

AXIS EXPLORATION

ARAPAHOE COUNTY

Sec 4-T4S-R65W

JAMASO 4-65 5-6-1

ORIGINAL WELLBORE

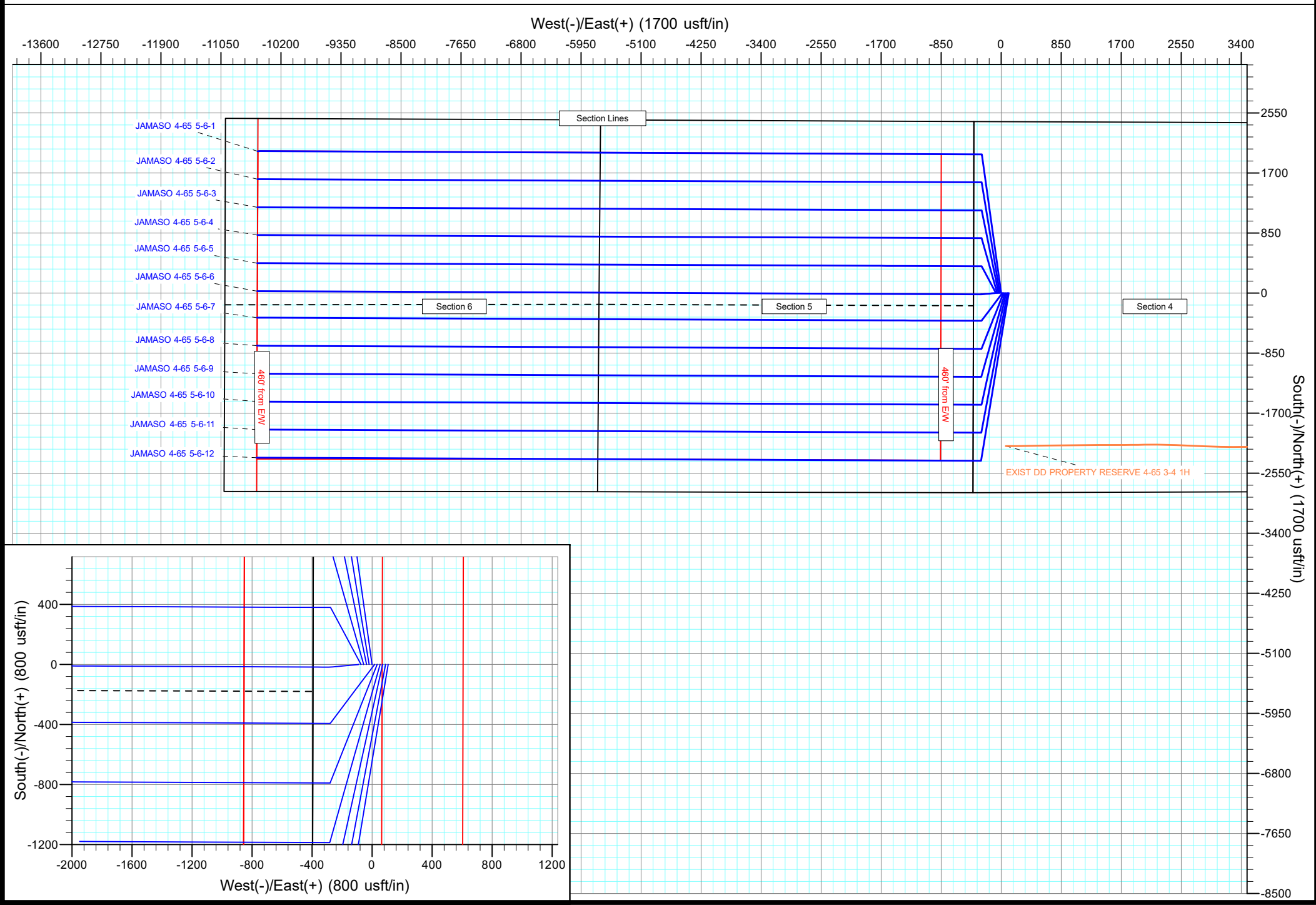
PROPOSAL 1

Anticollision Report

12 April, 2018



Project: ARAPAHOE COUNTY
Site: Sec 4-T4S-R65W
Well: JAMASO 4-65 5-6-1
ORIGINAL WELLBORE
PROPOSAL 1



Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Reference	PROPOSAL 1		
Filter type:	NO GLOBAL FILTER: Using user defined selection & filtering criteria		
Interpolation Method:	MD + Stations Interval 100.00usft	Error Model:	ISCWSA
Depth Range:	Unlimited	Scan Method:	Closest Approach 3D
Results Limited by:	Maximum center-center distance of 9,999.98 usft	Error Surface:	Pedal Curve
Warning Levels Evaluated at:	2.00 Sigma	Casing Method:	Not applied

Survey Tool Program	Date	4/12/2018			
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description	
0.00	18,239.20	PROPOSAL 1 (ORIGINAL WELLBORE)	MWD OWSG	OWSG MWD - Standard	

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						
Sec 4-T4S-R65W						
EXIST DD PROPERTY RESERVE 4-65 3-4 1H - Wellbo	7,981.57	16,985.00	4,161.41	3,882.58	14.925	CC, ES
EXIST DD PROPERTY RESERVE 4-65 3-4 1H - Wellbo	8,000.00	16,985.00	4,161.49	3,882.63	14.923	SF
JAMASO 4-65 5-6-10 - ORIGINAL WELLBORE - PROPO	200.00	200.00	70.31	69.33	71.325	CC
JAMASO 4-65 5-6-10 - ORIGINAL WELLBORE - PROPO	300.00	300.02	70.57	68.87	41.452	ES
JAMASO 4-65 5-6-10 - ORIGINAL WELLBORE - PROPO	18,239.20	18,153.00	3,544.34	2,986.83	6.357	SF
JAMASO 4-65 5-6-11 - ORIGINAL WELLBORE - PROPO	200.00	200.00	90.00	89.01	91.296	CC
JAMASO 4-65 5-6-11 - ORIGINAL WELLBORE - PROPO	300.00	299.98	90.26	88.55	53.018	ES
JAMASO 4-65 5-6-11 - ORIGINAL WELLBORE - PROPO	18,239.20	18,212.39	3,941.68	3,383.97	7.068	SF
JAMASO 4-65 5-6-12 - ORIGINAL WELLBORE - PROPO	286.20	286.98	106.31	104.72	66.650	CC
JAMASO 4-65 5-6-12 - ORIGINAL WELLBORE - PROPO	300.00	300.76	106.33	104.63	62.766	ES
JAMASO 4-65 5-6-12 - ORIGINAL WELLBORE - PROPO	18,239.20	18,210.73	4,342.23	3,784.71	7.788	SF
JAMASO 4-65 5-6-2 - ORIGINAL WELLBORE - PROPO	324.72	324.68	19.50	17.62	10.370	CC
JAMASO 4-65 5-6-2 - ORIGINAL WELLBORE - PROPO	18,239.20	18,091.52	399.82	-152.04	0.724	Level 1, ES, SF
JAMASO 4-65 5-6-3 - ORIGINAL WELLBORE - PROPO	369.98	369.88	36.21	34.01	16.416	CC
JAMASO 4-65 5-6-3 - ORIGINAL WELLBORE - PROPO	400.00	400.16	36.26	33.84	14.966	ES
JAMASO 4-65 5-6-3 - ORIGINAL WELLBORE - PROPO	18,239.20	17,877.58	814.47	273.06	1.504	SF
JAMASO 4-65 5-6-4 - ORIGINAL WELLBORE - PROPO	410.85	410.66	55.71	53.21	22.277	CC
JAMASO 4-65 5-6-4 - ORIGINAL WELLBORE - PROPO	500.00	500.55	56.28	53.12	17.840	ES
JAMASO 4-65 5-6-4 - ORIGINAL WELLBORE - PROPO	18,239.20	17,998.77	1,187.52	631.59	2.136	SF
JAMASO 4-65 5-6-5 - ORIGINAL WELLBORE - PROPO	440.43	440.14	72.43	69.71	26.663	CC
JAMASO 4-65 5-6-5 - ORIGINAL WELLBORE - PROPO	500.00	500.55	72.64	69.49	23.030	ES
JAMASO 4-65 5-6-5 - ORIGINAL WELLBORE - PROPO	18,239.20	17,913.30	1,585.27	1,030.16	2.856	SF
JAMASO 4-65 5-6-6 - ORIGINAL WELLBORE - PROPO	466.74	466.35	89.14	86.23	30.654	CC
JAMASO 4-65 5-6-6 - ORIGINAL WELLBORE - PROPO	500.00	500.55	89.20	86.05	28.280	ES
JAMASO 4-65 5-6-6 - ORIGINAL WELLBORE - PROPO	18,239.20	17,770.95	1,989.88	1,437.03	3.599	SF
JAMASO 4-65 5-6-7 - ORIGINAL WELLBORE - PROPO	200.00	200.00	16.87	15.89	17.118	CC
JAMASO 4-65 5-6-7 - ORIGINAL WELLBORE - PROPO	300.00	300.02	17.20	15.50	10.104	ES
JAMASO 4-65 5-6-7 - ORIGINAL WELLBORE - PROPO	18,239.20	17,969.79	2,356.83	1,800.17	4.234	SF
JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPO	200.00	200.00	33.75	32.76	34.236	CC
JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPO	300.00	300.02	34.03	32.33	19.990	ES
JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPO	18,239.20	17,963.93	2,754.28	2,197.58	4.948	SF
JAMASO 4-65 5-6-9 - ORIGINAL WELLBORE - PROPO	200.00	200.00	53.44	52.45	54.207	CC
JAMASO 4-65 5-6-9 - ORIGINAL WELLBORE - PROPO	300.00	300.02	53.71	52.00	31.544	ES
JAMASO 4-65 5-6-9 - ORIGINAL WELLBORE - PROPO	18,239.20	17,894.20	3,156.12	2,599.81	5.673	SF

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Sec 4-T4S-R65W - EXIST DD PROPERTY RESERVE 4-65 3-4 1H - Wellbore #1 - Wellbore #1		Offset Site Error:		0.00 usft
Survey Program:		83-MWD											Offset Well Error:		0.00 usft		
Reference		Offset		Semi Major Axis			Distance							Warning			
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor					
0.00	0.00	16,985.00	8,060.83	0.00	249.75	178.27	-2,164.51	65.41	8,245.28								
100.00	100.00	16,985.00	8,060.83	0.13	249.75	178.27	-2,164.51	65.41	8,148.83	8,048.96	99.87	81.594					
200.00	200.00	16,985.00	8,060.83	0.49	249.75	178.27	-2,164.51	65.41	8,052.47	7,952.09	100.38	80.218					
300.00	299.98	16,985.00	8,060.83	0.85	249.75	-174.49	-2,164.51	65.41	7,956.69	7,855.75	100.94	78.826					
400.00	399.84	16,985.00	8,060.83	1.22	249.75	-175.02	-2,164.51	65.41	7,862.09	7,760.52	101.58	77.400					
500.00	499.45	16,985.00	8,060.83	1.59	249.75	-175.45	-2,164.51	65.41	7,768.83	7,666.52	102.31	75.934					
600.00	598.70	16,985.00	8,060.83	1.97	249.75	-175.80	-2,164.51	65.41	7,677.08	7,573.93	103.15	74.429					
700.00	697.47	16,985.00	8,060.83	2.38	249.75	-176.10	-2,164.51	65.41	7,587.00	7,482.91	104.09	72.890					
800.00	795.62	16,985.00	8,060.83	2.82	249.75	-176.34	-2,164.51	65.41	7,498.76	7,393.62	105.14	71.318					
900.00	893.06	16,985.00	8,060.83	3.29	249.75	-176.55	-2,164.51	65.41	7,412.55	7,306.22	106.32	69.718					
1,000.00	989.64	16,985.00	8,060.83	3.79	249.75	-176.74	-2,164.51	65.41	7,328.53	7,220.90	107.62	68.094					
1,081.03	1,067.21	16,985.00	8,060.83	4.23	249.75	-176.86	-2,164.51	65.41	7,262.18	7,153.41	108.77	66.766					
1,100.00	1,085.29	16,985.00	8,060.83	4.34	249.75	-176.86	-2,164.51	65.41	7,246.85	7,137.81	109.04	66.457					
1,200.00	1,180.60	16,985.00	8,060.83	4.91	249.75	-176.86	-2,164.51	65.41	7,166.31	7,055.72	110.59	64.799					
1,300.00	1,275.90	16,985.00	8,060.83	5.49	249.75	-176.86	-2,164.51	65.41	7,086.27	6,974.07	112.20	63.158					
1,400.00	1,371.21	16,985.00	8,060.83	6.07	249.75	-176.86	-2,164.51	65.41	7,006.74	6,892.88	113.86	61.537					
1,500.00	1,466.52	16,985.00	8,060.83	6.66	249.75	-176.86	-2,164.51	65.41	6,927.74	6,812.16	115.58	59.937					
1,600.00	1,561.83	16,985.00	8,060.83	7.26	249.75	-176.86	-2,164.51	65.41	6,849.29	6,731.93	117.36	58.360					
1,700.00	1,657.14	16,985.00	8,060.83	7.85	249.75	-176.86	-2,164.51	65.41	6,771.41	6,652.21	119.20	56.808					
1,800.00	1,752.44	16,985.00	8,060.83	8.45	249.75	-176.86	-2,164.51	65.41	6,694.11	6,573.03	121.09	55.283					
1,900.00	1,847.75	16,985.00	8,060.83	9.05	249.75	-176.86	-2,164.51	65.41	6,617.43	6,494.39	123.04	53.785					
2,000.00	1,943.06	16,985.00	8,060.83	9.66	249.75	-176.86	-2,164.51	65.41	6,541.37	6,416.33	125.04	52.314					
2,100.00	2,038.37	16,985.00	8,060.83	10.26	249.75	-176.86	-2,164.51	65.41	6,465.97	6,338.87	127.10	50.873					
2,200.00	2,133.68	16,985.00	8,060.83	10.86	249.75	-176.86	-2,164.51	65.41	6,391.24	6,262.02	129.22	49.461					
2,300.00	2,228.99	16,985.00	8,060.83	11.47	249.75	-176.86	-2,164.51	65.41	6,317.21	6,185.81	131.39	48.078					
2,400.00	2,324.29	16,985.00	8,060.83	12.08	249.75	-176.86	-2,164.51	65.41	6,243.90	6,110.27	133.63	46.727					
2,500.00	2,419.60	16,985.00	8,060.83	12.68	249.75	-176.86	-2,164.51	65.41	6,171.34	6,035.43	135.92	45.405					
2,600.00	2,514.91	16,985.00	8,060.83	13.29	249.75	-176.86	-2,164.51	65.41	6,099.56	5,961.30	138.26	44.115					
2,700.00	2,610.22	16,985.00	8,060.83	13.90	249.75	-176.86	-2,164.51	65.41	6,028.59	5,887.91	140.67	42.856					
2,800.00	2,705.53	16,985.00	8,060.83	14.51	249.75	-176.86	-2,164.51	65.41	5,958.44	5,815.31	143.13	41.628					
2,900.00	2,800.83	16,985.00	8,060.83	15.12	249.75	-176.86	-2,164.51	65.41	5,889.16	5,743.50	145.66	40.432					
3,000.00	2,896.14	16,985.00	8,060.83	15.73	249.75	-176.86	-2,164.51	65.41	5,820.77	5,672.54	148.24	39.267					
3,100.00	2,991.45	16,985.00	8,060.83	16.34	249.75	-176.86	-2,164.51	65.41	5,753.31	5,602.44	150.87	38.134					
3,200.00	3,086.76	16,985.00	8,060.83	16.95	249.75	-176.86	-2,164.51	65.41	5,686.81	5,533.24	153.57	37.032					
3,300.00	3,182.07	16,985.00	8,060.83	17.56	249.75	-176.86	-2,164.51	65.41	5,621.30	5,464.98	156.31	35.961					
3,400.00	3,277.38	16,985.00	8,060.83	18.17	249.75	-176.86	-2,164.51	65.41	5,556.81	5,397.69	159.12	34.922					
3,500.00	3,372.68	16,985.00	8,060.83	18.78	249.75	-176.86	-2,164.51	65.41	5,493.39	5,331.41	161.98	33.914					
3,600.00	3,467.99	16,985.00	8,060.83	19.39	249.75	-176.86	-2,164.51	65.41	5,431.07	5,266.18	164.89	32.938					
3,700.00	3,563.30	16,985.00	8,060.83	20.00	249.75	-176.86	-2,164.51	65.41	5,369.89	5,202.04	167.85	31.992					
3,800.00	3,658.61	16,985.00	8,060.83	20.61	249.75	-176.86	-2,164.51	65.41	5,309.89	5,139.02	170.87	31.076					
3,900.00	3,753.92	16,985.00	8,060.83	21.22	249.75	-176.86	-2,164.51	65.41	5,251.10	5,077.18	173.93	30.191					
4,000.00	3,849.22	16,985.00	8,060.83	21.83	249.75	-176.86	-2,164.51	65.41	5,193.58	5,016.55	177.03	29.337					
4,100.00	3,944.53	16,985.00	8,060.83	22.45	249.75	-176.86	-2,164.51	65.41	5,137.36	4,957.18	180.18	28.512					
4,200.00	4,039.84	16,985.00	8,060.83	23.06	249.75	-176.86	-2,164.51	65.41	5,082.48	4,899.11	183.37	27.717					
4,300.00	4,135.15	16,985.00	8,060.83	23.67	249.75	-176.86	-2,164.51	65.41	5,029.00	4,842.40	186.60	26.951					
4,400.00	4,230.46	16,985.00	8,060.83	24.28	249.75	-176.86	-2,164.51	65.41	4,976.95	4,787.09	189.86	26.214					
4,500.00	4,325.77	16,985.00	8,060.83	24.89	249.75	-176.86	-2,164.51	65.41	4,926.38	4,733.23	193.15	25.506					
4,600.00	4,421.07	16,985.00	8,060.83	25.51	249.75	-176.86	-2,164.51	65.41	4,877.34	4,680.87	196.46	24.826					
4,700.00	4,516.38	16,985.00	8,060.83	26.12	249.75	-176.86	-2,164.51	65.41	4,829.86	4,630.07	199.80	24.174					
4,800.00	4,611.69	16,985.00	8,060.83	26.73	249.75	-176.86	-2,164.51	65.41	4,784.01	4,580.86	203.15	23.549					
4,900.00	4,707.00	16,985.00	8,060.83	27.34	249.75	-176.86	-2,164.51	65.41	4,739.83	4,533.31	206.51	22.952					
5,000.00	4,802.31	16,985.00	8,060.83	27.95	249.75	-176.86	-2,164.51	65.41	4,697.36	4,487.48	209.88	22.381					

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 83-MWD													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,100.00	4,897.61	16,985.00	8,060.83	28.57	249.75	-176.86	-2,164.51	65.41	4,656.64	4,443.40	213.24	21.837		
5,200.00	4,992.92	16,985.00	8,060.83	29.18	249.75	-176.86	-2,164.51	65.41	4,617.74	4,401.14	216.60	21.319		
5,300.00	5,088.23	16,985.00	8,060.83	29.79	249.75	-176.86	-2,164.51	65.41	4,580.69	4,360.74	219.95	20.826		
5,400.00	5,183.54	16,985.00	8,060.83	30.40	249.75	-176.86	-2,164.51	65.41	4,545.54	4,322.27	223.27	20.359		
5,500.00	5,278.85	16,985.00	8,060.83	31.01	249.75	-176.86	-2,164.51	65.41	4,512.33	4,285.76	226.56	19.916		
5,600.00	5,374.15	16,985.00	8,060.83	31.63	249.75	-176.86	-2,164.51	65.41	4,481.10	4,251.28	229.82	19.498		
5,700.00	5,469.46	16,985.00	8,060.83	32.24	249.75	-176.86	-2,164.51	65.41	4,451.91	4,218.87	233.04	19.104		
5,800.00	5,564.77	16,985.00	8,060.83	32.85	249.75	-176.86	-2,164.51	65.41	4,424.78	4,188.57	236.20	18.733		
5,900.00	5,660.08	16,985.00	8,060.83	33.46	249.75	-176.86	-2,164.51	65.41	4,399.75	4,160.44	239.31	18.385		
6,000.00	5,755.39	16,985.00	8,060.83	34.08	249.75	-176.86	-2,164.51	65.41	4,376.87	4,134.52	242.35	18.060		
6,100.00	5,850.70	16,985.00	8,060.83	34.69	249.75	-176.86	-2,164.51	65.41	4,356.17	4,110.85	245.32	17.757		
6,200.00	5,946.00	16,985.00	8,060.83	35.30	249.75	-176.86	-2,164.51	65.41	4,337.67	4,089.47	248.20	17.476		
6,300.00	6,041.31	16,985.00	8,060.83	35.91	249.75	-176.86	-2,164.51	65.41	4,321.41	4,070.41	251.00	17.217		
6,400.00	6,136.62	16,985.00	8,060.83	36.53	249.75	-176.86	-2,164.51	65.41	4,307.41	4,053.71	253.70	16.978		
6,500.00	6,231.93	16,985.00	8,060.83	37.14	249.75	-176.86	-2,164.51	65.41	4,295.69	4,039.39	256.30	16.761		
6,600.00	6,327.24	16,985.00	8,060.83	37.75	249.75	-176.86	-2,164.51	65.41	4,286.27	4,027.49	258.79	16.563		
6,700.00	6,422.54	16,985.00	8,060.83	38.37	249.75	-176.86	-2,164.51	65.41	4,279.17	4,018.01	261.16	16.385		
6,745.38	6,465.79	16,985.00	8,060.83	38.64	249.75	-176.86	-2,164.51	65.41	4,276.72	4,014.52	262.20	16.311		
6,800.00	6,518.01	16,985.00	8,060.83	38.97	249.75	-176.86	-2,164.51	65.41	4,273.88	4,010.47	263.41	16.225		
6,900.00	6,614.35	16,985.00	8,060.83	39.54	249.75	-176.85	-2,164.51	65.41	4,267.80	4,002.27	265.53	16.073		
7,000.00	6,711.57	16,985.00	8,060.83	40.06	249.75	-176.85	-2,164.51	65.41	4,260.58	3,993.07	267.51	15.927		
7,100.00	6,809.55	16,985.00	8,060.83	40.53	249.75	-176.84	-2,164.51	65.41	4,252.21	3,982.86	269.35	15.787		
7,200.00	6,908.17	16,985.00	8,060.83	40.96	249.75	-176.83	-2,164.51	65.41	4,242.71	3,971.66	271.05	15.653		
7,300.00	7,007.30	16,985.00	8,060.83	41.35	249.75	-176.81	-2,164.51	65.41	4,232.07	3,959.47	272.60	15.525		
7,400.00	7,106.83	16,985.00	8,060.83	41.69	249.75	-176.80	-2,164.51	65.41	4,220.30	3,946.29	274.01	15.402		
7,500.00	7,206.63	16,985.00	8,060.83	41.98	249.75	-176.79	-2,164.51	65.41	4,207.40	3,932.14	275.27	15.285		
7,600.00	7,306.59	16,985.00	8,060.83	42.23	249.75	-176.77	-2,164.51	65.41	4,193.39	3,917.01	276.38	15.173		
7,626.41	7,333.00	16,985.00	8,060.83	42.29	249.75	175.31	-2,164.51	65.41	4,189.50	3,912.86	276.65	15.144		
7,656.41	7,363.00	16,985.00	8,060.83	42.35	249.75	175.31	-2,164.51	65.41	4,185.15	3,908.21	276.94	15.112		
7,700.00	7,406.55	16,985.00	8,060.83	42.45	249.75	-95.53	-2,164.51	65.41	4,179.34	3,902.01	277.33	15.070		
7,750.00	7,456.18	16,985.00	8,060.83	42.56	249.75	-96.10	-2,164.51	65.41	4,173.63	3,895.89	277.73	15.028		
7,800.00	7,505.10	16,985.00	8,060.83	42.68	249.75	-96.57	-2,164.51	65.41	4,168.96	3,890.89	278.07	14.992		
7,850.00	7,552.93	16,985.00	8,060.83	42.81	249.75	-96.92	-2,164.51	65.41	4,165.39	3,887.03	278.36	14.964		
7,900.00	7,599.32	16,985.00	8,060.83	42.94	249.75	-97.16	-2,164.51	65.41	4,162.95	3,884.36	278.58	14.943		
7,950.00	7,643.91	16,985.00	8,060.83	43.08	249.75	-97.29	-2,164.51	65.41	4,161.64	3,882.89	278.75	14.930		
7,981.57	7,670.99	16,985.00	8,060.83	43.17	249.75	-97.32	-2,164.51	65.41	4,161.41	3,882.58	278.83	14.925 CC, ES		
8,000.00	7,686.37	16,985.00	8,060.83	43.22	249.75	-97.31	-2,164.51	65.41	4,161.49	3,882.63	278.86	14.923 SF		
8,050.00	7,726.36	16,985.00	8,060.83	43.37	249.75	-97.21	-2,164.51	65.41	4,162.49	3,883.58	278.91	14.924		
8,100.00	7,763.59	16,985.00	8,060.83	43.53	249.75	-97.00	-2,164.51	65.41	4,164.64	3,885.74	278.90	14.932		
8,150.00	7,797.77	16,985.00	8,060.83	43.69	249.75	-96.67	-2,164.51	65.41	4,167.92	3,889.07	278.85	14.947		
8,200.00	7,828.65	16,985.00	8,060.83	43.86	249.75	-96.23	-2,164.51	65.41	4,172.30	3,893.54	278.76	14.967		
8,250.00	7,855.98	16,985.00	8,060.83	44.05	249.75	-95.69	-2,164.51	65.41	4,177.74	3,899.12	278.63	14.994		
8,300.00	7,879.55	16,985.00	8,060.83	44.25	249.75	-95.04	-2,164.51	65.41	4,184.20	3,905.74	278.46	15.026		
8,350.00	7,899.20	16,985.00	8,060.83	44.47	249.75	-94.29	-2,164.51	65.41	4,191.63	3,913.36	278.27	15.063		
8,400.00	7,914.77	16,985.00	8,060.83	44.71	249.75	-93.45	-2,164.51	65.41	4,199.96	3,921.90	278.06	15.105		
8,450.00	7,926.14	16,985.00	8,060.83	44.98	249.75	-92.52	-2,164.51	65.41	4,209.12	3,931.29	277.83	15.150		
8,500.00	7,933.22	16,985.00	8,060.83	45.26	249.75	-91.51	-2,164.51	65.41	4,219.05	3,941.46	277.59	15.199		
8,550.00	7,935.96	16,985.00	8,060.83	45.58	249.75	-90.42	-2,164.51	65.41	4,229.65	3,952.32	277.33	15.251		
8,556.48	7,936.00	16,985.00	8,060.83	45.62	249.75	-90.28	-2,164.51	65.41	4,231.07	3,953.78	277.29	15.258		
8,600.00	7,936.00	16,985.00	8,060.83	45.92	249.75	-90.28	-2,164.51	65.41	4,240.85	3,963.79	277.06	15.306		
8,700.00	7,936.00	16,985.00	8,060.83	46.70	249.75	-90.28	-2,164.51	65.41	4,264.92	3,988.39	276.53	15.423		
8,800.00	7,936.00	16,985.00	8,060.83	47.61	249.75	-90.28	-2,164.51	65.41	4,291.18	4,015.19	275.99	15.549		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 83-MWVD													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
8,900.00	7,936.00	16,985.00	8,060.83	48.66	249.75	-90.28	-2,164.51	65.41	4,319.60	4,044.18	275.42	15.684		
9,000.00	7,935.99	16,985.00	8,060.83	49.84	249.75	-90.28	-2,164.51	65.41	4,350.13	4,075.30	274.83	15.828		
9,100.00	7,935.99	16,985.00	8,060.83	51.16	249.75	-90.28	-2,164.51	65.41	4,382.74	4,108.53	274.21	15.983		
9,200.00	7,935.99	16,985.00	8,060.83	52.60	249.75	-90.28	-2,164.51	65.41	4,417.36	4,143.81	273.55	16.148		
9,300.00	7,935.99	16,985.00	8,060.83	54.16	249.75	-90.28	-2,164.51	65.41	4,453.97	4,181.12	272.85	16.324		
9,400.00	7,935.99	16,985.00	8,060.83	55.82	249.75	-90.28	-2,164.51	65.41	4,492.50	4,220.39	272.11	16.510		
9,500.00	7,935.99	16,985.00	8,060.83	57.58	249.75	-90.28	-2,164.51	65.41	4,532.91	4,261.58	271.33	16.706		
9,600.00	7,935.99	16,985.00	8,060.83	59.43	249.75	-90.28	-2,164.51	65.41	4,575.15	4,304.65	270.50	16.914		
9,700.00	7,935.98	16,985.00	8,060.83	61.36	249.75	-90.28	-2,164.51	65.41	4,619.17	4,349.54	269.63	17.132		
9,800.00	7,935.98	16,985.00	8,060.83	63.35	249.75	-90.28	-2,164.51	65.41	4,664.92	4,396.21	268.71	17.360		
9,900.00	7,935.98	16,985.00	8,060.83	65.40	249.75	-90.28	-2,164.51	65.41	4,712.34	4,444.59	267.75	17.600		
10,000.00	7,935.98	16,985.00	8,060.83	67.50	249.75	-90.28	-2,164.51	65.41	4,761.39	4,494.64	266.75	17.849		
10,100.00	7,935.98	16,985.00	8,060.83	69.66	249.75	-90.28	-2,164.51	65.41	4,812.03	4,546.31	265.72	18.110		
10,200.00	7,935.98	16,985.00	8,060.83	71.85	249.75	-90.28	-2,164.51	65.41	4,864.19	4,599.54	264.64	18.380		
10,300.00	7,935.98	16,985.00	8,060.83	74.08	249.75	-90.28	-2,164.51	65.41	4,917.83	4,654.29	263.54	18.661		
10,400.00	7,935.97	16,985.00	8,060.83	76.35	249.75	-90.28	-2,164.51	65.41	4,972.90	4,710.50	262.40	18.951		
10,500.00	7,935.97	16,985.00	8,060.83	78.64	249.75	-90.28	-2,164.51	65.41	5,029.36	4,768.12	261.24	19.252		
10,600.00	7,935.97	16,985.00	8,060.83	80.97	249.75	-90.28	-2,164.51	65.41	5,087.16	4,827.11	260.05	19.562		
10,700.00	7,935.97	16,985.00	8,060.83	83.32	249.75	-90.28	-2,164.51	65.41	5,146.25	4,887.42	258.84	19.882		
10,800.00	7,935.97	16,985.00	8,060.83	85.69	249.75	-90.28	-2,164.51	65.41	5,206.60	4,948.99	257.61	20.211		
10,900.00	7,935.97	16,985.00	8,060.83	88.08	249.75	-90.28	-2,164.51	65.41	5,268.15	5,011.79	256.36	20.550		
11,000.00	7,935.97	16,985.00	8,060.83	90.49	249.75	-90.28	-2,164.51	65.41	5,330.86	5,075.77	255.10	20.897		
11,100.00	7,935.96	16,985.00	8,060.83	92.91	249.75	-90.28	-2,164.51	65.41	5,394.70	5,140.88	253.82	21.254		
11,200.00	7,935.96	16,985.00	8,060.83	95.35	249.75	-90.28	-2,164.51	65.41	5,459.63	5,207.09	252.54	21.619		
11,300.00	7,935.96	16,985.00	8,060.83	97.81	249.75	-90.28	-2,164.51	65.41	5,525.60	5,274.35	251.25	21.993		
11,400.00	7,935.96	16,985.00	8,060.83	100.28	249.75	-90.28	-2,164.51	65.41	5,592.58	5,342.63	249.95	22.375		
11,500.00	7,935.96	16,985.00	8,060.83	102.76	249.75	-90.28	-2,164.51	65.41	5,660.54	5,411.89	248.65	22.765		
11,600.00	7,935.96	16,985.00	8,060.83	105.25	249.75	-90.28	-2,164.51	65.41	5,729.43	5,482.09	247.34	23.164		
11,700.00	7,935.96	16,985.00	8,060.83	107.75	249.75	-90.28	-2,164.51	65.41	5,799.23	5,553.19	246.04	23.570		
11,800.00	7,935.95	16,985.00	8,060.83	110.26	249.75	-90.28	-2,164.51	65.41	5,869.91	5,625.17	244.74	23.984		
11,900.00	7,935.95	16,985.00	8,060.83	112.78	249.75	-90.28	-2,164.51	65.41	5,941.43	5,697.98	243.44	24.406		
12,000.00	7,935.95	16,985.00	8,060.83	115.31	249.75	-90.28	-2,164.51	65.41	6,013.76	5,771.61	242.15	24.835		
12,100.00	7,935.95	16,985.00	8,060.83	117.84	249.75	-90.28	-2,164.51	65.41	6,086.87	5,846.01	240.86	25.271		
12,200.00	7,935.95	16,985.00	8,060.83	120.39	249.75	-90.28	-2,164.51	65.41	6,160.74	5,921.16	239.58	25.714		
12,300.00	7,935.95	16,985.00	8,060.83	122.94	249.75	-90.28	-2,164.51	65.41	6,235.34	5,997.03	238.31	26.165		
12,400.00	7,935.95	16,985.00	8,060.83	125.49	249.75	-90.28	-2,164.51	65.41	6,310.64	6,073.59	237.05	26.622		
12,500.00	7,935.94	16,985.00	8,060.83	128.05	249.75	-90.28	-2,164.51	65.41	6,386.62	6,150.82	235.79	27.085		
12,600.00	7,935.94	16,985.00	8,060.83	130.62	249.75	-90.28	-2,164.51	65.41	6,463.25	6,228.70	234.55	27.556		
12,700.00	7,935.94	16,985.00	8,060.83	133.19	249.75	-90.28	-2,164.51	65.41	6,540.51	6,307.19	233.32	28.032		
12,800.00	7,935.94	16,985.00	8,060.83	135.77	249.75	-90.28	-2,164.51	65.41	6,618.39	6,386.29	232.10	28.515		
12,900.00	7,935.94	16,985.00	8,060.83	138.35	249.75	-90.28	-2,164.51	65.41	6,696.85	6,465.96	230.89	29.004		
13,000.00	7,935.94	16,985.00	8,060.83	140.93	249.75	-90.28	-2,164.51	65.41	6,775.88	6,546.18	229.70	29.499		
13,100.00	7,935.94	16,985.00	8,060.83	143.52	249.75	-90.28	-2,164.51	65.41	6,855.45	6,626.94	228.51	30.000		
13,200.00	7,935.93	16,985.00	8,060.83	146.11	249.75	-90.28	-2,164.51	65.41	6,935.56	6,708.21	227.35	30.507		
13,300.00	7,935.93	16,985.00	8,060.83	148.71	249.75	-90.28	-2,164.51	65.41	7,016.17	6,789.98	226.19	31.019		
13,400.00	7,935.93	16,985.00	8,060.83	151.31	249.75	-90.28	-2,164.51	65.41	7,097.28	6,872.23	225.05	31.536		
13,500.00	7,935.93	16,985.00	8,060.83	153.91	249.75	-90.28	-2,164.51	65.41	7,178.86	6,954.94	223.92	32.059		
13,600.00	7,935.93	16,985.00	8,060.83	156.52	249.75	-90.28	-2,164.51	65.41	7,260.91	7,038.10	222.81	32.587		
13,700.00	7,935.93	16,985.00	8,060.83	159.13	249.75	-90.28	-2,164.51	65.41	7,343.40	7,121.69	221.72	33.121		
13,800.00	7,935.93	16,985.00	8,060.83	161.74	249.75	-90.28	-2,164.51	65.41	7,426.32	7,205.69	220.63	33.659		
13,900.00	7,935.92	16,985.00	8,060.83	164.35	249.75	-90.28	-2,164.51	65.41	7,509.66	7,290.09	219.57	34.202		
14,000.00	7,935.92	16,985.00	8,060.83	166.97	249.75	-90.28	-2,164.51	65.41	7,593.40	7,374.89	218.51	34.750		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - EXIST DD PROPERTY RESERVE 4-65 3-4 1H - Wellbore #1 - Wellbore #1												Offset Site Error:	0.00 usft
Survey Program: 83-MWD												Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
14,100.00	7,935.92	16,985.00	8,060.83	169.59	249.75	-90.28	-2,164.51	65.41	7,677.53	7,460.05	217.48	35.303	
14,200.00	7,935.92	16,985.00	8,060.83	172.21	249.75	-90.28	-2,164.51	65.41	7,762.03	7,545.58	216.45	35.860	
14,300.00	7,935.92	16,985.00	8,060.83	174.84	249.75	-90.28	-2,164.51	65.41	7,846.90	7,631.46	215.44	36.422	
14,400.00	7,935.92	16,985.00	8,060.83	177.46	249.75	-90.28	-2,164.51	65.41	7,932.12	7,717.67	214.45	36.988	
14,500.00	7,935.92	16,985.00	8,060.83	180.09	249.75	-90.28	-2,164.51	65.41	8,017.69	7,804.21	213.47	37.559	
14,600.00	7,935.91	16,985.00	8,060.83	182.72	249.75	-90.28	-2,164.51	65.41	8,103.58	7,891.07	212.51	38.133	
14,700.00	7,935.91	16,985.00	8,060.83	185.35	249.75	-90.28	-2,164.51	65.41	8,189.79	7,978.24	211.56	38.712	
14,800.00	7,935.91	16,985.00	8,060.83	187.98	249.75	-90.28	-2,164.51	65.41	8,276.32	8,065.70	210.62	39.295	
14,900.00	7,935.91	16,985.00	8,060.83	190.62	249.75	-90.28	-2,164.51	65.41	8,363.14	8,153.44	209.70	39.881	
15,000.00	7,935.91	16,985.00	8,060.83	193.25	249.75	-90.28	-2,164.51	65.41	8,450.26	8,241.47	208.79	40.472	
15,100.00	7,935.91	16,985.00	8,060.83	195.89	249.75	-90.28	-2,164.51	65.41	8,537.66	8,329.76	207.90	41.066	
15,200.00	7,935.91	16,985.00	8,060.83	198.53	249.75	-90.28	-2,164.51	65.41	8,625.33	8,418.31	207.02	41.664	
15,300.00	7,935.90	16,985.00	8,060.83	201.17	249.75	-90.28	-2,164.51	65.41	8,713.27	8,507.11	206.16	42.265	
15,400.00	7,935.90	16,985.00	8,060.83	203.81	249.75	-90.28	-2,164.51	65.41	8,801.46	8,596.16	205.31	42.870	
15,500.00	7,935.90	16,985.00	8,060.83	206.45	249.75	-90.28	-2,164.51	65.41	8,889.91	8,685.44	204.47	43.478	
15,600.00	7,935.90	16,985.00	8,060.83	209.10	249.75	-90.28	-2,164.51	65.41	8,978.60	8,774.96	203.64	44.090	
15,700.00	7,935.90	16,985.00	8,060.83	211.74	249.75	-90.28	-2,164.51	65.41	9,067.52	8,864.69	202.83	44.705	
15,800.00	7,935.90	16,985.00	8,060.83	214.39	249.75	-90.28	-2,164.51	65.41	9,156.67	8,954.64	202.03	45.323	
15,900.00	7,935.90	16,985.00	8,060.83	217.04	249.75	-90.28	-2,164.51	65.41	9,246.05	9,044.80	201.24	45.944	
16,000.00	7,935.89	16,985.00	8,060.83	219.69	249.75	-90.28	-2,164.51	65.41	9,335.64	9,135.17	200.47	46.569	
16,100.00	7,935.89	16,985.00	8,060.83	222.34	249.75	-90.28	-2,164.51	65.41	9,425.44	9,225.73	199.71	47.196	
16,200.00	7,935.89	16,985.00	8,060.83	224.99	249.75	-90.28	-2,164.51	65.41	9,515.44	9,316.48	198.96	47.826	
16,300.00	7,935.89	16,985.00	8,060.83	227.64	249.75	-90.28	-2,164.51	65.41	9,605.64	9,407.42	198.22	48.459	
16,400.00	7,935.89	16,985.00	8,060.83	230.29	249.75	-90.28	-2,164.51	65.41	9,696.03	9,498.53	197.49	49.095	
16,500.00	7,935.89	16,985.00	8,060.83	232.94	249.75	-90.28	-2,164.51	65.41	9,786.61	9,589.83	196.78	49.734	
16,600.00	7,935.89	16,985.00	8,060.83	235.60	249.75	-90.28	-2,164.51	65.41	9,877.37	9,681.29	196.08	50.375	
16,700.00	7,935.88	16,985.00	8,060.83	238.25	249.75	-90.28	-2,164.51	65.41	9,968.31	9,772.92	195.39	51.018	

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	90.00	0.00	70.31	70.31					
100.00	100.00	100.00	100.00	0.13	0.13	90.00	0.00	70.31	70.31	70.04	0.27	261.526		
200.00	200.00	200.00	200.00	0.49	0.49	90.00	0.00	70.31	70.31	69.33	0.99	71.325 CC		
300.00	299.98	300.02	299.98	0.85	0.85	99.32	0.00	70.31	70.57	68.87	1.70	41.452 ES		
400.00	399.84	400.16	399.84	1.22	1.21	103.43	0.00	70.31	71.61	69.19	2.42	29.552		
500.00	499.45	499.45	499.45	1.59	1.57	109.93	0.00	70.31	74.12	70.97	3.15	23.534		
600.00	598.70	598.29	598.27	1.97	1.90	119.28	-1.65	69.95	79.38	75.51	3.87	20.511		
700.00	697.47	695.41	695.26	2.38	2.23	130.83	-6.50	68.87	89.85	85.26	4.59	19.590		
800.00	795.62	790.21	789.71	2.82	2.56	142.12	-14.34	67.14	107.73	102.42	5.30	20.322		
900.00	893.06	882.11	880.98	3.29	2.89	151.56	-24.84	64.81	133.85	127.85	6.00	22.312		
1,000.00	989.64	970.64	968.52	3.79	3.24	158.81	-37.66	61.98	167.92	161.25	6.67	25.163		
1,081.03	1,067.21	1,039.62	1,036.43	4.23	3.52	163.30	-49.47	59.37	200.90	193.69	7.20	27.889		
1,100.00	1,085.29	1,055.41	1,051.94	4.34	3.58	164.26	-52.40	58.72	209.21	201.88	7.33	28.546		
1,200.00	1,180.60	1,137.19	1,131.95	4.91	3.94	168.43	-68.90	55.07	255.03	247.09	7.94	32.120		
1,300.00	1,275.90	1,216.42	1,208.97	5.49	4.30	171.56	-87.01	51.06	303.90	295.36	8.53	35.615		
1,400.00	1,371.21	1,301.43	1,288.41	6.07	4.71	174.10	-107.49	46.53	355.06	345.89	9.17	38.718		
1,500.00	1,466.52	1,383.39	1,370.37	6.66	5.13	176.10	-128.78	41.82	406.79	396.97	9.82	41.427		
1,600.00	1,561.83	1,468.21	1,452.34	7.26	5.56	177.65	-150.06	37.11	458.80	448.31	10.49	43.748		
1,700.00	1,657.14	1,553.02	1,534.31	7.85	6.00	178.89	-171.34	32.40	511.01	499.85	11.16	45.785		
1,800.00	1,752.44	1,637.84	1,616.27	8.45	6.45	179.90	-192.62	27.69	563.36	551.52	11.84	47.583		
1,900.00	1,847.75	1,722.65	1,698.24	9.05	6.90	-179.26	-213.91	22.98	615.82	603.30	12.52	49.179		
2,000.00	1,943.06	1,807.47	1,780.21	9.66	7.36	-178.56	-235.19	18.27	668.36	655.15	13.21	50.603		
2,100.00	2,038.37	1,907.72	1,862.17	10.26	7.90	-177.95	-256.47	13.56	720.96	707.00	13.96	51.645		
2,200.00	2,133.68	1,977.10	1,944.14	10.86	8.28	-177.43	-277.75	8.85	773.62	759.03	14.59	53.028		
2,300.00	2,228.99	2,061.91	2,026.11	11.47	8.75	-176.97	-299.04	4.15	826.32	811.03	15.28	54.068		
2,400.00	2,324.29	2,146.73	2,108.07	12.08	9.21	-176.57	-320.32	-0.56	879.04	863.07	15.98	55.014		
2,500.00	2,419.60	2,231.54	2,190.04	12.68	9.68	-176.21	-341.60	-5.27	931.80	915.13	16.68	55.876		
2,600.00	2,514.91	2,316.36	2,272.01	13.29	10.15	-175.89	-362.88	-9.98	984.58	967.21	17.38	56.666		
2,700.00	2,610.22	2,401.17	2,353.97	13.90	10.62	-175.60	-384.17	-14.69	1,037.38	1,019.31	18.08	57.391		
2,800.00	2,705.53	2,485.99	2,435.94	14.51	11.09	-175.35	-405.45	-19.40	1,090.20	1,071.42	18.78	58.059		
2,900.00	2,800.83	2,570.81	2,517.91	15.12	11.56	-175.11	-426.73	-24.11	1,143.03	1,123.55	19.48	58.676		
3,000.00	2,896.14	2,655.62	2,599.87	15.73	12.03	-174.90	-448.01	-28.82	1,195.88	1,175.69	20.18	59.248		
3,100.00	2,991.45	2,740.44	2,681.84	16.34	12.51	-174.70	-469.30	-33.53	1,248.73	1,227.84	20.89	59.779		
3,200.00	3,086.76	2,825.25	2,763.81	16.95	12.98	-174.52	-490.58	-38.24	1,301.60	1,280.00	21.59	60.274		
3,300.00	3,182.07	2,910.07	2,845.77	17.56	13.46	-174.35	-511.86	-42.95	1,354.47	1,332.17	22.30	60.735		
3,400.00	3,277.38	3,005.12	2,927.74	18.17	13.99	-174.20	-533.14	-47.65	1,407.35	1,384.30	23.05	61.055		
3,500.00	3,372.68	3,079.70	3,009.70	18.78	14.41	-174.06	-554.43	-52.36	1,460.24	1,436.53	23.72	61.571		
3,600.00	3,467.99	3,164.51	3,091.67	19.39	14.88	-173.92	-575.71	-57.07	1,513.14	1,488.71	24.43	61.950		
3,700.00	3,563.30	3,249.33	3,173.64	20.00	15.36	-173.80	-596.99	-61.78	1,566.04	1,540.90	25.13	62.306		
3,800.00	3,658.61	3,334.14	3,255.60	20.61	15.84	-173.69	-618.27	-66.49	1,618.94	1,593.10	25.84	62.642		
3,900.00	3,753.92	3,418.96	3,337.57	21.22	16.31	-173.58	-639.56	-71.20	1,671.85	1,645.30	26.55	62.959		
4,000.00	3,849.22	3,503.77	3,419.54	21.83	16.79	-173.48	-660.84	-75.91	1,724.76	1,697.50	27.27	63.258		
4,100.00	3,944.53	3,588.59	3,501.50	22.45	17.27	-173.38	-682.12	-80.62	1,777.68	1,749.70	27.98	63.541		
4,200.00	4,039.84	3,673.40	3,583.47	23.06	17.74	-173.29	-703.40	-85.33	1,830.60	1,801.91	28.69	63.808		
4,300.00	4,135.15	3,758.22	3,665.44	23.67	18.22	-173.20	-724.69	-90.04	1,883.52	1,854.12	29.40	64.062		
4,400.00	4,230.46	3,843.04	3,747.40	24.28	18.70	-173.12	-745.97	-94.75	1,936.45	1,906.34	30.11	64.303		
4,500.00	4,325.77	3,927.85	3,829.37	24.89	19.18	-173.05	-767.25	-99.45	1,989.38	1,958.55	30.83	64.532		
4,600.00	4,421.07	4,012.67	3,911.34	25.51	19.66	-172.98	-788.53	-104.16	2,042.31	2,010.77	31.54	64.750		
4,700.00	4,516.38	4,102.52	3,993.30	26.12	20.16	-172.91	-809.82	-108.87	2,095.24	2,062.97	32.28	64.916		
4,800.00	4,611.69	4,182.30	4,075.27	26.73	20.61	-172.84	-831.10	-113.58	2,148.18	2,115.21	32.97	65.155		
4,900.00	4,707.00	4,267.11	4,157.24	27.34	21.09	-172.78	-852.38	-118.29	2,201.12	2,167.43	33.69	65.343		
5,000.00	4,802.31	4,351.93	4,239.20	27.95	21.57	-172.72	-873.67	-123.00	2,254.06	2,219.65	34.40	65.523		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,100.00	4,897.61	4,436.74	4,321.17	28.57	22.05	-172.66	-894.95	-127.71	2,307.00	2,271.88	35.12	65.695		
5,200.00	4,992.92	4,521.56	4,403.14	29.18	22.53	-172.61	-916.23	-132.42	2,359.94	2,324.11	35.83	65.859		
5,300.00	5,088.23	4,606.37	4,485.10	29.79	23.01	-172.56	-937.51	-137.13	2,412.88	2,376.33	36.55	66.016		
5,400.00	5,183.54	4,708.81	4,567.07	30.40	23.59	-172.51	-958.80	-141.84	2,465.83	2,428.49	37.34	66.039		
5,500.00	5,278.85	4,776.00	4,649.04	31.01	23.97	-172.46	-980.08	-146.55	2,518.77	2,480.79	37.98	66.311		
5,600.00	5,374.15	4,860.82	4,731.00	31.63	24.45	-172.42	-1,001.36	-151.25	2,571.72	2,533.02	38.70	66.449		
5,700.00	5,469.46	4,945.63	4,812.97	32.24	24.93	-172.37	-1,022.64	-155.96	2,624.67	2,585.25	39.42	66.582		
5,800.00	5,564.77	5,030.45	4,894.94	32.85	25.41	-172.33	-1,043.93	-160.67	2,677.62	2,637.48	40.14	66.709		
5,900.00	5,660.08	5,115.27	4,976.90	33.46	25.89	-172.29	-1,065.21	-165.38	2,730.57	2,689.71	40.86	66.831		
6,000.00	5,755.39	5,200.08	5,058.87	34.08	26.37	-172.25	-1,086.49	-170.09	2,783.52	2,741.94	41.58	66.948		
6,100.00	5,850.70	5,284.90	5,140.84	34.69	26.85	-172.22	-1,107.77	-174.80	2,836.47	2,794.18	42.30	67.061		
6,200.00	5,946.00	5,369.71	5,222.80	35.30	27.33	-172.18	-1,129.06	-179.51	2,889.43	2,846.41	43.02	67.169		
6,300.00	6,041.31	5,454.53	5,304.77	35.91	27.81	-172.15	-1,150.34	-184.22	2,942.38	2,898.64	43.74	67.273		
6,400.00	6,136.62	5,539.34	5,386.74	36.53	28.29	-172.11	-1,171.62	-188.93	2,995.34	2,950.88	44.46	67.374		
6,500.00	6,231.93	5,624.16	5,468.70	37.14	28.77	-172.08	-1,192.90	-193.64	3,048.29	3,003.11	45.18	67.470		
6,600.00	6,327.24	5,708.97	5,550.67	37.75	29.25	-172.05	-1,214.19	-198.35	3,101.25	3,055.35	45.90	67.563		
6,700.00	6,422.54	5,806.21	5,632.64	38.37	29.80	-172.02	-1,235.47	-203.06	3,154.21	3,107.53	46.67	67.578		
6,745.38	6,465.79	5,832.27	5,669.83	38.64	29.95	-172.01	-1,245.13	-205.19	3,178.24	3,131.28	46.95	67.692		
6,800.00	6,518.01	5,878.87	5,714.86	38.97	30.21	-172.08	-1,256.82	-207.78	3,206.72	3,159.38	47.35	67.730		
6,900.00	6,614.35	5,965.53	5,798.61	39.54	30.70	-172.20	-1,278.56	-212.59	3,256.58	3,208.51	48.07	67.748		
7,000.00	6,711.57	6,053.85	5,883.97	40.06	31.20	-172.30	-1,300.73	-217.49	3,303.41	3,254.61	48.79	67.702		
7,100.00	6,809.55	6,143.73	5,970.82	40.53	31.71	-172.37	-1,323.28	-222.48	3,347.15	3,297.63	49.52	67.596		
7,200.00	6,908.17	6,235.04	6,059.07	40.96	32.23	-172.43	-1,346.19	-227.55	3,387.76	3,337.52	50.24	67.432		
7,300.00	7,007.30	6,327.69	6,148.61	41.35	32.75	-172.47	-1,369.44	-232.70	3,425.20	3,374.24	50.96	67.215		
7,400.00	7,106.83	6,421.56	6,239.32	41.69	33.29	-172.49	-1,392.99	-237.91	3,459.40	3,407.73	51.67	66.947		
7,500.00	7,206.63	6,516.53	6,331.10	41.98	33.82	-172.49	-1,416.82	-243.18	3,490.34	3,437.96	52.38	66.632		
7,600.00	7,306.59	6,612.49	6,423.84	42.23	34.37	-172.48	-1,440.90	-248.51	3,517.98	3,464.89	53.08	66.272		
7,626.41	7,333.00	6,637.98	6,448.47	42.29	34.51	179.60	-1,447.30	-249.93	3,524.72	3,471.45	53.27	66.171		
7,656.41	7,363.00	6,666.97	6,476.49	42.35	34.68	179.63	-1,454.57	-251.54	3,532.25	3,478.77	53.48	66.053		
7,700.00	7,406.55	6,709.15	6,517.25	42.45	34.92	-89.48	-1,465.16	-253.88	3,543.20	3,489.42	53.78	65.881		
7,750.00	7,456.18	7,661.21	7,457.76	42.56	38.71	-90.16	-1,579.72	-287.12	3,544.31	3,485.01	59.30	59.773		
7,800.00	7,505.10	7,712.05	7,507.46	42.68	38.85	-90.15	-1,579.67	-297.74	3,544.31	3,484.66	59.65	59.419		
7,850.00	7,552.93	7,762.87	7,556.00	42.81	39.00	-90.15	-1,579.61	-312.72	3,544.31	3,484.28	60.02	59.048		
7,900.00	7,599.32	7,813.66	7,603.01	42.94	39.16	-90.14	-1,579.52	-331.92	3,544.31	3,483.88	60.42	58.658		
7,950.00	7,643.91	7,864.42	7,648.10	43.08	39.32	-90.14	-1,579.42	-355.19	3,544.31	3,483.46	60.85	58.246		
8,000.00	7,686.37	7,915.14	7,690.92	43.22	39.49	-90.13	-1,579.30	-382.34	3,544.31	3,483.00	61.31	57.809		
8,050.00	7,726.36	7,965.82	7,731.15	43.37	39.66	-90.12	-1,579.17	-413.15	3,544.31	3,482.50	61.81	57.342		
8,100.00	7,763.59	8,016.45	7,768.46	43.53	39.84	-90.11	-1,579.02	-447.35	3,544.31	3,481.95	62.36	56.839		
8,150.00	7,797.77	8,067.03	7,802.57	43.69	40.02	-90.10	-1,578.86	-484.66	3,544.31	3,481.35	62.96	56.293		
8,200.00	7,828.65	8,117.55	7,833.23	43.86	40.22	-90.09	-1,578.68	-524.79	3,544.31	3,480.68	63.63	55.700		
8,250.00	7,855.98	8,168.00	7,860.20	44.05	40.43	-90.08	-1,578.50	-567.41	3,544.31	3,479.93	64.38	55.056		
8,300.00	7,879.55	8,218.39	7,883.29	44.25	40.66	-90.07	-1,578.30	-612.18	3,544.31	3,479.11	65.20	54.359		
8,350.00	7,899.20	8,268.71	7,902.34	44.47	40.90	-90.06	-1,578.10	-658.74	3,544.31	3,478.20	66.11	53.610		
8,400.00	7,914.77	8,318.96	7,917.22	44.71	41.16	-90.04	-1,577.89	-706.72	3,544.32	3,477.21	67.11	52.815		
8,450.00	7,926.14	8,369.14	7,927.82	44.98	41.45	-90.03	-1,577.68	-755.75	3,544.32	3,476.13	68.18	51.981		
8,500.00	7,933.22	8,419.25	7,934.09	45.26	41.77	-90.01	-1,577.46	-805.45	3,544.32	3,474.99	69.33	51.119		
8,550.00	7,935.96	8,469.28	7,936.00	45.58	42.12	-90.00	-1,577.24	-855.43	3,544.32	3,473.78	70.55	50.242		
8,556.48	7,936.00	8,475.76	7,936.00	45.62	42.17	-90.00	-1,577.22	-861.91	3,544.32	3,473.61	70.71	50.127		
8,600.00	7,936.00	8,519.28	7,936.00	45.92	42.51	-90.00	-1,577.03	-905.43	3,544.32	3,472.49	71.84	49.339		
8,700.00	7,936.00	8,619.28	7,936.00	46.70	43.38	-90.00	-1,576.59	-1,005.42	3,544.33	3,469.70	74.63	47.495		
8,800.00	7,936.00	8,719.28	7,936.00	47.61	44.41	-90.00	-1,576.16	-1,105.42	3,544.34	3,466.65	77.69	45.622		
8,900.00	7,936.00	8,819.28	7,935.99	48.66	45.59	-90.00	-1,575.72	-1,205.42	3,544.34	3,463.35	80.99	43.760		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Sec 4-T4S-R65W - JAMASO 4-6S 5-6-10 - ORIGINAL WELLBORE - PROPOSAL 1		Offset Site Error:		0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:		0.00 usft		
Reference		Offset		Semi Major Axis			Distance							Warning			
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor					
9,000.00	7,935.99	8,919.28	7,935.99	49.84	46.92	-90.00	-1,575.29	-1,305.42	3,544.35	3,459.83	84.51	41.938					
9,100.00	7,935.99	9,019.28	7,935.99	51.16	48.39	-90.00	-1,574.85	-1,405.42	3,544.35	3,456.13	88.22	40.176					
9,200.00	7,935.99	9,119.28	7,935.99	52.60	49.99	-90.00	-1,574.42	-1,505.42	3,544.36	3,452.26	92.09	38.486					
9,300.00	7,935.99	9,219.28	7,935.99	54.16	51.71	-90.00	-1,573.98	-1,605.42	3,544.36	3,448.25	96.11	36.877					
9,400.00	7,935.99	9,319.28	7,935.98	55.82	53.52	-90.00	-1,573.55	-1,705.42	3,544.37	3,444.11	100.26	35.352					
9,500.00	7,935.99	9,419.28	7,935.98	57.58	55.43	-90.00	-1,573.11	-1,805.42	3,544.37	3,439.85	104.52	33.912					
9,600.00	7,935.99	9,519.28	7,935.98	59.43	57.41	-90.00	-1,572.68	-1,905.42	3,544.38	3,435.50	108.88	32.554					
9,700.00	7,935.98	9,619.28	7,935.98	61.36	59.46	-90.00	-1,572.24	-2,005.42	3,544.38	3,431.06	113.32	31.277					
9,800.00	7,935.98	9,719.28	7,935.98	63.35	61.57	-90.00	-1,571.81	-2,105.41	3,544.39	3,426.54	117.85	30.076					
9,900.00	7,935.98	9,819.28	7,935.98	65.40	63.73	-90.00	-1,571.37	-2,205.41	3,544.39	3,421.95	122.44	28.947					
10,000.00	7,935.98	9,919.28	7,935.97	67.50	65.93	-90.00	-1,570.94	-2,305.41	3,544.40	3,417.30	127.10	27.887					
10,100.00	7,935.98	10,019.28	7,935.97	69.66	68.18	-90.00	-1,570.50	-2,405.41	3,544.40	3,412.59	131.81	26.890					
10,200.00	7,935.98	10,119.28	7,935.97	71.85	70.46	-90.00	-1,570.07	-2,505.41	3,544.41	3,407.84	136.57	25.952					
10,300.00	7,935.98	10,219.28	7,935.97	74.08	72.77	-90.00	-1,569.63	-2,605.41	3,544.41	3,403.04	141.38	25.070					
10,400.00	7,935.97	10,319.28	7,935.97	76.35	75.11	-90.00	-1,569.20	-2,705.41	3,544.42	3,398.19	146.23	24.239					
10,500.00	7,935.97	10,419.28	7,935.96	78.64	77.48	-90.00	-1,568.76	-2,805.41	3,544.42	3,393.32	151.11	23.456					
10,600.00	7,935.97	10,519.28	7,935.96	80.97	79.87	-90.00	-1,568.33	-2,905.41	3,544.43	3,388.41	156.02	22.717					
10,700.00	7,935.97	10,619.28	7,935.96	83.32	82.28	-90.00	-1,567.89	-3,005.41	3,544.44	3,383.47	160.97	22.019					
10,800.00	7,935.97	10,719.28	7,935.96	85.69	84.71	-90.00	-1,567.46	-3,105.41	3,544.44	3,378.50	165.94	21.360					
10,900.00	7,935.97	10,819.28	7,935.96	88.08	87.15	-90.00	-1,567.02	-3,205.40	3,544.45	3,373.51	170.94	20.735					
11,000.00	7,935.97	10,919.28	7,935.96	90.49	89.61	-90.00	-1,566.59	-3,305.40	3,544.45	3,368.49	175.96	20.144					
11,100.00	7,935.96	11,019.28	7,935.95	92.91	92.09	-90.00	-1,566.15	-3,405.40	3,544.46	3,363.46	181.00	19.583					
11,200.00	7,935.96	11,119.28	7,935.95	95.35	94.58	-90.00	-1,565.72	-3,505.40	3,544.46	3,358.40	186.06	19.050					
11,300.00	7,935.96	11,219.28	7,935.95	97.81	97.08	-90.00	-1,565.28	-3,605.40	3,544.47	3,353.33	191.14	18.544					
11,400.00	7,935.96	11,319.28	7,935.95	100.28	99.59	-90.00	-1,564.85	-3,705.40	3,544.47	3,348.24	196.23	18.063					
11,500.00	7,935.96	11,419.28	7,935.95	102.76	102.11	-90.00	-1,564.41	-3,805.40	3,544.48	3,343.14	201.34	17.604					
11,600.00	7,935.96	11,519.28	7,935.94	105.25	104.63	-90.00	-1,563.98	-3,905.40	3,544.48	3,338.02	206.47	17.167					
11,700.00	7,935.96	11,619.28	7,935.94	107.75	107.17	-90.00	-1,563.55	-4,005.40	3,544.49	3,332.89	211.60	16.751					
11,800.00	7,935.95	11,719.28	7,935.94	110.26	109.72	-90.00	-1,563.11	-4,105.40	3,544.49	3,327.74	216.75	16.353					
11,900.00	7,935.95	11,819.28	7,935.94	112.78	112.27	-90.00	-1,562.68	-4,205.39	3,544.50	3,322.59	221.91	15.973					
12,000.00	7,935.95	11,919.28	7,935.94	115.31	114.83	-90.00	-1,562.24	-4,305.39	3,544.50	3,317.43	227.08	15.609					
12,100.00	7,935.95	12,019.28	7,935.94	117.84	117.39	-90.00	-1,561.81	-4,405.39	3,544.51	3,312.25	232.26	15.261					
12,200.00	7,935.95	12,119.28	7,935.93	120.39	119.97	-90.00	-1,561.37	-4,505.39	3,544.51	3,307.07	237.45	14.928					
12,300.00	7,935.95	12,219.28	7,935.93	122.94	122.54	-90.00	-1,560.94	-4,605.39	3,544.52	3,301.88	242.64	14.608					
12,400.00	7,935.95	12,319.28	7,935.93	125.49	125.12	-90.00	-1,560.50	-4,705.39	3,544.52	3,296.68	247.85	14.301					
12,500.00	7,935.94	12,419.28	7,935.93	128.05	127.71	-90.00	-1,560.07	-4,805.39	3,544.53	3,291.47	253.06	14.007					
12,600.00	7,935.94	12,519.28	7,935.93	130.62	130.30	-90.00	-1,559.63	-4,905.39	3,544.54	3,286.26	258.28	13.724					
12,700.00	7,935.94	12,619.28	7,935.92	133.19	132.90	-90.00	-1,559.20	-5,005.39	3,544.54	3,281.04	263.50	13.452					
12,800.00	7,935.94	12,719.28	7,935.92	135.77	135.50	-90.00	-1,558.76	-5,105.39	3,544.55	3,275.81	268.74	13.190					
12,900.00	7,935.94	12,819.28	7,935.92	138.35	138.10	-90.00	-1,558.33	-5,205.39	3,544.55	3,270.58	273.97	12.938					
13,000.00	7,935.94	12,919.28	7,935.92	140.93	140.71	-90.00	-1,557.89	-5,305.38	3,544.56	3,265.34	279.22	12.695					
13,100.00	7,935.94	13,019.28	7,935.92	143.52	143.32	-90.00	-1,557.46	-5,405.38	3,544.56	3,260.10	284.47	12.460					
13,200.00	7,935.93	13,119.28	7,935.92	146.11	145.93	-90.00	-1,557.02	-5,505.38	3,544.57	3,254.85	289.72	12.234					
13,300.00	7,935.93	13,219.28	7,935.91	148.71	148.55	-90.00	-1,556.59	-5,605.38	3,544.57	3,249.59	294.98	12.016					
13,400.00	7,935.93	13,319.28	7,935.91	151.31	151.16	-90.00	-1,556.15	-5,705.38	3,544.58	3,244.34	300.24	11.806					
13,500.00	7,935.93	13,419.28	7,935.91	153.91	153.79	-90.00	-1,555.72	-5,805.38	3,544.58	3,239.08	305.51	11.602					
13,600.00	7,935.93	13,519.28	7,935.91	156.52	156.41	-90.00	-1,555.28	-5,905.38	3,544.59	3,233.81	310.78	11.406					
13,700.00	7,935.93	13,619.28	7,935.91	159.13	159.04	-90.00	-1,554.85	-6,005.38	3,544.59	3,228.54	316.05	11.215					
13,800.00	7,935.93	13,719.28	7,935.90	161.74	161.66	-90.00	-1,554.41	-6,105.38	3,544.60	3,223.27	321.33	11.031					
13,900.00	7,935.92	13,819.28	7,935.90	164.35	164.30	-90.00	-1,553.98	-6,205.38	3,544.60	3,217.99	326.61	10.853					
14,000.00	7,935.92	13,919.28	7,935.90	166.97	166.93	-90.00	-1,553.54	-6,305.37	3,544.61	3,212.71	331.90	10.680					
14,100.00	7,935.92	14,019.28	7,935.90	169.59	169.56	-90.00	-1,553.11	-6,405.37	3,544.61	3,207.43	337.19	10.512					

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,200.00	7,935.92	14,119.28	7,935.90	172.21	172.20	-90.00	-1,552.67	-6,505.37	3,544.62	3,202.14	342.48	10.350		
14,300.00	7,935.92	14,219.28	7,935.90	174.84	174.84	-90.00	-1,552.24	-6,605.37	3,544.62	3,196.85	347.77	10.192		
14,400.00	7,935.92	14,319.28	7,935.89	177.46	177.48	-90.00	-1,551.80	-6,705.37	3,544.63	3,191.56	353.07	10.040		
14,500.00	7,935.92	14,419.28	7,935.89	180.09	180.12	-90.00	-1,551.37	-6,805.37	3,544.63	3,186.27	358.37	9.891		
14,600.00	7,935.91	14,519.28	7,935.89	182.72	182.76	-90.00	-1,550.93	-6,905.37	3,544.64	3,180.97	363.67	9.747		
14,700.00	7,935.91	14,619.28	7,935.89	185.35	185.41	-90.00	-1,550.50	-7,005.37	3,544.65	3,175.67	368.97	9.607		
14,800.00	7,935.91	14,719.28	7,935.89	187.98	188.05	-90.00	-1,550.06	-7,105.37	3,544.65	3,170.37	374.28	9.471		
14,900.00	7,935.91	14,819.28	7,935.88	190.62	190.70	-90.00	-1,549.63	-7,205.37	3,544.66	3,165.07	379.59	9.338		
15,000.00	7,935.91	14,919.28	7,935.88	193.25	193.35	-90.00	-1,549.19	-7,305.37	3,544.66	3,159.77	384.90	9.209		
15,100.00	7,935.91	15,019.28	7,935.88	195.89	196.00	-90.00	-1,548.76	-7,405.36	3,544.67	3,154.46	390.21	9.084		
15,200.00	7,935.91	15,119.28	7,935.88	198.53	198.65	-90.00	-1,548.32	-7,505.36	3,544.67	3,149.15	395.52	8.962		
15,300.00	7,935.90	15,219.28	7,935.88	201.17	201.30	-90.00	-1,547.89	-7,605.36	3,544.68	3,143.84	400.84	8.843		
15,400.00	7,935.90	15,319.28	7,935.88	203.81	203.96	-90.00	-1,547.45	-7,705.36	3,544.68	3,138.53	406.16	8.727		
15,500.00	7,935.90	15,419.28	7,935.87	206.45	206.61	-90.00	-1,547.02	-7,805.36	3,544.69	3,133.21	411.48	8.615		
15,600.00	7,935.90	15,519.28	7,935.87	209.10	209.27	-90.00	-1,546.58	-7,905.36	3,544.69	3,127.90	416.80	8.505		
15,700.00	7,935.90	15,619.28	7,935.87	211.74	211.92	-90.00	-1,546.15	-8,005.36	3,544.70	3,122.58	422.12	8.397		
15,800.00	7,935.90	15,719.28	7,935.87	214.39	214.58	-90.00	-1,545.71	-8,105.36	3,544.70	3,117.26	427.44	8.293		
15,900.00	7,935.90	15,819.28	7,935.87	217.04	217.24	-90.00	-1,545.28	-8,205.36	3,544.71	3,111.94	432.77	8.191		
16,000.00	7,935.89	15,919.28	7,935.86	219.69	219.90	-90.00	-1,544.84	-8,305.36	3,544.71	3,106.62	438.10	8.091		
16,100.00	7,935.89	16,019.28	7,935.86	222.34	222.56	-90.00	-1,544.41	-8,405.36	3,544.72	3,101.29	443.42	7.994		
16,200.00	7,935.89	16,119.28	7,935.86	224.99	225.22	-90.00	-1,543.97	-8,505.35	3,544.72	3,095.97	448.75	7.899		
16,300.00	7,935.89	16,219.28	7,935.86	227.64	227.88	-90.00	-1,543.54	-8,605.35	3,544.73	3,090.64	454.09	7.806		
16,400.00	7,935.89	16,319.28	7,935.86	230.29	230.54	-90.00	-1,543.10	-8,705.35	3,544.73	3,085.32	459.42	7.716		
16,500.00	7,935.89	16,419.28	7,935.86	232.94	233.20	-90.00	-1,542.67	-8,805.35	3,544.74	3,079.99	464.75	7.627		
16,600.00	7,935.89	16,519.28	7,935.85	235.60	235.87	-90.00	-1,542.23	-8,905.35	3,544.75	3,074.66	470.09	7.541		
16,700.00	7,935.88	16,619.28	7,935.85	238.25	238.53	-90.00	-1,541.80	-9,005.35	3,544.75	3,069.33	475.42	7.456		
16,800.00	7,935.88	16,719.28	7,935.85	240.91	241.20	-90.00	-1,541.36	-9,105.35	3,544.76	3,064.00	480.76	7.373		
16,900.00	7,935.88	16,819.28	7,935.85	243.56	243.86	-90.00	-1,540.93	-9,205.35	3,544.76	3,058.67	486.10	7.292		
17,000.00	7,935.88	16,919.28	7,935.85	246.22	246.53	-90.00	-1,540.49	-9,305.35	3,544.77	3,053.33	491.43	7.213		
17,100.00	7,935.88	17,019.28	7,935.85	248.88	249.20	-90.00	-1,540.06	-9,405.35	3,544.77	3,048.00	496.77	7.136		
17,200.00	7,935.88	17,119.28	7,935.84	251.54	251.86	-90.00	-1,539.62	-9,505.34	3,544.78	3,042.66	502.11	7.060		
17,300.00	7,935.88	17,219.28	7,935.84	254.20	254.53	-90.00	-1,539.19	-9,605.34	3,544.78	3,037.33	507.46	6.985		
17,400.00	7,935.87	17,319.28	7,935.84	256.86	257.20	-90.00	-1,538.75	-9,705.34	3,544.79	3,031.99	512.80	6.913		
17,500.00	7,935.87	17,419.28	7,935.84	259.52	259.87	-90.00	-1,538.32	-9,805.34	3,544.79	3,026.65	518.14	6.841		
17,600.00	7,935.87	17,519.28	7,935.84	262.18	262.54	-90.00	-1,537.88	-9,905.34	3,544.80	3,021.31	523.49	6.772		
17,700.00	7,935.87	17,619.28	7,935.83	264.84	265.21	-90.00	-1,537.45	-10,005.34	3,544.80	3,015.97	528.83	6.703		
17,800.00	7,935.87	17,719.28	7,935.83	267.50	267.88	-90.00	-1,537.02	-10,105.34	3,544.81	3,010.63	534.18	6.636		
17,900.00	7,935.87	17,819.28	7,935.83	270.17	270.55	-90.00	-1,536.58	-10,205.34	3,544.81	3,005.29	539.52	6.570		
18,000.00	7,935.87	17,919.28	7,935.83	272.83	273.22	-90.00	-1,536.15	-10,305.34	3,544.82	2,999.95	544.87	6.506		
18,100.00	7,935.86	18,019.28	7,935.83	275.49	275.89	-90.00	-1,535.71	-10,405.34	3,544.82	2,994.61	550.22	6.443		
18,200.00	7,935.86	18,129.42	7,935.92	278.16	278.84	-90.00	-1,535.15	-10,515.47	3,544.76	2,988.91	555.85	6.377		
18,238.21	7,935.86	18,153.00	7,936.00	279.18	279.47	-90.00	-1,534.98	-10,539.05	3,544.68	2,987.20	557.48	6.358		
18,239.20	7,936.00	18,153.00	7,936.00	279.20	279.47	-90.00	-1,534.98	-10,539.05	3,544.34	2,986.83	557.51	6.357 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-11 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	90.00	0.00	90.00	90.00					
100.00	100.00	100.00	100.00	0.13	0.13	90.00	0.00	90.00	90.00	89.73	0.27	334.753		
200.00	200.00	200.00	200.00	0.49	0.49	90.00	0.00	90.00	90.00	89.01	0.99	91.296 CC		
300.00	299.98	299.98	299.98	0.85	0.85	99.02	0.00	90.00	90.26	88.55	1.70	53.018 ES		
400.00	399.84	400.15	400.13	1.22	1.20	103.35	-1.72	89.68	91.05	88.64	2.41	37.828		
500.00	499.45	499.25	499.09	1.59	1.54	111.61	-6.81	88.72	93.59	90.47	3.12	30.033		
600.00	598.70	596.62	596.09	1.97	1.88	122.63	-15.08	87.16	100.56	96.71	3.85	26.118		
700.00	697.47	691.62	690.40	2.38	2.24	134.35	-26.26	85.06	114.69	110.10	4.59	24.961		
800.00	795.62	783.70	781.40	2.82	2.62	144.86	-40.03	82.46	137.52	132.20	5.33	25.822		
900.00	893.06	872.35	868.55	3.29	3.00	153.29	-56.00	79.46	169.11	163.08	6.03	28.058		
1,000.00	989.64	957.19	951.44	3.79	3.39	159.72	-73.76	76.12	208.69	202.00	6.70	31.171		
1,081.03	1,067.21	1,022.91	1,015.26	4.23	3.71	163.72	-89.16	73.22	246.03	238.81	7.22	34.090		
1,100.00	1,085.29	1,037.91	1,029.78	4.34	3.79	164.58	-92.88	72.52	255.34	248.00	7.34	34.782		
1,200.00	1,180.60	1,115.44	1,104.47	4.91	4.19	168.40	-113.28	68.68	306.37	298.44	7.93	38.646		
1,300.00	1,275.90	1,190.33	1,176.07	5.49	4.60	171.30	-134.87	64.62	360.29	351.79	8.50	42.372		
1,400.00	1,371.21	1,268.58	1,250.37	6.07	5.06	173.72	-158.97	60.08	416.40	407.29	9.12	45.681		
1,500.00	1,466.52	1,349.99	1,327.64	6.66	5.54	175.67	-184.18	55.34	473.09	463.32	9.77	48.445		
1,600.00	1,561.83	1,431.41	1,404.91	7.26	6.04	177.20	-209.38	50.59	530.08	519.65	10.42	50.860		
1,700.00	1,657.14	1,512.82	1,482.18	7.85	6.53	178.44	-234.59	45.85	587.27	576.19	11.08	52.982		
1,800.00	1,752.44	1,605.76	1,559.45	8.45	7.11	179.47	-259.80	41.10	644.63	632.82	11.80	54.623		
1,900.00	1,847.75	1,675.65	1,636.72	9.05	7.54	-179.67	-285.01	36.36	702.10	689.67	12.42	56.516		
2,000.00	1,943.06	1,757.07	1,713.99	9.66	8.05	-178.94	-310.21	31.61	759.66	746.56	13.10	57.999		
2,100.00	2,038.37	1,838.48	1,791.26	10.26	8.56	-178.31	-335.42	26.87	817.29	803.51	13.78	59.329		
2,200.00	2,133.68	1,919.90	1,868.53	10.86	9.07	-177.77	-360.63	22.13	874.98	860.52	14.46	60.527		
2,300.00	2,228.99	2,001.31	1,945.80	11.47	9.59	-177.29	-385.83	17.38	932.71	917.57	15.14	61.611		
2,400.00	2,324.29	2,082.73	2,023.06	12.08	10.10	-176.87	-411.04	12.64	990.49	974.66	15.82	62.596		
2,500.00	2,419.60	2,164.14	2,100.33	12.68	10.62	-176.49	-436.25	7.89	1,048.29	1,031.78	16.51	63.494		
2,600.00	2,514.91	2,245.56	2,177.60	13.29	11.14	-176.15	-461.45	3.15	1,106.13	1,088.93	17.20	64.316		
2,700.00	2,610.22	2,326.98	2,254.87	13.90	11.65	-175.85	-486.66	-1.59	1,163.98	1,146.09	17.89	65.070		
2,800.00	2,705.53	2,408.39	2,332.14	14.51	12.17	-175.58	-511.87	-6.34	1,221.86	1,203.28	18.58	65.765		
2,900.00	2,800.83	2,489.81	2,409.41	15.12	12.69	-175.33	-537.07	-11.08	1,279.75	1,260.48	19.27	66.407		
3,000.00	2,896.14	2,571.22	2,486.68	15.73	13.21	-175.10	-562.28	-15.83	1,337.66	1,317.70	19.96	67.001		
3,100.00	2,991.45	2,652.64	2,563.95	16.34	13.73	-174.89	-587.49	-20.57	1,395.58	1,374.92	20.66	67.553		
3,200.00	3,086.76	2,734.05	2,641.22	16.95	14.25	-174.69	-612.69	-25.32	1,453.51	1,432.16	21.35	68.066		
3,300.00	3,182.07	2,815.47	2,718.49	17.56	14.78	-174.52	-637.90	-30.06	1,511.46	1,489.41	22.05	68.545		
3,400.00	3,277.38	2,903.12	2,795.76	18.17	15.34	-174.35	-663.11	-34.80	1,569.41	1,546.63	22.77	68.911		
3,500.00	3,372.68	2,978.30	2,873.03	18.78	15.82	-174.20	-688.31	-39.55	1,627.37	1,603.92	23.45	69.412		
3,600.00	3,467.99	3,059.71	2,950.30	19.39	16.34	-174.05	-713.52	-44.29	1,685.34	1,661.19	24.14	69.804		
3,700.00	3,563.30	3,141.13	3,027.57	20.00	16.87	-173.92	-738.73	-49.04	1,743.31	1,718.47	24.84	70.174		
3,800.00	3,658.61	3,222.54	3,104.84	20.61	17.39	-173.80	-763.93	-53.78	1,801.29	1,775.75	25.54	70.521		
3,900.00	3,753.92	3,303.96	3,182.11	21.22	17.91	-173.68	-789.14	-58.52	1,859.27	1,833.03	26.24	70.848		
4,000.00	3,849.22	3,385.37	3,259.38	21.83	18.44	-173.57	-814.35	-63.27	1,917.26	1,890.32	26.94	71.157		
4,100.00	3,944.53	3,466.79	3,336.65	22.45	18.96	-173.47	-839.55	-68.01	1,975.26	1,947.61	27.65	71.449		
4,200.00	4,039.84	3,548.21	3,413.92	23.06	19.48	-173.37	-864.76	-72.76	2,033.26	2,004.91	28.35	71.725		
4,300.00	4,135.15	3,629.62	3,491.18	23.67	20.01	-173.28	-889.97	-77.50	2,091.26	2,062.21	29.05	71.986		
4,400.00	4,230.46	3,711.04	3,568.45	24.28	20.53	-173.19	-915.17	-82.25	2,149.26	2,119.51	29.75	72.234		
4,500.00	4,325.77	3,792.45	3,645.72	24.89	21.06	-173.11	-940.38	-86.99	2,207.27	2,176.81	30.46	72.470		
4,600.00	4,421.07	3,873.87	3,722.99	25.51	21.58	-173.03	-965.59	-91.73	2,265.28	2,234.12	31.16	72.694		
4,700.00	4,516.38	3,955.28	3,800.26	26.12	22.11	-172.95	-990.79	-96.48	2,323.30	2,291.43	31.87	72.906		
4,800.00	4,611.69	4,036.70	3,877.53	26.73	22.63	-172.88	-1,016.00	-101.22	2,381.31	2,348.74	32.57	73.109		
4,900.00	4,707.00	4,118.11	3,954.80	27.34	23.16	-172.81	-1,041.21	-105.97	2,439.33	2,406.06	33.28	73.302		
5,000.00	4,802.31	4,200.47	4,032.07	27.95	23.69	-172.75	-1,066.41	-110.71	2,497.35	2,463.37	33.99	73.477		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,100.00	4,897.61	4,280.94	4,109.34	28.57	24.21	-172.69	-1,091.62	-115.45	2,555.38	2,520.69	34.69	73.661		
5,200.00	4,992.92	4,362.36	4,186.61	29.18	24.73	-172.63	-1,116.83	-120.20	2,613.40	2,578.00	35.40	73.829		
5,300.00	5,088.23	4,443.77	4,263.88	29.79	25.26	-172.57	-1,142.04	-124.94	2,671.43	2,635.32	36.11	73.989		
5,400.00	5,183.54	4,525.19	4,341.15	30.40	25.78	-172.52	-1,167.24	-129.69	2,729.46	2,692.64	36.81	74.142		
5,500.00	5,278.85	4,606.60	4,418.42	31.01	26.31	-172.47	-1,192.45	-134.43	2,787.49	2,749.96	37.52	74.289		
5,600.00	5,374.15	4,688.02	4,495.69	31.63	26.83	-172.42	-1,217.66	-139.18	2,845.52	2,807.29	38.23	74.429		
5,700.00	5,469.46	4,769.44	4,572.96	32.24	27.36	-172.37	-1,242.86	-143.92	2,903.55	2,864.61	38.94	74.563		
5,800.00	5,564.77	4,850.85	4,650.23	32.85	27.88	-172.33	-1,268.07	-148.66	2,961.58	2,921.93	39.65	74.691		
5,900.00	5,660.08	4,932.27	4,727.50	33.46	28.41	-172.28	-1,293.28	-153.41	3,019.62	2,979.26	40.36	74.815		
6,000.00	5,755.39	5,013.68	4,804.77	34.08	28.93	-172.24	-1,318.48	-158.15	3,077.66	3,036.58	41.07	74.933		
6,100.00	5,850.70	5,104.90	4,882.04	34.69	29.52	-172.20	-1,343.69	-162.90	3,135.69	3,093.87	41.83	74.970		
6,200.00	5,946.00	5,176.51	4,959.30	35.30	29.99	-172.16	-1,368.90	-167.64	3,193.73	3,151.24	42.50	75.155		
6,300.00	6,041.31	5,257.93	5,036.57	35.91	30.51	-172.12	-1,394.10	-172.38	3,251.77	3,208.56	43.21	75.259		
6,400.00	6,136.62	5,339.34	5,113.84	36.53	31.04	-172.09	-1,419.31	-177.13	3,309.81	3,265.89	43.92	75.360		
6,500.00	6,231.93	5,420.76	5,191.11	37.14	31.56	-172.05	-1,444.52	-181.87	3,367.85	3,323.22	44.63	75.456		
6,600.00	6,327.24	5,502.17	5,268.38	37.75	32.09	-172.02	-1,469.72	-186.62	3,425.89	3,380.55	45.35	75.548		
6,700.00	6,422.54	5,583.59	5,345.65	38.37	32.61	-171.98	-1,494.93	-191.36	3,483.94	3,437.87	46.06	75.637		
6,745.38	6,465.79	5,620.53	5,380.71	38.64	32.85	-171.97	-1,506.37	-193.51	3,510.27	3,463.89	46.39	75.677		
6,800.00	6,518.01	5,665.30	5,423.20	38.97	33.14	-172.06	-1,520.23	-196.12	3,541.56	3,494.78	46.78	75.714		
6,900.00	6,614.35	5,748.74	5,502.40	39.54	33.68	-172.20	-1,546.06	-200.98	3,596.62	3,549.12	47.49	75.730		
7,000.00	6,711.57	5,834.03	5,583.34	40.06	34.23	-172.31	-1,572.47	-205.95	3,648.76	3,600.54	48.21	75.680		
7,100.00	6,809.55	5,921.05	5,665.93	40.53	34.79	-172.41	-1,599.41	-211.03	3,697.92	3,648.98	48.93	75.568		
7,200.00	6,908.17	6,009.70	5,750.07	40.96	35.37	-172.48	-1,626.86	-216.19	3,744.04	3,694.38	49.66	75.397		
7,300.00	7,007.30	6,100.13	5,835.65	41.35	35.95	-172.54	-1,654.78	-221.45	3,787.07	3,736.69	50.38	75.170		
7,400.00	7,106.83	6,208.54	5,922.57	41.69	36.65	-172.58	-1,683.13	-226.78	3,826.96	3,775.78	51.17	74.788		
7,500.00	7,206.63	6,284.34	6,010.72	41.98	37.14	-172.60	-1,711.89	-232.19	3,863.65	3,811.84	51.81	74.571		
7,600.00	7,306.59	6,378.42	6,100.01	42.23	37.75	-172.61	-1,741.01	-237.68	3,897.11	3,844.59	52.52	74.201		
7,626.41	7,333.00	6,403.44	6,123.76	42.29	37.91	179.47	-1,748.76	-239.13	3,905.40	3,852.69	52.71	74.098		
7,656.41	7,363.00	6,431.92	6,150.78	42.35	38.10	179.50	-1,757.58	-240.79	3,914.69	3,861.77	52.92	73.977		
7,700.00	7,406.55	6,473.34	6,190.10	42.45	38.36	-89.32	-1,770.40	-243.21	3,928.20	3,874.97	53.23	73.800		
7,750.00	7,456.18	7,766.66	7,455.97	42.56	44.02	-89.99	-1,976.77	-299.42	3,941.40	3,880.92	60.48	65.173		
7,800.00	7,505.10	7,816.23	7,503.46	42.68	44.15	-89.93	-1,976.71	-313.59	3,941.40	3,880.58	60.82	64.800		
7,850.00	7,552.93	7,865.46	7,549.22	42.81	44.28	-89.87	-1,976.63	-331.67	3,941.41	3,880.22	61.19	64.409		
7,900.00	7,599.32	7,914.35	7,592.98	42.94	44.42	-89.81	-1,976.53	-353.45	3,941.42	3,879.83	61.59	63.997		
7,950.00	7,643.91	7,962.92	7,634.45	43.08	44.56	-89.75	-1,976.42	-378.70	3,941.44	3,879.43	62.01	63.563		
8,000.00	7,686.37	8,011.18	7,673.40	43.22	44.71	-89.70	-1,976.30	-407.18	3,941.45	3,878.99	62.46	63.101		
8,050.00	7,726.36	8,059.16	7,709.60	43.37	44.86	-89.64	-1,976.16	-438.64	3,941.47	3,878.52	62.96	62.607		
8,100.00	7,763.59	8,106.86	7,742.87	43.53	45.01	-89.60	-1,976.01	-472.82	3,941.49	3,878.00	63.50	62.075		
8,150.00	7,797.77	8,154.32	7,773.03	43.69	45.17	-89.55	-1,975.84	-509.44	3,941.52	3,877.43	64.09	61.499		
8,200.00	7,828.65	8,201.55	7,799.93	43.86	45.34	-89.51	-1,975.67	-548.24	3,941.54	3,876.79	64.75	60.875		
8,250.00	7,855.98	8,248.58	7,823.46	44.05	45.52	-89.47	-1,975.49	-588.94	3,941.56	3,876.09	65.48	60.198		
8,300.00	7,879.55	8,295.41	7,843.49	44.25	45.70	-89.43	-1,975.30	-631.26	3,941.59	3,875.30	66.28	59.467		
8,350.00	7,899.20	8,342.08	7,859.95	44.47	45.90	-89.40	-1,975.11	-674.92	3,941.61	3,874.44	67.16	58.686		
8,400.00	7,914.77	8,388.61	7,872.77	44.71	46.12	-89.37	-1,974.91	-719.64	3,941.62	3,873.50	68.12	57.859		
8,450.00	7,926.14	8,435.02	7,881.90	44.98	46.35	-89.35	-1,974.71	-765.13	3,941.64	3,872.48	69.16	56.995		
8,500.00	7,933.22	8,481.33	7,887.31	45.26	46.59	-89.33	-1,974.51	-811.11	3,941.65	3,871.39	70.26	56.102		
8,550.00	7,935.96	8,527.75	7,889.00	45.58	46.86	-89.32	-1,974.30	-857.48	3,941.66	3,870.25	71.42	55.193		
8,556.48	7,936.00	8,534.23	7,889.00	45.62	46.90	-89.32	-1,974.27	-863.96	3,941.66	3,870.08	71.58	55.067		
8,600.00	7,936.00	8,577.75	7,889.00	45.92	47.18	-89.32	-1,974.08	-907.48	3,941.66	3,868.97	72.69	54.223		
8,700.00	7,936.00	8,677.74	7,889.00	46.70	47.89	-89.32	-1,973.64	-1,007.47	3,941.66	3,866.20	75.46	52.233		
8,800.00	7,936.00	8,777.74	7,889.00	47.61	48.72	-89.32	-1,973.19	-1,107.47	3,941.66	3,863.16	78.50	50.212		
8,900.00	7,936.00	8,877.73	7,889.00	48.66	49.69	-89.32	-1,972.75	-1,207.46	3,941.65	3,859.87	81.78	48.199		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
9,000.00	7,935.99	8,977.73	7,888.99	49.84	50.79	-89.32	-1,972.31	-1,307.45	3,941.65	3,856.38	85.27	46.224		
9,100.00	7,935.99	9,077.72	7,888.99	51.16	52.02	-89.32	-1,971.86	-1,407.45	3,941.65	3,852.69	88.95	44.311		
9,200.00	7,935.99	9,177.72	7,888.99	52.60	53.39	-89.32	-1,971.42	-1,507.44	3,941.65	3,848.84	92.80	42.473		
9,300.00	7,935.99	9,277.71	7,888.99	54.16	54.88	-89.32	-1,970.98	-1,607.44	3,941.64	3,844.85	96.80	40.721		
9,400.00	7,935.99	9,377.71	7,888.99	55.82	56.49	-89.32	-1,970.54	-1,707.43	3,941.64	3,840.72	100.92	39.057		
9,500.00	7,935.99	9,477.70	7,888.99	57.58	58.20	-89.32	-1,970.10	-1,807.42	3,941.64	3,836.48	105.16	37.483		
9,600.00	7,935.99	9,577.69	7,888.99	59.43	60.01	-89.32	-1,969.65	-1,907.42	3,941.64	3,832.14	109.50	35.998		
9,700.00	7,935.98	9,677.69	7,888.99	61.36	61.91	-89.32	-1,969.21	-2,007.41	3,941.64	3,827.71	113.92	34.599		
9,800.00	7,935.98	9,777.68	7,888.99	63.35	63.87	-89.32	-1,968.77	-2,107.40	3,941.64	3,823.20	118.43	33.282		
9,900.00	7,935.98	9,877.68	7,888.99	65.40	65.90	-89.32	-1,968.33	-2,207.40	3,941.63	3,818.63	123.01	32.044		
10,000.00	7,935.98	9,977.67	7,888.99	67.50	68.00	-89.32	-1,967.89	-2,307.39	3,941.63	3,813.99	127.65	30.879		
10,100.00	7,935.98	10,077.67	7,888.98	69.66	70.14	-89.32	-1,967.45	-2,407.38	3,941.63	3,809.29	132.34	29.783		
10,200.00	7,935.98	10,177.66	7,888.98	71.85	72.32	-89.32	-1,967.01	-2,507.38	3,941.63	3,804.54	137.09	28.752		
10,300.00	7,935.98	10,277.66	7,888.98	74.08	74.55	-89.32	-1,966.57	-2,607.37	3,941.63	3,799.75	141.88	27.781		
10,400.00	7,935.97	10,377.65	7,888.98	76.35	76.82	-89.32	-1,966.12	-2,707.36	3,941.63	3,794.91	146.72	26.866		
10,500.00	7,935.97	10,477.65	7,888.98	78.64	79.11	-89.32	-1,965.68	-2,807.36	3,941.63	3,790.04	151.59	26.003		
10,600.00	7,935.97	10,577.64	7,888.98	80.97	81.44	-89.32	-1,965.24	-2,907.35	3,941.63	3,785.14	156.49	25.188		
10,700.00	7,935.97	10,677.63	7,888.98	83.32	83.79	-89.32	-1,964.80	-3,007.34	3,941.63	3,780.21	161.42	24.418		
10,730.20	7,935.97	10,707.84	7,888.98	84.03	84.50	-89.32	-1,964.67	-3,037.55	3,941.63	3,778.71	162.92	24.194		
10,800.00	7,935.97	10,777.63	7,888.98	85.69	86.16	-89.32	-1,964.36	-3,107.34	3,941.63	3,775.24	166.39	23.690		
10,900.00	7,935.97	10,877.62	7,888.98	88.08	88.55	-89.32	-1,963.92	-3,207.33	3,941.63	3,770.26	171.37	23.000		
11,000.00	7,935.97	10,977.62	7,888.98	90.49	90.97	-89.32	-1,963.48	-3,307.32	3,941.63	3,765.25	176.38	22.347		
11,100.00	7,935.96	11,077.61	7,888.98	92.91	93.40	-89.32	-1,963.04	-3,407.32	3,941.63	3,760.21	181.41	21.727		
11,200.00	7,935.96	11,177.61	7,888.98	95.35	95.84	-89.32	-1,962.60	-3,507.31	3,941.63	3,755.16	186.47	21.139		
11,300.00	7,935.96	11,277.60	7,888.98	97.81	98.30	-89.32	-1,962.16	-3,607.31	3,941.63	3,750.09	191.54	20.579		
11,400.00	7,935.96	11,377.60	7,888.98	100.28	100.78	-89.32	-1,961.72	-3,707.30	3,941.63	3,745.01	196.62	20.047		
11,500.00	7,935.96	11,477.59	7,888.98	102.76	103.26	-89.32	-1,961.29	-3,807.29	3,941.63	3,739.91	201.72	19.540		
11,600.00	7,935.96	11,577.58	7,888.97	105.25	105.76	-89.32	-1,960.85	-3,907.29	3,941.63	3,734.79	206.84	19.057		
11,700.00	7,935.96	11,677.58	7,888.97	107.75	108.27	-89.32	-1,960.41	-4,007.28	3,941.63	3,729.67	211.97	18.595		
11,800.00	7,935.95	11,777.57	7,888.97	110.26	110.78	-89.32	-1,959.97	-4,107.27	3,941.64	3,724.53	217.11	18.155		
11,900.00	7,935.95	11,877.57	7,888.97	112.78	113.31	-89.32	-1,959.53	-4,207.27	3,941.64	3,719.38	222.26	17.734		
12,000.00	7,935.95	11,977.56	7,888.97	115.31	115.84	-89.32	-1,959.09	-4,307.26	3,941.64	3,714.21	227.43	17.332		
12,100.00	7,935.95	12,077.56	7,888.97	117.84	118.39	-89.32	-1,958.65	-4,407.25	3,941.64	3,709.04	232.60	16.946		
12,200.00	7,935.95	12,177.55	7,888.97	120.39	120.94	-89.32	-1,958.22	-4,507.25	3,941.64	3,703.86	237.78	16.577		
12,300.00	7,935.95	12,277.55	7,888.97	122.94	123.49	-89.32	-1,957.78	-4,607.24	3,941.65	3,698.67	242.97	16.223		
12,400.00	7,935.95	12,377.54	7,888.97	125.49	126.05	-89.32	-1,957.34	-4,707.23	3,941.65	3,693.48	248.17	15.883		
12,500.00	7,935.94	12,477.53	7,888.97	128.05	128.62	-89.32	-1,956.90	-4,807.23	3,941.65	3,688.27	253.38	15.556		
12,600.00	7,935.94	12,577.53	7,888.97	130.62	131.19	-89.32	-1,956.46	-4,907.22	3,941.65	3,683.06	258.59	15.243		
12,700.00	7,935.94	12,677.52	7,888.97	133.19	133.77	-89.32	-1,956.03	-5,007.21	3,941.65	3,677.84	263.81	14.941		
12,800.00	7,935.94	12,777.52	7,888.97	135.77	136.35	-89.32	-1,955.59	-5,107.21	3,941.66	3,672.62	269.04	14.651		
12,900.00	7,935.94	12,877.51	7,888.97	138.35	138.94	-89.32	-1,955.15	-5,207.20	3,941.66	3,667.39	274.27	14.371		
13,000.00	7,935.94	12,977.51	7,888.97	140.93	141.53	-89.32	-1,954.71	-5,307.20	3,941.66	3,662.15	279.51	14.102		
13,100.00	7,935.94	13,077.50	7,888.97	143.52	144.12	-89.32	-1,954.28	-5,407.19	3,941.67	3,656.91	284.76	13.842		
13,200.00	7,935.93	13,177.50	7,888.97	146.11	146.72	-89.32	-1,953.84	-5,507.18	3,941.67	3,651.66	290.01	13.592		
13,300.00	7,935.93	13,277.49	7,888.97	148.71	149.33	-89.32	-1,953.40	-5,607.18	3,941.67	3,646.41	295.26	13.350		
13,400.00	7,935.93	13,377.49	7,888.97	151.31	151.93	-89.32	-1,952.97	-5,707.17	3,941.68	3,641.16	300.52	13.116		
13,500.00	7,935.93	13,477.48	7,888.97	153.91	154.54	-89.32	-1,952.53	-5,807.16	3,941.68	3,635.90	305.78	12.890		
13,600.00	7,935.93	13,577.47	7,888.97	156.52	157.15	-89.32	-1,952.10	-5,907.16	3,941.68	3,630.64	311.05	12.672		
13,700.00	7,935.93	13,677.47	7,888.97	159.13	159.77	-89.32	-1,951.66	-6,007.15	3,941.69	3,625.37	316.32	12.461		
13,800.00	7,935.93	13,777.46	7,888.97	161.74	162.38	-89.32	-1,951.22	-6,107.14	3,941.69	3,620.10	321.59	12.257		
13,900.00	7,935.92	13,877.46	7,888.97	164.35	165.00	-89.32	-1,950.79	-6,207.14	3,941.70	3,614.82	326.87	12.059		
14,000.00	7,935.92	13,977.45	7,888.97	166.97	167.63	-89.32	-1,950.35	-6,307.13	3,941.70	3,609.55	332.15	11.867		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-11 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,100.00	7,935.92	14,077.45	7,888.97	169.59	170.25	-89.32	-1,949.92	-6,407.12	3,941.71	3,604.27	337.44	11.681		
14,200.00	7,935.92	14,177.44	7,888.97	172.21	172.88	-89.32	-1,949.48	-6,507.12	3,941.71	3,598.98	342.73	11.501		
14,300.00	7,935.92	14,277.44	7,888.97	174.84	175.51	-89.32	-1,949.05	-6,607.11	3,941.72	3,593.70	348.02	11.326		
14,400.00	7,935.92	14,377.43	7,888.97	177.46	178.14	-89.32	-1,948.61	-6,707.10	3,941.72	3,588.41	353.31	11.157		
14,500.00	7,935.92	14,477.42	7,888.97	180.09	180.77	-89.32	-1,948.18	-6,807.10	3,941.73	3,583.12	358.61	10.992		
14,600.00	7,935.91	14,577.42	7,888.97	182.72	183.40	-89.32	-1,947.74	-6,907.09	3,941.73	3,577.83	363.91	10.832		
14,700.00	7,935.91	14,677.41	7,888.97	185.35	186.04	-89.32	-1,947.31	-7,007.09	3,941.74	3,572.53	369.21	10.676		
14,800.00	7,935.91	14,777.41	7,888.97	187.98	188.68	-89.32	-1,946.87	-7,107.08	3,941.74	3,567.23	374.51	10.525		
14,900.00	7,935.91	14,877.40	7,888.97	190.62	191.32	-89.32	-1,946.44	-7,207.07	3,941.75	3,561.93	379.82	10.378		
15,000.00	7,935.91	14,977.40	7,888.97	193.25	193.96	-89.32	-1,946.00	-7,307.07	3,941.75	3,556.63	385.12	10.235		
15,100.00	7,935.91	15,077.39	7,888.97	195.89	196.60	-89.32	-1,945.57	-7,407.06	3,941.76	3,551.33	390.43	10.096		
15,200.00	7,935.91	15,177.39	7,888.97	198.53	199.24	-89.32	-1,945.13	-7,507.05	3,941.77	3,546.02	395.74	9.960		
15,300.00	7,935.90	15,277.38	7,888.98	201.17	201.89	-89.32	-1,944.70	-7,607.05	3,941.77	3,540.71	401.06	9.828		
15,400.00	7,935.90	15,377.37	7,888.98	203.81	204.54	-89.32	-1,944.27	-7,707.04	3,941.78	3,535.41	406.37	9.700		
15,500.00	7,935.90	15,477.37	7,888.98	206.45	207.18	-89.32	-1,943.83	-7,807.03	3,941.79	3,530.09	411.69	9.575		
15,600.00	7,935.90	15,577.36	7,888.98	209.10	209.83	-89.32	-1,943.40	-7,907.03	3,941.79	3,524.78	417.01	9.453		
15,700.00	7,935.90	15,677.36	7,888.98	211.74	212.48	-89.32	-1,942.97	-8,007.02	3,941.80	3,519.47	422.33	9.333		
15,800.00	7,935.90	15,777.35	7,888.98	214.39	215.13	-89.32	-1,942.53	-8,107.01	3,941.81	3,514.15	427.65	9.217		
15,900.00	7,935.90	15,877.35	7,888.98	217.04	217.79	-89.32	-1,942.10	-8,207.01	3,941.81	3,508.84	432.98	9.104		
16,000.00	7,935.89	15,977.34	7,888.98	219.69	220.44	-89.32	-1,941.67	-8,307.00	3,941.82	3,503.52	438.30	8.993		
16,100.00	7,935.89	16,077.34	7,888.98	222.34	223.09	-89.32	-1,941.23	-8,406.99	3,941.83	3,498.20	443.63	8.885		
16,200.00	7,935.89	16,177.33	7,888.98	224.99	225.75	-89.32	-1,940.80	-8,506.99	3,941.84	3,492.88	448.95	8.780		
16,300.00	7,935.89	16,277.33	7,888.98	227.64	228.41	-89.32	-1,940.37	-8,606.98	3,941.84	3,487.56	454.28	8.677		
16,400.00	7,935.89	16,377.32	7,888.98	230.29	231.06	-89.32	-1,939.94	-8,706.98	3,941.85	3,482.24	459.61	8.576		
16,500.00	7,935.89	16,477.31	7,888.98	232.94	233.72	-89.32	-1,939.51	-8,806.97	3,941.86	3,476.91	464.94	8.478		
16,600.00	7,935.89	16,577.31	7,888.98	235.60	236.38	-89.32	-1,939.07	-8,906.96	3,941.87	3,471.59	470.28	8.382		
16,700.00	7,935.88	16,677.30	7,888.98	238.25	239.04	-89.32	-1,938.64	-9,006.96	3,941.87	3,466.26	475.61	8.288		
16,800.00	7,935.88	16,777.30	7,888.99	240.91	241.70	-89.32	-1,938.21	-9,106.95	3,941.88	3,460.94	480.95	8.196		
16,900.00	7,935.88	16,877.29	7,888.99	243.56	244.36	-89.32	-1,937.78	-9,206.94	3,941.89	3,455.61	486.28	8.106		
17,000.00	7,935.88	16,977.29	7,888.99	246.22	247.02	-89.32	-1,937.35	-9,306.94	3,941.90	3,450.28	491.62	8.018		
17,100.00	7,935.88	17,077.28	7,888.99	248.88	249.68	-89.32	-1,936.91	-9,406.93	3,941.91	3,444.95	496.96	7.932		
17,200.00	7,935.88	17,177.28	7,888.99	251.54	252.35	-89.32	-1,936.48	-9,506.92	3,941.92	3,439.62	502.29	7.848		
17,300.00	7,935.88	17,277.27	7,888.99	254.20	255.01	-89.32	-1,936.05	-9,606.92	3,941.93	3,434.29	507.63	7.765		
17,400.00	7,935.87	17,377.26	7,888.99	256.86	257.67	-89.32	-1,935.62	-9,706.91	3,941.94	3,428.96	512.97	7.684		
17,500.00	7,935.87	17,477.26	7,888.99	259.52	260.34	-89.32	-1,935.19	-9,806.90	3,941.95	3,423.63	518.32	7.605		
17,600.00	7,935.87	17,577.25	7,888.99	262.18	263.00	-89.32	-1,934.76	-9,906.90	3,941.96	3,418.30	523.66	7.528		
17,700.00	7,935.87	17,677.25	7,888.99	264.84	265.67	-89.32	-1,934.33	-10,006.89	3,941.96	3,412.96	529.00	7.452		
17,800.00	7,935.87	17,777.24	7,889.00	267.50	268.34	-89.32	-1,933.90	-10,106.89	3,941.97	3,407.63	534.34	7.377		
17,900.00	7,935.87	17,877.24	7,889.00	270.17	271.00	-89.32	-1,933.47	-10,206.88	3,941.98	3,402.30	539.69	7.304		
18,000.00	7,935.87	17,977.23	7,889.00	272.83	273.67	-89.32	-1,933.04	-10,306.87	3,941.99	3,396.96	545.03	7.233		
18,100.00	7,935.86	18,077.23	7,889.00	275.49	276.34	-89.32	-1,932.61	-10,406.87	3,942.00	3,391.62	550.38	7.162		
18,200.00	7,935.86	18,177.22	7,889.00	278.16	279.01	-89.32	-1,932.18	-10,506.86	3,942.02	3,386.29	555.73	7.093		
18,238.39	7,935.86	18,212.39	7,889.00	279.18	279.95	-89.32	-1,932.03	-10,542.03	3,942.02	3,384.33	557.69	7.068		
18,239.20	7,936.00	18,212.39	7,889.00	279.20	279.95	-89.32	-1,932.03	-10,542.03	3,941.68	3,383.97	557.71	7.068 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	90.00	0.00	106.87	106.87					
100.00	100.00	100.00	100.00	0.13	0.13	90.00	0.00	106.87	106.87	106.61	0.27	397.519		
200.00	200.00	200.57	200.55	0.49	0.49	90.94	-1.74	106.59	106.60	105.63	0.98	109.133		
286.20	286.19	286.98	286.85	0.80	0.80	101.87	-6.02	105.88	106.31	104.72	1.60	66.650 CC		
300.00	299.98	300.76	300.59	0.85	0.85	102.60	-6.94	105.73	106.33	104.63	1.69	62.766 ES		
400.00	399.84	399.87	399.32	1.22	1.22	109.86	-15.47	104.32	107.64	105.21	2.43	44.271		
500.00	499.45	497.22	495.95	1.59	1.61	119.83	-27.13	102.40	112.99	109.79	3.19	35.381		
600.00	598.70	592.20	589.78	1.97	2.01	130.90	-41.62	100.01	125.13	121.16	3.97	31.522		
700.00	697.47	684.23	680.19	2.38	2.44	141.33	-58.57	97.21	145.91	141.18	4.73	30.836		
800.00	795.62	772.83	766.67	2.82	2.87	150.04	-77.60	94.07	175.71	170.26	5.46	32.192		
900.00	893.06	857.60	848.80	3.29	3.31	156.86	-98.26	90.66	213.93	207.78	6.14	34.816		
1,000.00	989.64	938.20	926.29	3.79	3.76	162.06	-120.13	87.05	259.63	252.84	6.79	38.219		
1,081.03	1,067.21	1,000.29	985.55	4.23	4.12	165.34	-138.43	84.03	301.55	294.26	7.29	41.354		
1,100.00	1,085.29	1,014.44	998.99	4.34	4.21	166.06	-142.78	83.31	311.89	304.48	7.41	42.084		
1,200.00	1,180.60	1,087.38	1,067.95	4.91	4.66	169.32	-166.23	79.44	368.14	360.16	7.98	46.126		
1,300.00	1,275.90	1,157.66	1,133.80	5.49	5.13	171.84	-190.46	75.44	427.00	418.47	8.54	50.024		
1,400.00	1,371.21	1,228.85	1,199.91	6.07	5.61	173.93	-216.51	71.14	488.08	478.97	9.10	53.610		
1,500.00	1,466.52	1,306.32	1,271.70	6.66	6.15	175.75	-245.23	66.40	549.94	540.20	9.74	56.468		
1,600.00	1,561.83	1,383.78	1,343.49	7.26	6.70	177.21	-273.94	61.66	612.08	601.70	10.38	58.965		
1,700.00	1,657.14	1,461.25	1,415.28	7.85	7.25	178.41	-302.66	56.92	674.43	663.40	11.03	61.158		
1,800.00	1,752.44	1,538.72	1,487.07	8.45	7.80	179.40	-331.38	52.19	736.92	725.24	11.68	63.094		
1,900.00	1,847.75	1,616.19	1,558.87	9.05	8.35	-179.76	-360.09	47.45	799.54	787.20	12.34	64.813		
2,000.00	1,943.06	1,706.35	1,630.66	9.66	9.00	-179.03	-388.81	42.71	862.24	849.19	13.05	66.050		
2,100.00	2,038.37	1,771.12	1,702.45	10.26	9.47	-178.41	-417.52	37.97	925.02	911.36	13.66	67.721		
2,200.00	2,133.68	1,848.59	1,774.24	10.86	10.03	-177.87	-446.24	33.23	987.85	973.53	14.33	68.960		
2,300.00	2,228.99	1,926.06	1,846.03	11.47	10.59	-177.38	-474.96	28.49	1,050.74	1,035.74	14.99	70.080		
2,400.00	2,324.29	2,003.52	1,917.83	12.08	11.15	-176.96	-503.67	23.75	1,113.66	1,098.00	15.66	71.097		
2,500.00	2,419.60	2,080.99	1,989.62	12.68	11.71	-176.58	-532.39	19.01	1,176.62	1,160.28	16.34	72.024		
2,600.00	2,514.91	2,158.46	2,061.41	13.29	12.27	-176.23	-561.11	14.27	1,239.60	1,222.59	17.01	72.872		
2,700.00	2,610.22	2,235.92	2,133.20	13.90	12.84	-175.92	-589.82	9.53	1,302.61	1,284.93	17.69	73.651		
2,800.00	2,705.53	2,313.39	2,205.00	14.51	13.40	-175.64	-618.54	4.79	1,365.64	1,347.28	18.36	74.367		
2,900.00	2,800.83	2,409.14	2,276.79	15.12	14.10	-175.39	-647.25	0.05	1,428.69	1,409.57	19.13	74.699		
3,000.00	2,896.14	2,468.33	2,348.58	15.73	14.53	-175.15	-675.97	-4.68	1,491.76	1,472.04	19.72	75.640		
3,100.00	2,991.45	2,545.79	2,420.37	16.34	15.10	-174.94	-704.69	-9.42	1,554.84	1,534.43	20.40	76.208		
3,200.00	3,086.76	2,623.26	2,492.16	16.95	15.66	-174.74	-733.40	-14.16	1,617.93	1,596.84	21.08	76.736		
3,300.00	3,182.07	2,700.73	2,563.96	17.56	16.23	-174.55	-762.12	-18.90	1,681.03	1,659.26	21.77	77.228		
3,400.00	3,277.38	2,778.20	2,635.75	18.17	16.79	-174.38	-790.83	-23.64	1,744.14	1,721.69	22.45	77.687		
3,500.00	3,372.68	2,855.66	2,707.54	18.78	17.36	-174.22	-819.55	-28.38	1,807.26	1,784.13	23.14	78.117		
3,600.00	3,467.99	2,933.13	2,779.33	19.39	17.93	-174.07	-848.27	-33.12	1,870.39	1,846.57	23.82	78.520		
3,700.00	3,563.30	3,010.60	2,851.12	20.00	18.49	-173.94	-876.98	-37.86	1,933.52	1,909.02	24.51	78.897		
3,800.00	3,658.61	3,088.06	2,922.92	20.61	19.06	-173.81	-905.70	-42.60	1,996.67	1,971.47	25.19	79.253		
3,900.00	3,753.92	3,165.53	2,994.71	21.22	19.63	-173.68	-934.41	-47.34	2,059.81	2,033.93	25.88	79.587		
4,000.00	3,849.22	3,243.00	3,066.50	21.83	20.20	-173.57	-963.13	-52.08	2,122.97	2,096.40	26.57	79.902		
4,100.00	3,944.53	3,320.47	3,138.29	22.45	20.76	-173.46	-991.85	-56.82	2,186.12	2,158.87	27.26	80.200		
4,200.00	4,039.84	3,402.07	3,210.08	23.06	21.36	-173.36	-1,020.56	-61.55	2,249.29	2,221.32	27.97	80.427		
4,300.00	4,135.15	3,475.40	3,281.88	23.67	21.90	-173.26	-1,049.28	-66.29	2,312.45	2,283.81	28.64	80.747		
4,400.00	4,230.46	3,552.87	3,353.67	24.28	22.47	-173.17	-1,078.00	-71.03	2,375.62	2,346.29	29.33	80.999		
4,500.00	4,325.77	3,630.34	3,425.46	24.89	23.03	-173.08	-1,106.71	-75.77	2,438.80	2,408.77	30.02	81.238		
4,600.00	4,421.07	3,707.80	3,497.25	25.51	23.60	-173.00	-1,135.43	-80.51	2,501.97	2,471.26	30.71	81.464		
4,700.00	4,516.38	3,785.27	3,569.04	26.12	24.17	-172.92	-1,164.14	-85.25	2,565.15	2,533.75	31.41	81.680		
4,800.00	4,611.69	3,862.74	3,640.84	26.73	24.74	-172.85	-1,192.86	-89.99	2,628.33	2,596.23	32.10	81.884		
4,900.00	4,707.00	3,940.20	3,712.63	27.34	25.31	-172.78	-1,221.58	-94.73	2,691.52	2,658.73	32.79	82.079		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.00	4,802.31	4,017.67	3,784.42	27.95	25.87	-172.71	-1,250.29	-99.47	2,754.70	2,721.22	33.49	82.264		
5,100.00	4,897.61	4,104.86	3,856.21	28.57	26.51	-172.65	-1,279.01	-104.21	2,817.89	2,783.67	34.23	82.333		
5,200.00	4,992.92	4,172.61	3,928.00	29.18	27.01	-172.58	-1,307.72	-108.95	2,881.08	2,846.21	34.88	82.608		
5,300.00	5,088.23	4,250.07	3,999.80	29.79	27.58	-172.52	-1,336.44	-113.69	2,944.28	2,908.71	35.57	82.769		
5,400.00	5,183.54	4,327.54	4,071.59	30.40	28.15	-172.47	-1,365.16	-118.42	3,007.47	2,971.20	36.27	82.922		
5,500.00	5,278.85	4,405.01	4,143.38	31.01	28.72	-172.41	-1,393.87	-123.16	3,070.67	3,033.70	36.97	83.068		
5,600.00	5,374.15	4,482.48	4,215.17	31.63	29.28	-172.36	-1,422.59	-127.90	3,133.87	3,096.20	37.66	83.207		
5,700.00	5,469.46	4,559.94	4,286.97	32.24	29.85	-172.31	-1,451.31	-132.64	3,197.07	3,158.71	38.36	83.340		
5,800.00	5,564.77	4,637.41	4,358.76	32.85	30.42	-172.26	-1,480.02	-137.38	3,260.27	3,221.21	39.06	83.468		
5,900.00	5,660.08	4,714.88	4,430.55	33.46	30.99	-172.22	-1,508.74	-142.12	3,323.47	3,283.71	39.76	83.589		
6,000.00	5,755.39	4,807.66	4,502.34	34.08	31.67	-172.17	-1,537.45	-146.86	3,386.68	3,346.15	40.53	83.561		
6,100.00	5,850.70	4,869.81	4,574.13	34.69	32.13	-172.13	-1,566.17	-151.60	3,449.88	3,408.72	41.16	83.817		
6,200.00	5,946.00	4,947.28	4,645.93	35.30	32.70	-172.09	-1,594.89	-156.34	3,513.09	3,471.23	41.86	83.924		
6,300.00	6,041.31	5,024.75	4,717.72	35.91	33.27	-172.05	-1,623.60	-161.08	3,576.29	3,533.73	42.56	84.026		
6,400.00	6,136.62	5,102.21	4,789.51	36.53	33.83	-172.01	-1,652.32	-165.82	3,639.50	3,596.24	43.26	84.123		
6,500.00	6,231.93	5,179.68	4,861.30	37.14	34.40	-171.97	-1,681.03	-170.56	3,702.71	3,658.74	43.97	84.217		
6,600.00	6,327.24	5,257.15	4,933.09	37.75	34.97	-171.94	-1,709.75	-175.29	3,765.92	3,721.25	44.67	84.306		
6,700.00	6,422.54	5,334.62	5,004.89	38.37	35.54	-171.90	-1,738.47	-180.03	3,829.13	3,783.76	45.37	84.392		
6,745.38	6,465.79	5,369.77	5,037.46	38.64	35.80	-171.89	-1,751.50	-182.18	3,857.81	3,812.12	45.69	84.430		
6,800.00	6,518.01	5,412.40	5,076.98	38.97	36.11	-171.99	-1,767.30	-184.79	3,891.94	3,845.86	46.08	84.465		
6,900.00	6,614.35	5,507.91	5,150.82	39.54	36.81	-172.16	-1,796.84	-189.67	3,952.31	3,905.45	46.86	84.345		
7,000.00	6,711.57	5,573.80	5,226.54	40.06	37.30	-172.30	-1,827.13	-194.67	4,009.89	3,962.38	47.50	84.417		
7,100.00	6,809.55	5,657.43	5,304.05	40.53	37.91	-172.41	-1,858.13	-199.78	4,064.60	4,016.38	48.22	84.294		
7,200.00	6,908.17	5,742.88	5,383.24	40.96	38.54	-172.51	-1,889.81	-205.01	4,116.39	4,067.45	48.94	84.110		
7,300.00	7,007.30	5,830.05	5,464.03	41.35	39.18	-172.59	-1,922.12	-210.34	4,165.20	4,115.54	49.66	83.869		
7,400.00	7,106.83	5,918.84	5,546.31	41.69	39.83	-172.65	-1,955.03	-215.77	4,210.96	4,160.57	50.38	83.576		
7,500.00	7,206.63	6,009.12	5,629.98	41.98	40.50	-172.69	-1,988.50	-221.30	4,253.62	4,202.52	51.10	83.234		
7,600.00	7,306.59	6,100.80	5,714.94	42.23	41.17	-172.72	-2,022.48	-226.91	4,293.13	4,241.31	51.82	82.845		
7,626.41	7,333.00	6,125.23	5,737.58	42.29	41.35	-179.35	-2,031.54	-228.40	4,303.04	4,251.03	52.01	82.737		
7,656.41	7,363.00	6,153.03	5,763.35	42.35	41.55	-179.38	-2,041.84	-230.10	4,314.16	4,261.94	52.22	82.610		
7,700.00	7,406.55	6,193.49	5,800.84	42.45	41.85	-89.12	-2,056.84	-232.58	4,330.33	4,277.79	52.54	82.424		
7,750.00	7,456.18	7,885.17	7,434.71	42.56	49.77	-89.39	-2,373.60	-343.63	4,338.68	4,276.95	61.74	70.277		
7,800.00	7,505.10	7,928.86	7,473.15	42.68	49.88	-89.21	-2,373.51	-364.38	4,338.87	4,276.79	62.08	69.892		
7,850.00	7,552.93	7,971.75	7,509.24	42.81	49.99	-89.03	-2,373.41	-387.53	4,339.09	4,276.64	62.44	69.488		
7,900.00	7,599.32	8,013.91	7,542.93	42.94	50.10	-88.86	-2,373.30	-412.86	4,339.34	4,276.50	62.83	69.062		
7,950.00	7,643.91	8,055.43	7,574.21	43.08	50.22	-88.70	-2,373.18	-440.16	4,339.61	4,276.36	63.25	68.611		
8,000.00	7,686.37	8,096.38	7,603.03	43.22	50.34	-88.54	-2,373.05	-469.23	4,339.90	4,276.20	63.70	68.131		
8,050.00	7,726.36	8,136.81	7,629.39	43.37	50.46	-88.40	-2,372.92	-499.88	4,340.20	4,276.00	64.19	67.613		
8,100.00	7,763.59	8,176.79	7,653.26	43.53	50.58	-88.26	-2,372.78	-531.94	4,340.49	4,275.77	64.73	67.059		
8,150.00	7,797.77	8,216.38	7,674.63	43.69	50.71	-88.14	-2,372.63	-565.25	4,340.79	4,275.48	65.31	66.464		
8,200.00	7,828.65	8,255.61	7,693.50	43.86	50.84	-88.03	-2,372.48	-599.64	4,341.07	4,275.12	65.95	65.826		
8,250.00	7,855.98	8,294.55	7,709.86	44.05	50.98	-87.93	-2,372.33	-634.97	4,341.33	4,274.68	66.65	65.139		
8,300.00	7,879.55	8,333.23	7,723.69	44.25	51.13	-87.84	-2,372.17	-671.08	4,341.56	4,274.15	67.41	64.403		
8,350.00	7,899.20	8,371.70	7,735.00	44.47	51.28	-87.77	-2,372.02	-707.84	4,341.77	4,273.53	68.24	63.623		
8,400.00	7,914.77	8,410.00	7,743.79	44.71	51.44	-87.71	-2,371.85	-745.11	4,341.94	4,272.81	69.13	62.806		
8,450.00	7,926.14	8,450.00	7,750.29	44.98	51.61	-87.66	-2,371.68	-784.57	4,342.07	4,271.97	70.10	61.938		
8,500.00	7,933.22	8,486.24	7,753.79	45.26	51.78	-87.63	-2,371.53	-820.63	4,342.17	4,271.07	71.10	61.073		
8,550.00	7,935.96	8,524.48	7,755.00	45.58	51.97	-87.61	-2,371.36	-858.85	4,342.22	4,270.06	72.16	60.178		
8,556.48	7,936.00	8,530.96	7,755.00	45.62	52.01	-87.61	-2,371.33	-865.33	4,342.22	4,269.90	72.32	60.043		
8,600.00	7,936.00	8,574.48	7,755.00	45.92	52.24	-87.61	-2,371.14	-908.85	4,342.22	4,268.80	73.42	59.139		
8,700.00	7,936.00	8,674.48	7,755.00	46.70	52.83	-87.61	-2,370.71	-1,008.85	4,342.23	4,266.06	76.17	57.007		
8,800.00	7,936.00	8,774.48	7,755.00	47.61	53.52	-87.61	-2,370.27	-1,108.85	4,342.23	4,263.05	79.18	54.838		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
8,900.00	7,936.00	8,874.48	7,755.00	48.66	54.32	-87.61	-2,369.84	-1,208.85	4,342.24	4,259.80	82.44	52.674		
9,000.00	7,935.99	8,974.48	7,755.00	49.84	55.22	-87.61	-2,369.41	-1,308.84	4,342.24	4,256.34	85.90	50.547		
9,100.00	7,935.99	9,074.48	7,755.00	51.16	56.25	-87.61	-2,368.97	-1,408.84	4,342.25	4,252.69	89.56	48.483		
9,200.00	7,935.99	9,174.48	7,755.00	52.60	57.39	-87.61	-2,368.54	-1,508.84	4,342.26	4,248.87	93.39	46.498		
9,300.00	7,935.99	9,274.48	7,755.00	54.16	58.65	-87.61	-2,368.10	-1,608.84	4,342.26	4,244.91	97.36	44.602		
9,400.00	7,935.99	9,374.48	7,755.00	55.82	60.04	-87.61	-2,367.67	-1,708.84	4,342.27	4,240.81	101.46	42.799		
9,500.00	7,935.99	9,474.48	7,755.00	57.58	61.53	-87.61	-2,367.23	-1,808.84	4,342.27	4,236.60	105.67	41.092		
9,600.00	7,935.99	9,574.48	7,755.00	59.43	63.13	-87.61	-2,366.80	-1,908.84	4,342.28	4,232.29	109.99	39.479		
9,700.00	7,935.98	9,674.48	7,755.00	61.36	64.83	-87.61	-2,366.37	-2,008.84	4,342.29	4,227.89	114.40	37.958		
9,800.00	7,935.98	9,774.48	7,755.00	63.35	66.62	-87.61	-2,365.93	-2,108.84	4,342.29	4,223.41	118.88	36.526		
9,900.00	7,935.98	9,874.48	7,755.00	65.40	68.49	-87.61	-2,365.50	-2,208.84	4,342.30	4,218.86	123.44	35.177		
10,000.00	7,935.98	9,974.48	7,755.00	67.50	70.43	-87.61	-2,365.06	-2,308.83	4,342.30	4,214.24	128.06	33.907		
10,100.00	7,935.98	10,074.48	7,755.00	69.66	72.44	-87.61	-2,364.63	-2,408.83	4,342.31	4,209.57	132.74	32.712		
10,200.00	7,935.98	10,174.48	7,755.00	71.85	74.50	-87.61	-2,364.20	-2,508.83	4,342.32	4,204.84	137.47	31.587		
10,300.00	7,935.98	10,274.48	7,755.00	74.08	76.62	-87.61	-2,363.76	-2,608.83	4,342.32	4,200.07	142.25	30.526		
10,400.00	7,935.97	10,374.48	7,755.00	76.35	78.78	-87.61	-2,363.33	-2,708.83	4,342.33	4,195.26	147.07	29.526		
10,500.00	7,935.97	10,474.48	7,755.00	78.64	80.99	-87.61	-2,362.89	-2,808.83	4,342.33	4,190.41	151.92	28.583		
10,600.00	7,935.97	10,574.48	7,755.00	80.97	83.22	-87.61	-2,362.46	-2,908.83	4,342.34	4,185.53	156.81	27.692		
10,700.00	7,935.97	10,674.48	7,755.00	83.32	85.50	-87.61	-2,362.02	-3,008.83	4,342.35	4,180.61	161.73	26.849		
10,800.00	7,935.97	10,774.48	7,755.00	85.69	87.80	-87.61	-2,361.59	-3,108.83	4,342.35	4,175.67	166.68	26.052		
10,900.00	7,935.97	10,874.48	7,755.00	88.08	90.13	-87.61	-2,361.16	-3,208.83	4,342.36	4,170.70	171.66	25.297		
11,000.00	7,935.97	10,974.48	7,755.00	90.49	92.48	-87.61	-2,360.72	-3,308.83	4,342.36	4,165.71	176.65	24.581		
11,100.00	7,935.96	11,074.48	7,755.00	92.91	94.86	-87.61	-2,360.29	-3,408.82	4,342.37	4,160.70	181.67	23.902		
11,200.00	7,935.96	11,174.48	7,755.00	95.35	97.25	-87.61	-2,359.85	-3,508.82	4,342.38	4,155.66	186.71	23.257		
11,300.00	7,935.96	11,274.48	7,754.99	97.81	99.66	-87.61	-2,359.42	-3,608.82	4,342.38	4,150.61	191.77	22.643		
11,400.00	7,935.96	11,374.48	7,754.99	100.28	102.09	-87.61	-2,358.98	-3,708.82	4,342.39	4,145.54	196.85	22.060		
11,500.00	7,935.96	11,474.48	7,754.99	102.76	104.54	-87.61	-2,358.55	-3,808.82	4,342.39	4,140.45	201.94	21.504		
11,600.00	7,935.96	11,574.48	7,754.99	105.25	106.99	-87.61	-2,358.12	-3,908.82	4,342.40	4,135.36	207.04	20.973		
11,700.00	7,935.96	11,674.48	7,754.99	107.75	109.47	-87.61	-2,357.68	-4,008.82	4,342.40	4,130.24	212.16	20.467		
11,800.00	7,935.95	11,774.48	7,754.99	110.26	111.95	-87.61	-2,357.25	-4,108.82	4,342.41	4,125.12	217.29	19.984		
11,900.00	7,935.95	11,874.48	7,754.99	112.78	114.44	-87.61	-2,356.81	-4,208.82	4,342.42	4,119.98	222.44	19.522		
12,000.00	7,935.95	11,974.48	7,754.99	115.31	116.95	-87.61	-2,356.38	-4,308.82	4,342.42	4,114.83	227.59	19.080		
12,100.00	7,935.95	12,074.48	7,754.99	117.84	119.46	-87.61	-2,355.95	-4,408.81	4,342.43	4,109.67	232.76	18.657		
12,200.00	7,935.95	12,174.48	7,754.99	120.39	121.98	-87.61	-2,355.51	-4,508.81	4,342.43	4,104.50	237.93	18.251		
12,300.00	7,935.95	12,274.48	7,754.99	122.94	124.51	-87.61	-2,355.08	-4,608.81	4,342.44	4,099.33	243.11	17.862		
12,400.00	7,935.95	12,374.48	7,754.99	125.49	127.05	-87.61	-2,354.64	-4,708.81	4,342.45	4,094.14	248.30	17.489		
12,500.00	7,935.94	12,474.48	7,754.99	128.05	129.59	-87.61	-2,354.21	-4,808.81	4,342.45	4,088.95	253.50	17.130		
12,600.00	7,935.94	12,574.48	7,754.99	130.62	132.14	-87.61	-2,353.77	-4,908.81	4,342.46	4,083.75	258.71	16.785		
12,700.00	7,935.94	12,674.48	7,754.99	133.19	134.70	-87.61	-2,353.34	-5,008.81	4,342.46	4,078.54	263.92	16.454		
12,800.00	7,935.94	12,774.48	7,754.99	135.77	137.26	-87.61	-2,352.91	-5,108.81	4,342.47	4,073.33	269.14	16.135		
12,900.00	7,935.94	12,874.48	7,754.99	138.35	139.83	-87.61	-2,352.47	-5,208.81	4,342.48	4,068.11	274.37	15.827		
13,000.00	7,935.94	12,974.48	7,754.99	140.93	142.40	-87.61	-2,352.04	-5,308.81	4,342.48	4,062.88	279.60	15.531		
13,100.00	7,935.94	13,074.48	7,754.99	143.52	144.98	-87.61	-2,351.60	-5,408.81	4,342.49	4,057.65	284.83	15.246		
13,200.00	7,935.93	13,174.48	7,754.99	146.11	147.56	-87.61	-2,351.17	-5,508.80	4,342.49	4,052.42	290.08	14.970		
13,300.00	7,935.93	13,274.48	7,754.99	148.71	150.15	-87.61	-2,350.74	-5,608.80	4,342.50	4,047.18	295.32	14.704		
13,400.00	7,935.93	13,374.48	7,754.99	151.31	152.74	-87.61	-2,350.30	-5,708.80	4,342.51	4,041.93	300.57	14.447		
13,500.00	7,935.93	13,474.48	7,754.99	153.91	155.33	-87.61	-2,349.87	-5,808.80	4,342.51	4,036.68	305.83	14.199		
13,600.00	7,935.93	13,574.48	7,754.99	156.52	157.93	-87.61	-2,349.43	-5,908.80	4,342.52	4,031.43	311.09	13.959		
13,700.00	7,935.93	13,674.48	7,754.99	159.13	160.53	-87.61	-2,349.00	-6,008.80	4,342.52	4,026.17	316.35	13.727		
13,800.00	7,935.93	13,774.48	7,754.99	161.74	163.14	-87.61	-2,348.56	-6,108.80	4,342.53	4,020.91	321.62	13.502		
13,900.00	7,935.92	13,874.48	7,754.99	164.35	165.74	-87.61	-2,348.13	-6,208.80	4,342.54	4,015.64	326.89	13.284		
14,000.00	7,935.92	13,974.48	7,754.99	166.97	168.35	-87.61	-2,347.70	-6,308.80	4,342.54	4,010.37	332.17	13.073		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,100.00	7,935.92	14,074.48	7,754.99	169.59	170.97	-87.61	-2,347.26	-6,408.80	4,342.55	4,005.10	337.45	12.869		
14,200.00	7,935.92	14,174.48	7,754.99	172.21	173.58	-87.61	-2,346.83	-6,508.80	4,342.55	3,999.82	342.73	12.671		
14,300.00	7,935.92	14,274.48	7,754.99	174.84	176.20	-87.61	-2,346.39	-6,608.79	4,342.56	3,994.55	348.01	12.478		
14,400.00	7,935.92	14,374.48	7,754.99	177.46	178.82	-87.61	-2,345.96	-6,708.79	4,342.56	3,989.26	353.30	12.291		
14,500.00	7,935.92	14,474.48	7,754.99	180.09	181.44	-87.61	-2,345.53	-6,808.79	4,342.57	3,983.98	358.59	12.110		
14,600.00	7,935.91	14,574.48	7,754.99	182.72	184.07	-87.61	-2,345.09	-6,908.79	4,342.58	3,978.69	363.88	11.934		
14,700.00	7,935.91	14,674.48	7,754.99	185.35	186.70	-87.61	-2,344.66	-7,008.79	4,342.58	3,973.41	369.18	11.763		
14,800.00	7,935.91	14,774.48	7,754.99	187.98	189.32	-87.61	-2,344.22	-7,108.79	4,342.59	3,968.11	374.47	11.596		
14,900.00	7,935.91	14,874.48	7,754.99	190.62	191.96	-87.61	-2,343.79	-7,208.79	4,342.59	3,962.82	379.77	11.435		
15,000.00	7,935.91	14,974.48	7,754.99	193.25	194.59	-87.61	-2,343.35	-7,308.79	4,342.60	3,957.52	385.08	11.277		
15,100.00	7,935.91	15,074.48	7,754.99	195.89	197.22	-87.61	-2,342.92	-7,408.79	4,342.61	3,952.23	390.38	11.124		
15,200.00	7,935.91	15,174.48	7,754.99	198.53	199.86	-87.61	-2,342.49	-7,508.79	4,342.61	3,946.93	395.68	10.975		
15,300.00	7,935.90	15,274.48	7,754.99	201.17	202.50	-87.61	-2,342.05	-7,608.78	4,342.62	3,941.63	400.99	10.830		
15,400.00	7,935.90	15,374.48	7,754.99	203.81	205.13	-87.61	-2,341.62	-7,708.78	4,342.62	3,936.32	406.30	10.688		
15,500.00	7,935.90	15,474.48	7,754.99	206.45	207.78	-87.61	-2,341.18	-7,808.78	4,342.63	3,931.02	411.61	10.550		
15,600.00	7,935.90	15,574.48	7,754.99	209.10	210.42	-87.61	-2,340.75	-7,908.78	4,342.64	3,925.71	416.93	10.416		
15,700.00	7,935.90	15,674.48	7,754.99	211.74	213.06	-87.61	-2,340.31	-8,008.78	4,342.64	3,920.40	422.24	10.285		
15,800.00	7,935.90	15,774.48	7,754.99	214.39	215.71	-87.61	-2,339.88	-8,108.78	4,342.65	3,915.09	427.56	10.157		
15,900.00	7,935.90	15,874.48	7,754.99	217.04	218.35	-87.61	-2,339.45	-8,208.78	4,342.65	3,909.78	432.88	10.032		
16,000.00	7,935.89	15,974.48	7,754.99	219.69	221.00	-87.61	-2,339.01	-8,308.78	4,342.66	3,904.46	438.20	9.910		
16,100.00	7,935.89	16,074.48	7,754.99	222.34	223.65	-87.61	-2,338.58	-8,408.78	4,342.67	3,899.15	443.52	9.791		
16,200.00	7,935.89	16,174.48	7,754.99	224.99	226.30	-87.61	-2,338.14	-8,508.78	4,342.67	3,893.83	448.84	9.675		
16,300.00	7,935.89	16,274.48	7,754.99	227.64	228.95	-87.61	-2,337.71	-8,608.78	4,342.68	3,888.52	454.16	9.562		
16,400.00	7,935.89	16,374.48	7,754.98	230.29	231.60	-87.61	-2,337.28	-8,708.77	4,342.68	3,883.20	459.49	9.451		
16,500.00	7,935.89	16,474.48	7,754.98	232.94	234.25	-87.61	-2,336.84	-8,808.77	4,342.69	3,877.88	464.81	9.343		
16,600.00	7,935.89	16,574.48	7,754.98	235.60	236.90	-87.61	-2,336.41	-8,908.77	4,342.70	3,872.56	470.14	9.237		
16,700.00	7,935.88	16,674.48	7,754.98	238.25	239.56	-87.61	-2,335.97	-9,008.77	4,342.70	3,867.23	475.47	9.134		
16,800.00	7,935.88	16,774.48	7,754.98	240.91	242.21	-87.61	-2,335.54	-9,108.77	4,342.71	3,861.91	480.80	9.032		
16,900.00	7,935.88	16,874.48	7,754.98	243.56	244.87	-87.61	-2,335.10	-9,208.77	4,342.71	3,856.59	486.13	8.933		
17,000.00	7,935.88	16,974.48	7,754.98	246.22	247.53	-87.61	-2,334.67	-9,308.77	4,342.72	3,851.26	491.46	8.836		
17,100.00	7,935.88	17,074.48	7,754.98	248.88	250.18	-87.61	-2,334.24	-9,408.77	4,342.72	3,845.93	496.79	8.742		
17,200.00	7,935.88	17,174.48	7,754.98	251.54	252.84	-87.61	-2,333.80	-9,508.77	4,342.73	3,840.61	502.13	8.649		
17,300.00	7,935.88	17,274.48	7,754.98	254.20	255.50	-87.61	-2,333.37	-9,608.77	4,342.74	3,835.28	507.46	8.558		
17,400.00	7,935.87	17,374.48	7,754.98	256.86	258.16	-87.61	-2,332.93	-9,708.77	4,342.74	3,829.95	512.79	8.469		
17,500.00	7,935.87	17,474.48	7,754.98	259.52	260.82	-87.61	-2,332.50	-9,808.76	4,342.75	3,824.62	518.13	8.382		
17,600.00	7,935.87	17,574.48	7,754.98	262.18	263.48	-87.61	-2,332.07	-9,908.76	4,342.75	3,819.29	523.47	8.296		
17,700.00	7,935.87	17,674.48	7,754.98	264.84	266.14	-87.61	-2,331.63	-10,008.76	4,342.76	3,813.95	528.81	8.212		
17,800.00	7,935.87	17,774.48	7,754.98	267.50	268.81	-87.61	-2,331.20	-10,108.76	4,342.77	3,808.62	534.14	8.130		
17,900.00	7,935.87	17,874.48	7,754.98	270.17	271.47	-87.61	-2,330.76	-10,208.76	4,342.77	3,803.29	539.48	8.050		
18,000.00	7,935.87	17,974.48	7,754.98	272.83	274.13	-87.61	-2,330.33	-10,308.76	4,342.78	3,797.95	544.82	7.971		
18,100.00	7,935.86	18,074.48	7,754.98	275.49	276.80	-87.61	-2,329.89	-10,408.76	4,342.78	3,792.62	550.17	7.894		
18,200.00	7,935.86	18,210.73	7,755.00	278.16	280.43	-87.61	-2,329.08	-10,545.01	4,342.72	3,786.28	556.44	7.805		
18,238.71	7,935.86	18,210.73	7,755.00	279.19	280.43	-87.61	-2,329.08	-10,545.01	4,342.57	3,785.06	557.51	7.789		
18,239.20	7,936.00	18,210.73	7,755.00	279.20	280.43	-87.61	-2,329.08	-10,545.01	4,342.23	3,784.71	557.52	7.788 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	-90.00	0.00	-19.69	19.69					
100.00	100.00	100.00	100.00	0.13	0.13	-90.00	0.00	-19.69	19.69	19.42	0.27	73.227		
200.00	200.00	200.00	200.00	0.49	0.49	-90.00	0.00	-19.69	19.69	18.70	0.99	19.971		
300.00	299.98	300.02	299.98	0.85	0.85	-87.16	0.00	-19.69	19.52	17.82	1.70	11.467		
324.72	324.68	324.68	324.68	0.94	0.94	-90.00	0.00	-19.69	19.50	17.62	1.88	10.370 CC		
400.00	399.84	399.84	399.84	1.22	1.21	-102.31	0.00	-19.69	19.96	17.54	2.42	8.240		
500.00	499.45	499.85	499.83	1.59	1.57	-119.86	1.72	-19.97	22.55	19.39	3.15	7.155		
600.00	598.70	600.10	599.94	1.97	1.93	-132.75	6.89	-20.82	26.81	22.93	3.89	6.898		
700.00	697.47	700.60	700.05	2.38	2.30	-141.65	15.55	-22.23	32.09	27.46	4.63	6.933		
800.00	795.62	801.35	800.04	2.82	2.68	-147.82	27.70	-24.22	37.94	32.57	5.37	7.060		
900.00	893.06	902.35	899.78	3.29	3.08	-152.18	43.35	-26.79	44.12	38.00	6.13	7.202		
1,000.00	989.64	1,003.60	999.14	3.79	3.51	-155.35	62.52	-29.92	50.50	43.61	6.89	7.331		
1,081.03	1,067.21	1,085.82	1,079.29	4.23	3.88	-157.31	80.63	-32.89	55.75	48.24	7.51	7.420		
1,100.00	1,085.29	1,105.10	1,098.00	4.34	3.97	-157.70	85.20	-33.64	56.93	49.27	7.66	7.431		
1,200.00	1,180.60	1,205.27	1,195.01	4.91	4.45	-159.14	109.83	-37.67	62.33	53.87	8.46	7.369		
1,300.00	1,275.90	1,305.12	1,291.69	5.49	4.94	-160.33	134.44	-41.70	67.72	58.45	9.27	7.308		
1,400.00	1,371.21	1,404.96	1,388.38	6.07	5.45	-161.34	159.05	-45.73	73.13	63.05	10.08	7.258		
1,500.00	1,466.52	1,504.81	1,485.06	6.66	5.96	-162.22	183.65	-49.75	78.55	67.67	10.89	7.215		
1,600.00	1,561.83	1,604.65	1,581.74	7.26	6.47	-162.98	208.26	-53.78	84.00	72.30	11.70	7.179		
1,700.00	1,657.14	1,704.50	1,678.42	7.85	6.99	-163.65	232.87	-57.81	89.46	76.94	12.51	7.148		
1,800.00	1,752.44	1,804.34	1,775.11	8.45	7.51	-164.24	257.47	-61.84	94.93	81.60	13.33	7.121		
1,900.00	1,847.75	1,904.19	1,871.79	9.05	8.04	-164.76	282.08	-65.87	100.40	86.26	14.15	7.098		
2,000.00	1,943.06	2,004.04	1,968.47	9.66	8.57	-165.24	306.69	-69.90	105.89	90.93	14.96	7.077		
2,100.00	2,038.37	2,103.88	2,065.15	10.26	9.09	-165.66	331.29	-73.92	111.38	95.60	15.78	7.059		
2,200.00	2,133.68	2,203.73	2,161.84	10.86	9.63	-166.05	355.90	-77.95	116.88	100.28	16.60	7.042		
2,300.00	2,228.99	2,303.57	2,258.52	11.47	10.16	-166.40	380.51	-81.98	122.38	104.96	17.41	7.028		
2,400.00	2,324.29	2,403.42	2,355.20	12.08	10.69	-166.72	405.11	-86.01	127.88	109.65	18.23	7.014		
2,500.00	2,419.60	2,503.27	2,451.88	12.68	11.22	-167.02	429.72	-90.04	133.39	114.34	19.05	7.002		
2,600.00	2,514.91	2,603.11	2,548.57	13.29	11.76	-167.29	454.33	-94.07	138.91	119.04	19.87	6.991		
2,700.00	2,610.22	2,702.96	2,645.25	13.90	12.30	-167.54	478.93	-98.10	144.42	123.73	20.69	6.981		
2,800.00	2,705.53	2,802.80	2,741.93	14.51	12.83	-167.77	503.54	-102.12	149.94	128.43	21.51	6.971		
2,900.00	2,800.83	2,902.65	2,838.61	15.12	13.37	-167.98	528.15	-106.15	155.46	133.13	22.33	6.963		
3,000.00	2,896.14	3,002.49	2,935.29	15.73	13.91	-168.18	552.75	-110.18	160.98	137.84	23.15	6.955		
3,100.00	2,991.45	3,102.34	3,031.98	16.34	14.44	-168.37	577.36	-114.21	166.51	142.54	23.97	6.947		
3,200.00	3,086.76	3,202.19	3,128.66	16.95	14.98	-168.55	601.97	-118.24	172.03	147.25	24.79	6.940		
3,300.00	3,182.07	3,302.03	3,225.34	17.56	15.52	-168.71	626.57	-122.27	177.56	151.95	25.61	6.934		
3,400.00	3,277.38	3,401.88	3,322.02	18.17	16.06	-168.87	651.18	-126.29	183.09	156.66	26.43	6.928		
3,500.00	3,372.68	3,501.72	3,418.71	18.78	16.60	-169.01	675.79	-130.32	188.62	161.37	27.25	6.922		
3,600.00	3,467.99	3,601.57	3,515.39	19.39	17.14	-169.15	700.39	-134.35	194.15	166.08	28.07	6.917		
3,700.00	3,563.30	3,701.42	3,612.07	20.00	17.67	-169.28	725.00	-138.38	199.69	170.80	28.89	6.912		
3,800.00	3,658.61	3,801.26	3,708.75	20.61	18.21	-169.40	749.61	-142.41	205.22	175.51	29.71	6.907		
3,900.00	3,753.92	3,901.11	3,805.44	21.22	18.75	-169.52	774.21	-146.44	210.75	180.22	30.53	6.903		
4,000.00	3,849.22	4,000.95	3,902.12	21.83	19.29	-169.63	798.82	-150.47	216.29	184.94	31.35	6.899		
4,100.00	3,944.53	4,100.80	3,998.80	22.45	19.83	-169.73	823.43	-154.49	221.82	189.65	32.17	6.895		
4,200.00	4,039.84	4,200.65	4,095.48	23.06	20.37	-169.83	848.03	-158.52	227.36	194.37	32.99	6.891		
4,300.00	4,135.15	4,300.49	4,192.16	23.67	20.91	-169.93	872.64	-162.55	232.90	199.08	33.82	6.887		
4,400.00	4,230.46	4,400.34	4,288.85	24.28	21.46	-170.02	897.25	-166.58	238.44	203.80	34.64	6.884		
4,500.00	4,325.77	4,500.18	4,385.53	24.89	22.00	-170.10	921.85	-170.61	243.97	208.51	35.46	6.880		
4,600.00	4,421.07	4,600.03	4,482.21	25.51	22.54	-170.19	946.46	-174.64	249.51	213.23	36.28	6.877		
4,700.00	4,516.38	4,699.87	4,578.89	26.12	23.08	-170.26	971.07	-178.66	255.05	217.95	37.10	6.874		
4,800.00	4,611.69	4,800.28	4,675.58	26.73	23.62	-170.34	995.67	-182.69	260.59	222.67	37.93	6.871		
4,900.00	4,707.00	4,900.43	4,772.26	27.34	24.16	-170.41	1,020.28	-186.72	266.13	227.38	38.75	6.868		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.00	4,802.31	4,999.41	4,868.94	27.95	24.70	-170.48	1,044.89	-190.75	271.67	232.11	39.57	6.866		
5,100.00	4,897.61	5,100.74	4,965.62	28.57	25.25	-170.55	1,069.50	-194.78	277.21	236.82	40.39	6.863		
5,200.00	4,992.92	5,200.90	5,062.31	29.18	25.79	-170.61	1,094.10	-198.81	282.76	241.54	41.22	6.860		
5,300.00	5,088.23	5,301.05	5,158.99	29.79	26.33	-170.67	1,118.71	-202.83	288.30	246.26	42.04	6.858		
5,400.00	5,183.54	5,398.80	5,255.67	30.40	26.86	-170.73	1,143.32	-206.86	293.84	250.99	42.85	6.857		
5,500.00	5,278.85	5,501.36	5,352.35	31.01	27.42	-170.79	1,167.92	-210.89	299.38	255.69	43.69	6.853		
5,600.00	5,374.15	5,601.51	5,449.04	31.63	27.96	-170.85	1,192.53	-214.92	304.92	260.41	44.51	6.851		
5,700.00	5,469.46	5,701.67	5,545.72	32.24	28.51	-170.90	1,217.14	-218.95	310.47	265.13	45.33	6.848		
5,800.00	5,564.77	5,801.82	5,642.40	32.85	29.05	-170.95	1,241.74	-222.98	316.01	269.85	46.16	6.846		
5,900.00	5,660.08	5,901.98	5,739.08	33.46	29.59	-171.00	1,266.35	-227.01	321.55	274.57	46.98	6.844		
6,000.00	5,755.39	6,002.13	5,835.76	34.08	30.14	-171.05	1,290.96	-231.03	327.10	279.29	47.80	6.842		
6,100.00	5,850.70	6,102.28	5,932.45	34.69	30.68	-171.09	1,315.56	-235.06	332.64	284.01	48.63	6.841		
6,200.00	5,946.00	6,202.44	6,029.13	35.30	31.22	-171.14	1,340.17	-239.09	338.19	288.74	49.45	6.839		
6,300.00	6,041.31	6,302.59	6,125.81	35.91	31.77	-171.18	1,364.78	-243.12	343.73	293.46	50.27	6.837		
6,400.00	6,136.62	6,402.75	6,222.49	36.53	32.31	-171.22	1,389.38	-247.15	349.27	298.18	51.10	6.835		
6,500.00	6,231.93	6,502.90	6,319.18	37.14	32.85	-171.26	1,413.99	-251.18	354.82	302.90	51.92	6.834		
6,600.00	6,327.24	6,603.05	6,415.86	37.75	33.40	-171.30	1,438.60	-255.20	360.36	307.62	52.74	6.832		
6,700.00	6,422.54	6,703.21	6,512.54	38.37	33.94	-171.34	1,463.20	-259.23	365.91	312.34	53.57	6.831		
6,745.38	6,465.79	6,742.10	6,556.41	38.64	34.15	-171.36	1,474.37	-261.06	368.43	314.51	53.92	6.833		
6,800.00	6,518.01	6,792.14	6,604.93	38.97	34.42	-171.38	1,486.49	-263.05	371.18	316.85	54.34	6.831		
6,900.00	6,614.35	6,880.67	6,691.22	39.54	34.87	-171.42	1,505.95	-266.23	375.86	320.81	55.05	6.828		
7,000.00	6,711.57	6,969.08	6,777.98	40.06	35.29	-171.45	1,522.74	-268.98	380.12	324.43	55.69	6.826		
7,100.00	6,809.55	7,057.40	6,865.13	40.53	35.67	-171.49	1,536.87	-271.29	383.98	327.71	56.27	6.824		
7,200.00	6,908.17	7,145.64	6,952.59	40.96	36.02	-171.52	1,548.34	-273.17	387.42	330.63	56.78	6.823		
7,300.00	7,007.30	7,233.80	7,040.30	41.35	36.35	-171.56	1,557.13	-274.61	390.43	333.21	57.23	6.822		
7,400.00	7,106.83	7,321.89	7,128.17	41.69	36.63	-171.59	1,563.26	-275.61	393.03	335.42	57.61	6.823		
7,500.00	7,206.63	7,409.93	7,216.13	41.98	36.89	-171.63	1,566.71	-276.18	395.21	337.28	57.92	6.823		
7,600.00	7,306.59	7,500.40	7,306.59	42.23	37.12	-171.66	1,567.55	-276.32	396.89	338.64	58.25	6.814		
7,626.41	7,333.00	7,526.76	7,332.96	42.29	37.19	-179.56	1,567.55	-276.57	397.01	338.59	58.42	6.796		
7,656.41	7,363.00	7,556.61	7,362.75	42.35	37.26	-179.32	1,567.56	-278.23	397.02	338.39	58.63	6.771		
7,700.00	7,406.55	7,599.69	7,405.52	42.45	37.38	-89.06	1,567.58	-283.35	397.06	338.10	58.96	6.734		
7,750.00	7,456.18	7,648.80	7,453.64	42.56	37.51	-88.48	1,567.62	-293.09	397.15	337.81	59.34	6.693		
7,800.00	7,505.10	7,697.58	7,500.43	42.68	37.65	-87.92	1,567.68	-306.81	397.27	337.55	59.72	6.652		
7,850.00	7,552.93	7,746.05	7,545.61	42.81	37.79	-87.38	1,567.76	-324.33	397.43	337.32	60.11	6.612		
7,900.00	7,599.32	7,794.23	7,588.89	42.94	37.94	-86.85	1,567.85	-345.47	397.62	337.12	60.50	6.572		
7,950.00	7,643.91	7,842.13	7,630.01	43.08	38.09	-86.36	1,567.95	-370.01	397.83	336.93	60.89	6.533		
8,000.00	7,686.37	7,889.77	7,668.73	43.22	38.24	-85.88	1,568.07	-397.75	398.05	336.75	61.30	6.494		
8,050.00	7,726.36	7,937.18	7,704.84	43.37	38.40	-85.44	1,568.21	-428.44	398.29	336.56	61.72	6.453		
8,100.00	7,763.59	7,984.37	7,738.14	43.53	38.57	-85.04	1,568.35	-461.86	398.52	336.36	62.16	6.411		
8,150.00	7,797.77	8,031.36	7,768.47	43.69	38.75	-84.67	1,568.50	-497.74	398.76	336.13	62.63	6.367		
8,200.00	7,828.65	8,078.18	7,795.65	43.86	38.94	-84.34	1,568.67	-535.84	398.98	335.85	63.14	6.319		
8,250.00	7,855.98	8,124.85	7,819.56	44.05	39.14	-84.05	1,568.84	-575.90	399.19	335.50	63.69	6.268		
8,300.00	7,879.55	8,171.38	7,840.08	44.25	39.36	-83.80	1,569.02	-617.65	399.38	335.09	64.29	6.212		
8,350.00	7,899.20	8,217.80	7,857.11	44.47	39.60	-83.60	1,569.21	-660.82	399.54	334.59	64.95	6.152		
8,400.00	7,914.77	8,264.14	7,870.57	44.71	39.86	-83.44	1,569.40	-705.15	399.66	333.99	65.67	6.085		
8,450.00	7,926.14	8,310.41	7,880.39	44.98	40.15	-83.33	1,569.59	-750.36	399.76	333.29	66.47	6.014		
8,500.00	7,933.22	8,356.64	7,886.53	45.26	40.47	-83.27	1,569.79	-796.16	399.82	332.49	67.33	5.938		
8,550.00	7,935.96	8,402.86	7,888.96	45.58	40.81	-83.25	1,569.99	-842.30	399.83	331.58	68.26	5.858		
8,552.26	7,935.98	8,415.22	7,889.00	45.59	40.91	-83.25	1,570.00	-843.98	399.83	331.42	68.41	5.845		
8,556.48	7,936.00	8,410.99	7,889.00	45.62	40.88	-83.25	1,570.02	-848.20	399.83	331.43	68.40	5.845		
8,600.00	7,936.00	8,452.28	7,889.00	45.92	41.22	-83.25	1,570.20	-891.72	399.84	330.36	69.48	5.755		
8,700.00	7,936.00	8,552.28	7,889.00	46.70	42.15	-83.25	1,570.63	-991.72	399.85	327.65	72.20	5.538		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-2 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
8,800.00	7,936.00	8,652.28	7,889.00	47.61	43.24	-83.25	1,571.06	-1,091.72	399.85	324.66	75.20	5.318		
8,900.00	7,936.00	8,752.28	7,889.00	48.66	44.49	-83.25	1,571.50	-1,191.72	399.86	321.42	78.44	5.097		
9,000.00	7,935.99	8,852.28	7,888.99	49.84	45.88	-83.25	1,571.93	-1,291.72	399.87	317.96	81.91	4.882		
9,100.00	7,935.99	8,952.28	7,888.99	51.16	47.40	-83.25	1,572.36	-1,391.72	399.88	314.30	85.58	4.673		
9,200.00	7,935.99	9,052.28	7,888.99	52.60	49.04	-83.25	1,572.79	-1,491.72	399.89	310.48	89.41	4.473		
9,300.00	7,935.99	9,152.28	7,888.99	54.16	50.80	-83.25	1,573.22	-1,591.72	399.90	306.51	93.39	4.282		
9,400.00	7,935.99	9,252.28	7,888.99	55.82	52.64	-83.25	1,573.65	-1,691.72	399.91	302.40	97.50	4.102		
9,500.00	7,935.99	9,352.28	7,888.99	57.58	54.57	-83.25	1,574.09	-1,791.72	399.91	298.19	101.73	3.931		
9,600.00	7,935.99	9,452.29	7,888.99	59.43	56.57	-83.25	1,574.52	-1,891.72	399.92	293.87	106.05	3.771		
9,700.00	7,935.98	9,552.29	7,888.99	61.36	58.63	-83.25	1,574.95	-1,991.72	399.93	289.46	110.47	3.620		
9,800.00	7,935.98	9,652.29	7,888.99	63.35	60.75	-83.25	1,575.38	-2,091.72	399.94	284.97	114.97	3.479		
9,900.00	7,935.98	9,752.29	7,888.98	65.40	62.92	-83.25	1,575.82	-2,191.72	399.94	280.41	119.53	3.346		
10,000.00	7,935.98	9,852.29	7,888.98	67.50	65.13	-83.25	1,576.25	-2,291.72	399.95	275.79	124.16	3.221		
10,100.00	7,935.98	9,952.29	7,888.98	69.66	67.38	-83.25	1,576.68	-2,391.72	399.96	271.12	128.84	3.104		
10,200.00	7,935.98	10,052.29	7,888.98	71.85	69.66	-83.25	1,577.11	-2,491.71	399.97	266.39	133.57	2.994		
10,300.00	7,935.98	10,152.29	7,888.98	74.08	71.97	-83.25	1,577.55	-2,591.71	399.97	261.62	138.35	2.891		
10,400.00	7,935.97	10,252.29	7,888.98	76.35	74.31	-83.25	1,577.98	-2,691.71	399.98	256.81	143.17	2.794		
10,500.00	7,935.97	10,352.29	7,888.98	78.64	76.68	-83.25	1,578.41	-2,791.71	399.99	251.97	148.02	2.702		
10,600.00	7,935.97	10,452.29	7,888.98	80.97	79.07	-83.25	1,578.85	-2,891.71	399.99	247.09	152.91	2.616		
10,700.00	7,935.97	10,552.29	7,888.98	83.32	81.48	-83.25	1,579.28	-2,991.71	400.00	242.18	157.82	2.534		
10,800.00	7,935.97	10,652.29	7,888.98	85.69	83.90	-83.25	1,579.71	-3,091.71	400.01	237.24	162.77	2.458		
10,900.00	7,935.97	10,752.29	7,888.98	88.08	86.34	-83.25	1,580.15	-3,191.71	400.01	232.28	167.73	2.385		
11,000.00	7,935.97	10,852.29	7,888.98	90.49	88.80	-83.25	1,580.58	-3,291.71	400.02	227.30	172.72	2.316		
11,100.00	7,935.96	10,952.29	7,888.98	92.91	91.27	-83.25	1,581.02	-3,391.71	400.03	222.29	177.73	2.251		
11,200.00	7,935.96	11,052.29	7,888.97	95.35	93.76	-83.25	1,581.45	-3,491.71	400.03	217.27	182.76	2.189		
11,300.00	7,935.96	11,152.29	7,888.97	97.81	96.25	-83.25	1,581.88	-3,591.71	400.04	212.23	187.81	2.130		
11,400.00	7,935.96	11,252.29	7,888.97	100.28	98.76	-83.25	1,582.32	-3,691.71	400.04	207.17	192.87	2.074		
11,500.00	7,935.96	11,352.29	7,888.97	102.76	101.27	-83.26	1,582.75	-3,791.71	400.05	202.10	197.95	2.021		
11,600.00	7,935.96	11,452.29	7,888.97	105.25	103.80	-83.26	1,583.19	-3,891.71	400.05	197.01	203.04	1.970		
11,700.00	7,935.96	11,552.30	7,888.97	107.75	106.33	-83.26	1,583.62	-3,991.71	400.06	191.91	208.15	1.922		
11,800.00	7,935.95	11,652.30	7,888.97	110.26	108.87	-83.26	1,584.06	-4,091.71	400.06	186.80	213.26	1.876		
11,900.00	7,935.95	11,752.30	7,888.97	112.78	111.42	-83.26	1,584.49	-4,191.71	400.07	181.68	218.39	1.832		
12,000.00	7,935.95	11,852.30	7,888.97	115.31	113.98	-83.26	1,584.93	-4,291.71	400.07	176.55	223.53	1.790		
12,100.00	7,935.95	11,952.30	7,888.97	117.84	116.54	-83.26	1,585.36	-4,391.71	400.08	171.41	228.67	1.750		
12,200.00	7,935.95	12,052.30	7,888.97	120.39	119.11	-83.26	1,585.80	-4,491.71	400.08	166.26	233.83	1.711		
12,300.00	7,935.95	12,152.30	7,888.97	122.94	121.68	-83.26	1,586.23	-4,591.71	400.09	161.10	238.99	1.674		
12,400.00	7,935.95	12,252.30	7,888.97	125.49	124.26	-83.26	1,586.67	-4,691.70	400.09	155.93	244.16	1.639		
12,500.00	7,935.94	12,352.30	7,888.97	128.05	126.84	-83.26	1,587.10	-4,791.70	400.10	150.76	249.34	1.605		
12,600.00	7,935.94	12,452.30	7,888.97	130.62	129.43	-83.26	1,587.54	-4,891.70	400.10	145.58	254.53	1.572		
12,700.00	7,935.94	12,552.30	7,888.97	133.19	132.02	-83.26	1,587.98	-4,991.70	400.11	140.39	259.72	1.541		
12,800.00	7,935.94	12,652.30	7,888.97	135.77	134.61	-83.26	1,588.41	-5,091.70	400.11	135.19	264.92	1.510		
12,900.00	7,935.94	12,752.30	7,888.97	138.35	137.21	-83.26	1,588.85	-5,191.70	400.11	129.99	270.12	1.481 Level 3		
13,000.00	7,935.94	12,852.30	7,888.97	140.93	139.82	-83.26	1,589.28	-5,291.70	400.12	124.79	275.33	1.453 Level 3		
13,100.00	7,935.94	12,952.30	7,888.97	143.52	142.42	-83.26	1,589.72	-5,391.70	400.12	119.58	280.54	1.426 Level 3		
13,200.00	7,935.93	13,052.30	7,888.97	146.11	145.03	-83.26	1,590.16	-5,491.70	400.13	114.36	285.76	1.400 Level 3		
13,300.00	7,935.93	13,152.30	7,888.97	148.71	147.64	-83.26	1,590.59	-5,591.70	400.13	109.14	290.99	1.375 Level 3		
13,400.00	7,935.93	13,252.30	7,888.97	151.31	150.26	-83.26	1,591.03	-5,691.70	400.13	103.92	296.22	1.351 Level 3		
13,500.00	7,935.93	13,352.30	7,888.97	153.91	152.87	-83.26	1,591.47	-5,791.70	400.14	98.69	301.45	1.327 Level 3		
13,600.00	7,935.93	13,452.30	7,888.97	156.52	155.49	-83.26	1,591.90	-5,891.70	400.14	93.45	306.68	1.305 Level 3		
13,700.00	7,935.93	13,552.31	7,888.97	159.13	158.12	-83.26	1,592.34	-5,991.70	400.14	88.22	311.92	1.283 Level 3		
13,800.00	7,935.93	13,652.31	7,888.97	161.74	160.74	-83.26	1,592.78	-6,091.70	400.14	82.98	317.17	1.262 Level 3		
13,900.00	7,935.92	13,752.31	7,888.97	164.35	163.37	-83.26	1,593.21	-6,191.70	400.15	77.73	322.41	1.241 Level 2		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-2 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,000.00	7,935.92	13,852.31	7,888.97	166.97	166.00	-83.26	1,593.65	-6,291.70	400.15	72.49	327.66	1.221	Level 2	
14,100.00	7,935.92	13,952.31	7,888.97	169.59	168.63	-83.26	1,594.09	-6,391.70	400.15	67.24	332.92	1.202	Level 2	
14,200.00	7,935.92	14,052.31	7,888.97	172.21	171.26	-83.26	1,594.53	-6,491.70	400.15	61.98	338.17	1.183	Level 2	
14,300.00	7,935.92	14,152.31	7,888.97	174.84	173.89	-83.26	1,594.97	-6,591.70	400.16	56.73	343.43	1.165	Level 2	
14,400.00	7,935.92	14,252.31	7,888.97	177.46	176.53	-83.26	1,595.40	-6,691.70	400.16	51.47	348.69	1.148	Level 2	
14,500.00	7,935.92	14,352.31	7,888.97	180.09	179.17	-83.26	1,595.84	-6,791.69	400.16	46.21	353.95	1.131	Level 2	
14,600.00	7,935.91	14,452.31	7,888.97	182.72	181.81	-83.26	1,596.28	-6,891.69	400.16	40.94	359.22	1.114	Level 2	
14,700.00	7,935.91	14,552.31	7,888.97	185.35	184.45	-83.26	1,596.72	-6,991.69	400.16	35.68	364.49	1.098	Level 2	
14,800.00	7,935.91	14,652.31	7,888.97	187.98	187.09	-83.26	1,597.16	-7,091.69	400.17	30.41	369.76	1.082	Level 2	
14,900.00	7,935.91	14,752.31	7,888.97	190.62	189.73	-83.26	1,597.59	-7,191.69	400.17	25.14	375.03	1.067	Level 2	
15,000.00	7,935.91	14,852.31	7,888.97	193.25	192.38	-83.26	1,598.03	-7,291.69	400.17	19.86	380.31	1.052	Level 2	
15,100.00	7,935.91	14,952.31	7,888.97	195.89	195.02	-83.26	1,598.47	-7,391.69	400.17	14.59	385.58	1.038	Level 2	
15,200.00	7,935.91	15,052.31	7,888.97	198.53	197.67	-83.26	1,598.91	-7,491.69	400.17	9.31	390.86	1.024	Level 2	
15,300.00	7,935.90	15,152.31	7,888.97	201.17	200.32	-83.27	1,599.35	-7,591.69	400.17	4.03	396.14	1.010	Level 2	
15,400.00	7,935.90	15,252.31	7,888.97	203.81	202.97	-83.27	1,599.79	-7,691.69	400.17	-1.25	401.42	0.997	Level 1	
15,500.00	7,935.90	15,352.31	7,888.97	206.45	205.62	-83.27	1,600.23	-7,791.69	400.17	-6.53	406.71	0.984	Level 1	
15,600.00	7,935.90	15,452.31	7,888.97	209.10	208.27	-83.27	1,600.67	-7,891.69	400.17	-11.82	411.99	0.971	Level 1	
15,700.00	7,935.90	15,552.31	7,888.98	211.74	210.92	-83.27	1,601.11	-7,991.69	400.17	-17.10	417.28	0.959	Level 1	
15,800.00	7,935.90	15,652.32	7,888.98	214.39	213.58	-83.27	1,601.55	-8,091.69	400.17	-22.39	422.57	0.947	Level 1	
15,900.00	7,935.90	15,752.32	7,888.98	217.04	216.23	-83.27	1,601.99	-8,191.69	400.17	-27.68	427.85	0.935	Level 1	
16,000.00	7,935.89	15,852.32	7,888.98	219.69	218.89	-83.27	1,602.43	-8,291.69	400.17	-32.97	433.15	0.924	Level 1	
16,100.00	7,935.89	15,952.32	7,888.98	222.34	221.54	-83.27	1,602.87	-8,391.69	400.17	-38.26	438.44	0.913	Level 1	
16,200.00	7,935.89	16,052.32	7,888.98	224.99	224.20	-83.27	1,603.31	-8,491.69	400.17	-43.56	443.73	0.902	Level 1	
16,300.00	7,935.89	16,152.32	7,888.98	227.64	226.86	-83.27	1,603.75	-8,591.69	400.17	-48.85	449.03	0.891	Level 1	
16,400.00	7,935.89	16,252.32	7,888.98	230.29	229.52	-83.27	1,604.19	-8,691.69	400.17	-54.15	454.32	0.881	Level 1	
16,500.00	7,935.89	16,352.32	7,888.98	232.94	232.18	-83.27	1,604.63	-8,791.69	400.17	-59.44	459.62	0.871	Level 1	
16,600.00	7,935.89	16,452.32	7,888.98	235.60	234.84	-83.27	1,605.07	-8,891.68	400.17	-64.74	464.92	0.861	Level 1	
16,700.00	7,935.88	16,552.32	7,888.98	238.25	237.50	-83.27	1,605.51	-8,991.68	400.17	-70.04	470.22	0.851	Level 1	
16,800.00	7,935.88	16,652.32	7,888.98	240.91	240.16	-83.27	1,605.95	-9,091.68	400.17	-75.34	475.52	0.842	Level 1	
16,900.00	7,935.88	16,752.32	7,888.98	243.56	242.82	-83.27	1,606.39	-9,191.68	400.17	-80.65	480.82	0.832	Level 1	
17,000.00	7,935.88	16,852.32	7,888.99	246.22	245.48	-83.27	1,606.83	-9,291.68	400.17	-85.95	486.12	0.823	Level 1	
17,100.00	7,935.88	16,952.32	7,888.99	248.88	248.14	-83.27	1,607.27	-9,391.68	400.17	-91.25	491.42	0.814	Level 1	
17,200.00	7,935.88	17,052.32	7,888.99	251.54	250.81	-83.27	1,607.71	-9,491.68	400.17	-96.56	496.73	0.806	Level 1	
17,300.00	7,935.88	17,152.32	7,888.99	254.20	253.47	-83.27	1,608.15	-9,591.68	400.17	-101.86	502.03	0.797	Level 1	
17,400.00	7,935.87	17,252.32	7,888.99	256.86	256.14	-83.27	1,608.60	-9,691.68	400.16	-107.17	507.34	0.789	Level 1	
17,500.00	7,935.87	17,352.32	7,888.99	259.52	258.80	-83.27	1,609.04	-9,791.68	400.16	-112.48	512.64	0.781	Level 1	
17,600.00	7,935.87	17,452.32	7,888.99	262.18	261.47	-83.27	1,609.48	-9,891.68	400.16	-117.79	517.95	0.773	Level 1	
17,700.00	7,935.87	17,552.32	7,888.99	264.84	264.14	-83.27	1,609.92	-9,991.68	400.16	-123.10	523.26	0.765	Level 1	
17,800.00	7,935.87	17,652.33	7,888.99	267.50	266.80	-83.27	1,610.36	-10,091.68	400.16	-128.41	528.57	0.757	Level 1	
17,900.00	7,935.87	17,752.33	7,889.00	270.17	269.47	-83.27	1,610.80	-10,191.68	400.15	-133.72	533.88	0.750	Level 1	
18,000.00	7,935.87	17,852.33	7,889.00	272.83	272.14	-83.27	1,611.25	-10,291.68	400.15	-139.03	539.19	0.742	Level 1	
18,100.00	7,935.86	17,952.33	7,889.00	275.49	274.80	-83.27	1,611.69	-10,391.68	400.15	-144.35	544.50	0.735	Level 1	
18,200.00	7,935.86	18,052.33	7,889.00	278.16	277.47	-83.27	1,612.13	-10,491.68	400.15	-149.66	549.81	0.728	Level 1	
18,239.20	7,936.00	18,091.52	7,889.00	279.20	278.52	-83.25	1,612.30	-10,530.87	399.82	-152.04	551.86	0.724	Level 1, ES, SF	

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	-90.00	0.00	-36.56	36.56					
100.00	100.00	100.00	100.00	0.13	0.13	-90.00	0.00	-36.56	36.56	36.29	0.27	135.993		
200.00	200.00	200.00	200.00	0.49	0.49	-90.00	0.00	-36.56	36.56	35.58	0.99	37.089		
300.00	299.98	300.02	299.98	0.85	0.85	-84.80	0.00	-36.56	36.36	34.66	1.70	21.358		
369.98	369.88	369.88	369.88	1.11	1.10	-90.00	0.00	-36.56	36.21	34.01	2.21	16.416 CC		
400.00	399.84	400.16	399.84	1.22	1.21	-93.05	0.00	-36.56	36.26	33.84	2.42	14.966 ES		
500.00	499.45	500.55	499.45	1.59	1.57	-106.31	0.00	-36.56	37.75	34.59	3.15	11.965		
600.00	598.70	598.70	598.70	1.97	1.92	-121.99	0.00	-36.56	42.81	38.92	3.89	11.005		
700.00	697.47	698.67	698.65	2.38	2.28	-135.09	1.66	-36.90	51.71	47.08	4.63	11.161		
800.00	795.62	799.14	798.98	2.82	2.64	-143.89	6.78	-37.95	62.62	57.24	5.38	11.646		
900.00	893.06	900.11	899.56	3.29	3.01	-149.84	15.39	-39.71	74.65	68.52	6.12	12.188		
1,000.00	989.64	1,001.58	1,000.27	3.79	3.39	-153.97	27.53	-42.20	87.32	80.44	6.88	12.694		
1,081.03	1,067.21	1,084.18	1,081.88	4.23	3.71	-156.42	39.99	-44.75	97.87	90.37	7.50	13.053		
1,100.00	1,085.29	1,103.58	1,100.99	4.34	3.78	-156.91	43.25	-45.42	100.30	92.66	7.64	13.122		
1,200.00	1,180.60	1,204.86	1,200.44	4.91	4.20	-158.73	62.05	-49.27	111.59	103.18	8.42	13.257		
1,300.00	1,275.90	1,304.24	1,297.89	5.49	4.62	-160.07	81.11	-53.18	122.40	113.19	9.20	13.301		
1,400.00	1,371.21	1,403.62	1,395.35	6.07	5.05	-161.18	100.16	-57.08	133.26	123.27	9.99	13.338		
1,500.00	1,466.52	1,503.00	1,492.80	6.66	5.49	-162.13	119.22	-60.98	144.16	133.38	10.78	13.371		
1,600.00	1,561.83	1,602.37	1,590.26	7.26	5.94	-162.95	138.27	-64.89	155.09	143.52	11.57	13.400		
1,700.00	1,657.14	1,701.75	1,687.71	7.85	6.39	-163.66	157.33	-68.79	166.05	153.69	12.37	13.426		
1,800.00	1,752.44	1,801.13	1,785.17	8.45	6.84	-164.28	176.39	-72.70	177.04	163.88	13.16	13.449		
1,900.00	1,847.75	1,900.51	1,882.62	9.05	7.30	-164.83	195.44	-76.60	188.04	174.08	13.96	13.470		
2,000.00	1,943.06	1,999.89	1,980.08	9.66	7.76	-165.31	214.50	-80.50	199.06	184.30	14.76	13.490		
2,100.00	2,038.37	2,099.26	2,077.54	10.26	8.22	-165.75	233.56	-84.41	210.09	194.53	15.55	13.507		
2,200.00	2,133.68	2,201.36	2,174.99	10.86	8.69	-166.14	252.61	-88.31	221.13	204.77	16.36	13.514		
2,300.00	2,228.99	2,301.98	2,272.45	11.47	9.16	-166.50	271.67	-92.21	232.18	215.01	17.17	13.525		
2,400.00	2,324.29	2,402.60	2,369.90	12.08	9.63	-166.82	290.72	-96.12	243.24	225.27	17.97	13.535		
2,500.00	2,419.60	2,496.77	2,467.36	12.68	10.07	-167.12	309.78	-100.02	254.30	235.55	18.75	13.563		
2,600.00	2,514.91	2,603.85	2,564.81	13.29	10.58	-167.39	328.84	-103.93	265.37	245.79	19.58	13.554		
2,700.00	2,610.22	2,704.47	2,662.27	13.90	11.05	-167.64	347.89	-107.83	276.45	256.07	20.38	13.562		
2,800.00	2,705.53	2,794.91	2,759.72	14.51	11.48	-167.87	366.95	-111.73	287.53	266.38	21.15	13.595		
2,900.00	2,800.83	2,905.71	2,857.18	15.12	12.00	-168.08	386.01	-115.64	298.62	276.62	22.00	13.576		
3,000.00	2,896.14	3,006.34	2,954.63	15.73	12.48	-168.28	405.06	-119.54	309.71	286.91	22.80	13.583		
3,100.00	2,991.45	3,106.96	3,052.09	16.34	12.95	-168.46	424.12	-123.44	320.80	297.19	23.61	13.589		
3,200.00	3,086.76	3,207.58	3,149.55	16.95	13.43	-168.63	443.18	-127.35	331.90	307.48	24.41	13.594		
3,300.00	3,182.07	3,308.20	3,247.00	17.56	13.91	-168.79	462.23	-131.25	342.99	317.77	25.22	13.600		
3,400.00	3,277.38	3,408.83	3,344.46	18.17	14.38	-168.94	481.29	-135.15	354.10	328.07	26.03	13.605		
3,500.00	3,372.68	3,490.55	3,441.91	18.78	14.77	-169.08	500.34	-139.06	365.20	338.44	26.76	13.647		
3,600.00	3,467.99	3,589.93	3,539.37	19.39	15.24	-169.21	519.40	-142.96	376.30	348.74	27.56	13.653		
3,700.00	3,563.30	3,689.31	3,636.82	20.00	15.72	-169.34	538.46	-146.87	387.41	359.05	28.37	13.658		
3,800.00	3,658.61	3,788.69	3,734.28	20.61	16.19	-169.46	557.51	-150.77	398.52	369.35	29.17	13.663		
3,900.00	3,753.92	3,888.06	3,831.73	21.22	16.66	-169.57	576.57	-154.67	409.63	379.66	29.97	13.668		
4,000.00	3,849.22	3,987.44	3,929.19	21.83	17.13	-169.68	595.63	-158.58	420.74	389.97	30.77	13.673		
4,100.00	3,944.53	4,086.82	4,026.64	22.45	17.61	-169.78	614.68	-162.48	431.86	400.28	31.58	13.677		
4,200.00	4,039.84	4,186.20	4,124.10	23.06	18.08	-169.87	633.74	-166.38	442.97	410.59	32.38	13.681		
4,300.00	4,135.15	4,285.57	4,221.55	23.67	18.55	-169.96	652.79	-170.29	454.09	420.91	33.18	13.685		
4,400.00	4,230.46	4,384.95	4,319.01	24.28	19.03	-170.05	671.85	-174.19	465.20	431.22	33.98	13.689		
4,500.00	4,325.77	4,484.33	4,416.47	24.89	19.50	-170.13	690.91	-178.10	476.32	441.53	34.79	13.692		
4,600.00	4,421.07	4,583.71	4,513.92	25.51	19.98	-170.21	709.96	-182.00	487.44	451.85	35.59	13.696		
4,700.00	4,516.38	4,683.09	4,611.38	26.12	20.45	-170.29	729.02	-185.90	498.56	462.17	36.39	13.699		
4,800.00	4,611.69	4,782.46	4,708.83	26.73	20.92	-170.36	748.08	-189.81	509.68	472.48	37.20	13.702		
4,900.00	4,707.00	4,881.84	4,806.29	27.34	21.40	-170.43	767.13	-193.71	520.80	482.80	38.00	13.705		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.00	4,802.31	4,981.22	4,903.74	27.95	21.87	-170.49	786.19	-197.61	531.92	493.12	38.80	13.708		
5,100.00	4,897.61	5,080.60	5,001.20	28.57	22.35	-170.55	805.24	-201.52	543.05	503.44	39.61	13.711		
5,200.00	4,992.92	5,179.97	5,098.65	29.18	22.82	-170.62	824.30	-205.42	554.17	513.76	40.41	13.713		
5,300.00	5,088.23	5,279.35	5,196.11	29.79	23.29	-170.67	843.36	-209.33	565.29	524.08	41.21	13.716		
5,400.00	5,183.54	5,378.73	5,293.56	30.40	23.77	-170.73	862.41	-213.23	576.42	534.40	42.02	13.718		
5,500.00	5,278.85	5,478.11	5,391.02	31.01	24.24	-170.78	881.47	-217.13	587.54	544.72	42.82	13.721		
5,600.00	5,374.15	5,577.49	5,488.48	31.63	24.72	-170.84	900.53	-221.04	598.67	555.04	43.63	13.723		
5,700.00	5,469.46	5,676.86	5,585.93	32.24	25.19	-170.89	919.58	-224.94	609.79	565.36	44.43	13.725		
5,800.00	5,564.77	5,776.24	5,683.39	32.85	25.67	-170.93	938.64	-228.84	620.92	575.69	45.23	13.727		
5,900.00	5,660.08	5,875.62	5,780.84	33.46	26.14	-170.98	957.70	-232.75	632.05	586.01	46.04	13.729		
6,000.00	5,755.39	5,975.00	5,878.30	34.08	26.62	-171.03	976.75	-236.65	643.17	596.33	46.84	13.731		
6,100.00	5,850.70	6,074.37	5,975.75	34.69	27.09	-171.07	995.81	-240.55	654.30	606.66	47.65	13.733		
6,200.00	5,946.00	6,173.75	6,073.21	35.30	27.57	-171.11	1,014.86	-244.46	665.43	616.98	48.45	13.735		
6,300.00	6,041.31	6,273.13	6,170.66	35.91	28.04	-171.15	1,033.92	-248.36	676.56	627.30	49.25	13.736		
6,400.00	6,136.62	6,372.51	6,268.12	36.53	28.52	-171.19	1,052.98	-252.27	687.69	637.63	50.06	13.738		
6,500.00	6,231.93	6,471.89	6,365.57	37.14	28.99	-171.23	1,072.03	-256.17	698.81	647.95	50.86	13.740		
6,600.00	6,327.24	6,571.26	6,463.03	37.75	29.47	-171.26	1,091.09	-260.07	709.94	658.28	51.67	13.741		
6,700.00	6,422.54	6,670.64	6,560.48	38.37	29.94	-171.30	1,110.15	-263.98	721.07	668.60	52.47	13.743		
6,745.38	6,465.79	6,713.01	6,602.04	38.64	30.15	-171.32	1,118.25	-265.64	726.15	673.33	52.82	13.748		
6,800.00	6,518.01	6,766.47	6,644.75	38.97	30.35	-171.35	1,126.11	-267.25	732.32	679.15	53.18	13.771		
6,900.00	6,614.35	6,835.90	6,723.11	39.54	30.70	-171.42	1,138.82	-269.85	743.06	689.26	53.80	13.812		
7,000.00	6,711.57	6,915.16	6,801.63	40.06	31.03	-171.49	1,149.38	-272.01	753.05	698.69	54.37	13.851		
7,100.00	6,809.55	6,994.26	6,880.27	40.53	31.34	-171.56	1,157.80	-273.74	762.30	707.42	54.88	13.889		
7,200.00	6,908.17	7,073.23	6,958.97	40.96	31.62	-171.63	1,164.07	-275.02	770.80	715.46	55.34	13.927		
7,300.00	7,007.30	7,152.07	7,037.69	41.35	31.88	-171.69	1,168.22	-275.87	778.55	722.80	55.75	13.965		
7,400.00	7,106.83	7,230.79	7,116.39	41.69	32.12	-171.76	1,170.23	-276.29	785.53	729.42	56.11	14.001		
7,500.00	7,206.63	7,321.04	7,206.62	41.98	32.38	-171.79	1,170.45	-276.86	791.34	734.74	56.61	13.980		
7,600.00	7,306.59	7,419.22	7,303.88	42.23	32.67	-170.92	1,170.51	-289.44	794.09	736.74	57.34	13.848		
7,626.41	7,333.00	7,444.21	7,328.17	42.29	32.74	-178.43	1,170.53	-295.29	794.33	736.78	57.55	13.803		
7,656.41	7,363.00	7,471.91	7,354.77	42.35	32.83	-177.87	1,170.57	-303.00	794.57	736.79	57.78	13.751		
7,700.00	7,406.55	7,511.20	7,391.80	42.45	32.96	-87.22	1,170.63	-316.12	795.13	737.01	58.12	13.681		
7,750.00	7,456.18	7,555.39	7,432.26	42.56	33.11	-86.22	1,170.70	-333.87	795.99	737.51	58.48	13.610		
7,800.00	7,505.10	7,598.73	7,470.49	42.68	33.26	-85.24	1,170.79	-354.25	797.07	738.24	58.84	13.547		
7,850.00	7,552.93	7,641.31	7,506.45	42.81	33.41	-84.30	1,170.89	-377.04	798.34	739.16	59.18	13.491		
7,900.00	7,599.32	7,683.20	7,540.08	42.94	33.56	-83.40	1,171.00	-401.99	799.74	740.25	59.50	13.441		
7,950.00	7,643.91	7,724.47	7,571.34	43.08	33.72	-82.55	1,171.12	-428.92	801.26	741.45	59.81	13.397		
8,000.00	7,686.37	7,765.20	7,600.22	43.22	33.88	-81.74	1,171.25	-457.63	802.83	742.73	60.10	13.357		
8,050.00	7,726.36	7,805.44	7,626.67	43.37	34.05	-80.99	1,171.38	-487.94	804.43	744.04	60.39	13.320		
8,100.00	7,763.59	7,845.25	7,650.69	43.53	34.23	-80.30	1,171.52	-519.69	806.01	745.33	60.69	13.281		
8,150.00	7,797.77	7,884.68	7,672.24	43.69	34.42	-79.67	1,171.66	-552.70	807.55	746.55	61.00	13.239		
8,200.00	7,828.65	7,923.79	7,691.33	43.86	34.62	-79.11	1,171.81	-586.82	808.99	747.67	61.32	13.192		
8,250.00	7,855.98	7,962.62	7,707.94	44.05	34.85	-78.61	1,171.97	-621.92	810.32	748.64	61.68	13.138		
8,300.00	7,879.55	8,000.00	7,721.65	44.25	35.08	-78.19	1,172.12	-656.68	811.50	749.48	62.03	13.083		
8,350.00	7,899.20	8,039.62	7,733.66	44.47	35.34	-77.83	1,172.29	-694.42	812.51	749.98	62.52	12.995		
8,400.00	7,914.77	8,077.86	7,742.77	44.71	35.63	-77.55	1,172.45	-731.56	813.32	750.29	63.03	12.903		
8,450.00	7,926.14	8,115.99	7,749.36	44.98	35.93	-77.34	1,172.61	-769.11	813.93	750.32	63.61	12.796		
8,500.00	7,933.22	8,154.04	7,753.43	45.26	36.26	-77.21	1,172.78	-806.93	814.32	750.07	64.25	12.674		
8,550.00	7,935.96	8,192.05	7,754.98	45.58	36.62	-77.16	1,172.95	-844.90	814.47	749.51	64.97	12.537		
8,556.48	7,936.00	8,197.13	7,755.00	45.62	36.67	-77.16	1,172.97	-849.98	814.48	749.41	65.07	12.517		
8,600.00	7,936.00	8,240.65	7,755.00	45.92	37.11	-77.16	1,173.16	-893.50	814.48	748.31	66.16	12.310		
8,700.00	7,936.00	8,340.65	7,755.00	46.70	38.26	-77.16	1,173.60	-993.50	814.48	745.62	68.86	11.828		
8,800.00	7,936.00	8,440.65	7,755.00	47.61	39.57	-77.16	1,174.04	-1,093.49	814.48	742.64	71.84	11.338		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Sec 4-T4S-R65W - JAMASO 4-65 5-6-3 - ORIGINAL WELLBORE - PROPOSAL 1		Offset Site Error:		0.00 usft										
Survey Program: 0-MWD OWSG													Offset Well Error:		0.00 usft												
Reference		Offset		Semi Major Axis			Distance							Warning													
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor															
8,900.00	7,936.00	8,540.65	7,755.00	48.66	41.03	-77.16	1,174.48	-1,193.49	814.48	739.41	75.07	10.850															
9,000.00	7,935.99	8,640.65	7,754.99	49.84	42.64	-77.16	1,174.92	-1,293.49	814.48	735.96	78.52	10.373															
9,100.00	7,935.99	8,740.65	7,754.99	51.16	44.36	-77.16	1,175.36	-1,393.49	814.48	732.33	82.16	9.914															
9,200.00	7,935.99	8,840.65	7,754.99	52.60	46.18	-77.16	1,175.80	-1,493.49	814.48	728.52	85.96	9.475															
9,300.00	7,935.99	8,940.65	7,754.99	54.16	48.10	-77.16	1,176.24	-1,593.49	814.48	724.57	89.92	9.058															
9,400.00	7,935.99	9,040.65	7,754.99	55.82	50.09	-77.16	1,176.68	-1,693.49	814.48	720.49	94.00	8.665															
															9,500.00	7,935.99	9,140.65	7,754.99	57.58	52.15	-77.16	1,177.11	-1,793.49	814.48	716.30	98.19	8.295
															9,600.00	7,935.99	9,240.65	7,754.99	59.43	54.27	-77.16	1,177.55	-1,893.49	814.49	712.01	102.48	7.948
															9,700.00	7,935.98	9,340.65	7,754.99	61.36	56.44	-77.16	1,177.99	-1,993.49	814.49	707.63	106.85	7.622
															9,800.00	7,935.98	9,440.65	7,754.99	63.35	58.66	-77.16	1,178.43	-2,093.49	814.49	703.18	111.31	7.318
9,900.00	7,935.98	9,540.65	7,754.98	65.40	60.92	-77.16	1,178.87	-2,193.48	814.49	698.66	115.83	7.032															
10,000.00	7,935.98	9,640.65	7,754.98	67.50	63.21	-77.16	1,179.31	-2,293.48	814.49	694.08	120.41	6.765															
10,100.00	7,935.98	9,740.65	7,754.98	69.66	65.54	-77.16	1,179.75	-2,393.48	814.49	689.45	125.04	6.514															
10,200.00	7,935.98	9,840.65	7,754.98	71.85	67.89	-77.16	1,180.19	-2,493.48	814.49	684.77	129.72	6.279															
10,300.00	7,935.98	9,940.65	7,754.98	74.08	70.27	-77.16	1,180.63	-2,593.48	814.49	680.05	134.44	6.058															
10,400.00	7,935.97	10,040.65	7,754.98	76.35	72.67	-77.16	1,181.07	-2,693.48	814.49	675.29	139.20	5.851															
10,500.00	7,935.97	10,140.65	7,754.98	78.64	75.09	-77.16	1,181.51	-2,793.48	814.49	670.50	143.99	5.656															
10,600.00	7,935.97	10,240.65	7,754.98	80.97	77.53	-77.16	1,181.95	-2,893.48	814.49	665.67	148.82	5.473															
10,700.00	7,935.97	10,340.65	7,754.97	83.32	79.98	-77.16	1,182.39	-2,993.48	814.49	660.82	153.67	5.300															
10,800.00	7,935.97	10,440.65	7,754.97	85.69	82.45	-77.16	1,182.82	-3,093.48	814.50	655.94	158.55	5.137															
10,900.00	7,935.97	10,540.65	7,754.97	88.08	84.94	-77.16	1,183.26	-3,193.47	814.50	651.04	163.45	4.983															
11,000.00	7,935.97	10,640.65	7,754.97	90.49	87.44	-77.16	1,183.70	-3,293.47	814.50	646.12	168.38	4.837															
11,100.00	7,935.96	10,740.65	7,754.97	92.91	89.94	-77.16	1,184.14	-3,393.47	814.50	641.18	173.32	4.699															
11,200.00	7,935.96	10,840.65	7,754.97	95.35	92.46	-77.16	1,184.58	-3,493.47	814.50	636.22	178.28	4.569															
11,300.00	7,935.96	10,940.65	7,754.97	97.81	94.99	-77.16	1,185.02	-3,593.47	814.50	631.24	183.26	4.445															
11,400.00	7,935.96	11,040.65	7,754.97	100.28	97.53	-77.16	1,185.46	-3,693.47	814.50	626.25	188.25	4.327															
11,500.00	7,935.96	11,140.65	7,754.97	102.76	100.07	-77.16	1,185.90	-3,793.47	814.50	621.24	193.26	4.215															
11,600.00	7,935.96	11,240.65	7,754.96	105.25	102.62	-77.16	1,186.34	-3,893.47	814.50	616.23	198.28	4.108															
11,700.00	7,935.96	11,340.65	7,754.96	107.75	105.18	-77.16	1,186.78	-3,993.47	814.50	611.20	203.31	4.006															
11,800.00	7,935.95	11,440.65	7,754.96	110.26	107.75	-77.16	1,187.22	-4,093.47	814.50	606.15	208.35	3.909															
11,900.00	7,935.95	11,540.65	7,754.96	112.78	110.32	-77.16	1,187.66	-4,193.47	814.50	601.10	213.40	3.817															
12,000.00	7,935.95	11,640.65	7,754.96	115.31	112.90	-77.16	1,188.10	-4,293.46	814.51	596.04	218.46	3.728															
12,100.00	7,935.95	11,740.65	7,754.96	117.84	115.48	-77.16	1,188.53	-4,393.46	814.51	590.97	223.53	3.644															
12,200.00	7,935.95	11,840.65	7,754.96	120.39	118.07	-77.16	1,188.97	-4,493.46	814.51	585.89	228.61	3.563															
12,300.00	7,935.95	11,940.65	7,754.96	122.94	120.66	-77.16	1,189.41	-4,593.46	814.51	580.81	233.70	3.485															
12,400.00	7,935.95	12,040.65	7,754.95	125.49	123.26	-77.16	1,189.85	-4,693.46	814.51	575.72	238.79	3.411															
12,500.00	7,935.94	12,140.65	7,754.95	128.05	125.86	-77.16	1,190.29	-4,793.46	814.51	570.62	243.89	3.340															
12,600.00	7,935.94	12,240.65	7,754.95	130.62	128.46	-77.16	1,190.73	-4,893.46	814.51	565.51	249.00	3.271															
12,700.00	7,935.94	12,340.65	7,754.95	133.19	131.07	-77.16	1,191.17	-4,993.46	814.51	560.40	254.11	3.205															
12,800.00	7,935.94	12,440.65	7,754.95	135.77	133.68	-77.16	1,191.61	-5,093.46	814.51	555.28	259.23	3.142															
12,900.00	7,935.94	12,540.65	7,754.95	138.35	136.30	-77.16	1,192.05	-5,193.46	814.51	550.16	264.36	3.081															
13,000.00	7,935.94	12,640.65	7,754.95	140.93	138.91	-77.16	1,192.49	-5,293.45	814.51	545.03	269.49	3.022															
13,100.00	7,935.94	12,740.65	7,754.95	143.52	141.53	-77.16	1,192.93	-5,393.45	814.52	539.90	274.62	2.966															
13,200.00	7,935.93	12,840.65	7,754.94	146.11	144.15	-77.16	1,193.37	-5,493.45	814.52	534.76	279.76	2.912															
13,300.00	7,935.93	12,940.65	7,754.94	148.71	146.78	-77.16	1,193.81	-5,593.45	814.52	529.62	284.90	2.859															
13,400.00	7,935.93	13,040.65	7,754.94	151.31	149.41	-77.16	1,194.24	-5,693.45	814.52	524.47	290.05	2.808															
13,500.00	7,935.93	13,140.65	7,754.94	153.91	152.04	-77.16	1,194.68	-5,793.45	814.52	519.32	295.20	2.759															
13,600.00	7,935.93	13,240.65	7,754.94	156.52	154.67	-77.16	1,195.12	-5,893.45	814.52	514.17	300.35	2.712															
13,700.00	7,935.93	13,340.65	7,754.94	159.13	157.30	-77.16	1,195.56	-5,993.45	814.52	509.01	305.51	2.666															
13,800.00	7,935.93	13,440.65	7,754.94	161.74	159.94	-77.16	1,196.00	-6,093.45	814.52	503.85	310.67	2.622															
13,900.00	7,935.92	13,540.65	7,754.94	164.35	162.57	-77.16	1,196.44	-6,193.45	814.52	498.69	315.83	2.579															
14,000.00	7,935.92	13,640.65	7,754.94	166.97	165.21	-77.16	1,196.88	-6,293.44	814.52	493.52	321.00	2.537															

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-3 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,100.00	7,935.92	13,740.65	7,754.93	169.59	167.85	-77.16	1,197.32	-6,393.44	814.52	488.36	326.17	2.497		
14,200.00	7,935.92	13,840.65	7,754.93	172.21	170.49	-77.16	1,197.76	-6,493.44	814.52	483.18	331.34	2.458		
14,300.00	7,935.92	13,940.65	7,754.93	174.84	173.14	-77.16	1,198.20	-6,593.44	814.53	478.01	336.51	2.420		
14,400.00	7,935.92	14,040.65	7,754.93	177.46	175.78	-77.16	1,198.64	-6,693.44	814.53	472.83	341.69	2.384		
14,500.00	7,935.92	14,140.65	7,754.93	180.09	178.43	-77.16	1,199.08	-6,793.44	814.53	467.66	346.87	2.348		
14,600.00	7,935.91	14,240.65	7,754.93	182.72	181.08	-77.16	1,199.52	-6,893.44	814.53	462.48	352.05	2.314		
14,700.00	7,935.91	14,340.65	7,754.93	185.35	183.73	-77.16	1,199.95	-6,993.44	814.53	457.29	357.24	2.280		
14,800.00	7,935.91	14,440.65	7,754.93	187.98	186.38	-77.16	1,200.39	-7,093.44	814.53	452.11	362.42	2.247		
14,900.00	7,935.91	14,540.65	7,754.92	190.62	189.03	-77.16	1,200.83	-7,193.44	814.53	446.92	367.61	2.216		
15,000.00	7,935.91	14,640.65	7,754.92	193.25	191.68	-77.16	1,201.27	-7,293.44	814.53	441.73	372.80	2.185		
15,100.00	7,935.91	14,740.65	7,754.92	195.89	194.33	-77.16	1,201.71	-7,393.43	814.53	436.54	377.99	2.155		
15,200.00	7,935.91	14,840.65	7,754.92	198.53	196.99	-77.16	1,202.15	-7,493.43	814.53	431.35	383.18	2.126		
15,300.00	7,935.90	14,940.65	7,754.92	201.17	199.64	-77.16	1,202.59	-7,593.43	814.53	426.16	388.38	2.097		
15,400.00	7,935.90	15,040.65	7,754.92	203.81	202.30	-77.16	1,203.03	-7,693.43	814.53	420.96	393.57	2.070		
15,500.00	7,935.90	15,140.65	7,754.92	206.45	204.95	-77.16	1,203.47	-7,793.43	814.54	415.76	398.77	2.043		
15,600.00	7,935.90	15,240.65	7,754.92	209.10	207.61	-77.16	1,203.91	-7,893.43	814.54	410.57	403.97	2.016		
15,700.00	7,935.90	15,340.65	7,754.92	211.74	210.27	-77.16	1,204.35	-7,993.43	814.54	405.37	409.17	1.991		
15,800.00	7,935.90	15,440.65	7,754.91	214.39	212.93	-77.16	1,204.79	-8,093.43	814.54	400.16	414.37	1.966		
15,900.00	7,935.90	15,540.65	7,754.91	217.04	215.59	-77.16	1,205.23	-8,193.43	814.54	394.96	419.58	1.941		
16,000.00	7,935.89	15,640.65	7,754.91	219.69	218.25	-77.16	1,205.66	-8,293.43	814.54	389.76	424.78	1.918		
16,100.00	7,935.89	15,740.65	7,754.91	222.34	220.91	-77.16	1,206.10	-8,393.42	814.54	384.55	429.99	1.894		
16,200.00	7,935.89	15,840.65	7,754.91	224.99	223.57	-77.16	1,206.54	-8,493.42	814.54	379.35	435.19	1.872		
16,300.00	7,935.89	15,940.65	7,754.91	227.64	226.24	-77.16	1,206.98	-8,593.42	814.54	374.14	440.40	1.850		
16,400.00	7,935.89	16,040.65	7,754.91	230.29	228.90	-77.16	1,207.42	-8,693.42	814.54	368.93	445.61	1.828		
16,500.00	7,935.89	16,140.65	7,754.91	232.94	231.57	-77.16	1,207.86	-8,793.42	814.54	363.72	450.82	1.807		
16,600.00	7,935.89	16,240.65	7,754.90	235.60	234.23	-77.16	1,208.30	-8,893.42	814.55	358.51	456.03	1.786		
16,700.00	7,935.88	16,340.65	7,754.90	238.25	236.90	-77.16	1,208.74	-8,993.42	814.55	353.30	461.24	1.766		
16,800.00	7,935.88	16,440.65	7,754.90	240.91	239.56	-77.16	1,209.18	-9,093.42	814.55	348.09	466.46	1.746		
16,900.00	7,935.88	16,540.65	7,754.90	243.56	242.23	-77.16	1,209.62	-9,193.42	814.55	342.88	471.67	1.727		
17,000.00	7,935.88	16,640.65	7,754.90	246.22	244.90	-77.16	1,210.06	-9,293.42	814.55	337.66	476.89	1.708		
17,100.00	7,935.88	16,740.65	7,754.90	248.88	247.56	-77.16	1,210.50	-9,393.42	814.55	332.45	482.10	1.690		
17,200.00	7,935.88	16,840.65	7,754.90	251.54	250.23	-77.16	1,210.94	-9,493.41	814.55	327.23	487.32	1.671		
17,300.00	7,935.88	16,940.65	7,754.90	254.20	252.90	-77.16	1,211.37	-9,593.41	814.55	322.02	492.54	1.654		
17,400.00	7,935.87	17,040.65	7,754.89	256.86	255.57	-77.16	1,211.81	-9,693.41	814.55	316.80	497.75	1.636		
17,500.00	7,935.87	17,140.65	7,754.89	259.52	258.24	-77.16	1,212.25	-9,793.41	814.55	311.58	502.97	1.619		
17,600.00	7,935.87	17,240.65	7,754.89	262.18	260.91	-77.16	1,212.69	-9,893.41	814.55	306.36	508.19	1.603		
17,700.00	7,935.87	17,340.65	7,754.89	264.84	263.58	-77.16	1,213.13	-9,993.41	814.55	301.14	513.41	1.587		
17,800.00	7,935.87	17,440.65	7,754.89	267.50	266.25	-77.16	1,213.57	-10,093.41	814.56	295.92	518.63	1.571		
17,900.00	7,935.87	17,540.65	7,754.89	270.17	268.92	-77.16	1,214.01	-10,193.41	814.56	290.70	523.86	1.555		
18,000.00	7,935.87	17,640.65	7,754.89	272.83	271.59	-77.16	1,214.45	-10,293.41	814.56	285.48	529.08	1.540		
18,100.00	7,935.86	17,740.65	7,754.89	275.49	274.26	-77.16	1,214.89	-10,393.41	814.56	280.26	534.30	1.525		
18,200.00	7,935.86	17,838.39	7,754.94	278.16	276.87	-77.17	1,215.20	-10,491.15	814.67	275.28	539.39	1.510		
18,236.69	7,935.86	17,875.07	7,754.99	279.13	277.85	-77.17	1,215.24	-10,527.83	814.77	273.46	541.32	1.505		
18,239.20	7,936.00	17,877.58	7,755.00	279.20	277.92	-77.16	1,215.24	-10,530.34	814.47	273.06	541.42	1.504 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	-90.00	0.00	-56.25	56.25					
100.00	100.00	100.00	100.00	0.13	0.13	-90.00	0.00	-56.25	56.25	55.98	0.27	209.221		
200.00	200.00	200.00	200.00	0.49	0.49	-90.00	0.00	-56.25	56.25	55.26	0.99	57.060		
300.00	299.98	300.02	299.98	0.85	0.85	-83.85	0.00	-56.25	56.04	54.33	1.70	32.913		
400.00	399.84	400.16	399.84	1.22	1.21	-89.20	0.00	-56.25	55.72	53.29	2.42	22.995		
410.85	410.66	410.66	410.66	1.26	1.25	-90.00	0.00	-56.25	55.71	53.21	2.50	22.277	CC	
500.00	499.45	500.55	499.45	1.59	1.57	-98.06	0.00	-56.25	56.28	53.12	3.15	17.840	ES	
600.00	598.70	601.30	598.70	1.97	1.93	-109.68	0.00	-56.25	59.24	55.33	3.90	15.181		
700.00	697.47	702.53	697.47	2.38	2.29	-122.30	0.00	-56.25	66.21	61.54	4.66	14.201		
800.00	795.62	795.62	795.62	2.82	2.63	-133.92	0.00	-56.25	78.18	72.79	5.39	14.496		
900.00	893.06	895.32	895.30	3.29	2.99	-142.94	1.53	-56.68	94.20	88.06	6.14	15.339		
1,000.00	989.64	995.81	995.66	3.79	3.35	-149.07	6.44	-58.07	112.13	105.24	6.89	16.267		
1,081.03	1,067.21	1,077.79	1,077.36	4.23	3.64	-152.61	12.95	-59.92	127.51	120.00	7.51	16.981		
1,100.00	1,085.29	1,097.07	1,096.54	4.34	3.71	-153.32	14.81	-60.44	131.13	123.48	7.66	17.130		
1,200.00	1,180.60	1,198.38	1,197.11	4.91	4.09	-156.06	26.51	-63.76	148.80	140.38	8.42	17.679		
1,300.00	1,275.90	1,303.22	1,294.67	5.49	4.48	-157.99	38.81	-67.24	165.85	156.65	9.20	18.018		
1,400.00	1,371.21	1,404.83	1,392.23	6.07	4.87	-159.55	51.12	-70.73	183.05	173.07	9.98	18.336		
1,500.00	1,466.52	1,506.43	1,489.80	6.66	5.27	-160.84	63.43	-74.22	200.37	189.60	10.76	18.616		
1,600.00	1,561.83	1,608.03	1,587.36	7.26	5.67	-161.93	75.74	-77.70	217.76	206.22	11.55	18.862		
1,700.00	1,657.14	1,709.63	1,684.92	7.85	6.07	-162.85	88.05	-81.19	235.22	222.90	12.33	19.081		
1,800.00	1,752.44	1,788.76	1,782.48	8.45	6.38	-163.65	100.36	-84.68	252.74	239.71	13.03	19.399		
1,900.00	1,847.75	1,887.16	1,880.05	9.05	6.78	-164.35	112.67	-88.16	270.29	256.49	13.80	19.585		
2,000.00	1,943.06	1,985.56	1,977.61	9.66	7.17	-164.96	124.98	-91.65	287.88	273.30	14.57	19.752		
2,100.00	2,038.37	2,083.96	2,075.17	10.26	7.57	-165.50	137.29	-95.14	305.49	290.15	15.35	19.904		
2,200.00	2,133.68	2,182.35	2,172.73	10.86	7.96	-165.98	149.60	-98.62	323.13	307.01	16.12	20.041		
2,300.00	2,228.99	2,280.75	2,270.30	11.47	8.36	-166.41	161.91	-102.11	340.79	323.89	16.90	20.167		
2,400.00	2,324.29	2,379.15	2,367.86	12.08	8.76	-166.80	174.21	-105.60	358.47	340.79	17.67	20.281		
2,500.00	2,419.60	2,477.55	2,465.42	12.68	9.16	-167.15	186.52	-109.08	376.16	357.71	18.45	20.387		
2,600.00	2,514.91	2,575.95	2,562.98	13.29	9.56	-167.47	198.83	-112.57	393.86	374.63	19.23	20.484		
2,700.00	2,610.22	2,674.34	2,660.55	13.90	9.96	-167.77	211.14	-116.06	411.58	391.57	20.00	20.574		
2,800.00	2,705.53	2,772.74	2,758.11	14.51	10.37	-168.04	223.45	-119.54	429.30	408.52	20.78	20.657		
2,900.00	2,800.83	2,871.14	2,855.67	15.12	10.77	-168.28	235.76	-123.03	447.03	425.47	21.56	20.734		
3,000.00	2,896.14	2,969.54	2,953.23	15.73	11.17	-168.51	248.07	-126.51	464.77	442.43	22.34	20.806		
3,100.00	2,991.45	3,067.93	3,050.80	16.34	11.57	-168.72	260.38	-130.00	482.52	459.40	23.12	20.874		
3,200.00	3,086.76	3,166.33	3,148.36	16.95	11.98	-168.92	272.69	-133.49	500.27	476.37	23.89	20.937		
3,300.00	3,182.07	3,264.73	3,245.92	17.56	12.38	-169.10	285.00	-136.97	518.03	493.35	24.67	20.996		
3,400.00	3,277.38	3,363.13	3,343.48	18.17	12.79	-169.27	297.31	-140.46	535.79	510.34	25.45	21.051		
3,500.00	3,372.68	3,461.52	3,441.05	18.78	13.19	-169.43	309.61	-143.95	553.56	527.32	26.23	21.103		
3,600.00	3,467.99	3,559.92	3,538.61	19.39	13.59	-169.59	321.92	-147.43	571.33	544.32	27.01	21.152		
3,700.00	3,563.30	3,658.32	3,636.17	20.00	14.00	-169.73	334.23	-150.92	589.10	561.31	27.79	21.199		
3,800.00	3,658.61	3,756.72	3,733.73	20.61	14.40	-169.86	346.54	-154.41	606.88	578.31	28.57	21.242		
3,900.00	3,753.92	3,855.12	3,831.30	21.22	14.81	-169.98	358.85	-157.89	624.66	595.31	29.35	21.284		
4,000.00	3,849.22	3,953.51	3,928.86	21.83	15.21	-170.10	371.16	-161.38	642.44	612.31	30.13	21.323		
4,100.00	3,944.53	4,051.91	4,026.42	22.45	15.62	-170.21	383.47	-164.87	660.23	629.32	30.91	21.361		
4,200.00	4,039.84	4,150.31	4,123.98	23.06	16.03	-170.32	395.78	-168.35	678.01	646.32	31.69	21.396		
4,300.00	4,135.15	4,248.71	4,221.55	23.67	16.43	-170.42	408.09	-171.84	695.80	663.33	32.47	21.430		
4,400.00	4,230.46	4,347.10	4,319.11	24.28	16.84	-170.52	420.40	-175.33	713.60	680.35	33.25	21.462		
4,500.00	4,325.77	4,445.50	4,416.67	24.89	17.24	-170.61	432.71	-178.81	731.39	697.36	34.03	21.493		
4,600.00	4,421.07	4,543.90	4,514.23	25.51	17.65	-170.70	445.01	-182.30	749.18	714.37	34.81	21.522		
4,700.00	4,516.38	4,642.30	4,611.80	26.12	18.06	-170.78	457.32	-185.79	766.98	731.39	35.59	21.550		
4,800.00	4,611.69	4,740.69	4,709.36	26.73	18.46	-170.86	469.63	-189.27	784.78	748.41	36.37	21.577		
4,900.00	4,707.00	4,839.09	4,806.92	27.34	18.87	-170.93	481.94	-192.76	802.58	765.43	37.15	21.603		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.00	4,802.31	4,937.49	4,904.48	27.95	19.27	-171.00	494.25	-196.25	820.38	782.45	37.93	21.628		
5,100.00	4,897.61	5,035.89	5,002.05	28.57	19.68	-171.07	506.56	-199.73	838.18	799.47	38.71	21.651		
5,200.00	4,992.92	5,134.29	5,099.61	29.18	20.09	-171.14	518.87	-203.22	855.99	816.49	39.49	21.674		
5,300.00	5,088.23	5,232.68	5,197.17	29.79	20.49	-171.20	531.18	-206.70	873.79	833.52	40.28	21.696		
5,400.00	5,183.54	5,331.08	5,294.73	30.40	20.90	-171.26	543.49	-210.19	891.60	850.54	41.06	21.716		
5,500.00	5,278.85	5,429.48	5,392.30	31.01	21.31	-171.32	555.80	-213.68	909.40	867.57	41.84	21.737		
5,600.00	5,374.15	5,527.88	5,489.86	31.63	21.71	-171.38	568.11	-217.16	927.21	884.59	42.62	21.756		
5,700.00	5,469.46	5,626.27	5,587.42	32.24	22.12	-171.43	580.41	-220.65	945.02	901.62	43.40	21.775		
5,800.00	5,564.77	5,724.67	5,684.98	32.85	22.53	-171.49	592.72	-224.14	962.83	918.65	44.18	21.793		
5,900.00	5,660.08	5,823.07	5,782.55	33.46	22.93	-171.54	605.03	-227.62	980.64	935.68	44.96	21.810		
6,000.00	5,755.39	5,921.47	5,880.11	34.08	23.34	-171.58	617.34	-231.11	998.45	952.70	45.74	21.827		
6,100.00	5,850.70	6,019.87	5,977.67	34.69	23.75	-171.63	629.65	-234.60	1,016.26	969.73	46.53	21.843		
6,200.00	5,946.00	6,118.26	6,075.23	35.30	24.15	-171.68	641.96	-238.08	1,034.07	986.76	47.31	21.859		
6,300.00	6,041.31	6,216.66	6,172.80	35.91	24.56	-171.72	654.27	-241.57	1,051.88	1,003.79	48.09	21.874		
6,400.00	6,136.62	6,315.06	6,270.36	36.53	24.97	-171.76	666.58	-245.06	1,069.70	1,020.83	48.87	21.888		
6,500.00	6,231.93	6,413.46	6,367.92	37.14	25.38	-171.80	678.89	-248.54	1,087.51	1,037.86	49.65	21.902		
6,600.00	6,327.24	6,511.85	6,465.48	37.75	25.78	-171.84	691.20	-252.03	1,105.32	1,054.89	50.43	21.916		
6,700.00	6,422.54	6,610.25	6,563.05	38.37	26.19	-171.88	703.51	-255.52	1,123.14	1,071.92	51.22	21.929		
6,745.38	6,465.79	6,654.90	6,607.32	38.64	26.37	-171.90	709.09	-257.10	1,131.22	1,079.65	51.57	21.935		
6,800.00	6,518.01	6,708.74	6,660.70	38.97	26.60	-171.94	715.83	-259.01	1,140.45	1,088.45	52.00	21.933		
6,900.00	6,614.35	6,807.71	6,758.83	39.54	27.01	-171.99	728.21	-262.51	1,154.69	1,101.92	52.77	21.881		
7,000.00	6,711.57	6,907.12	6,857.40	40.06	27.42	-172.01	740.64	-266.04	1,165.51	1,111.97	53.54	21.769		
7,100.00	6,809.55	7,006.84	6,956.27	40.53	27.83	-171.99	753.12	-269.57	1,172.88	1,118.58	54.30	21.600		
7,200.00	6,908.17	7,079.66	7,028.57	40.96	28.12	-171.97	761.44	-271.93	1,177.91	1,123.06	54.85	21.474		
7,300.00	7,007.30	7,151.23	7,099.82	41.35	28.40	-171.96	767.90	-273.76	1,181.88	1,126.53	55.35	21.352		
7,400.00	7,106.83	7,222.76	7,171.18	41.69	28.66	-171.95	772.65	-275.10	1,184.80	1,128.99	55.81	21.229		
7,500.00	7,206.63	7,300.00	7,248.35	41.98	28.94	-171.94	775.85	-276.01	1,186.68	1,130.40	56.28	21.086		
7,600.00	7,306.59	7,365.78	7,314.12	42.23	29.15	-171.94	776.99	-276.33	1,187.47	1,130.88	56.59	20.985		
7,626.41	7,333.00	7,384.67	7,333.00	42.29	29.21	-179.86	777.05	-276.35	1,187.50	1,130.83	56.68	20.952		
7,656.41	7,363.00	7,414.67	7,363.00	42.35	29.31	-179.86	777.05	-276.35	1,187.50	1,130.63	56.87	20.880		
7,700.00	7,406.55	7,458.44	7,406.73	42.45	29.45	-90.11	777.06	-278.02	1,187.50	1,130.35	57.16	20.776		
7,750.00	7,456.18	7,508.64	7,456.55	42.56	29.61	-90.11	777.08	-284.04	1,187.50	1,130.00	57.50	20.652		
7,800.00	7,505.10	7,558.84	7,505.66	42.68	29.78	-90.11	777.13	-294.39	1,187.50	1,129.64	57.86	20.523		
7,850.00	7,552.93	7,609.04	7,553.66	42.81	29.96	-90.11	777.19	-309.00	1,187.50	1,129.26	58.25	20.388		
7,900.00	7,599.32	7,659.23	7,600.20	42.94	30.15	-90.10	777.28	-327.75	1,187.50	1,128.85	58.65	20.246		
7,950.00	7,643.91	7,709.41	7,644.92	43.08	30.34	-90.10	777.37	-350.50	1,187.50	1,128.41	59.09	20.097		
8,000.00	7,686.37	7,759.58	7,687.46	43.22	30.53	-90.09	777.49	-377.06	1,187.50	1,127.95	59.56	19.939		
8,050.00	7,726.36	7,809.75	7,727.51	43.37	30.74	-90.09	777.62	-407.24	1,187.51	1,127.44	60.06	19.771		
8,100.00	7,763.59	7,859.90	7,764.76	43.53	30.96	-90.08	777.77	-440.79	1,187.51	1,126.89	60.61	19.591		
8,150.00	7,797.77	7,910.04	7,798.93	43.69	31.19	-90.07	777.93	-477.47	1,187.51	1,126.28	61.22	19.397		
8,200.00	7,828.65	7,960.16	7,829.75	43.86	31.45	-90.07	778.10	-516.98	1,187.51	1,125.61	61.89	19.186		
8,250.00	7,855.98	8,010.27	7,857.00	44.05	31.74	-90.06	778.29	-559.01	1,187.51	1,124.87	62.64	18.958		
8,300.00	7,879.55	8,060.37	7,880.46	44.25	32.06	-90.05	778.48	-603.25	1,187.51	1,124.05	63.46	18.713		
8,350.00	7,899.20	8,110.45	7,899.97	44.47	32.43	-90.04	778.68	-649.36	1,187.51	1,123.15	64.36	18.450		
8,400.00	7,914.77	8,160.51	7,915.37	44.71	32.84	-90.03	778.89	-696.98	1,187.51	1,122.16	65.35	18.171		
8,450.00	7,926.14	8,210.56	7,926.56	44.98	33.30	-90.02	779.10	-745.74	1,187.51	1,121.09	66.42	17.879		
8,500.00	7,933.22	8,260.59	7,933.44	45.26	33.81	-90.01	779.32	-795.28	1,187.51	1,119.96	67.56	17.578		
8,550.00	7,935.96	8,310.60	7,935.99	45.58	34.36	-90.00	779.54	-845.21	1,187.52	1,118.76	68.75	17.272		
8,556.48	7,936.00	8,317.08	7,936.00	45.62	34.43	-90.00	779.57	-851.69	1,187.52	1,118.60	68.92	17.231		
8,600.00	7,936.00	8,360.60	7,936.00	45.92	34.96	-90.00	779.76	-895.21	1,187.52	1,117.48	70.04	16.956		
8,700.00	7,936.00	8,460.60	7,936.00	46.70	36.27	-90.00	780.20	-995.21	1,187.52	1,114.71	72.81	16.310		
8,800.00	7,936.00	8,560.60	7,936.00	47.61	37.73	-90.00	780.63	-1,095.20	1,187.52	1,111.66	75.86	15.655		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-4 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
8,900.00	7,936.00	8,660.60	7,936.00	48.66	39.34	-90.00	781.07	-1,195.20	1,187.53	1,108.37	79.16	15.002		
9,000.00	7,935.99	8,760.60	7,936.00	49.84	41.06	-90.00	781.51	-1,295.20	1,187.53	1,104.86	82.67	14.364		
9,100.00	7,935.99	8,860.60	7,936.00	51.16	42.88	-90.00	781.95	-1,395.20	1,187.53	1,101.15	86.38	13.748		
9,200.00	7,935.99	8,960.60	7,936.00	52.60	44.79	-90.00	782.38	-1,495.20	1,187.53	1,097.27	90.26	13.157		
9,300.00	7,935.99	9,060.60	7,936.00	54.16	46.79	-90.00	782.82	-1,595.20	1,187.54	1,093.25	94.28	12.595		
9,400.00	7,935.99	9,160.60	7,936.00	55.82	48.85	-90.00	783.26	-1,695.20	1,187.54	1,089.10	98.44	12.064		
9,500.00	7,935.99	9,260.60	7,936.00	57.58	50.97	-90.00	783.70	-1,795.20	1,187.54	1,084.84	102.71	11.563		
9,600.00	7,935.99	9,360.60	7,936.00	59.43	53.15	-90.00	784.13	-1,895.20	1,187.54	1,080.47	107.07	11.091		
9,700.00	7,935.98	9,460.60	7,935.99	61.36	55.37	-90.00	784.57	-1,995.20	1,187.55	1,076.02	111.53	10.648		
9,800.00	7,935.98	9,560.60	7,935.99	63.35	57.63	-90.00	785.01	-2,095.19	1,187.55	1,071.48	116.07	10.232		
9,900.00	7,935.98	9,660.60	7,935.99	65.40	59.93	-90.00	785.45	-2,195.19	1,187.55	1,066.88	120.67	9.841		
10,000.00	7,935.98	9,760.60	7,935.99	67.50	62.25	-90.00	785.88	-2,295.19	1,187.55	1,062.22	125.34	9.475		
10,100.00	7,935.98	9,860.60	7,935.99	69.66	64.61	-90.00	786.32	-2,395.19	1,187.56	1,057.50	130.06	9.131		
10,200.00	7,935.98	9,960.60	7,935.99	71.85	66.99	-90.00	786.76	-2,495.19	1,187.56	1,052.73	134.83	8.808		
10,300.00	7,935.98	10,060.60	7,935.99	74.08	69.40	-90.00	787.20	-2,595.19	1,187.56	1,047.92	139.64	8.504		
10,400.00	7,935.97	10,160.60	7,935.99	76.35	71.83	-90.00	787.63	-2,695.19	1,187.57	1,043.07	144.50	8.219		
10,500.00	7,935.97	10,260.60	7,935.99	78.64	74.27	-90.00	788.07	-2,795.19	1,187.57	1,038.18	149.39	7.950		
10,600.00	7,935.97	10,360.60	7,935.99	80.97	76.73	-90.00	788.51	-2,895.19	1,187.57	1,033.26	154.31	7.696		
10,700.00	7,935.97	10,460.60	7,935.99	83.32	79.21	-90.00	788.95	-2,995.19	1,187.57	1,028.31	159.26	7.457		
10,800.00	7,935.97	10,560.60	7,935.99	85.69	81.70	-90.00	789.38	-3,095.19	1,187.58	1,023.33	164.24	7.231		
10,900.00	7,935.97	10,660.60	7,935.99	88.08	84.20	-90.00	789.82	-3,195.18	1,187.58	1,018.33	169.25	7.017		
11,000.00	7,935.97	10,760.60	7,935.99	90.49	86.71	-90.00	790.26	-3,295.18	1,187.58	1,013.31	174.27	6.814		
11,100.00	7,935.96	10,860.60	7,935.99	92.91	89.24	-90.00	790.70	-3,395.18	1,187.58	1,008.26	179.32	6.623		
11,200.00	7,935.96	10,960.60	7,935.99	95.35	91.77	-90.00	791.13	-3,495.18	1,187.59	1,003.20	184.39	6.441		
11,300.00	7,935.96	11,060.60	7,935.99	97.81	94.31	-90.00	791.57	-3,595.18	1,187.59	998.12	189.47	6.268		
11,400.00	7,935.96	11,160.60	7,935.99	100.28	96.86	-90.00	792.01	-3,695.18	1,187.59	993.03	194.57	6.104		
11,500.00	7,935.96	11,260.60	7,935.99	102.76	99.42	-90.00	792.45	-3,795.18	1,187.59	987.91	199.68	5.947		
11,600.00	7,935.96	11,360.60	7,935.99	105.25	101.98	-90.00	792.88	-3,895.18	1,187.60	982.79	204.81	5.799		
11,700.00	7,935.96	11,460.60	7,935.98	107.75	104.55	-90.00	793.32	-3,995.18	1,187.60	977.65	209.95	5.657		
11,800.00	7,935.95	11,560.60	7,935.98	110.26	107.13	-90.00	793.76	-4,095.18	1,187.60	972.50	215.10	5.521		
11,900.00	7,935.95	11,660.60	7,935.98	112.78	109.71	-90.00	794.20	-4,195.17	1,187.61	967.34	220.26	5.392		
12,000.00	7,935.95	11,760.60	7,935.98	115.31	112.30	-90.00	794.63	-4,295.17	1,187.61	962.17	225.43	5.268		
12,100.00	7,935.95	11,860.60	7,935.98	117.84	114.89	-90.00	795.07	-4,395.17	1,187.61	957.00	230.62	5.150		
12,200.00	7,935.95	11,960.60	7,935.98	120.39	117.49	-90.00	795.51	-4,495.17	1,187.61	951.81	235.81	5.036		
12,300.00	7,935.95	12,060.60	7,935.98	122.94	120.09	-90.00	795.95	-4,595.17	1,187.62	946.61	241.01	4.928		
12,400.00	7,935.95	12,160.60	7,935.98	125.49	122.69	-90.00	796.38	-4,695.17	1,187.62	941.41	246.21	4.824		
12,500.00	7,935.94	12,260.60	7,935.98	128.05	125.30	-90.00	796.82	-4,795.17	1,187.62	936.19	251.43	4.724		
12,600.00	7,935.94	12,360.60	7,935.98	130.62	127.91	-90.00	797.26	-4,895.17	1,187.62	930.98	256.65	4.627		
12,700.00	7,935.94	12,460.60	7,935.98	133.19	130.53	-90.00	797.70	-4,995.17	1,187.63	925.75	261.88	4.535		
12,800.00	7,935.94	12,560.60	7,935.98	135.77	133.14	-90.00	798.13	-5,095.17	1,187.63	920.52	267.11	4.446		
12,900.00	7,935.94	12,660.60	7,935.98	138.35	135.76	-90.00	798.57	-5,195.17	1,187.63	915.28	272.35	4.361		
13,000.00	7,935.94	12,760.60	7,935.98	140.93	138.39	-90.00	799.01	-5,295.16	1,187.64	910.04	277.59	4.278		
13,100.00	7,935.94	12,860.60	7,935.98	143.52	141.01	-90.00	799.45	-5,395.16	1,187.64	904.80	282.84	4.199		
13,200.00	7,935.93	12,960.60	7,935.98	146.11	143.64	-90.00	799.88	-5,495.16	1,187.64	899.54	288.10	4.122		
13,300.00	7,935.93	13,060.60	7,935.98	148.71	146.27	-90.00	800.32	-5,595.16	1,187.64	894.29	293.35	4.048		
13,400.00	7,935.93	13,160.60	7,935.98	151.31	148.90	-90.00	800.76	-5,695.16	1,187.65	889.03	298.62	3.977		
13,500.00	7,935.93	13,260.60	7,935.98	153.91	151.54	-90.00	801.20	-5,795.16	1,187.65	883.76	303.89	3.908		
13,600.00	7,935.93	13,360.60	7,935.98	156.52	154.17	-90.00	801.63	-5,895.16	1,187.65	878.49	309.16	3.842		
13,700.00	7,935.93	13,460.60	7,935.98	159.13	156.81	-90.00	802.07	-5,995.16	1,187.65	873.22	314.43	3.777		
13,800.00	7,935.93	13,560.60	7,935.97	161.74	159.45	-90.00	802.51	-6,095.16	1,187.66	867.95	319.71	3.715		
13,900.00	7,935.92	13,660.60	7,935.97	164.35	162.09	-90.00	802.95	-6,195.16	1,187.66	862.67	324.99	3.654		
14,000.00	7,935.92	13,760.60	7,935.97	166.97	164.73	-90.00	803.38	-6,295.15	1,187.66	857.39	330.28	3.596		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-4 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,100.00	7,935.92	13,860.60	7,935.97	169.59	167.38	-90.00	803.82	-6,395.15	1,187.66	852.10	335.56	3.539		
14,200.00	7,935.92	13,960.60	7,935.97	172.21	170.03	-90.00	804.26	-6,495.15	1,187.67	846.81	340.85	3.484		
14,300.00	7,935.92	14,060.60	7,935.97	174.84	172.67	-90.00	804.70	-6,595.15	1,187.67	841.52	346.15	3.431		
14,400.00	7,935.92	14,160.60	7,935.97	177.46	175.32	-90.00	805.13	-6,695.15	1,187.67	836.23	351.44	3.379		
14,500.00	7,935.92	14,260.60	7,935.97	180.09	177.97	-90.00	805.57	-6,795.15	1,187.68	830.93	356.74	3.329		
14,600.00	7,935.91	14,360.60	7,935.97	182.72	180.62	-90.00	806.01	-6,895.15	1,187.68	825.64	362.04	3.280		
14,700.00	7,935.91	14,460.60	7,935.97	185.35	183.27	-90.00	806.45	-6,995.15	1,187.68	820.33	367.35	3.233		
14,800.00	7,935.91	14,560.60	7,935.97	187.98	185.93	-90.00	806.88	-7,095.15	1,187.68	815.03	372.65	3.187		
14,900.00	7,935.91	14,660.60	7,935.97	190.62	188.58	-90.00	807.32	-7,195.15	1,187.69	809.73	377.96	3.142		
15,000.00	7,935.91	14,760.60	7,935.97	193.25	191.24	-90.00	807.76	-7,295.15	1,187.69	804.42	383.27	3.099		
15,100.00	7,935.91	14,860.60	7,935.97	195.89	193.89	-90.00	808.19	-7,395.14	1,187.69	799.11	388.58	3.056		
15,200.00	7,935.91	14,960.60	7,935.97	198.53	196.55	-90.00	808.63	-7,495.14	1,187.69	793.80	393.89	3.015		
15,300.00	7,935.90	15,060.60	7,935.97	201.17	199.21	-90.00	809.07	-7,595.14	1,187.70	788.49	399.21	2.975		
15,400.00	7,935.90	15,160.60	7,935.97	203.81	201.87	-90.00	809.51	-7,695.14	1,187.70	783.17	404.52	2.936		
15,500.00	7,935.90	15,260.60	7,935.97	206.45	204.53	-90.00	809.94	-7,795.14	1,187.70	777.86	409.84	2.898		
15,600.00	7,935.90	15,360.60	7,935.97	209.10	207.19	-90.00	810.38	-7,895.14	1,187.70	772.54	415.16	2.861		
15,700.00	7,935.90	15,460.60	7,935.97	211.74	209.85	-90.00	810.82	-7,995.14	1,187.71	767.22	420.48	2.825		
15,800.00	7,935.90	15,560.60	7,935.96	214.39	212.51	-90.00	811.26	-8,095.14	1,187.71	761.90	425.81	2.789		
15,900.00	7,935.90	15,660.60	7,935.96	217.04	215.17	-90.00	811.69	-8,195.14	1,187.71	756.58	431.13	2.755		
16,000.00	7,935.89	15,760.60	7,935.96	219.69	217.84	-90.00	812.13	-8,295.14	1,187.72	751.26	436.46	2.721		
16,100.00	7,935.89	15,860.60	7,935.96	222.34	220.50	-90.00	812.57	-8,395.13	1,187.72	745.93	441.78	2.688		
16,200.00	7,935.89	15,960.60	7,935.96	224.99	223.16	-90.00	813.01	-8,495.13	1,187.72	740.61	447.11	2.656		
16,300.00	7,935.89	16,060.60	7,935.96	227.64	225.83	-90.00	813.44	-8,595.13	1,187.72	735.28	452.44	2.625		
16,400.00	7,935.89	16,160.60	7,935.96	230.29	228.50	-90.00	813.88	-8,695.13	1,187.73	729.95	457.77	2.595		
16,500.00	7,935.89	16,260.60	7,935.96	232.94	231.16	-90.00	814.32	-8,795.13	1,187.73	724.62	463.10	2.565		
16,600.00	7,935.89	16,360.60	7,935.96	235.60	233.83	-90.00	814.76	-8,895.13	1,187.73	719.29	468.44	2.536		
16,700.00	7,935.88	16,460.60	7,935.96	238.25	236.50	-90.00	815.19	-8,995.13	1,187.73	713.96	473.77	2.507		
16,800.00	7,935.88	16,560.60	7,935.96	240.91	239.16	-90.00	815.63	-9,095.13	1,187.74	708.63	479.11	2.479		
16,900.00	7,935.88	16,660.60	7,935.96	243.56	241.83	-90.00	816.07	-9,195.13	1,187.74	703.30	484.44	2.452		
17,000.00	7,935.88	16,760.60	7,935.96	246.22	244.50	-90.00	816.51	-9,295.13	1,187.74	697.96	489.78	2.425		
17,100.00	7,935.88	16,860.60	7,935.96	248.88	247.17	-90.00	816.94	-9,395.13	1,187.75	692.63	495.12	2.399		
17,200.00	7,935.88	16,960.60	7,935.96	251.54	249.84	-90.00	817.38	-9,495.12	1,187.75	687.29	500.46	2.373		
17,300.00	7,935.88	17,060.60	7,935.96	254.20	252.51	-90.00	817.82	-9,595.12	1,187.75	681.96	505.79	2.348		
17,400.00	7,935.87	17,160.60	7,935.96	256.86	255.18	-90.00	818.26	-9,695.12	1,187.75	676.62	511.13	2.324		
17,500.00	7,935.87	17,260.60	7,935.96	259.52	257.85	-90.00	818.69	-9,795.12	1,187.76	671.28	516.48	2.300		
17,600.00	7,935.87	17,360.60	7,935.96	262.18	260.52	-90.00	819.13	-9,895.12	1,187.76	665.94	521.82	2.276		
17,700.00	7,935.87	17,460.60	7,935.96	264.84	263.19	-90.00	819.57	-9,995.12	1,187.76	660.60	527.16	2.253		
17,800.00	7,935.87	17,560.60	7,935.96	267.50	265.87	-90.00	820.01	-10,095.12	1,187.76	655.26	532.50	2.231		
17,900.00	7,935.87	17,660.60	7,935.95	270.17	268.54	-90.00	820.44	-10,195.12	1,187.77	649.92	537.85	2.208		
18,000.00	7,935.87	17,760.60	7,935.95	272.83	271.21	-90.00	820.88	-10,295.12	1,187.77	644.58	543.19	2.187		
18,100.00	7,935.86	17,860.60	7,935.95	275.49	273.88	-90.00	821.32	-10,395.12	1,187.77	639.23	548.54	2.165		
18,200.00	7,935.86	17,959.58	7,935.98	278.16	276.53	-90.01	821.70	-10,494.10	1,187.83	633.99	553.83	2.145		
18,238.52	7,935.86	17,998.10	7,936.00	279.18	277.56	-90.01	821.84	-10,532.62	1,187.86	631.97	555.89	2.137		
18,239.20	7,936.00	17,998.77	7,936.00	279.20	277.58	-90.00	821.84	-10,533.29	1,187.52	631.59	555.93	2.136 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	-90.00	0.00	-73.12	73.12					
100.00	100.00	100.00	100.00	0.13	0.13	-90.00	0.00	-73.12	73.12	72.86	0.27	271.987		
200.00	200.00	200.00	200.00	0.49	0.49	-90.00	0.00	-73.12	73.12	72.14	0.99	74.178		
300.00	299.98	300.02	299.98	0.85	0.85	-83.44	0.00	-73.12	72.90	71.20	1.70	42.821		
400.00	399.84	400.16	399.84	1.22	1.21	-87.55	0.00	-73.12	72.49	70.07	2.42	29.919		
440.43	440.14	440.14	440.14	1.37	1.35	-90.00	0.00	-73.12	72.43	69.71	2.72	26.663	CC	
500.00	499.45	500.55	499.45	1.59	1.57	-94.41	0.00	-73.12	72.64	69.49	3.15	23.030	ES	
600.00	598.70	601.30	598.70	1.97	1.93	-103.68	0.00	-73.12	74.58	70.68	3.90	19.111		
700.00	697.47	702.53	697.47	2.38	2.29	-114.45	0.00	-73.12	79.77	75.11	4.67	17.090		
800.00	795.62	804.38	795.62	2.82	2.66	-125.35	0.00	-73.12	89.46	84.02	5.44	16.441		
900.00	893.06	906.94	893.06	3.29	3.03	-135.14	0.00	-73.12	104.27	98.06	6.21	16.782		
1,000.00	989.64	989.64	989.64	3.79	3.32	-143.25	0.00	-73.12	124.20	117.29	6.91	17.982		
1,081.03	1,067.21	1,069.42	1,069.41	4.23	3.61	-148.45	0.74	-73.52	143.37	135.86	7.51	19.085		
1,100.00	1,085.29	1,088.25	1,088.24	4.34	3.68	-149.48	1.20	-73.77	148.02	140.37	7.66	19.332		
1,200.00	1,180.60	1,188.59	1,188.46	4.91	4.04	-153.51	5.47	-76.05	171.75	163.34	8.41	20.430		
1,300.00	1,275.90	1,286.25	1,285.88	5.49	4.39	-156.02	11.53	-79.29	194.49	185.34	9.15	21.245		
1,400.00	1,371.21	1,383.33	1,382.71	6.07	4.74	-157.99	17.58	-82.53	217.48	207.58	9.90	21.962		
1,500.00	1,466.52	1,480.41	1,479.55	6.66	5.09	-159.58	23.62	-85.76	240.67	230.02	10.65	22.595		
1,600.00	1,561.83	1,577.49	1,576.38	7.26	5.44	-160.89	29.67	-89.00	264.01	252.61	11.40	23.154		
1,700.00	1,657.14	1,674.56	1,673.21	7.85	5.80	-161.98	35.72	-92.23	287.45	275.30	12.15	23.651		
1,800.00	1,752.44	1,771.64	1,770.05	8.45	6.16	-162.91	41.77	-95.47	310.98	298.08	12.91	24.094		
1,900.00	1,847.75	1,868.72	1,866.88	9.05	6.51	-163.72	47.82	-98.70	334.58	320.92	13.66	24.492		
2,000.00	1,943.06	1,965.79	1,963.72	9.66	6.87	-164.41	53.87	-101.94	358.23	343.81	14.42	24.850		
2,100.00	2,038.37	2,062.87	2,060.55	10.26	7.23	-165.02	59.92	-105.17	381.92	366.75	15.17	25.174		
2,200.00	2,133.68	2,159.95	2,157.39	10.86	7.59	-165.56	65.97	-108.41	405.65	389.73	15.93	25.469		
2,300.00	2,228.99	2,257.03	2,254.22	11.47	7.95	-166.04	72.02	-111.64	429.41	412.73	16.68	25.737		
2,400.00	2,324.29	2,354.10	2,351.06	12.08	8.31	-166.47	78.06	-114.88	453.20	435.76	17.44	25.983		
2,500.00	2,419.60	2,451.18	2,447.89	12.68	8.67	-166.85	84.11	-118.11	477.00	458.80	18.20	26.209		
2,600.00	2,514.91	2,548.26	2,544.73	13.29	9.03	-167.20	90.16	-121.35	500.83	481.87	18.96	26.417		
2,700.00	2,610.22	2,645.34	2,641.56	13.90	9.39	-167.52	96.21	-124.58	524.67	504.95	19.72	26.609		
2,800.00	2,705.53	2,742.41	2,738.39	14.51	9.75	-167.81	102.26	-127.82	548.53	528.05	20.48	26.787		
2,900.00	2,800.83	2,839.49	2,835.23	15.12	10.11	-168.07	108.31	-131.05	572.39	551.16	21.24	26.953		
3,000.00	2,896.14	2,936.57	2,932.06	15.73	10.48	-168.32	114.36	-134.29	596.27	574.27	22.00	27.107		
3,100.00	2,991.45	3,033.64	3,028.90	16.34	10.84	-168.54	120.41	-137.52	620.16	597.40	22.76	27.251		
3,200.00	3,086.76	3,130.72	3,125.73	16.95	11.20	-168.75	126.46	-140.76	644.05	620.54	23.52	27.386		
3,300.00	3,182.07	3,227.80	3,222.57	17.56	11.56	-168.95	132.50	-143.99	667.96	643.68	24.28	27.513		
3,400.00	3,277.38	3,324.88	3,319.40	18.17	11.92	-169.13	138.55	-147.23	691.87	666.83	25.04	27.631		
3,500.00	3,372.68	3,421.95	3,416.24	18.78	12.29	-169.30	144.60	-150.46	715.78	689.98	25.80	27.743		
3,600.00	3,467.99	3,519.03	3,513.07	19.39	12.65	-169.45	150.65	-153.70	739.70	713.14	26.56	27.848		
3,700.00	3,563.30	3,616.11	3,609.91	20.00	13.01	-169.60	156.70	-156.93	763.63	736.31	27.32	27.948		
3,800.00	3,658.61	3,713.18	3,706.74	20.61	13.37	-169.74	162.75	-160.17	787.56	759.48	28.09	28.042		
3,900.00	3,753.92	3,810.26	3,803.57	21.22	13.74	-169.87	168.80	-163.40	811.50	782.65	28.85	28.131		
4,000.00	3,849.22	3,907.34	3,900.41	21.83	14.10	-169.99	174.85	-166.64	835.44	805.83	29.61	28.215		
4,100.00	3,944.53	4,004.42	3,997.24	22.45	14.46	-170.11	180.90	-169.87	859.38	829.01	30.37	28.295		
4,200.00	4,039.84	4,101.49	4,094.08	23.06	14.82	-170.22	186.94	-173.11	883.32	852.19	31.13	28.371		
4,300.00	4,135.15	4,201.43	4,190.91	23.67	15.20	-170.32	192.99	-176.34	907.27	875.36	31.91	28.434		
4,400.00	4,230.46	4,304.35	4,287.75	24.28	15.58	-170.42	199.04	-179.58	931.22	898.53	32.69	28.485		
4,500.00	4,325.77	4,407.28	4,384.58	24.89	15.97	-170.52	205.09	-182.82	955.18	921.70	33.48	28.533		
4,600.00	4,421.07	4,489.80	4,481.42	25.51	16.28	-170.61	211.14	-186.05	979.13	944.95	34.19	28.642		
4,700.00	4,516.38	4,586.88	4,578.25	26.12	16.64	-170.69	217.19	-189.29	1,003.09	968.14	34.95	28.702		
4,800.00	4,611.69	4,683.96	4,675.09	26.73	17.00	-170.77	223.24	-192.52	1,027.05	991.34	35.71	28.759		
4,900.00	4,707.00	4,781.03	4,771.92	27.34	17.37	-170.85	229.29	-195.76	1,051.01	1,014.54	36.48	28.814		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.00	4,802.31	4,878.11	4,868.75	27.95	17.73	-170.92	235.34	-198.99	1,074.97	1,037.74	37.24	28.867		
5,100.00	4,897.61	4,975.19	4,965.59	28.57	18.09	-170.99	241.38	-202.23	1,098.94	1,060.94	38.00	28.918		
5,200.00	4,992.92	5,072.27	5,062.42	29.18	18.46	-171.06	247.43	-205.46	1,122.91	1,084.14	38.77	28.966		
5,300.00	5,088.23	5,169.34	5,159.26	29.79	18.82	-171.13	253.48	-208.70	1,146.87	1,107.34	39.53	29.013		
5,400.00	5,183.54	5,266.42	5,256.09	30.40	19.18	-171.19	259.53	-211.93	1,170.84	1,130.55	40.29	29.058		
5,500.00	5,278.85	5,363.50	5,352.93	31.01	19.55	-171.25	265.58	-215.17	1,194.81	1,153.76	41.06	29.101		
5,600.00	5,374.15	5,460.57	5,449.76	31.63	19.91	-171.31	271.63	-218.40	1,218.78	1,176.96	41.82	29.143		
5,700.00	5,469.46	5,557.65	5,546.60	32.24	20.27	-171.36	277.68	-221.64	1,242.76	1,200.17	42.59	29.183		
5,800.00	5,564.77	5,654.73	5,643.43	32.85	20.64	-171.41	283.73	-224.87	1,266.73	1,223.38	43.35	29.221		
5,900.00	5,660.08	5,751.81	5,740.27	33.46	21.00	-171.46	289.78	-228.11	1,290.71	1,246.59	44.11	29.259		
6,000.00	5,755.39	5,848.88	5,837.10	34.08	21.36	-171.51	295.82	-231.34	1,314.68	1,269.80	44.88	29.294		
6,100.00	5,850.70	5,945.96	5,933.93	34.69	21.73	-171.56	301.87	-234.58	1,338.66	1,293.02	45.64	29.329		
6,200.00	5,946.00	6,043.04	6,030.77	35.30	22.09	-171.61	307.92	-237.81	1,362.64	1,316.23	46.41	29.363		
6,300.00	6,041.31	6,140.11	6,127.60	35.91	22.45	-171.65	313.97	-241.05	1,386.61	1,339.44	47.17	29.395		
6,400.00	6,136.62	6,237.19	6,224.44	36.53	22.82	-171.69	320.02	-244.28	1,410.59	1,362.66	47.94	29.426		
6,500.00	6,231.93	6,334.27	6,321.27	37.14	23.18	-171.74	326.07	-247.52	1,434.57	1,385.87	48.70	29.456		
6,600.00	6,327.24	6,431.35	6,418.11	37.75	23.55	-171.78	332.12	-250.75	1,458.55	1,409.09	49.47	29.486		
6,700.00	6,422.54	6,528.42	6,514.94	38.37	23.91	-171.81	338.17	-253.99	1,482.53	1,432.30	50.23	29.514		
6,745.38	6,465.79	6,572.47	6,558.88	38.64	24.07	-171.83	340.91	-255.46	1,493.42	1,442.84	50.58	29.527		
6,800.00	6,518.01	6,625.62	6,611.90	38.97	24.27	-171.89	344.22	-257.23	1,506.01	1,455.02	51.00	29.532		
6,900.00	6,614.35	6,723.50	6,709.53	39.54	24.64	-171.96	350.32	-260.49	1,526.47	1,474.72	51.75	29.495		
7,000.00	6,711.57	6,822.03	6,807.81	40.06	25.01	-172.01	356.46	-263.77	1,543.53	1,491.03	52.51	29.397		
7,100.00	6,809.55	6,921.09	6,906.62	40.53	25.38	-172.02	362.63	-267.07	1,557.18	1,503.93	53.25	29.243		
7,200.00	6,908.17	7,020.55	7,005.84	40.96	25.75	-172.01	368.83	-270.39	1,567.39	1,513.41	53.99	29.034		
7,300.00	7,007.30	7,113.18	7,098.24	41.35	26.10	-171.98	374.57	-273.46	1,574.21	1,519.55	54.66	28.800		
7,400.00	7,106.83	7,180.44	7,165.40	41.69	26.35	-171.97	377.76	-275.17	1,579.02	1,523.89	55.13	28.642		
7,500.00	7,206.63	7,247.69	7,232.61	41.98	26.59	-171.96	379.56	-276.13	1,582.44	1,526.88	55.56	28.482		
7,600.00	7,306.59	7,321.67	7,306.59	42.23	26.84	-171.97	380.00	-276.36	1,584.43	1,528.42	56.01	28.287		
7,626.41	7,333.00	7,348.19	7,333.11	42.29	26.94	-179.89	380.00	-276.62	1,584.55	1,528.36	56.19	28.201		
7,656.41	7,363.00	7,378.30	7,363.17	42.35	27.04	-179.83	380.01	-278.31	1,584.55	1,528.16	56.39	28.099		
7,681.76	7,388.34	7,403.61	7,388.35	42.41	27.13	-90.00	380.02	-280.95	1,584.55	1,527.98	56.57	28.012		
7,700.00	7,406.55	7,421.77	7,406.32	42.45	27.20	-89.95	380.03	-283.53	1,584.55	1,527.85	56.69	27.949		
7,750.00	7,456.18	7,471.30	7,454.83	42.56	27.38	-89.80	380.08	-293.44	1,584.56	1,527.50	57.05	27.773		
7,800.00	7,505.10	7,520.49	7,501.98	42.68	27.57	-89.66	380.14	-307.39	1,584.58	1,527.15	57.43	27.592		
7,850.00	7,552.93	7,569.35	7,547.46	42.81	27.77	-89.51	380.21	-325.19	1,584.61	1,526.79	57.82	27.406		
7,900.00	7,599.32	7,617.89	7,590.99	42.94	27.97	-89.38	380.31	-346.66	1,584.64	1,526.41	58.23	27.213		
7,950.00	7,643.91	7,666.13	7,632.29	43.08	28.19	-89.24	380.42	-371.56	1,584.69	1,526.02	58.66	27.013		
8,000.00	7,686.37	7,714.10	7,671.13	43.22	28.41	-89.11	380.54	-399.68	1,584.74	1,525.61	59.13	26.803		
8,050.00	7,726.36	7,761.80	7,707.29	43.37	28.65	-88.99	380.68	-430.77	1,584.80	1,525.17	59.62	26.580		
8,100.00	7,763.59	7,809.25	7,740.58	43.53	28.91	-88.88	380.82	-464.57	1,584.86	1,524.69	60.16	26.343		
8,150.00	7,797.77	7,856.49	7,770.82	43.69	29.20	-88.78	380.98	-500.84	1,584.92	1,524.16	60.75	26.088		
8,200.00	7,828.65	7,903.52	7,797.86	43.86	29.52	-88.68	381.15	-539.30	1,584.98	1,523.58	61.40	25.814		
8,250.00	7,855.98	7,950.37	7,821.58	44.05	29.87	-88.59	381.33	-579.69	1,585.04	1,522.92	62.11	25.520		
8,300.00	7,879.55	7,997.06	7,841.85	44.25	30.26	-88.52	381.51	-621.74	1,585.09	1,522.19	62.89	25.202		
8,350.00	7,899.20	8,043.62	7,858.59	44.47	30.68	-88.45	381.70	-665.16	1,585.14	1,521.39	63.75	24.864		
8,400.00	7,914.77	8,090.06	7,871.72	44.71	31.15	-88.40	381.89	-709.69	1,585.18	1,520.50	64.68	24.507		
8,450.00	7,926.14	8,136.40	7,881.19	44.98	31.65	-88.35	382.09	-755.05	1,585.22	1,519.53	65.69	24.133		
8,500.00	7,933.22	8,182.68	7,886.95	45.26	32.18	-88.32	382.29	-800.95	1,585.24	1,518.49	66.75	23.748		
8,550.00	7,935.96	8,233.57	7,889.00	45.58	32.80	-88.30	382.49	-846.94	1,585.26	1,517.33	67.93	23.337		
8,556.48	7,936.00	8,235.20	7,889.00	45.62	32.82	-88.30	382.52	-853.42	1,585.26	1,517.23	68.03	23.302		
8,600.00	7,936.00	8,278.72	7,889.00	45.92	33.38	-88.30	382.71	-896.94	1,585.26	1,516.12	69.15	22.927		
8,700.00	7,936.00	8,378.72	7,889.00	46.70	34.79	-88.30	383.15	-996.93	1,585.27	1,513.34	71.93	22.040		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
8,800.00	7,936.00	8,478.72	7,889.00	47.61	36.34	-88.30	383.59	-1,096.93	1,585.27	1,510.28	74.99	21.141		
8,900.00	7,936.00	8,578.72	7,889.00	48.66	38.02	-88.30	384.02	-1,196.93	1,585.27	1,506.98	78.30	20.247		
9,000.00	7,935.99	8,678.72	7,889.00	49.84	39.80	-88.30	384.46	-1,296.93	1,585.28	1,503.45	81.83	19.374		
9,100.00	7,935.99	8,778.72	7,889.00	51.16	41.69	-88.30	384.90	-1,396.93	1,585.28	1,499.73	85.55	18.531		
9,200.00	7,935.99	8,878.72	7,889.00	52.60	43.66	-88.30	385.33	-1,496.93	1,585.28	1,495.84	89.44	17.725		
9,300.00	7,935.99	8,978.72	7,889.00	54.16	45.70	-88.30	385.77	-1,596.93	1,585.28	1,491.81	93.48	16.959		
9,400.00	7,935.99	9,078.72	7,889.00	55.82	47.81	-88.30	386.21	-1,696.93	1,585.29	1,487.64	97.64	16.235		
9,500.00	7,935.99	9,178.72	7,889.00	57.58	49.97	-88.30	386.65	-1,796.93	1,585.29	1,483.37	101.92	15.554		
9,600.00	7,935.99	9,278.72	7,889.00	59.43	52.19	-88.30	387.08	-1,896.93	1,585.29	1,478.99	106.30	14.913		
9,700.00	7,935.98	9,378.72	7,889.00	61.36	54.44	-88.30	387.52	-1,996.93	1,585.30	1,474.53	110.77	14.311		
9,800.00	7,935.98	9,478.72	7,889.00	63.35	56.74	-88.30	387.96	-2,096.92	1,585.30	1,469.98	115.32	13.747		
9,900.00	7,935.98	9,578.72	7,889.00	65.40	59.06	-88.30	388.39	-2,196.92	1,585.30	1,465.37	119.93	13.218		
10,000.00	7,935.98	9,678.72	7,889.00	67.50	61.42	-88.30	388.83	-2,296.92	1,585.31	1,460.70	124.61	12.722		
10,100.00	7,935.98	9,778.72	7,889.00	69.66	63.81	-88.30	389.27	-2,396.92	1,585.31	1,455.97	129.34	12.257		
10,200.00	7,935.98	9,878.72	7,889.00	71.85	66.21	-88.30	389.71	-2,496.92	1,585.31	1,451.20	134.12	11.820		
10,300.00	7,935.98	9,978.72	7,889.00	74.08	68.64	-88.30	390.14	-2,596.92	1,585.32	1,446.38	138.94	11.410		
10,400.00	7,935.97	10,078.72	7,889.00	76.35	71.09	-88.30	390.58	-2,696.92	1,585.32	1,441.52	143.80	11.025		
10,500.00	7,935.97	10,178.72	7,889.00	78.64	73.55	-88.30	391.02	-2,796.92	1,585.32	1,436.63	148.70	10.661		
10,600.00	7,935.97	10,278.72	7,889.00	80.97	76.03	-88.30	391.45	-2,896.92	1,585.33	1,431.70	153.63	10.319		
10,700.00	7,935.97	10,378.72	7,889.00	83.32	78.52	-88.30	391.89	-2,996.92	1,585.33	1,426.74	158.58	9.997		
10,800.00	7,935.97	10,478.72	7,889.00	85.69	81.03	-88.30	392.33	-3,096.91	1,585.33	1,421.76	163.57	9.692		
10,900.00	7,935.97	10,578.72	7,889.00	88.08	83.55	-88.30	392.76	-3,196.91	1,585.33	1,416.76	168.58	9.404		
11,000.00	7,935.97	10,678.72	7,889.00	90.49	86.08	-88.30	393.20	-3,296.91	1,585.34	1,411.73	173.61	9.132		
11,100.00	7,935.96	10,778.72	7,889.00	92.91	88.61	-88.30	393.64	-3,396.91	1,585.34	1,406.68	178.66	8.874		
11,200.00	7,935.96	10,878.72	7,889.00	95.35	91.16	-88.30	394.08	-3,496.91	1,585.34	1,401.61	183.73	8.629		
11,300.00	7,935.96	10,978.72	7,889.00	97.81	93.71	-88.30	394.51	-3,596.91	1,585.35	1,396.53	188.82	8.396		
11,400.00	7,935.96	11,078.72	7,889.00	100.28	96.27	-88.30	394.95	-3,696.91	1,585.35	1,391.43	193.92	8.175		
11,500.00	7,935.96	11,178.72	7,889.00	102.76	98.84	-88.30	395.39	-3,796.91	1,585.35	1,386.32	199.03	7.965		
11,600.00	7,935.96	11,278.72	7,889.00	105.25	101.42	-88.30	395.82	-3,896.91	1,585.36	1,381.19	204.16	7.765		
11,700.00	7,935.96	11,378.72	7,889.00	107.75	104.00	-88.30	396.26	-3,996.91	1,585.36	1,376.05	209.31	7.574		
11,800.00	7,935.95	11,478.72	7,889.00	110.26	106.58	-88.30	396.70	-4,096.91	1,585.36	1,370.90	214.46	7.392		
11,900.00	7,935.95	11,578.72	7,889.00	112.78	109.17	-88.30	397.13	-4,196.90	1,585.37	1,365.74	219.62	7.219		
12,000.00	7,935.95	11,678.72	7,889.00	115.31	111.77	-88.30	397.57	-4,296.90	1,585.37	1,360.57	224.80	7.052		
12,100.00	7,935.95	11,778.72	7,889.00	117.84	114.37	-88.30	398.01	-4,396.90	1,585.37	1,355.39	229.98	6.893		
12,200.00	7,935.95	11,878.72	7,889.00	120.39	116.97	-88.30	398.45	-4,496.90	1,585.37	1,350.20	235.18	6.741		
12,300.00	7,935.95	11,978.72	7,889.00	122.94	119.58	-88.30	398.88	-4,596.90	1,585.38	1,345.00	240.38	6.595		
12,400.00	7,935.95	12,078.72	7,889.00	125.49	122.19	-88.30	399.32	-4,696.90	1,585.38	1,339.80	245.58	6.456		
12,500.00	7,935.94	12,178.72	7,889.00	128.05	124.81	-88.30	399.76	-4,796.90	1,585.38	1,334.58	250.80	6.321		
12,600.00	7,935.94	12,278.72	7,889.00	130.62	127.43	-88.30	400.19	-4,896.90	1,585.39	1,329.37	256.02	6.192		
12,700.00	7,935.94	12,378.72	7,888.99	133.19	130.05	-88.30	400.63	-4,996.90	1,585.39	1,324.14	261.25	6.068		
12,800.00	7,935.94	12,478.72	7,888.99	135.77	132.67	-88.30	401.07	-5,096.90	1,585.39	1,318.91	266.48	5.949		
12,900.00	7,935.94	12,578.72	7,888.99	138.35	135.30	-88.30	401.50	-5,196.89	1,585.40	1,313.67	271.72	5.835		
13,000.00	7,935.94	12,678.72	7,888.99	140.93	137.92	-88.30	401.94	-5,296.89	1,585.40	1,308.43	276.97	5.724		
13,100.00	7,935.94	12,778.72	7,888.99	143.52	140.56	-88.30	402.38	-5,396.89	1,585.40	1,303.18	282.22	5.618		
13,200.00	7,935.93	12,878.72	7,888.99	146.11	143.19	-88.30	402.82	-5,496.89	1,585.41	1,297.93	287.47	5.515		
13,300.00	7,935.93	12,978.72	7,888.99	148.71	145.82	-88.30	403.25	-5,596.89	1,585.41	1,292.68	292.73	5.416		
13,400.00	7,935.93	13,078.72	7,888.99	151.31	148.46	-88.30	403.69	-5,696.89	1,585.41	1,287.42	298.00	5.320		
13,500.00	7,935.93	13,178.72	7,888.99	153.91	151.10	-88.30	404.13	-5,796.89	1,585.42	1,282.15	303.26	5.228		
13,600.00	7,935.93	13,278.72	7,888.99	156.52	153.74	-88.30	404.56	-5,896.89	1,585.42	1,276.88	308.53	5.139		
13,700.00	7,935.93	13,378.72	7,888.99	159.13	156.38	-88.30	405.00	-5,996.89	1,585.42	1,271.61	313.81	5.052		
13,800.00	7,935.93	13,478.72	7,888.99	161.74	159.03	-88.30	405.44	-6,096.89	1,585.42	1,266.34	319.09	4.969		
13,900.00	7,935.92	13,578.72	7,888.99	164.35	161.67	-88.30	405.88	-6,196.89	1,585.43	1,261.06	324.37	4.888		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-5 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,000.00	7,935.92	13,678.72	7,888.99	166.97	164.32	-88.30	406.31	-6,296.88	1,585.43	1,255.78	329.65	4.809		
14,100.00	7,935.92	13,778.72	7,888.99	169.59	166.97	-88.30	406.75	-6,396.88	1,585.43	1,250.49	334.94	4.733		
14,200.00	7,935.92	13,878.72	7,888.99	172.21	169.62	-88.30	407.19	-6,496.88	1,585.44	1,245.21	340.23	4.660		
14,300.00	7,935.92	13,978.72	7,888.99	174.84	172.27	-88.30	407.62	-6,596.88	1,585.44	1,239.92	345.52	4.589		
14,400.00	7,935.92	14,078.72	7,888.99	177.46	174.92	-88.30	408.06	-6,696.88	1,585.44	1,234.62	350.82	4.519		
14,500.00	7,935.92	14,178.72	7,888.99	180.09	177.57	-88.30	408.50	-6,796.88	1,585.45	1,229.33	356.12	4.452		
14,600.00	7,935.91	14,278.72	7,888.99	182.72	180.23	-88.30	408.93	-6,896.88	1,585.45	1,224.03	361.42	4.387		
14,700.00	7,935.91	14,378.72	7,888.99	185.35	182.88	-88.30	409.37	-6,996.88	1,585.45	1,218.73	366.72	4.323		
14,800.00	7,935.91	14,478.72	7,888.99	187.98	185.54	-88.30	409.81	-7,096.88	1,585.46	1,213.43	372.02	4.262		
14,900.00	7,935.91	14,578.72	7,888.99	190.62	188.20	-88.30	410.25	-7,196.88	1,585.46	1,208.13	377.33	4.202		
15,000.00	7,935.91	14,678.72	7,888.99	193.25	190.85	-88.30	410.68	-7,296.87	1,585.46	1,202.82	382.64	4.143		
15,100.00	7,935.91	14,778.72	7,888.99	195.89	193.51	-88.30	411.12	-7,396.87	1,585.46	1,197.51	387.95	4.087		
15,200.00	7,935.91	14,878.72	7,888.99	198.53	196.17	-88.30	411.56	-7,496.87	1,585.47	1,192.21	393.26	4.032		
15,300.00	7,935.90	14,978.72	7,888.99	201.17	198.83	-88.30	411.99	-7,596.87	1,585.47	1,186.89	398.58	3.978		
15,400.00	7,935.90	15,078.72	7,888.99	203.81	201.50	-88.30	412.43	-7,696.87	1,585.47	1,181.58	403.89	3.925		
15,500.00	7,935.90	15,178.72	7,888.99	206.45	204.16	-88.30	412.87	-7,796.87	1,585.48	1,176.27	409.21	3.874		
15,600.00	7,935.90	15,278.72	7,888.99	209.10	206.82	-88.30	413.30	-7,896.87	1,585.48	1,170.95	414.53	3.825		
15,700.00	7,935.90	15,378.72	7,888.99	211.74	209.48	-88.30	413.74	-7,996.87	1,585.48	1,165.63	419.85	3.776		
15,800.00	7,935.90	15,478.72	7,888.99	214.39	212.15	-88.30	414.18	-8,096.87	1,585.49	1,160.32	425.17	3.729		
15,900.00	7,935.90	15,578.72	7,888.99	217.04	214.81	-88.30	414.62	-8,196.87	1,585.49	1,155.00	430.49	3.683		
16,000.00	7,935.89	15,678.72	7,888.99	219.69	217.48	-88.30	415.05	-8,296.87	1,585.49	1,149.67	435.82	3.638		
16,100.00	7,935.89	15,778.72	7,888.99	222.34	220.14	-88.30	415.49	-8,396.86	1,585.50	1,144.35	441.14	3.594		
16,200.00	7,935.89	15,878.72	7,888.99	224.99	222.81	-88.30	415.93	-8,496.86	1,585.50	1,139.03	446.47	3.551		
16,300.00	7,935.89	15,978.72	7,888.99	227.64	225.48	-88.30	416.36	-8,596.86	1,585.50	1,133.70	451.80	3.509		
16,400.00	7,935.89	16,078.72	7,888.99	230.29	228.15	-88.30	416.80	-8,696.86	1,585.51	1,128.38	457.13	3.468		
16,500.00	7,935.89	16,178.72	7,888.99	232.94	230.81	-88.31	417.24	-8,796.86	1,585.51	1,123.05	462.46	3.428		
16,600.00	7,935.89	16,278.72	7,888.99	235.60	233.48	-88.31	417.67	-8,896.86	1,585.51	1,117.72	467.79	3.389		
16,700.00	7,935.88	16,378.72	7,888.99	238.25	236.15	-88.31	418.11	-8,996.86	1,585.51	1,112.39	473.12	3.351		
16,800.00	7,935.88	16,478.72	7,888.99	240.91	238.82	-88.31	418.55	-9,096.86	1,585.52	1,107.06	478.46	3.314		
16,900.00	7,935.88	16,578.72	7,888.99	243.56	241.49	-88.31	418.99	-9,196.86	1,585.52	1,101.73	483.79	3.277		
17,000.00	7,935.88	16,678.72	7,888.99	246.22	244.16	-88.31	419.42	-9,296.86	1,585.52	1,096.40	489.13	3.242		
17,100.00	7,935.88	16,778.72	7,888.99	248.88	246.83	-88.31	419.86	-9,396.85	1,585.53	1,091.06	494.46	3.207		
17,200.00	7,935.88	16,878.72	7,888.99	251.54	249.50	-88.31	420.30	-9,496.85	1,585.53	1,085.73	499.80	3.172		
17,300.00	7,935.88	16,978.72	7,888.99	254.20	252.18	-88.31	420.73	-9,596.85	1,585.53	1,080.40	505.14	3.139		
17,400.00	7,935.87	17,078.72	7,888.99	256.86	254.85	-88.31	421.17	-9,696.85	1,585.54	1,075.06	510.48	3.106		
17,500.00	7,935.87	17,178.72	7,888.99	259.52	257.52	-88.31	421.61	-9,796.85	1,585.54	1,069.72	515.82	3.074		
17,600.00	7,935.87	17,278.72	7,888.99	262.18	260.19	-88.31	422.05	-9,896.85	1,585.54	1,064.39	521.16	3.042		
17,700.00	7,935.87	17,378.72	7,888.99	264.84	262.87	-88.31	422.48	-9,996.85	1,585.55	1,059.05	526.50	3.011		
17,800.00	7,935.87	17,478.72	7,888.99	267.50	265.54	-88.31	422.92	-10,096.85	1,585.55	1,053.71	531.84	2.981		
17,900.00	7,935.87	17,578.72	7,888.99	270.17	268.21	-88.31	423.36	-10,196.85	1,585.55	1,048.37	537.18	2.952		
18,000.00	7,935.87	17,678.72	7,888.99	272.83	270.89	-88.31	423.79	-10,296.85	1,585.56	1,043.03	542.53	2.923		
18,100.00	7,935.86	17,778.72	7,888.99	275.49	273.56	-88.31	424.23	-10,396.85	1,585.56	1,037.69	547.87	2.894		
18,200.00	7,935.86	17,878.72	7,888.99	278.16	276.24	-88.31	424.67	-10,496.84	1,585.56	1,032.35	553.21	2.866		
18,237.04	7,935.86	17,911.15	7,889.00	279.14	277.11	-88.31	424.78	-10,529.27	1,585.60	1,030.60	555.00	2.857		
18,239.20	7,936.00	17,913.30	7,889.00	279.20	277.16	-88.30	424.78	-10,531.42	1,585.27	1,030.16	555.11	2.856 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	-90.00	0.00	-90.00	90.00					
100.00	100.00	100.00	100.00	0.13	0.13	-90.00	0.00	-90.00	90.00	89.73	0.27	334.753		
200.00	200.00	200.00	200.00	0.49	0.49	-90.00	0.00	-90.00	90.00	89.01	0.99	91.296		
300.00	299.98	300.02	299.98	0.85	0.85	-83.18	0.00	-90.00	89.78	88.07	1.70	52.731		
400.00	399.84	400.16	399.84	1.22	1.21	-86.52	0.00	-90.00	89.31	86.88	2.42	36.858		
466.74	466.35	466.35	466.35	1.46	1.45	-90.00	0.00	-90.00	89.14	86.23	2.91	30.654	CC	
500.00	499.45	500.55	499.45	1.59	1.57	-92.10	0.00	-90.00	89.20	86.05	3.15	28.280	ES	
600.00	598.70	601.30	598.70	1.97	1.93	-99.75	0.00	-90.00	90.47	86.57	3.90	23.182		
700.00	697.47	702.53	697.47	2.38	2.29	-108.97	0.00	-90.00	94.41	89.74	4.67	20.213		
800.00	795.62	804.38	795.62	2.82	2.66	-118.84	0.00	-90.00	102.30	96.85	5.45	18.760		
900.00	893.06	906.94	893.06	3.29	3.03	-128.35	0.00	-90.00	115.02	108.78	6.24	18.438		
1,000.00	989.64	989.64	989.64	3.79	3.32	-136.75	0.00	-90.00	132.90	125.95	6.94	19.138		
1,081.03	1,067.21	1,067.21	1,067.21	4.23	3.60	-142.53	0.00	-90.00	151.10	143.55	7.55	20.018		
1,100.00	1,085.29	1,085.29	1,085.29	4.34	3.67	-143.79	0.00	-90.00	155.77	148.08	7.69	20.257		
1,200.00	1,180.60	1,180.60	1,180.60	4.91	4.01	-149.38	0.00	-90.00	181.42	173.01	8.41	21.560		
1,300.00	1,275.90	1,273.83	1,273.82	5.49	4.34	-153.26	-0.09	-90.95	208.70	199.58	9.12	22.883		
1,400.00	1,371.21	1,368.60	1,368.54	6.07	4.66	-155.82	-0.36	-93.94	237.40	227.57	9.83	24.145		
1,500.00	1,466.52	1,463.90	1,463.80	6.66	4.99	-157.83	-0.63	-97.02	266.47	255.92	10.55	25.261		
1,600.00	1,561.83	1,559.21	1,559.05	7.26	5.32	-159.44	-0.91	-100.09	295.78	284.51	11.27	26.249		
1,700.00	1,657.14	1,654.51	1,654.31	7.85	5.65	-160.77	-1.19	-103.17	325.27	313.28	11.99	27.126		
1,800.00	1,752.44	1,749.82	1,749.56	8.45	5.99	-161.87	-1.46	-106.25	354.89	342.17	12.72	27.908		
1,900.00	1,847.75	1,845.12	1,844.82	9.05	6.32	-162.81	-1.74	-109.32	384.61	371.17	13.44	28.609		
2,000.00	1,943.06	1,940.43	1,940.07	9.66	6.66	-163.61	-2.02	-112.40	414.42	400.24	14.17	29.239		
2,100.00	2,038.37	2,035.74	2,035.33	10.26	7.00	-164.31	-2.30	-115.47	444.29	429.38	14.91	29.808		
2,200.00	2,133.68	2,131.04	2,130.58	10.86	7.33	-164.91	-2.57	-118.55	474.21	458.57	15.64	30.324		
2,300.00	2,228.99	2,226.35	2,225.84	11.47	7.67	-165.45	-2.85	-121.62	504.17	487.80	16.37	30.793		
2,400.00	2,324.29	2,321.65	2,321.10	12.08	8.01	-165.92	-3.13	-124.70	534.17	517.06	17.11	31.223		
2,500.00	2,419.60	2,416.96	2,416.35	12.68	8.35	-166.35	-3.40	-127.78	564.20	546.36	17.85	31.616		
2,600.00	2,514.91	2,512.26	2,511.61	13.29	8.69	-166.73	-3.68	-130.85	594.26	575.67	18.58	31.978		
2,700.00	2,610.22	2,607.57	2,606.86	13.90	9.03	-167.07	-3.96	-133.93	624.33	605.01	19.32	32.313		
2,800.00	2,705.53	2,702.88	2,702.12	14.51	9.38	-167.39	-4.24	-137.00	654.43	634.37	20.06	32.622		
2,900.00	2,800.83	2,801.82	2,797.37	15.12	9.73	-167.67	-4.51	-140.08	684.54	663.72	20.81	32.888		
3,000.00	2,896.14	2,906.51	2,892.63	15.73	10.11	-167.93	-4.79	-143.16	714.66	693.07	21.59	33.104		
3,100.00	2,991.45	2,988.79	2,987.89	16.34	10.40	-168.17	-5.07	-146.23	744.80	722.52	22.28	33.424		
3,200.00	3,086.76	3,084.10	3,083.14	16.95	10.74	-168.40	-5.34	-149.31	774.95	751.93	23.03	33.657		
3,300.00	3,182.07	3,179.40	3,178.40	17.56	11.09	-168.60	-5.62	-152.38	805.11	781.34	23.77	33.874		
3,400.00	3,277.38	3,274.71	3,273.65	18.17	11.43	-168.79	-5.90	-155.46	835.28	810.77	24.51	34.078		
3,500.00	3,372.68	3,370.01	3,368.91	18.78	11.77	-168.97	-6.18	-158.53	865.45	840.20	25.25	34.270		
3,600.00	3,467.99	3,465.32	3,464.16	19.39	12.12	-169.13	-6.45	-161.61	895.63	869.64	26.00	34.451		
3,700.00	3,563.30	3,560.63	3,559.42	20.00	12.46	-169.29	-6.73	-164.69	925.82	899.08	26.74	34.621		
3,800.00	3,658.61	3,655.93	3,654.67	20.61	12.80	-169.43	-7.01	-167.76	956.02	928.53	27.49	34.782		
3,900.00	3,753.92	3,751.24	3,749.93	21.22	13.15	-169.57	-7.28	-170.84	986.22	957.99	28.23	34.934		
4,000.00	3,849.22	3,846.54	3,845.19	21.83	13.49	-169.70	-7.56	-173.91	1,016.42	987.45	28.98	35.079		
4,100.00	3,944.53	3,941.85	3,940.44	22.45	13.83	-169.82	-7.84	-176.99	1,046.63	1,016.91	29.72	35.215		
4,200.00	4,039.84	4,037.15	4,035.70	23.06	14.18	-169.93	-8.12	-180.06	1,076.84	1,046.38	30.47	35.345		
4,300.00	4,135.15	4,132.46	4,130.95	23.67	14.52	-170.04	-8.39	-183.14	1,107.06	1,075.85	31.21	35.469		
4,400.00	4,230.46	4,227.76	4,226.21	24.28	14.87	-170.14	-8.67	-186.22	1,137.28	1,105.32	31.96	35.586		
4,500.00	4,325.77	4,323.07	4,321.46	24.89	15.21	-170.24	-8.95	-189.29	1,167.50	1,134.80	32.70	35.699		
4,600.00	4,421.07	4,418.38	4,416.72	25.51	15.55	-170.33	-9.22	-192.37	1,197.73	1,164.28	33.45	35.805		
4,700.00	4,516.38	4,513.68	4,511.97	26.12	15.90	-170.42	-9.50	-195.44	1,227.96	1,193.76	34.20	35.907		
4,800.00	4,611.69	4,608.99	4,607.23	26.73	16.24	-170.50	-9.78	-198.52	1,258.19	1,223.24	34.94	36.005		
4,900.00	4,707.00	4,704.29	4,702.49	27.34	16.59	-170.58	-10.06	-201.59	1,288.42	1,252.73	35.69	36.098		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,000.00	4,802.31	4,800.40	4,797.74	27.95	16.93	-170.65	-10.33	-204.67	1,318.66	1,282.21	36.44	36.185		
5,100.00	4,897.61	4,905.10	4,893.00	28.57	17.31	-170.73	-10.61	-207.75	1,348.89	1,311.67	37.22	36.238		
5,200.00	4,992.92	5,009.79	4,988.25	29.18	17.69	-170.79	-10.89	-210.82	1,379.13	1,341.13	38.01	36.288		
5,300.00	5,088.23	5,085.52	5,083.51	29.79	17.97	-170.86	-11.17	-213.90	1,409.37	1,370.69	38.68	36.435		
5,400.00	5,183.54	5,180.82	5,178.76	30.40	18.31	-170.92	-11.44	-216.97	1,439.61	1,400.18	39.43	36.510		
5,500.00	5,278.85	5,276.13	5,274.02	31.01	18.65	-170.98	-11.72	-220.05	1,469.86	1,429.68	40.18	36.583		
5,600.00	5,374.15	5,371.43	5,369.27	31.63	19.00	-171.04	-12.00	-223.13	1,500.10	1,459.18	40.93	36.653		
5,700.00	5,469.46	5,466.74	5,464.53	32.24	19.34	-171.10	-12.27	-226.20	1,530.35	1,488.67	41.68	36.721		
5,800.00	5,564.77	5,562.04	5,559.79	32.85	19.69	-171.15	-12.55	-229.28	1,560.60	1,518.17	42.42	36.786		
5,900.00	5,660.08	5,657.35	5,655.04	33.46	20.03	-171.20	-12.83	-232.35	1,590.85	1,547.67	43.17	36.848		
6,000.00	5,755.39	5,752.65	5,750.30	34.08	20.38	-171.25	-13.11	-235.43	1,621.10	1,577.18	43.92	36.908		
6,100.00	5,850.70	5,847.96	5,845.55	34.69	20.72	-171.30	-13.38	-238.50	1,651.35	1,606.68	44.67	36.967		
6,200.00	5,946.00	5,943.27	5,940.81	35.30	21.07	-171.35	-13.66	-241.58	1,681.60	1,636.18	45.42	37.023		
6,300.00	6,041.31	6,038.57	6,036.06	35.91	21.41	-171.39	-13.94	-244.66	1,711.85	1,665.68	46.17	37.077		
6,400.00	6,136.62	6,133.88	6,131.32	36.53	21.76	-171.43	-14.21	-247.73	1,742.11	1,695.19	46.92	37.130		
6,500.00	6,231.93	6,229.18	6,226.57	37.14	22.10	-171.48	-14.49	-250.81	1,772.36	1,724.69	47.67	37.180		
6,600.00	6,327.24	6,324.49	6,321.83	37.75	22.45	-171.52	-14.77	-253.88	1,802.62	1,754.20	48.42	37.229		
6,700.00	6,422.54	6,419.79	6,417.09	38.37	22.79	-171.55	-15.05	-256.96	1,832.88	1,783.71	49.17	37.277		
6,745.38	6,465.79	6,463.04	6,460.31	38.64	22.95	-171.57	-15.17	-258.35	1,846.61	1,797.10	49.51	37.298		
6,800.00	6,518.01	6,515.25	6,512.49	38.97	23.14	-171.64	-15.32	-260.04	1,862.64	1,812.72	49.92	37.313		
6,900.00	6,614.35	6,611.59	6,608.78	39.54	23.49	-171.74	-15.60	-263.15	1,889.44	1,838.77	50.66	37.294		
7,000.00	6,711.57	6,708.80	6,705.94	40.06	23.84	-171.81	-15.89	-266.29	1,912.89	1,861.48	51.40	37.213		
7,100.00	6,809.55	6,806.75	6,803.84	40.53	24.20	-171.86	-16.17	-269.45	1,932.96	1,880.83	52.14	37.075		
7,200.00	6,908.17	6,905.34	6,902.38	40.96	24.55	-171.88	-16.46	-272.63	1,949.65	1,896.79	52.86	36.883		
7,300.00	7,007.30	7,004.44	7,001.43	41.35	24.91	-171.88	-16.75	-275.83	1,962.91	1,909.34	53.58	36.638		
7,400.00	7,106.83	7,106.80	7,103.74	41.69	25.28	-171.86	-17.01	-278.78	1,972.72	1,918.42	54.30	36.330		
7,500.00	7,206.63	7,209.79	7,206.72	41.98	25.64	-171.88	-17.05	-279.72	1,978.85	1,923.85	55.00	35.980		
7,600.00	7,306.59	7,308.36	7,304.35	42.23	26.02	-171.53	-16.99	-292.40	1,981.51	1,925.80	55.71	35.569		
7,626.41	7,333.00	7,333.44	7,328.72	42.29	26.12	-179.28	-16.97	-298.29	1,981.68	1,925.78	55.90	35.453		
7,656.41	7,363.00	7,361.23	7,355.41	42.35	26.23	-179.06	-16.93	-306.06	1,981.76	1,925.66	56.11	35.320		
7,700.00	7,406.55	7,400.65	7,392.54	42.45	26.40	-88.95	-16.87	-319.27	1,981.97	1,925.56	56.41	35.133		
7,750.00	7,456.18	7,444.97	7,433.09	42.56	26.59	-88.54	-16.80	-337.13	1,982.31	1,925.54	56.77	34.920		
7,800.00	7,505.10	7,488.43	7,471.39	42.68	26.79	-88.15	-16.71	-357.64	1,982.73	1,925.60	57.13	34.707		
7,850.00	7,552.93	7,531.11	7,507.39	42.81	27.00	-87.77	-16.61	-380.54	1,983.23	1,925.73	57.50	34.490		
7,900.00	7,599.32	7,573.09	7,541.04	42.94	27.21	-87.40	-16.50	-405.63	1,983.79	1,925.90	57.89	34.269		
7,950.00	7,643.91	7,614.45	7,572.31	43.08	27.44	-87.05	-16.38	-432.68	1,984.39	1,926.10	58.29	34.042		
8,000.00	7,686.37	7,655.25	7,601.17	43.22	27.68	-86.72	-16.25	-461.51	1,985.03	1,926.31	58.72	33.805		
8,050.00	7,726.36	7,695.56	7,627.59	43.37	27.94	-86.41	-16.12	-491.94	1,985.68	1,926.50	59.18	33.555		
8,100.00	7,763.59	7,735.43	7,651.56	43.53	28.21	-86.12	-15.98	-523.79	1,986.32	1,926.65	59.67	33.287		
8,150.00	7,797.77	7,774.91	7,673.06	43.69	28.51	-85.86	-15.84	-556.90	1,986.95	1,926.74	60.21	33.002		
8,200.00	7,828.65	7,814.06	7,692.07	43.86	28.83	-85.62	-15.69	-591.12	1,987.54	1,926.75	60.79	32.696		
8,250.00	7,855.98	7,852.93	7,708.59	44.05	29.17	-85.41	-15.53	-626.29	1,988.09	1,926.67	61.42	32.368		
8,300.00	7,879.55	7,891.56	7,722.61	44.25	29.54	-85.23	-15.38	-662.27	1,988.59	1,926.47	62.12	32.013		
8,350.00	7,899.20	7,929.98	7,734.12	44.47	29.93	-85.08	-15.22	-698.93	1,989.01	1,926.14	62.88	31.634		
8,400.00	7,914.77	7,968.24	7,743.12	44.71	30.35	-84.96	-15.05	-736.11	1,989.36	1,925.67	63.69	31.234		
8,450.00	7,926.14	8,006.39	7,749.60	44.98	30.78	-84.87	-14.89	-773.69	1,989.62	1,925.05	64.57	30.815		
8,500.00	7,933.22	8,044.44	7,753.56	45.26	31.24	-84.81	-14.73	-811.53	1,989.79	1,924.29	65.50	30.378		
8,550.00	7,935.96	8,082.45	7,754.99	45.58	31.71	-84.78	-14.56	-849.51	1,989.87	1,923.39	66.49	29.930		
8,556.48	7,936.00	8,088.09	7,755.00	45.62	31.79	-84.78	-14.53	-855.14	1,989.87	1,923.25	66.63	29.865		
8,600.00	7,936.00	8,131.61	7,755.00	45.92	32.38	-84.78	-14.34	-898.66	1,989.88	1,922.12	67.76	29.367		
8,700.00	7,936.00	8,231.61	7,755.00	46.70	33.81	-84.78	-13.91	-998.66	1,989.88	1,919.34	70.54	28.209		
8,800.00	7,936.00	8,331.61	7,755.00	47.61	35.39	-84.78	-13.47	-1,098.66	1,989.88	1,916.28	73.61	27.034		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-6 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
8,900.00	7,936.00	8,431.61	7,755.00	48.66	37.10	-84.78	-13.03	-1,198.66	1,989.89	1,912.96	76.93	25.867		
9,000.00	7,935.99	8,531.61	7,755.00	49.84	38.92	-84.78	-12.60	-1,298.66	1,989.89	1,909.42	80.47	24.730		
9,100.00	7,935.99	8,631.61	7,755.00	51.16	40.84	-84.78	-12.16	-1,398.66	1,989.89	1,905.70	84.20	23.634		
9,200.00	7,935.99	8,731.61	7,755.00	52.60	42.84	-84.78	-11.73	-1,498.66	1,989.90	1,901.80	88.10	22.587		
9,300.00	7,935.99	8,831.61	7,755.00	54.16	44.91	-84.78	-11.29	-1,598.66	1,989.90	1,897.76	92.14	21.596		
9,400.00	7,935.99	8,931.61	7,755.00	55.82	47.05	-84.78	-10.85	-1,698.65	1,989.90	1,893.59	96.32	20.660		
9,500.00	7,935.99	9,031.61	7,755.00	57.58	49.24	-84.78	-10.42	-1,798.65	1,989.91	1,889.30	100.60	19.780		
9,600.00	7,935.99	9,131.61	7,755.00	59.43	51.48	-84.78	-9.98	-1,898.65	1,989.91	1,884.92	104.99	18.954		
9,700.00	7,935.98	9,231.61	7,755.00	61.36	53.75	-84.78	-9.54	-1,998.65	1,989.91	1,880.45	109.46	18.179		
9,800.00	7,935.98	9,331.61	7,755.00	63.35	56.07	-84.78	-9.11	-2,098.65	1,989.92	1,875.91	114.01	17.454		
9,900.00	7,935.98	9,431.61	7,755.00	65.40	58.42	-84.78	-8.67	-2,198.65	1,989.92	1,871.30	118.62	16.775		
10,000.00	7,935.98	9,531.61	7,755.00	67.50	60.79	-84.78	-8.23	-2,298.65	1,989.92	1,866.63	123.30	16.139		
10,100.00	7,935.98	9,631.61	7,755.00	69.66	63.19	-84.78	-7.80	-2,398.65	1,989.93	1,861.90	128.03	15.543		
10,200.00	7,935.98	9,731.61	7,755.00	71.85	65.62	-84.78	-7.36	-2,498.65	1,989.93	1,857.13	132.80	14.984		
10,300.00	7,935.98	9,831.61	7,755.00	74.08	68.06	-84.78	-6.92	-2,598.65	1,989.94	1,852.31	137.62	14.459		
10,400.00	7,935.97	9,931.61	7,755.00	76.35	70.52	-84.78	-6.49	-2,698.65	1,989.94	1,847.46	142.48	13.966		
10,500.00	7,935.97	10,031.61	7,755.00	78.64	73.00	-84.78	-6.05	-2,798.64	1,989.94	1,842.57	147.37	13.503		
10,600.00	7,935.97	10,131.61	7,755.00	80.97	75.49	-84.78	-5.61	-2,898.64	1,989.95	1,837.65	152.30	13.066		
10,700.00	7,935.97	10,231.61	7,755.00	83.32	77.99	-84.78	-5.18	-2,998.64	1,989.95	1,832.70	157.25	12.655		
10,800.00	7,935.97	10,331.61	7,755.00	85.69	80.51	-84.78	-4.74	-3,098.64	1,989.95	1,827.72	162.23	12.266		
10,900.00	7,935.97	10,431.61	7,755.00	88.08	83.04	-84.78	-4.30	-3,198.64	1,989.96	1,822.73	167.23	11.900		
11,000.00	7,935.97	10,531.61	7,755.00	90.49	85.58	-84.78	-3.87	-3,298.64	1,989.96	1,817.71	172.25	11.553		
11,100.00	7,935.96	10,631.61	7,755.00	92.91	88.12	-84.78	-3.43	-3,398.64	1,989.96	1,812.67	177.29	11.224		
11,200.00	7,935.96	10,731.61	7,755.00	95.35	90.68	-84.78	-2.99	-3,498.64	1,989.97	1,807.61	182.35	10.913		
11,300.00	7,935.96	10,831.61	7,755.00	97.81	93.24	-84.78	-2.56	-3,598.64	1,989.97	1,802.54	187.43	10.617		
11,400.00	7,935.96	10,931.61	7,755.00	100.28	95.81	-84.78	-2.12	-3,698.64	1,989.97	1,797.45	192.52	10.336		
11,500.00	7,935.96	11,031.61	7,755.00	102.76	98.39	-84.78	-1.68	-3,798.63	1,989.98	1,792.35	197.63	10.069		
11,600.00	7,935.96	11,131.61	7,755.00	105.25	100.97	-84.78	-1.25	-3,898.63	1,989.98	1,787.23	202.75	9.815		
11,700.00	7,935.96	11,231.61	7,755.00	107.75	103.56	-84.78	-0.81	-3,998.63	1,989.98	1,782.10	207.88	9.573		
11,800.00	7,935.95	11,331.61	7,755.00	110.26	106.15	-84.78	-0.37	-4,098.63	1,989.99	1,776.96	213.02	9.342		
11,900.00	7,935.95	11,431.61	7,755.00	112.78	108.75	-84.78	0.06	-4,198.63	1,989.99	1,771.81	218.18	9.121		
12,000.00	7,935.95	11,531.61	7,755.00	115.31	111.35	-84.78	0.50	-4,298.63	1,989.99	1,766.66	223.34	8.910		
12,100.00	7,935.95	11,631.61	7,755.00	117.84	113.95	-84.78	0.94	-4,398.63	1,990.00	1,761.49	228.51	8.709		
12,200.00	7,935.95	11,731.61	7,755.00	120.39	116.56	-84.78	1.37	-4,498.63	1,990.00	1,756.31	233.69	8.516		
12,300.00	7,935.95	11,831.61	7,755.00	122.94	119.18	-84.78	1.81	-4,598.63	1,990.00	1,751.13	238.88	8.331		
12,400.00	7,935.95	11,931.61	7,755.00	125.49	121.79	-84.78	2.25	-4,698.63	1,990.01	1,745.93	244.07	8.153		
12,500.00	7,935.94	12,031.61	7,755.00	128.05	124.41	-84.78	2.68	-4,798.63	1,990.01	1,740.74	249.27	7.983		
12,600.00	7,935.94	12,131.61	7,755.00	130.62	127.03	-84.78	3.12	-4,898.62	1,990.01	1,735.53	254.48	7.820		
12,700.00	7,935.94	12,231.61	7,755.00	133.19	129.66	-84.78	3.56	-4,998.62	1,990.02	1,730.32	259.70	7.663		
12,800.00	7,935.94	12,331.61	7,755.00	135.77	132.29	-84.78	3.99	-5,098.62	1,990.02	1,725.10	264.92	7.512		
12,900.00	7,935.94	12,431.61	7,755.00	138.35	134.92	-84.78	4.43	-5,198.62	1,990.03	1,719.88	270.14	7.367		
13,000.00	7,935.94	12,531.61	7,755.00	140.93	137.55	-84.78	4.86	-5,298.62	1,990.03	1,714.65	275.37	7.227		
13,100.00	7,935.94	12,631.61	7,755.00	143.52	140.18	-84.78	5.30	-5,398.62	1,990.03	1,709.42	280.61	7.092		
13,200.00	7,935.93	12,731.61	7,755.00	146.11	142.82	-84.78	5.74	-5,498.62	1,990.04	1,704.19	285.85	6.962		
13,300.00	7,935.93	12,831.61	7,755.00	148.71	145.46	-84.78	6.17	-5,598.62	1,990.04	1,698.94	291.09	6.836		
13,400.00	7,935.93	12,931.61	7,755.00	151.31	148.10	-84.78	6.61	-5,698.62	1,990.04	1,693.70	296.34	6.715		
13,500.00	7,935.93	13,031.61	7,754.99	153.91	150.74	-84.78	7.05	-5,798.62	1,990.05	1,688.45	301.60	6.598		
13,600.00	7,935.93	13,131.61	7,754.99	156.52	153.39	-84.78	7.48	-5,898.61	1,990.05	1,683.20	306.85	6.485		
13,700.00	7,935.93	13,231.61	7,754.99	159.13	156.03	-84.78	7.92	-5,998.61	1,990.05	1,677.94	312.11	6.376		
13,800.00	7,935.93	13,331.61	7,754.99	161.74	158.68	-84.78	8.36	-6,098.61	1,990.06	1,672.68	317.37	6.270		
13,900.00	7,935.92	13,431.61	7,754.99	164.35	161.33	-84.78	8.79	-6,198.61	1,990.06	1,667.42	322.64	6.168		
14,000.00	7,935.92	13,531.61	7,754.99	166.97	163.98	-84.78	9.23	-6,298.61	1,990.06	1,662.15	327.91	6.069		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-6 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,100.00	7,935.92	13,631.61	7,754.99	169.59	166.63	-84.78	9.67	-6,398.61	1,990.07	1,656.89	333.18	5.973		
14,200.00	7,935.92	13,731.61	7,754.99	172.21	169.28	-84.78	10.10	-6,498.61	1,990.07	1,651.62	338.45	5.880		
14,300.00	7,935.92	13,831.61	7,754.99	174.84	171.93	-84.78	10.54	-6,598.61	1,990.07	1,646.34	343.73	5.790		
14,400.00	7,935.92	13,931.61	7,754.99	177.46	174.59	-84.78	10.98	-6,698.61	1,990.08	1,641.07	349.01	5.702		
14,500.00	7,935.92	14,031.61	7,754.99	180.09	177.24	-84.78	11.41	-6,798.61	1,990.08	1,635.79	354.29	5.617		
14,600.00	7,935.91	14,131.61	7,754.99	182.72	179.90	-84.78	11.85	-6,898.61	1,990.08	1,630.51	359.58	5.535		
14,700.00	7,935.91	14,231.61	7,754.99	185.35	182.56	-84.78	12.29	-6,998.60	1,990.09	1,625.22	364.86	5.454		
14,800.00	7,935.91	14,331.61	7,754.99	187.98	185.22	-84.78	12.72	-7,098.60	1,990.09	1,619.94	370.15	5.376		
14,900.00	7,935.91	14,431.61	7,754.99	190.62	187.88	-84.78	13.16	-7,198.60	1,990.09	1,614.65	375.44	5.301		
15,000.00	7,935.91	14,531.61	7,754.99	193.25	190.54	-84.78	13.60	-7,298.60	1,990.10	1,609.36	380.73	5.227		
15,100.00	7,935.91	14,631.61	7,754.99	195.89	193.20	-84.78	14.03	-7,398.60	1,990.10	1,604.07	386.03	5.155		
15,200.00	7,935.91	14,731.61	7,754.99	198.53	195.86	-84.78	14.47	-7,498.60	1,990.10	1,598.78	391.32	5.086		
15,300.00	7,935.90	14,831.61	7,754.99	201.17	198.52	-84.78	14.91	-7,598.60	1,990.11	1,593.49	396.62	5.018		
15,400.00	7,935.90	14,931.61	7,754.99	203.81	201.19	-84.78	15.34	-7,698.60	1,990.11	1,588.19	401.92	4.952		
15,500.00	7,935.90	15,031.61	7,754.99	206.45	203.85	-84.78	15.78	-7,798.60	1,990.11	1,582.89	407.22	4.887		
15,600.00	7,935.90	15,131.61	7,754.99	209.10	206.51	-84.78	16.22	-7,898.60	1,990.12	1,577.60	412.52	4.824		
15,700.00	7,935.90	15,231.61	7,754.99	211.74	209.18	-84.78	16.65	-7,998.59	1,990.12	1,572.29	417.83	4.763		
15,800.00	7,935.90	15,331.61	7,754.99	214.39	211.85	-84.78	17.09	-8,098.59	1,990.13	1,566.99	423.13	4.703		
15,900.00	7,935.90	15,431.61	7,754.99	217.04	214.51	-84.78	17.53	-8,198.59	1,990.13	1,561.69	428.44	4.645		
16,000.00	7,935.89	15,531.61	7,754.99	219.69	217.18	-84.78	17.96	-8,298.59	1,990.13	1,556.39	433.75	4.588		
16,100.00	7,935.89	15,631.61	7,754.99	222.34	219.85	-84.78	18.40	-8,398.59	1,990.14	1,551.08	439.05	4.533		
16,200.00	7,935.89	15,731.61	7,754.99	224.99	222.52	-84.78	18.84	-8,498.59	1,990.14	1,545.77	444.36	4.479		
16,300.00	7,935.89	15,831.61	7,754.99	227.64	225.18	-84.78	19.27	-8,598.59	1,990.14	1,540.47	449.68	4.426		
16,400.00	7,935.89	15,931.61	7,754.99	230.29	227.85	-84.78	19.71	-8,698.59	1,990.15	1,535.16	454.99	4.374		
16,500.00	7,935.89	16,031.61	7,754.99	232.94	230.52	-84.78	20.15	-8,798.59	1,990.15	1,529.85	460.30	4.324		
16,600.00	7,935.89	16,131.61	7,754.99	235.60	233.19	-84.78	20.58	-8,898.59	1,990.15	1,524.54	465.62	4.274		
16,700.00	7,935.88	16,231.61	7,754.99	238.25	235.86	-84.78	21.02	-8,998.59	1,990.16	1,519.23	470.93	4.226		
16,800.00	7,935.88	16,331.61	7,754.99	240.91	238.53	-84.79	21.45	-9,098.58	1,990.16	1,513.91	476.25	4.179		
16,900.00	7,935.88	16,431.61	7,754.99	243.56	241.21	-84.79	21.89	-9,198.58	1,990.16	1,508.60	481.56	4.133		
17,000.00	7,935.88	16,531.61	7,754.99	246.22	243.88	-84.79	22.33	-9,298.58	1,990.17	1,503.29	486.88	4.088		
17,100.00	7,935.88	16,631.61	7,754.99	248.88	246.55	-84.79	22.76	-9,398.58	1,990.17	1,497.97	492.20	4.043		
17,200.00	7,935.88	16,731.61	7,754.99	251.54	249.22	-84.79	23.20	-9,498.58	1,990.17	1,492.65	497.52	4.000		
17,300.00	7,935.88	16,831.61	7,754.99	254.20	251.90	-84.79	23.64	-9,598.58	1,990.18	1,487.34	502.84	3.958		
17,400.00	7,935.87	16,931.61	7,754.99	256.86	254.57	-84.79	24.07	-9,698.58	1,990.18	1,482.02	508.16	3.916		
17,500.00	7,935.87	17,031.61	7,754.99	259.52	257.24	-84.79	24.51	-9,798.58	1,990.18	1,476.70	513.48	3.876		
17,600.00	7,935.87	17,131.61	7,754.99	262.18	259.92	-84.79	24.95	-9,898.58	1,990.19	1,471.38	518.81	3.836		
17,700.00	7,935.87	17,231.61	7,754.99	264.84	262.59	-84.79	25.38	-9,998.58	1,990.19	1,466.06	524.13	3.797		
17,800.00	7,935.87	17,331.61	7,754.99	267.50	265.27	-84.79	25.82	-10,098.57	1,990.19	1,460.74	529.46	3.759		
17,900.00	7,935.87	17,431.61	7,754.99	270.17	267.94	-84.79	26.26	-10,198.57	1,990.20	1,455.42	534.78	3.722		
18,000.00	7,935.87	17,531.61	7,754.99	272.83	270.62	-84.79	26.69	-10,298.57	1,990.20	1,450.10	540.11	3.685		
18,100.00	7,935.86	17,631.61	7,754.99	275.49	273.29	-84.79	27.13	-10,398.57	1,990.20	1,444.77	545.43	3.649		
18,200.00	7,935.86	17,731.75	7,754.99	278.16	275.97	-84.79	27.57	-10,498.72	1,990.21	1,439.44	550.76	3.614		
18,239.20	7,936.00	17,770.95	7,755.00	279.20	277.02	-84.78	27.74	-10,537.91	1,989.88	1,437.03	552.85	3.599 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-7 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	89.99	0.00	16.87	16.87					
100.00	100.00	100.00	100.00	0.13	0.13	89.99	0.00	16.87	16.87	16.61	0.27	62.766		
200.00	200.00	200.00	200.00	0.49	0.49	89.99	0.00	16.87	16.87	15.89	0.99	17.118 CC		
300.00	299.98	300.02	299.98	0.85	0.85	103.67	0.00	16.87	17.20	15.50	1.70	10.104 ES		
400.00	399.84	400.16	399.84	1.22	1.21	119.04	0.00	16.87	19.13	16.70	2.42	7.891		
500.00	499.45	500.55	499.45	1.59	1.57	136.99	0.00	16.87	24.58	21.42	3.15	7.791		
600.00	598.70	601.30	598.70	1.97	1.93	150.80	0.00	16.87	34.52	30.63	3.89	8.876		
700.00	697.47	702.53	697.47	2.38	2.29	159.69	0.00	16.87	48.80	44.17	4.63	10.549		
800.00	795.62	804.38	795.62	2.82	2.66	165.25	0.00	16.87	67.04	61.68	5.37	12.494		
900.00	893.06	906.94	893.06	3.29	3.03	168.85	0.00	16.87	89.00	82.89	6.11	14.565		
1,000.00	989.64	989.64	989.64	3.79	3.32	171.27	0.00	16.87	114.53	107.74	6.79	16.872		
1,081.03	1,067.21	1,067.21	1,067.21	4.23	3.60	172.69	0.00	16.87	137.75	130.37	7.38	18.670		
1,100.00	1,085.29	1,085.29	1,085.29	4.34	3.67	172.98	0.00	16.87	143.45	135.93	7.52	19.078		
1,200.00	1,180.60	1,177.59	1,177.58	4.91	3.99	174.45	-0.83	16.24	174.25	166.04	8.21	21.232		
1,300.00	1,275.90	1,267.97	1,267.88	5.49	4.29	176.10	-3.93	13.91	207.08	198.21	8.87	23.341		
1,400.00	1,371.21	1,358.06	1,357.72	6.07	4.59	177.83	-9.19	9.94	241.97	232.43	9.53	25.380		
1,500.00	1,466.52	1,451.30	1,450.65	6.66	4.91	179.29	-15.26	5.35	277.57	267.34	10.23	27.144		
1,600.00	1,561.83	1,544.54	1,543.57	7.26	5.23	-179.57	-21.34	0.76	313.29	302.37	10.92	28.677		
1,700.00	1,657.14	1,637.78	1,636.50	7.85	5.56	-178.67	-27.42	-3.82	349.10	337.47	11.63	30.020		
1,800.00	1,752.44	1,731.02	1,729.43	8.45	5.89	-177.94	-33.49	-8.41	384.97	372.63	12.34	31.201		
1,900.00	1,847.75	1,824.26	1,822.36	9.05	6.23	-177.33	-39.57	-13.00	420.89	407.84	13.05	32.247		
2,000.00	1,943.06	1,917.50	1,915.29	9.66	6.57	-176.81	-45.65	-17.58	456.84	443.07	13.77	33.179		
2,100.00	2,038.37	2,010.74	2,008.22	10.26	6.91	-176.37	-51.72	-22.17	492.82	478.33	14.49	34.015		
2,200.00	2,133.68	2,103.99	2,101.15	10.86	7.25	-175.99	-57.80	-26.76	528.82	513.61	15.21	34.767		
2,300.00	2,228.99	2,202.77	2,194.08	11.47	7.62	-175.66	-63.88	-31.34	564.84	548.89	15.95	35.403		
2,400.00	2,324.29	2,309.53	2,287.01	12.08	8.01	-175.37	-69.95	-35.93	600.88	584.15	16.73	35.917		
2,500.00	2,419.60	2,383.71	2,379.94	12.68	8.29	-175.11	-76.03	-40.52	636.92	619.53	17.39	36.629		
2,600.00	2,514.91	2,476.95	2,472.87	13.29	8.64	-174.88	-82.11	-45.10	672.98	654.86	18.12	37.145		
2,700.00	2,610.22	2,570.19	2,565.80	13.90	8.98	-174.68	-88.18	-49.69	709.04	690.19	18.85	37.619		
2,800.00	2,705.53	2,663.43	2,658.73	14.51	9.33	-174.49	-94.26	-54.28	745.11	725.54	19.58	38.056		
2,900.00	2,800.83	2,756.67	2,751.66	15.12	9.68	-174.32	-100.34	-58.86	781.19	760.88	20.31	38.460		
3,000.00	2,896.14	2,849.92	2,844.59	15.73	10.04	-174.16	-106.41	-63.45	817.28	796.23	21.05	38.834		
3,100.00	2,991.45	2,943.16	2,937.52	16.34	10.39	-174.02	-112.49	-68.04	853.36	831.58	21.78	39.182		
3,200.00	3,086.76	3,036.40	3,030.45	16.95	10.74	-173.89	-118.57	-72.62	889.46	866.94	22.51	39.506		
3,300.00	3,182.07	3,129.64	3,123.38	17.56	11.09	-173.77	-124.64	-77.21	925.55	902.30	23.25	39.808		
3,400.00	3,277.38	3,222.88	3,216.31	18.17	11.45	-173.66	-130.72	-81.80	961.65	937.66	23.99	40.092		
3,500.00	3,372.68	3,316.12	3,309.24	18.78	11.80	-173.56	-136.80	-86.38	997.75	973.03	24.72	40.357		
3,600.00	3,467.99	3,409.36	3,402.17	19.39	12.15	-173.46	-142.87	-90.97	1,033.86	1,008.40	25.46	40.606		
3,700.00	3,563.30	3,502.60	3,495.10	20.00	12.51	-173.37	-148.95	-95.55	1,069.97	1,043.77	26.20	40.841		
3,800.00	3,658.61	3,604.15	3,588.03	20.61	12.90	-173.29	-155.03	-100.14	1,106.07	1,079.11	26.97	41.015		
3,900.00	3,753.92	3,689.09	3,680.96	21.22	13.22	-173.21	-161.10	-104.73	1,142.19	1,114.51	27.68	41.270		
4,000.00	3,849.22	3,782.33	3,773.89	21.83	13.57	-173.14	-167.18	-109.31	1,178.30	1,149.88	28.41	41.467		
4,100.00	3,944.53	3,875.57	3,866.82	22.45	13.93	-173.07	-173.26	-113.90	1,214.41	1,185.26	29.15	41.654		
4,200.00	4,039.84	3,968.81	3,959.75	23.06	14.29	-173.00	-179.33	-118.49	1,250.53	1,220.63	29.89	41.831		
4,300.00	4,135.15	4,062.05	4,052.68	23.67	14.64	-172.94	-185.41	-123.07	1,286.65	1,256.01	30.63	41.999		
4,400.00	4,230.46	4,155.29	4,145.61	24.28	15.00	-172.88	-191.49	-127.66	1,322.76	1,291.39	31.38	42.159		
4,500.00	4,325.77	4,248.54	4,238.54	24.89	15.35	-172.83	-197.56	-132.25	1,358.88	1,326.77	32.12	42.311		
4,600.00	4,421.07	4,341.78	4,331.47	25.51	15.71	-172.77	-203.64	-136.83	1,395.00	1,362.15	32.86	42.456		
4,700.00	4,516.38	4,435.02	4,424.40	26.12	16.07	-172.73	-209.72	-141.42	1,431.13	1,397.53	33.60	42.594		
4,800.00	4,611.69	4,528.26	4,517.33	26.73	16.43	-172.68	-215.79	-146.01	1,467.25	1,432.91	34.34	42.725		
4,900.00	4,707.00	4,621.50	4,610.26	27.34	16.78	-172.63	-221.87	-150.59	1,503.37	1,468.29	35.08	42.851		
5,000.00	4,802.31	4,714.74	4,703.19	27.95	17.14	-172.59	-227.95	-155.18	1,539.50	1,503.67	35.83	42.971		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,100.00	4,897.61	4,807.98	4,796.12	28.57	17.50	-172.55	-234.02	-159.77	1,575.62	1,539.05	36.57	43.087		
5,200.00	4,992.92	4,901.22	4,889.05	29.18	17.85	-172.51	-240.10	-164.35	1,611.75	1,574.43	37.31	43.197		
5,300.00	5,088.23	4,994.47	4,981.98	29.79	18.21	-172.47	-246.18	-168.94	1,647.87	1,609.82	38.05	43.303		
5,400.00	5,183.54	5,087.71	5,074.91	30.40	18.57	-172.44	-252.25	-173.53	1,684.00	1,645.20	38.80	43.404		
5,500.00	5,278.85	5,180.95	5,167.84	31.01	18.93	-172.40	-258.33	-178.11	1,720.13	1,680.58	39.54	43.501		
5,600.00	5,374.15	5,274.19	5,260.77	31.63	19.29	-172.37	-264.40	-182.70	1,756.25	1,715.97	40.29	43.595		
5,700.00	5,469.46	5,367.43	5,353.70	32.24	19.64	-172.34	-270.48	-187.29	1,792.38	1,751.35	41.03	43.685		
5,800.00	5,564.77	5,460.67	5,446.63	32.85	20.00	-172.31	-276.56	-191.87	1,828.51	1,786.74	41.77	43.771		
5,900.00	5,660.08	5,553.91	5,539.56	33.46	20.36	-172.28	-282.63	-196.46	1,864.64	1,822.12	42.52	43.854		
6,000.00	5,755.39	5,647.15	5,632.49	34.08	20.72	-172.25	-288.71	-201.05	1,900.77	1,857.50	43.26	43.935		
6,100.00	5,850.70	5,740.40	5,725.42	34.69	21.08	-172.23	-294.79	-205.63	1,936.90	1,892.89	44.01	44.012		
6,200.00	5,946.00	5,833.64	5,818.35	35.30	21.44	-172.20	-300.86	-210.22	1,973.03	1,928.27	44.75	44.086		
6,300.00	6,041.31	5,926.88	5,911.28	35.91	21.79	-172.17	-306.94	-214.81	2,009.16	1,963.66	45.50	44.158		
6,400.00	6,136.62	6,020.12	6,004.21	36.53	22.15	-172.15	-313.02	-219.39	2,045.29	1,999.04	46.24	44.227		
6,500.00	6,231.93	6,113.36	6,097.14	37.14	22.51	-172.13	-319.09	-223.98	2,081.42	2,034.43	46.99	44.294		
6,600.00	6,327.24	6,206.60	6,190.07	37.75	22.87	-172.10	-325.17	-228.57	2,117.55	2,069.82	47.74	44.359		
6,700.00	6,422.54	6,300.16	6,283.00	38.37	23.23	-172.08	-331.25	-233.15	2,153.68	2,105.20	48.48	44.421		
6,745.38	6,465.79	6,342.15	6,325.17	38.64	23.39	-172.07	-334.01	-235.23	2,170.08	2,121.26	48.82	44.449		
6,800.00	6,518.01	6,406.73	6,376.11	38.97	23.64	-172.12	-337.34	-237.75	2,189.33	2,140.06	49.28	44.428		
6,900.00	6,614.35	6,487.74	6,470.28	39.54	23.95	-172.18	-343.49	-242.40	2,222.07	2,172.10	49.97	44.467		
7,000.00	6,711.57	6,583.29	6,565.50	40.06	24.32	-172.22	-349.72	-247.10	2,251.52	2,200.81	50.71	44.401		
7,100.00	6,809.55	6,679.78	6,661.67	40.53	24.69	-172.23	-356.01	-251.84	2,277.65	2,226.20	51.44	44.276		
7,200.00	6,908.17	6,777.11	6,758.68	40.96	25.06	-172.23	-362.35	-256.63	2,300.43	2,248.26	52.17	44.096		
7,300.00	7,007.30	6,875.16	6,856.40	41.35	25.44	-172.20	-368.74	-261.45	2,319.83	2,266.94	52.89	43.864		
7,400.00	7,106.83	6,973.80	6,954.71	41.69	25.82	-172.16	-375.17	-266.31	2,335.83	2,282.23	53.60	43.583		
7,500.00	7,206.63	7,072.92	7,053.50	41.98	26.20	-172.09	-381.63	-271.18	2,348.42	2,294.12	54.29	43.254		
7,600.00	7,306.59	7,275.69	7,255.86	42.23	26.96	-171.95	-391.42	-278.57	2,356.40	2,300.71	55.69	42.315		
7,626.41	7,333.00	7,352.84	7,333.00	42.29	27.22	-179.86	-392.25	-279.19	2,356.80	2,300.64	56.17	41.961		
7,656.41	7,363.00	7,382.84	7,363.00	42.35	27.32	-179.86	-392.25	-279.19	2,356.80	2,300.45	56.36	41.820		
7,700.00	7,406.55	7,426.78	7,406.90	42.45	27.47	-90.11	-392.24	-280.88	2,356.80	2,300.16	56.65	41.606		
7,750.00	7,456.18	7,477.18	7,456.92	42.56	27.66	-90.11	-392.21	-286.94	2,356.80	2,299.81	57.00	41.350		
7,800.00	7,505.10	7,527.58	7,506.21	42.68	27.85	-90.11	-392.17	-297.38	2,356.80	2,299.43	57.37	41.081		
7,850.00	7,552.93	7,577.96	7,554.38	42.81	28.06	-90.11	-392.10	-312.10	2,356.80	2,299.04	57.77	40.799		
7,900.00	7,599.32	7,628.33	7,601.06	42.94	28.28	-90.10	-392.02	-330.99	2,356.80	2,298.62	58.19	40.504		
7,950.00	7,643.91	7,678.69	7,645.89	43.08	28.50	-90.10	-391.92	-353.89	2,356.80	2,298.17	58.64	40.194		
8,000.00	7,686.37	7,729.03	7,688.52	43.22	28.74	-90.09	-391.80	-380.63	2,356.80	2,297.69	59.12	39.866		
8,050.00	7,726.36	7,779.36	7,728.62	43.37	28.99	-90.09	-391.67	-411.00	2,356.81	2,297.17	59.64	39.517		
8,100.00	7,763.59	7,829.65	7,765.89	43.53	29.26	-90.08	-391.52	-444.75	2,356.81	2,296.60	60.21	39.143		
8,150.00	7,797.77	7,879.93	7,800.04	43.69	29.56	-90.07	-391.36	-481.62	2,356.81	2,295.97	60.84	38.739		
8,200.00	7,828.65	7,930.17	7,830.82	43.86	29.89	-90.07	-391.19	-521.32	2,356.81	2,295.28	61.53	38.302		
8,250.00	7,855.98	7,980.39	7,857.98	44.05	30.25	-90.06	-391.00	-563.54	2,356.81	2,294.51	62.30	37.830		
8,300.00	7,879.55	8,030.58	7,881.34	44.25	30.66	-90.05	-390.81	-607.94	2,356.81	2,293.66	63.15	37.322		
8,350.00	7,899.20	8,080.73	7,900.70	44.47	31.11	-90.04	-390.61	-654.19	2,356.81	2,292.73	64.08	36.778		
8,400.00	7,914.77	8,130.85	7,915.95	44.71	31.61	-90.03	-390.40	-701.92	2,356.81	2,291.71	65.10	36.204		
8,450.00	7,926.14	8,180.94	7,926.95	44.98	32.15	-90.02	-390.19	-750.77	2,356.82	2,290.62	66.20	35.603		
8,500.00	7,933.22	8,231.00	7,933.65	45.26	32.74	-90.01	-389.97	-800.35	2,356.82	2,289.45	67.37	34.984		
8,550.00	7,935.96	8,281.02	7,936.00	45.58	33.35	-90.00	-389.75	-850.30	2,356.82	2,288.22	68.60	34.357		
8,556.48	7,936.00	8,287.50	7,936.00	45.62	33.43	-90.00	-389.72	-856.78	2,356.82	2,288.06	68.76	34.275		
8,600.00	7,936.00	8,331.02	7,936.00	45.92	34.02	-90.00	-389.53	-900.30	2,356.82	2,286.91	69.92	33.710		
8,700.00	7,936.00	8,431.02	7,936.00	46.70	35.45	-90.00	-389.10	-1,000.30	2,356.82	2,284.08	72.75	32.398		
8,800.00	7,936.00	8,531.02	7,936.00	47.61	37.03	-90.00	-388.66	-1,100.30	2,356.83	2,280.97	75.85	31.070		
8,900.00	7,936.00	8,631.02	7,936.00	48.66	38.73	-90.00	-388.22	-1,200.30	2,356.83	2,277.62	79.21	29.756		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
9,000.00	7,935.99	8,731.02	7,935.99	49.84	40.55	-90.00	-387.79	-1,300.30	2,356.83	2,274.06	82.77	28.474		
9,100.00	7,935.99	8,831.02	7,935.99	51.16	42.45	-90.00	-387.35	-1,400.30	2,356.84	2,270.31	86.53	27.239		
9,200.00	7,935.99	8,931.02	7,935.99	52.60	44.44	-90.00	-386.91	-1,500.30	2,356.84	2,266.40	90.44	26.059		
9,300.00	7,935.99	9,031.02	7,935.99	54.16	46.50	-90.00	-386.48	-1,600.29	2,356.85	2,262.34	94.50	24.939		
9,400.00	7,935.99	9,131.02	7,935.99	55.82	48.62	-90.00	-386.04	-1,700.29	2,356.85	2,258.16	98.69	23.881		
9,500.00	7,935.99	9,231.02	7,935.99	57.58	50.80	-90.00	-385.60	-1,800.29	2,356.85	2,253.86	102.99	22.884		
9,600.00	7,935.99	9,331.02	7,935.98	59.43	53.02	-90.00	-385.17	-1,900.29	2,356.86	2,249.47	107.38	21.948		
9,700.00	7,935.98	9,431.02	7,935.98	61.36	55.29	-90.00	-384.73	-2,000.29	2,356.86	2,244.99	111.87	21.069		
9,800.00	7,935.98	9,531.02	7,935.98	63.35	57.59	-90.00	-384.29	-2,100.29	2,356.86	2,240.44	116.42	20.244		
9,900.00	7,935.98	9,631.02	7,935.98	65.40	59.93	-90.00	-383.86	-2,200.29	2,356.87	2,235.82	121.05	19.470		
10,000.00	7,935.98	9,731.02	7,935.98	67.50	62.29	-90.00	-383.42	-2,300.29	2,356.87	2,231.14	125.73	18.745		
10,100.00	7,935.98	9,831.02	7,935.98	69.66	64.68	-90.00	-382.98	-2,400.29	2,356.87	2,226.40	130.47	18.064		
10,200.00	7,935.98	9,931.02	7,935.98	71.85	67.10	-90.00	-382.55	-2,500.29	2,356.88	2,221.62	135.26	17.425		
10,300.00	7,935.98	10,031.02	7,935.97	74.08	69.53	-90.00	-382.11	-2,600.29	2,356.88	2,216.79	140.09	16.824		
10,400.00	7,935.97	10,131.02	7,935.97	76.35	71.98	-90.00	-381.67	-2,700.28	2,356.88	2,211.93	144.96	16.259		
10,500.00	7,935.97	10,231.02	7,935.97	78.64	74.45	-90.00	-381.24	-2,800.28	2,356.89	2,207.03	149.86	15.727		
10,600.00	7,935.97	10,331.02	7,935.97	80.97	76.93	-90.00	-380.80	-2,900.28	2,356.89	2,202.10	154.79	15.226		
10,700.00	7,935.97	10,431.02	7,935.97	83.32	79.43	-90.00	-380.36	-3,000.28	2,356.89	2,197.14	159.76	14.753		
10,800.00	7,935.97	10,531.02	7,935.97	85.69	81.94	-90.00	-379.93	-3,100.28	2,356.90	2,192.15	164.75	14.306		
10,900.00	7,935.97	10,631.02	7,935.97	88.08	84.46	-90.00	-379.49	-3,200.28	2,356.90	2,187.14	169.76	13.884		
11,000.00	7,935.97	10,731.02	7,935.96	90.49	86.99	-90.00	-379.05	-3,300.28	2,356.91	2,182.11	174.79	13.484		
11,100.00	7,935.96	10,831.02	7,935.96	92.91	89.53	-90.00	-378.62	-3,400.28	2,356.91	2,177.06	179.85	13.105		
11,200.00	7,935.96	10,931.02	7,935.96	95.35	92.07	-90.00	-378.18	-3,500.28	2,356.91	2,171.99	184.92	12.745		
11,300.00	7,935.96	11,031.02	7,935.96	97.81	94.63	-90.00	-377.74	-3,600.28	2,356.92	2,166.90	190.01	12.404		
11,400.00	7,935.96	11,131.02	7,935.96	100.28	97.19	-90.00	-377.31	-3,700.27	2,356.92	2,161.80	195.12	12.079		
11,500.00	7,935.96	11,231.02	7,935.96	102.76	99.76	-90.00	-376.87	-3,800.27	2,356.92	2,156.69	200.24	11.771		
11,600.00	7,935.96	11,331.02	7,935.96	105.25	102.34	-90.00	-376.44	-3,900.27	2,356.93	2,151.56	205.37	11.476		
11,700.00	7,935.96	11,431.02	7,935.95	107.75	104.92	-90.00	-376.00	-4,000.27	2,356.93	2,146.41	210.52	11.196		
11,800.00	7,935.95	11,531.02	7,935.95	110.26	107.51	-90.00	-375.56	-4,100.27	2,356.93	2,141.26	215.67	10.928		
11,900.00	7,935.95	11,631.02	7,935.95	112.78	110.10	-90.00	-375.13	-4,200.27	2,356.94	2,136.10	220.84	10.673		
12,000.00	7,935.95	11,731.02	7,935.95	115.31	112.70	-90.00	-374.69	-4,300.27	2,356.94	2,130.92	226.02	10.428		
12,100.00	7,935.95	11,831.02	7,935.95	117.84	115.30	-90.00	-374.25	-4,400.27	2,356.94	2,125.74	231.21	10.194		
12,200.00	7,935.95	11,931.02	7,935.95	120.39	117.90	-90.00	-373.82	-4,500.27	2,356.95	2,120.55	236.40	9.970		
12,300.00	7,935.95	12,031.02	7,935.95	122.94	120.51	-90.00	-373.38	-4,600.27	2,356.95	2,115.35	241.60	9.755		
12,400.00	7,935.95	12,131.02	7,935.94	125.49	123.12	-90.00	-372.94	-4,700.27	2,356.95	2,110.14	246.81	9.549		
12,500.00	7,935.94	12,231.02	7,935.94	128.05	125.74	-90.00	-372.51	-4,800.26	2,356.96	2,104.93	252.03	9.352		
12,600.00	7,935.94	12,331.02	7,935.94	130.62	128.36	-90.00	-372.07	-4,900.26	2,356.96	2,099.70	257.26	9.162		
12,700.00	7,935.94	12,431.02	7,935.94	133.19	130.98	-90.00	-371.63	-5,000.26	2,356.97	2,094.48	262.49	8.979		
12,800.00	7,935.94	12,531.02	7,935.94	135.77	133.60	-90.00	-371.20	-5,100.26	2,356.97	2,089.24	267.73	8.804		
12,900.00	7,935.94	12,631.02	7,935.94	138.35	136.23	-90.00	-370.76	-5,200.26	2,356.97	2,084.01	272.97	8.635		
13,000.00	7,935.94	12,731.02	7,935.94	140.93	138.86	-90.00	-370.32	-5,300.26	2,356.98	2,078.76	278.21	8.472		
13,100.00	7,935.94	12,831.02	7,935.93	143.52	141.49	-90.00	-369.89	-5,400.26	2,356.98	2,073.51	283.47	8.315		
13,200.00	7,935.93	12,931.02	7,935.93	146.11	144.12	-90.00	-369.45	-5,500.26	2,356.98	2,068.26	288.72	8.163		
13,300.00	7,935.93	13,031.02	7,935.93	148.71	146.76	-90.00	-369.01	-5,600.26	2,356.99	2,063.00	293.99	8.017		
13,400.00	7,935.93	13,131.02	7,935.93	151.31	149.40	-90.00	-368.58	-5,700.26	2,356.99	2,057.74	299.25	7.876		
13,500.00	7,935.93	13,231.02	7,935.93	153.91	152.04	-90.00	-368.14	-5,800.25	2,356.99	2,052.47	304.52	7.740		
13,600.00	7,935.93	13,331.02	7,935.93	156.52	154.68	-90.00	-367.70	-5,900.25	2,357.00	2,047.20	309.80	7.608		
13,700.00	7,935.93	13,431.02	7,935.93	159.13	157.32	-90.00	-367.27	-6,000.25	2,357.00	2,041.93	315.07	7.481		
13,800.00	7,935.93	13,531.02	7,935.92	161.74	159.96	-90.00	-366.83	-6,100.25	2,357.00	2,036.65	320.35	7.358		
13,900.00	7,935.92	13,631.02	7,935.92	164.35	162.61	-90.00	-366.39	-6,200.25	2,357.01	2,031.37	325.64	7.238		
14,000.00	7,935.92	13,731.02	7,935.92	166.97	165.26	-90.00	-365.96	-6,300.25	2,357.01	2,026.09	330.92	7.123		
14,100.00	7,935.92	13,831.02	7,935.92	169.59	167.91	-90.00	-365.52	-6,400.25	2,357.02	2,020.80	336.21	7.010		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-7 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,200.00	7,935.92	13,931.02	7,935.92	172.21	170.56	-90.00	-365.08	-6,500.25	2,357.02	2,015.51	341.51	6.902		
14,300.00	7,935.92	14,031.02	7,935.92	174.84	173.21	-90.00	-364.65	-6,600.25	2,357.02	2,010.22	346.80	6.796		
14,400.00	7,935.92	14,131.02	7,935.91	177.46	175.86	-90.00	-364.21	-6,700.25	2,357.03	2,004.93	352.10	6.694		
14,500.00	7,935.92	14,231.02	7,935.91	180.09	178.51	-90.00	-363.77	-6,800.25	2,357.03	1,999.63	357.40	6.595		
14,600.00	7,935.91	14,331.02	7,935.91	182.72	181.17	-90.00	-363.34	-6,900.24	2,357.03	1,994.33	362.70	6.499		
14,700.00	7,935.91	14,431.02	7,935.91	185.35	183.82	-90.00	-362.90	-7,000.24	2,357.04	1,989.03	368.01	6.405		
14,800.00	7,935.91	14,531.02	7,935.91	187.98	186.48	-90.00	-362.46	-7,100.24	2,357.04	1,983.73	373.31	6.314		
14,900.00	7,935.91	14,631.02	7,935.91	190.62	189.14	-90.00	-362.03	-7,200.24	2,357.04	1,978.42	378.62	6.225		
15,000.00	7,935.91	14,731.02	7,935.91	193.25	191.80	-90.00	-361.59	-7,300.24	2,357.05	1,973.11	383.93	6.139		
15,100.00	7,935.91	14,831.02	7,935.90	195.89	194.45	-90.00	-361.15	-7,400.24	2,357.05	1,967.80	389.25	6.055		
15,200.00	7,935.91	14,931.02	7,935.90	198.53	197.11	-90.00	-360.72	-7,500.24	2,357.05	1,962.49	394.56	5.974		
15,300.00	7,935.90	15,031.02	7,935.90	201.17	199.78	-90.00	-360.28	-7,600.24	2,357.06	1,957.18	399.88	5.894		
15,400.00	7,935.90	15,131.02	7,935.90	203.81	202.44	-90.00	-359.84	-7,700.24	2,357.06	1,951.87	405.20	5.817		
15,500.00	7,935.90	15,231.02	7,935.90	206.45	205.10	-90.00	-359.41	-7,800.24	2,357.06	1,946.55	410.52	5.742		
15,600.00	7,935.90	15,331.02	7,935.90	209.10	207.76	-90.00	-358.97	-7,900.24	2,357.07	1,941.23	415.84	5.668		
15,700.00	7,935.90	15,431.02	7,935.90	211.74	210.43	-90.00	-358.53	-8,000.23	2,357.07	1,935.91	421.16	5.597		
15,800.00	7,935.90	15,531.02	7,935.89	214.39	213.09	-90.00	-358.10	-8,100.23	2,357.08	1,930.59	426.48	5.527		
15,900.00	7,935.90	15,631.02	7,935.89	217.04	215.76	-90.00	-357.66	-8,200.23	2,357.08	1,925.27	431.81	5.459		
16,000.00	7,935.89	15,731.02	7,935.89	219.69	218.42	-90.00	-357.22	-8,300.23	2,357.08	1,919.95	437.14	5.392		
16,100.00	7,935.89	15,831.02	7,935.89	222.34	221.09	-90.00	-356.79	-8,400.23	2,357.09	1,914.62	442.46	5.327		
16,200.00	7,935.89	15,931.02	7,935.89	224.99	223.75	-90.00	-356.35	-8,500.23	2,357.09	1,909.30	447.79	5.264		
16,300.00	7,935.89	16,031.02	7,935.89	227.64	226.42	-90.00	-355.91	-8,600.23	2,357.09	1,903.97	453.12	5.202		
16,400.00	7,935.89	16,131.02	7,935.89	230.29	229.09	-90.00	-355.48	-8,700.23	2,357.10	1,898.64	458.45	5.141		
16,500.00	7,935.89	16,231.02	7,935.88	232.94	231.76	-90.00	-355.04	-8,800.23	2,357.10	1,893.31	463.79	5.082		
16,600.00	7,935.89	16,331.02	7,935.88	235.60	234.43	-90.00	-354.60	-8,900.23	2,357.10	1,887.98	469.12	5.025		
16,700.00	7,935.88	16,431.02	7,935.88	238.25	237.10	-90.00	-354.17	-9,000.22	2,357.11	1,882.65	474.46	4.968		
16,800.00	7,935.88	16,531.02	7,935.88	240.91	239.76	-90.00	-353.73	-9,100.22	2,357.11	1,877.32	479.79	4.913		
16,900.00	7,935.88	16,631.02	7,935.88	243.56	242.44	-90.00	-353.29	-9,200.22	2,357.11	1,871.99	485.13	4.859		
17,000.00	7,935.88	16,731.02	7,935.88	246.22	245.11	-90.00	-352.86	-9,300.22	2,357.12	1,866.65	490.47	4.806		
17,100.00	7,935.88	16,831.02	7,935.88	248.88	247.78	-90.00	-352.42	-9,400.22	2,357.12	1,861.32	495.81	4.754		
17,200.00	7,935.88	16,931.02	7,935.87	251.54	250.45	-90.00	-351.98	-9,500.22	2,357.13	1,855.98	501.14	4.703		
17,300.00	7,935.88	17,031.02	7,935.87	254.20	253.12	-90.00	-351.55	-9,600.22	2,357.13	1,850.64	506.49	4.654		
17,400.00	7,935.87	17,131.02	7,935.87	256.86	255.79	-90.00	-351.11	-9,700.22	2,357.13	1,845.31	511.83	4.605		
17,500.00	7,935.87	17,231.02	7,935.87	259.52	258.46	-90.00	-350.67	-9,800.22	2,357.14	1,839.97	517.17	4.558		
17,600.00	7,935.87	17,331.02	7,935.87	262.18	261.14	-90.00	-350.24	-9,900.22	2,357.14	1,834.63	522.51	4.511		
17,700.00	7,935.87	17,431.02	7,935.87	264.84	263.81	-90.00	-349.80	-10,000.22	2,357.14	1,829.29	527.85	4.466		
17,800.00	7,935.87	17,531.02	7,935.87	267.50	266.48	-90.00	-349.36	-10,100.21	2,357.15	1,823.95	533.20	4.421		
17,900.00	7,935.87	17,631.02	7,935.86	270.17	269.16	-90.00	-348.93	-10,200.21	2,357.15	1,818.61	538.54	4.377		
18,000.00	7,935.87	17,731.02	7,935.86	272.83	271.83	-90.00	-348.49	-10,300.21	2,357.15	1,813.26	543.89	4.334		
18,100.00	7,935.86	17,831.02	7,935.86	275.49	274.51	-90.00	-348.05	-10,400.21	2,357.16	1,807.92	549.24	4.292		
18,200.00	7,935.86	17,930.60	7,935.92	278.16	277.17	-90.00	-347.62	-10,499.79	2,357.17	1,802.60	554.57	4.250		
18,239.03	7,935.86	17,969.63	7,936.00	279.20	278.21	-90.00	-347.46	-10,538.82	2,357.17	1,800.52	556.66	4.235		
18,239.20	7,936.00	17,969.79	7,936.00	279.20	278.22	-90.00	-347.46	-10,538.98	2,356.83	1,800.17	556.66	4.234 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	90.00	0.00	33.75	33.75					
100.00	100.00	100.00	100.00	0.13	0.13	90.00	0.00	33.75	33.75	33.48	0.27	125.532		
200.00	200.00	200.00	200.00	0.49	0.49	90.00	0.00	33.75	33.75	32.76	0.99	34.236 CC		
300.00	299.98	300.02	299.98	0.85	0.85	100.83	0.00	33.75	34.03	32.33	1.70	19.990 ES		
400.00	399.84	400.16	399.84	1.22	1.21	109.14	0.00	33.75	35.39	32.97	2.42	14.605		
500.00	499.45	500.55	499.45	1.59	1.57	121.19	0.00	33.75	39.13	35.98	3.15	12.408		
600.00	598.70	601.30	598.70	1.97	1.93	133.94	0.00	33.75	46.65	42.75	3.89	11.982		
700.00	697.47	702.53	697.47	2.38	2.29	144.83	0.00	33.75	58.64	54.00	4.64	12.648		
800.00	795.62	804.38	795.62	2.82	2.66	153.06	0.00	33.75	75.11	69.72	5.38	13.958		
900.00	893.06	893.06	893.06	3.29	2.98	159.00	0.00	33.75	95.77	89.69	6.08	15.757		
1,000.00	989.64	987.06	987.05	3.79	3.30	163.63	-1.23	33.26	121.32	114.54	6.78	17.895		
1,081.03	1,067.21	1,061.15	1,061.07	4.23	3.55	166.94	-4.21	32.08	146.50	139.17	7.33	19.988		
1,100.00	1,085.29	1,078.24	1,078.12	4.34	3.60	167.67	-5.15	31.71	152.91	145.45	7.46	20.502		
1,200.00	1,180.60	1,167.12	1,166.73	4.91	3.90	171.04	-11.57	29.16	188.41	180.30	8.10	23.249		
1,300.00	1,275.90	1,253.96	1,253.06	5.49	4.20	173.75	-20.30	25.70	226.64	217.90	8.74	25.938		
1,400.00	1,371.21	1,341.39	1,339.68	6.07	4.52	176.04	-31.32	21.33	267.33	257.95	9.38	28.495		
1,500.00	1,466.52	1,432.05	1,429.44	6.66	4.85	177.85	-43.17	16.63	308.70	298.64	10.06	30.681		
1,600.00	1,561.83	1,522.71	1,519.20	7.26	5.20	179.24	-55.01	11.94	350.27	339.52	10.75	32.592		
1,700.00	1,657.14	1,613.37	1,608.96	7.85	5.55	-179.67	-66.85	7.24	391.97	380.53	11.44	34.262		
1,800.00	1,752.44	1,704.03	1,698.72	8.45	5.90	-178.79	-78.70	2.54	433.77	421.63	12.14	35.735		
1,900.00	1,847.75	1,805.31	1,788.49	9.05	6.31	-178.06	-90.54	-2.15	475.64	462.76	12.88	36.929		
2,000.00	1,943.06	1,885.35	1,878.25	9.66	6.63	-177.45	-102.39	-6.85	517.56	504.01	13.55	38.206		
2,100.00	2,038.37	1,976.02	1,968.01	10.26	6.99	-176.93	-114.23	-11.55	559.52	545.27	14.26	39.250		
2,200.00	2,133.68	2,066.68	2,057.77	10.86	7.36	-176.48	-126.07	-16.24	601.52	586.55	14.97	40.191		
2,300.00	2,228.99	2,157.34	2,147.53	11.47	7.74	-176.10	-137.92	-20.94	643.54	627.86	15.68	41.043		
2,400.00	2,324.29	2,248.00	2,237.29	12.08	8.11	-175.76	-149.76	-25.64	685.58	669.19	16.39	41.817		
2,500.00	2,419.60	2,338.66	2,327.06	12.68	8.49	-175.45	-161.61	-30.33	727.64	710.53	17.11	42.523		
2,600.00	2,514.91	2,429.32	2,416.82	13.29	8.86	-175.19	-173.45	-35.03	769.72	751.89	17.83	43.169		
2,700.00	2,610.22	2,519.99	2,506.58	13.90	9.24	-174.94	-185.30	-39.72	811.80	793.26	18.55	43.764		
2,800.00	2,705.53	2,610.65	2,596.34	14.51	9.62	-174.73	-197.14	-44.42	853.90	834.63	19.27	44.312		
2,900.00	2,800.83	2,701.31	2,686.10	15.12	10.00	-174.53	-208.98	-49.12	896.01	876.02	19.99	44.818		
3,000.00	2,896.14	2,791.97	2,775.86	15.73	10.39	-174.35	-220.83	-53.81	938.13	917.41	20.72	45.287		
3,100.00	2,991.45	2,882.63	2,865.63	16.34	10.77	-174.19	-232.67	-58.51	980.25	958.81	21.44	45.723		
3,200.00	3,086.76	2,973.29	2,955.39	16.95	11.15	-174.04	-244.52	-63.21	1,022.38	1,000.21	22.16	46.130		
3,300.00	3,182.07	3,063.95	3,045.15	17.56	11.54	-173.90	-256.36	-67.90	1,064.51	1,041.62	22.89	46.509		
3,400.00	3,277.38	3,154.62	3,134.91	18.17	11.92	-173.77	-268.20	-72.60	1,106.65	1,083.04	23.61	46.864		
3,500.00	3,372.68	3,245.28	3,224.67	18.78	12.31	-173.65	-280.05	-77.30	1,148.79	1,124.45	24.34	47.197		
3,600.00	3,467.99	3,335.94	3,314.44	19.39	12.69	-173.54	-291.89	-81.99	1,190.94	1,165.87	25.07	47.510		
3,700.00	3,563.30	3,426.60	3,404.20	20.00	13.08	-173.44	-303.74	-86.69	1,233.09	1,207.29	25.79	47.804		
3,800.00	3,658.61	3,517.26	3,493.96	20.61	13.46	-173.34	-315.58	-91.39	1,275.24	1,248.72	26.52	48.081		
3,900.00	3,753.92	3,607.92	3,583.72	21.22	13.85	-173.25	-327.43	-96.08	1,317.40	1,290.15	27.25	48.343		
4,000.00	3,849.22	3,701.41	3,673.48	21.83	14.25	-173.17	-339.27	-100.78	1,359.56	1,331.56	27.99	48.571		
4,100.00	3,944.53	3,789.25	3,763.24	22.45	14.63	-173.09	-351.11	-105.48	1,401.72	1,373.01	28.71	48.824		
4,200.00	4,039.84	3,879.91	3,853.01	23.06	15.01	-173.02	-362.96	-110.17	1,443.88	1,414.44	29.44	49.046		
4,300.00	4,135.15	3,970.57	3,942.77	23.67	15.40	-172.95	-374.80	-114.87	1,486.04	1,455.87	30.17	49.257		
4,400.00	4,230.46	4,061.23	4,032.53	24.28	15.79	-172.88	-386.65	-119.57	1,528.21	1,497.31	30.90	49.457		
4,500.00	4,325.77	4,151.89	4,122.29	24.89	16.18	-172.82	-398.49	-124.26	1,570.38	1,538.75	31.63	49.647		
4,600.00	4,421.07	4,242.56	4,212.05	25.51	16.57	-172.76	-410.33	-128.96	1,612.55	1,580.18	32.36	49.828		
4,700.00	4,516.38	4,333.22	4,301.82	26.12	16.96	-172.70	-422.18	-133.66	1,654.72	1,621.62	33.09	50.001		
4,800.00	4,611.69	4,423.88	4,391.58	26.73	17.35	-172.65	-434.02	-138.35	1,696.89	1,663.06	33.83	50.166		
4,900.00	4,707.00	4,514.54	4,481.34	27.34	17.74	-172.60	-445.87	-143.05	1,739.06	1,704.50	34.56	50.323		
5,000.00	4,802.31	4,605.20	4,571.10	27.95	18.13	-172.55	-457.71	-147.74	1,781.24	1,745.94	35.29	50.474		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,100.00	4,897.61	4,704.14	4,660.86	28.57	18.55	-172.50	-469.56	-152.44	1,823.41	1,787.36	36.05	50.574		
5,200.00	4,992.92	4,786.52	4,750.62	29.18	18.90	-172.46	-481.40	-157.14	1,865.59	1,828.83	36.76	50.756		
5,300.00	5,088.23	4,877.19	4,840.39	29.79	19.29	-172.42	-493.24	-161.83	1,907.76	1,870.27	37.49	50.888		
5,400.00	5,183.54	4,967.85	4,930.15	30.40	19.68	-172.38	-505.09	-166.53	1,949.94	1,911.72	38.22	51.015		
5,500.00	5,278.85	5,058.51	5,019.91	31.01	20.08	-172.34	-516.93	-171.23	1,992.12	1,953.16	38.96	51.136		
5,600.00	5,374.15	5,149.17	5,109.67	31.63	20.47	-172.30	-528.78	-175.92	2,034.30	1,994.61	39.69	51.253		
5,700.00	5,469.46	5,239.83	5,199.43	32.24	20.86	-172.26	-540.62	-180.62	2,076.48	2,036.05	40.43	51.365		
5,800.00	5,564.77	5,330.49	5,289.19	32.85	21.25	-172.23	-552.46	-185.32	2,118.66	2,077.50	41.16	51.473		
5,900.00	5,660.08	5,421.16	5,378.96	33.46	21.64	-172.20	-564.31	-190.01	2,160.84	2,118.94	41.90	51.577		
6,000.00	5,755.39	5,511.82	5,468.72	34.08	22.03	-172.17	-576.15	-194.71	2,203.02	2,160.39	42.63	51.677		
6,100.00	5,850.70	5,602.48	5,558.48	34.69	22.42	-172.13	-588.00	-199.41	2,245.20	2,201.84	43.37	51.773		
6,200.00	5,946.00	5,706.86	5,648.24	35.30	22.87	-172.11	-599.84	-204.10	2,287.39	2,243.23	44.15	51.805		
6,300.00	6,041.31	5,783.80	5,738.00	35.91	23.20	-172.08	-611.69	-208.80	2,329.57	2,284.73	44.84	51.955		
6,400.00	6,136.62	5,874.46	5,827.77	36.53	23.59	-172.05	-623.53	-213.50	2,371.75	2,326.18	45.57	52.041		
6,500.00	6,231.93	5,965.12	5,917.53	37.14	23.98	-172.02	-635.37	-218.19	2,413.94	2,367.63	46.31	52.124		
6,600.00	6,327.24	6,055.79	6,007.29	37.75	24.37	-172.00	-647.22	-222.89	2,456.12	2,409.07	47.05	52.205		
6,700.00	6,422.54	6,146.45	6,097.05	38.37	24.76	-171.97	-659.06	-227.59	2,498.31	2,450.52	47.79	52.282		
6,745.38	6,465.79	6,187.59	6,137.78	38.64	24.94	-171.96	-664.44	-229.72	2,517.45	2,469.33	48.12	52.317		
6,800.00	6,518.01	6,237.32	6,187.02	38.97	25.16	-172.02	-670.93	-232.29	2,540.02	2,491.50	48.52	52.348		
6,900.00	6,614.35	6,329.44	6,278.23	39.54	25.55	-172.10	-682.97	-237.07	2,578.90	2,529.64	49.26	52.357		
7,000.00	6,711.57	6,422.84	6,370.70	40.06	25.96	-172.16	-695.17	-241.90	2,614.57	2,564.58	49.99	52.303		
7,100.00	6,809.55	6,517.40	6,464.32	40.53	26.37	-172.20	-707.52	-246.80	2,646.99	2,596.28	50.72	52.191		
7,200.00	6,908.17	6,613.01	6,558.98	40.96	26.78	-172.21	-720.01	-251.76	2,676.13	2,624.69	51.44	52.024		
7,300.00	7,007.30	6,709.56	6,654.57	41.35	27.20	-172.21	-732.63	-256.76	2,701.94	2,649.78	52.16	51.804		
7,400.00	7,106.83	6,806.92	6,750.97	41.69	27.62	-172.19	-745.35	-261.80	2,724.40	2,671.54	52.87	51.534		
7,500.00	7,206.63	6,904.99	6,848.06	41.98	28.04	-172.15	-758.16	-266.88	2,743.49	2,689.92	53.57	51.217		
7,600.00	7,306.59	7,005.21	6,948.59	42.23	28.45	-171.95	-771.25	-272.01	2,763.08	2,709.18	54.27	50.890		
7,626.41	7,333.00	7,031.79	6,979.17	42.29	28.83	-171.88	-784.44	-277.07	2,782.17	2,728.27	54.97	50.561		
7,656.41	7,363.00	7,062.01	7,009.34	42.35	29.22	-171.84	-797.63	-282.12	2,801.26	2,747.36	55.67	50.232		
7,700.00	7,406.55	7,105.63	7,052.63	42.45	30.07	-90.02	-810.82	-287.17	2,820.35	2,766.45	56.37	49.903		
7,702.49	7,409.04	7,108.12	7,055.12	42.45	30.08	-90.01	-813.01	-287.16	2,822.54	2,768.64	56.38	49.884		
7,750.00	7,456.18	7,153.33	7,100.33	42.56	30.25	-89.93	-826.01	-292.22	2,841.44	2,787.54	57.07	49.555		
7,800.00	7,505.10	7,202.45	7,149.45	42.68	30.43	-89.85	-839.10	-297.27	2,860.53	2,806.63	57.77	49.226		
7,850.00	7,552.93	7,251.69	7,198.19	42.81	30.62	-89.76	-852.19	-302.32	2,879.62	2,825.72	58.47	48.897		
7,900.00	7,599.32	7,298.37	7,245.37	42.94	30.81	-89.68	-865.28	-307.37	2,898.71	2,844.81	59.17	48.568		
7,950.00	7,643.91	7,342.96	7,290.96	43.08	31.01	-89.60	-878.37	-312.42	2,917.80	2,863.90	59.87	48.239		
8,000.00	7,686.37	7,386.42	7,333.42	43.22	31.22	-89.53	-891.46	-317.47	2,936.89	2,883.00	60.57	47.910		
8,050.00	7,726.36	7,426.41	7,373.41	43.37	31.44	-89.46	-904.55	-322.52	2,955.98	2,902.09	61.27	47.581		
8,100.00	7,763.59	7,463.64	7,410.64	43.53	31.66	-89.39	-917.64	-327.57	2,975.07	2,921.18	61.97	47.252		
8,150.00	7,797.77	7,499.82	7,446.82	43.69	31.91	-89.32	-930.73	-332.62	2,994.16	2,940.27	62.67	46.923		
8,200.00	7,828.65	7,534.66	7,481.66	43.86	32.17	-89.27	-943.82	-337.67	3,013.25	2,959.36	63.37	46.594		
8,250.00	7,855.98	7,569.59	7,516.59	44.05	32.46	-89.21	-956.91	-342.72	3,032.34	2,978.45	64.07	46.265		
8,300.00	7,879.55	7,594.16	7,541.16	44.25	32.78	-89.17	-970.00	-347.77	3,051.43	2,997.54	64.77	45.936		
8,350.00	7,899.20	7,618.84	7,565.84	44.47	33.13	-89.12	-983.09	-352.82	3,070.52	3,016.63	65.47	45.607		
8,400.00	7,914.77	7,643.42	7,590.42	44.71	33.52	-89.09	-996.18	-357.87	3,089.61	3,035.72	66.17	45.278		
8,450.00	7,926.14	7,667.79	7,614.79	44.98	33.95	-89.06	-1,009.27	-362.92	3,108.70	3,054.81	66.87	44.949		
8,500.00	7,933.22	7,682.08	7,629.08	45.26	34.42	-89.04	-1,022.36	-367.97	3,127.79	3,073.90	67.57	44.620		
8,550.00	7,935.96	7,696.55	7,643.55	45.58	34.93	-89.02	-1,035.45	-373.02	3,146.88	3,093.00	68.27	44.291		
8,556.48	7,936.00	7,697.00	7,644.00	45.62	35.00	-89.02	-1,037.64	-373.01	3,148.07	3,094.19	68.30	44.273		
8,600.00	7,936.00	7,697.00	7,644.00	45.92	35.52	-89.02	-1,050.73	-378.06	3,167.16	3,113.28	69.00	43.944		
8,700.00	7,936.00	7,697.00	7,644.00	46.70	36.82	-89.02	-1,063.82	-383.11	3,186.25	3,132.37	70.08	43.615		
8,800.00	7,936.00	7,697.00	7,644.00	47.61	38.29	-89.02	-1,076.91	-388.16	3,205.34	3,151.46	71.16	43.286		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Sec 4-T4S-R65W - JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPOSAL 1		Offset Site Error:		0.00 usft
Survey Program: 0-MWD													Offset Well Error:		0.00 usft		
Reference		Offset		Semi Major Axis			Distance							Warning			
Measured Depth	Vertical Depth	Measured Depth	Vertical Depth	Reference	Offset	Highside Toolface	Offset Wellbore Centre	Between Centres	Between Ellipses	Minimum Separation	Separation Factor						
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	+N/-S (usft)	+E/-W (usft)	(usft)	(usft)	(usft)						
8,900.00	7,936.00	8,624.30	7,889.00	48.66	39.90	-89.02	-785.30	-1,201.82	2,754.31	2,674.95	79.36	34.705					
9,000.00	7,935.99	8,724.31	7,888.99	49.84	41.64	-89.02	-784.87	-1,301.82	2,754.32	2,671.39	82.93	33.214					
9,100.00	7,935.99	8,824.31	7,888.99	51.16	43.47	-89.02	-784.44	-1,401.83	2,754.33	2,667.66	86.68	31.777					
9,200.00	7,935.99	8,924.32	7,888.99	52.60	45.40	-89.02	-784.01	-1,501.83	2,754.34	2,663.75	90.59	30.404					
9,300.00	7,935.99	9,024.32	7,888.99	54.16	47.41	-89.02	-783.58	-1,601.83	2,754.35	2,659.70	94.65	29.101					
9,400.00	7,935.99	9,124.33	7,888.99	55.82	49.48	-89.02	-783.15	-1,701.84	2,754.36	2,655.53	98.83	27.869					
9,500.00	7,935.99	9,224.33	7,888.99	57.58	51.62	-89.02	-782.72	-1,801.84	2,754.37	2,651.25	103.13	26.708					
9,600.00	7,935.99	9,324.33	7,888.99	59.43	53.81	-89.02	-782.29	-1,901.85	2,754.38	2,646.86	107.52	25.617					
9,700.00	7,935.98	9,424.34	7,888.99	61.36	56.04	-89.02	-781.86	-2,001.85	2,754.39	2,642.40	112.00	24.593					
9,800.00	7,935.98	9,524.34	7,888.99	63.35	58.31	-89.02	-781.43	-2,101.85	2,754.40	2,637.85	116.55	23.632					
9,900.00	7,935.98	9,624.35	7,888.99	65.40	60.62	-89.02	-781.00	-2,201.86	2,754.41	2,633.24	121.18	22.731					
10,000.00	7,935.98	9,724.35	7,888.98	67.50	62.96	-89.02	-780.57	-2,301.86	2,754.42	2,628.57	125.86	21.885					
10,100.00	7,935.98	9,824.36	7,888.98	69.66	65.32	-89.02	-780.14	-2,401.86	2,754.43	2,623.84	130.59	21.092					
10,200.00	7,935.98	9,924.36	7,888.98	71.85	67.71	-89.02	-779.71	-2,501.87	2,754.44	2,619.06	135.38	20.346					
10,300.00	7,935.98	10,024.37	7,888.98	74.08	70.13	-89.02	-779.28	-2,601.87	2,754.45	2,614.25	140.20	19.646					
10,400.00	7,935.97	10,124.37	7,888.98	76.35	72.56	-89.02	-778.85	-2,701.88	2,754.46	2,609.39	145.07	18.987					
10,500.00	7,935.97	10,224.38	7,888.98	78.64	75.01	-89.02	-778.41	-2,801.88	2,754.47	2,604.50	149.97	18.367					
10,600.00	7,935.97	10,324.38	7,888.98	80.97	77.48	-89.02	-777.98	-2,901.88	2,754.48	2,599.57	154.90	17.782					
10,700.00	7,935.97	10,424.39	7,888.98	83.32	79.96	-89.02	-777.55	-3,001.89	2,754.48	2,594.62	159.86	17.230					
10,800.00	7,935.97	10,524.39	7,888.98	85.69	82.46	-89.02	-777.12	-3,101.89	2,754.49	2,589.64	164.85	16.709					
10,900.00	7,935.97	10,624.40	7,888.98	88.08	84.96	-89.02	-776.69	-3,201.89	2,754.50	2,584.64	169.86	16.216					
11,000.00	7,935.97	10,724.40	7,888.98	90.49	87.48	-89.02	-776.25	-3,301.90	2,754.51	2,579.61	174.90	15.749					
11,100.00	7,935.96	10,824.41	7,888.98	92.91	90.01	-89.02	-775.82	-3,401.90	2,754.52	2,574.57	179.95	15.307					
11,200.00	7,935.96	10,924.41	7,888.98	95.35	92.55	-89.02	-775.39	-3,501.91	2,754.52	2,569.50	185.02	14.888					
11,300.00	7,935.96	11,024.41	7,888.97	97.81	95.09	-89.02	-774.96	-3,601.91	2,754.53	2,564.42	190.11	14.489					
11,400.00	7,935.96	11,124.42	7,888.97	100.28	97.65	-89.02	-774.52	-3,701.91	2,754.54	2,559.33	195.21	14.110					
11,500.00	7,935.96	11,224.42	7,888.97	102.76	100.21	-89.02	-774.09	-3,801.92	2,754.55	2,554.21	200.33	13.750					
11,600.00	7,935.96	11,324.43	7,888.97	105.25	102.77	-89.02	-773.66	-3,901.92	2,754.55	2,549.09	205.46	13.407					
11,700.00	7,935.96	11,424.43	7,888.97	107.75	105.35	-89.02	-773.22	-4,001.92	2,754.56	2,543.95	210.61	13.079					
11,800.00	7,935.95	11,524.44	7,888.97	110.26	107.93	-89.02	-772.79	-4,101.93	2,754.57	2,538.80	215.76	12.767					
11,900.00	7,935.95	11,624.44	7,888.97	112.78	110.51	-89.02	-772.36	-4,201.93	2,754.57	2,533.64	220.93	12.468					
12,000.00	7,935.95	11,724.45	7,888.97	115.31	113.10	-89.02	-771.92	-4,301.94	2,754.58	2,528.47	226.10	12.183					
12,100.00	7,935.95	11,824.45	7,888.97	117.84	115.70	-89.02	-771.49	-4,401.94	2,754.58	2,523.29	231.29	11.910					
12,200.00	7,935.95	11,924.46	7,888.97	120.39	118.30	-89.02	-771.05	-4,501.94	2,754.59	2,518.11	236.48	11.648					
12,300.00	7,935.95	12,024.46	7,888.97	122.94	120.90	-89.02	-770.62	-4,601.95	2,754.60	2,512.91	241.69	11.397					
12,400.00	7,935.95	12,124.47	7,888.97	125.49	123.51	-89.02	-770.18	-4,701.95	2,754.60	2,507.71	246.90	11.157					
12,500.00	7,935.94	12,224.47	7,888.97	128.05	126.12	-89.02	-769.75	-4,801.95	2,754.61	2,502.49	252.11	10.926					
12,600.00	7,935.94	12,324.48	7,888.97	130.62	128.73	-89.02	-769.31	-4,901.96	2,754.61	2,497.28	257.34	10.704					
12,700.00	7,935.94	12,424.48	7,888.97	133.19	131.34	-89.02	-768.88	-5,001.96	2,754.62	2,492.05	262.56	10.491					
12,800.00	7,935.94	12,524.48	7,888.97	135.77	133.96	-89.02	-768.44	-5,101.97	2,754.62	2,486.82	267.80	10.286					
12,900.00	7,935.94	12,624.49	7,888.97	138.35	136.59	-89.02	-768.01	-5,201.97	2,754.63	2,481.58	273.04	10.089					
13,000.00	7,935.94	12,724.49	7,888.97	140.93	139.21	-89.02	-767.57	-5,301.97	2,754.63	2,476.34	278.29	9.898					
13,100.00	7,935.94	12,824.50	7,888.97	143.52	141.84	-89.02	-767.14	-5,401.98	2,754.63	2,471.09	283.54	9.715					
13,200.00	7,935.93	12,924.50	7,888.97	146.11	144.47	-89.02	-766.70	-5,501.98	2,754.64	2,465.84	288.79	9.538					
13,300.00	7,935.93	13,024.51	7,888.97	148.71	147.10	-89.02	-766.26	-5,601.98	2,754.64	2,460.59	294.06	9.368					
13,400.00	7,935.93	13,124.51	7,888.97	151.31	149.73	-89.02	-765.83	-5,701.99	2,754.65	2,455.33	299.32	9.203					
13,500.00	7,935.93	13,224.52	7,888.97	153.91	152.37	-89.02	-765.39	-5,801.99	2,754.65	2,450.06	304.59	9.044					
13,600.00	7,935.93	13,324.52	7,888.97	156.52	155.01	-89.02	-764.95	-5,902.00	2,754.65	2,444.79	309.86	8.890					
13,700.00	7,935.93	13,424.53	7,888.97	159.13	157.65	-89.02	-764.52	-6,002.00	2,754.66	2,439.52	315.14	8.741					
13,800.00	7,935.93	13,524.53	7,888.97	161.74	160.29	-89.02	-764.08	-6,102.00	2,754.66	2,434.24	320.42	8.597					
13,900.00	7,935.92	13,624.54	7,888.97	164.35	162.93	-89.02	-763.64	-6,202.01	2,754.66	2,428.96	325.70	8.458					
14,000.00	7,935.92	13,724.54	7,888.97	166.97	165.57	-89.02	-763.20	-6,302.01	2,754.66	2,423.68	330.98	8.323					

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-8 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,100.00	7,935.92	13,824.55	7,888.97	169.59	168.22	-89.02	-762.77	-6,402.01	2,754.67	2,418.39	336.27	8.192		
14,200.00	7,935.92	13,924.55	7,888.97	172.21	170.87	-89.02	-762.33	-6,502.02	2,754.67	2,413.10	341.56	8.065		
14,300.00	7,935.92	14,024.56	7,888.97	174.84	173.52	-89.02	-761.89	-6,602.02	2,754.67	2,407.81	346.86	7.942		
14,400.00	7,935.92	14,124.56	7,888.97	177.46	176.17	-89.02	-761.45	-6,702.03	2,754.67	2,402.52	352.16	7.822		
14,500.00	7,935.92	14,224.56	7,888.97	180.09	178.82	-89.02	-761.01	-6,802.03	2,754.68	2,397.22	357.45	7.706		
14,600.00	7,935.91	14,324.57	7,888.97	182.72	181.47	-89.02	-760.58	-6,902.03	2,754.68	2,391.92	362.76	7.594		
14,700.00	7,935.91	14,424.57	7,888.97	185.35	184.12	-89.02	-760.14	-7,002.04	2,754.68	2,386.62	368.06	7.484		
14,800.00	7,935.91	14,524.58	7,888.97	187.98	186.78	-89.02	-759.70	-7,102.04	2,754.68	2,381.31	373.37	7.378		
14,900.00	7,935.91	14,624.58	7,888.97	190.62	189.43	-89.02	-759.26	-7,202.04	2,754.68	2,376.01	378.67	7.275		
15,000.00	7,935.91	14,724.59	7,888.97	193.25	192.09	-89.02	-758.82	-7,302.05	2,754.68	2,370.70	383.98	7.174		
15,100.00	7,935.91	14,824.59	7,888.97	195.89	194.74	-89.02	-758.38	-7,402.05	2,754.68	2,365.39	389.30	7.076		
15,200.00	7,935.91	14,924.60	7,888.97	198.53	197.40	-89.02	-757.94	-7,502.06	2,754.68	2,360.07	394.61	6.981		
15,300.00	7,935.90	15,024.60	7,888.97	201.17	200.06	-89.02	-757.50	-7,602.06	2,754.68	2,354.76	399.92	6.888		
15,400.00	7,935.90	15,124.61	7,888.97	203.81	202.72	-89.02	-757.06	-7,702.06	2,754.68	2,349.44	405.24	6.798		
15,500.00	7,935.90	15,224.61	7,888.97	206.45	205.38	-89.02	-756.62	-7,802.07	2,754.68	2,344.12	410.56	6.710		
15,600.00	7,935.90	15,324.62	7,888.98	209.10	208.04	-89.02	-756.18	-7,902.07	2,754.68	2,338.80	415.88	6.624		
15,700.00	7,935.90	15,424.62	7,888.98	211.74	210.70	-89.02	-755.74	-8,002.07	2,754.68	2,333.48	421.20	6.540		
15,800.00	7,935.90	15,524.63	7,888.98	214.39	213.37	-89.02	-755.30	-8,102.08	2,754.68	2,328.16	426.53	6.458		
15,900.00	7,935.90	15,624.63	7,888.98	217.04	216.03	-89.02	-754.86	-8,202.08	2,754.68	2,322.83	431.85	6.379		
16,000.00	7,935.89	15,724.64	7,888.98	219.69	218.69	-89.02	-754.42	-8,302.09	2,754.68	2,317.51	437.18	6.301		
16,100.00	7,935.89	15,824.64	7,888.98	222.34	221.36	-89.02	-753.98	-8,402.09	2,754.68	2,312.18	442.50	6.225		
16,200.00	7,935.89	15,924.64	7,888.98	224.99	224.02	-89.02	-753.54	-8,502.09	2,754.68	2,306.85	447.83	6.151		
16,300.00	7,935.89	16,024.65	7,888.98	227.64	226.69	-89.02	-753.10	-8,602.10	2,754.68	2,301.52	453.16	6.079		
16,400.00	7,935.89	16,124.65	7,888.98	230.29	229.36	-89.02	-752.65	-8,702.10	2,754.68	2,296.19	458.49	6.008		
16,500.00	7,935.89	16,224.66	7,888.98	232.94	232.02	-89.02	-752.21	-8,802.10	2,754.68	2,290.85	463.82	5.939		
16,600.00	7,935.89	16,324.66	7,888.98	235.60	234.69	-89.02	-751.77	-8,902.11	2,754.67	2,285.52	469.16	5.872		
16,700.00	7,935.88	16,424.67	7,888.98	238.25	237.36	-89.02	-751.33	-9,002.11	2,754.67	2,280.18	474.49	5.806		
16,800.00	7,935.88	16,524.67	7,888.98	240.91	240.03	-89.02	-750.89	-9,102.12	2,754.67	2,274.85	479.83	5.741		
16,900.00	7,935.88	16,624.68	7,888.99	243.56	242.70	-89.02	-750.44	-9,202.12	2,754.67	2,269.51	485.16	5.678		
17,000.00	7,935.88	16,724.68	7,888.99	246.22	245.37	-89.02	-750.00	-9,302.12	2,754.67	2,264.17	490.50	5.616		
17,100.00	7,935.88	16,824.69	7,888.99	248.88	248.04	-89.02	-749.56	-9,402.13	2,754.66	2,258.83	495.84	5.556		
17,200.00	7,935.88	16,924.69	7,888.99	251.54	250.71	-89.02	-749.12	-9,502.13	2,754.66	2,253.49	501.17	5.496		
17,300.00	7,935.88	17,024.70	7,888.99	254.20	253.38	-89.02	-748.67	-9,602.13	2,754.66	2,248.14	506.51	5.438		
17,400.00	7,935.87	17,124.70	7,888.99	256.86	256.05	-89.02	-748.23	-9,702.14	2,754.65	2,242.80	511.85	5.382		
17,500.00	7,935.87	17,224.71	7,888.99	259.52	258.72	-89.02	-747.79	-9,802.14	2,754.65	2,237.46	517.20	5.326		
17,600.00	7,935.87	17,324.71	7,888.99	262.18	261.39	-89.02	-747.34	-9,902.15	2,754.65	2,232.11	522.54	5.272		
17,700.00	7,935.87	17,424.72	7,888.99	264.84	264.06	-89.02	-746.90	-10,002.15	2,754.64	2,226.76	527.88	5.218		
17,800.00	7,935.87	17,524.72	7,888.99	267.50	266.74	-89.03	-746.45	-10,102.15	2,754.64	2,221.42	533.22	5.166		
17,900.00	7,935.87	17,624.72	7,889.00	270.17	269.41	-89.03	-746.01	-10,202.16	2,754.64	2,216.07	538.57	5.115		
18,000.00	7,935.87	17,724.73	7,889.00	272.83	272.08	-89.03	-745.57	-10,302.16	2,754.63	2,210.72	543.91	5.064		
18,100.00	7,935.86	17,824.73	7,889.00	275.49	274.76	-89.03	-745.12	-10,402.16	2,754.63	2,205.37	549.26	5.015		
18,200.00	7,935.86	17,924.74	7,889.00	278.16	277.43	-89.03	-744.68	-10,502.17	2,754.62	2,200.02	554.60	4.967		
18,239.20	7,936.00	17,963.93	7,889.00	279.20	278.48	-89.02	-744.50	-10,541.36	2,754.28	2,197.58	556.70	4.948 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
0.00	0.00	0.00	0.00	0.00	0.00	90.00	0.00	53.44	53.44					
100.00	100.00	100.00	100.00	0.13	0.13	90.00	0.00	53.44	53.44	53.17	0.27	198.760		
200.00	200.00	200.00	200.00	0.49	0.49	90.00	0.00	53.44	53.44	52.45	0.99	54.207 CC		
300.00	299.98	300.02	299.98	0.85	0.85	99.76	0.00	53.44	53.71	52.00	1.70	31.544 ES		
400.00	399.84	400.16	399.84	1.22	1.21	105.13	0.00	53.44	54.84	52.41	2.42	22.630		
500.00	499.45	500.55	499.45	1.59	1.57	113.43	0.00	53.44	57.73	54.58	3.15	18.307		
600.00	598.70	601.30	598.70	1.97	1.93	123.40	0.00	53.44	63.59	59.69	3.90	16.322		
700.00	697.47	697.47	697.47	2.38	2.28	133.44	0.00	53.44	73.42	68.80	4.63	15.864		
800.00	795.62	794.18	794.17	2.82	2.61	143.05	-1.49	53.02	88.51	83.16	5.35	16.553		
900.00	893.06	888.60	888.47	3.29	2.92	151.82	-5.97	51.75	110.44	104.40	6.04	18.286		
1,000.00	989.64	980.20	979.76	3.79	3.23	158.93	-13.18	49.71	139.56	132.84	6.72	20.777		
1,081.03	1,067.21	1,052.02	1,051.14	4.23	3.49	163.48	-20.79	47.56	168.27	161.02	7.25	23.195		
1,100.00	1,085.29	1,068.52	1,067.51	4.34	3.55	164.44	-22.78	47.00	175.57	168.19	7.38	23.785		
1,200.00	1,180.60	1,154.13	1,152.23	4.91	3.86	168.68	-34.56	43.66	216.03	208.03	8.01	26.973		
1,300.00	1,275.90	1,237.39	1,234.25	5.49	4.19	171.89	-48.36	39.76	259.54	250.92	8.62	30.102		
1,400.00	1,371.21	1,320.50	1,315.68	6.07	4.53	174.46	-64.30	35.25	305.73	296.49	9.24	33.082		
1,500.00	1,466.52	1,408.05	1,401.35	6.66	4.90	176.53	-81.66	30.35	352.88	342.97	9.91	35.624		
1,600.00	1,561.83	1,504.40	1,487.03	7.26	5.33	178.12	-99.02	25.44	400.31	389.69	10.61	37.714		
1,700.00	1,657.14	1,583.15	1,572.70	7.85	5.68	179.38	-116.37	20.53	447.93	436.66	11.26	39.772		
1,800.00	1,752.44	1,670.71	1,658.38	8.45	6.08	-179.61	-133.73	15.62	495.68	483.73	11.95	41.482		
1,900.00	1,847.75	1,758.26	1,744.05	9.05	6.49	-178.77	-151.09	10.71	543.53	530.89	12.64	43.000		
2,000.00	1,943.06	1,845.81	1,829.73	9.66	6.90	-178.07	-168.45	5.80	591.46	578.12	13.34	44.354		
2,100.00	2,038.37	1,933.37	1,915.40	10.26	7.31	-177.47	-185.81	0.89	639.45	625.41	14.03	45.568		
2,200.00	2,133.68	2,020.92	2,001.07	10.86	7.73	-176.96	-203.17	-4.01	687.48	672.75	14.73	46.662		
2,300.00	2,228.99	2,108.47	2,086.75	11.47	8.15	-176.51	-220.53	-8.92	735.55	720.11	15.44	47.652		
2,400.00	2,324.29	2,203.98	2,172.42	12.08	8.61	-176.12	-237.88	-13.83	783.65	767.48	16.17	48.458		
2,500.00	2,419.60	2,283.58	2,258.10	12.68	8.99	-175.77	-255.24	-18.74	831.77	814.93	16.85	49.372		
2,600.00	2,514.91	2,371.13	2,343.77	13.29	9.42	-175.46	-272.60	-23.65	879.92	862.37	17.56	50.123		
2,700.00	2,610.22	2,458.68	2,429.45	13.90	9.84	-175.19	-289.96	-28.56	928.09	909.82	18.26	50.814		
2,800.00	2,705.53	2,546.24	2,515.12	14.51	10.27	-174.94	-307.32	-33.47	976.26	957.29	18.98	51.450		
2,900.00	2,800.83	2,633.79	2,600.80	15.12	10.70	-174.71	-324.68	-38.37	1,024.46	1,004.77	19.69	52.037		
3,000.00	2,896.14	2,721.34	2,686.47	15.73	11.13	-174.50	-342.03	-43.28	1,072.66	1,052.26	20.40	52.582		
3,100.00	2,991.45	2,808.89	2,772.14	16.34	11.56	-174.31	-359.39	-48.19	1,120.87	1,099.76	21.11	53.088		
3,200.00	3,086.76	2,896.45	2,857.82	16.95	11.99	-174.14	-376.75	-53.10	1,169.09	1,147.27	21.83	53.560		
3,300.00	3,182.07	2,984.00	2,943.49	17.56	12.42	-173.98	-394.11	-58.01	1,217.32	1,194.78	22.54	54.000		
3,400.00	3,277.38	3,071.55	3,029.17	18.17	12.86	-173.84	-411.47	-62.92	1,265.56	1,242.30	23.26	54.411		
3,500.00	3,372.68	3,159.11	3,114.84	18.78	13.29	-173.70	-428.83	-67.83	1,313.80	1,289.82	23.98	54.797		
3,600.00	3,467.99	3,246.66	3,200.52	19.39	13.72	-173.57	-446.19	-72.74	1,362.05	1,337.35	24.69	55.159		
3,700.00	3,563.30	3,334.21	3,286.19	20.00	14.16	-173.45	-463.54	-77.64	1,410.30	1,384.89	25.41	55.499		
3,800.00	3,658.61	3,421.77	3,371.86	20.61	14.59	-173.34	-480.90	-82.55	1,458.56	1,432.43	26.13	55.820		
3,900.00	3,753.92	3,509.32	3,457.54	21.22	15.03	-173.24	-498.26	-87.46	1,506.82	1,479.97	26.85	56.122		
4,000.00	3,849.22	3,603.13	3,543.21	21.83	15.49	-173.14	-515.62	-92.37	1,555.08	1,527.49	27.59	56.358		
4,100.00	3,944.53	3,684.42	3,628.89	22.45	15.90	-173.05	-532.98	-97.28	1,603.35	1,575.06	28.29	56.679		
4,200.00	4,039.84	3,771.98	3,714.56	23.06	16.34	-172.97	-550.34	-102.19	1,651.62	1,622.61	29.01	56.935		
4,300.00	4,135.15	3,859.53	3,800.24	23.67	16.77	-172.89	-567.69	-107.10	1,699.89	1,670.16	29.73	57.178		
4,400.00	4,230.46	3,947.08	3,885.91	24.28	17.21	-172.81	-585.05	-112.00	1,748.16	1,717.71	30.45	57.409		
4,500.00	4,325.77	4,034.64	3,971.59	24.89	17.65	-172.74	-602.41	-116.91	1,796.44	1,765.27	31.17	57.628		
4,600.00	4,421.07	4,122.19	4,057.26	25.51	18.08	-172.67	-619.77	-121.82	1,844.72	1,812.82	31.89	57.837		
4,700.00	4,516.38	4,209.74	4,142.93	26.12	18.52	-172.60	-637.13	-126.73	1,893.00	1,860.38	32.62	58.036		
4,800.00	4,611.69	4,302.71	4,228.61	26.73	18.98	-172.54	-654.49	-131.64	1,941.28	1,907.92	33.36	58.189		
4,900.00	4,707.00	4,384.85	4,314.28	27.34	19.40	-172.48	-671.85	-136.55	1,989.57	1,955.50	34.06	58.407		
5,000.00	4,802.31	4,472.40	4,399.96	27.95	19.83	-172.43	-689.20	-141.46	2,037.85	2,003.06	34.79	58.580		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
5,100.00	4,897.61	4,559.95	4,485.63	28.57	20.27	-172.38	-706.56	-146.37	2,086.14	2,050.63	35.51	58.746		
5,200.00	4,992.92	4,647.51	4,571.31	29.18	20.71	-172.32	-723.92	-151.27	2,134.43	2,098.19	36.24	58.904		
5,300.00	5,088.23	4,735.06	4,656.98	29.79	21.15	-172.28	-741.28	-156.18	2,182.72	2,145.76	36.96	59.055		
5,400.00	5,183.54	4,822.61	4,742.66	30.40	21.59	-172.23	-758.64	-161.09	2,231.01	2,193.32	37.69	59.201		
5,500.00	5,278.85	4,910.16	4,828.33	31.01	22.02	-172.18	-776.00	-166.00	2,279.30	2,240.89	38.41	59.340		
5,600.00	5,374.15	5,002.28	4,914.00	31.63	22.49	-172.14	-793.35	-170.91	2,327.59	2,288.44	39.15	59.446		
5,700.00	5,469.46	5,085.27	4,999.68	32.24	22.90	-172.10	-810.71	-175.82	2,375.89	2,336.03	39.86	59.602		
5,800.00	5,564.77	5,172.82	5,085.35	32.85	23.34	-172.06	-828.07	-180.73	2,424.18	2,383.59	40.59	59.725		
5,900.00	5,660.08	5,260.38	5,171.03	33.46	23.78	-172.02	-845.43	-185.63	2,472.48	2,431.16	41.32	59.843		
6,000.00	5,755.39	5,347.93	5,256.70	34.08	24.22	-171.99	-862.79	-190.54	2,520.78	2,478.73	42.04	59.957		
6,100.00	5,850.70	5,435.48	5,342.38	34.69	24.66	-171.95	-880.15	-195.45	2,569.07	2,526.30	42.77	60.067		
6,200.00	5,946.00	5,523.03	5,428.05	35.30	25.10	-171.92	-897.51	-200.36	2,617.37	2,573.87	43.50	60.172		
6,300.00	6,041.31	5,610.59	5,513.72	35.91	25.54	-171.89	-914.86	-205.27	2,665.67	2,621.44	44.23	60.274		
6,400.00	6,136.62	5,701.86	5,599.40	36.53	26.00	-171.85	-932.22	-210.18	2,713.97	2,669.00	44.97	60.352		
6,500.00	6,231.93	5,785.69	5,685.07	37.14	26.42	-171.82	-949.58	-215.09	2,762.27	2,716.59	45.68	60.466		
6,600.00	6,327.24	5,873.25	5,770.75	37.75	26.86	-171.80	-966.94	-219.99	2,810.57	2,764.16	46.41	60.557		
6,700.00	6,422.54	5,960.80	5,856.42	38.37	27.29	-171.77	-984.30	-224.90	2,858.87	2,811.73	47.14	60.644		
6,745.38	6,465.79	6,000.53	5,895.30	38.64	27.49	-171.75	-992.17	-227.13	2,880.79	2,833.32	47.47	60.683		
6,800.00	6,518.01	6,048.60	5,942.34	38.97	27.74	-171.82	-1,001.70	-229.83	2,906.72	2,858.85	47.87	60.720		
6,900.00	6,614.35	6,137.83	6,029.65	39.54	28.18	-171.93	-1,019.40	-234.83	2,951.82	2,903.22	48.60	60.738		
7,000.00	6,711.57	6,228.55	6,118.43	40.06	28.64	-172.01	-1,037.38	-239.91	2,993.82	2,944.49	49.33	60.693		
7,100.00	6,809.55	6,320.65	6,208.55	40.53	29.10	-172.07	-1,055.64	-245.08	3,032.65	2,982.60	50.05	60.588		
7,200.00	6,908.17	6,414.03	6,299.93	40.96	29.57	-172.11	-1,074.16	-250.31	3,068.28	3,017.51	50.78	60.427		
7,300.00	7,007.30	6,508.56	6,392.43	41.35	30.05	-172.13	-1,092.90	-255.61	3,100.67	3,049.17	51.50	60.213		
7,400.00	7,106.83	6,604.14	6,485.96	41.69	30.53	-172.14	-1,111.85	-260.97	3,129.76	3,077.56	52.21	59.949		
7,500.00	7,206.63	6,700.93	6,580.82	41.98	33.36	-171.89	-1,186.35	-282.58	3,148.15	3,091.48	56.67	55.548		
7,600.00	7,306.59	7,429.87	7,304.81	42.23	33.65	-171.68	-1,186.29	-295.36	3,150.80	3,093.46	57.34	54.952		
7,626.41	7,333.00	7,455.04	7,329.27	42.29	33.73	-179.49	-1,186.27	-301.29	3,150.94	3,093.43	57.51	54.788		
7,656.41	7,363.00	7,482.93	7,356.03	42.35	33.82	-179.35	-1,186.23	-309.11	3,150.99	3,093.28	57.71	54.599		
7,700.00	7,406.55	7,522.47	7,393.26	42.45	33.96	-89.38	-1,186.17	-322.41	3,151.11	3,093.11	58.00	54.328		
7,750.00	7,456.18	7,566.92	7,433.90	42.56	34.11	-89.12	-1,186.10	-340.38	3,151.32	3,092.97	58.35	54.011		
7,800.00	7,505.10	7,610.49	7,472.27	42.68	34.27	-88.87	-1,186.01	-361.00	3,151.57	3,092.87	58.70	53.685		
7,850.00	7,552.93	7,653.27	7,508.32	42.81	34.43	-88.63	-1,185.91	-384.03	3,151.88	3,092.80	59.08	53.347		
7,900.00	7,599.32	7,695.35	7,541.99	42.94	34.59	-88.40	-1,185.80	-409.24	3,152.23	3,092.75	59.48	52.993		
7,950.00	7,643.91	7,736.79	7,573.26	43.08	34.76	-88.17	-1,185.68	-436.42	3,152.61	3,092.70	59.91	52.620		
8,000.00	7,686.37	7,777.66	7,602.11	43.22	34.93	-87.96	-1,185.55	-465.37	3,153.01	3,092.63	60.37	52.226		
8,050.00	7,726.36	7,818.03	7,628.49	43.37	35.11	-87.77	-1,185.42	-495.91	3,153.41	3,092.55	60.87	51.807		
8,100.00	7,763.59	7,857.96	7,652.41	43.53	35.29	-87.58	-1,185.28	-527.87	3,153.82	3,092.42	61.41	51.361		
8,150.00	7,797.77	7,897.49	7,673.85	43.69	35.48	-87.42	-1,185.13	-561.08	3,154.22	3,092.23	61.99	50.882		
8,200.00	7,828.65	7,936.69	7,692.79	43.86	35.69	-87.26	-1,184.98	-595.38	3,154.60	3,091.96	62.64	50.363		
8,250.00	7,855.98	7,975.59	7,709.23	44.05	35.91	-87.13	-1,184.83	-630.63	3,154.95	3,091.61	63.34	49.810		
8,300.00	7,879.55	8,014.25	7,723.16	44.25	36.14	-87.01	-1,184.67	-666.68	3,155.27	3,091.16	64.10	49.221		
8,350.00	7,899.20	8,052.69	7,734.57	44.47	36.39	-86.91	-1,184.51	-703.39	3,155.54	3,090.61	64.93	48.598		
8,400.00	7,914.77	8,090.97	7,745.46	44.71	36.67	-86.83	-1,184.35	-740.62	3,155.77	3,089.94	65.83	47.939		
8,450.00	7,926.14	8,129.13	7,749.83	44.98	36.96	-86.77	-1,184.18	-778.23	3,155.94	3,089.16	66.79	47.254		
8,500.00	7,933.22	8,167.19	7,753.68	45.26	37.28	-86.73	-1,184.02	-816.09	3,156.06	3,088.26	67.80	46.549		
8,550.00	7,935.96	8,207.44	7,755.00	45.58	37.64	-86.71	-1,183.85	-853.77	3,156.12	3,087.23	68.89	45.813		
8,556.48	7,936.00	8,211.38	7,755.00	45.62	37.68	-86.71	-1,183.83	-860.25	3,156.12	3,087.10	69.02	45.725		
8,600.00	7,936.00	8,254.90	7,755.00	45.92	38.10	-86.71	-1,183.64	-903.77	3,156.12	3,085.95	70.17	44.977		
8,700.00	7,936.00	8,354.90	7,755.00	46.70	39.20	-86.71	-1,183.20	-1,003.77	3,156.13	3,083.13	73.00	43.235		
8,800.00	7,936.00	8,454.90	7,755.00	47.61	40.48	-86.71	-1,182.76	-1,103.77	3,156.13	3,080.03	76.10	41.473		
8,900.00	7,936.00	8,554.90	7,755.00	48.66	41.91	-86.71	-1,182.33	-1,203.76	3,156.13	3,076.69	79.44	39.728		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-9 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance						Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
9,000.00	7,935.99	8,654.90	7,755.00	49.84	43.48	-86.71	-1,181.89	-1,303.76	3,156.14	3,073.14	83.00	38.025		
9,100.00	7,935.99	8,754.90	7,755.00	51.16	45.18	-86.71	-1,181.45	-1,403.76	3,156.14	3,069.40	86.75	36.384		
9,200.00	7,935.99	8,854.90	7,755.00	52.60	46.99	-86.71	-1,181.02	-1,503.76	3,156.15	3,065.49	90.65	34.815		
9,300.00	7,935.99	8,954.90	7,755.00	54.16	48.90	-86.71	-1,180.58	-1,603.76	3,156.15	3,061.44	94.71	33.326		
9,400.00	7,935.99	9,054.90	7,755.00	55.82	50.88	-86.71	-1,180.14	-1,703.76	3,156.15	3,057.27	98.88	31.918		
9,500.00	7,935.99	9,154.90	7,755.00	57.58	52.94	-86.71	-1,179.71	-1,803.76	3,156.16	3,052.98	103.17	30.591		
9,600.00	7,935.99	9,254.90	7,755.00	59.43	55.06	-86.71	-1,179.27	-1,903.76	3,156.16	3,048.60	107.56	29.343		
9,700.00	7,935.98	9,354.90	7,754.99	61.36	57.23	-86.71	-1,178.83	-2,003.76	3,156.16	3,044.13	112.03	28.172		
9,800.00	7,935.98	9,454.90	7,754.99	63.35	59.45	-86.71	-1,178.40	-2,103.76	3,156.17	3,039.59	116.58	27.073		
9,900.00	7,935.98	9,554.90	7,754.99	65.40	61.71	-86.71	-1,177.96	-2,203.76	3,156.17	3,034.97	121.20	26.042		
10,000.00	7,935.98	9,654.90	7,754.99	67.50	64.00	-86.71	-1,177.52	-2,303.75	3,156.17	3,030.30	125.87	25.074		
10,100.00	7,935.98	9,754.90	7,754.99	69.66	66.33	-86.71	-1,177.09	-2,403.75	3,156.18	3,025.57	130.60	24.166		
10,200.00	7,935.98	9,854.90	7,754.99	71.85	68.69	-86.71	-1,176.65	-2,503.75	3,156.18	3,020.80	135.38	23.313		
10,300.00	7,935.98	9,954.90	7,754.99	74.08	71.07	-86.71	-1,176.21	-2,603.75	3,156.18	3,015.98	140.20	22.512		
10,400.00	7,935.97	10,054.90	7,754.99	76.35	73.47	-86.71	-1,175.78	-2,703.75	3,156.19	3,011.12	145.06	21.757		
10,500.00	7,935.97	10,154.90	7,754.99	78.64	75.90	-86.71	-1,175.34	-2,803.75	3,156.19	3,006.23	149.96	21.047		
10,600.00	7,935.97	10,254.90	7,754.99	80.97	78.34	-86.71	-1,174.90	-2,903.75	3,156.19	3,001.31	154.89	20.378		
10,700.00	7,935.97	10,354.90	7,754.99	83.32	80.80	-86.71	-1,174.47	-3,003.75	3,156.20	2,996.36	159.84	19.746		
10,800.00	7,935.97	10,454.90	7,754.99	85.69	83.28	-86.71	-1,174.03	-3,103.75	3,156.20	2,991.38	164.82	19.149		
10,900.00	7,935.97	10,554.90	7,754.99	88.08	85.77	-86.71	-1,173.59	-3,203.75	3,156.20	2,986.37	169.83	18.585		
11,000.00	7,935.97	10,654.90	7,754.99	90.49	88.27	-86.71	-1,173.16	-3,303.74	3,156.21	2,981.35	174.86	18.050		
11,100.00	7,935.96	10,754.90	7,754.99	92.91	90.78	-86.71	-1,172.72	-3,403.74	3,156.21	2,976.31	179.91	17.544		
11,200.00	7,935.96	10,854.90	7,754.99	95.35	93.30	-86.71	-1,172.28	-3,503.74	3,156.22	2,971.24	184.97	17.063		
11,300.00	7,935.96	10,954.90	7,754.99	97.81	95.84	-86.71	-1,171.85	-3,603.74	3,156.22	2,966.16	190.06	16.607		
11,400.00	7,935.96	11,054.90	7,754.99	100.28	98.38	-86.71	-1,171.41	-3,703.74	3,156.22	2,961.07	195.15	16.173		
11,500.00	7,935.96	11,154.90	7,754.99	102.76	100.93	-86.71	-1,170.97	-3,803.74	3,156.23	2,955.96	200.27	15.760		
11,600.00	7,935.96	11,254.90	7,754.99	105.25	103.48	-86.71	-1,170.54	-3,903.74	3,156.23	2,950.84	205.39	15.367		
11,700.00	7,935.96	11,354.90	7,754.98	107.75	106.05	-86.71	-1,170.10	-4,003.74	3,156.23	2,945.70	210.53	14.992		
11,800.00	7,935.95	11,454.90	7,754.98	110.26	108.62	-86.71	-1,169.66	-4,103.74	3,156.24	2,940.55	215.68	14.634		
11,900.00	7,935.95	11,554.90	7,754.98	112.78	111.20	-86.71	-1,169.23	-4,203.74	3,156.24	2,935.40	220.84	14.292		
12,000.00	7,935.95	11,654.90	7,754.98	115.31	113.78	-86.71	-1,168.79	-4,303.74	3,156.24	2,930.23	226.02	13.965		
12,100.00	7,935.95	11,754.90	7,754.98	117.84	116.36	-86.71	-1,168.35	-4,403.73	3,156.25	2,925.05	231.20	13.652		
12,200.00	7,935.95	11,854.90	7,754.98	120.39	118.96	-86.71	-1,167.92	-4,503.73	3,156.25	2,919.87	236.38	13.352		
12,300.00	7,935.95	11,954.90	7,754.98	122.94	121.55	-86.71	-1,167.48	-4,603.73	3,156.25	2,914.67	241.58	13.065		
12,400.00	7,935.95	12,054.90	7,754.98	125.49	124.15	-86.71	-1,167.04	-4,703.73	3,156.26	2,909.47	246.79	12.789		
12,500.00	7,935.94	12,154.90	7,754.98	128.05	126.76	-86.71	-1,166.61	-4,803.73	3,156.26	2,904.26	252.00	12.525		
12,600.00	7,935.94	12,254.90	7,754.98	130.62	129.37	-86.71	-1,166.17	-4,903.73	3,156.26	2,899.05	257.22	12.271		
12,700.00	7,935.94	12,354.90	7,754.98	133.19	131.98	-86.71	-1,165.74	-5,003.73	3,156.27	2,893.83	262.44	12.027		
12,800.00	7,935.94	12,454.90	7,754.98	135.77	134.59	-86.71	-1,165.30	-5,103.73	3,156.27	2,888.60	267.67	11.792		
12,900.00	7,935.94	12,554.90	7,754.98	138.35	137.21	-86.71	-1,164.86	-5,203.73	3,156.27	2,883.37	272.91	11.565		
13,000.00	7,935.94	12,654.90	7,754.98	140.93	139.83	-86.71	-1,164.43	-5,303.73	3,156.28	2,878.13	278.15	11.347		
13,100.00	7,935.94	12,754.90	7,754.98	143.52	142.46	-86.71	-1,163.99	-5,403.72	3,156.28	2,872.89	283.40	11.137		
13,200.00	7,935.93	12,854.90	7,754.98	146.11	145.08	-86.71	-1,163.55	-5,503.72	3,156.29	2,867.64	288.65	10.935		
13,300.00	7,935.93	12,954.90	7,754.98	148.71	147.71	-86.71	-1,163.12	-5,603.72	3,156.29	2,862.39	293.90	10.739		
13,400.00	7,935.93	13,054.90	7,754.98	151.31	150.34	-86.71	-1,162.68	-5,703.72	3,156.29	2,857.13	299.16	10.550		
13,500.00	7,935.93	13,154.90	7,754.98	153.91	152.98	-86.71	-1,162.24	-5,803.72	3,156.30	2,851.87	304.43	10.368		
13,600.00	7,935.93	13,254.90	7,754.98	156.52	155.61	-86.71	-1,161.81	-5,903.72	3,156.30	2,846.61	309.69	10.192		
13,700.00	7,935.93	13,354.90	7,754.98	159.13	158.25	-86.71	-1,161.37	-6,003.72	3,156.30	2,841.34	314.97	10.021		
13,800.00	7,935.93	13,454.90	7,754.97	161.74	160.89	-86.71	-1,160.93	-6,103.72	3,156.31	2,836.07	320.24	9.856		
13,900.00	7,935.92	13,554.90	7,754.97	164.35	163.53	-86.71	-1,160.50	-6,203.72	3,156.31	2,830.79	325.52	9.696		
14,000.00	7,935.92	13,654.90	7,754.97	166.97	166.17	-86.71	-1,160.06	-6,303.72	3,156.31	2,825.51	330.80	9.541		
14,100.00	7,935.92	13,754.90	7,754.97	169.59	168.82	-86.71	-1,159.62	-6,403.72	3,156.32	2,820.23	336.08	9.391		

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

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

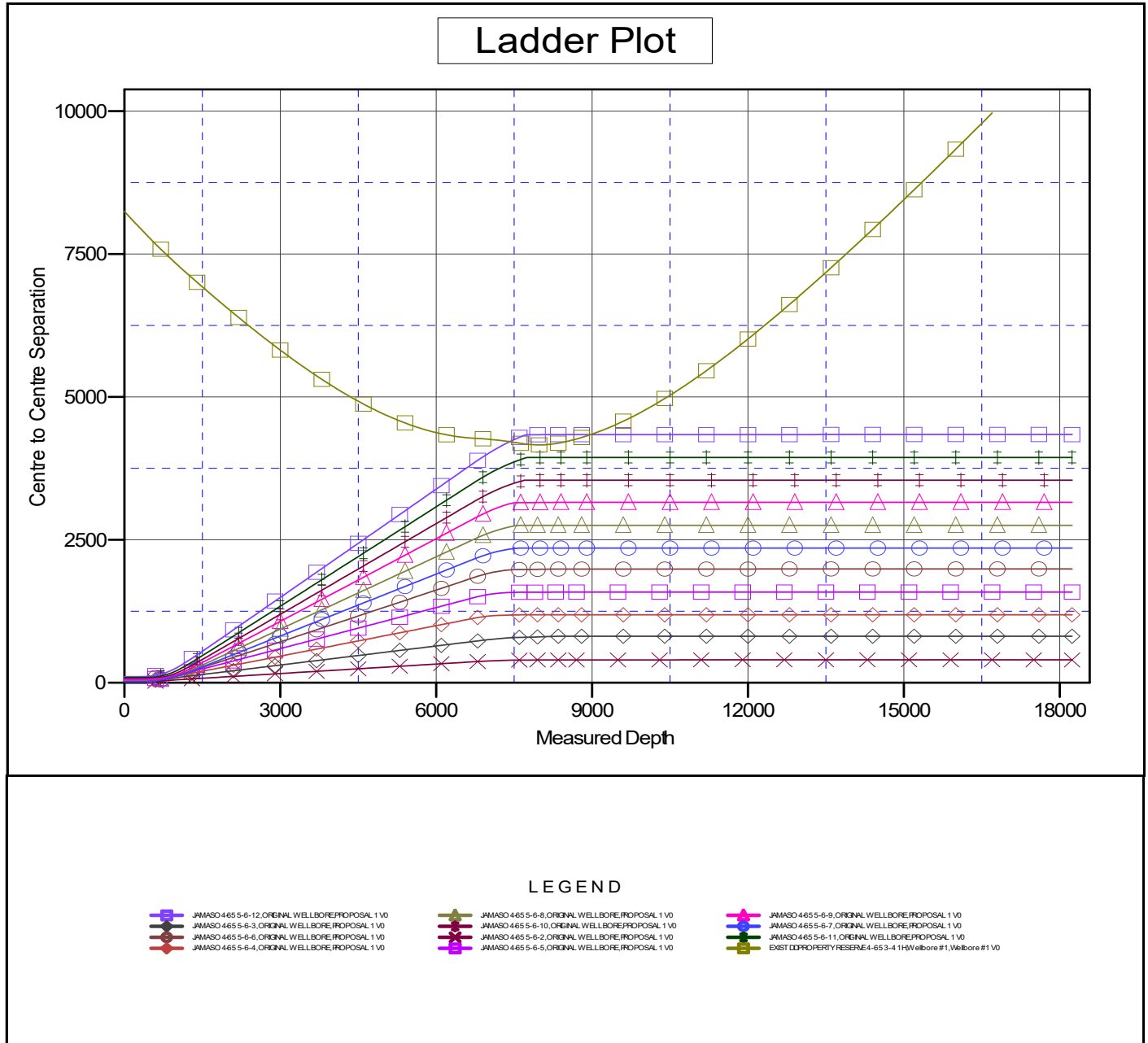
Offset Design Sec 4-T4S-R65W - JAMASO 4-65 5-6-9 - ORIGINAL WELLBORE - PROPOSAL 1													Offset Site Error:	0.00 usft
Survey Program: 0-MWD OWSG													Offset Well Error:	0.00 usft
Reference		Offset		Semi Major Axis			Distance							Warning
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
14,200.00	7,935.92	13,854.90	7,754.97	172.21	171.46	-86.71	-1,159.19	-6,503.71	3,156.32	2,814.95	341.37	9.246		
14,300.00	7,935.92	13,954.90	7,754.97	174.84	174.11	-86.71	-1,158.75	-6,603.71	3,156.32	2,809.66	346.66	9.105		
14,400.00	7,935.92	14,054.90	7,754.97	177.46	176.76	-86.71	-1,158.31	-6,703.71	3,156.33	2,804.38	351.95	8.968		
14,500.00	7,935.92	14,154.90	7,754.97	180.09	179.41	-86.71	-1,157.88	-6,803.71	3,156.33	2,799.08	357.25	8.835		
14,600.00	7,935.91	14,254.90	7,754.97	182.72	182.06	-86.71	-1,157.44	-6,903.71	3,156.33	2,793.79	362.54	8.706		
14,700.00	7,935.91	14,354.90	7,754.97	185.35	184.71	-86.71	-1,157.00	-7,003.71	3,156.34	2,788.50	367.84	8.581		
14,800.00	7,935.91	14,454.90	7,754.97	187.98	187.37	-86.71	-1,156.57	-7,103.71	3,156.34	2,783.20	373.14	8.459		
14,900.00	7,935.91	14,554.90	7,754.97	190.62	190.02	-86.71	-1,156.13	-7,203.71	3,156.34	2,777.90	378.45	8.340		
15,000.00	7,935.91	14,654.90	7,754.97	193.25	192.68	-86.71	-1,155.69	-7,303.71	3,156.35	2,772.60	383.75	8.225		
15,100.00	7,935.91	14,754.90	7,754.97	195.89	195.34	-86.71	-1,155.26	-7,403.71	3,156.35	2,767.29	389.06	8.113		
15,200.00	7,935.91	14,854.90	7,754.97	198.53	197.99	-86.71	-1,154.82	-7,503.70	3,156.36	2,761.99	394.37	8.004		
15,300.00	7,935.90	14,954.90	7,754.97	201.17	200.65	-86.71	-1,154.38	-7,603.70	3,156.36	2,756.68	399.68	7.897		
15,400.00	7,935.90	15,054.90	7,754.97	203.81	203.31	-86.71	-1,153.95	-7,703.70	3,156.36	2,751.37	404.99	7.794		
15,500.00	7,935.90	15,154.90	7,754.97	206.45	205.97	-86.71	-1,153.51	-7,803.70	3,156.37	2,746.06	410.31	7.693		
15,600.00	7,935.90	15,254.90	7,754.97	209.10	208.64	-86.71	-1,153.07	-7,903.70	3,156.37	2,740.75	415.62	7.594		
15,700.00	7,935.90	15,354.90	7,754.97	211.74	211.30	-86.71	-1,152.64	-8,003.70	3,156.37	2,735.44	420.94	7.498		
15,800.00	7,935.90	15,454.90	7,754.97	214.39	213.96	-86.71	-1,152.20	-8,103.70	3,156.38	2,730.12	426.26	7.405		
15,900.00	7,935.90	15,554.90	7,754.96	217.04	216.62	-86.71	-1,151.76	-8,203.70	3,156.38	2,724.80	431.58	7.314		
16,000.00	7,935.89	15,654.90	7,754.96	219.69	219.29	-86.71	-1,151.33	-8,303.70	3,156.38	2,719.49	436.90	7.225		
16,100.00	7,935.89	15,754.90	7,754.96	222.34	221.95	-86.71	-1,150.89	-8,403.70	3,156.39	2,714.17	442.22	7.138		
16,200.00	7,935.89	15,854.90	7,754.96	224.99	224.62	-86.71	-1,150.45	-8,503.70	3,156.39	2,708.85	447.54	7.053		
16,300.00	7,935.89	15,954.90	7,754.96	227.64	227.29	-86.71	-1,150.02	-8,603.69	3,156.39	2,703.53	452.87	6.970		
16,400.00	7,935.89	16,054.90	7,754.96	230.29	229.95	-86.71	-1,149.58	-8,703.69	3,156.40	2,698.20	458.19	6.889		
16,500.00	7,935.89	16,154.90	7,754.96	232.94	232.62	-86.71	-1,149.14	-8,803.69	3,156.40	2,692.88	463.52	6.810		
16,600.00	7,935.89	16,254.90	7,754.96	235.60	235.29	-86.71	-1,148.71	-8,903.69	3,156.40	2,687.55	468.85	6.732		
16,700.00	7,935.88	16,354.90	7,754.96	238.25	237.96	-86.71	-1,148.27	-9,003.69	3,156.41	2,682.23	474.18	6.657		
16,800.00	7,935.88	16,454.90	7,754.96	240.91	240.63	-86.71	-1,147.83	-9,103.69	3,156.41	2,676.90	479.51	6.583		
16,900.00	7,935.88	16,554.90	7,754.96	243.56	243.30	-86.71	-1,147.40	-9,203.69	3,156.41	2,671.57	484.84	6.510		
17,000.00	7,935.88	16,654.90	7,754.96	246.22	245.97	-86.71	-1,146.96	-9,303.69	3,156.42	2,666.25	490.17	6.439		
17,100.00	7,935.88	16,754.90	7,754.96	248.88	248.64	-86.71	-1,146.52	-9,403.69	3,156.42	2,660.92	495.51	6.370		
17,200.00	7,935.88	16,854.90	7,754.96	251.54	251.31	-86.71	-1,146.09	-9,503.69	3,156.43	2,655.58	500.84	6.302		
17,300.00	7,935.88	16,954.90	7,754.96	254.20	253.99	-86.71	-1,145.65	-9,603.68	3,156.43	2,650.25	506.18	6.236		
17,400.00	7,935.87	17,054.90	7,754.96	256.86	256.66	-86.71	-1,145.21	-9,703.68	3,156.43	2,644.92	511.51	6.171		
17,500.00	7,935.87	17,154.90	7,754.96	259.52	259.33	-86.71	-1,144.78	-9,803.68	3,156.44	2,639.59	516.85	6.107		
17,600.00	7,935.87	17,254.90	7,754.96	262.18	262.00	-86.71	-1,144.34	-9,903.68	3,156.44	2,634.25	522.18	6.045		
17,700.00	7,935.87	17,354.90	7,754.96	264.84	264.68	-86.71	-1,143.90	-10,003.68	3,156.44	2,628.92	527.52	5.984		
17,800.00	7,935.87	17,454.90	7,754.96	267.50	267.35	-86.71	-1,143.47	-10,103.68	3,156.45	2,623.58	532.86	5.924		
17,900.00	7,935.87	17,554.90	7,754.96	270.17	270.03	-86.71	-1,143.03	-10,203.68	3,156.45	2,618.25	538.20	5.865		
18,000.00	7,935.87	17,654.90	7,754.95	272.83	272.70	-86.71	-1,142.59	-10,303.68	3,156.45	2,612.91	543.54	5.807		
18,100.00	7,935.86	17,754.90	7,754.95	275.49	275.38	-86.71	-1,142.16	-10,403.68	3,156.46	2,607.58	548.88	5.751		
18,200.00	7,935.86	17,855.00	7,754.98	278.16	278.06	-86.71	-1,141.72	-10,503.78	3,156.46	2,602.23	554.23	5.695		
18,239.19	7,935.86	17,894.19	7,755.00	279.20	279.10	-86.72	-1,141.55	-10,542.97	3,156.46	2,600.14	556.32	5.674		
18,239.20	7,936.00	17,894.20	7,755.00	279.20	279.10	-86.71	-1,141.55	-10,542.97	3,156.12	2,599.81	556.32	5.673 SF		

Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to KB 25' @ 5610.00usft
 Offset Depths are relative to Offset Datum
 Central Meridian is 105° 30' 0.000 W

Coordinates are relative to: JAMASO 4-65 5-6-1
 Coordinate System is US State Plane 1983, Colorado Northern Zone
 Grid Convergence at Surface is: 0.53°



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

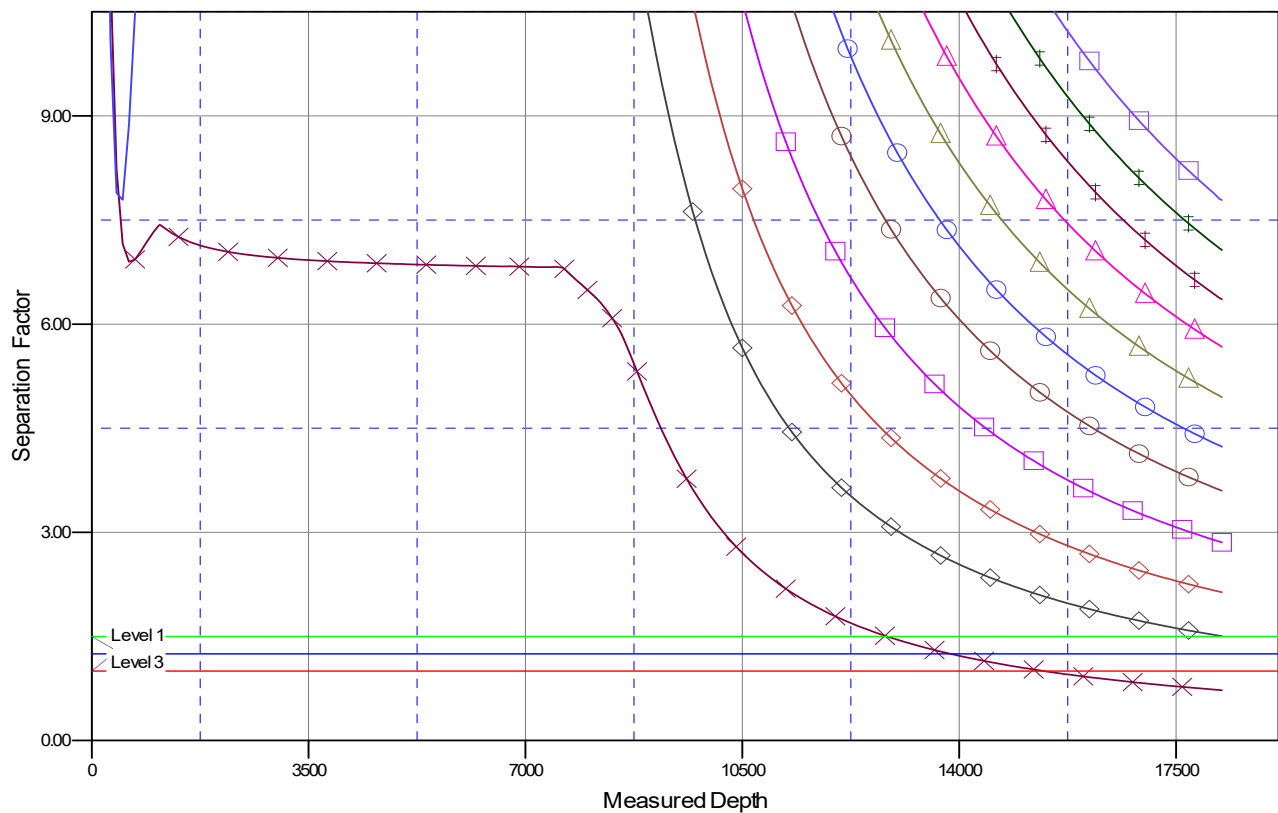
Anticollision Report

Company:	AXIS EXPLORATION	Local Co-ordinate Reference:	Well JAMASO 4-65 5-6-1
Project:	ARAPAHOE COUNTY	TVD Reference:	KB 25' @ 5610.00usft
Reference Site:	Sec 4-T4S-R65W	MD Reference:	KB 25' @ 5610.00usft
Site Error:	0.00 usft	North Reference:	True
Reference Well:	JAMASO 4-65 5-6-1	Survey Calculation Method:	Minimum Curvature
Well Error:	0.00 usft	Output errors are at	2.00 sigma
Reference Wellbore	ORIGINAL WELLBORE	Database:	EDT_32Bit_ODBC
Reference Design:	PROPOSAL 1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to KB 25' @ 5610.00usft
 Offset Depths are relative to Offset Datum
 Central Meridian is 105° 30' 0.000 W

Coordinates are relative to: JAMASO 4-65 5-6-1
 Coordinate System is US State Plane 1983, Colorado Northern Zone
 Grid Convergence at Surface is: 0.53°

Separation Factor Plot



LEGEND

JAMASO 4-65 5-6-12, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-8, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-9, ORIGINAL WELLBORE, PROPOSAL 1 V0
JAMASO 4-65 5-6-3, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-10, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-7, ORIGINAL WELLBORE, PROPOSAL 1 V0
JAMASO 4-65 5-6-6, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-2, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-11, ORIGINAL WELLBORE, PROPOSAL 1 V0
JAMASO 4-65 5-6-4, ORIGINAL WELLBORE, PROPOSAL 1 V0	JAMASO 4-65 5-6-5, ORIGINAL WELLBORE, PROPOSAL 1 V0	EXIST CO-PROPERTY RESERVE 4-65 3-4 11 Wellbore #1, Wellbore #1 V0