HOLE BH = BOTTOM HOLE
- = PROPOSED WELL ⚬ = EXISTING WELL

NOTES:

1. THIS FIELD SURVEY CONFORMS TO THE MINIMUM STANDARDS SET BY THE C.O.G.C.C., RULE NO. 215
2. HORIZONTAL POSITIONS AND ORTHOMETRIC ELEVATIONS SHOWN AT THE WELL HEAD, ARE BASED ON GPS-RTK POSITIONS DERIVED FROM MINIMUM 2-HOUR STATIC OBSERVATIONS CORRECTED BY THE NATIONAL GEODETIC SURVEY ONLINE POSITIONING USER SERVICE, O.P.U.S. DATUM: HORIZONTAL = NAD83/2011, VERTICAL = NAVD88
3. THE BASIS OF BEARINGS ARE STATE PLANE COORDINATE SYSTEM GRID BEARINGS SHOWN HEREON BETWEEN THE DESCRIBED MONUMENTS SHOWN HEREON.
4. GRID DISTANCES ARE SHOWN, AS MEASURED IN THE FIELD, WITH TIES TO WELLS MEASURED PERPENDICULAR TO SECTION LINES.

I, BRADLEY L. LAMAN, A LICENSED PROFESSIONAL LAND SURVEYOR IN THE STATE OF COLORADO DO HEREBY CERTIFY TO KERR-MCGEE OIL & GAS ONSHORE LP, THAT THE SURVEY AND WELL LOCATION CERTIFICATE SHOWN HEREON WERE DONE BY ME OR UNDER MY DIRECT SUPERVISION AND THAT THE DRAWING SHOWN HEREON ACCURATELY DEPICTS THE PROPOSED LOCATION OF THE WELL. THIS CERTIFICATE DOES NOT REPRESENT A LAND SURVEY PLAT OR IMPROVEMENT SURVEY PLAT AS DEFINED BY C.R.S. 38-51-102 AND CANNOT BE RELIED UPON TO DETERMINE OWNERSHIP.

BRADLEY L. LAMAN, PLS 38345
 COLORADO LICENSED PROFESSIONAL LAND SURVEYOR
 FOR AND ON BEHALF OF P.F.S., LLC



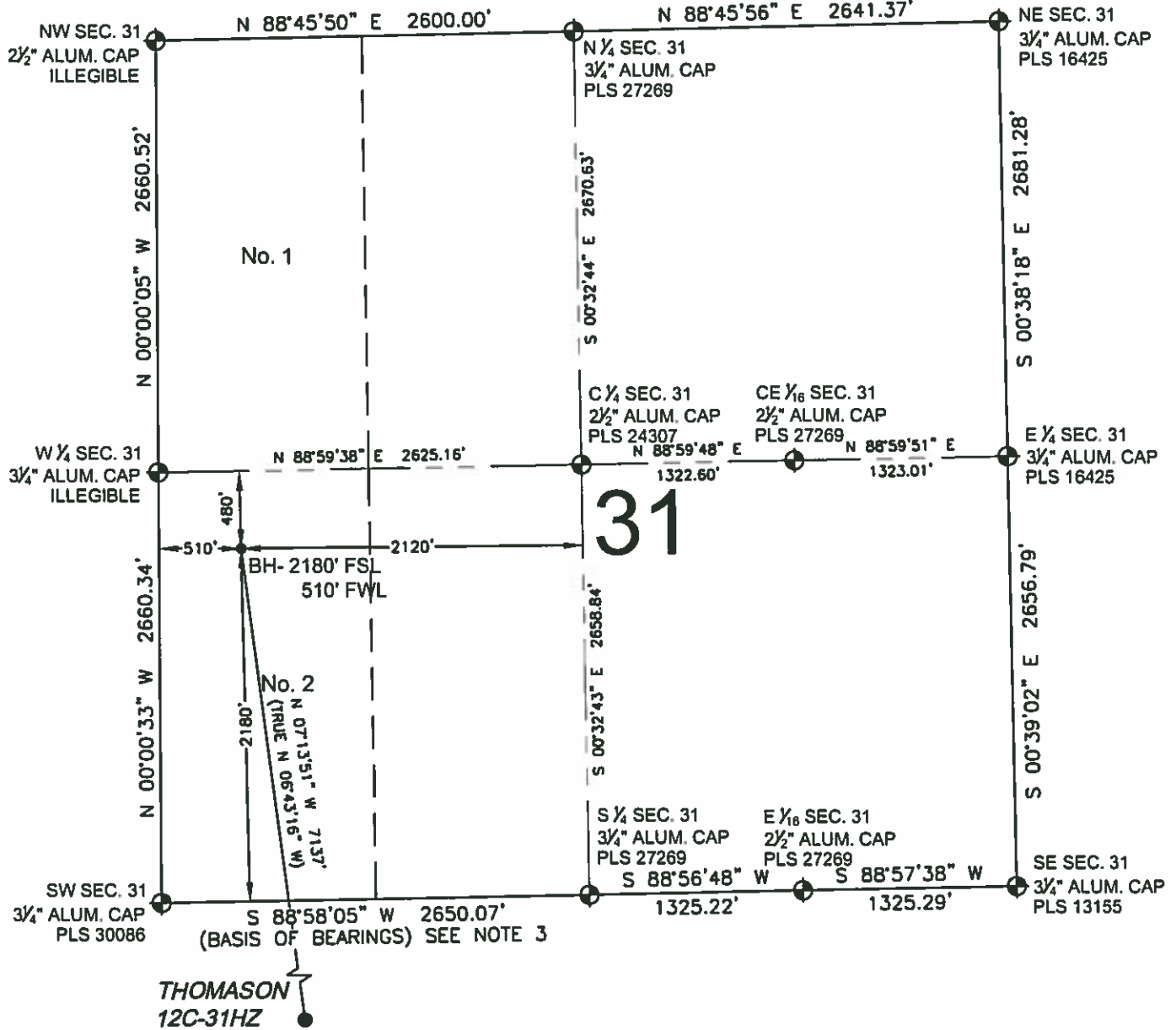
SHEET 1 OF 2

PREPARED BY: Petroleum Field Services, LLC 7535 Hilltop Circle Denver, CO 80221	FIELD DATE: 08-21-13	SURFACE LOCATION:
	DRAWING DATE: 08-21-13	SE 1/4 SW 1/4, SEC. 6, T1N, R65W, 6TH P.M.
	BY: SMF CHECKED: TJN	WELD COUNTY, COLORADO

NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION OR PROCEEDINGS UPON ANY DEFECT IN THIS SURVEY WITHIN THREE YEARS AFTER YOU FIRST DISCOVERED THE DEFECT. NO EVENT MAY ANY ACTION BASED UPON ANY DEFECT IN THIS SURVEY BE COMMENCED MORE THAN TEN YEARS FROM THIS SAID DATE OF THIS CERTIFICATION SHOWN HEREON.

WELL LOCATION CERTIFICATE: THOMASON 12C-31HZ

SECTION 31, TOWNSHIP 2 NORTH, RANGE 65 WEST, 6TH P.M.



31

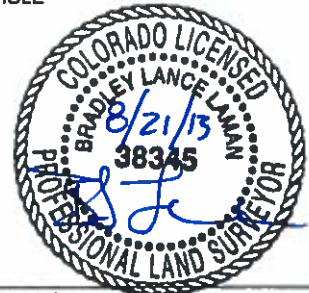
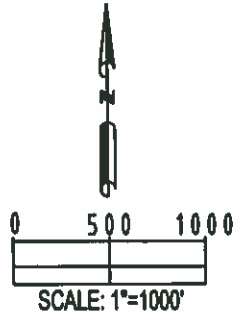
THOMASON
12C-31HZ

LEGEND

- ⊕ = EXISTING MONUMENT
- ⊙ = PROPOSED WELL
- ⊕ = BOTTOM HOLE
- ⊙ = EXISTING WELL
- BH = BOTTOM HOLE

NOTES:

1. THIS FIELD SURVEY CONFORMS TO THE MINIMUM STANDARDS SET BY THE C.O.G.C.C., RULE NO. 215
2. HORIZONTAL POSITIONS AND ORTHOMETRIC ELEVATIONS SHOWN AT THE WELL HEAD, ARE BASED ON GPS-RTK POSITIONS DERIVED FROM MINIMUM 2-HOUR STATIC OBSERVATIONS CORRECTED BY THE NATIONAL GEODETIC SURVEY ONLINE POSITIONING USER SERVICE, O.P.U.S. DATUM: HORIZONTAL = NAD83/2011, VERTICAL = NAVD88
3. THE BASIS OF BEARINGS ARE STATE PLANE COORDINATE SYSTEM GRID BEARINGS SHOWN HEREON BETWEEN THE DESCRIBED MONUMENTS SHOWN HEREON.
4. GRID DISTANCES ARE SHOWN, AS MEASURED IN THE FIELD, WITH TIES TO WELLS MEASURED PERPENDICULAR TO SECTION LINES.



BRADLEY L. LAMAN, PLS 38345
COLORADO LICENSED PROFESSIONAL LAND SURVEYOR
FOR AND ON BEHALF OF P.F.S., LLC

SHEET 2 OF 2

PREPARED BY: Petroleum Field Services, LLC 7535 Hilltop Circle Denver, CO 80221	FIELD DATE: 08-21-13	SURFACE LOCATION: SE 1/4 SW 1/4,
	DRAWING DATE: 08-21-13	SEC. 6, T1N, R65W, 6TH P.M.
BY: SMF	CHECKED: TJN	WELD COUNTY, COLORADO

NOTICE: ACCORDING TO COLORADO LAW YOU MUST COMMENCE ANY LEGAL ACTION BASED UPON ANY DEFECT IN THIS SURVEY WITHIN THREE YEARS AFTER YOU FIRST DISCOVER SUCH DEFECT. IN NO EVENT MAY ANY ACTION BASED UPON ANY DEFECT IN THIS SURVEY BE COMMENCED MORE THAN TEN YEARS FROM THIS SAID DATE OF THIS CERTIFICATION SHOWN HEREON.