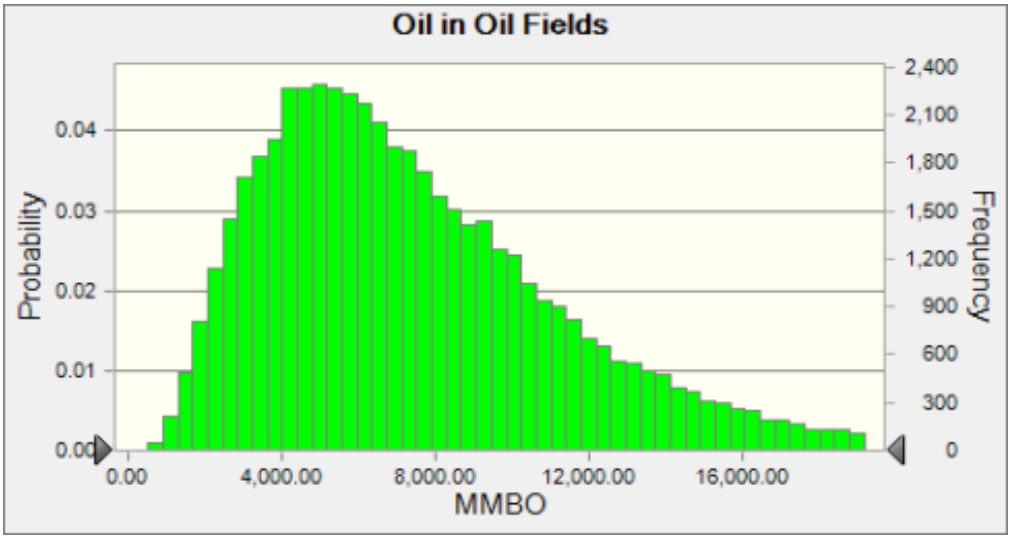
20640103
Offshore Salt Structures
Monte Carlo Results

Forecast: Oil in Oil Fields

Summary:
Entire range is from 142.80 to 40,232.73
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 18.58



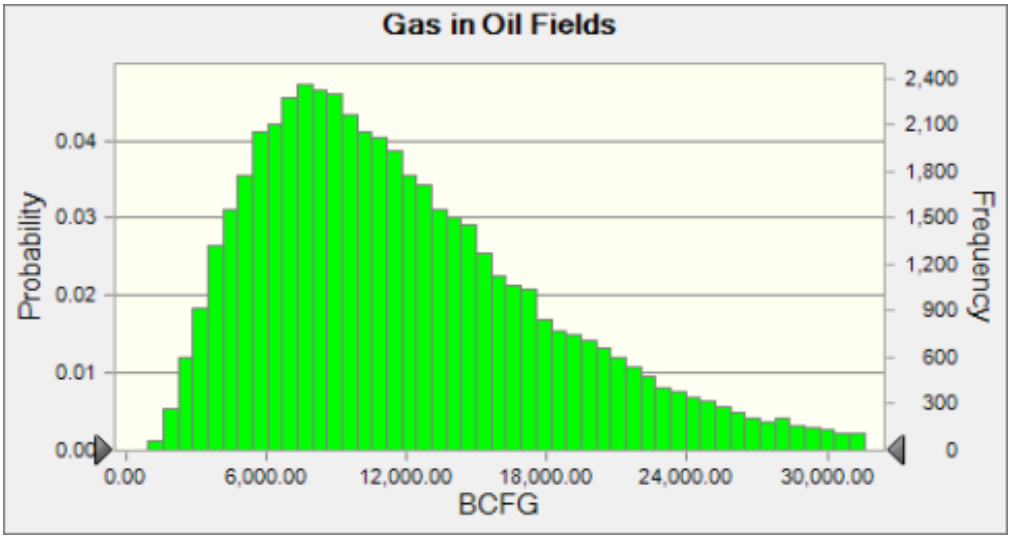
Statistics:	Forecast values
Trials	50,000
Mean	7,556.65
Median	6,715.06
Mode	---
Standard Deviation	4,154.17
Variance	17,257,137.41
Skewness	1.22
Kurtosis	5.30
Coefficient of Variability	0.5497
Minimum	142.80
Maximum	40,232.73
Range Width	40,089.93
Mean Standard Error	18.58

Forecast: Oil in Oil Fields (continued)

Percentiles:	MMBO
100%	142.80
95%	2,416.10
90%	3,066.22
85%	3,602.16
80%	4,090.25
75%	4,519.21
70%	4,952.97
65%	5,369.25
60%	5,803.79
55%	6,241.48
50%	6,714.97
45%	7,221.92
40%	7,751.66
35%	8,355.20
30%	9,020.79
25%	9,732.61
20%	10,561.78
15%	11,640.40
10%	13,150.11
5%	15,496.44
0%	40,232.73

Forecast: Gas in Oil Fields

Summary:
Entire range is from 255.55 to 69,252.36
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 30.97



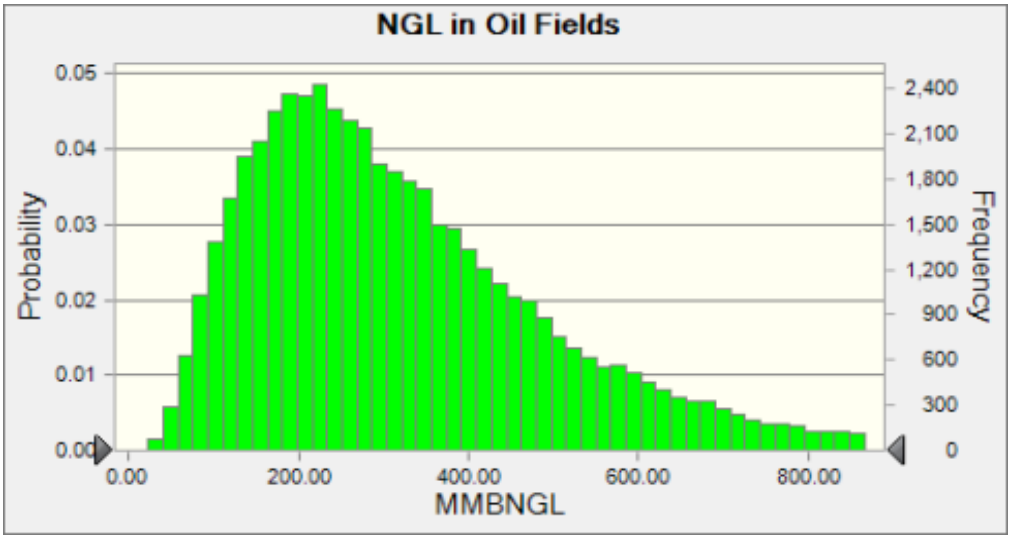
Statistics:	Forecast values
Trials	50,000
Mean	12,198.29
Median	10,758.80
Mode	---
Standard Deviation	6,925.06
Variance	47,956,436.84
Skewness	1.30
Kurtosis	5.59
Coefficient of Variability	0.5677
Minimum	255.55
Maximum	69,252.36
Range Width	68,996.82
Mean Standard Error	30.97

Forecast: Gas in Oil Fields (continued)

Percentiles:	BCFG
100%	255.55
95%	3,794.27
90%	4,838.94
85%	5,687.60
80%	6,443.27
75%	7,163.02
70%	7,851.85
65%	8,530.40
60%	9,227.44
55%	9,979.52
50%	10,758.52
45%	11,574.79
40%	12,449.04
35%	13,413.09
30%	14,482.89
25%	15,675.62
20%	17,142.69
15%	19,035.29
10%	21,433.42
5%	25,476.05
0%	69,252.36

Forecast: NGL in Oil Fields

Summary:
Entire range is from 5.24 to 1,928.45
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 0.86



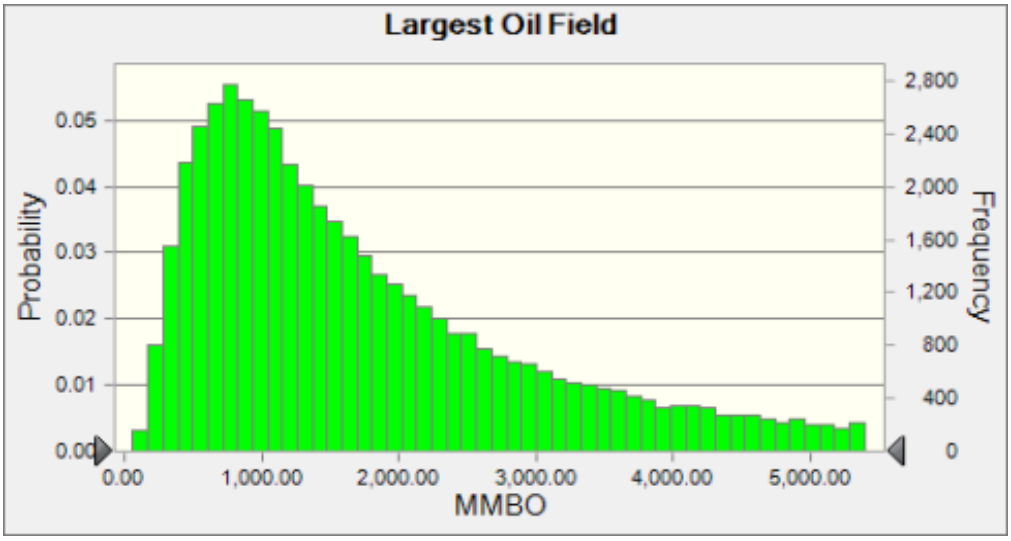
Statistics:	Forecast values
Trials	50,000
Mean	328.05
Median	285.71
Mode	---
Standard Deviation	192.06
Variance	36,887.50
Skewness	1.40
Kurtosis	6.05
Coefficient of Variability	0.5855
Minimum	5.24
Maximum	1,928.45
Range Width	1,923.21
Mean Standard Error	0.86

Forecast: NGL in Oil Fields (continued)

Percentiles:	MMBNGL
100%	5.24
95%	99.55
90%	127.54
85%	150.02
80%	170.87
75%	189.54
70%	208.15
65%	226.67
60%	245.16
55%	265.04
50%	285.70
45%	308.76
40%	333.18
35%	358.34
30%	387.88
25%	421.35
20%	462.18
15%	511.95
10%	584.30
5%	697.36
0%	1,928.45

Forecast: Largest Oil Field

Summary:
Entire range is from 61.72 to 5,999.47
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 5.75



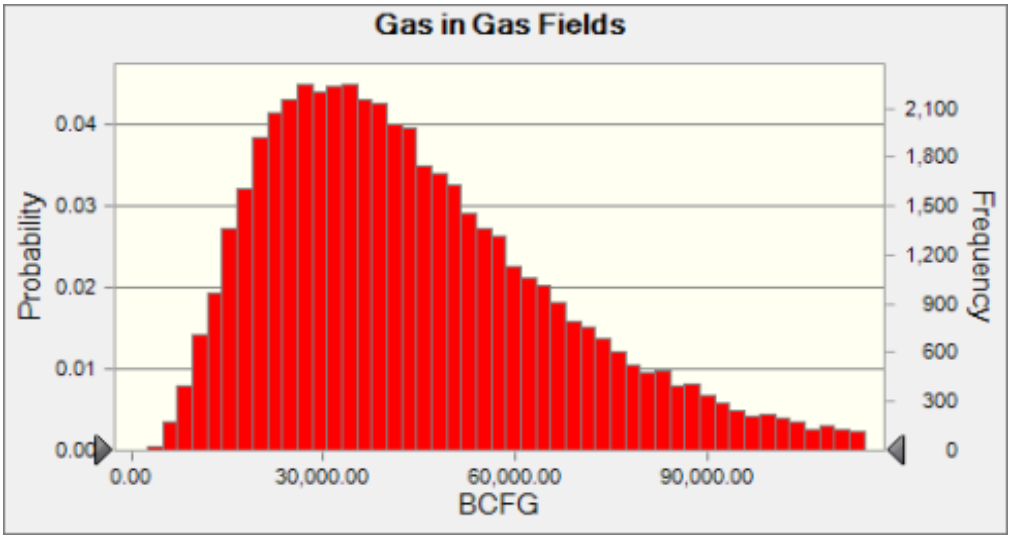
Statistics:	Forecast values
Trials	50,000
Mean	1,788.37
Median	1,400.85
Mode	---
Standard Deviation	1,286.37
Variance	1,654,735.66
Skewness	1.19
Kurtosis	3.81
Coefficient of Variability	0.7193
Minimum	61.72
Maximum	5,999.47
Range Width	5,937.75
Mean Standard Error	5.75

Forecast: Largest Oil Field (continued)

Percentiles:	MMBO
100%	61.72
95%	387.17
90%	510.92
85%	620.09
80%	722.68
75%	821.20
70%	921.59
65%	1,028.82
60%	1,138.57
55%	1,263.83
50%	1,400.76
45%	1,552.31
40%	1,720.05
35%	1,917.00
30%	2,140.89
25%	2,411.29
20%	2,747.76
15%	3,175.65
10%	3,742.03
5%	4,584.81
0%	5,999.47

Forecast: Gas in Gas Fields

Summary:
Entire range is from 267.73 to 224,326.99
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 110.53



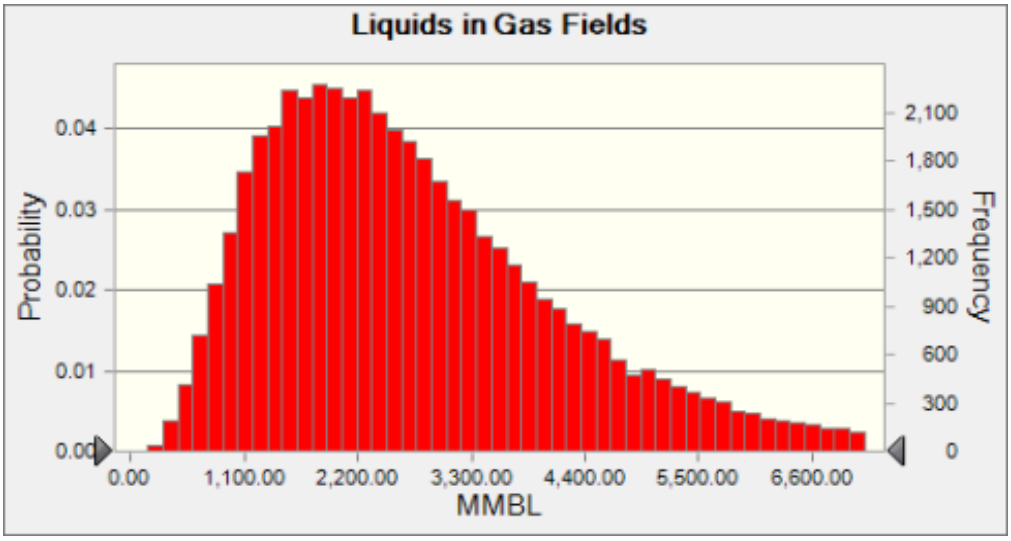
Statistics:	Forecast values
Trials	50,000
Mean	45,208.19
Median	40,352.19
Mode	---
Standard Deviation	24,714.74
Variance	610,818,155.36
Skewness	1.20
Kurtosis	5.09
Coefficient of Variability	0.5467
Minimum	267.73
Maximum	224,326.99
Range Width	224,059.26
Mean Standard Error	110.53

Forecast: Gas in Gas Fields (continued)

Percentiles:	BCFG
100%	267.73
95%	14,680.79
90%	18,562.98
85%	21,648.05
80%	24,410.31
75%	27,043.87
70%	29,673.25
65%	32,288.51
60%	34,869.68
55%	37,574.17
50%	40,351.11
45%	43,295.92
40%	46,472.86
35%	49,859.86
30%	53,695.00
25%	57,980.25
20%	63,240.75
15%	69,602.16
10%	78,356.76
5%	92,347.49
0%	224,326.99

Forecast: Liquids in Gas Fields

Summary:
Entire range is from 17.84 to 13,814.85
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 6.89



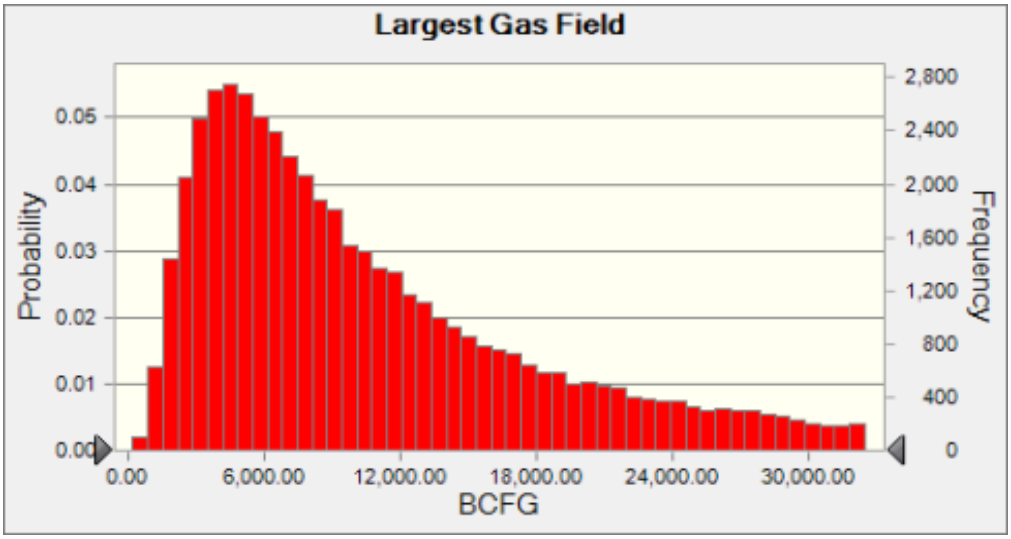
Statistics:	Forecast values
Trials	50,000
Mean	2,790.78
Median	2,482.26
Mode	---
Standard Deviation	1,540.62
Variance	2,373,506.85
Skewness	1.22
Kurtosis	5.15
Coefficient of Variability	0.5520
Minimum	17.84
Maximum	13,814.85
Range Width	13,797.01
Mean Standard Error	6.89

Forecast: Liquids in Gas Fields (continued)

Percentiles:	MMBL
100%	17.84
95%	896.44
90%	1,136.55
85%	1,324.66
80%	1,500.04
75%	1,661.25
70%	1,823.77
65%	1,984.40
60%	2,147.24
55%	2,311.03
50%	2,482.23
45%	2,665.27
40%	2,858.27
35%	3,072.41
30%	3,305.33
25%	3,581.01
20%	3,902.71
15%	4,304.81
10%	4,861.19
5%	5,759.10
0%	13,814.85

Forecast: Largest Gas Field

Summary:
Entire range is from 232.92 to 35,990.61
Filter range is from 0.00 to Infinity
After 50,000 trials, the standard error of the mean is 34.59



Statistics:	Forecast values
Trials	50,000
Mean	10,777.82
Median	8,462.98
Mode	---
Standard Deviation	7,735.56
Variance	59,838,861.58
Skewness	1.16
Kurtosis	3.73
Coefficient of Variability	0.7177
Minimum	232.92
Maximum	35,990.61
Range Width	35,757.68
Mean Standard Error	34.59

Forecast: Largest Gas Field (continued)

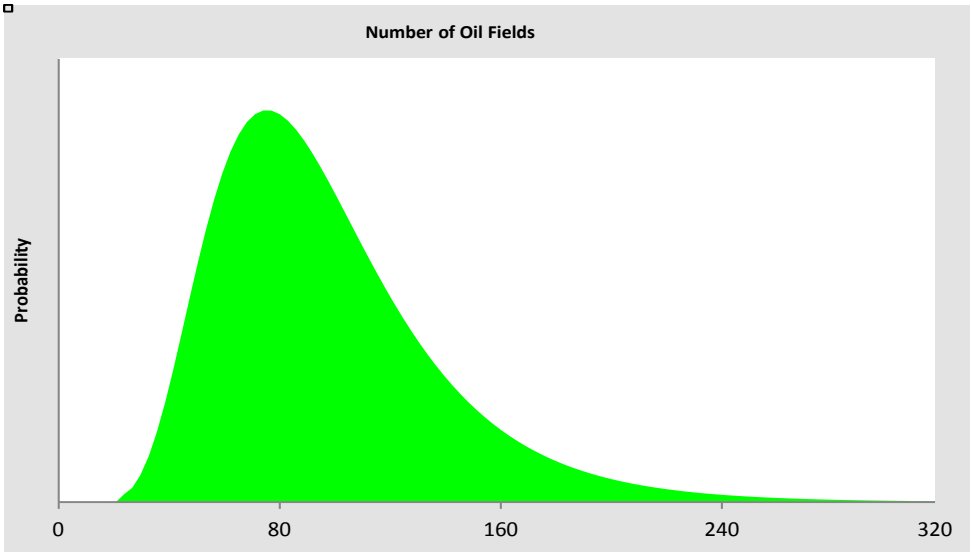
Percentiles:	BCFG
100%	232.92
95%	2,326.38
90%	3,085.41
85%	3,713.70
80%	4,314.78
75%	4,916.76
70%	5,527.75
65%	6,189.91
60%	6,886.54
55%	7,632.77
50%	8,462.80
45%	9,354.78
40%	10,405.77
35%	11,593.31
30%	12,937.74
25%	14,575.76
20%	16,612.65
15%	19,181.05
10%	22,628.33
5%	27,528.28
0%	35,990.61

End of Forecasts

Assumptions

Assumption: Number of Oil Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	1
Mean	96.93	97.93
Standard Deviation	41.81	41.81
Selected range is from -Infinity to 319.00		1.00 to 320.00



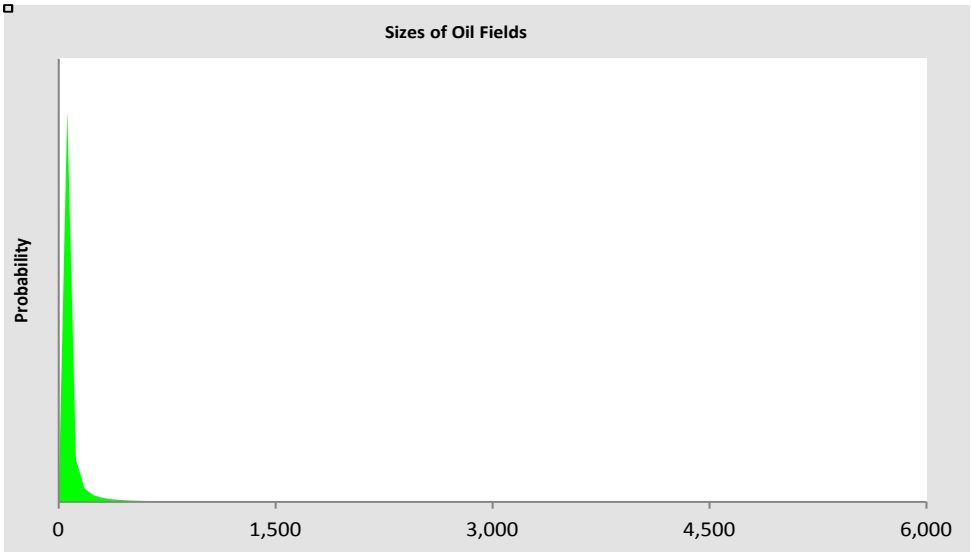
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	97.86	97.66
Median	89.91	89.95
Mode	---	---
Standard Deviation	41.38	40.98
Variance	1,712.36	1,679.15
Skewness	1.20	1.19
Kurtosis	5.06	5.08
Coefficient of Variability	0.4229	0.4196
Minimum	15.92	1.00
Maximum	319.22	320.00
Range Width	303.30	319.00
Mean Standard Error	0.19	---

Assumption: Number of Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	15.92	1.00
95%	45.94	46.10
90%	53.18	53.40
85%	59.00	58.99
80%	63.70	63.84
75%	68.22	68.33
70%	72.57	72.64
65%	76.87	76.87
60%	81.08	81.12
55%	85.44	85.46
50%	89.91	89.95
45%	94.73	94.69
40%	99.90	99.76
35%	105.44	105.28
30%	111.71	111.44
25%	118.77	118.48
20%	127.29	126.86
15%	137.92	137.36
10%	152.60	151.80
5%	177.09	175.93
0%	319.22	320.00

Assumption: Sizes of Oil Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	5
Mean	85.19	90.19
Standard Deviation	720.74	720.74
Selected range is from -Infinity to 5,995.00		5.00 to 6,000.00



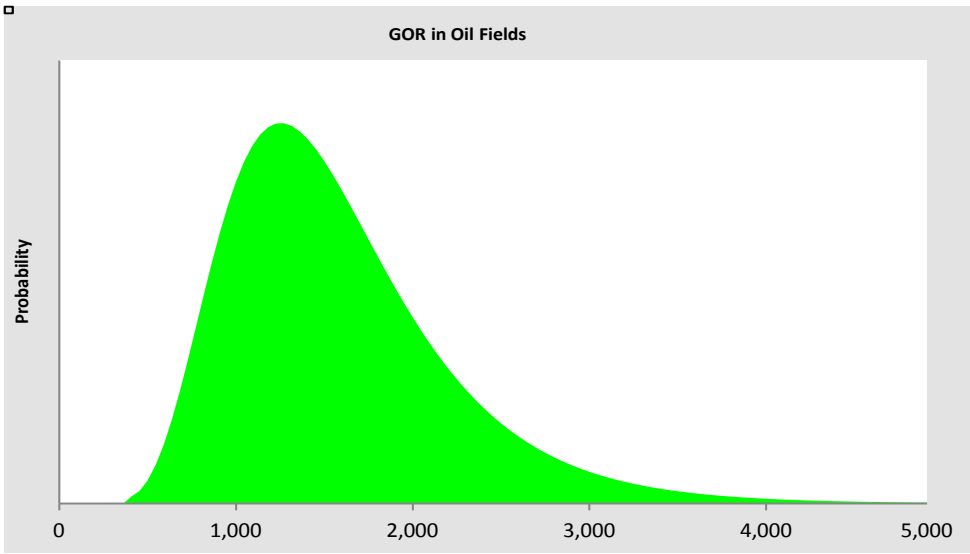
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	78.72	80.23
Median	15.07	14.97
Mode	---	---
Standard Deviation	271.06	268.02
Variance	73,473.84	71,835.26
Skewness	9.91	10.24
Kurtosis	136.79	144.99
Coefficient of Variability	3.44	3.34
Minimum	5.00	5.00
Maximum	5,887.37	6,000.00
Range Width	5,882.37	5,995.00
Mean Standard Error	1.21	---

Assumption: Sizes of Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	5.00	5.00
95%	5.34	5.33
90%	5.74	5.70
85%	6.20	6.17
80%	6.79	6.75
75%	7.50	7.47
70%	8.42	8.37
65%	9.55	9.50
60%	11.03	10.91
55%	12.81	12.69
50%	15.07	14.97
45%	18.18	17.93
40%	22.08	21.84
35%	27.39	27.12
30%	34.91	34.49
25%	45.63	45.20
20%	62.24	61.76
15%	91.67	89.81
10%	147.54	145.43
5%	307.24	300.42
0%	5,887.37	6,000.00

Assumption: GOR in Oil Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	30
Mean	1,588.78	1,618.78
Standard Deviation	651.48	651.48
Selected range is from -Infinity to 4,970.00		30.00 to 5,000.00



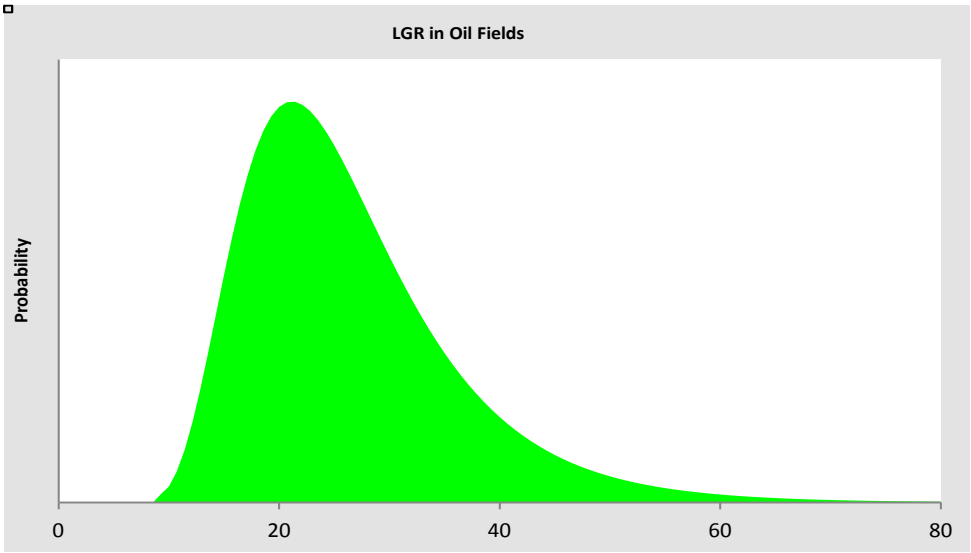
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	1,614.08	1,614.79
Median	1,499.49	1,499.27
Mode	---	---
Standard Deviation	639.61	639.19
Variance	409,099.56	408,558.03
Skewness	1.14	1.13
Kurtosis	4.91	4.86
Coefficient of Variability	0.3963	0.3958
Minimum	331.78	30.00
Maximum	4,991.45	5,000.00
Range Width	4,659.67	4,970.00
Mean Standard Error	2.86	---

Assumption: GOR in Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	331.78	30.00
95%	793.39	798.46
90%	916.46	916.76
85%	1,007.82	1,006.70
80%	1,086.39	1,084.63
75%	1,157.60	1,156.43
70%	1,225.15	1,225.05
65%	1,293.02	1,292.36
60%	1,358.96	1,359.73
55%	1,427.92	1,428.32
50%	1,499.47	1,499.27
45%	1,572.19	1,573.81
40%	1,650.82	1,653.40
35%	1,737.12	1,739.97
30%	1,834.47	1,836.16
25%	1,944.98	1,945.99
20%	2,072.85	2,076.08
15%	2,237.99	2,238.73
10%	2,458.81	2,461.40
5%	2,828.39	2,831.34
0%	4,991.45	5,000.00

Assumption: LGR in Oil Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	5
Mean	21.92	26.92
Standard Deviation	9.82	9.82
Selected range is from -Infinity to 75.00		5.00 to 80.00



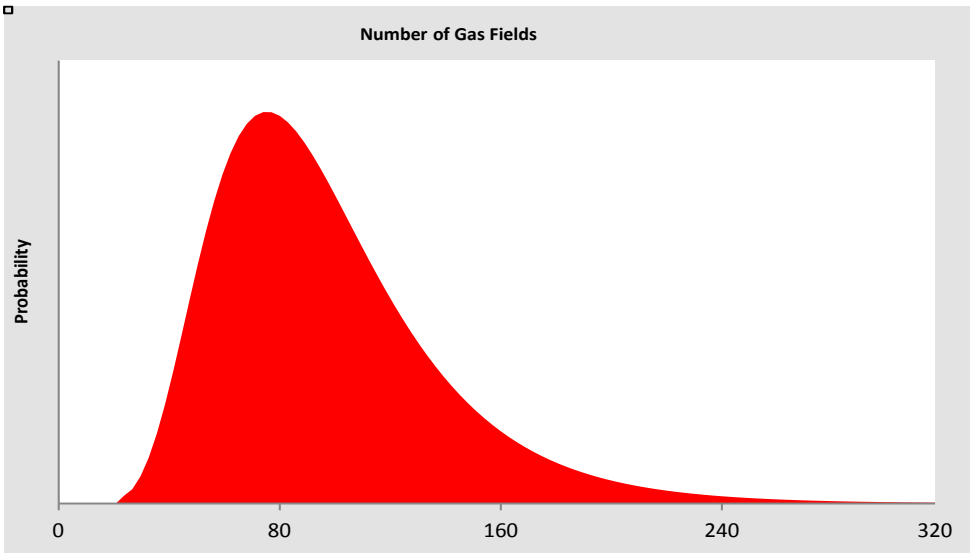
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	26.84	26.85
Median	24.96	24.99
Mode	---	---
Standard Deviation	9.63	9.61
Variance	92.73	92.44
Skewness	1.25	1.24
Kurtosis	5.32	5.25
Coefficient of Variability	0.3588	0.3580
Minimum	7.83	5.00
Maximum	79.92	80.00
Range Width	72.09	75.00
Mean Standard Error	0.04	---

Assumption: LGR in Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	7.83	5.00
95%	14.92	14.89
90%	16.58	16.56
85%	17.80	17.83
80%	18.90	18.95
75%	19.94	19.98
70%	20.96	20.98
65%	21.92	21.95
60%	22.91	22.94
55%	23.89	23.94
50%	24.96	24.99
45%	26.03	26.09
40%	27.22	27.27
35%	28.55	28.57
30%	29.98	30.01
25%	31.66	31.66
20%	33.56	33.63
15%	36.09	36.11
10%	39.57	39.53
5%	45.14	45.26
0%	79.92	80.00

Assumption: Number of Gas Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	1
Mean	96.93	97.93
Standard Deviation	41.81	41.81
Selected range is from -Infinity to 319.00		1.00 to 320.00



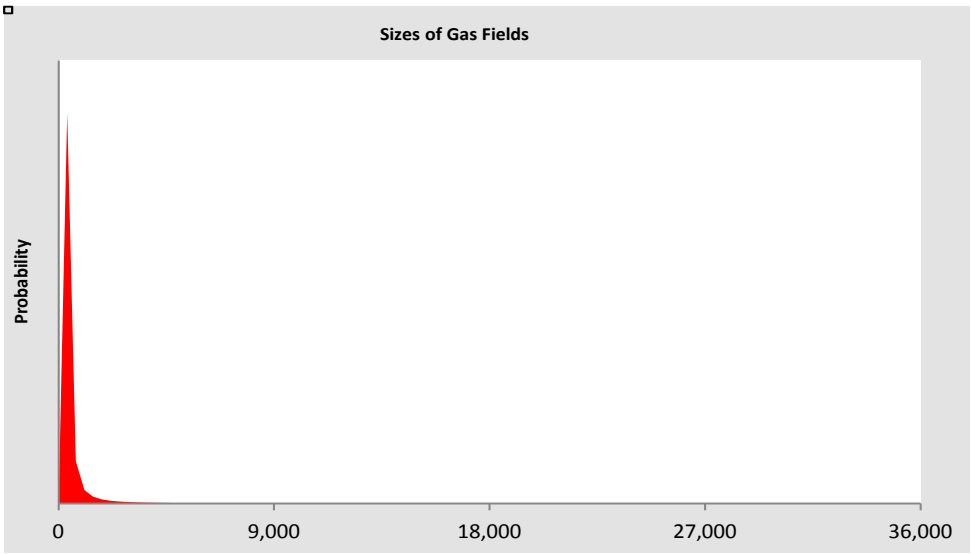
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	97.72	97.66
Median	89.88	89.95
Mode	---	---
Standard Deviation	41.09	40.98
Variance	1,688.79	1,679.15
Skewness	1.20	1.19
Kurtosis	5.06	5.08
Coefficient of Variability	0.4205	0.4196
Minimum	16.79	1.00
Maximum	319.56	320.00
Range Width	302.77	319.00
Mean Standard Error	0.18	---

Assumption: Number of Gas Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	16.79	1.00
95%	46.09	46.10
90%	53.47	53.40
85%	59.05	58.99
80%	63.99	63.84
75%	68.32	68.33
70%	72.66	72.64
65%	76.79	76.87
60%	81.14	81.12
55%	85.42	85.46
50%	89.88	89.95
45%	94.56	94.69
40%	99.71	99.76
35%	105.19	105.28
30%	111.31	111.44
25%	118.49	118.48
20%	126.83	126.86
15%	137.62	137.36
10%	152.28	151.80
5%	176.25	175.93
0%	319.56	320.00

Assumption: Sizes of Gas Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	30
Mean	511.15	541.15
Standard Deviation	4,324.42	4,324.42
Selected range is from -Infinity to 35,970.00		30.00 to 36,000.00



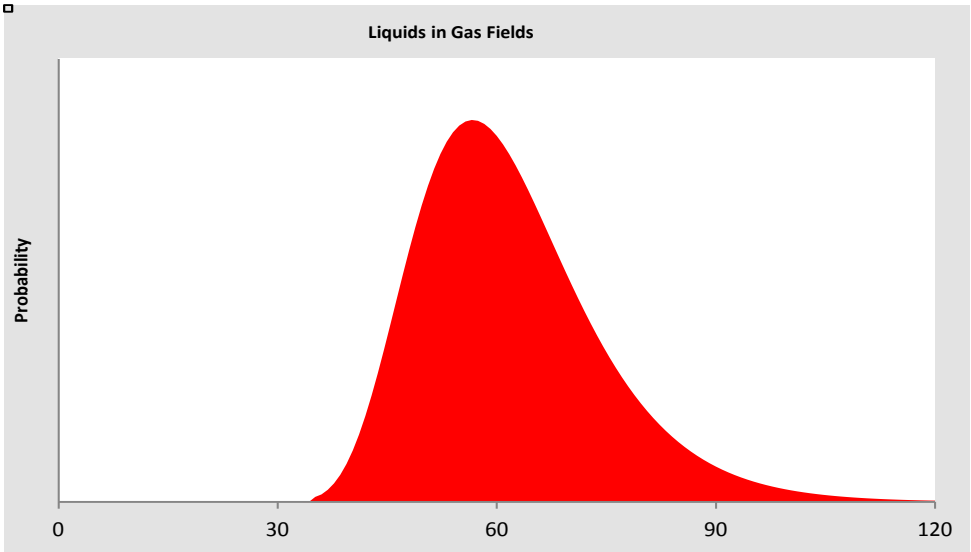
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	471.09	481.37
Median	89.89	89.84
Mode	---	---
Standard Deviation	1,636.56	1,608.13
Variance	2,678,343.49	2,586,069.42
Skewness	10.06	10.24
Kurtosis	140.36	144.99
Coefficient of Variability	3.47	3.34
Minimum	30.01	30.00
Maximum	35,681.11	36,000.00
Range Width	35,651.10	35,970.00
Mean Standard Error	7.32	---

Assumption: Sizes of Gas Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	30.01	30.00
95%	31.96	31.99
90%	34.19	34.22
85%	37.04	37.01
80%	40.63	40.49
75%	45.03	44.83
70%	50.68	50.23
65%	57.42	56.97
60%	65.82	65.44
55%	76.06	76.15
50%	89.89	89.84
45%	107.13	107.60
40%	130.88	131.04
35%	163.99	162.73
30%	208.57	206.91
25%	273.10	271.20
20%	373.13	370.54
15%	544.82	538.85
10%	887.72	872.59
5%	1,847.34	1,802.50
0%	35,681.11	36,000.00

Assumption: Liquids in Gas Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	20
Mean	41.80	61.8
Standard Deviation	12.67	12.67
Selected range is from -Infinity to 100.00		20.00 to 120.00



Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean	61.75	61.73
Median	59.98	59.99
Mode	---	---
Standard Deviation	12.56	12.50
Variance	157.72	156.16
Skewness	0.8341	0.8303
Kurtosis	3.96	3.95
Coefficient of Variability	0.2034	0.2024
Minimum	31.79	20.00
Maximum	120.00	120.00
Range Width	88.21	100.00
Mean Standard Error	0.06	---

Assumption: Liquids in Gas Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%	31.79	20.00
95%	44.41	44.56
90%	47.30	47.35
85%	49.40	49.41
80%	51.16	51.16
75%	52.76	52.74
70%	54.25	54.23
65%	55.69	55.67
60%	57.08	57.09
55%	58.51	58.52
50%	59.98	59.99
45%	61.52	61.50
40%	63.07	63.10
35%	64.80	64.82
30%	66.67	66.70
25%	68.82	68.82
20%	71.44	71.30
15%	74.42	74.33
10%	78.47	78.40
5%	85.18	84.97
0%	120.00	120.00

End of Assumptions

Simulation started on 9/14/2011 at 9:48 AM
Simulation stopped on 9/14/2011 at 10:06 AM