

**Onshore Grab Sample**

**Sample:** VO-28-SS  
**Sample Taken By:** J. Ladner  
**Sample Collected On:** 12/3/03  
**Splits?** N/A

**County:** Volusia  
**Latitude:** 29° 05' 43.8"  
**Longitude:** 80° 55' 59.04"  
**Datum:** NAD 83  
**Surf. Elev:** N/A  
**Datum:** N/A

**Fine Data Summary**

Total Sample Weight	88.423 grams
Total Fines in Sample	1.231 grams
Total Percent Fines	1.37 %

**Dry Sieving Summary**

Total Sample Weight	87.209 grams
Total Digested Weight	85.510 grams
Total Carbonate Weight	1.699 grams
Total Silica %	98.05 %
Total Carbonate %	1.95 %
Carbonate/Silica Ratio	0.020

**General Comments:**

None

**Description**

Worked By: M. Lachance

# Pre-Digestion Grain Size Distribution

Onshore Grab Sample

Sample: VO-28-SS

Total Sample Mass: 87.209 grams

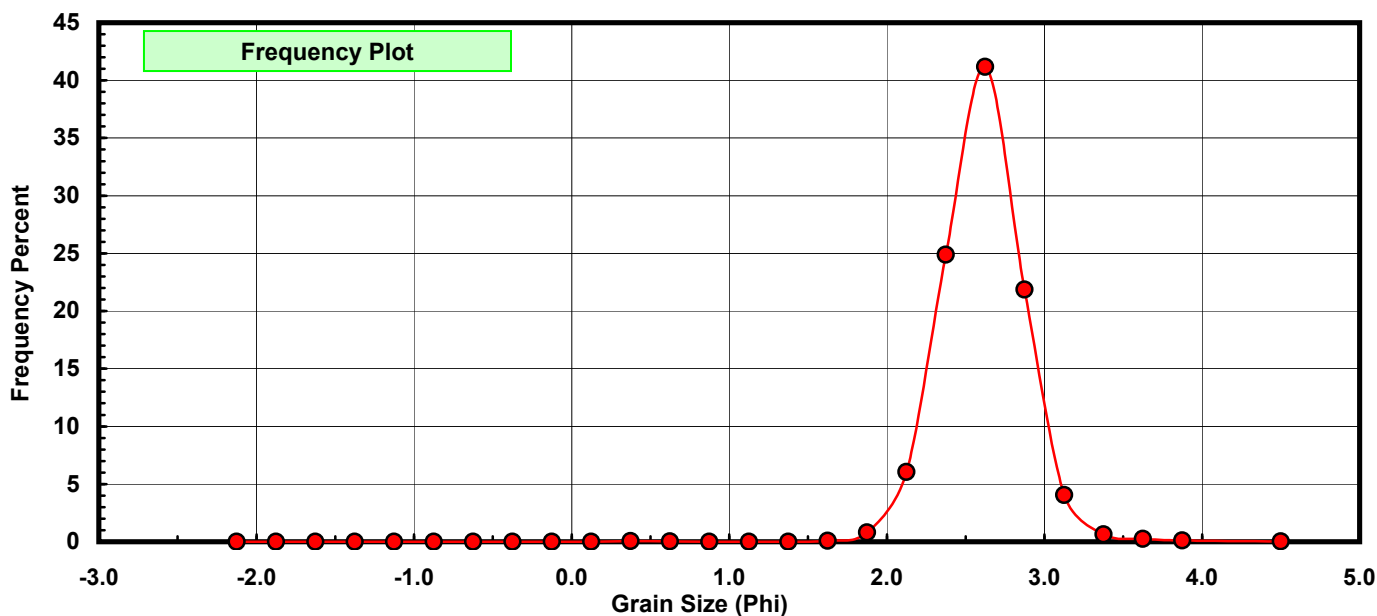
Sieve Size (phi)	Sieve Midpt (phi)	Weight (grams)	Freq Weight %	Cumulative Weight %
-2.00	-2.125	0.000	0.000	0.000
-1.75	-1.875	0.000	0.000	0.000
-1.50	-1.625	0.000	0.000	0.000
-1.25	-1.375	0.000	0.000	0.000
-1.00	-1.125	0.000	0.000	0.000
-0.75	-0.875	0.000	0.000	0.000
-0.50	-0.625	0.000	0.000	0.000
-0.25	-0.375	0.000	0.000	0.000
0.00	-0.125	0.000	0.000	0.000
0.25	0.125	0.000	0.000	0.000
0.50	0.375	0.039	0.045	0.045
0.75	0.625	0.019	0.022	0.067
1.00	0.875	0.003	0.003	0.070
1.25	1.125	0.007	0.008	0.078
1.50	1.375	0.012	0.014	0.092
1.75	1.625	0.067	0.077	0.169
2.00	1.875	0.704	0.807	0.976
2.25	2.125	5.269	6.042	7.018
2.50	2.375	21.695	24.877	31.895
2.75	2.625	35.914	41.182	73.076
3.00	2.875	19.056	21.851	94.927
3.25	3.125	3.534	4.052	98.979
3.50	3.375	0.563	0.646	99.625
3.75	3.625	0.222	0.255	99.880
4.00	3.875	0.091	0.104	99.984
5.00	4.500	0.014	0.016	100.000

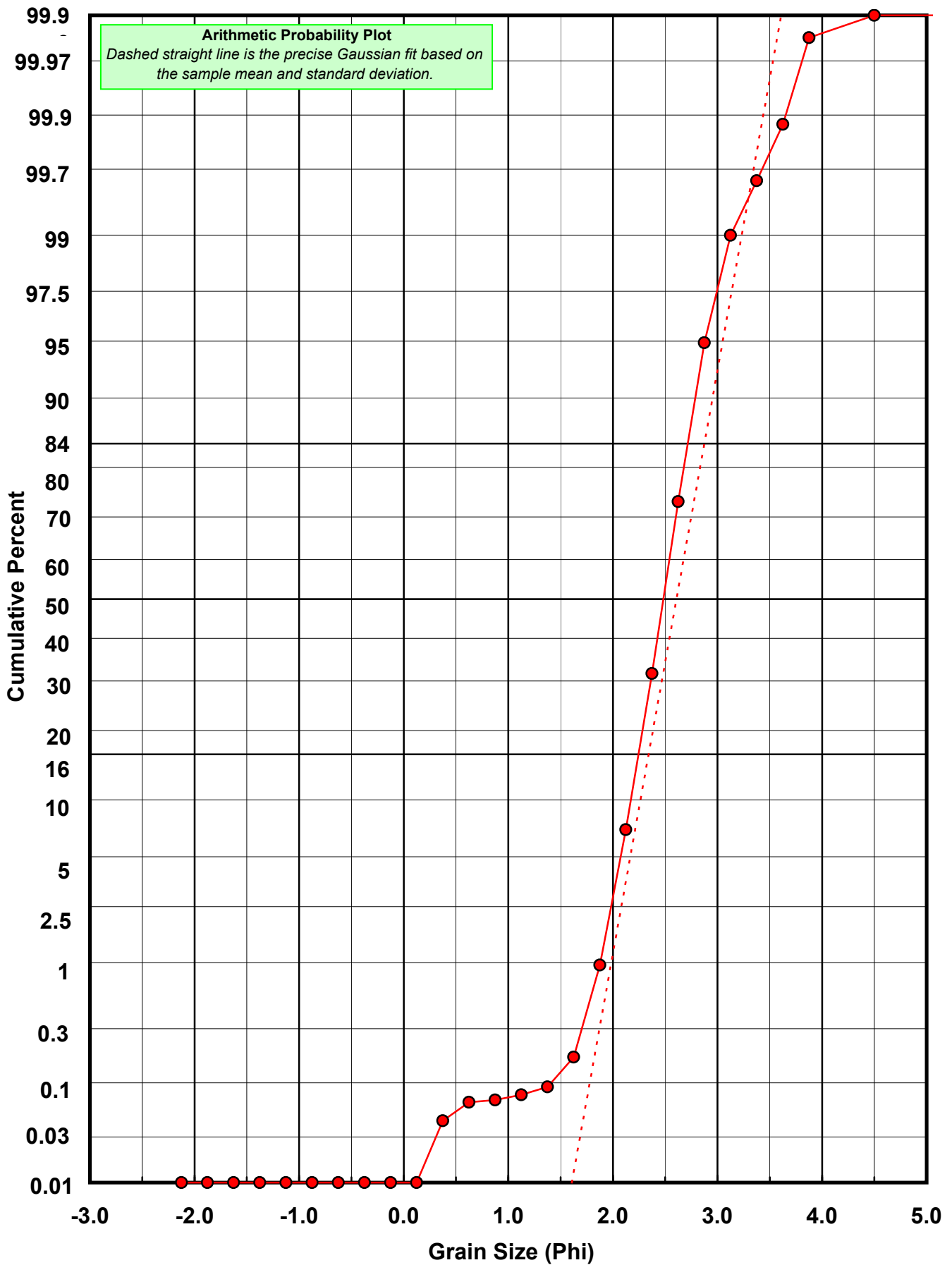
Statistical Results			
Mean:	2.6079	phi	(0.164 mm)
Standard Dev:	0.2689	phi-units	(0.83 mm)
Skewness:	-0.1379	dimensionless	
Kurtosis:	7.0226	dimensionless	
5th Moment:	-16.9799	dimensionless	
6th Moment:	241.9218	dimensionless	
RARD *	0.1031	dimensionless	
Median	2.4849	phi	(0.1786 mm)

\* 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)





# Carbonate Grain Size Distribution

Onshore Grab Sample

Sample: VO-28-SS

Total Carbonate Mass: 3.256 grams

% Carbonate: 1.9 %

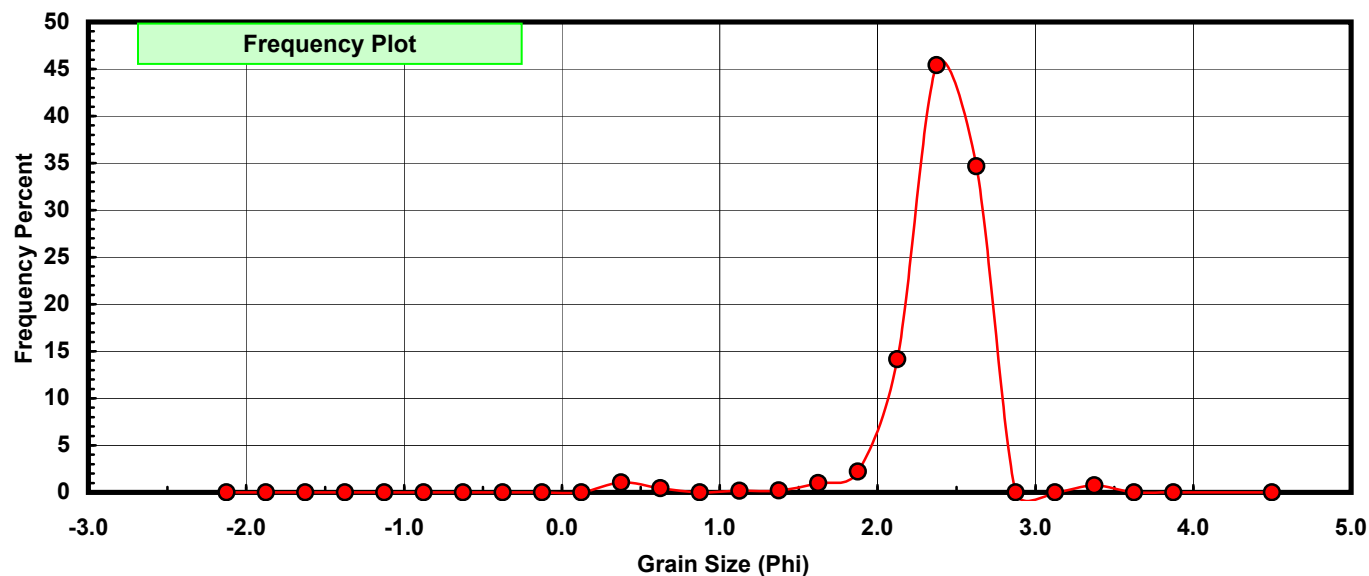
Sieve Size (phi)	Sieve Midpt (phi)	Weight (grams)	Freq Weight %	Cumulative Weight %
-2.00	-2.125	0.000	0.000	0.000
-1.75	-1.875	0.000	0.000	0.000
-1.50	-1.625	0.000	0.000	0.000
-1.25	-1.375	0.000	0.000	0.000
-1.00	-1.125	0.000	0.000	0.000
-0.75	-0.875	0.000	0.000	0.000
-0.50	-0.625	0.000	0.000	0.000
-0.25	-0.375	0.000	0.000	0.000
0.00	-0.125	0.000	0.000	0.000
0.25	0.125	0.000	0.000	0.000
0.50	0.375	0.034	1.044	1.044
0.75	0.625	0.014	0.430	1.474
1.00	0.875	0.000	0.000	1.474
1.25	1.125	0.005	0.154	1.628
1.50	1.375	0.007	0.215	1.843
1.75	1.625	0.032	0.983	2.826
2.00	1.875	0.072	2.211	5.037
2.25	2.125	0.461	14.158	19.195
2.50	2.375	1.479	45.424	64.619
2.75	2.625	1.128	34.644	99.263
3.00	2.875	0.000	0.000	99.263
3.25	3.125	0.000	0.000	99.263
3.50	3.375	0.024	0.737	100.000
3.75	3.625	0.000	0.000	100.000
4.00	3.875	0.000	0.000	100.000
5.00	4.500	0.000	0.000	100.000

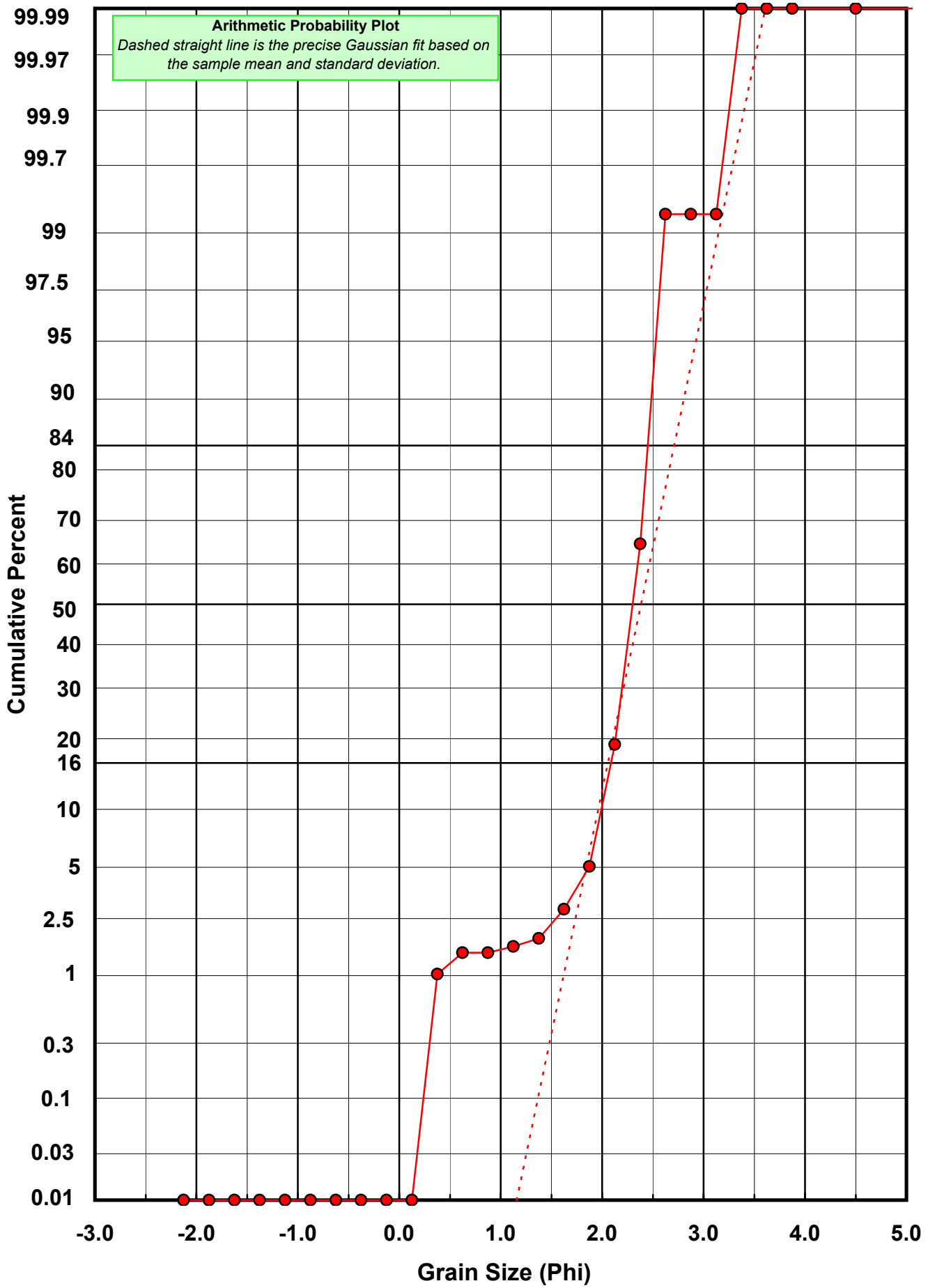
Statistical Results			
Mean:	2.3827	phi	(0.1918 mm)
Standard Dev:	0.3292	phi-units	(0.796 mm)
Skewness:	-3.0999	dimensionless	
Kurtosis:	19.6258	dimensionless	
5th Moment:	-107.5830	dimensionless	
6th Moment:	651.1068	dimensionless	
RARD *	0.1382	dimensionless	
Median	2.2945	phi	(0.2038 mm)

\* 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)





# Post-Digestion Grain Size Distribution

Onshore Grab Sample

Sample: VO-28-SS

Total Digested Mass: 85.483 grams

% Silica: 98.1 %

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	0.000	0.000	0.000
-0.50	-0.625	0.000	0.000	0.000
-0.25	-0.375	0.000	0.000	0.000
0.00	-0.125	0.000	0.000	0.000
0.25	0.125	0.000	0.000	0.000
0.50	0.375	0.005	0.006	0.006
0.75	0.625	0.005	0.006	0.012
1.00	0.875	0.005	0.006	0.018
1.25	1.125	0.002	0.002	0.020
1.50	1.375	0.005	0.006	0.026
1.75	1.625	0.035	0.041	0.067
2.00	1.875	0.632	0.739	0.806
2.25	2.125	4.808	5.625	6.431
2.50	2.375	20.216	23.649	30.080
2.75	2.625	34.786	40.693	70.773
3.00	2.875	19.995	23.391	94.164
3.25	3.125	4.109	4.807	98.971
3.50	3.375	0.539	0.631	99.601
3.75	3.625	0.226	0.264	99.865
4.00	3.875	0.115	0.135	100.000
5.00	4.500	0.000	0.000	100.000

Statistical Results			
Mean:	2.6229	phi	(0.1623 mm)
Standard Dev:	0.2646	phi-units	(0.8324 mm)
Skewness:	0.1166	dimensionless	
Kurtosis:	4.6019	dimensionless	
5th Moment:	-0.3932	dimensionless	
6th Moment:	76.2708	dimensionless	
RARD *	0.1009	dimensionless	
Median	2.4974	phi	(0.1771 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)

