Onshore Grab Sample

Sample: DU-13-SS
Sample Taken By: J. Ladner
Sample Collected On: 12/4/02
Splits? N/A

County: Duval
Latitude: 30° 28' 39.6"
Longitude: 81° 24' 42.1"
Datum: WGS 84
Surf. Elev: N/A
Datum: N/A

Fine Data Summary

Total Sample Weight	77.02	grams
Total Fines in Sample	0.497	grams
Total Percent Fines	0.64	%

Dry Sieving Summary

Total Sample Weight	76.547	grams
Total Digested Weight	72.558	grams
Total Carbonate Weight	3.989	grams
Total Silica %	94.79	%
Total Carbonate %	5.21	%
Carbonate/Silica Ratio	0.055	

General Comments:

None

Description

Worked By: C. Fischler
Reviewed and Editted By: M. Ladle

Pre-Digestion Grain Size Distribution

Onshore Grab Sample

Sample: DU-13-SS

Total Sample Mass: 76.547 grams

Sieve Size (phi)	Sieve Midpt (phi)	Weight (grams)	Freq Weight %	Cumulative Weight %
-2.00	-2.125	0.494	0.645	0.645
-1.75	-1.875	0.128	0.167	0.813
-1.50	-1.625	0.235	0.307	1.120
-1.25	-1.375	0.323	0.422	1.542
-1.00	-1.125	0.263	0.344	1.885
-0.75	-0.875	0.236	0.308	2.193
-0.50	-0.625	0.232	0.303	2.497
-0.25	-0.375	0.163	0.213	2.709
0.00	-0.125	0.149	0.195	2.904
0.25	0.125	0.158	0.206	3.111
0.50	0.375	0.137	0.179	3.289
0.75	0.625	0.187	0.244	3.534
1.00	0.875	0.380	0.496	4.030
1.25	1.125	0.598	0.781	4.811
1.50	1.375	1.396	1.824	6.635
1.75	1.625	2.749	3.591	10.226
2.00	1.875	4.807	6.280	16.506
2.25	2.125	8.247	10.774	27.280
2.50	2.375	14.570	19.034	46.314
2.75	2.625	21.109	27.577	73.891
3.00	2.875	14.372	18.775	92.666
3.25	3.125	4.539	5.930	98.596
3.50	3.375	0.780	1.019	99.615
3.75	3.625	0.214	0.280	99.894
4.00	3.875	0.063	0.082	99.976
5.00	4.500	0.018	0.024	100.000

Statistical Results			
Mean:	2.3584	phi	(0.195 mm)
Standard Dev:	0.7949	phi-units	(0.5764 mm)
Skewness:	-3.1600	dimensionless	
Kurtosis:	15.8619	dimensionless	
5th Moment:	-77.9387	dimensionless	
6th Moment:	399.5438	dimensionless	
RARD *	0.3371	dimensionless	
Median	2.4084	phi	(0.1884 mm)
* RARD = reciprocal absolute relative dispersion (see below)			

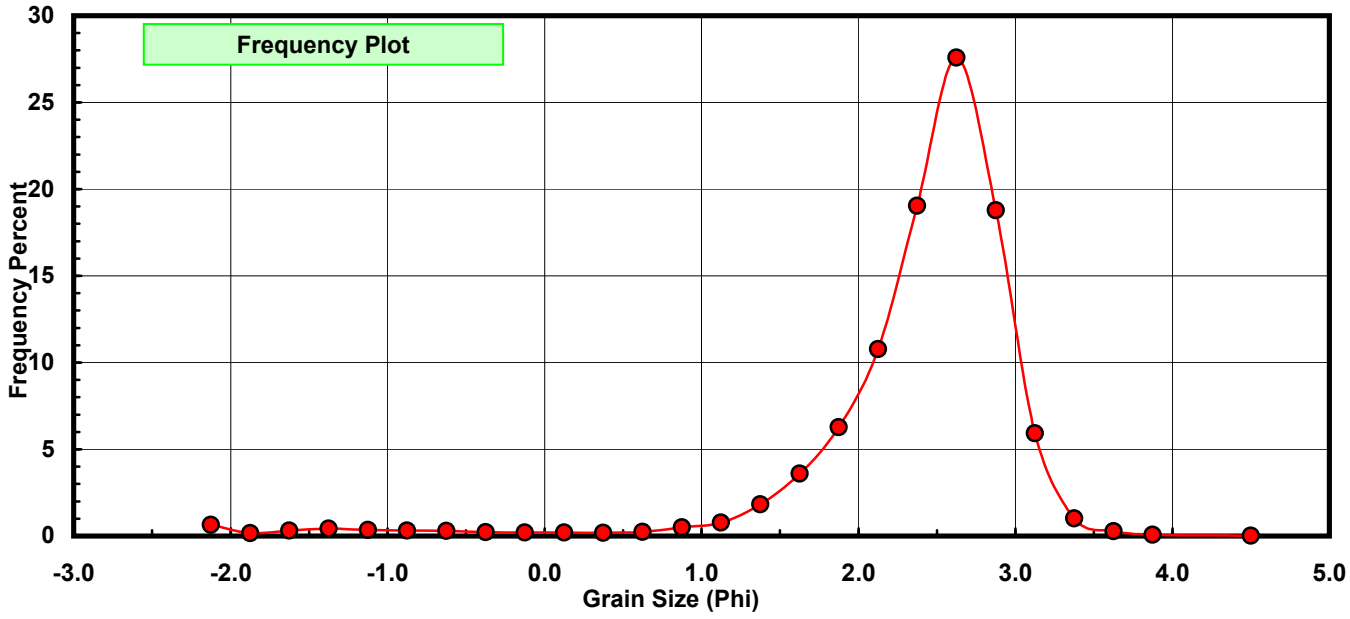
Statistical Explanation

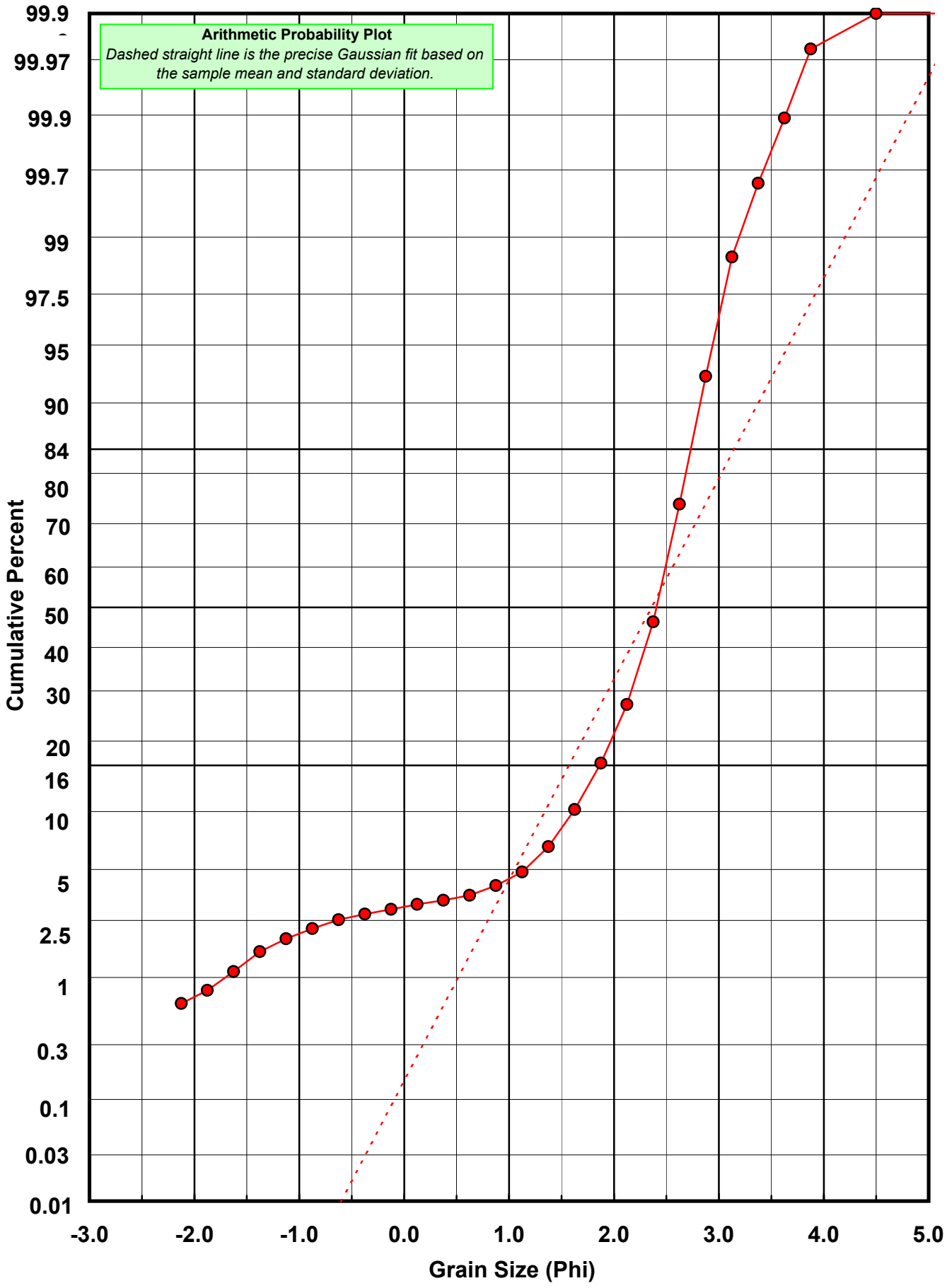
Calculations based on the Method of Moments
Skewness: 3rd Stand. Moment; Exact Gaussian = 0.0
Kurtosis: 4th Stand. Moment; Exact Gaussian = 3.0

For Further Explanation, See Calculation Sheets

Millimeter data calculated by mm = 2^(-phi)

Reciprocal Absolute Relative Dispersion (RARD) Scale	
< 0.5	Excellent homogeneity (e.g., beaches)
0.5 to 1.0	Good homogeneity
1.0 to 1.33	Fair homogeneity
> 1.33	Poor homogeneity (e.g., glacial)




Arithmetic Probability Plot
Dashed straight line is the precise Gaussian fit based on the sample mean and standard deviation.
Cumulative Percent
99.9
99.97
99.9
99.7
99
97.5
95
90
84
80
70
60
50
40
30
20
16
10
5
2.5
1
0.3
0.1
0.03
0.01
-3.0
-2.0
-1.0
0.0
1.0
2.0
3.0
4.0
5.0
Grain Size (Phi)

Carbonate Grain Size Distribution

Onshore Grab Sample

Sample: DU-13-SS

Total Carbonate Mass: 4.791 grams

% Carbonate: 5.2 %

Sieve Size (phi)	Sieve Midpt (phi)	Weight (grams)	Freq Weight %	Cumulative Weight %
-2.00	-2.125	0.494	10.311	10.311
-1.75	-1.875	0.128	2.672	12.983
-1.50	-1.625	0.235	4.905	17.888
-1.25	-1.375	0.323	6.742	24.630
-1.00	-1.125	0.263	5.489	30.119
-0.75	-0.875	0.220	4.592	34.711
-0.50	-0.625	0.209	4.362	39.073
-0.25	-0.375	0.160	3.340	42.413
0.00	-0.125	0.132	2.755	45.168
0.25	0.125	0.121	2.526	47.694
0.50	0.375	0.085	1.774	49.468
0.75	0.625	0.125	2.609	52.077
1.00	0.875	0.137	2.860	54.936
1.25	1.125	0.127	2.651	57.587
1.50	1.375	0.155	3.235	60.822
1.75	1.625	0.099	2.066	62.889
2.00	1.875	0.296	6.178	69.067
2.25	2.125	0.298	6.220	75.287
2.50	2.375	0.000	0.000	75.287
2.75	2.625	0.000	0.000	75.287
3.00	2.875	0.711	14.840	90.127
3.25	3.125	0.372	7.765	97.892
3.50	3.375	0.066	1.378	99.269
3.75	3.625	0.018	0.376	99.645
4.00	3.875	0.017	0.355	100.000
5.00	4.500	0.000	0.000	100.000

Statistical Results			
Mean:	0.5634	phi	(0.6767 mm)
Standard Dev:	1.8849	phi-units	(0.2708 mm)
Skewness:	0.0292	dimensionless	
Kurtosis:	1.5025	dimensionless	
5th Moment:	0.0757	dimensionless	
6th Moment:	2.5814	dimensionless	
RARD *	3.3453	dimensionless	
Median	0.4260	phi	(0.7443 mm)

* RARD = reciprocal absolute relative dispersion (see below)

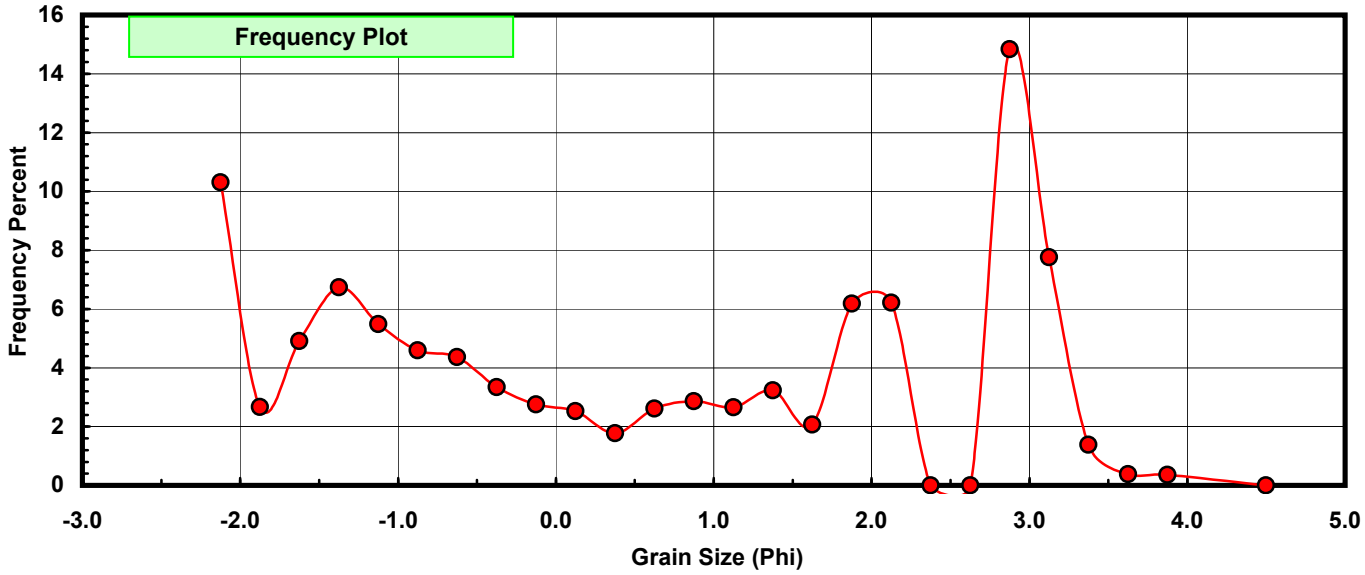
Statistical Explanation

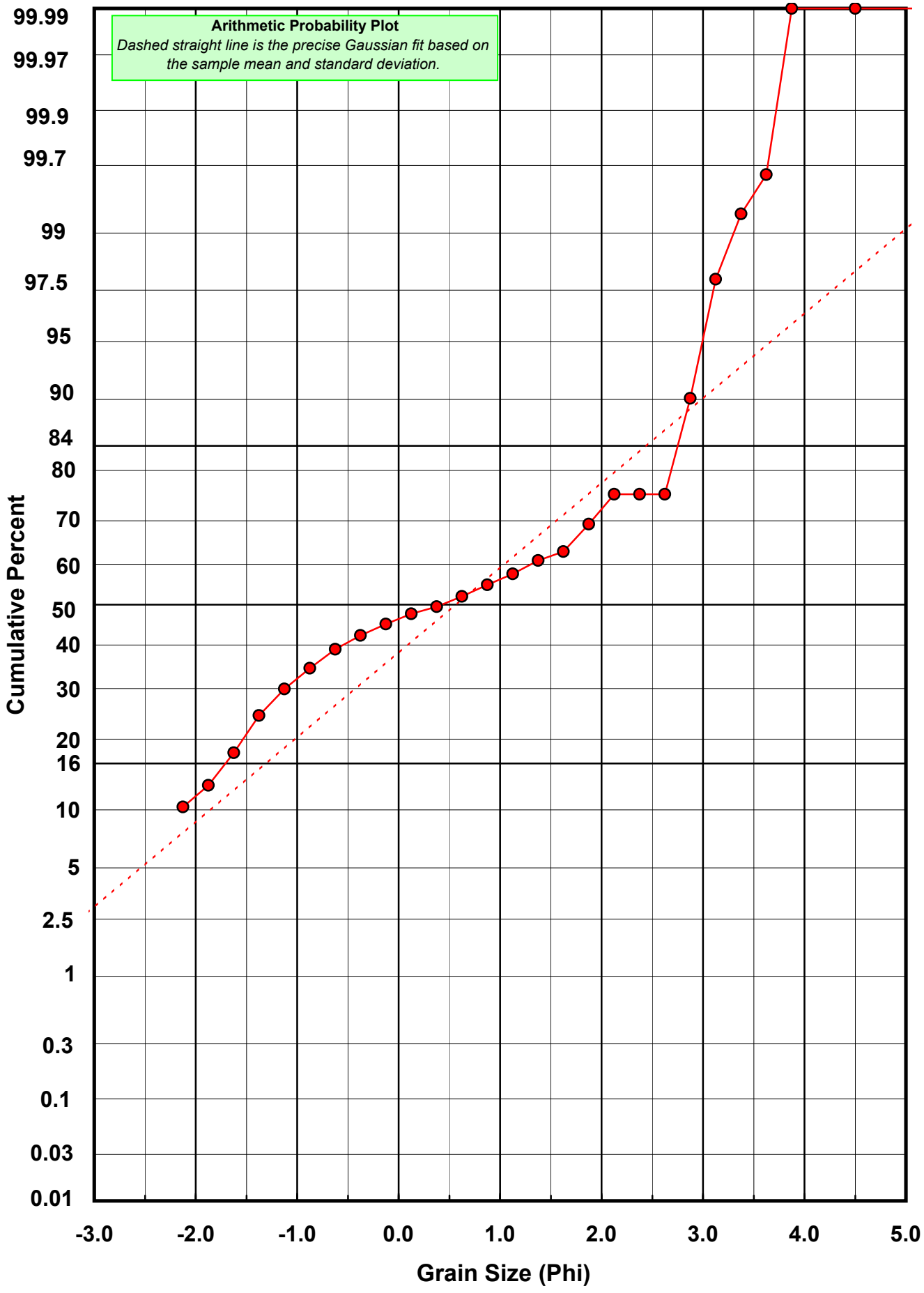
Calculations based on the Method of Moments
Skewness: 3rd Stand. Moment; Exact Gaussian = 0.0
Kurtosis: 4th Stand. Moment; Exact Gaussian = 3.0

For Further Explanation, See Calculation Sheets

Millimeter data calculated by mm = 2^(-phi)

Reciprocal Absolute Relative Dispersion (RARD) Scale	
< 0.5	Excellent homogeneity (e.g., beaches)
0.5 to 1.0	Good homogeneity
1.0 to 1.33	Fair homogeneity
> 1.33	Poor homogeneity (e.g., glacial)




Arithmetic Probability Plot
Dashed straight line is the precise Gaussian fit based on the sample mean and standard deviation.
Cumulative Percent
99.99
99.97
99.9
99.7
99
97.5
95
90
84
80
70
60
50
40
30
20
16
10
5
2.5
1
0.3
0.1
0.03
0.01
-3.0
-2.0
-1.0
0.0
1.0
2.0
3.0
4.0
5.0
Grain Size (Phi)

Post-Digestion Grain Size Distribution

Onshore Grab Sample

Sample: DU-13-SS

Total Digested Mass: 72.541 grams

% Silica: 94.8 %

Sieve Size (phi)	Sieve Midpt (phi)	Weight (grams)	Freq Weight %	Cumulative Weight %
-2.00	-2.125	0.000	0.000	0.000
-1.75	-1.875	0.000	0.000	0.000
-1.50	-1.625	0.000	0.000	0.000
-1.25	-1.375	0.000	0.000	0.000
-1.00	-1.125	0.000	0.000	0.000
-0.75	-0.875	0.016	0.022	0.022
-0.50	-0.625	0.023	0.032	0.054
-0.25	-0.375	0.003	0.004	0.058
0.00	-0.125	0.017	0.023	0.081
0.25	0.125	0.037	0.051	0.132
0.50	0.375	0.052	0.072	0.204
0.75	0.625	0.062	0.085	0.289
1.00	0.875	0.243	0.335	0.624
1.25	1.125	0.471	0.649	1.274
1.50	1.375	1.241	1.711	2.985
1.75	1.625	2.650	3.653	6.638
2.00	1.875	4.511	6.219	12.856
2.25	2.125	7.949	10.958	23.814
2.50	2.375	14.999	20.677	44.491
2.75	2.625	21.483	29.615	74.106
3.00	2.875	13.661	18.832	92.938
3.25	3.125	4.167	5.744	98.682
3.50	3.375	0.714	0.984	99.666
3.75	3.625	0.196	0.270	99.937
4.00	3.875	0.046	0.063	100.000
5.00	4.500	0.000	0.000	100.000

Statistical Results			
Mean:	2.4779	phi	(0.1795 mm)
Standard Dev:	0.4453	phi-units	(0.7344 mm)
Skewness:	-1.0857	dimensionless	
Kurtosis:	6.1184	dimensionless	
5th Moment:	-23.0072	dimensionless	
6th Moment:	135.2555	dimensionless	
RARD *	0.1797	dimensionless	
Median	2.4215	phi	(0.1867 mm)

* RARD = reciprocal absolute relative dispersion (see below)

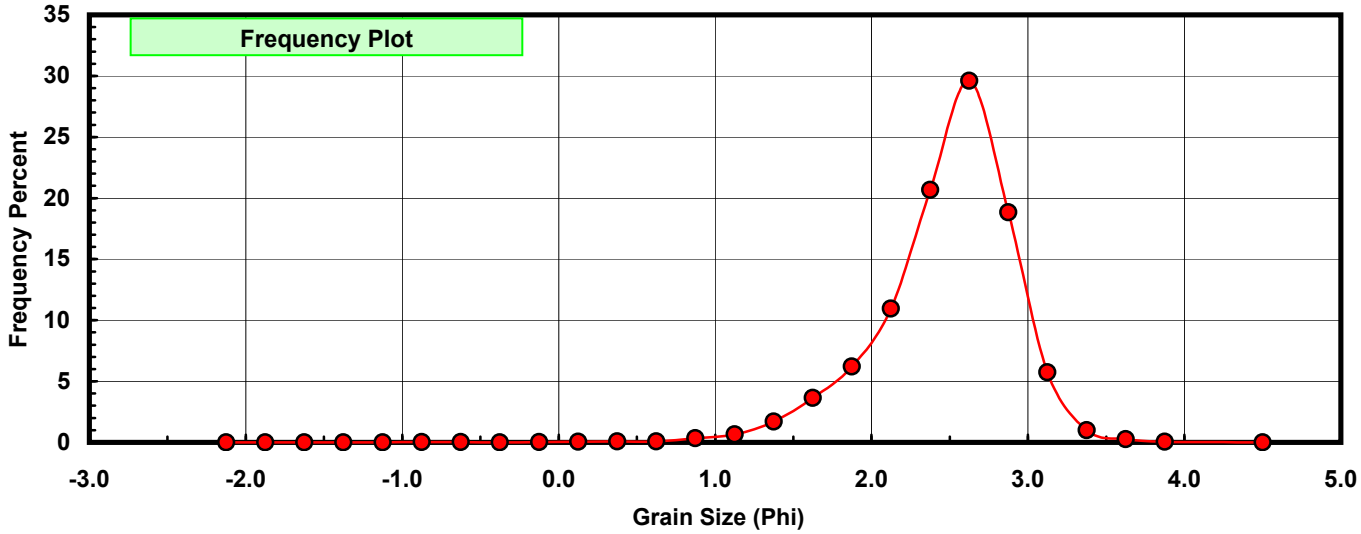
Statistical Explanation

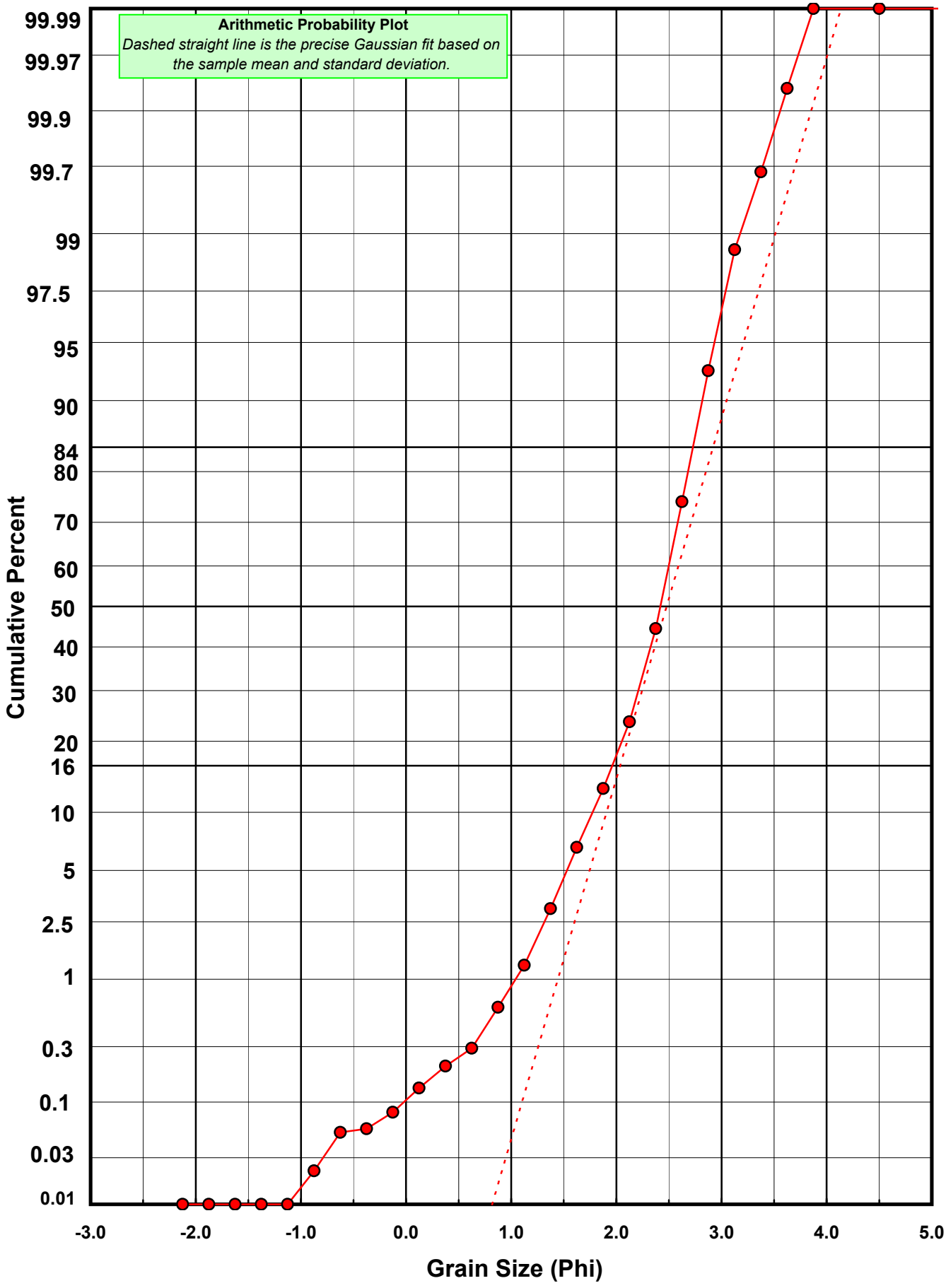
Calculations based on the Method of Moments
Skewness: 3rd Stand. Moment; Exact Gaussian = 0.0
Kurtosis: 4th Stand. Moment; Exact Gaussian = 3.0

For Further Explanation, See Calculation Sheets

Millimeter data calculated by mm = 2^(-phi)

Reciprocal Absolute Relative Dispersion (RARD) Scale	
< 0.5	Excellent homogeneity (e.g., beaches)
0.5 to 1.0	Good homogeneity
1.0 to 1.33	Fair homogeneity
> 1.33	Poor homogeneity (e.g., glacial)




Arithmetic Probability Plot
Dashed straight line is the precise Gaussian fit based on the sample mean and standard deviation.
Cumulative Percent
99.99
99.97
99.9
99.7
99
97.5
95
90
84
80
70
60
50
40
30
20
16
10
5
2.5
1
0.3
0.1
0.03
0.01
-3.0
-2.0
-1.0
0.0
1.0
2.0
3.0
4.0
5.0
Grain Size (Phi)