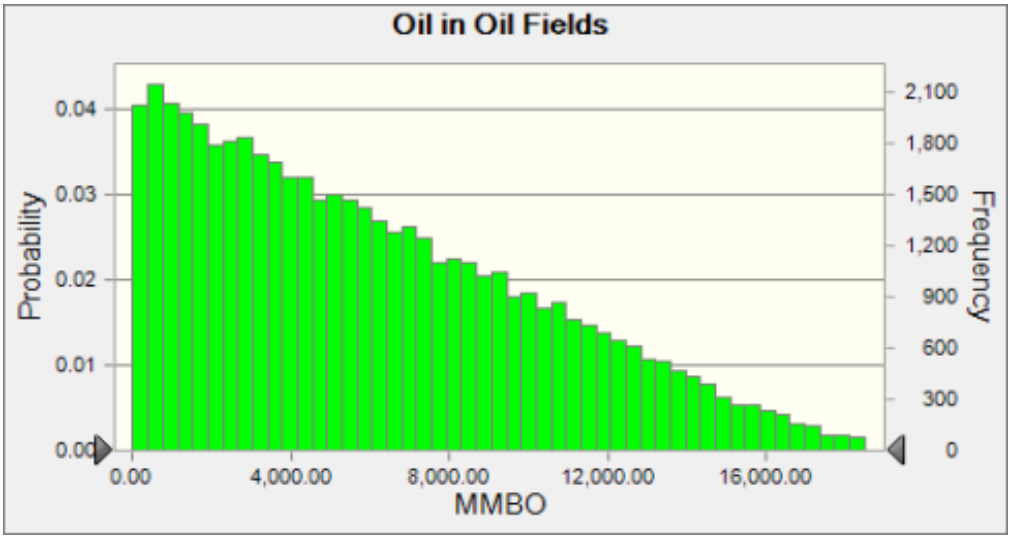
53000105
Miocene-Pliocene Sandstones
Monte Carlo Results

Forecast: Oil in Oil Fields

Summary:
Entire range is from 3.89 to 24,287.19
After 50,000 trials, the standard error of the mean is 19.71



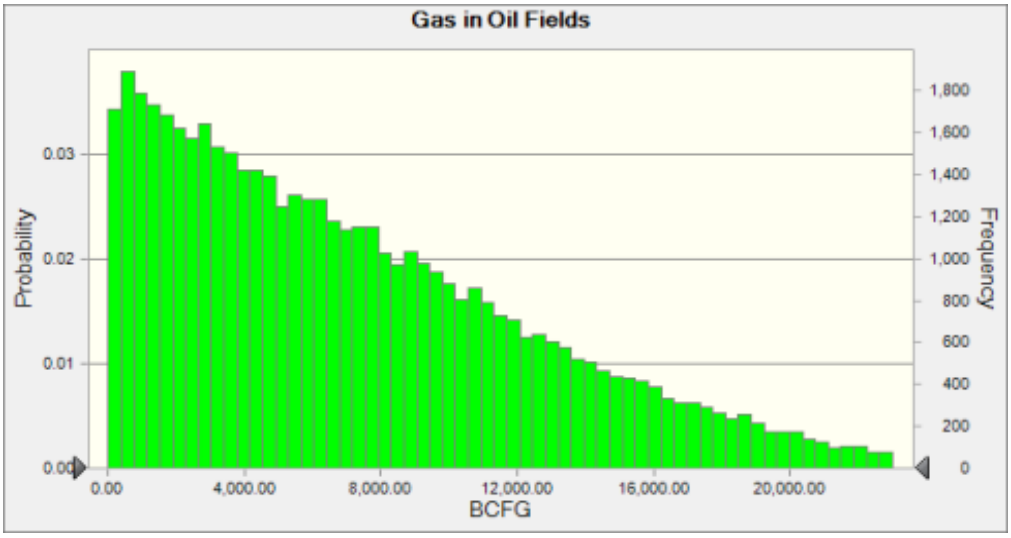
Statistics:	Forecast values
Trials	50,000
Mean	6,065.46
Median	5,247.96
Mode	---
Standard Deviation	4,407.46
Variance	19,425,659.73
Skewness	0.72
Kurtosis	2.86
Coefficient of Variability	0.73
Minimum	3.89
Maximum	24,287.19
Range Width	24,283.30
Mean Standard Error	19.71

Forecast: Oil in Oil Fields (continued)

Percentiles:	MMBO
100%	3.89
95%	476.30
90%	931.92
85%	1,405.47
80%	1,885.45
75%	2,403.61
70%	2,929.40
65%	3,486.47
60%	4,051.63
55%	4,638.21
50%	5,247.96
45%	5,898.33
40%	6,587.30
35%	7,317.16
30%	8,113.40
25%	8,980.17
20%	9,946.56
15%	11,099.94
10%	12,467.62
5%	14,424.65
0%	24,287.19

Forecast: Gas in Oil Fields

Summary:
Entire range is from 3.75 to 36,288.48
After 50,000 trials, the standard error of the mean is 25.03



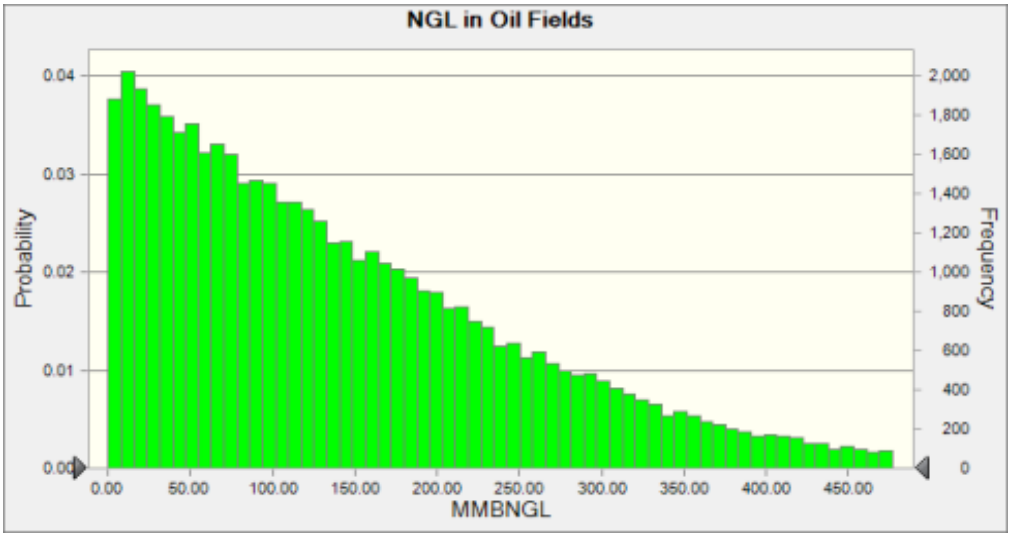
Statistics:	Forecast values
Trials	50,000
Mean	7,275.68
Median	6,096.22
Mode	---
Standard Deviation	5,597.23
Variance	31,329,003.50
Skewness	0.98
Kurtosis	3.71
Coefficient of Variability	0.77
Minimum	3.75
Maximum	36,288.48
Range Width	36,284.74
Mean Standard Error	25.03

Forecast: Gas in Oil Fields (continued)

Percentiles:	BCFG
100%	3.75
95%	554.99
90%	1,080.25
85%	1,612.80
80%	2,172.69
75%	2,755.06
70%	3,360.61
65%	3,995.59
60%	4,661.80
55%	5,358.65
50%	6,096.22
45%	6,878.54
40%	7,695.86
35%	8,560.51
30%	9,521.87
25%	10,598.68
20%	11,808.14
15%	13,302.76
10%	15,223.81
5%	18,115.73
0%	36,288.48

Forecast: NGL in Oil Fields

Summary:
Entire range is from 0.07 to 912.80
After 50,000 trials, the standard error of the mean is 0.53



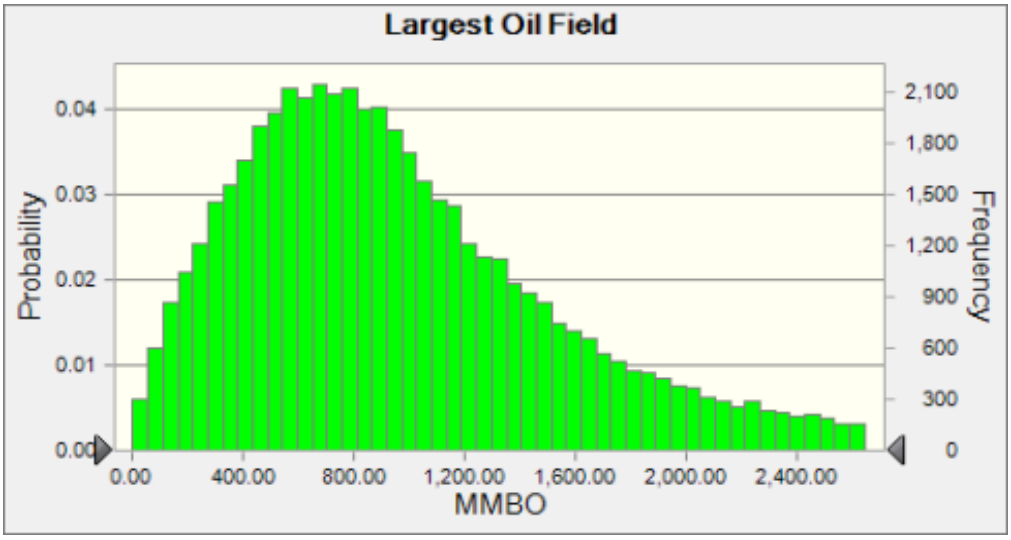
Statistics:	Forecast values
Trials	50,000
Mean	145.30
Median	117.51
Mode	---
Standard Deviation	117.74
Variance	13,862.34
Skewness	1.21
Kurtosis	4.68
Coefficient of Variability	0.81
Minimum	0.07
Maximum	912.80
Range Width	912.73
Mean Standard Error	0.53

Forecast: NGL in Oil Fields (continued)

Percentiles:	MMBNGL
100%	0.07
95%	10.69
90%	20.61
85%	30.89
80%	41.89
75%	52.88
70%	64.35
65%	76.80
60%	89.87
55%	103.35
50%	117.51
45%	133.03
40%	149.82
35%	167.03
30%	186.46
25%	208.72
20%	234.76
15%	267.85
10%	308.84
5%	375.47
0%	912.80

Forecast: Largest Oil Field

Summary:
Entire range is from 3.89 to 2,999.53
After 50,000 trials, the standard error of the mean is 2.66



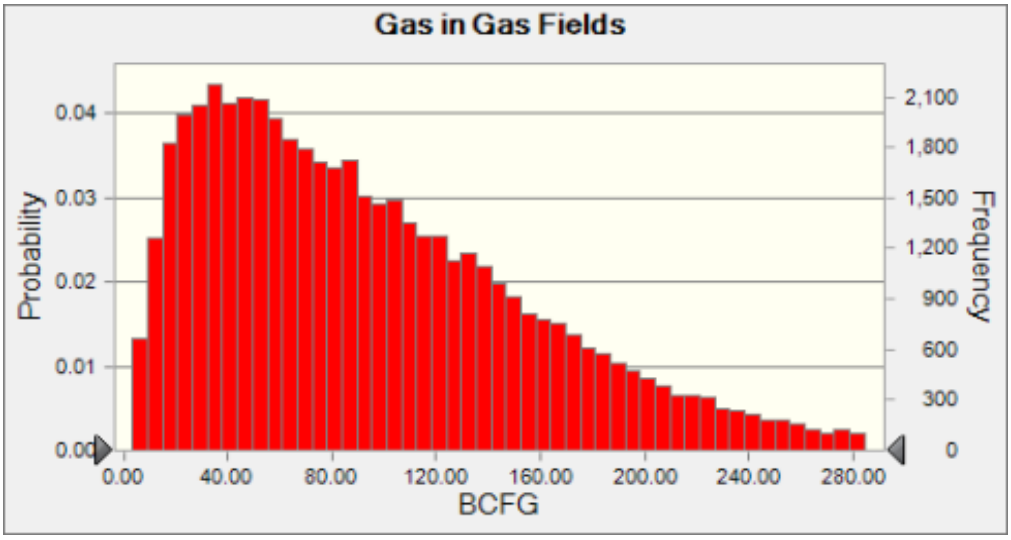
Statistics:	Forecast values
Trials	50,000
Mean	970.35
Median	849.83
Mode	---
Standard Deviation	594.34
Variance	353,236.65
Skewness	0.96
Kurtosis	3.67
Coefficient of Variability	0.61
Minimum	3.89
Maximum	2,999.53
Range Width	2,995.64
Mean Standard Error	2.66

Forecast: Largest Oil Field (continued)

Percentiles:	MMBO
100%	3.89
95%	204.05
90%	312.08
85%	395.92
80%	469.76
75%	536.41
70%	600.68
65%	660.43
60%	722.56
55%	787.14
50%	849.83
45%	921.06
40%	995.04
35%	1,079.29
30%	1,170.91
25%	1,281.64
20%	1,412.97
15%	1,582.50
10%	1,817.90
5%	2,178.88
0%	2,999.53

Forecast: Gas in Gas Fields

Summary:
Entire range is from 3.35 to 525.19
After 50,000 trials, the standard error of the mean is 0.30



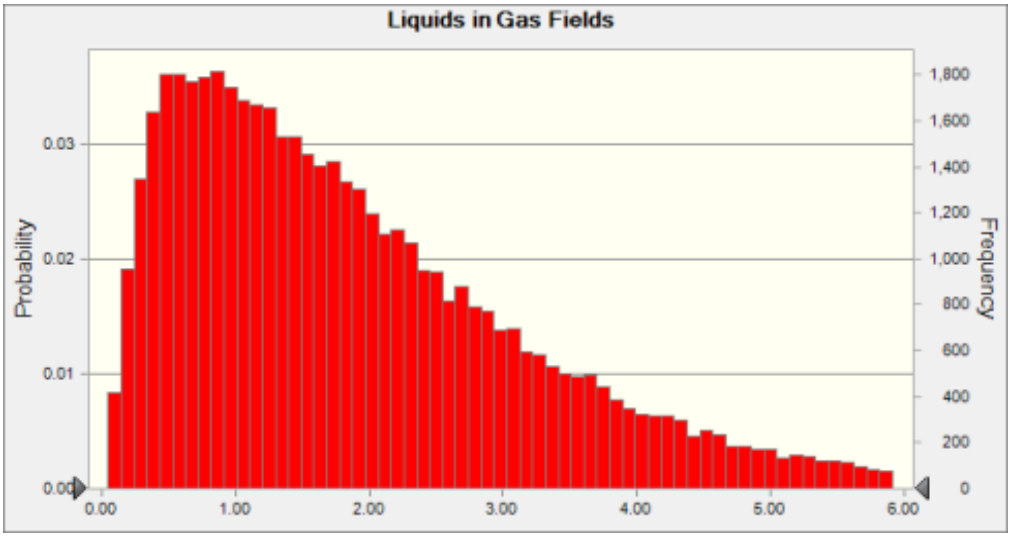
Statistics:	Forecast values
Trials	50,000
Mean	96.36
Median	81.98
Mode	---
Standard Deviation	66.87
Variance	4,471.65
Skewness	1.12
Kurtosis	4.42
Coefficient of Variability	0.69
Minimum	3.35
Maximum	525.19
Range Width	521.84
Mean Standard Error	0.30

Forecast: Gas in Gas Fields (continued)

Percentiles:	BCFG
100%	3.35
95%	16.70
90%	23.89
85%	30.82
80%	37.56
75%	44.32
70%	51.10
65%	58.48
60%	65.77
55%	73.49
50%	81.98
45%	90.51
40%	100.09
35%	110.21
30%	121.51
25%	133.71
20%	148.06
15%	165.75
10%	188.68
5%	224.97
0%	525.19

Forecast: Liquids in Gas Fields

Summary:
Entire range is from 0.05 to 12.26
After 50,000 trials, the standard error of the mean is 0.01



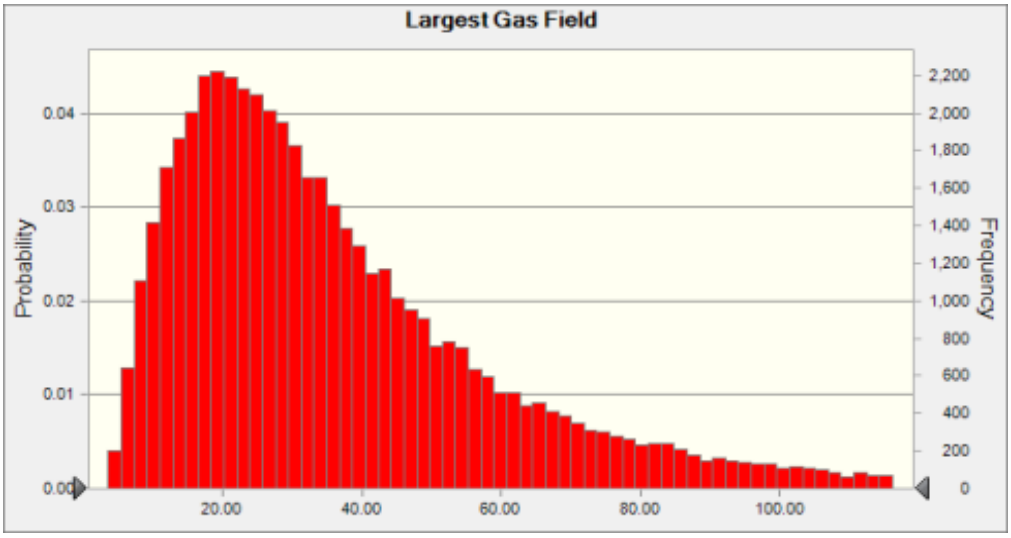
Statistics:	Forecast values
Trials	50,000
Mean	1.93
Median	1.59
Mode	---
Standard Deviation	1.42
Variance	2.01
Skewness	1.35
Kurtosis	5.46
Coefficient of Variability	0.74
Minimum	0.05
Maximum	12.26
Range Width	12.21
Mean Standard Error	0.01

Forecast: Liquids in Gas Fields (continued)

Percentiles:	MMBL
100%	0.05
95%	0.31
90%	0.46
85%	0.59
80%	0.72
75%	0.85
70%	0.99
65%	1.13
60%	1.27
55%	1.42
50%	1.59
45%	1.76
40%	1.95
35%	2.16
30%	2.38
25%	2.64
20%	2.96
15%	3.34
10%	3.85
5%	4.69
0%	12.26

Forecast: Largest Gas Field

Summary:
Entire range is from 3.35 to 199.51
After 50,000 trials, the standard error of the mean is 0.12



Statistics:	Forecast values
Trials	50,000
Mean	38.00
Median	30.31
Mode	---
Standard Deviation	27.85
Variance	775.50
Skewness	1.99
Kurtosis	8.27
Coefficient of Variability	0.73
Minimum	3.35
Maximum	199.51
Range Width	196.16
Mean Standard Error	0.12

Forecast: Largest Gas Field (continued)

Percentiles:	BCFG
100%	3.35
95%	9.84
90%	12.70
85%	15.13
80%	17.30
75%	19.33
70%	21.42
65%	23.55
60%	25.71
55%	27.93
50%	30.31
45%	32.90
40%	35.85
35%	39.19
30%	43.07
25%	47.51
20%	53.35
15%	60.92
10%	72.12
5%	94.18
0%	199.51

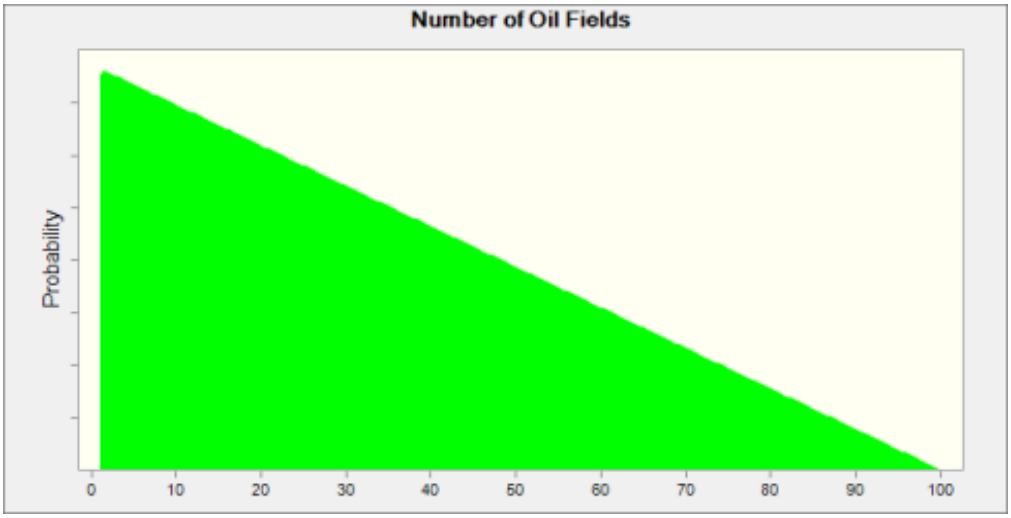
End of Forecasts

Assumptions

Assumption: Number of Oil Fields

Triangular distribution with parameters:

Minimum	1
Median	30
Maximum	100



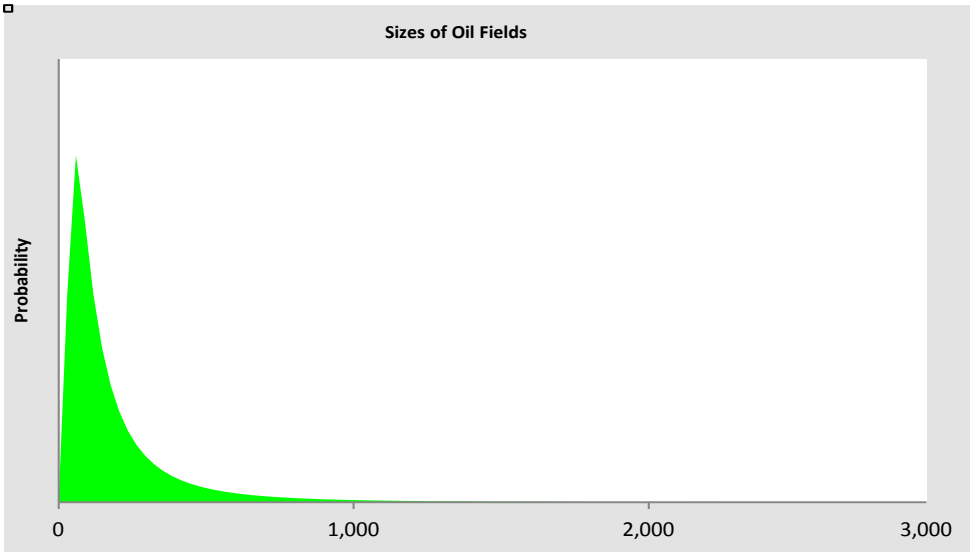
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		34
Median		30
Mode		1
Standard Deviation		23
Variance		544
Skewness		0.5657
Kurtosis		5.40
Coefficient of Variability		0.6862
Minimum		1
Maximum		100
Range Width		99
Mean Standard Error		---

Assumption: Number of Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		1
95%		4
90%		6
85%		9
80%		11
75%		14
70%		17
65%		20
60%		23
55%		27
50%		30
45%		34
40%		37
35%		41
30%		46
25%		51
20%		56
15%		62
10%		69
5%		78
0%		100

Assumption: Sizes of Oil Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	0.5
Mean	182.67	183.17
Standard Deviation	281.23	281.23
Selected range is from -Infinity to 2,999.50		0.50 to 3,000.00



Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		179.06
Median		99.86
Mode		---
Standard Deviation		244.00
Variance		59,537.00
Skewness		4.07
Kurtosis		27.68
Coefficient of Variability		1.36
Minimum		0.50
Maximum		3,000.00
Range Width		2,999.50
Mean Standard Error		---

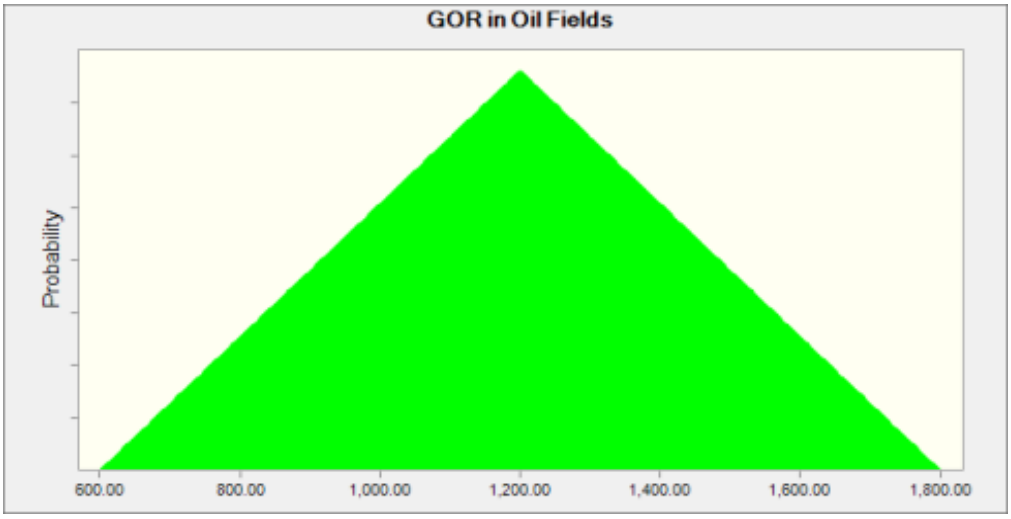
Assumption: Sizes of Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		0.50
95%		16.72
90%		24.71
85%		32.22
80%		39.82
75%		47.77
70%		56.27
65%		65.50
60%		75.67
55%		87.02
50%		99.86
45%		114.61
40%		131.83
35%		152.36
30%		177.47
25%		209.23
20%		251.31
15%		311.12
10%		406.82
5%		604.25
0%		3,000.00

Assumption: GOR in Oil Fields

Triangular distribution with parameters:

Minimum	600.00
Median	1,200.00
Maximum	1,800.00



Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		1,200.00
Median		1,200.00
Mode		1,200.00
Standard Deviation		244.95
Variance		60,000.00
Skewness		0.00
Kurtosis		5.40
Coefficient of Variability		0.2041
Minimum		600.00
Maximum		1,800.00
Range Width		1,200.00
Mean Standard Error		---

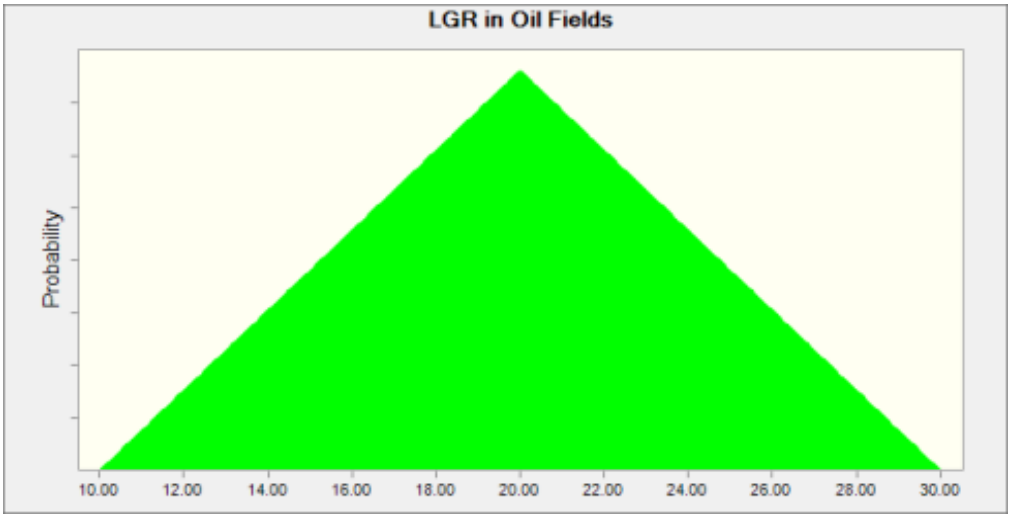
Assumption: GOR in Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		600.00
95%		789.74
90%		868.33
85%		928.63
80%		979.47
75%		1,024.26
70%		1,064.76
65%		1,102.00
60%		1,136.66
55%		1,169.21
50%		1,200.00
45%		1,230.79
40%		1,263.34
35%		1,298.00
30%		1,335.24
25%		1,375.74
20%		1,420.53
15%		1,471.37
10%		1,531.67
5%		1,610.26
0%		1,800.00

Assumption: LGR in Oil Fields

Triangular distribution with parameters:

Minimum	10.00
Median	20.00
Maximum	30.00



Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		20.00
Median		20.00
Mode		20.00
Standard Deviation		4.08
Variance		16.67
Skewness		0.00
Kurtosis		5.40
Coefficient of Variability		0.2041
Minimum		10.00
Maximum		30.00
Range Width		20.00
Mean Standard Error		---

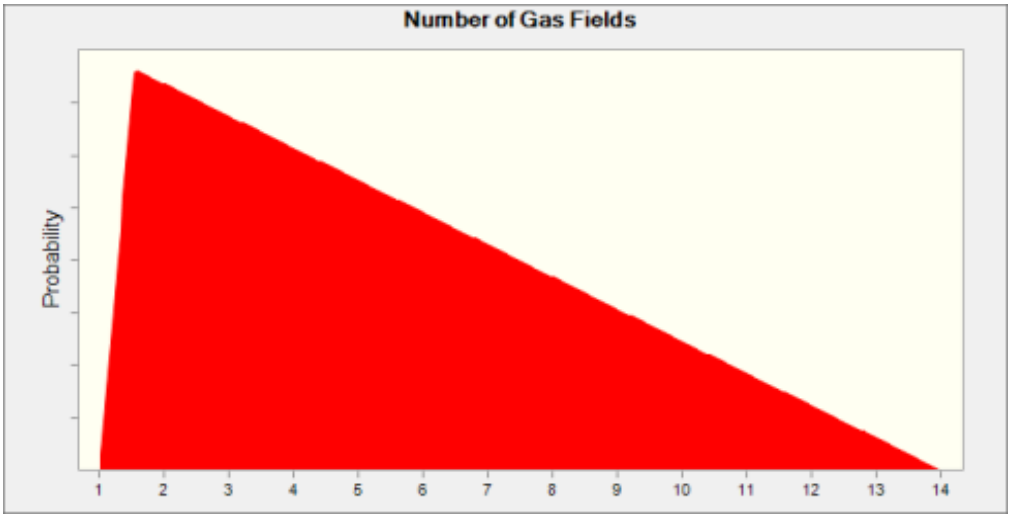
Assumption: LGR in Oil Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		10.00
95%		13.16
90%		14.47
85%		15.48
80%		16.32
75%		17.07
70%		17.75
65%		18.37
60%		18.94
55%		19.49
50%		20.00
45%		20.51
40%		21.06
35%		21.63
30%		22.25
25%		22.93
20%		23.68
15%		24.52
10%		25.53
5%		26.84
0%		30.00

Assumption: Number of Gas Fields

Triangular distribution with parameters:

Minimum	1
Median	5
Maximum	14



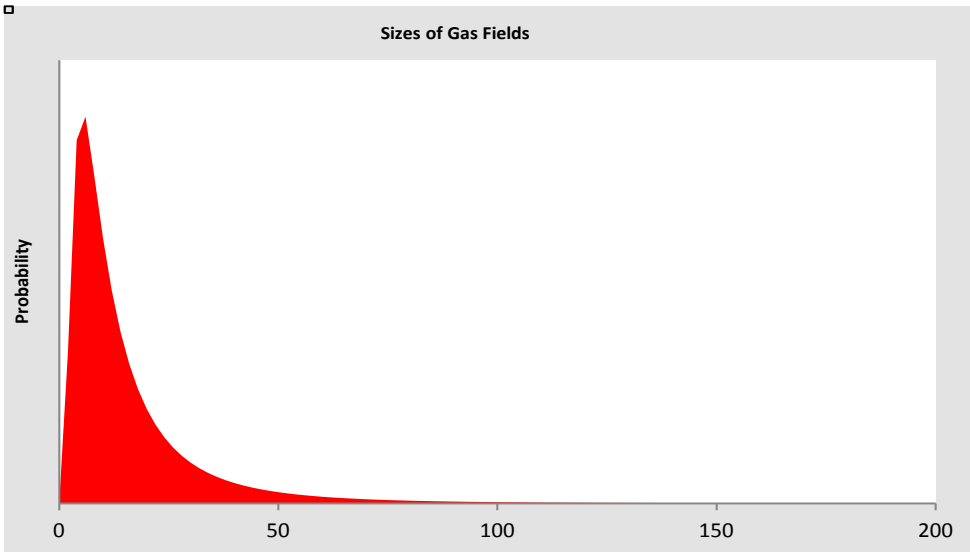
Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		6
Median		5
Mode		2
Standard Deviation		3
Variance		9
Skewness		0.5623
Kurtosis		5.40
Coefficient of Variability		0.5447
Minimum		1
Maximum		14
Range Width		13
Mean Standard Error		---

Assumption: Number of Gas Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		1
95%		2
90%		2
85%		2
80%		3
75%		3
70%		3
65%		4
60%		4
55%		5
50%		5
45%		5
40%		6
35%		6
30%		7
25%		8
20%		8
15%		9
10%		10
5%		11
0%		14

Assumption: Sizes of Gas Fields

Lognormal distribution with parameters:		Shifted parameters
Location	0.00	3
Mean	14.82	17.82
Standard Deviation	19.39	19.39
Selected range is from -Infinity to 197.00		3.00 to 200.00



Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		17.56
Median		11.99
Mode		---
Standard Deviation		17.38
Variance		302.13
Skewness		3.54
Kurtosis		21.81
Coefficient of Variability		0.99
Minimum		3.00
Maximum		200.00
Range Width		197.00
Mean Standard Error		---

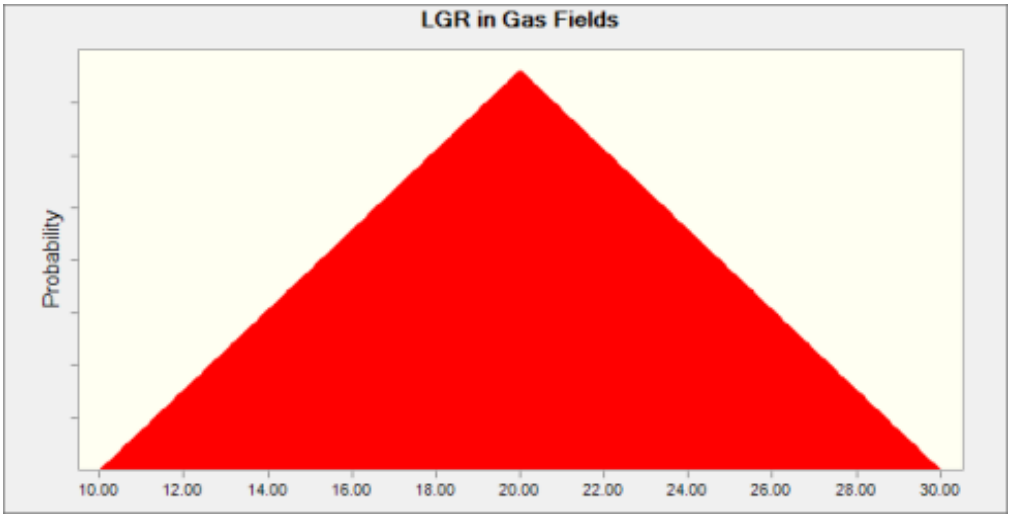
Assumption: Sizes of Gas Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		3.00
95%		4.74
90%		5.50
85%		6.19
80%		6.88
75%		7.59
70%		8.33
65%		9.12
60%		9.98
55%		10.93
50%		11.99
45%		13.19
40%		14.57
35%		16.20
30%		18.16
25%		20.61
20%		23.80
15%		28.25
10%		35.20
5%		49.10
0%		200.00

Assumption: LGR in Gas Fields

Triangular distribution with parameters:

Minimum	10.00
Median	20.00
Maximum	30.00



Statistics:	Simulated values	Theoretical values
Trials	50,000	---
Mean		20.00
Median		20.00
Mode		20.00
Standard Deviation		4.08
Variance		16.67
Skewness		0.00
Kurtosis		5.40
Coefficient of Variability		0.2041
Minimum		10.00
Maximum		30.00
Range Width		20.00
Mean Standard Error		---

Assumption: LGR in Gas Fields (continued)

Percentiles:	Simulated values	Theoretical values
100%		10.00
95%		13.16
90%		14.47
85%		15.48
80%		16.32
75%		17.07
70%		17.75
65%		18.37
60%		18.94
55%		19.49
50%		20.00
45%		20.51
40%		21.06
35%		21.63
30%		22.25
25%		22.93
20%		23.68
15%		24.52
10%		25.53
5%		26.84
0%		30.00

End of Assumptions

Simulation started on 9/9/03 at 11:49:14
Simulation stopped on 9/9/03 at 12:21:41