

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 Rd., Aztec, NM 87410
Phone:(505) 334-6178 Fax:(505) 334-6170

District IV

1220 S. St Francis Dr., Santa Fe, NM 87505
Phone:(505) 476-3470 Fax:(505) 476-3462

State of New Mexico
Energy, Minerals and Natural Resources
Oil Conservation Division
1220 S. St Francis Dr.
Santa Fe, NM 87505

Form C-101

August 1, 2011

Permit 278257

APPLICATION FOR PERMIT TO DRILL, RE-ENTER, DEEPEN, PLUGBACK, OR ADD A ZONE

1. Operator Name and Address ADVANCE ENERGY PARTNERS HAT MESA, LLC 11490 Westheimer Rd., Ste 950 Houston, TX 77077		2. OGRID Number 372417
		3. API Number 30-025-46881
4. Property Code 319599	5. Property Name DAGGER LAKE 5 STATE COM	6. Well No. 553H

7. Surface Location

UL - Lot K	Section 5	Township 22S	Range 33E	Lot Idn K	Feet From 1940	N/S Line S	Feet From 1864	E/W Line W	County Lea
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8. Proposed Bottom Hole Location

UL - Lot C	Section 32	Township 21S	Range 33E	Lot Idn C	Feet From 100	N/S Line N	Feet From 1980	E/W Line W	County Lea
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9. Pool Information

LEGG;BONE SPRING	37870
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Additional Well Information

11. Work Type New Well	12. Well Type OIL	13. Cable/Rotary	14. Lease Type State	15. Ground Level Elevation 3656
16. Multiple N	17. Proposed Depth 19060	18. Formation Bone Spring	19. Contractor	20. Spud Date 2/14/2020
Depth to Ground water		Distance from nearest fresh water well		Distance to nearest surface water

☒ We will be using a closed-loop system in lieu of lined pits**21. Proposed Casing and Cement Program**

Type	Hole Size	Casing Size	Casing Weight/ft	Setting Depth	Sacks of Cement	Estimated TOC
Int1	12.25	9.625	40	4000	950	0
Int1	12.25	9.625	40	5300	330	4000
Surf	17.5	9.625	54.5	1600	500	0
Prod	8.5	5.5	20	19060	2300	0

Casing/Cement Program: Additional Comments

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22. Proposed Blowout Prevention Program

Type	Working Pressure	Test Pressure	Manufacturer
Double Ram	5000	5000	

23. I hereby certify that the information given above is true and complete to the best of my knowledge and belief. I further certify I have complied with 19.15.14.9 (A) NMAC ☒ and/or 19.15.14.9 (B) NMAC ☒ , if applicable.	OIL CONSERVATION DIVISION	
Signature:		
Printed Name: Electronically filed by David C Harwell	Approved By: Paul F Kautz	
Title: VP Engineering	Title: Geologist	
Email Address: dharwell@advanceenergypartners.com	Approved Date: 2/15/2020	Expiration Date: 2/15/2022
Date: 2/12/2020	Phone: 832-672-4604	Conditions of Approval Attached

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State of New Mexico
Energy, Minerals and Natural Resources Department

Form C-102
Revised August 4, 2011

Submit one copy to appropriate
District Office

OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, New Mexico 87505

WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number	Pool Code 37870	Pool Name LEGG; BONE SPRING
Property Code 319599	Property Name DAGGER LAKE 5 STATE COM	Well Number 553H
OGRID No. 372417	Operator Name ADVANCE ENERGY PARTNERS HAT MESA	Elevation 3656'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	SOUTH/South line	Feet from the	East/West line	County
K	5	22 S	33 E		1940	SOUTH	1864	WEST	LEA

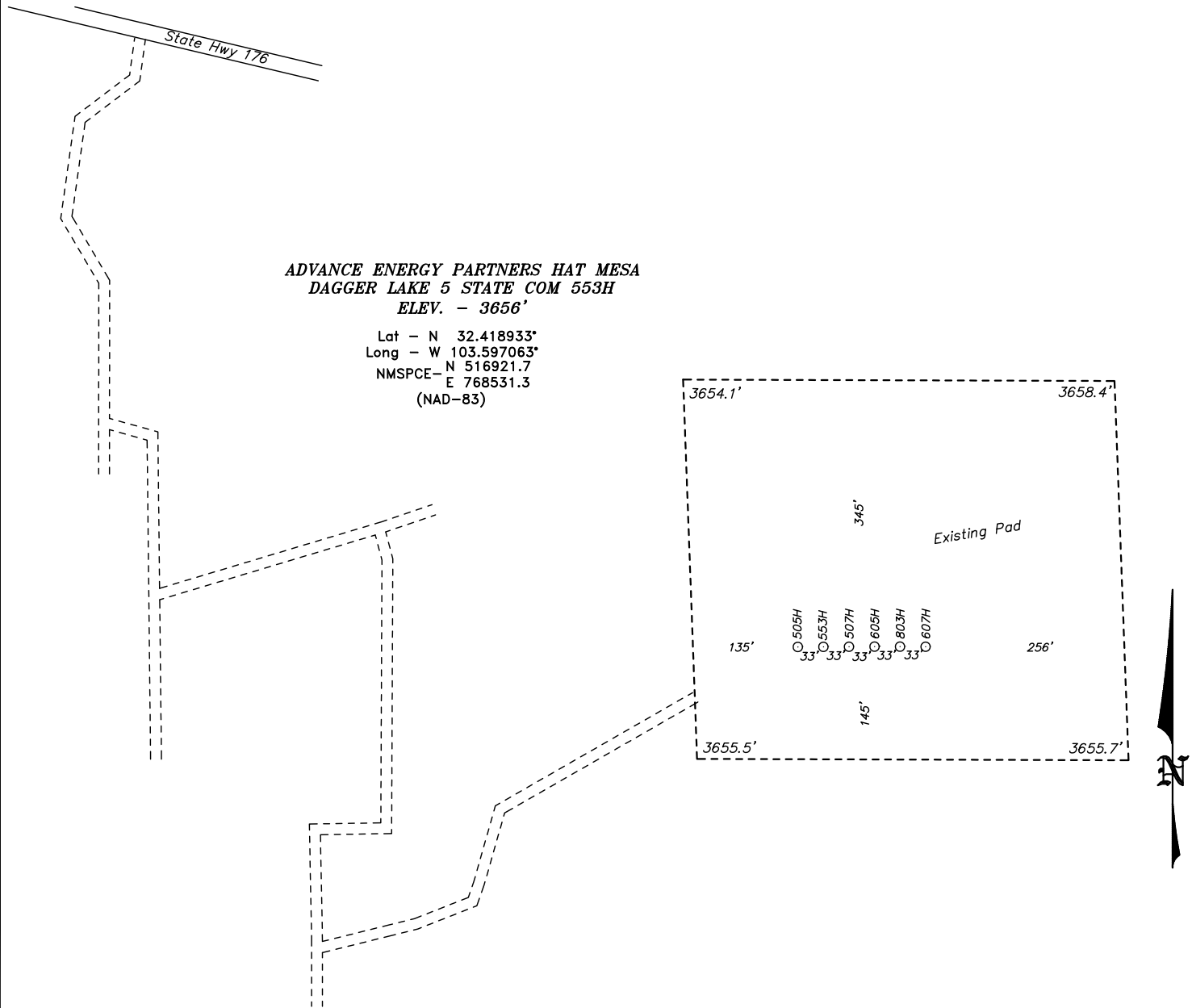
Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	SOUTH/South line	Feet from the	East/West line	County
C	32	21 S	33 E		100	NORTH	1980	WEST	LEA
Dedicated Acres	Joint or Infill	Consolidation Code	Order No.						

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

N:525527.7 E:766604.4 (NAD 83) LAST TAKE POINT BOTTOM HOLE LOCATION Lat - N 32.442343° Long - W 103.596698° NMSPC - N 525439.2 E 768585.2 (NAD-83) N:522892.4 E:766624.6 (NAD 83) N:520252.9 E:766646.1 (NAD 83) FIRST TAKE POINT 2540' FNL & 1980' FWL Lat - N 32.421135° Long - W 103.596685° NMSPC - N 517723.6 E 768642.5 (NAD-83) SURFACE LOCATION Lat - N 32.418933° Long - W 103.597063° NMSPC - N 516921.7 E 768531.3 (NAD-83) N:514973.6 E:766680.2 (NAD 83)		N:525543.0 E:769243.0 (NAD 83) N:525558.3 E:771881.6 (NAD 83) N:522919.5 E:771903.4 (NAD 83) N:520267.1 E:769286.7 (NAD 83) N:520280.5 E:771925.8 (NAD 83) N:517613.3 E:766663.2 (NAD 83) N:517637.8 E:771940.4 (NAD 83) N:514985.6 E:769318.0 (NAD 83) N:514997.3 E:771954.9 (NAD 83)	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 unLEASED mineral interest in the land including the proposed bottom hole location or has a right to drill this well at 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 _____ Date _____ Printed Name _____ Email Address _____ 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 and correct to the best of my belief. FEBRUARY 4, 2020 Date Surveyed _____ Signature & Seal of Professional Surveyor _____ Certificate No. Gary L. Jones 7977 BASIN SURVEYORS 0' 1000' 2000' 3000' 4000' IN SCALE: 1" = 2000' WO Num.: 35028
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**SECTION 5, TOWNSHIP 22 SOUTH, RANGE 33 EAST. N.M.P.M.,
LEA COUNTY,
NEW MEXICO.**



I HEREBY CERTIFY THAT THIS SURVEY WAS PREPARED FROM FIELD NOTES OF AN ACTUAL SURVEY AND MEETS OR EXCEEDS ALL REQUIREMENTS FOR LAND SURVEYS AS SPECIFIED BY THIS STATE.



GARY L. JONES, N.M.P.S. No. 7977
LEA COUNTY, TEXAS No. 5074

basin
surveys
focused on excellence
in the oilfield

P.O. Box 1786 (575) 393-7316 - Office
1120 N. West County Rd. (575) 392-2206 - Fax
Hobbs, New Mexico 88241 basin-surveys.com

200 0 200 400 FEET
SCALE: 1" = 200'

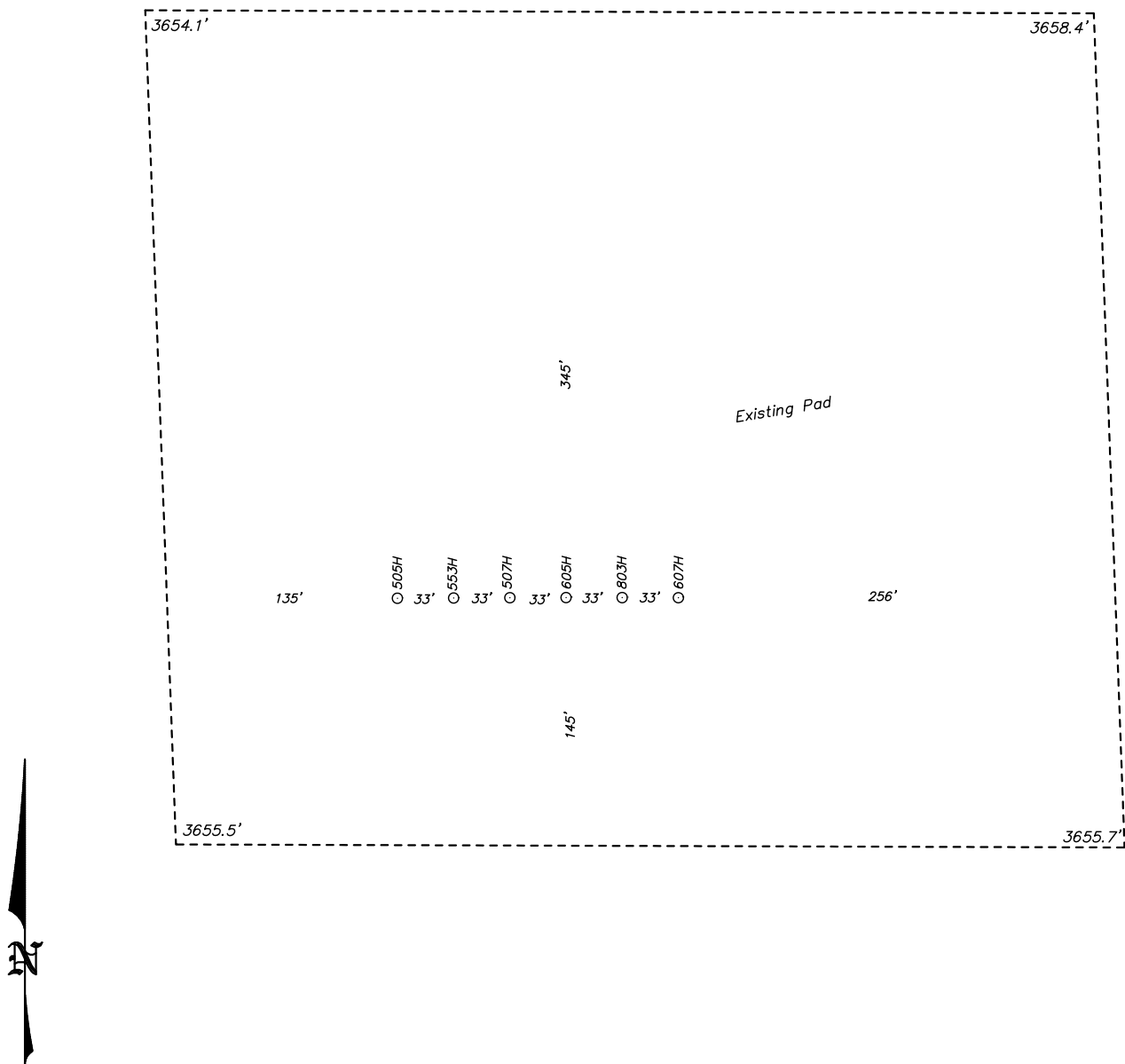
ADVANCE ENERGY PARTNERS HAT MESA

REF: DAGGER LAKE 5 STATE COM 553H / WELL PAD TOPO

THE DAGGER LAKE 5 STATE COM 553H LOCATED 1940' FROM
THE SOUTH LINE AND 1864' FROM THE WEST LINE OF
SECTION 5, TOWNSHIP 22 SOUTH, RANGE 33 EAST.

N.M.P.M., LEA COUNTY, NEW MEXICO.

**SECTION 5, TOWNSHIP 22 SOUTH, RANGE 33 EAST. N.M.P.M.,
LEA COUNTY, NEW MEXICO.**



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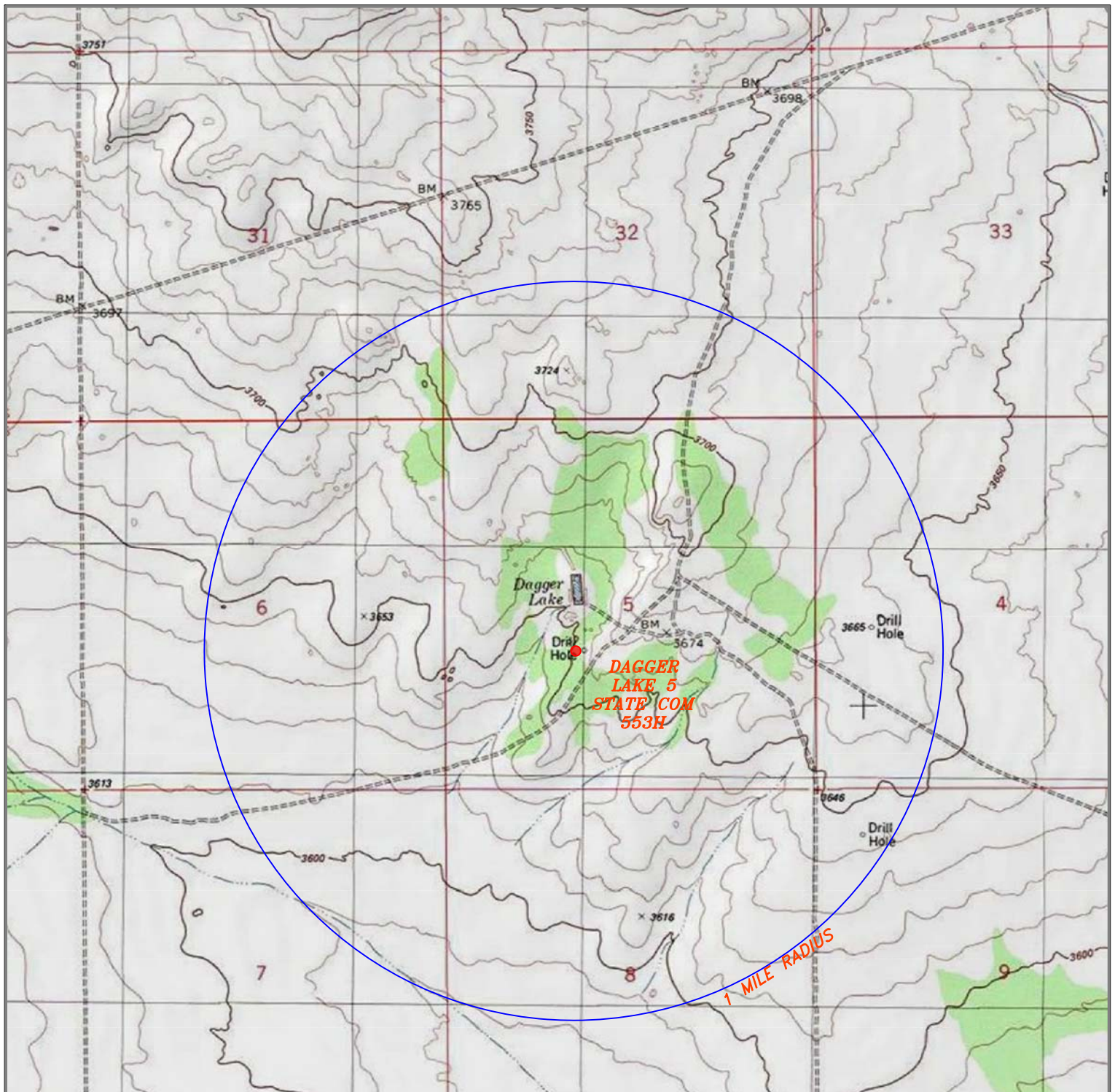
100 0 100 200 FEET
SCALE: 1" = 100'

ADVANCE ENERGY PARTNERS HAT MESA

REF: DAGGER LAKE 5 STATE COM 553H / WELL PAD TOPO

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SECTION 5, TOWNSHIP 22 SOUTH, RANGE 33 EAST.

N.M.P.M., LEA COUNTY, NEW MEXICO.



DAGGER LAKE 5 STATE COM 553H

Located 1940' FSL and 1864' FWL
 Section 5, Township 22 South, Range 33 East,
 N.M.P.M., Lea County, New Mexico.



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 basinsurveys.com

0' 1000' 2000' 3000' 4000'

SCALE: 1" = 2000'

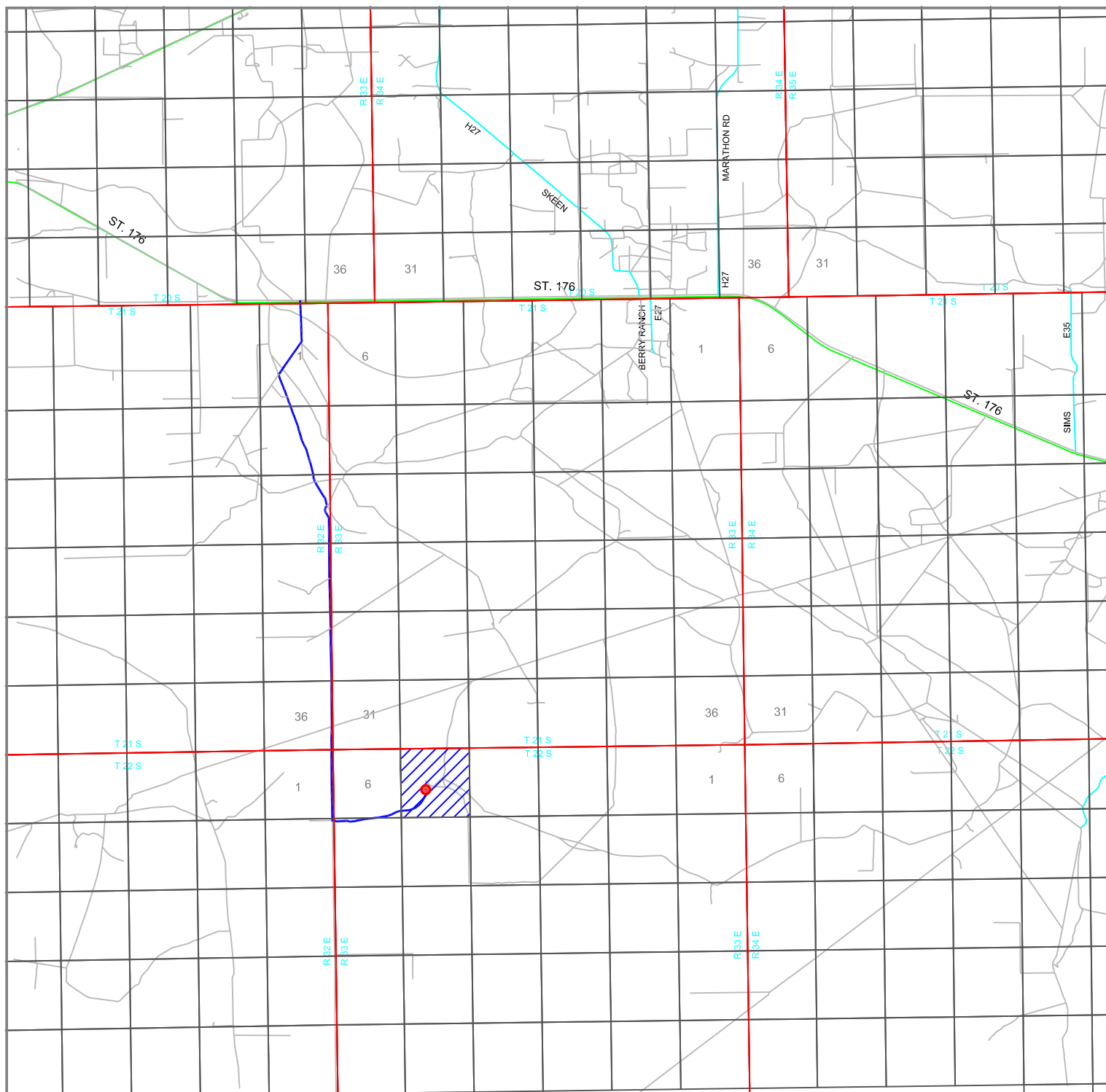
W.O. Number: KJG 35028

Survey Date: 02-04-2020

YELLOW TINT - USA LAND
 BLUE TINT - STATE LAND
 NATURAL COLOR - FEE LAND



**ADVANCE
 ENERGY
 PARTNERS
 HAT MESA**



DAGGER LAKE 5 STATE COM 553H

Located 1940' FSL and 1864' FWL
 Section 5, Township 22 South, Range 33 East,
 N.M.P.M., Lea County, New Mexico.



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0 1 MI 2 MI 3 MI 4 MI

SCALE: 1" = 2 MILES

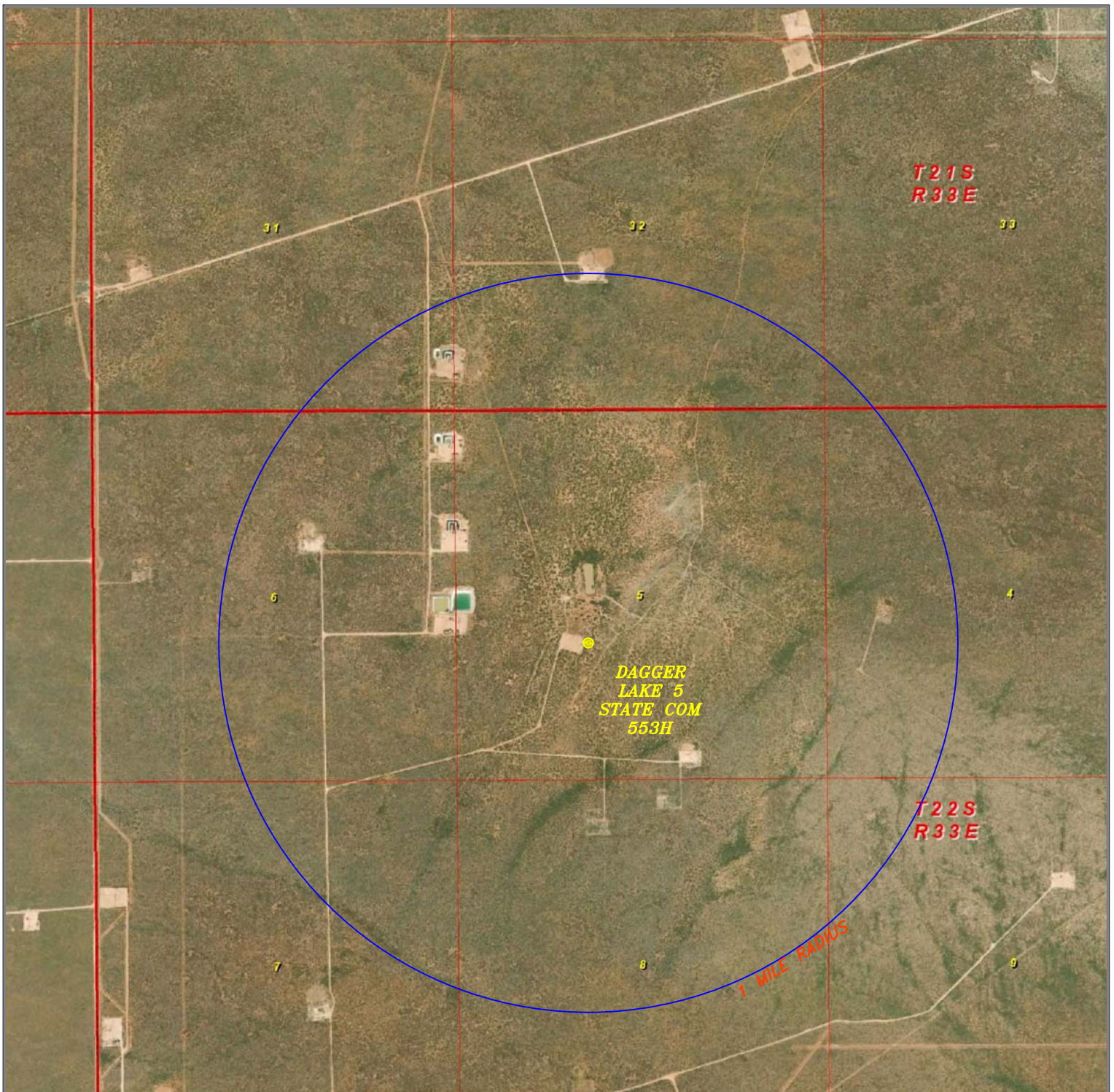
W.O. Number: KJG 35028

Survey Date: 02-04-2020

YELLOW TINT - USA LAND
 BLUE TINT - STATE LAND
 NATURAL COLOR - FEE LAND



**ADVANCE
 ENERGY
 PARTNERS
 HAT MESA**



DAGGER LAKE 5 STATE COM 553H

Located 1940' FSL and 1864' FWL
Section 5, Township 22 South, Range 33 East,
N.M.P.M., Lea County, New Mexico.



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0' 1000' 2000' 3000' 4000'
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ENERGY
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HAT MESA**

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Energy, Minerals and Natural Resources
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Santa Fe, NM 87505

GAS CAPTURE PLAN

Date: 2/15/2020

☒ Original

Operator & OGRID No.: [372417] ADVANCE ENERGY PARTNERS HAT MESA, LLC

☐ Amended - Reason for
Amendment: _____

This Gas Capture Plan outlines actions to be taken by the Operator to reduce well/production facility flaring/venting for new completion (new drill, recomple to new zone, re-frac) activity.

Note: Form C-129 must be submitted and approved prior to exceeding 60 days allowed by Rule (Subsection A of 19.15.18.12 NMAC).

Well(s)/Production Facility – Name of facility

The well(s) that will be located at the production facility are shown in the table below.

Well Name	API	Well Location (ULSTR)	Footages	Expected MCF/D	Flared or Vented	Comments
DAGGER LAKE 5 STATE COM #553H	30-025-46881	K-5-22S-33E	1940S 1864W	1500	Flared	Flare during initial testing and cleanup

Gathering System and Pipeline Notification

Well(s) will be connected to a production facility after flowback operations are complete, if gas transporter system is in place. The gas produced from production facility is dedicated to TARGA MIDSTREAM SERVICES LLC and will be connected to TARGA MIDSTREAM SERVICES LLC Low Pressure gathering system located in Lea County, New Mexico. It will require 200' of pipeline to connect the facility to Low Pressure gathering system. ADVANCE ENERGY PARTNERS HAT MESA, LLC provides (periodically) to TARGA MIDSTREAM SERVICES LLC a drilling, completion and estimated first production date for wells that are scheduled to be drilled in the foreseeable future. In addition, ADVANCE ENERGY PARTNERS HAT MESA, LLC and TARGA MIDSTREAM SERVICES LLC have periodic conference calls to discuss changes to drilling and completion schedules. Gas from these wells will be processed at TARGA MIDSTREAM SERVICES LLC Processing Plant located in Sec. 35, Twn. 19S, Rng. 33E, Lea County, New Mexico. The actual flow of the gas will be based on compression operating parameters and gathering system pressures.

Flowback Strategy

After the fracture treatment/completion operations, well(s) will be produced to temporary production tanks and gas will be flared or vented. During flowback, the fluids and sand content will be monitored. When the produced fluids contain minimal sand, the wells will be turned to production facilities. Gas sales should start as soon as the wells start flowing through the production facilities, unless there are operational issues on TARGA MIDSTREAM SERVICES LLC system at that time. Based on current information, it is ADVANCE ENERGY PARTNERS HAT MESA, LLC's belief the system can take this gas upon completion of the well(s).

Safety requirements during cleanout operations from the use of underbalanced air cleanout systems may necessitate that sand and non-pipeline quality gas be vented and/or flared rather than sold on a temporary basis.

Alternatives to Reduce Flaring

Below are alternatives considered from a conceptual standpoint to reduce the amount of gas flared.

- Power Generation – On lease
 - Only a portion of gas is consumed operating the generator, remainder of gas will be flared
- Compressed Natural Gas – On lease
 - Gas flared would be minimal, but might be uneconomical to operate when gas volume declines
- NGL Removal – On lease
 - Plants are expensive, residue gas is still flared, and uneconomical to operate when gas volume declines

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Oil Conservation Division
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Santa Fe, NM 87505

Form APD Comments

Permit 278257

PERMIT COMMENTS

Operator Name and Address: ADVANCE ENERGY PARTNERS HAT MESA, LLC [372417] 11490 Westheimer Rd., Ste 950 Houston, TX 77077		API Number: 30-025-46881
		Well: DAGGER LAKE 5 STATE COM #553H

Created By	Comment	Comment Date
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Form APD Conditions

Permit 278257

PERMIT CONDITIONS OF APPROVAL

Operator Name and Address: ADVANCE ENERGY PARTNERS HAT MESA, LLC [372417] 11490 Westheimer Rd., Ste 950 Houston, TX 77077	API Number: 30-025-46881
	Well: DAGGER LAKE 5 STATE COM #553H

OCD Reviewer	Condition
pkautz	Will require a directional survey with the C-104
pkautz	SURFACE & PRODUCTION CASING - Cement must circulate to surface
pkautz	If cement does not circulate to surface, must run temperature survey or other log to determine top of cement
pkautz	Surface casing must be set 25' below top of Rustler Anhydrite in order to seal off protectable water
pkautz	1)- The Operator is to notify NMOCD by sundry (Form C-103) within ten (10) days of the well being spud 2)- Drilling Sundries Form C-103 (Casing and Cement test are to be submitted within 10 days 3)- Completion Reports & Logs are to be submitted within 45 days 4)- Deviation / Directional Drill Survey are to be filed with or prior to C-104
pkautz	It is the operator's responsibility to monitor cancellation dates of approved APDs. APD's are good for 2 years and may be extended for one year. Only one 1 year extension will be granted if submitted by C-103 before expiration date. After expiration date or after a 1 year extension must submit new APD. If an APD expires and if site construction has occurred, site remediation is required.
pkautz	Stage Tool 1) Must notify OCD Hobbs Office prior to running Stage Tool at 5753703186 2) If using Stage Tool on Surface casing, Stage Tool must be set greater than 350' from surface and a minimum of 200 feet above surface shoe. 3) When using a Stage Tool on Intermediate or Production Casing Stage must be a minimum of 50 feet below previous casing shoe.



Advance Energy Partners

Hat Mesa

Dagger Lake 5 State Com

Dagger Lake 5 State Com 553H

Dagger Lake 5 State Com 553H

Prelim Plan 1

Anticollision Report

12 February, 2020



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Reference	Prelim Plan 1		
Filter type:	NO GLOBAL FILTER: Using user defined selection & filtering criteria		
Interpolation Method:	Stations	Error Model:	ISCWSA
Depth Range:	Unlimited	Scan Method:	Closest Approach 3D
Results Limited by:	Maximum centre distance of 1,000.0usft	Error Surface:	Pedal Curve
Warning Levels Evaluated at:	2.79 Sigma	Casing Method:	Not applied

Survey Tool Program	Date	2/12/2020		
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
0.0	19,286.3	Prelim Plan 1 (Dagger Lake 5 State Com 5	MWD+HRGM	OWSG MWD + HRGM

Summary						
Site Name	Reference Measured Depth (usft)	Offset Measured Depth (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Separation Factor	Warning
Offset Well - Wellbore - Design						
Dagger Lake 5 State Com						
Dagger Lake 5 State Com 505H - Dagger Lake 5 State C	5,200.0	5,200.0	33.0	6.2	1.233	Level 3, CC, ES, SF
Dagger Lake 5 State Com 507H - Dagger Lake 5 State C	5,200.0	5,200.0	33.0	6.2	1.233	Level 3, CC, ES, SF

Offset Design:	Dagger Lake 5 State Com - Dagger Lake 5 State Com 505H - Dagger Lake 5 State Com 505H - Prelim Plan 1										Offset Site Error:	0.0 usft
Survey Program:	0-MWD+HRGM										Offset Well Error:	0.0 usft
Reference	Offset	Semi Major Axis	Offset	Highside	Offset Wellbore Centre	Distance	Minimum	Separation	Warning			
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Separation (usft)	Factor
0.0	0.0	0.0	0.0	0.0	0.0	-90.35	-0.2	-33.0	33.0			
100.0	100.0	100.0	100.0	0.6	0.6	-90.35	-0.2	-33.0	33.0	31.8	1.19	27.808
200.0	200.0	200.0	200.0	1.7	1.7	-90.35	-0.2	-33.0	33.0	29.5	3.49	9.457
300.0	300.0	300.0	300.0	2.4	2.4	-90.35	-0.2	-33.0	33.0	28.1	4.87	6.776
400.0	400.0	400.0	400.0	3.0	3.0	-90.35	-0.2	-33.0	33.0	27.1	5.95	5.549
500.0	500.0	500.0	500.0	3.4	3.4	-90.35	-0.2	-33.0	33.0	26.1	6.86	4.808
600.0	600.0	600.0	600.0	3.8	3.8	-90.35	-0.2	-33.0	33.0	25.3	7.68	4.297
700.0	700.0	700.0	700.0	4.2	4.2	-90.35	-0.2	-33.0	33.0	24.6	8.42	3.918
800.0	800.0	800.0	800.0	4.6	4.6	-90.35	-0.2	-33.0	33.0	23.9	9.11	3.622
900.0	900.0	900.0	900.0	4.9	4.9	-90.35	-0.2	-33.0	33.0	23.2	9.75	3.383
1,000.0	1,000.0	1,000.0	1,000.0	5.2	5.2	-90.35	-0.2	-33.0	33.0	22.6	10.36	3.184
1,100.0	1,100.0	1,100.0	1,100.0	5.5	5.5	-90.35	-0.2	-33.0	33.0	22.1	10.95	3.015
1,200.0	1,200.0	1,200.0	1,200.0	5.8	5.8	-90.35	-0.2	-33.0	33.0	21.5	11.50	2.869
1,300.0	1,300.0	1,300.0	1,300.0	6.0	6.0	-90.35	-0.2	-33.0	33.0	21.0	12.04	2.742
1,400.0	1,400.0	1,400.0	1,400.0	6.3	6.3	-90.35	-0.2	-33.0	33.0	20.4	12.55	2.629
1,500.0	1,500.0	1,500.0	1,500.0	6.5	6.5	-90.35	-0.2	-33.0	33.0	19.9	13.05	2.529
1,600.0	1,600.0	1,600.0	1,600.0	6.8	6.8	-90.35	-0.2	-33.0	33.0	19.5	13.54	2.438
1,700.0	1,700.0	1,700.0	1,700.0	7.0	7.0	-90.35	-0.2	-33.0	33.0	19.0	14.01	2.356
1,800.0	1,800.0	1,800.0	1,800.0	7.2	7.2	-90.35	-0.2	-33.0	33.0	18.5	14.47	2.281
1,900.0	1,900.0	1,900.0	1,900.0	7.5	7.5	-90.35	-0.2	-33.0	33.0	18.1	14.92	2.212
2,000.0	2,000.0	2,000.0	2,000.0	7.7	7.7	-90.35	-0.2	-33.0	33.0	17.6	15.36	2.149
2,100.0	2,100.0	2,100.0	2,100.0	7.9	7.9	-90.35	-0.2	-33.0	33.0	17.2	15.79	2.090
2,200.0	2,200.0	2,200.0	2,200.0	8.1	8.1	-90.35	-0.2	-33.0	33.0	16.8	16.21	2.036

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 505H - Dagger Lake 5 State Com 505H - Prelim Plan 1													Offset Site Error:	0.0 usft
Survey Program: 0-MWD+HRGM													Offset Well Error:	0.0 usft
Reference	Offset	Semi Major Axis		Offset Wellbore Centre		Rule Assigned:		Warning						
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
2,300.0	2,300.0	2,300.0	2,300.0	8.3	8.3	-90.35	-0.2	-33.0	33.0	16.4	16.62	1.985		
2,400.0	2,400.0	2,400.0	2,400.0	8.5	8.5	-90.35	-0.2	-33.0	33.0	16.0	17.03	1.938		
2,500.0	2,500.0	2,500.0	2,500.0	8.7	8.7	-90.35	-0.2	-33.0	33.0	15.6	17.43	1.893		
2,600.0	2,600.0	2,600.0	2,600.0	8.9	8.9	-90.35	-0.2	-33.0	33.0	15.2	17.83	1.851		
2,700.0	2,700.0	2,700.0	2,700.0	9.1	9.1	-90.35	-0.2	-33.0	33.0	14.8	18.22	1.812		
2,800.0	2,800.0	2,800.0	2,800.0	9.3	9.3	-90.35	-0.2	-33.0	33.0	14.4	18.60	1.774		
2,900.0	2,900.0	2,900.0	2,900.0	9.5	9.5	-90.35	-0.2	-33.0	33.0	14.0	18.98	1.739		
3,000.0	3,000.0	3,000.0	3,000.0	9.7	9.7	-90.35	-0.2	-33.0	33.0	13.6	19.35	1.705		
3,100.0	3,100.0	3,100.0	3,100.0	9.9	9.9	-90.35	-0.2	-33.0	33.0	13.3	19.72	1.673		
3,200.0	3,200.0	3,200.0	3,200.0	10.0	10.0	-90.35	-0.2	-33.0	33.0	12.9	20.09	1.643		
3,300.0	3,300.0	3,300.0	3,300.0	10.2	10.2	-90.35	-0.2	-33.0	33.0	12.6	20.45	1.614		
3,400.0	3,400.0	3,400.0	3,400.0	10.4	10.4	-90.35	-0.2	-33.0	33.0	12.2	20.81	1.586		
3,500.0	3,500.0	3,500.0	3,500.0	10.6	10.6	-90.35	-0.2	-33.0	33.0	11.8	21.16	1.559		
3,600.0	3,600.0	3,600.0	3,600.0	10.8	10.8	-90.35	-0.2	-33.0	33.0	11.5	21.51	1.534		
3,700.0	3,700.0	3,700.0	3,700.0	10.9	10.9	-90.35	-0.2	-33.0	33.0	11.1	21.86	1.510		
3,800.0	3,800.0	3,800.0	3,800.0	11.1	11.1	-90.35	-0.2	-33.0	33.0	10.8	22.20	1.486	Level 3	
3,900.0	3,900.0	3,900.0	3,900.0	11.3	11.3	-90.35	-0.2	-33.0	33.0	10.5	22.55	1.464	Level 3	
4,000.0	4,000.0	4,000.0	4,000.0	11.4	11.4	-90.35	-0.2	-33.0	33.0	10.1	22.88	1.442	Level 3	
4,100.0	4,100.0	4,100.0	4,100.0	11.6	11.6	-90.35	-0.2	-33.0	33.0	9.8	23.22	1.421	Level 3	
4,200.0	4,200.0	4,200.0	4,200.0	11.8	11.8	-90.35	-0.2	-33.0	33.0	9.4	23.55	1.401	Level 3	
4,300.0	4,300.0	4,300.0	4,300.0	11.9	11.9	-90.35	-0.2	-33.0	33.0	9.1	23.88	1.382	Level 3	
4,400.0	4,400.0	4,400.0	4,400.0	12.1	12.1	-90.35	-0.2	-33.0	33.0	8.8	24.21	1.363	Level 3	
4,500.0	4,500.0	4,500.0	4,500.0	12.3	12.3	-90.35	-0.2	-33.0	33.0	8.5	24.54	1.345	Level 3	
4,600.0	4,600.0	4,600.0	4,600.0	12.4	12.4	-90.35	-0.2	-33.0	33.0	8.1	24.86	1.327	Level 3	
4,700.0	4,700.0	4,700.0	4,700.0	12.6	12.6	-90.35	-0.2	-33.0	33.0	7.8	25.18	1.310	Level 3	
4,800.0	4,800.0	4,800.0	4,800.0	12.8	12.8	-90.35	-0.2	-33.0	33.0	7.5	25.50	1.294	Level 3	
4,900.0	4,900.0	4,900.0	4,900.0	12.9	12.9	-90.35	-0.2	-33.0	33.0	7.2	25.82	1.278	Level 3	
5,000.0	5,000.0	5,000.0	5,000.0	13.1	13.1	-90.35	-0.2	-33.0	33.0	6.9	26.14	1.263	Level 3	
5,100.0	5,100.0	5,100.0	5,100.0	13.2	13.2	-90.35	-0.2	-33.0	33.0	6.5	26.45	1.248	Level 3	
5,166.7	5,166.7	5,166.7	5,166.7	13.3	13.3	-90.35	-0.2	-33.0	33.0	6.3	26.66	1.238	Level 3	
5,200.0	5,200.0	5,200.0	5,200.0	13.4	13.4	-90.35	-0.2	-33.0	33.0	6.2	26.76	1.233	Level 3, CC, ES, SF	
5,300.0	5,300.0	5,299.7	5,299.7	13.5	13.5	-89.04	0.6	-33.4	33.4	6.4	27.07	1.235	Level 3	
5,400.0	5,400.0	5,399.4	5,399.3	13.7	13.7	-85.34	2.8	-34.7	34.8	7.4	27.37	1.272	Level 3	
5,500.0	5,500.0	5,498.9	5,498.8	13.8	13.9	-101.02	6.6	-36.8	37.6	9.9	27.67	1.357	Level 3	
5,600.0	5,600.0	5,598.4	5,598.0	14.0	14.1	-97.95	11.9	-39.7	41.9	13.9	27.98	1.496	Level 3	
5,700.0	5,699.9	5,697.7	5,697.0	14.2	14.3	-96.01	18.7	-43.5	47.6	19.3	28.29	1.683		
5,800.0	5,799.7	5,797.4	5,796.4	14.4	14.5	-95.61	26.3	-47.7	54.2	25.6	28.62	1.894		
5,900.1	5,899.5	5,897.3	5,895.9	14.6	14.7	-96.92	33.9	-52.0	61.0	32.1	28.95	2.107		
6,000.0	5,999.0	5,996.9	5,995.2	14.8	15.0	-98.75	41.5	-56.2	67.9	38.6	29.28	2.320		
6,100.0	6,098.6	6,096.7	6,094.5	15.0	15.3	-100.25	49.1	-60.4	74.9	45.3	29.62	2.529		
6,200.0	6,198.2	6,196.4	6,193.9	15.3	15.5	-101.48	56.7	-64.7	82.0	52.0	29.96	2.735		
6,300.0	6,297.8	6,296.2	6,293.2	15.6	15.8	-102.53	64.3	-68.9	89.0	58.7	30.31	2.937		
6,400.0	6,397.5	6,395.9	6,392.6	15.9	16.2	-103.41	71.9	-73.1	96.1	65.4	30.67	3.134		
6,500.0	6,497.1	6,495.6	6,492.0	16.2	16.5	-104.18	79.5	-77.4	103.2	72.2	31.03	3.326		
6,600.0	6,596.7	6,595.4	6,591.3	16.5	16.8	-104.85	87.1	-81.6	110.3	78.9	31.40	3.514		
6,700.0	6,696.3	6,695.1	6,690.7	16.8	17.2	-105.43	94.7	-85.8	117.5	85.7	31.77	3.698		
6,800.0	6,795.9	6,794.8	6,790.0	17.1	17.5	-105.95	102.3	-90.1	124.6	92.5	32.15	3.877		
6,900.0	6,895.6	6,894.6	6,889.4	17.5	17.9	-106.42	109.9	-94.3	131.8	99.3	32.53	4.051		
7,000.0	6,995.2	6,994.3	6,988.8	17.8	18.2	-106.83	117.5	-98.5	139.0	106.0	32.92	4.221		
7,100.0	7,094.8	7,094.1	7,088.1	18.2	18.6	-107.20	125.1	-102.8	146.1	112.8	33.32	4.386		

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Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 505H - Dagger Lake 5 State Com 505H - Prelim Plan 1													Offset Site Error:	0.0 usft
Survey Program: 0-MWD+HRGM													Offset Well Error:	0.0 usft
Reference		Offset		Semi Major Axis		Highside Toolface (°)	Offset Wellbore Centre		Distance		Minimum Separation (usft)	Separation Factor	Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)		+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)				
7,200.0	7,194.4	7,193.8	7,187.5	18.6	19.0	-107.54	132.7	-107.0	153.3	119.6	33.71	4.547		
7,300.0	7,294.0	7,293.5	7,286.8	18.9	19.4	-107.85	140.3	-111.2	160.5	126.4	34.12	4.704		
7,400.0	7,393.7	7,393.3	7,386.2	19.3	19.8	-108.14	147.9	-115.5	167.7	133.2	34.53	4.856		
7,500.0	7,493.3	7,493.0	7,485.5	19.7	20.2	-108.39	155.5	-119.7	174.9	139.9	34.94	5.005		
7,600.0	7,592.9	7,592.7	7,584.9	20.1	20.6	-108.63	163.1	-123.9	182.1	146.7	35.36	5.149		
7,700.0	7,692.5	7,692.5	7,684.3	20.5	21.1	-108.85	170.7	-128.2	189.3	153.5	35.78	5.290		
7,800.0	7,792.1	7,792.2	7,783.6	21.0	21.5	-109.06	178.3	-132.4	196.5	160.3	36.20	5.426		
7,900.0	7,891.8	7,892.0	7,883.0	21.4	21.9	-109.25	185.9	-136.6	203.7	167.0	36.63	5.559		
8,000.0	7,991.4	7,991.7	7,982.3	21.8	22.4	-109.42	193.5	-140.9	210.9	173.8	37.07	5.689		
8,100.0	8,091.0	8,091.4	8,081.7	22.2	22.8	-109.59	201.1	-145.1	218.1	180.6	37.50	5.815		
8,200.0	8,190.6	8,191.2	8,181.0	22.7	23.2	-109.74	208.7	-149.3	225.3	187.3	37.95	5.937		
8,300.0	8,290.2	8,290.9	8,280.4	23.1	23.7	-109.89	216.3	-153.5	232.5	194.1	38.39	6.056		
8,400.0	8,389.8	8,390.7	8,379.8	23.6	24.1	-110.03	223.8	-157.8	239.7	200.9	38.84	6.172		
8,500.0	8,489.5	8,490.4	8,479.1	24.0	24.6	-110.15	231.4	-162.0	246.9	207.6	39.29	6.285		
8,600.0	8,589.1	8,590.1	8,578.5	24.5	25.1	-110.28	239.0	-166.2	254.1	214.4	39.74	6.394		
8,700.0	8,688.7	8,689.9	8,677.8	24.9	25.5	-110.39	246.6	-170.5	261.3	221.1	40.20	6.501		
8,800.0	8,788.3	8,789.6	8,777.2	25.4	26.0	-110.50	254.2	-174.7	268.6	227.9	40.66	6.605		
8,900.0	8,887.9	8,889.3	8,876.6	25.8	26.5	-110.60	261.8	-178.9	275.8	234.7	41.12	6.706		
9,000.0	8,987.6	8,989.1	8,975.9	26.3	26.9	-110.70	269.4	-183.2	283.0	241.4	41.59	6.805		
9,100.0	9,087.2	9,088.8	9,075.3	26.8	27.4	-110.79	277.0	-187.4	290.2	248.2	42.05	6.901		
9,200.0	9,186.8	9,188.6	9,174.6	27.2	27.9	-110.88	284.6	-191.6	297.4	254.9	42.52	6.994		
9,304.1	9,290.5	9,292.4	9,278.1	27.7	28.4	-110.97	292.6	-196.0	304.9	261.9	43.02	7.088		
9,400.0	9,386.1	9,388.1	9,373.4	28.2	28.8	-110.97	299.8	-200.1	311.6	268.1	43.47	7.167		
9,500.0	9,485.9	9,488.4	9,473.4	28.6	29.3	-110.68	307.5	-204.3	317.9	274.0	43.92	7.237		
9,600.0	9,585.8	9,591.0	9,575.7	29.0	29.8	-110.29	314.1	-208.0	323.0	278.6	44.37	7.279		
9,700.0	9,685.8	9,693.7	9,678.2	29.4	30.2	-109.89	319.2	-210.9	326.6	281.8	44.81	7.289		
9,804.2	9,790.0	9,800.9	9,785.3	29.7	30.7	-89.52	322.7	-212.8	328.9	283.7	45.22	7.273		
9,900.0	9,885.8	9,899.5	9,883.9	29.7	31.0	-89.22	324.5	-213.8	329.9	284.3	45.54	7.242		
10,000.0	9,985.8	10,001.4	9,985.8	29.8	31.2	-89.17	324.8	-214.0	330.0	284.3	45.77	7.211		
10,100.0	10,085.8	10,101.4	10,085.8	29.9	31.3	-89.17	324.8	-214.0	330.0	284.0	45.99	7.176		
10,104.2	10,089.9	10,105.5	10,089.9	29.9	31.3	-89.17	324.8	-214.0	330.0	284.0	46.00	7.175		
10,200.0	10,185.8	10,200.0	10,184.2	30.0	31.5	-88.47	328.8	-214.0	330.2	283.9	46.23	7.141		
10,300.0	10,285.8	10,293.2	10,274.9	30.1	32.1	-84.85	349.8	-214.2	331.7	284.9	46.82	7.084		
10,400.0	10,385.8	10,375.0	10,349.8	30.2	32.6	-79.31	382.3	-214.4	338.2	290.2	47.96	7.051		
10,500.0	10,485.8	10,445.2	10,408.8	30.3	33.0	-73.15	420.2	-214.7	354.0	304.2	49.78	7.112		
10,600.0	10,585.8	10,500.0	10,450.7	30.4	33.3	-67.74	455.5	-215.0	382.3	330.3	52.02	7.349		
10,700.0	10,685.8	10,550.0	10,485.2	30.5	33.6	-62.61	491.7	-215.3	423.6	369.2	54.37	7.791		
10,800.0	10,785.8	10,586.8	10,508.0	30.5	33.8	-58.83	520.5	-215.5	476.7	420.3	56.38	8.455		
10,816.8	10,802.5	10,592.4	10,511.3	30.6	33.8	-58.26	525.1	-215.5	486.6	429.9	56.68	8.585		
10,825.0	10,810.8	10,600.0	10,515.7	30.6	33.9	-56.45	531.3	-215.6	491.6	434.7	56.88	8.642		
10,850.0	10,835.7	10,600.0	10,515.7	30.7	33.9	-54.61	531.3	-215.6	506.5	449.3	57.19	8.857		
10,875.0	10,860.6	10,612.3	10,522.5	30.8	33.9	-51.77	541.5	-215.7	521.3	463.7	57.63	9.047		
10,900.0	10,885.3	10,625.0	10,529.3	30.9	34.0	-49.10	552.2	-215.7	536.1	478.1	58.04	9.236		
10,925.0	10,909.8	10,625.0	10,529.3	31.1	34.0	-47.50	552.2	-215.7	550.6	492.4	58.27	9.451		
10,950.0	10,934.0	10,639.1	10,536.5	31.2	34.1	-45.08	564.4	-215.8	564.9	506.2	58.65	9.631		
10,975.0	10,957.9	10,650.0	10,541.8	31.4	34.1	-43.05	573.9	-215.9	578.8	519.9	58.97	9.816		
11,000.0	10,981.3	10,657.7	10,545.4	31.5	34.1	-41.35	580.6	-216.0	592.5	533.2	59.23	10.004		
11,025.0	11,004.2	10,667.1	10,549.7	31.7	34.2	-39.69	589.0	-216.0	605.7	546.2	59.49	10.183		
11,050.0	11,026.6	10,675.0	10,553.2	31.9	34.2	-38.23	596.1	-216.1	618.6	558.9	59.70	10.360		
11,075.0	11,048.4	10,686.2	10,557.9	32.0	34.3	-36.76	606.3	-216.1	630.9	571.0	59.95	10.524		

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11,100.0	11,069.4	10,700.0	10,563.4	32.2	34.3	-35.35	618.9	-216.2	642.9	582.7	60.22	10.675		
11,125.0	11,089.8	10,700.0	10,563.4	32.3	34.3	-34.46	618.9	-216.2	654.3	594.0	60.28	10.855		
11,150.0	11,109.4	10,715.5	10,569.1	32.5	34.4	-33.23	633.4	-216.4	665.2	604.6	60.54	10.987		
11,175.0	11,128.1	10,725.0	10,572.4	32.7	34.4	-32.26	642.3	-216.4	675.5	614.8	60.71	11.128		
11,200.0	11,145.9	10,735.4	10,575.8	32.8	34.4	-31.37	652.1	-216.5	685.3	624.4	60.87	11.259		
11,225.0	11,162.8	10,750.0	10,580.2	32.9	34.5	-30.48	666.0	-216.6	694.5	633.5	61.08	11.371		
11,250.0	11,178.7	10,750.0	10,580.2	33.1	34.5	-29.92	666.0	-216.6	703.2	642.1	61.06	11.515		
11,275.0	11,193.6	10,765.5	10,584.3	33.2	34.5	-29.18	681.0	-216.7	711.1	649.8	61.26	11.607		
11,300.0	11,207.4	10,775.0	10,586.7	33.3	34.5	-28.61	690.2	-216.8	718.5	657.1	61.36	11.709		
11,325.0	11,220.1	10,785.8	10,589.1	33.4	34.6	-28.08	700.7	-216.9	725.2	663.7	61.47	11.798		
11,350.0	11,231.6	10,800.0	10,591.9	33.5	34.6	-27.59	714.6	-217.0	731.3	669.7	61.62	11.869		
11,375.0	11,242.0	10,800.0	10,591.9	33.6	34.6	-27.28	714.6	-217.0	736.8	675.2	61.54	11.972		
11,400.0	11,251.2	10,816.5	10,594.6	33.7	34.6	-26.88	730.8	-217.1	741.5	679.8	61.70	12.017		
11,425.0	11,259.1	10,825.0	10,595.8	33.8	34.7	-26.60	739.3	-217.2	745.6	683.8	61.74	12.077		
11,450.0	11,265.8	10,837.0	10,597.3	33.9	34.7	-26.36	751.2	-217.3	749.0	687.2	61.81	12.118		
11,475.0	11,271.2	10,850.0	10,598.5	33.9	34.7	-26.16	764.1	-217.4	751.7	689.8	61.89	12.146		
11,500.0	11,275.3	10,857.6	10,599.0	34.0	34.7	-26.03	771.7	-217.4	753.8	691.9	61.88	12.181		
11,525.0	11,278.2	10,875.0	10,599.8	34.0	34.8	-25.92	789.1	-217.5	755.2	693.2	62.01	12.178		
11,550.0	11,279.7	10,875.0	10,599.8	34.0	34.8	-25.89	789.1	-217.5	755.8	693.9	61.87	12.215		
11,566.8	11,280.0	10,888.2	10,600.0	34.1	34.8	-25.89	802.3	-217.6	755.9	693.9	61.96	12.199		
11,574.1	11,280.0	10,888.2	10,600.0	34.1	34.8	-25.89	802.3	-217.6	755.8	693.9	61.91	12.208		
11,600.0	11,280.0	10,914.1	10,600.0	34.1	34.8	-25.89	828.2	-217.8	755.8	693.7	62.12	12.167		
11,700.0	11,280.0	11,014.1	10,600.0	34.2	35.0	-25.89	928.2	-218.6	755.8	692.8	62.99	12.000		
11,800.0	11,280.0	11,114.1	10,600.0	34.4	35.2	-25.89	1,028.2	-219.4	755.8	691.9	63.96	11.817		
11,900.0	11,280.0	11,214.1	10,600.0	34.6	35.6	-25.89	1,128.2	-220.1	755.8	690.8	65.03	11.623		
12,000.0	11,280.0	11,314.1	10,600.0	35.0	36.0	-25.89	1,228.2	-220.9	755.8	689.7	66.18	11.421		
12,100.0	11,280.0	11,414.1	10,600.0	35.6	36.7	-25.89	1,328.2	-221.7	755.8	688.4	67.42	11.211		
12,200.0	11,280.0	11,514.1	10,600.0	36.5	37.6	-25.89	1,428.2	-222.4	755.9	687.1	68.73	10.997		
12,300.0	11,280.0	11,614.1	10,600.0	37.7	38.7	-25.89	1,528.1	-223.2	755.9	685.7	70.12	10.779		
12,400.0	11,280.0	11,714.1	10,600.0	39.1	39.9	-25.89	1,628.1	-223.9	755.9	684.3	71.58	10.560		
12,500.0	11,280.0	11,814.1	10,600.0	40.6	41.3	-25.89	1,728.1	-224.7	755.9	682.8	73.10	10.340		
12,600.0	11,280.0	11,914.1	10,600.0	42.1	42.8	-25.89	1,828.1	-225.5	755.9	681.2	74.69	10.120		
12,700.0	11,280.0	12,014.1	10,600.0	43.8	44.4	-25.89	1,928.1	-226.2	755.9	679.5	76.33	9.902		
12,800.0	11,280.0	12,114.1	10,600.0	45.5	46.0	-25.89	2,028.1	-227.0	755.9	677.8	78.03	9.687		
12,900.0	11,280.0	12,214.1	10,600.0	47.2	47.7	-25.89	2,128.1	-227.8	755.9	676.1	79.78	9.474		
13,000.0	11,280.0	12,314.1	10,600.0	48.9	49.4	-25.89	2,228.1	-228.5	755.9	674.3	81.58	9.265		
13,100.0	11,280.0	12,414.1	10,600.0	50.7	51.1	-25.89	2,328.1	-229.3	755.9	672.4	83.42	9.061		
13,200.0	11,280.0	12,514.1	10,600.0	52.5	52.9	-25.89	2,428.1	-230.0	755.9	670.6	85.31	8.861		
13,300.0	11,280.0	12,614.1	10,600.0	54.3	54.7	-25.89	2,528.1	-230.8	755.9	668.6	87.23	8.665		
13,400.0	11,280.0	12,714.1	10,600.0	56.1	56.5	-25.89	2,628.1	-231.6	755.9	666.7	89.19	8.475		
13,500.0	11,280.0	12,814.1	10,600.0	58.0	58.3	-25.89	2,728.1	-232.3	755.9	664.7	91.18	8.290		
13,600.0	11,280.0	12,914.1	10,600.0	59.8	60.2	-25.89	2,828.1	-233.1	755.9	662.7	93.21	8.109		
13,700.0	11,280.0	13,014.1	10,600.0	61.7	62.0	-25.89	2,928.1	-233.9	755.9	660.6	95.27	7.934		
13,800.0	11,280.0	13,114.1	10,600.0	63.6	63.9	-25.89	3,028.1	-234.6	755.9	658.5	97.35	7.764		
13,900.0	11,280.0	13,214.1	10,600.0	65.4	65.8	-25.89	3,128.1	-235.4	755.9	656.4	99.46	7.600		
14,000.0	11,280.0	13,314.1	10,600.0	67.3	67.7	-25.89	3,228.1	-236.2	755.9	654.3	101.60	7.440		
14,100.0	11,280.0	13,414.1	10,600.0	69.2	69.5	-25.90	3,328.1	-236.9	755.9	652.1	103.76	7.285		
14,200.0	11,280.0	13,514.1	10,600.0	71.1	71.4	-25.90	3,428.1	-237.7	755.9	650.0	105.94	7.135		
14,300.0	11,280.0	13,614.1	10,600.0	73.1	73.3	-25.90	3,528.1	-238.4	755.9	647.8	108.14	6.990		
14,400.0	11,280.0	13,714.1	10,600.0	75.0	75.3	-25.90	3,628.1	-239.2	755.9	645.5	110.36	6.849		

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 505H - Dagger Lake 5 State Com 505H - Prelim Plan 1													Offset Site Error:	0.0 usft
Survey Program: 0-MWD+HRGM													Offset Well Error:	0.0 usft
Reference		Offset		Semi Major Axis		Highside Toolface (°)	Offset Wellbore Centre		Distance		Minimum Separation (usft)	Separation Factor	Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)		+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)				
14,500.0	11,280.0	13,814.1	10,600.0	76.9	77.2	-25.90	3,728.1	-240.0	755.9	643.3	112.60	6.713		
14,600.0	11,280.0	13,914.1	10,600.0	78.8	79.1	-25.90	3,828.1	-240.7	755.9	641.0	114.86	6.581		
14,700.0	11,280.0	14,014.1	10,600.0	80.7	81.0	-25.90	3,928.1	-241.5	755.9	638.8	117.13	6.453		
14,800.0	11,280.0	14,114.1	10,600.0	82.7	83.0	-25.90	4,028.1	-242.3	755.9	636.5	119.42	6.330		
14,900.0	11,280.0	14,214.1	10,600.0	84.6	84.9	-25.90	4,128.1	-243.0	755.9	634.2	121.72	6.210		
15,000.0	11,280.0	14,314.1	10,600.0	86.6	86.8	-25.90	4,228.1	-243.8	755.9	631.9	124.04	6.094		
15,100.0	11,280.0	14,414.1	10,600.0	88.5	88.8	-25.90	4,328.1	-244.5	755.9	629.6	126.37	5.982		
15,200.0	11,280.0	14,514.1	10,600.0	90.5	90.7	-25.90	4,428.1	-245.3	755.9	627.2	128.71	5.873		
15,300.0	11,280.0	14,614.1	10,600.0	92.4	92.7	-25.90	4,528.1	-246.1	755.9	624.9	131.06	5.768		
15,400.0	11,280.0	14,714.1	10,600.0	94.4	94.6	-25.90	4,628.1	-246.8	755.9	622.5	133.42	5.666		
15,500.0	11,280.0	14,814.1	10,600.0	96.3	96.6	-25.90	4,728.1	-247.6	755.9	620.1	135.80	5.567		
15,600.0	11,280.0	14,914.1	10,600.0	98.3	98.5	-25.90	4,828.1	-248.4	755.9	617.8	138.18	5.471		
15,700.0	11,280.0	15,014.1	10,600.0	100.2	100.5	-25.90	4,928.0	-249.1	755.9	615.4	140.57	5.378		
15,800.0	11,280.0	15,114.1	10,600.0	102.2	102.4	-25.90	5,028.0	-249.9	755.9	613.0	142.97	5.287		
15,900.0	11,280.0	15,214.1	10,600.0	104.2	104.4	-25.90	5,128.0	-250.7	755.9	610.6	145.38	5.200		
16,000.0	11,280.0	15,314.1	10,600.0	106.1	106.4	-25.90	5,228.0	-251.4	755.9	608.1	147.80	5.115		
16,100.0	11,280.0	15,414.1	10,600.0	108.1	108.3	-25.90	5,328.0	-252.2	755.9	605.7	150.23	5.032		
16,200.0	11,280.0	15,514.1	10,600.0	110.1	110.3	-25.90	5,428.0	-252.9	755.9	603.3	152.66	4.952		
16,300.0	11,280.0	15,614.1	10,600.0	112.1	112.3	-25.90	5,528.0	-253.7	755.9	600.9	155.10	4.874		
16,400.0	11,280.0	15,714.1	10,600.0	114.0	114.3	-25.90	5,628.0	-254.5	756.0	598.4	157.54	4.798		
16,500.0	11,280.0	15,814.1	10,600.0	116.0	116.2	-25.90	5,728.0	-255.2	756.0	596.0	160.00	4.725		
16,600.0	11,280.0	15,914.1	10,600.0	118.0	118.2	-25.90	5,828.0	-256.0	756.0	593.5	162.45	4.653		
16,700.0	11,280.0	16,014.1	10,600.0	120.0	120.2	-25.90	5,928.0	-256.8	756.0	591.0	164.92	4.584		
16,800.0	11,280.0	16,114.1	10,600.0	121.9	122.2	-25.91	6,028.0	-257.5	756.0	588.6	167.39	4.516		
16,900.0	11,280.0	16,214.1	10,600.0	123.9	124.1	-25.91	6,128.0	-258.3	756.0	586.1	169.86	4.450		
17,000.0	11,280.0	16,314.1	10,600.0	125.9	126.1	-25.91	6,228.0	-259.0	756.0	583.6	172.34	4.386		
17,100.0	11,280.0	16,414.1	10,600.0	127.9	128.1	-25.91	6,328.0	-259.8	756.0	581.1	174.82	4.324		
17,200.0	11,280.0	16,514.1	10,600.0	129.9	130.1	-25.91	6,428.0	-260.6	756.0	578.7	177.31	4.263		
17,300.0	11,280.0	16,614.1	10,600.0	131.8	132.1	-25.91	6,528.0	-261.3	756.0	576.2	179.81	4.204		
17,400.0	11,280.0	16,714.1	10,600.0	133.8	134.0	-25.91	6,628.0	-262.1	756.0	573.7	182.30	4.147		
17,500.0	11,280.0	16,814.1	10,600.0	135.8	136.0	-25.91	6,728.0	-262.9	756.0	571.2	184.80	4.091		
17,600.0	11,280.0	16,914.1	10,600.0	137.8	138.0	-25.91	6,828.0	-263.6	756.0	568.7	187.31	4.036		
17,700.0	11,280.0	17,014.1	10,600.0	139.8	140.0	-25.91	6,928.0	-264.4	756.0	566.2	189.82	3.983		
17,800.0	11,280.0	17,114.1	10,600.0	141.8	142.0	-25.91	7,028.0	-265.1	756.0	563.7	192.33	3.931		
17,900.0	11,280.0	17,214.1	10,600.0	143.8	144.0	-25.91	7,128.0	-265.9	756.0	561.1	194.85	3.880		
18,000.0	11,280.0	17,314.1	10,600.0	145.8	146.0	-25.91	7,228.0	-266.7	756.0	558.6	197.37	3.830		
18,100.0	11,280.0	17,414.1	10,600.0	147.8	148.0	-25.91	7,328.0	-267.4	756.0	556.1	199.89	3.782		
18,200.0	11,280.0	17,514.1	10,600.0	149.7	149.9	-25.91	7,428.0	-268.2	756.0	553.6	202.41	3.735		
18,300.0	11,280.0	17,614.1	10,600.0	151.7	151.9	-25.91	7,528.0	-269.0	756.0	551.1	204.94	3.689		
18,400.0	11,280.0	17,714.1	10,600.0	153.7	153.9	-25.91	7,628.0	-269.7	756.0	548.5	207.47	3.644		
18,500.0	11,280.0	17,814.1	10,600.0	155.7	155.9	-25.91	7,728.0	-270.5	756.0	546.0	210.01	3.600		
18,600.0	11,280.0	17,914.1	10,600.0	157.7	157.9	-25.91	7,828.0	-271.3	756.0	543.5	212.54	3.557		
18,700.0	11,280.0	18,014.1	10,600.0	159.7	159.9	-25.91	7,928.0	-272.0	756.0	540.9	215.08	3.515		
18,800.0	11,280.0	18,114.1	10,600.0	161.7	161.9	-25.91	8,028.0	-272.8	756.0	538.4	217.63	3.474		
18,900.0	11,280.0	18,214.1	10,600.0	163.7	163.9	-25.91	8,128.0	-273.5	756.0	535.8	220.17	3.434		
19,000.0	11,280.0	18,314.1	10,600.0	165.7	165.9	-25.91	8,228.0	-274.3	756.0	533.3	222.72	3.395		
19,100.0	11,280.0	18,414.1	10,600.0	167.7	167.9	-25.91	8,327.9	-275.1	756.0	530.8	225.26	3.356		
19,200.0	11,280.0	18,514.1	10,600.0	169.7	169.9	-25.91	8,427.9	-275.8	756.0	528.2	227.82	3.319		
19,287.0	11,280.0	18,601.1	10,600.0	171.4	171.6	-25.91	8,515.0	-276.5	756.0	526.0	230.04	3.287		

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 507H - Dagger Lake 5 State Com 507H - Prelim Plan 1													Offset Site Error:	0.0 usft
Survey Program: 0-MWD+HRGM													Offset Well Error:	0.0 usft
Reference	Offset	Semi Major Axis		Offset Wellbore Centre		Rule Assigned:		Warning						
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.0	0.0	0.0	0.0	0.0	0.0	89.83	0.1	33.0	33.0					
100.0	100.0	100.0	100.0	0.6	0.6	89.83	0.1	33.0	33.0	31.8	1.19	27.808		
200.0	200.0	200.0	200.0	1.7	1.7	89.83	0.1	33.0	33.0	29.5	3.49	9.457		
300.0	300.0	300.0	300.0	2.4	2.4	89.83	0.1	33.0	33.0	28.1	4.87	6.776		
400.0	400.0	400.0	400.0	3.0	3.0	89.83	0.1	33.0	33.0	27.1	5.95	5.549		
500.0	500.0	500.0	500.0	3.4	3.4	89.83	0.1	33.0	33.0	26.1	6.86	4.807		
600.0	600.0	600.0	600.0	3.8	3.8	89.83	0.1	33.0	33.0	25.3	7.68	4.297		
700.0	700.0	700.0	700.0	4.2	4.2	89.83	0.1	33.0	33.0	24.6	8.42	3.918		
800.0	800.0	800.0	800.0	4.6	4.6	89.83	0.1	33.0	33.0	23.9	9.11	3.622		
900.0	900.0	900.0	900.0	4.9	4.9	89.83	0.1	33.0	33.0	23.2	9.75	3.383		
1,000.0	1,000.0	1,000.0	1,000.0	5.2	5.2	89.83	0.1	33.0	33.0	22.6	10.36	3.184		
1,100.0	1,100.0	1,100.0	1,100.0	5.5	5.5	89.83	0.1	33.0	33.0	22.1	10.95	3.015		
1,200.0	1,200.0	1,200.0	1,200.0	5.8	5.8	89.83	0.1	33.0	33.0	21.5	11.50	2.869		
1,300.0	1,300.0	1,300.0	1,300.0	6.0	6.0	89.83	0.1	33.0	33.0	21.0	12.04	2.742		
1,400.0	1,400.0	1,400.0	1,400.0	6.3	6.3	89.83	0.1	33.0	33.0	20.4	12.55	2.629		
1,500.0	1,500.0	1,500.0	1,500.0	6.5	6.5	89.83	0.1	33.0	33.0	19.9	13.05	2.529		
1,600.0	1,600.0	1,600.0	1,600.0	6.8	6.8	89.83	0.1	33.0	33.0	19.5	13.54	2.438		
1,700.0	1,700.0	1,700.0	1,700.0	7.0	7.0	89.83	0.1	33.0	33.0	19.0	14.01	2.356		
1,800.0	1,800.0	1,800.0	1,800.0	7.2	7.2	89.83	0.1	33.0	33.0	18.5	14.47	2.281		
1,900.0	1,900.0	1,900.0	1,900.0	7.5	7.5	89.83	0.1	33.0	33.0	18.1	14.92	2.212		
2,000.0	2,000.0	2,000.0	2,000.0	7.7	7.7	89.83	0.1	33.0	33.0	17.6	15.36	2.149		
2,100.0	2,100.0	2,100.0	2,100.0	7.9	7.9	89.83	0.1	33.0	33.0	17.2	15.79	2.090		
2,200.0	2,200.0	2,200.0	2,200.0	8.1	8.1	89.83	0.1	33.0	33.0	16.8	16.21	2.036		
2,300.0	2,300.0	2,300.0	2,300.0	8.3	8.3	89.83	0.1	33.0	33.0	16.4	16.62	1.985		
2,400.0	2,400.0	2,400.0	2,400.0	8.5	8.5	89.83	0.1	33.0	33.0	16.0	17.03	1.938		
2,500.0	2,500.0	2,500.0	2,500.0	8.7	8.7	89.83	0.1	33.0	33.0	15.6	17.43	1.893		
2,600.0	2,600.0	2,600.0	2,600.0	8.9	8.9	89.83	0.1	33.0	33.0	15.2	17.83	1.851		
2,700.0	2,700.0	2,700.0	2,700.0	9.1	9.1	89.83	0.1	33.0	33.0	14.8	18.22	1.812		
2,800.0	2,800.0	2,800.0	2,800.0	9.3	9.3	89.83	0.1	33.0	33.0	14.4	18.60	1.774		
2,900.0	2,900.0	2,900.0	2,900.0	9.5	9.5	89.83	0.1	33.0	33.0	14.0	18.98	1.739		
3,000.0	3,000.0	3,000.0	3,000.0	9.7	9.7	89.83	0.1	33.0	33.0	13.6	19.35	1.705		
3,100.0	3,100.0	3,100.0	3,100.0	9.9	9.9	89.83	0.1	33.0	33.0	13.3	19.72	1.673		
3,200.0	3,200.0	3,200.0	3,200.0	10.0	10.0	89.83	0.1	33.0	33.0	12.9	20.09	1.643		
3,300.0	3,300.0	3,300.0	3,300.0	10.2	10.2	89.83	0.1	33.0	33.0	12.6	20.45	1.614		
3,400.0	3,400.0	3,400.0	3,400.0	10.4	10.4	89.83	0.1	33.0	33.0	12.2	20.81	1.586		
3,500.0	3,500.0	3,500.0	3,500.0	10.6	10.6	89.83	0.1	33.0	33.0	11.8	21.16	1.559		
3,600.0	3,600.0	3,600.0	3,600.0	10.8	10.8	89.83	0.1	33.0	33.0	11.5	21.51	1.534		
3,700.0	3,700.0	3,700.0	3,700.0	10.9	10.9	89.83	0.1	33.0	33.0	11.1	21.86	1.510		
3,800.0	3,800.0	3,800.0	3,800.0	11.1	11.1	89.83	0.1	33.0	33.0	10.8	22.20	1.486 Level 3		
3,900.0	3,900.0	3,900.0	3,900.0	11.3	11.3	89.83	0.1	33.0	33.0	10.5	22.55	1.464 Level 3		
4,000.0	4,000.0	4,000.0	4,000.0	11.4	11.4	89.83	0.1	33.0	33.0	10.1	22.88	1.442 Level 3		
4,100.0	4,100.0	4,100.0	4,100.0	11.6	11.6	89.83	0.1	33.0	33.0	9.8	23.22	1.421 Level 3		
4,200.0	4,200.0	4,200.0	4,200.0	11.8	11.8	89.83	0.1	33.0	33.0	9.4	23.55	1.401 Level 3		
4,300.0	4,300.0	4,300.0	4,300.0	11.9	11.9	89.83	0.1	33.0	33.0	9.1	23.88	1.382 Level 3		
4,400.0	4,400.0	4,400.0	4,400.0	12.1	12.1	89.83	0.1	33.0	33.0	8.8	24.21	1.363 Level 3		
4,500.0	4,500.0	4,500.0	4,500.0	12.3	12.3	89.83	0.1	33.0	33.0	8.5	24.54	1.345 Level 3		
4,600.0	4,600.0	4,600.0	4,600.0	12.4	12.4	89.83	0.1	33.0	33.0	8.1	24.86	1.327 Level 3		
4,700.0	4,700.0	4,700.0	4,700.0	12.6	12.6	89.83	0.1	33.0	33.0	7.8	25.18	1.310 Level 3		
4,800.0	4,800.0	4,800.0	4,800.0	12.8	12.8	89.83	0.1	33.0	33.0	7.5	25.50	1.294 Level 3		
4,900.0	4,900.0	4,900.0	4,900.0	12.9	12.9	89.83	0.1	33.0	33.0	7.2	25.82	1.278 Level 3		

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 507H - Dagger Lake 5 State Com 507H - Prelim Plan 1													Offset Site Error:	0.0 usft
Survey Program: 0-MWD+HRGM													Offset Well Error:	0.0 usft
Reference	Offset	Semi Major Axis		Offset Wellbore Centre		Rule Assigned:		Warning						
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.0	5,000.0	5,000.0	5,000.0	13.1	13.1	89.83	0.1	33.0	33.0	6.9	26.14	1.263	Level 3	
5,100.0	5,100.0	5,100.0	5,100.0	13.2	13.2	89.83	0.1	33.0	33.0	6.5	26.45	1.248	Level 3	
5,166.7	5,166.7	5,166.7	5,166.7	13.3	13.3	89.83	0.1	33.0	33.0	6.3	26.66	1.238	Level 3	
5,200.0	5,200.0	5,200.0	5,200.0	13.4	13.4	89.83	0.1	33.0	33.0	6.2	26.76	1.233	Level 3, CC, ES, SF	
5,300.0	5,300.0	5,299.5	5,299.5	13.5	13.5	88.92	0.6	33.7	33.7	6.6	27.06	1.245	Level 3	
5,400.0	5,400.0	5,399.0	5,399.0	13.7	13.7	86.40	2.2	35.7	35.8	8.4	27.35	1.309	Level 3	
5,500.0	5,500.0	5,498.4	5,498.3	13.8	13.8	64.00	4.9	39.1	39.0	11.4	27.65	1.412	Level 3	
5,600.0	5,600.0	5,597.7	5,597.4	14.0	14.0	62.78	8.7	43.8	43.0	15.1	27.95	1.540		
5,700.0	5,699.9	5,696.9	5,696.3	14.2	14.2	62.56	13.5	49.9	47.7	19.5	28.27	1.688		
5,800.0	5,799.7	5,796.0	5,795.0	14.4	14.4	63.07	19.3	57.3	53.1	24.5	28.61	1.856		
5,900.1	5,899.5	5,895.4	5,893.7	14.6	14.6	64.13	26.2	66.0	59.1	30.2	28.91	2.045		
6,000.0	5,999.0	5,995.0	5,992.7	14.8	14.9	65.50	33.5	75.1	65.2	35.9	29.27	2.228		
6,100.0	6,098.6	6,094.9	6,091.8	15.0	15.1	66.64	40.7	84.3	71.3	41.7	29.65	2.406		
6,200.0	6,198.2	6,194.7	6,190.9	15.3	15.4	67.60	47.9	93.4	77.5	47.4	30.05	2.578		
6,300.0	6,297.8	6,294.5	6,290.0	15.6	15.7	68.41	55.2	102.6	83.6	53.2	30.45	2.746		
6,400.0	6,397.5	6,394.3	6,389.1	15.9	16.1	69.12	62.4	111.7	89.8	58.9	30.87	2.909		
6,500.0	6,497.1	6,494.1	6,488.3	16.2	16.4	69.73	69.6	120.8	96.0	64.7	31.29	3.068		
6,600.0	6,596.7	6,593.9	6,587.4	16.5	16.7	70.27	76.9	130.0	102.2	70.5	31.72	3.221		
6,700.0	6,696.3	6,693.7	6,686.5	16.8	17.1	70.74	84.1	139.1	108.4	76.2	32.17	3.369		
6,800.0	6,795.9	6,793.5	6,785.6	17.1	17.5	71.17	91.4	148.3	114.6	82.0	32.62	3.513		
6,900.0	6,895.6	6,893.3	6,884.7	17.5	17.9	71.55	98.6	157.4	120.8	87.7	33.07	3.653		
7,000.0	6,995.2	6,993.1	6,983.9	17.8	18.3	71.90	105.8	166.5	127.0	93.5	33.54	3.787		
7,100.0	7,094.8	7,092.9	7,083.0	18.2	18.7	72.21	113.1	175.7	133.2	99.2	34.01	3.918		
7,200.0	7,194.4	7,192.7	7,182.1	18.6	19.1	72.49	120.3	184.8	139.5	105.0	34.49	4.044		
7,300.0	7,294.0	7,292.5	7,281.2	18.9	19.5	72.75	127.5	194.0	145.7	110.7	34.98	4.166		
7,400.0	7,393.7	7,392.3	7,380.4	19.3	19.9	72.99	134.8	203.1	151.9	116.5	35.47	4.284		
7,500.0	7,493.3	7,492.1	7,479.5	19.7	20.4	73.21	142.0	212.2	158.2	122.2	35.96	4.398		
7,600.0	7,592.9	7,591.9	7,578.6	20.1	20.8	73.41	149.3	221.4	164.4	127.9	36.47	4.508		
7,700.0	7,692.5	7,691.7	7,677.7	20.5	21.3	73.60	156.5	230.5	170.7	133.7	36.98	4.615		
7,800.0	7,792.1	7,791.5	7,776.8	21.0	21.7	73.78	163.7	239.7	176.9	139.4	37.49	4.719		
7,900.0	7,891.8	7,891.3	7,876.0	21.4	22.2	73.94	171.0	248.8	183.1	145.1	38.01	4.819		
8,000.0	7,991.4	7,991.1	7,975.1	21.8	22.7	74.09	178.2	258.0	189.4	150.9	38.53	4.915		
8,100.0	8,091.0	8,090.9	8,074.2	22.2	23.1	74.24	185.4	267.1	195.6	156.6	39.06	5.009		
8,200.0	8,190.6	8,190.7	8,173.3	22.7	23.6	74.37	192.7	276.2	201.9	162.3	39.59	5.100		
8,300.0	8,290.2	8,290.5	8,272.4	23.1	24.1	74.50	199.9	285.4	208.1	168.0	40.12	5.187		
8,400.0	8,389.8	8,390.3	8,371.6	23.6	24.6	74.61	207.2	294.5	214.4	173.7	40.66	5.272		
8,500.0	8,489.5	8,490.1	8,470.7	24.0	25.1	74.73	214.4	303.7	220.6	179.4	41.20	5.355		
8,600.0	8,589.1	8,589.9	8,569.8	24.5	25.6	74.83	221.6	312.8	226.9	185.1	41.75	5.434		
8,700.0	8,688.7	8,689.7	8,668.9	24.9	26.1	74.93	228.9	321.9	233.1	190.8	42.30	5.512		
8,800.0	8,788.3	8,789.6	8,768.0	25.4	26.6	75.03	236.1	331.1	239.4	196.5	42.85	5.586		
8,900.0	8,887.9	8,889.4	8,867.2	25.8	27.1	75.12	243.3	340.2	245.6	202.2	43.40	5.659		
9,000.0	8,987.6	8,989.2	8,966.3	26.3	27.6	75.20	250.6	349.4	251.9	207.9	43.96	5.729		
9,100.0	9,087.2	9,089.0	9,065.4	26.8	28.1	75.28	257.8	358.5	258.1	213.6	44.52	5.798		
9,200.0	9,186.8	9,188.8	9,164.5	27.2	28.6	75.36	265.1	367.6	264.4	219.3	45.09	5.864		
9,304.1	9,290.5	9,292.7	9,267.7	27.7	29.2	75.44	272.6	377.2	270.9	225.2	45.68	5.930		
9,400.0	9,386.1	9,388.4	9,362.7	28.2	29.7	75.40	279.5	385.9	277.1	230.8	46.26	5.990		
9,500.0	9,485.9	9,488.1	9,461.8	28.6	30.2	75.04	286.8	395.1	284.0	237.1	46.94	6.051		
9,600.0	9,585.8	9,587.8	9,560.8	29.0	30.7	74.38	294.0	404.2	291.4	243.7	47.69	6.110		
9,700.0	9,685.8	9,687.3	9,659.6	29.4	31.2	73.43	301.2	413.3	299.3	250.8	48.53	6.167		
9,804.2	9,790.0	9,794.4	9,766.1	29.7	31.8	92.13	308.6	422.6	307.8	258.3	49.45	6.223		

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 507H - Dagger Lake 5 State Com 507H - Prelim Plan 1												Offset Site Error:	0.0 usft
Survey Program: 0-MWD+HRGM												Offset Well Error:	0.0 usft
Rule Assigned:													
Measured Reference	Vertical	Measured	Vertical	Reference	Semi Major Axis	Highside	Offset Wellbore Centre		Distance		Minimum	Separation	Warning
Depth	Depth	Depth	Depth	Offset	Offset	Toolface	+N/-S	+E/-W	Between	Between	Separation	Factor	
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	Centres	Ellipses	(usft)		
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	(usft)	(usft)	(usft)		
9,900.0	9,885.8	9,893.9	9,865.2	29.7	32.3	91.03	314.3	429.9	314.6	264.4	50.25	6.262	
10,000.0	9,985.8	9,998.1	9,969.1	29.8	32.8	90.14	319.2	436.1	320.5	269.5	51.00	6.285	
10,100.0	10,085.8	10,102.6	10,073.4	29.9	33.3	89.48	323.0	440.8	325.0	273.3	51.66	6.291	
10,200.0	10,185.8	10,207.3	10,177.9	30.0	33.7	89.04	325.5	444.0	328.1	275.9	52.24	6.281	
10,300.0	10,285.8	10,312.0	10,282.7	30.1	34.1	88.81	326.9	445.7	329.8	277.1	52.70	6.258	
10,400.0	10,385.8	10,415.1	10,385.8	30.2	34.2	88.77	327.1	446.0	330.1	277.1	52.94	6.234	
10,402.4	10,388.2	10,417.5	10,388.2	30.2	34.2	88.77	327.1	446.0	330.1	277.1	52.95	6.234	
10,500.0	10,485.8	10,514.7	10,485.4	30.3	34.3	88.57	328.2	446.0	330.1	276.9	53.18	6.207	
10,600.0	10,585.8	10,610.6	10,579.7	30.4	34.7	85.78	344.4	445.9	330.8	276.5	54.30	6.093	
10,700.0	10,685.8	10,697.0	10,660.5	30.5	35.1	80.57	374.8	445.6	335.1	278.8	56.34	5.948	
10,800.0	10,785.8	10,770.7	10,724.0	30.5	35.5	74.42	411.8	445.4	347.4	288.6	58.84	5.905	
10,816.8	10,802.5	10,781.7	10,733.1	30.6	35.5	73.40	418.2	445.3	350.6	291.3	59.26	5.917	
10,825.0	10,810.8	10,787.1	10,737.4	30.6	35.5	73.14	421.4	445.3	352.2	292.8	59.46	5.924	
10,850.0	10,835.7	10,803.1	10,750.1	30.7	35.6	71.07	431.2	445.2	357.5	297.5	60.04	5.954	
10,875.0	10,860.6	10,819.0	10,762.4	30.8	35.7	69.05	441.3	445.1	363.1	302.5	60.59	5.993	
10,900.0	10,885.3	10,834.8	10,774.2	30.9	35.8	67.10	451.7	445.0	369.0	307.9	61.09	6.040	
10,925.0	10,909.8	10,850.0	10,785.3	31.1	35.8	65.25	462.1	445.0	375.1	313.5	61.54	6.095	
10,950.0	10,934.0	10,865.9	10,796.5	31.2	35.9	63.41	473.4	444.9	381.3	319.3	61.97	6.153	
10,975.0	10,957.9	10,881.3	10,807.0	31.4	36.0	61.68	484.7	444.8	387.6	325.3	62.36	6.216	
11,000.0	10,981.3	10,900.0	10,819.2	31.5	36.1	59.82	498.8	444.7	394.0	331.2	62.80	6.273	
11,025.0	11,004.2	10,911.8	10,826.7	31.7	36.1	58.46	507.9	444.6	400.3	337.3	63.03	6.351	
11,050.0	11,026.6	10,925.0	10,834.7	31.9	36.2	57.08	518.4	444.5	406.6	343.4	63.27	6.427	
11,075.0	11,048.4	10,942.0	10,844.7	32.0	36.2	55.57	532.2	444.4	412.8	349.3	63.59	6.492	
11,100.0	11,069.4	10,957.0	10,853.0	32.2	36.3	54.26	544.6	444.3	418.9	355.1	63.83	6.563	
11,125.0	11,089.8	10,975.0	10,862.6	32.3	36.4	52.90	559.9	444.2	424.9	360.7	64.15	6.624	
11,150.0	11,109.4	10,986.7	10,868.4	32.5	36.4	51.88	570.0	444.1	430.6	366.4	64.25	6.702	
11,175.0	11,128.1	11,000.0	10,874.8	32.7	36.5	50.87	581.7	444.1	436.2	371.8	64.39	6.774	
11,200.0	11,145.9	11,016.2	10,882.1	32.8	36.5	49.83	596.2	443.9	441.5	376.9	64.59	6.834	
11,225.0	11,162.8	11,030.9	10,888.3	32.9	36.6	48.92	609.5	443.8	446.5	381.7	64.74	6.897	
11,250.0	11,178.7	11,050.0	10,895.8	33.1	36.7	47.97	627.0	443.7	451.3	386.3	65.01	6.941	
11,275.0	11,193.6	11,060.2	10,899.5	33.2	36.7	47.32	636.6	443.6	455.7	390.7	64.98	7.012	
11,300.0	11,207.4	11,075.0	10,904.5	33.3	36.7	46.63	650.5	443.5	459.8	394.7	65.09	7.065	
11,325.0	11,220.1	11,089.4	10,908.9	33.4	36.8	46.01	664.2	443.4	463.6	398.4	65.17	7.114	
11,350.0	11,231.6	11,100.0	10,911.9	33.5	36.8	45.52	674.3	443.3	467.1	402.0	65.10	7.174	
11,375.0	11,242.0	11,118.4	10,916.6	33.6	36.9	44.97	692.2	443.2	470.1	404.8	65.30	7.200	
11,400.0	11,251.2	11,132.9	10,919.8	33.7	36.9	44.55	706.3	443.1	472.9	407.5	65.35	7.236	
11,425.0	11,259.1	11,150.0	10,923.0	33.8	37.0	44.16	723.1	443.0	475.2	409.7	65.48	7.257	
11,450.0	11,265.8	11,161.8	10,924.9	33.9	37.0	43.90	734.8	442.9	477.2	411.7	65.41	7.295	
11,475.0	11,271.2	11,175.0	10,926.6	33.9	37.1	43.67	747.8	442.8	478.7	413.3	65.38	7.322	
11,500.0	11,275.3	11,190.7	10,928.2	34.0	37.1	43.49	763.4	442.7	479.9	414.5	65.44	7.333	
11,525.0	11,278.2	11,200.0	10,928.9	34.0	37.2	43.38	772.7	442.6	480.7	415.5	65.24	7.368	
11,550.0	11,279.7	11,219.6	10,929.8	34.0	37.2	43.32	792.2	442.4	481.0	415.6	65.43	7.352	
11,566.8	11,280.0	11,229.2	10,930.0	34.1	37.2	43.32	801.9	442.4	481.1	415.6	65.42	7.354	
11,579.9	11,280.0	11,240.4	10,930.0	34.1	37.3	43.32	813.1	442.3	481.0	415.5	65.55	7.339	
11,600.0	11,280.0	11,260.5	10,930.0	34.1	37.3	43.32	833.2	442.1	481.0	415.2	65.86	7.304	
11,700.0	11,280.0	11,360.5	10,930.0	34.2	37.7	43.32	933.2	441.4	481.0	413.6	67.48	7.128	
11,800.0	11,280.0	11,460.5	10,930.0	34.4	38.2	43.32	1,033.2	440.6	481.0	411.8	69.22	6.949	
11,900.0	11,280.0	11,560.5	10,930.0	34.6	38.8	43.31	1,133.2	439.8	481.0	410.0	71.07	6.769	
12,000.0	11,280.0	11,660.5	10,930.0	35.0	39.6	43.31	1,233.2	439.1	481.0	408.0	73.00	6.589	
12,100.0	11,280.0	11,760.5	10,930.0	35.6	40.5	43.31	1,333.2	438.3	481.0	406.0	75.03	6.411	

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 507H - Dagger Lake 5 State Com 507H - Prelim Plan 1													Offset Site Error: 0.0 usft	
Survey Program: 0-MWD+HRGM									Rule Assigned:				Offset Well Error: 0.0 usft	
Reference		Offset		Semi Major Axis		Highside Toolface (°)	Offset Wellbore Centre		Distance		Minimum Separation (usft)	Separation Factor	Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)		+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)				
12,200.0	11,280.0	11,860.5	10,930.0	36.5	41.5	43.31	1,433.2	437.5	481.0	403.9	77.13	6.237		
12,300.0	11,280.0	11,960.5	10,930.0	37.7	42.6	43.31	1,533.2	436.8	481.0	401.7	79.30	6.065		
12,400.0	11,280.0	12,060.5	10,930.0	39.1	43.8	43.31	1,633.2	436.0	481.0	399.5	81.55	5.899		
12,500.0	11,280.0	12,160.5	10,930.0	40.6	45.1	43.31	1,733.2	435.3	481.0	397.2	83.85	5.736		
12,600.0	11,280.0	12,260.5	10,930.0	42.1	46.5	43.31	1,833.2	434.5	481.0	394.8	86.21	5.579		
12,700.0	11,280.0	12,360.5	10,930.0	43.8	48.0	43.31	1,933.2	433.7	481.0	392.4	88.63	5.427		
12,800.0	11,280.0	12,460.5	10,930.0	45.5	49.5	43.31	2,033.2	433.0	481.0	389.9	91.09	5.281		
12,900.0	11,280.0	12,560.5	10,930.0	47.2	51.1	43.31	2,133.2	432.2	481.0	387.4	93.59	5.139		
13,000.0	11,280.0	12,660.5	10,930.0	48.9	52.6	43.31	2,233.2	431.4	481.0	384.8	96.14	5.003		
13,100.0	11,280.0	12,760.5	10,930.0	50.7	54.3	43.31	2,333.2	430.7	481.0	382.3	98.73	4.872		
13,200.0	11,280.0	12,860.5	10,930.0	52.5	55.9	43.31	2,433.2	429.9	481.0	379.6	101.35	4.746		
13,300.0	11,280.0	12,960.5	10,930.0	54.3	57.6	43.31	2,533.2	429.1	481.0	377.0	104.00	4.625		
13,400.0	11,280.0	13,060.5	10,930.0	56.1	59.4	43.31	2,633.2	428.4	481.0	374.3	106.68	4.509		
13,500.0	11,280.0	13,160.5	10,930.0	58.0	61.1	43.31	2,733.2	427.6	481.0	371.6	109.39	4.397		
13,600.0	11,280.0	13,260.5	10,930.0	59.8	62.8	43.30	2,833.1	426.9	481.0	368.8	112.12	4.290		
13,700.0	11,280.0	13,360.5	10,930.0	61.7	64.6	43.30	2,933.1	426.1	481.0	366.1	114.88	4.187		
13,800.0	11,280.0	13,460.5	10,930.0	63.6	66.4	43.30	3,033.1	425.3	480.9	363.3	117.66	4.088		
13,900.0	11,280.0	13,560.5	10,930.0	65.4	68.2	43.30	3,133.1	424.6	480.9	360.5	120.46	3.993		
14,000.0	11,280.0	13,660.5	10,930.0	67.3	70.0	43.30	3,233.1	423.8	480.9	357.7	123.28	3.901		
14,100.0	11,280.0	13,760.5	10,930.0	69.2	71.8	43.30	3,333.1	423.0	480.9	354.8	126.12	3.813		
14,200.0	11,280.0	13,860.5	10,930.0	71.1	73.7	43.30	3,433.1	422.3	480.9	352.0	128.97	3.729		
14,300.0	11,280.0	13,960.5	10,930.0	73.1	75.5	43.30	3,533.1	421.5	480.9	349.1	131.84	3.648		
14,400.0	11,280.0	14,060.5	10,930.0	75.0	77.4	43.30	3,633.1	420.7	480.9	346.2	134.73	3.570		
14,500.0	11,280.0	14,160.5	10,930.0	76.9	79.3	43.30	3,733.1	420.0	480.9	343.3	137.62	3.494		
14,600.0	11,280.0	14,260.5	10,930.0	78.8	81.1	43.30	3,833.1	419.2	480.9	340.4	140.53	3.422		
14,700.0	11,280.0	14,360.5	10,930.0	80.7	83.0	43.30	3,933.1	418.4	480.9	337.5	143.46	3.352		
14,800.0	11,280.0	14,460.5	10,930.0	82.7	84.9	43.30	4,033.1	417.7	480.9	334.5	146.39	3.285		
14,900.0	11,280.0	14,560.5	10,930.0	84.6	86.8	43.30	4,133.1	416.9	480.9	331.6	149.33	3.220		
15,000.0	11,280.0	14,660.5	10,930.0	86.6	88.7	43.30	4,233.1	416.2	480.9	328.6	152.29	3.158		
15,100.0	11,280.0	14,760.5	10,930.0	88.5	90.6	43.30	4,333.1	415.4	480.9	325.6	155.25	3.097		
15,200.0	11,280.0	14,860.5	10,930.0	90.5	92.5	43.30	4,433.1	414.6	480.9	322.7	158.22	3.039		
15,300.0	11,280.0	14,960.5	10,930.0	92.4	94.4	43.30	4,533.1	413.9	480.9	319.7	161.20	2.983		
15,400.0	11,280.0	15,060.5	10,930.0	94.4	96.3	43.29	4,633.1	413.1	480.9	316.7	164.19	2.929		
15,500.0	11,280.0	15,160.5	10,930.0	96.3	98.2	43.29	4,733.1	412.3	480.9	313.7	167.19	2.876		
15,600.0	11,280.0	15,260.5	10,930.0	98.3	100.1	43.29	4,833.1	411.6	480.9	310.7	170.19	2.825		
15,700.0	11,280.0	15,360.5	10,930.0	100.2	102.1	43.29	4,933.1	410.8	480.9	307.7	173.20	2.776		
15,800.0	11,280.0	15,460.5	10,930.0	102.2	104.0	43.29	5,033.1	410.0	480.9	304.6	176.22	2.729		
15,900.0	11,280.0	15,560.5	10,930.0	104.2	105.9	43.29	5,133.1	409.3	480.9	301.6	179.24	2.683		
16,000.0	11,280.0	15,660.5	10,930.0	106.1	107.9	43.29	5,233.1	408.5	480.8	298.6	182.27	2.638		
16,100.0	11,280.0	15,760.5	10,930.0	108.1	109.8	43.29	5,333.1	407.7	480.8	295.5	185.30	2.595		
16,200.0	11,280.0	15,860.5	10,930.0	110.1	111.8	43.29	5,433.1	407.0	480.8	292.5	188.34	2.553		
16,300.0	11,280.0	15,960.5	10,930.0	112.1	113.7	43.29	5,533.1	406.2	480.8	289.5	191.38	2.512		
16,400.0	11,280.0	16,060.5	10,930.0	114.0	115.6	43.29	5,633.1	405.5	480.8	286.4	194.43	2.473		
16,500.0	11,280.0	16,160.5	10,930.0	116.0	117.6	43.29	5,733.1	404.7	480.8	283.3	197.48	2.435		
16,600.0	11,280.0	16,260.5	10,930.0	118.0	119.5	43.29	5,833.1	403.9	480.8	280.3	200.54	2.398		
16,700.0	11,280.0	16,360.5	10,930.0	120.0	121.5	43.29	5,933.1	403.2	480.8	277.2	203.60	2.362		
16,800.0	11,280.0	16,460.5	10,930.0	121.9	123.5	43.29	6,033.1	402.4	480.8	274.1	206.67	2.327		
16,900.0	11,280.0	16,560.5	10,930.0	123.9	125.4	43.29	6,133.1	401.6	480.8	271.1	209.74	2.292		
17,000.0	11,280.0	16,660.5	10,930.0	125.9	127.4	43.29	6,233.0	400.9	480.8	268.0	212.81	2.259		
17,100.0	11,280.0	16,760.5	10,930.0	127.9	129.3	43.28	6,333.0	400.1	480.8	264.9	215.88	2.227		

CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Offset Design: Dagger Lake 5 State Com - Dagger Lake 5 State Com 507H - Dagger Lake 5 State Com 507H - Prelim Plan 1													Offset Site Error: 0.0 usft	
Survey Program: 0-MWD+HRGM		Offset		Semi Major Axis		Highside Toolface (°)	Offset Wellbore Centre		Rule Assigned: Distance				Offset Well Error: 0.0 usft	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)		+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning	
17,200.0	11,280.0	16,860.5	10,930.0	129.9	131.3	43.28	6,433.0	399.3	480.8	261.8	218.96	2.196		
17,300.0	11,280.0	16,960.5	10,930.0	131.8	133.3	43.28	6,533.0	398.6	480.8	258.7	222.05	2.165		
17,400.0	11,280.0	17,060.5	10,930.0	133.8	135.2	43.28	6,633.0	397.8	480.8	255.7	225.13	2.136		
17,500.0	11,280.0	17,160.5	10,930.0	135.8	137.2	43.28	6,733.0	397.1	480.8	252.6	228.22	2.107		
17,600.0	11,280.0	17,260.5	10,930.0	137.8	139.2	43.28	6,833.0	396.3	480.8	249.5	231.31	2.079		
17,700.0	11,280.0	17,360.5	10,930.0	139.8	141.1	43.28	6,933.0	395.5	480.8	246.4	234.40	2.051		
17,800.0	11,280.0	17,460.5	10,930.0	141.8	143.1	43.28	7,033.0	394.8	480.8	243.3	237.50	2.024		
17,900.0	11,280.0	17,560.5	10,930.0	143.8	145.1	43.28	7,133.0	394.0	480.8	240.2	240.60	1.998		
18,000.0	11,280.0	17,660.5	10,930.0	145.8	147.0	43.28	7,233.0	393.2	480.8	237.1	243.70	1.973		
18,100.0	11,280.0	17,760.5	10,930.0	147.8	149.0	43.28	7,333.0	392.5	480.8	234.0	246.80	1.948		
18,200.0	11,280.0	17,860.5	10,930.0	149.7	151.0	43.28	7,433.0	391.7	480.8	230.8	249.91	1.924		
18,300.0	11,280.0	17,960.5	10,930.0	151.7	153.0	43.28	7,533.0	390.9	480.7	227.7	253.01	1.900		
18,400.0	11,280.0	18,060.5	10,930.0	153.7	154.9	43.28	7,633.0	390.2	480.7	224.6	256.12	1.877		
18,500.0	11,280.0	18,160.5	10,930.0	155.7	156.9	43.28	7,733.0	389.4	480.7	221.5	259.23	1.854		
18,600.0	11,280.0	18,260.5	10,930.0	157.7	158.9	43.28	7,833.0	388.6	480.7	218.4	262.35	1.832		
18,700.0	11,280.0	18,360.5	10,930.0	159.7	160.9	43.28	7,933.0	387.9	480.7	215.3	265.46	1.811		
18,800.0	11,280.0	18,460.5	10,930.0	161.7	162.9	43.28	8,033.0	387.1	480.7	212.1	268.58	1.790		
18,900.0	11,280.0	18,560.5	10,930.0	163.7	164.8	43.27	8,133.0	386.4	480.7	209.0	271.70	1.769		
19,000.0	11,280.0	18,660.5	10,930.0	165.7	166.8	43.27	8,233.0	385.6	480.7	205.9	274.82	1.749		
19,100.0	11,280.0	18,760.5	10,930.0	167.7	168.8	43.27	8,333.0	384.8	480.7	202.8	277.94	1.730		
19,200.0	11,280.0	18,860.5	10,930.0	169.7	170.8	43.27	8,433.0	384.1	480.7	199.6	281.06	1.710		
19,285.4	11,280.0	18,946.0	10,930.0	171.4	172.5	43.27	8,518.4	383.4	480.7	197.0	283.73	1.694		
19,287.0	11,280.0	18,946.9	10,930.0	171.4	172.5	43.27	8,519.4	383.4	480.7	196.9	283.76	1.694		

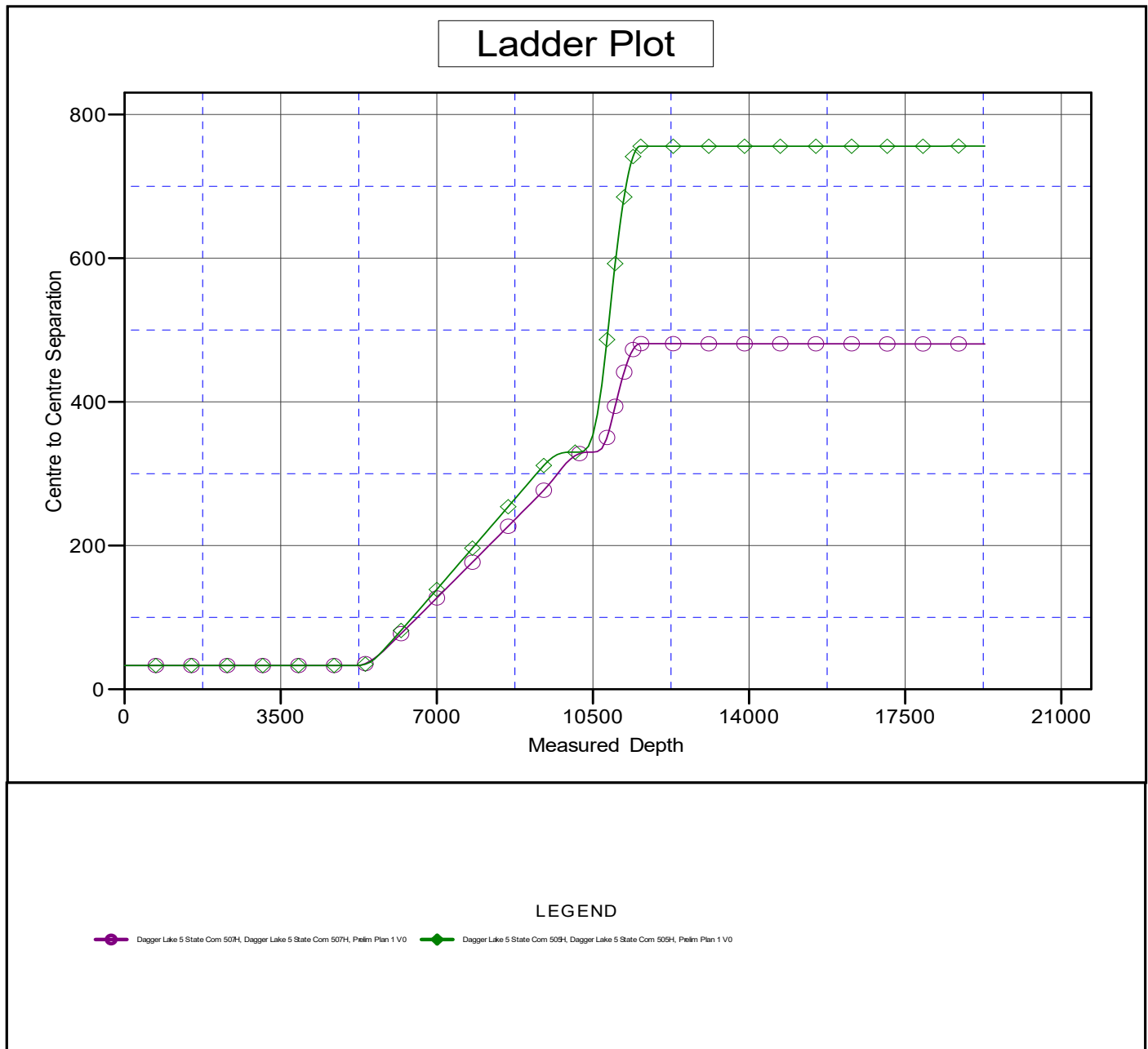


Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to WELL @ 3681.5usft (25.5' - RKB 368
Offset Depths are relative to Offset Datum
Central Meridian is 104° 20' 0.000 W

Coordinates are relative to: Dagger Lake 5 State Com 553H
Coordinate System is US State Plane 1983, New Mexico Eastern Zone
Grid Convergence at Surface is: 0.39°



CC - Min centre to center distance or convergent point, SF - min separation factor, ES - min ellipse separation



Anticollision Report

Company:	Advance Energy Partners	Local Co-ordinate Reference:	Well Dagger Lake 5 State Com 553H
Project:	Hat Mesa	TVD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Reference Site:	Dagger Lake 5 State Com	MD Reference:	WELL @ 3681.5usft (25.5' - RKB 3681.5' (H&P 466))
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	Dagger Lake 5 State Com 553H	Survey Calculation Method:	Minimum Curvature
Well Error:	0.0 usft	Output errors are at	2.79 sigma
Reference Wellbore	Dagger Lake 5 State Com 553H	Database:	EDM 5000.16 Single User Db
Reference Design:	Prelim Plan 1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to WELL @ 3681.5usft (25.5' - RKB 368

Offset Depths are relative to Offset Datum

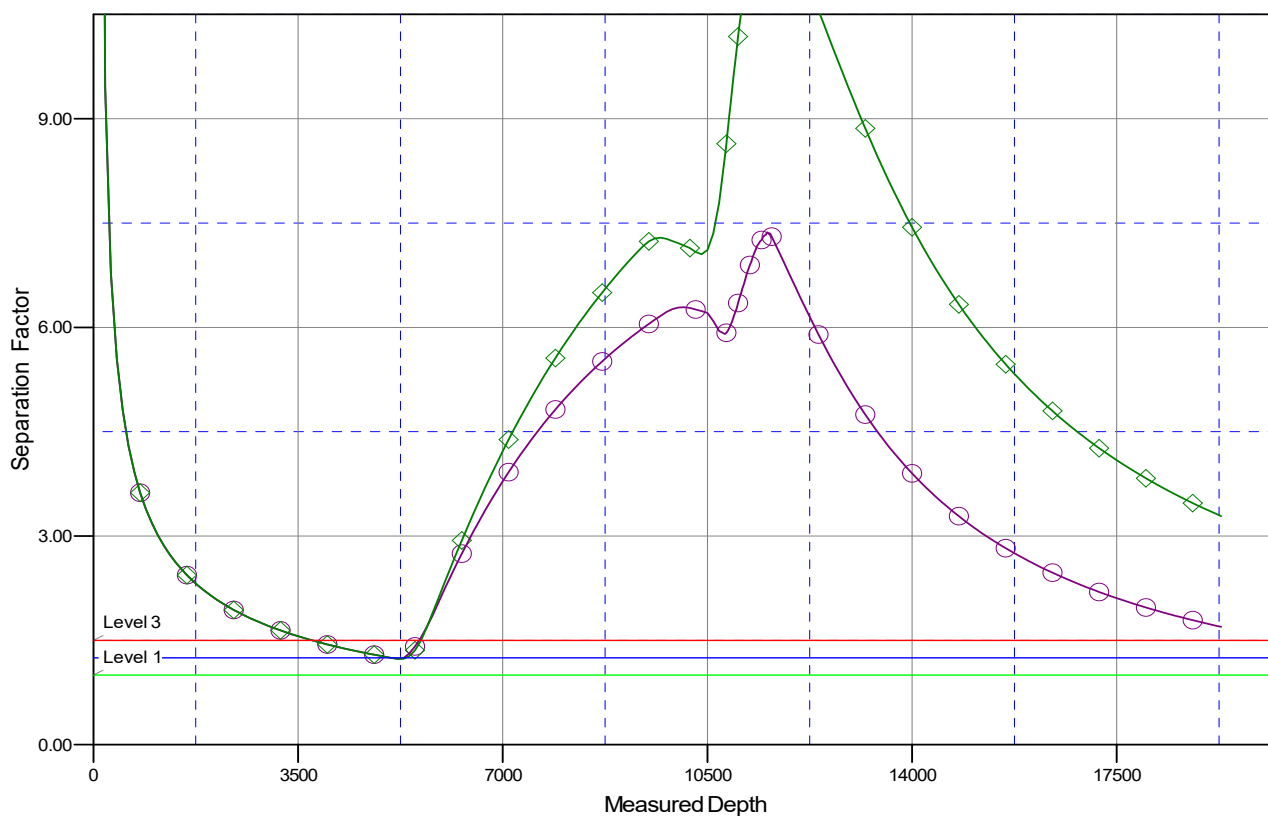
Central Meridian is 104° 20' 0.000 W

Coordinates are relative to: Dagger Lake 5 State Com 553H

Coordinate System is US State Plane 1983, New Mexico Eastern Zone

Grid Convergence at Surface is: 0.39°

Separation Factor Plot



LEGEND

Dagger Lake 5 State Com 507H, Dagger Lake 5 State Com 507H, Prelim Plan 1 V0
 Dagger Lake 5 State Com 509H, Dagger Lake 5 State Com 509H, Prelim Plan 1 V0