

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

FORM APPROVED  
OMB NO. 1004-0137  
Expires: January 31, 2018

**SUNDRY NOTICES AND REPORTS ON WELLS**  
*Do not use this form for proposals to drill or to re-enter an abandoned well. Use form 3160-3 (APD) for such proposals.*

**Carlsbad Field Office**  
**OCD Artesia**

NMNM117120

6. If Indian, Allottee or Tribe Name

**SUBMIT IN TRIPLICATE - Other instructions on page 2**

7. If Unit or CA/Agreement, Name and/or No.  
NMNM124060

1. Type of Well  
 Oil Well  Gas Well  Other

8. Well Name and No.  
ZACH MCCORMICK FED COM 201H

2. Name of Operator Contact: TAMMY R LINK  
MATADOR PRODUCTION COMPANYE-Mail: tlink@matadorresources.com

9. API Well No.  
30-015-44247-00-X1

3a. Address 3b. Phone No. (include area code)  
ONE LINCOLN CENTER 5400 LBJ FREEWAY SUITE 1500 575-627-2465  
DALLAS, TX 75240

10. Field and Pool or Exploratory Area  
PIERCE CROSSING-WOLFCAMP, NW

4. Location of Well (Footage, Sec., T., R., M., or Survey Description)  
Sec 18 T24S R29E Lot 1 712FNL 321FWL  
32.223061 N Lat, 104.031227 W Lon

11. County or Parish, State  
EDDY COUNTY, NM

12. CHECK THE APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION			
<input checked="" type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off
<input type="checkbox"/> Subsequent Report	<input type="checkbox"/> Alter Casing	<input type="checkbox"/> Hydraulic Fracturing	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input type="checkbox"/> Recomplete	<input checked="" type="checkbox"/> Other Change to Original A PD
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	
	<input type="checkbox"/> Convert to Injection	<input type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	

13. Describe Proposed or Completed Operation: Clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports must be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 must be filed once testing has been completed. Final Abandonment Notices must be filed only after all requirements, including reclamation, have been completed and the operator has determined that the site is ready for final inspection.

BLM BOND NO. NMB001079  
SURETY BOND NO. RLB0015172

**SEE ATTACHED FOR  
CONDITIONS OF APPROVAL**

Please see attached plats to revise SHL on Matador's Zach McCormick Fed 18-24S-29E RB #201H from 712' FNL and 321' FWL of Sec 18, T24S, R29E to 742' FNL and 351' FWL of Sec 18, T24S, R29E. There is no change in pad size or location. SHL has moved within previously approved footprint. There is no change in BHL. SHL revisions are to accommodate Matador's drill schedule.

Matador also requests a variance to run 7-5/8" casing inside 9 5/8" BTC casing which will be less than the 0.422" stand off regulation. Matador has met with Christopher Walls and Mustafa Haque as well as other BLM representatives and determined that this would be acceptable as long as the 7 5/8" flush casing was run throughout the entire 300' cement tie back section between 9 5/8" and 7

*12/4/17 - Surface - VW*

*04/2017: Engineering review completed by M. Hogue*

**NM OIL CONSERVATION  
ARTESIA DISTRICT**

14. I hereby certify that the foregoing is true and correct.  
Electronic Submission #387929 verified by the BLM Well Information System  
For MATADOR PRODUCTION COMPANY, sent to the Carlsbad  
Committed to AFMSS for processing by PRISCILLA PEREZ on 10/03/2017 (18PP0054SE)

Name (Printed/Typed) TAMMY R LINK

Title PRODUCTION ANALYST

Signature (Electronic Submission)

Date 09/07/2017

DEC 12 2017  
*27*  
RECEIVED *12-7*

**THIS SPACE FOR FEDERAL OR STATE OFFICE USE**

Approved By

*[Signature]*

Title

*AFN - LEU*

Date

*12/04/17*

Conditions of approval, if any, are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Office

*CFO*

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Instructions on page 2)

**\*\* BLM REVISED \*\* BLM REVISED \*\* BLM REVISED \*\* BLM REVISED \*\* BLM REVISED \*\***

*RP 12-12-17*

**Additional data for EC transaction #387929 that would not fit on the form**

**32. Additional remarks, continued**

5/8" casing. Please see attachments for new casing design.

Please contact Cassie Hahn by phone at 972-371-5440 or by e-mail [chahn@matadorresources.com](mailto:chahn@matadorresources.com) should you have any questions.

District I  
1625 N. French Dr., Hobbs, NM 88240  
Phone: (575) 393-6161 Fax: (575) 393-0720  
District II  
811 S. First St., Artesia, NM 88210  
Phone: (575) 748-1283 Fax: (575) 748-9720  
District III  
1000 Rio Brazos Road, Aztec, NM 87410  
Phone: (505) 334-6178 Fax: (505) 334-6170  
District IV  
1220 S. St. Francis Dr., Santa Fe, NM 87505  
Phone: (505) 476-3460 Fax: (505) 476-3462

State of New Mexico  
Energy, Minerals & Natural Resources  
Department  
OIL CONSERVATION DIVISION  
1220 South St. Francis Dr.  
Sante Fe, NM 87505

FORM C-102  
Revised August 1, 2011  
Submit one copy to appropriate  
District Office

AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number 30-015-44247	<sup>2</sup> Pool Code 98220	<sup>3</sup> Pool Name Purple Sage; Wolfcamp (Gas)
<sup>4</sup> Property Code 98220	<sup>5</sup> Property Name ZACH MCCORMICK FED 18-24S-29E RB	<sup>6</sup> Well Number #201H
<sup>7</sup> OCRID No. 228937	<sup>8</sup> Operator Name MATADOR PRODUCTION COMPANY	<sup>9</sup> Elevation 2952'

<sup>10</sup>Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
D 1	18	24-S	29-E	-	742'	NORTH	351'	WEST	EDDY

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
A	18	24-S	29-E	-	331'	NORTH	240'	EAST	EDDY

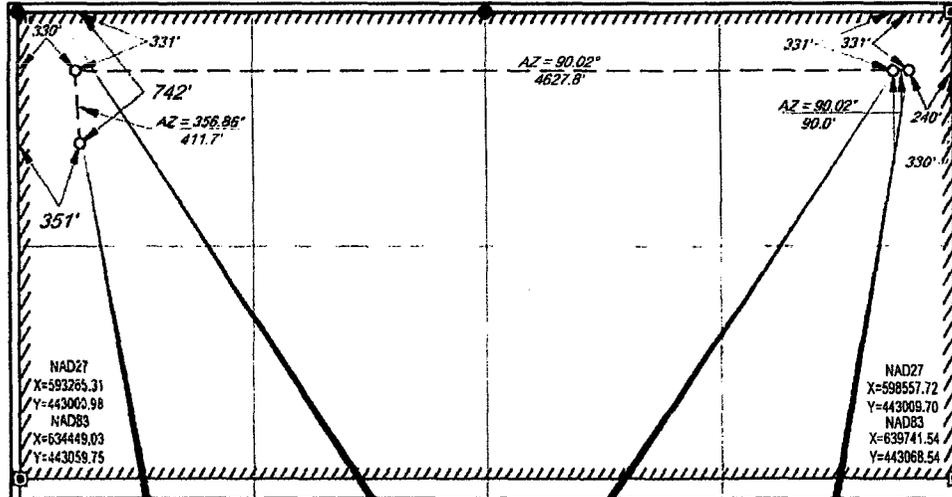
<sup>12</sup> Dedicated Acres 323.11	<sup>13</sup> Joint or Infill	<sup>14</sup> Consolidation Code	<sup>15</sup> Order No.
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No allowable will be assigned to this completion until all interests have been consolidated or a non-standard unit has been approved by the division.

NAD27 X=593252.57 Y=445667.51  
NAD83 X=634436.23 Y=445726.34

NAD27 X=595888.64 Y=445665.61  
NAD83 X=637072.34 Y=445724.47

NAD27 X=598539.65 Y=445665.23  
NAD83 X=639723.40 Y=445724.12



**17 OPERATOR CERTIFICATION**  
I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or undivided mineral interest in the land including the proposed bottom hole location or has a right to drill this well of this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

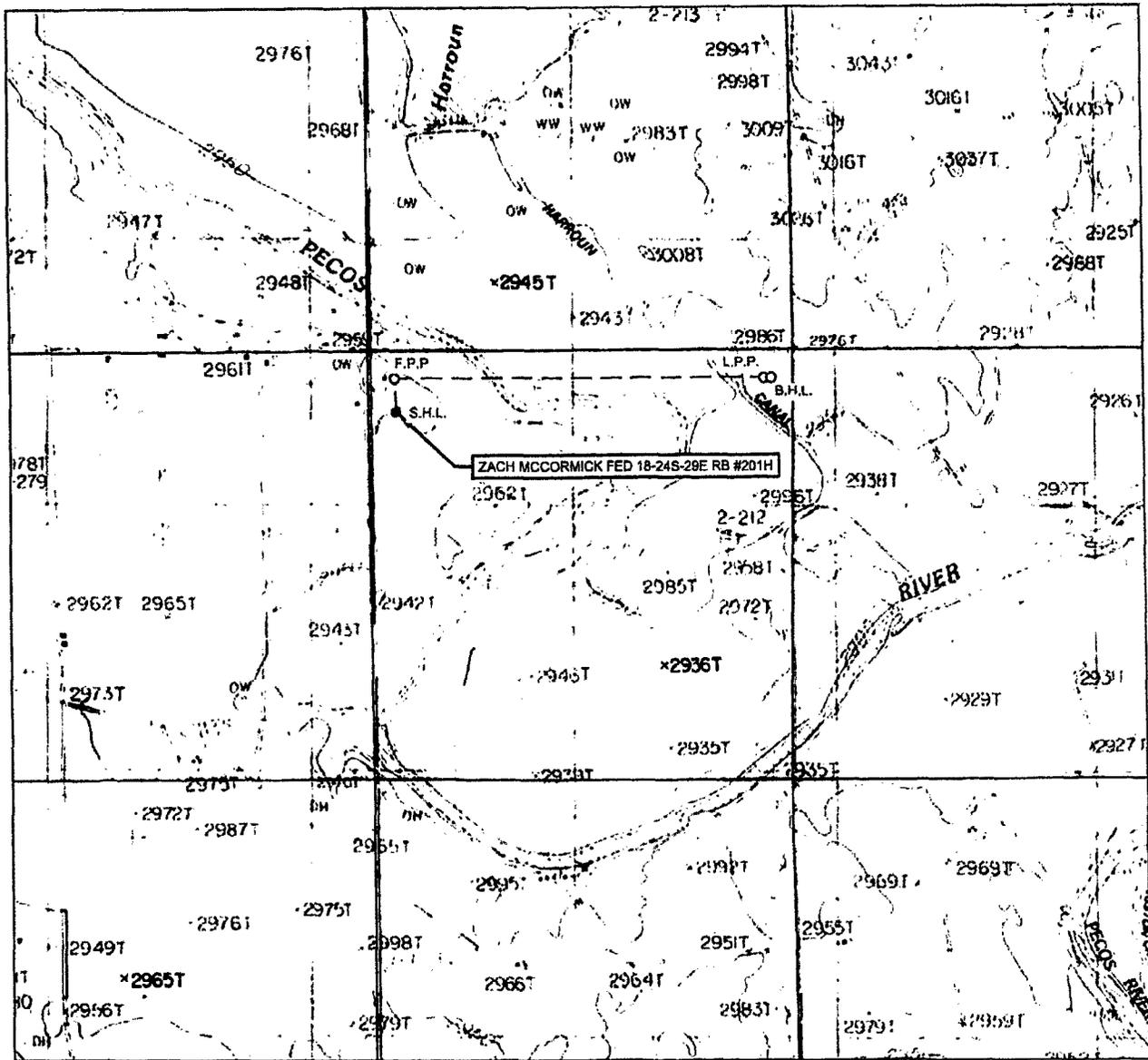
Signature: *Cassie Hahn* Date: 9/17/17  
Printed Name: Cassie Hahn  
E-mail Address: chahn@matadorresources.com

SURFACE LOCATION NEW MEXICO EAST	FIRST PERFORATION POINT NEW MEXICO EAST	LAST PERFORATION POINT NEW MEXICO EAST	BOTTOM HOLE LOCATION NEW MEXICO EAST
NAD 1927 X=593607 Y=444926 LAT.: N 32.2228550 LONG.: W 104.0306374 NAD 1983 X=634790 Y=444984 LAT.: N 32.2229772 LONG.: W 104.0311279	NAD 1927 X=593584 Y=445337 LAT.: N 32.2239851 LONG.: W 104.0307064 NAD 1983 X=634768 Y=445395 LAT.: N 32.2241074 LONG.: W 104.0311970	NAD 1927 X=598212 Y=445335 LAT.: N 32.2239429 LONG.: W 104.0157417 NAD 1983 X=639396 Y=445394 LAT.: N 32.2240654 LONG.: W 104.0162317	NAD 1927 X=598302 Y=445335 LAT.: N 32.2239421 LONG.: W 104.0154507 NAD 1983 X=639486 Y=445393 LAT.: N 32.2240646 LONG.: W 104.0159406

**18 SURVEYOR CERTIFICATION**  
I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true to the best of my belief.

Date of Survey: 08/07/2017  
Signature of Professional Surveyor: *[Signature]*  
Professional Surveyor: M. E. BROWN  
18329  
Certificate Number

# LOCATION & ELEVATION VERIFICATION MAP



LEASE NAME & WELL NO.: ZACH MCCORMICK FED 18-24S-29E RB #201H

SECTION 18 TWP 24-S RGE 29-E SURVEY N.M.P.M.  
 COUNTY EDDY STATE NM ELEVATION 2952'  
 DESCRIPTION 742' FNL & 351' FWL

LATITUDE N 32.2229772 LONGITUDE W 104.0311279



SCALE: 1" = 2000'  
 0' 1000' 2000'

THIS EASEMENT/SERVITUDE LOCATION SHOWN HEREON HAS BEEN SURVEYED ON THE GROUND UNDER MY SUPERVISION AND PREPARED ACCORDING TO THE EVIDENCE FOUND AT THE TIME OF SURVEY, AND DATA PROVIDED BY MATADOR PRODUCTION COMPANY. THIS CERTIFICATION IS MADE AND LIMITED TO THOSE PERSONS OR ENTITIES SHOWN ON THE FACE OF THIS PLAT AND IS NON-TRANSFERABLE. THIS SURVEY IS CERTIFIED FOR THIS TRANSACTION ONLY.

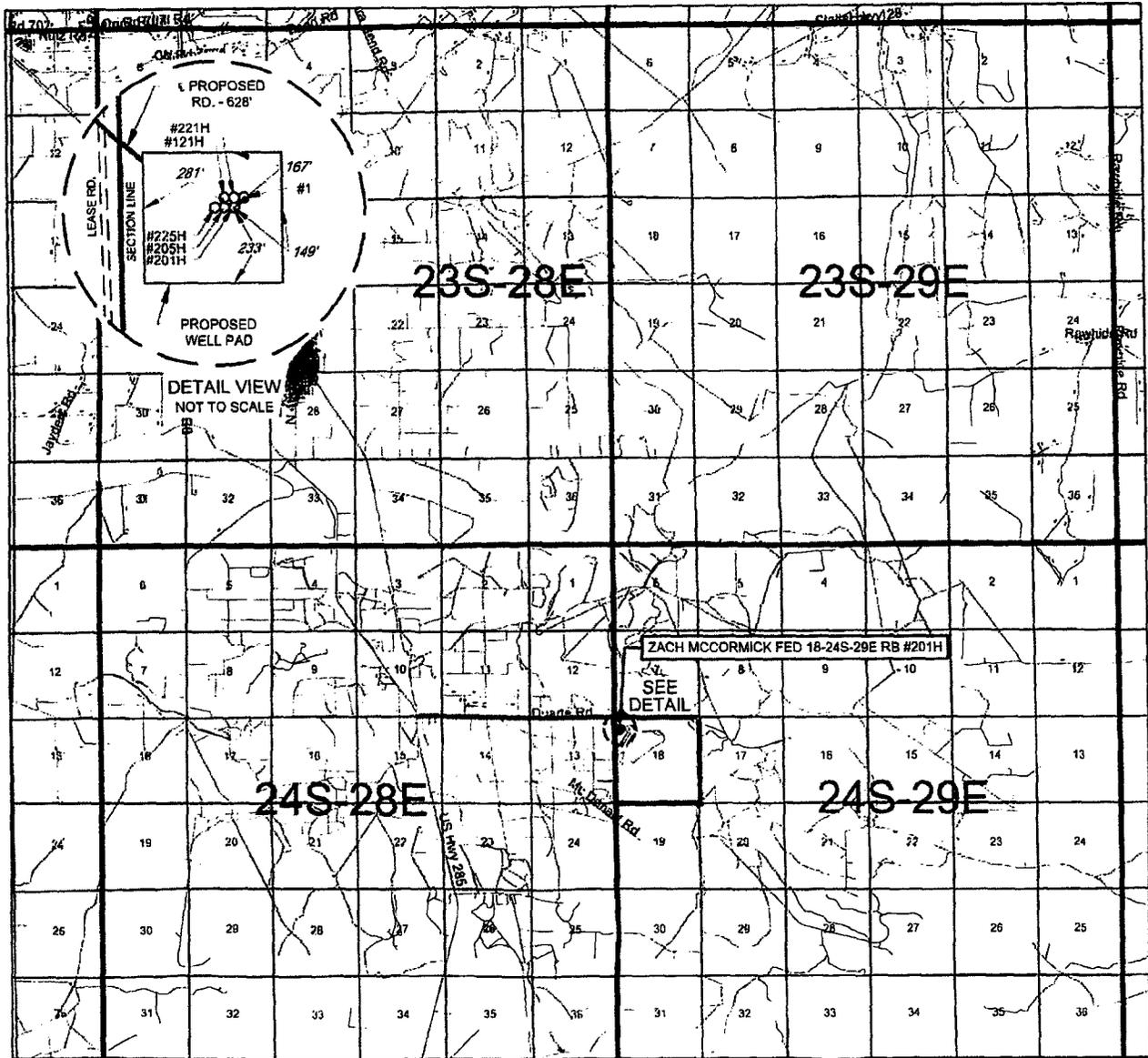
ALL BEARINGS, DISTANCES, AND COORDINATE VALUES CONTAINED HEREON ARE GRID BASED UPON THE NEW MEXICO STATE PLANE COORDINATE SYSTEM, EAST ZONE OF THE NORTH AMERICAN DATUM 1983, U.S. SURVEY FEET.



**TOPOGRAPHIC**  
 LOYALTY INNOVATION LEGACY

1400 EVERMAN PARKWAY, Ste. 197 • FT. WORTH, TEXAS 76140  
 TELEPHONE: (817) 744-7512 • FAX (817) 744-7548  
 2803 NORTH BIG SPRING • MIDLAND, TEXAS 79705  
 TELEPHONE: (432) 682-1653 OR (800) 767-1653 • FAX (432) 682-1743  
 WWW.TOPOGRAPHIC.COM

# VICINITY MAP



LEASE NAME & WELL NO.: ZACH MCCORMICK FED 18-24S-29E RB #201H

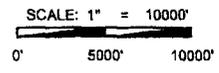
SECTION 18 TWP 24-S RGE 29-E SURVEY N.M.P.M.

COUNTY EDDY STATE NM

DESCRIPTION 742' FNL & 351' FWL

**DISTANCE & DIRECTION**

FROM INT. OF US-285 & DUARTE RD., GO EAST ON DUARTE RD. ±2.3  
MILES, THENCE SOUTH (RIGHT) ON A PROPOSED ROAD ±628 FEET TO  
A POINT ±300 FEET NORTHEAST OF THE LOCATION.



THIS EASEMENT/SERVITUDE LOCATION SHOWN HEREON HAS BEEN SURVEYED ON THE GROUND UNDER MY SUPERVISION AND PREPARED ACCORDING TO THE EVIDENCE FOUND AT THE TIME OF SURVEY, AND DATA PROVIDED BY MATADOR PRODUCTION COMPANY. THIS CERTIFICATION IS MADE AND LIMITED TO THOSE PERSONS OR ENTITIES SHOWN ON THE FACE OF THIS PLAT AND IS NON-TRANSFERABLE. THIS SURVEY IS CERTIFIED FOR THIS TRANSACTION ONLY.

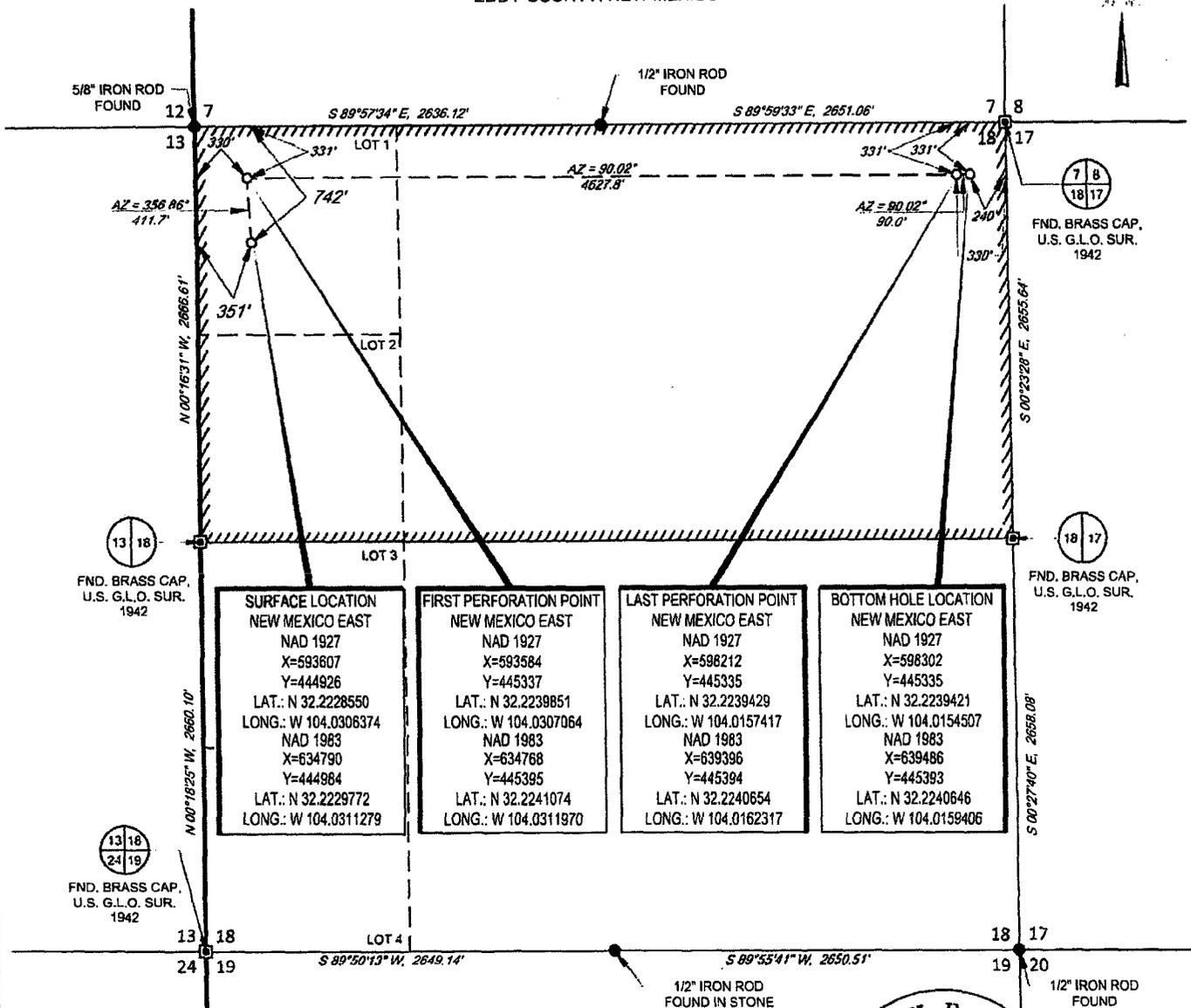
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 LOYALTY INNOVATION LEGACY  
 1400 EVERMAN PARKWAY, Ste. 197 • FT. WORTH, TEXAS 76140  
 TELEPHONE (817) 744-7512 • FAX (817) 744-7518  
 2903 NORTH BIG SPRING • MIDLAND, TEXAS 79703  
 TELEPHONE: (432) 682-1653 OR (800) 767-1653 • FAX (432) 682-1743  
 WWW.TOPOGRAPHIC.COM

SCALE: 1" = 1000'  
 0' 500' 1000'

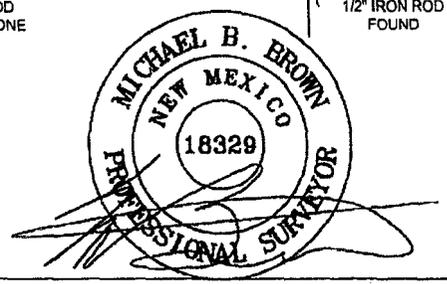


SECTION 18, TOWNSHIP 24-S, RANGE 29-E, N.M.P.M.  
 EDDY COUNTY, NEW MEXICO



SURFACE LOCATION NEW MEXICO EAST	FIRST PERFORATION POINT NEW MEXICO EAST	LAST PERFORATION POINT NEW MEXICO EAST	BOTTOM HOLE LOCATION NEW MEXICO EAST
NAD 1927 X=593607 Y=444926	NAD 1927 X=593584 Y=445337	NAD 1927 X=598212 Y=445335	NAD 1927 X=598302 Y=445335
LAT.: N 32.2228550 LONG.: W 104.0306374	LAT.: N 32.2239851 LONG.: W 104.0307064	LAT.: N 32.2239429 LONG.: W 104.0157417	LAT.: N 32.2239421 LONG.: W 104.0154507
NAD 1983 X=634790 Y=444984	NAD 1983 X=634768 Y=445395	NAD 1983 X=639396 Y=445394	NAD 1983 X=639486 Y=445393
LAT.: N 32.2229772 LONG.: W 104.0311279	LAT.: N 32.2241074 LONG.: W 104.0311970	LAT.: N 32.2240654 LONG.: W 104.0162317	LAT.: N 32.2240646 LONG.: W 104.0159406

LEASE NAME & WELL NO.: ZACH MCCORMICK FED 18-24S-29E RB #201H  
 SECTION 18 TWP 24-S RGE 29-E SURVEY N.M.P.M.  
 COUNTY EDDY STATE NM  
 DESCRIPTION 742' FNL & 351' FWL  
 DISTANCE & DIRECTION  
FROM INT. OF US-285 & DUARTE RD. GO EAST ON DUARTE RD. ±2.3  
MILES, THENCE SOUTH (RIGHT) ON A PROPOSED ROAD ±628 FEET TO  
A POINT ±300 FEET NORTHEAST OF THE LOCATION.



Michael Blake Brown, P.S. No. 18329  
 AUGUST 14, 2017

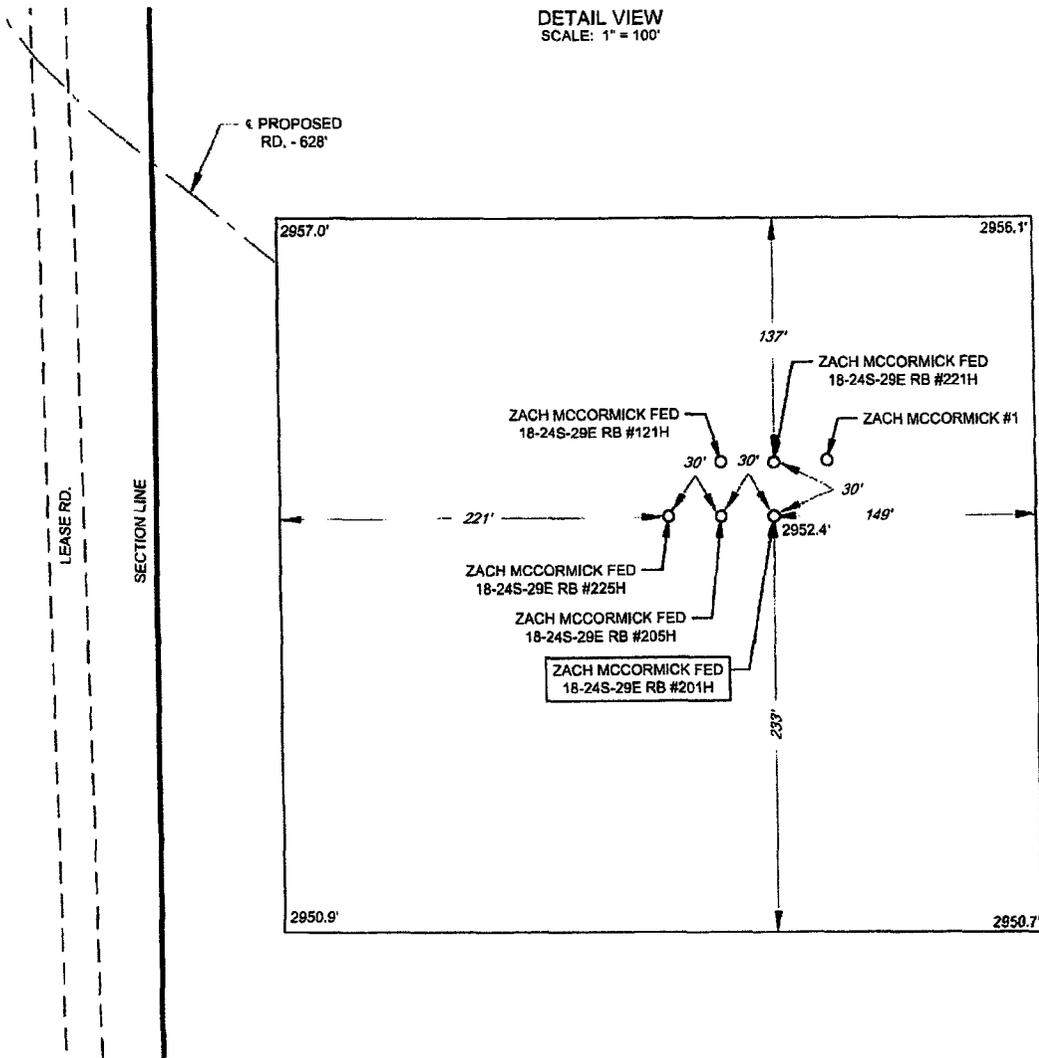
ALL BEARINGS, DISTANCES, AND COORDINATE VALUES CONTAINED HEREON ARE GRID BASED UPON THE NEW MEXICO STATE PLANE COORDINATE SYSTEM, EAST ZONE OF THE NORTH AMERICAN DATUM 1983, U.S. SURVEY FEET. THIS EASEMENT/SERVITUDE LOCATION SHOWN HEREON HAS BEEN SURVEYED ON THE GROUND UNDER MY SUPERVISION AND PREPARED ACCORDING TO THE EVIDENCE FOUND AT THE TIME OF SURVEY, AND DATA PROVIDED BY MATADOR PRODUCTION COMPANY. THIS CERTIFICATION IS MADE AND LIMITED TO THOSE PERSONS OR ENTITIES SHOWN ON THE FACE OF THIS PLAT AND IS NON-TRANSFERABLE. THIS SURVEY IS CERTIFIED FOR THIS TRANSACTION ONLY.  
 AS OF THE DATE OF SURVEY, ALL ABOVE GROUND APPURTENANCES WITHIN 300' OF THE STAKED LOCATION ARE SHOWN HEREON.

**TOPOGRAPHIC**  
 LOYALTY INNOVATION LEGACY  
 1400 EVERMAN PARKWAY, Ste 197 • FT WORTH, TEXAS 76140  
 TELEPHONE (817) 744-7512 • FAX (817) 744-7548  
 2903 NORTH BIG SPRING • MIDLAND, TEXAS 79705  
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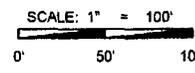


SECTION 18, TOWNSHIP 24-S, RANGE 29-E, N.M.P.M.  
EDDY COUNTY, NEW MEXICO

DETAIL VIEW  
SCALE: 1" = 100'



LEASE NAME & WELL NO.: ZACH MCCORMICK FED 18-24S-29E RB #201H  
 #201H LATITUDE N 32.2229772 #201H LONGITUDE W 104.0311279



**LEGEND**

- EXISTING ROAD
- BLOCK LINE
- - - PROPOSED ROAD

ALL BEARINGS, DISTANCES, AND COORDINATE VALUES CONTAINED HEREON ARE GRID BASED UPON THE NEW MEXICO STATE PLANE COORDINATE SYSTEM, EAST ZONE OF THE NORTH AMERICAN DATUM 1983, U.S. SURVEY FEET

THIS PROPOSED PAD SITE LOCATION SHOWN HEREON HAS BEEN SURVEYED ON THE GROUND UNDER MY SUPERVISION AND PREPARED ACCORDING TO THE EVIDENCE FOUND AT THE TIME OF SURVEY, AND DATA PROVIDED BY MATADOR PRODUCTION COMPANY. THIS CERTIFICATION IS MADE AND LIMITED TO THOSE PERSONS OR ENTITIES SHOWN ON THE FACE OF THIS PLAT AND IS NON-TRANSFERABLE THIS SURVEY IS CERTIFIED FOR THIS TRANSACTION ONLY



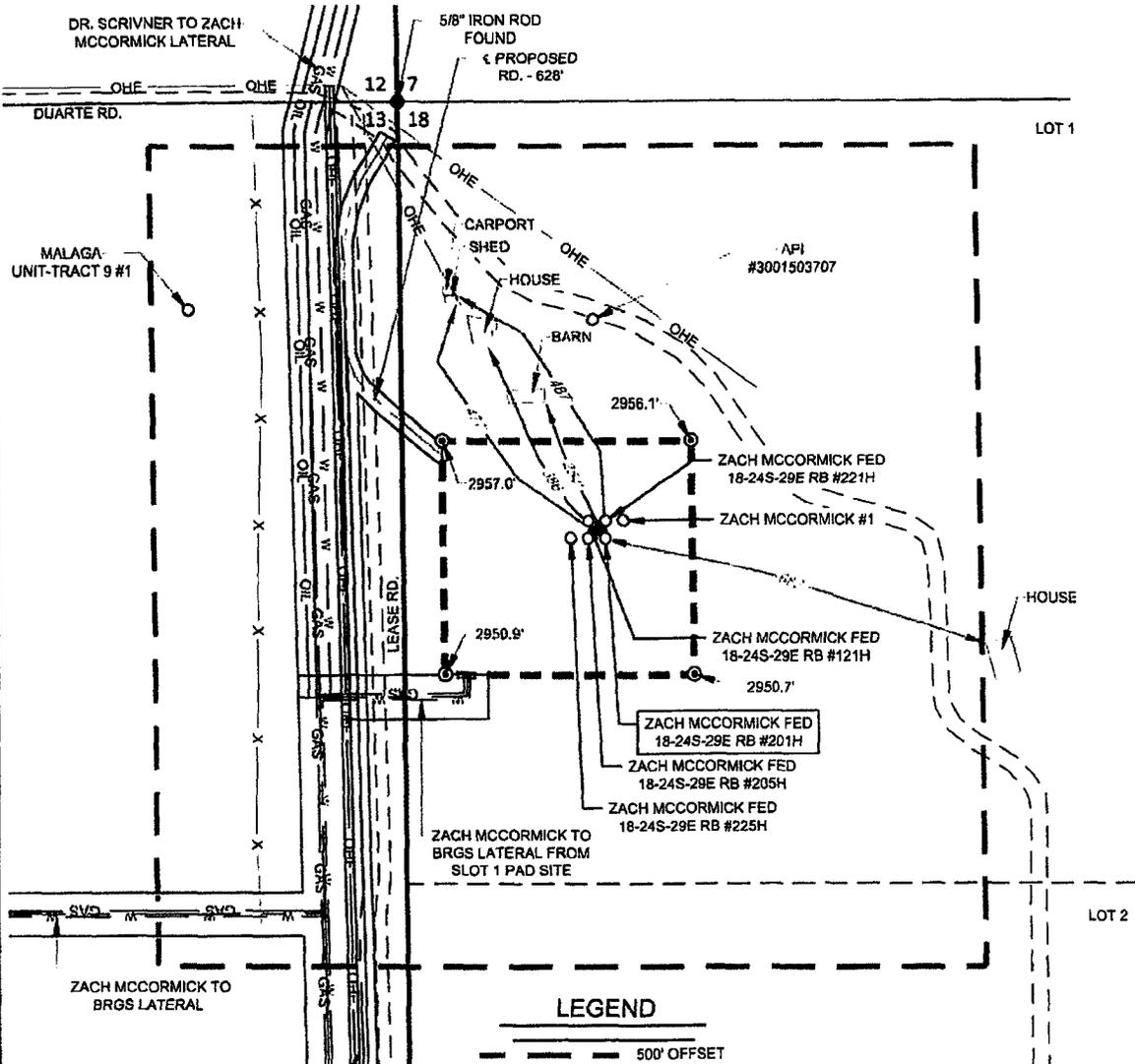
**TOPOGRAPHIC**  
LOYALTY INNOVATION LEGACY

1400 EVERMAN PARKWAY, Ste 197 • FT. WORTH, TEXAS 76140  
 TELEPHONE (817) 744-7512 • FAX (817) 744-7548  
 2903 NORTH BIG SPRING • MIDLAND, TEXAS 79705  
 TELEPHONE: (432) 682-1650 OR (800) 767-1659 • FAX (432) 682-1743  
 WWW.TOPOGRAPHIC.COM

ORIGINAL DOCUMENT SIZE: 8.5" X 11"

SCALE: 1" = 300'  
 0' 150' 300'

SECTION 18, TOWNSHIP 24-S, RANGE 29-E, N.M.P.M.  
 EDDY COUNTY, NEW MEXICO

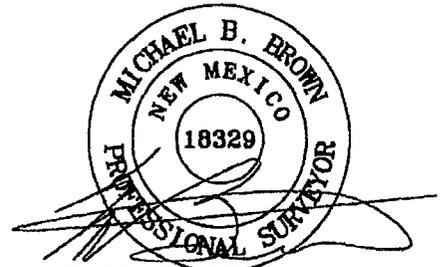


LEGEND

- 500' OFFSET
- - - - - PROPOSED SITE
- ==== BLOCK/TOWNSHIP LINE
- ===== SURVEY/SECTION LINE
- == ROAD WAY
- X FENCE LINE
- OHE OVERHEAD ELECTRIC
- w WATER LINE
- o OIL LINE
- g GAS LINE
- IRON ROD SET
- IRON ROD FOUND



**TOPOGRAPHIC**  
 LOYALTY INNOVATION LEGACY  
 1400 EVERMAN PARKWAY, Ste. 187 • FT. WORTH, TEXAS 76140  
 TELEPHONE: (817) 744-7512 • FAX (617) 744-7546  
 2903 NORTH BIG SPRING • MIDLAND, TEXAS 79705  
 TELEPHONE: (432) 682-1653 OR (800) 787-1853 • FAX (432) 682-1743  
 WWW.TOPOGRAPHIC.COM



Michael Blake Brown, P.S. No. 18329  
 AUGUST 14, 2017

ZACH MCCORMICK FED 18-24S-29E RB #201H PROXIMITY	REVISION:	
	INT	DATE
DATE: 08/11/17		
FILE: LO ZACH MCCORMICK FEDERAL 18-24S-29E RB 201H REV1		
DRAWN BY: MML		
SHEET: 7 OF 7		

NOTES:  
 1 ORIGINAL DOCUMENT SIZE: 8 5/8" X 11"  
 2 ALL BEARINGS, DISTANCES, AND COORDINATE VALUES CONTAINED HEREIN ARE GRID BASED UPON THE NEW MEXICO STATE PLANE COORDINATE SYSTEM, EAST ZONE, U.S. SURVEY FEET, NORTH AMERICAN DATUM 1983.  
 3 CERTIFICATION IS MADE ONLY TO THE LOCATION OF THIS EASEMENT, IN RELATION TO THE EVIDENCE FOUND DURING A FIELD SURVEY, MADE ON THE GROUND, UNDER MY SUPERVISION, AND USING DOCUMENTATION PROVIDED BY MATADOR PRODUCTION COMPANY. ONLY UTILITIES/EASEMENTS THAT WERE VISIBLE ON THE DATE OF THIS SURVEY, WITHIN/ADJOINING THIS EASEMENT, HAVE BEEN LOCATED AS SHOWN HEREON OF WHICH I HAVE KNOWLEDGE. THIS CERTIFICATION IS LIMITED TO THOSE PERSONS OR ENTITIES SHOWN ON THE FACE OF THIS PLAT AND IS NON-TRANSFERABLE, AND MADE FOR THIS TRANSACTION ONLY.

Name	Hole Size	Casing Size	Wt/Grade	Thread Collar	Setting Depth	Top Cement
Surface	17-1/2"	13-3/8" (new)	54.5# J-55	BTC	<del>600</del> 650	Surface
Intermediate	12-1/4"	9-5/8" (new)	40# J-55	BTC	2750	Surface
Intermediate 2 Top	8-3/4"	7-5/8" (new)	29.7# P-110	BTC	2450	2450
Intermediate 2 Middle	8-3/4"	7-5/8" (new)	29.7# P-110	VAM HTF-NR	9200	2450
Intermediate 2 Bottom	8-3/4"	7" (new)	29# P-110	BTC	10002	2450
Production Top	6-1/8"	5-1/2" (new)	20# P-110	BTC/TXP	9100	9500
Production Bottom	6-1/8"	4-1/2" (new)	13.5# P-110	BTC/TXP	14624	9500

Name	Type	Sacks	Yield	Weight	Blend
Surface	Tail	400	1.38	14.8	Class C + 5% NaCl + LCM
TOC = 0'			100% Excess		Centralizers per Onshore Order 2.III.B.1f
Intermediate	Lead	550	2.13	12.6	Class C + Bentonite + 1% CaCl2 + 8% NaCl + LCM
	Tail	270	1.38	14.8	Class C + 5% NaCl + LCM
TOC = 0'			100% Excess		2 on btm jt, 1 on 2nd jt, 1 every 4th jt to surface
Intermediate 2	Lead	400	2.13	12.6	TXI + Fluid Loss + Dispersant + Retarder + LCM
	Tail	310	1.38	14.8	TXI + Fluid Loss + Dispersant + Retarder + LCM
TOC = 2450'			60% Excess		2 on btm jt, 1 on 2nd jt, 1 every 4th jt to top of tail cement (500' above TOC)
Production	Tail	510	1.17	15.8	Class H + Fluid Loss + Dispersant + Retarder + LCM
TOC = 9500'			25% Excess		2 on btm jt, 1 on 2nd jt, 1 every other jt to top of curve

Low Cement

For the latest performance data, always visit our website: [www.tenaris.com](http://www.tenaris.com)

February 02 2017



**Connection:** TenarisXP® BTC  
**Casing/Tubing:** CAS  
**Coupling Option:** REGULAR

**Size:** 4.500 in.  
**Wall:** 0.290 in.  
**Weight:** 13.50 lbs/ft  
**Grade:** P110-ICY  
**Min. Wall Thickness:** 87.5 %

Nominal OD	<b>4.500 in.</b>	Nominal Weight	<b>13.50 lbs/ft</b>	Standard Drift Diameter	<b>3.795 in.</b>
Nominal ID	<b>3.920 in.</b>	Wall Thickness	<b>0.290 in.</b>	Special Drift Diameter	<b>N/A</b>
Plain End Weight	<b>13.05 lbs/ft</b>				
Body Yield Strength	<b>479 x 1000 lbs</b>	Internal Yield	<b>14100 psi</b>	SMYS	<b>125000 psi</b>
Collapse	<b>11620 psi</b>				
Connection OD	<b>5.000 in.</b>	Coupling Length	<b>9.075 in.</b>	Connection ID	<b>3.908 in.</b>
Critical Section Area	<b>3.836 sq. in.</b>	Threads per in.	<b>5.00</b>	Make-Up Loss	<b>4.016 in.</b>
Tension Efficiency	<b>100 %</b>	Joint Yield Strength	<b>479 x 1000 lbs</b>	Internal Pressure Capacity <sup>(1)</sup>	<b>14100 psi</b>
Structural Compression Efficiency	<b>100 %</b>	Structural Compression Strength	<b>479 x 1000 lbs</b>	Structural Bending <sup>(2)</sup>	<b>127 °/100 ft</b>
External Pressure Capacity	<b>11620 psi</b>				
Minimum	<b>6950 ft-lbs</b>	Optimum	<b>7720 ft-lbs</b>	Maximum	<b>8490 ft-lbs</b>
Operating Torque	<b>10500 ft-lbs</b>	Yield Torque	<b>12200 ft-lbs</b>		

Blanking Dimensions

(1) Internal Pressure Capacity related to structural resistance only. Internal pressure leak resistance as per

section 10.3 API 5C3 / ISO 10400 - 2007.

**(2)** Structural rating, pure bending to yield (i.e no other loads applied)

**(3)** Torque values calculated for API Modified thread compounds with Friction Factor=1. For other thread compounds please contact us at [licensees@oilfield.tenaris.com](mailto:licensees@oilfield.tenaris.com). Torque values may be further reviewed.

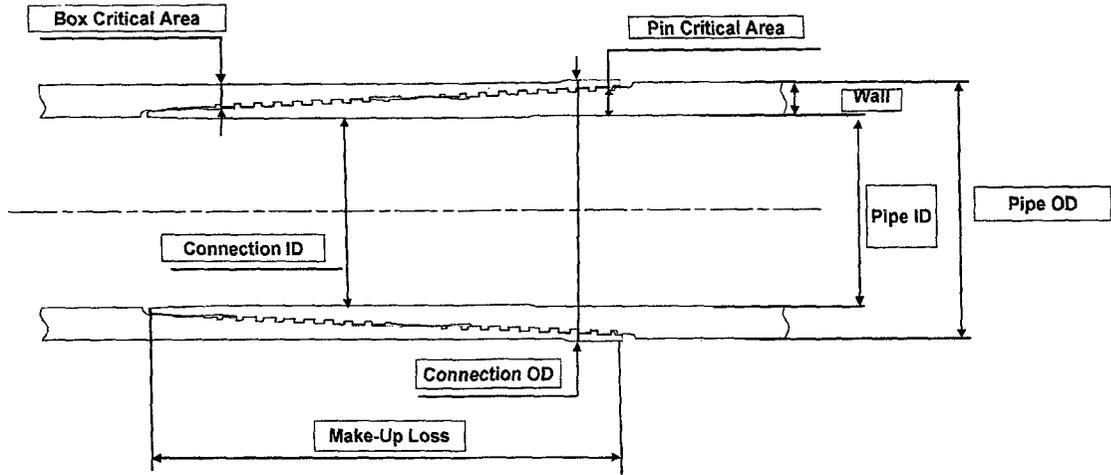
For additional information, please contact us at [contact-tenarishydril@tenaris.com](mailto:contact-tenarishydril@tenaris.com)

# CONNECTION DATA SHEET ( Imperial Units )



Connection: VAM® HTF-NR 7,625" 29,70# P110EC  
 Alternate Drift: 6,750"

Drawing: PD-101836P PD-101836B Isolated connection



OD	WEIGHT	WALL	GRADE	API DRIFT
7,625"	29,70 lb/ft	0,375"	P110EC	6,750"

PIPE BODY PROPERTIES:			CONNECTION PROPERTIES:		
Outside Diameter	<i>inch</i>	7,625	Connection OD (nom)	<i>inch</i>	7,701
Internal Diameter	<i>inch</i>	6,875	Connection ID	<i>inch</i>	6,782
Nominal Area	<i>sqin.</i>	8,541	Coupling Length	<i>inch</i>	N/A
			Make-up Loss	<i>inch</i>	4,657
			Box critical area	<i>%PBYS</i>	58%
			Pin critical area	<i>%PBYS</i>	67%
Yield Strength	<i>klb</i>	1 068	Yield Strength	<i>klb</i>	619
Ultimate Strength	<i>klb</i>	1 153	Ultimate strength	<i>klb</i>	669
			Structural compression	<i>klb</i>	776
			Compression with sealability	<i>klb</i>	371
MIYP	<i>psi</i>	10 760	MIYP	<i>psi</i>	10 760
Collapse Pressure	<i>psi</i>	5 670	Ext Pressure Resistance	<i>psi</i>	5 670
			Regular Make-up Torque	<i>ft.lb</i>	
			Min		9 600
			Opt		11 300
			Max		13 000
			Maximum Torque with Sealability	<i>ft.lb</i>	58 500
			Maximum Torsional Value	<i>ft.lb</i>	73 000

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80 VAM Specialists available worldwide 24/7 for Rig Site Assistance



Designed by :  
 X. MENCAGLIA

Reference: VRCC16-1177  
 Revision : 0  
 Date : July 19, 2016

For the latest performance data, always visit our website: [www.tenaris.com](http://www.tenaris.com)

February 02 2017



**Connection:** TenarisXP® BTC  
**Casing/Tubing:** CAS  
**Coupling Option:** REGULAR

**Size:** 5.500 in.  
**Wall:** 0.361 in.  
**Weight:** 20.00 lbs/ft  
**Grade:** P110-IC  
**Min. Wall Thickness:** 87.5 %

Nominal OD	<b>5.500 in.</b>	Nominal Weight	<b>20.00 lbs/ft</b>	Standard Drift Diameter	<b>4.653 in.</b>
Nominal ID	<b>4.778 in.</b>	Wall Thickness	<b>0.361 in.</b>	Special Drift Diameter	<b>N/A</b>
Plain End Weight	<b>19.83 lbs/ft</b>				
Body Yield Strength	<b>641 x 1000 lbs</b>	Internal Yield	<b>12630 psi</b>	SMYS	<b>110000 psi</b>
Collapse	<b>12100 psi</b>				
Connection OD	<b>6.100 in.</b>	Coupling Length	<b>9.450 in.</b>	Connection ID	<b>4.766 in.</b>
Critical Section Area	<b>5.828 sq. in.</b>	Threads per in.	<b>5.00</b>	Make-Up Loss	<b>4.204 in.</b>
Tension Efficiency	<b>100 %</b>	Joint Yield Strength	<b>641 x 1000 lbs</b>	Internal Pressure Capacity <sup>(1)</sup>	<b>12630 psi</b>
Structural Compression Efficiency	<b>100 %</b>	Structural Compression Strength	<b>641 x 1000 lbs</b>	Structural Bending <sup>(2)</sup>	<b>92 °/100 ft</b>
External Pressure Capacity	<b>12100 psi</b>				
Minimum	<b>11270 ft-lbs</b>	Optimum	<b>12520 ft-lbs</b>	Maximum	<b>13770 ft-lbs</b>
Operating Torque	<b>21500 ft-lbs</b>	Yield Torque	<b>23900 ft-lbs</b>		

Blanking Dimensions

(1) Internal Pressure Capacity related to structural resistance only. Internal pressure leak resistance as per

section 10.3 API 5C3 / ISO 10400 - 2007.

**(2)** Structural rating, pure bending to yield (i.e no other loads applied)

**(3)** Torque values calculated for API Modified thread compounds with Friction Factor=1. For other thread compounds please contact us at [licensees@oilfield.tenaris.com](mailto:licensees@oilfield.tenaris.com). Torque values may be further reviewed.

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**PECOS DISTRICT  
DRILLING OPERATIONS  
CONDITIONS OF APPROVAL**

OPERATOR'S NAME:	Matador Production Company
LEASE NO.:	NMNM117120
WELL NAME & NO.:	201H-Zach McCormick Fed Com
SURFACE HOLE FOOTAGE:	742'/N & 351'/W
BOTTOM HOLE FOOTAGE:	331'/N & 240'/E
LOCATION:	Section 18, T.24 S., R.29 E., NMPM
COUNTY:	Eddy County, New Mexico

**All previous COAs still apply, except for the following:**

**A. CASING**

**Changes to the approved APD casing program need prior approval if the items substituted are of lesser grade or different casing size or are Non-API. The Operator can exchange the components of the proposal with that of superior strength (i.e. changing from J-55 to N-80, or from 36# to 40#). Changes to the approved cement program need prior approval if the altered cement plan has less volume or strength or if the changes are substantial (i.e. Multistage tool, ECP, etc.). The initial wellhead installed on the well will remain on the well with spools used as needed.**

**Centralizers required on surface casing per Onshore Order 2.III.B.1.f.**

**Wait on cement (WOC) for Water Basin:**

**After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi at the shoe, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. See individual casing strings for details regarding lead cement slurry requirements.**

**Provide compressive strengths including hours to reach required 500 pounds compressive strength prior to cementing each casing string. Have well specific cement details onsite prior to pumping the cement for each casing string.**

**No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.**

**Medium Cave/Karst**

**Possible water flows in the Artesia Group and Salado.**

**Possibility of lost circulation in the Artesia Group, Rustler, Capitan Reef, and Delaware.**

**Abnormal pressure might be encountered upon entering third Bone Spring and subsequent formations.**

1. The 13-3/8 inch surface casing shall be set at approximately 650 feet (a minimum of 25 feet into the Rustler Anhydrite and above the salt) and cemented to the surface. **If salt is encountered, set casing at least 25 feet above the salt. Excess calculates to 9% - additional cement might be required.**
  - a. If cement does not circulate to the surface, the appropriate BLM office shall be notified and a temperature survey utilizing an electronic type temperature survey with surface log readout will be used or a cement bond log shall be run to verify the top of the cement. Temperature survey will be run a minimum of six hours after pumping cement and ideally between 8-10 hours after completing the cement job.
  - b. Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry.**
  - c. Wait on cement (WOC) time for a remedial job will be a minimum of 4 hours after bringing cement to surface or 500 pounds compressive strength, whichever is greater.
  - d. If cement falls back, remedial cementing will be done prior to drilling out that string.
2. The minimum required fill of cement behind the 9-5/8 inch first intermediate casing, is:
  - Cement to surface. If cement does not circulate see A.1.a, c-d above. **Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst.**

**If cement does not circulate to surface on the the first two casing strings, the cement on the third casing must come to surface.**

3. The minimum required fill of cement behind the 7 5/8 X 7 inch second intermediate casing, is:
  - Cement should tie-back at least 200 feet into previous casing string. Operator shall provide method of verification.

**Formation below the 7 5/8" X 7.0" shoe to be tested according to Onshore Order 2.III.B.1.i. Test to be done as a mud equivalency test using the mud weight necessary for the pore pressure of the formation below the shoe (not the mud weight**

**required to prevent dissolving the salt formation) and the mud weight for the bottom of the hole. Report results to BLM office.**

4. The minimum required fill of cement behind the **5 1/2 X 4 1/2** inch production casing, is:

Cement should tie-back at least **200** feet into previous casing string. Operator shall provide method of verification.

5. If hardband drill pipe is rotated inside casing, returns will be monitored for metal. If metal is found in samples, drill pipe will be pulled and rubber protectors which have a larger diameter than the tool joints of the drill pipe will be installed prior to continuing drilling operations.

**MHH 12042017**