GEUS
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GANE-1
GANE-1A

Conventional Core Analysis on GANE-1 and GANE-1A cores, Eqalulik, Nuussuaq, West Greenland

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DANMARKS OG GRØNLANDS GEOLOGISKE UNDERSØGELSE RAPPORT 1996/117

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Contents

1. Introduction

In May 1995 grønArctic Energy Inc., Canada was awarded an exclusive licence to explore for hydrocarbons on the southern and western part of the Nuussuaq peninsula, West Greenland. As part of the commitments under this licence three slim core holes GANE#1, GANK#1 and GANT#1 were drilled in July and August 1995.

The GANE#1 well was drilled in two sections. The upper part GANE#1 and a side-track GANE#1A below.

The Core Analysis Laboratory at The Geological Survey of Denmark and Greenland has received parts of these two cores for conventional core analysis. Table 1.1 show box numbers, depth intervals and measured core size for the analyzed cores:

Table 1.1: List of analyzed cores.

Core	Box numbers	Top	Bottom	Core size
GANE#1	156 - part of 204	487,28		ø47mm
GANE#1	Part of 204 - 205		636,86 *	ø36mm
GANE#1A	206 - 258	535,57	706,68	ø36mm

* Corrected due to error on bottom depth on box 204 and top/bottom depth on box 205.

The analysis covers the following services:

- Spectral core gamma log
- Gas permeability
- Porosity
- Grain density

2. Sampling and analytical procedures

Cores were transported from Greenland to Copenhagen in 1,2m boxes. Boxes were made of a toplayer and a bottomlayer only, fixed together without any side walls. Every box contained 3 meters (m) core interval parted in three 1 m lengths. These lengths are named A, B and C from top to bottom in this analysis programme.

The cores were restored in another set of boxes at the arrival to Denmark.

2.1 Spectral core gamma log

Spectral core gamma logs were made with a scanning speed of 1 cm per minute. The cores were scanned without the boxes.

2.2 Plugging

Following the gamma activity recording, the plugging programme was conducted. Horizontal 1" plugs were drilles for every 1m of core if possible. Standard plugging depth was 0,5m below top of section A, B and C.

Some sections were shaled and plugging was impossible in these sections. Other plugs were drilled in the other boxes, to supply the standard plugging. Depths were selected due to the visual variation in the core, giving a better representation of the variations in the core.

The missing plugs from these sections se plugs were saved for drilling supply plugs in other intervals, giving a better representation of the variation in the core.

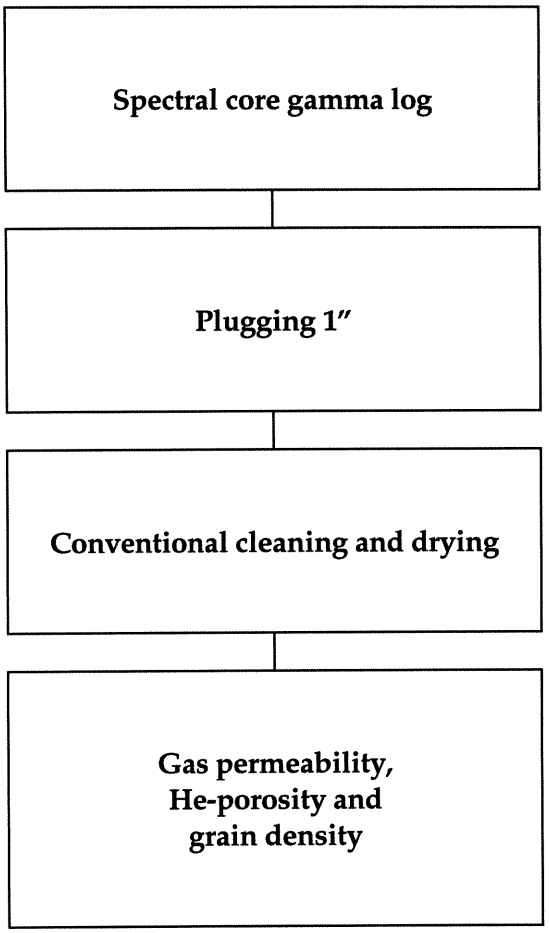
Plug depths were calculated as distance from top of the 3m boxes. The core length expanded for some of the cores during the restoring in other boxes and during the spectral core gamma log, and the distance from top of 3m box were calculated by the following algorithm:

A sections:	Measured distance from top of box
B sections:	Measured distance from top of box plus measured length of A
C sections:	Measured distance from top of box plus measured length of A and B

2.3 Conventional core analysis

The plugs were cleaned in Soxhlet extractors and then dried at 110°C. Conventional core analysis including He-porosity, grain density and gas permeability was performed. The permeability was measured using a sleeve pressure of 400 psi.

3. Flow diagram of the analytical procedures



4. Analytical methods

The following is a short description of the methods used by the Core Analysis Laboratory. For a more detailed description of methods, instrumentation and principles of calculation the reader is referred to API recommended practice for core analysis procedure (API RP 40, 1960).

4.1 Spectral core gamma log

The natural gamma radiation of a core is recorded within an energy window of 0.5 - 3.0 MeV, using Tl activated NaI scintillation detectors (Bicron), connected to a multichannel analyzer (Canberra).

The core is passed through a lead shielded tunnel at constant speed while the gamma activity is continuously recorded. Refer to Chapter 2 for the scanning speed used. The integrated gamma activity is recorded at regular intervals, either every 10 cm or every 3". The gamma activity represents the mean activity over a 10 cm or 3" interval, the assigned depth being the middle of the interval. The measured gamma activity is corrected for background activity, and in the case of sleeved core, also for activity of the sleeve.

Gamma activity is normally reported in counts per minute (cpm) at the actual core diameter. The following empirical relationship between "GAPI" from wireline logs and the actual cpm from GEUS core gamma logs (GEUS-cpm) has been established. The relationship should be used as a guideline only:

$$GAPI = GEUS\text{-}cpm * (10cm/d)^2 / 18{,}2$$

where d is core diameter in cm.

Radiation from decay of potassium and the uranium and thorium decay series are recorded in separate energy windows. Concentrations are calculated using synthetic standards of concrete doped with radioactive minerals in decay equilibrium. Concentrations of K, U and Th are reported as % K, ppm U and ppm Th, respectively. Relevant ratios are given.

4.2 Conventional cleaning and drying

The plugs are drilled and trimmed to a standard size of 1" diameter and 1.5" length. The samples are then placed in a Soxhlet extractor, which continuously soaks and washes the samples with methanol. This process removes water and dissolves salt precipitated in the pore space of the rock. Extraction is terminated when no chloride ions are present in the methanol. Samples containing hydrocarbons are then cleaned in toluene until a clear solution is obtained. Samples are vacuum dried at 90°C or 110°C, or they are humidity dried at 60°C and 40% relative humidity until constant weight occurs, depending on the requirements of the client.

4.3 Gas permeability

The plug is mounted in a Hassler core holder, and a confining pressure of 400 psi applied to the sleeve. The specific permeability to gas is measured by flowing nitrogen gas through a plug of known dimensions at differential pressures between 0 and 1 bar. No back pressure is applied. The readings of the digital gas permeameter are checked regularly by routine measurement of permeable steel reference plugs.

4.4 He-porosity and grain density

The porosity is measured on cleaned and dried samples. The porosity is determined by subtraction of the measured grain volume and the measured bulk volume. The Helium technique, employing Boyle's Law, is used for grain volume determination, applying a double chambered Helium porosimeter with digital readout, whereas bulk volume is measured by submersion of the plug in a mercury bath using Archimedes principle. Grain density is calculated from the grain volume measurement and the weight of the cleaned and dried sample.

4.5 Precision of analytical data

The Table below gives the precision (reproducibility) at the 68% level of confidence (+/- 1 standard deviation) for routine core analysis measurements performed at the GEUS Core Analysis Laboratory.

Measurement	Range, mD	Precision
Grain density		0.003 g/cc
Porosity		0.1 porosity-%
Gas Permeability	0.001-0.01 0.01-0.1 > 0.1	25% 15% 4%

The precision of the fluid saturation determination depends on the pore volume of the plug. The greater the volume of the plug and the greater the porosity of the plug, better precision is obtained. The following Table gives the precision in absolute percent-point.

Porosity	1" x 1.5" plugs	1.5" x 3" plugs
> 20%	5%	1%
10-20%	10%	2%
5-10%	20%	5%
< 5%	> 20%	> 5%

Certain factors might alter the stated precision of the fluid saturation determination. Loss of material during handling of the plug will result in an increase in the calculated oil saturation, and a similar decrease in the calculated gas saturation. This may occur for fragile or loosely consolidated rocks or if the rock contains dissolvable matter like halite. As the lost material usually has a greater density than oil, it may happen that the esti-

mated volume of oil and the measured volume of water all together take up more space than the actual pore volume after cleaning.

The precision of the total gamma activity analysis is calculated from counting statistics. The following list shows the dependency of reproducibility on count rate at 2 standard deviations.

Count rate (cpm)	Reproducibility (cpm)
125	7.1
250	10.0
500	14.2
1000	20.1
2000	28.4
4000	40.2

Reproducibility (precision) of the amount af uranium, thorium and potassium from gamma radiation is dependent on concentration. Two values for reproducibility are given, one for normal to high concentration range, and one for low concentration range. The latter also defines the detection limit (LLD). The reproducibility values are applicable to total gamma activity above and below 800 cpm, respectively.

	K(%)	U(ppm)	Th(ppm)
Reproducibility			
Normal to high range	0.07	0.60	1.14
Low range (LLD)	0.02	0.45	0.48
Accuracy	0.02	0.45	0.48

Accuracy is calculated as mean deviation from the accepted concentration of one internal standard. This value is only applicable to low concentrations. For high concentrations the high range reproducibility may serve as an approximation to accuracy. Accuracy is reported as an arithmetic mean.

5. Results

5.1 Spectral core gamma log

Spectral core gamma logs are made in the three sections, GANE1-1, GANE1-2 and GANE1A as shown in Table 5.1 below. The gamma logs are presented in the log sheet below. Please note: The logs "Total gamma (cps)" are in cps without correction for differences in core dimensions. Box numbers with ø36mm core are shown with a dotted background and box numbers with ø47mm are shown with a white background.

The spectral log is made with at measure time of 595sec at each window and a presumed core density at 2,020g/ccm.

Drillers information on top and bottom depth for box no. 204 and 205 is probably erronous. There is a 3 m depth error, and a correction for this error gave a perfect correlation between the spectral core gamma logs for GANE#1 and GANE#1A.

Table 5.2: Depth corrections in metre for box 204 and 205.

Box	Top	Bottom	Corrected top	Corrected bottom
204	630,42	636,62		633,62
205	636,62	639,86	633,62	636,86

Core gammalog for GANE#1 and GANE#1A below:

GANE 1

Core gamma log

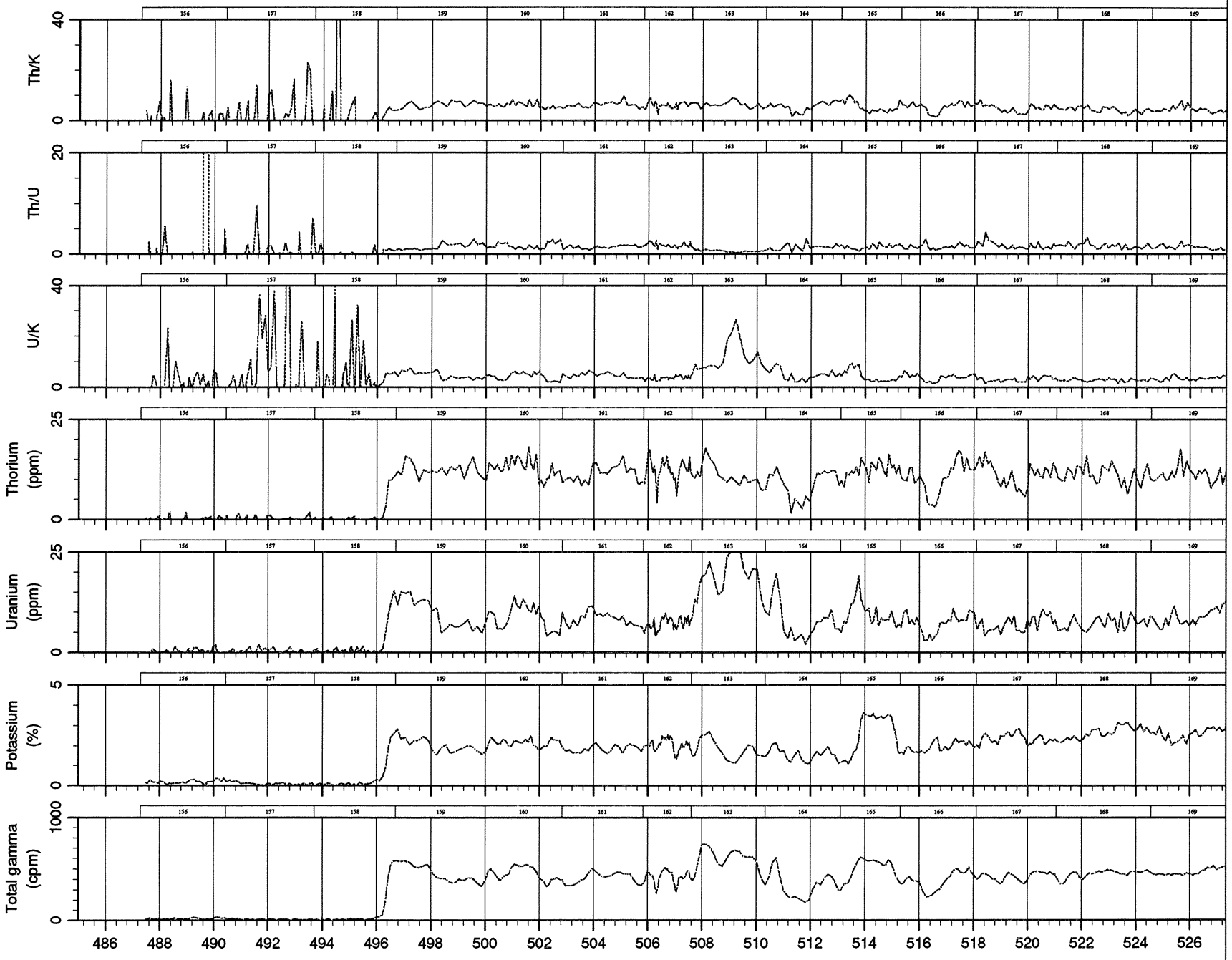
ø47mm/ø36mm

Depth vs.
- Th/K
- Th/U
- U/K
- Thorium
- Uranium
- Potassium
- Total Gamma

Scale 1:200

Legend

Gane1



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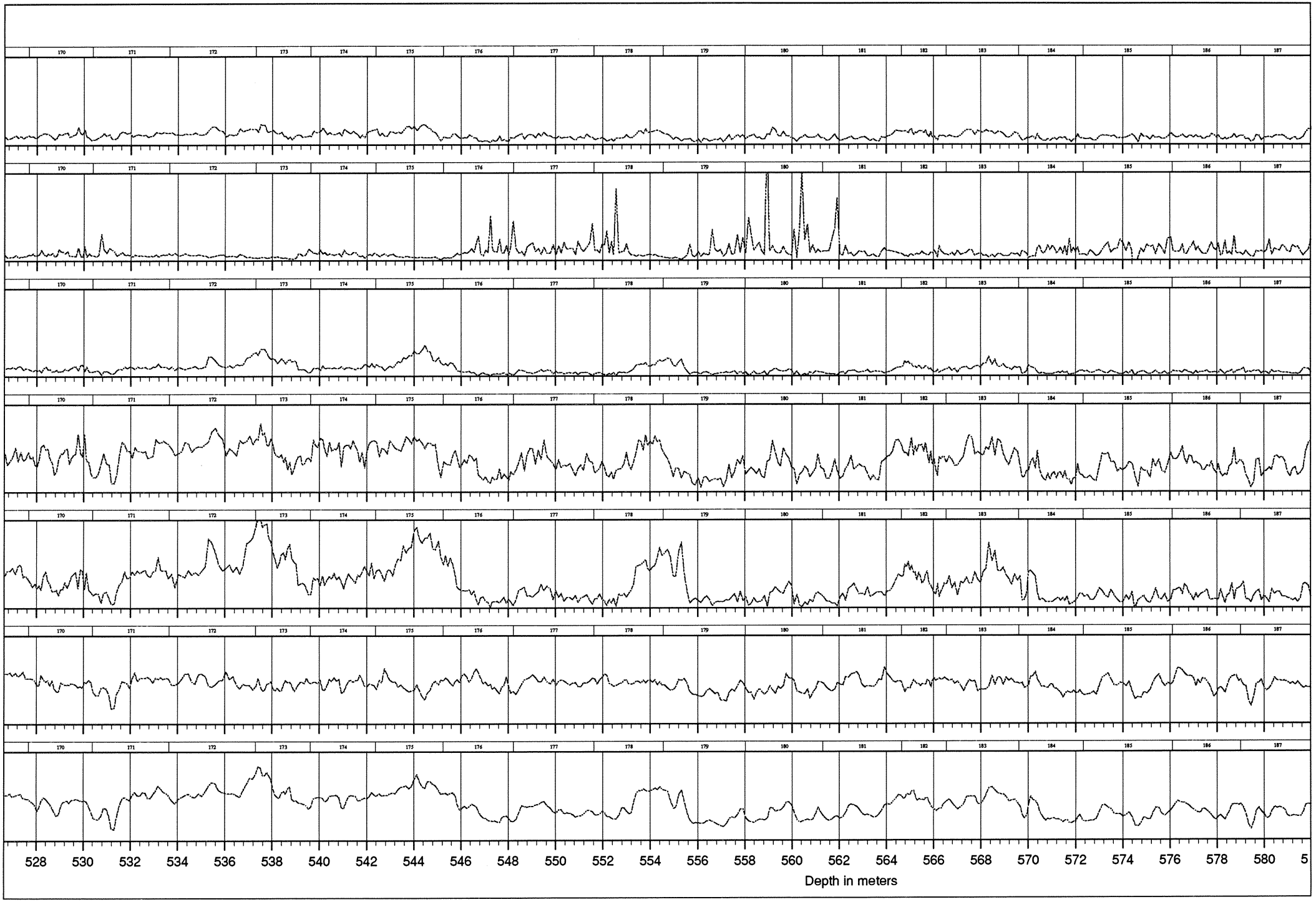
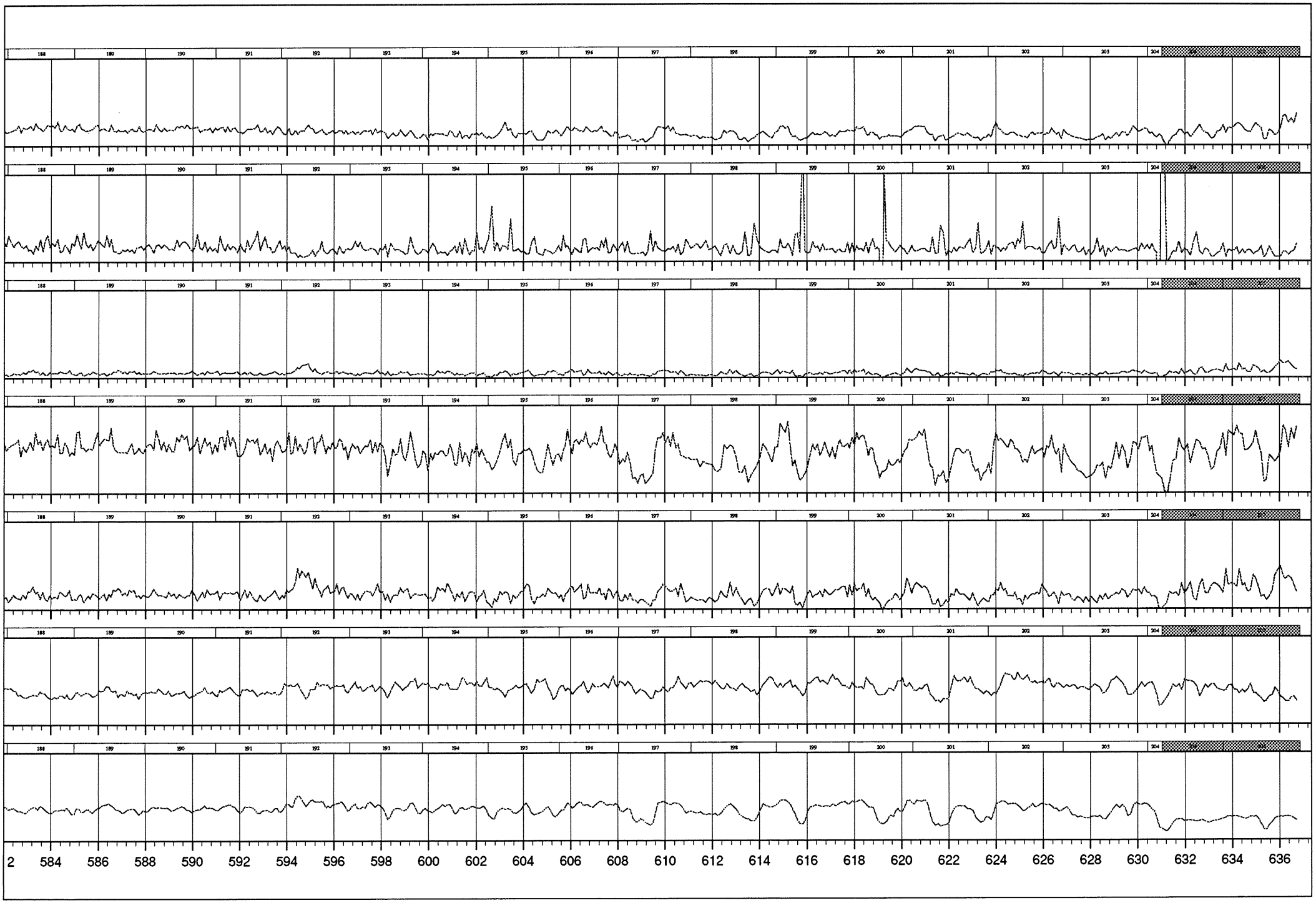

170 171 172 173 174 175 176 177 178 179 180 181 182 183 184 185 186 187
528 530 532 534 536 538 540 542 544 546 548 550 552 554 556 558 560 562 564 566 568 570 572 574 576 578 580 5
Depth in meters


188 189 190 191 192 193 194 195 196 197 198 199 200 201 202 203 204
2 584 586 588 590 592 594 596 598 600 602 604 606 608 610 612 614 616 618 620 622 624 626 628 630 632 634 636

GANE 1A

Core gamma log

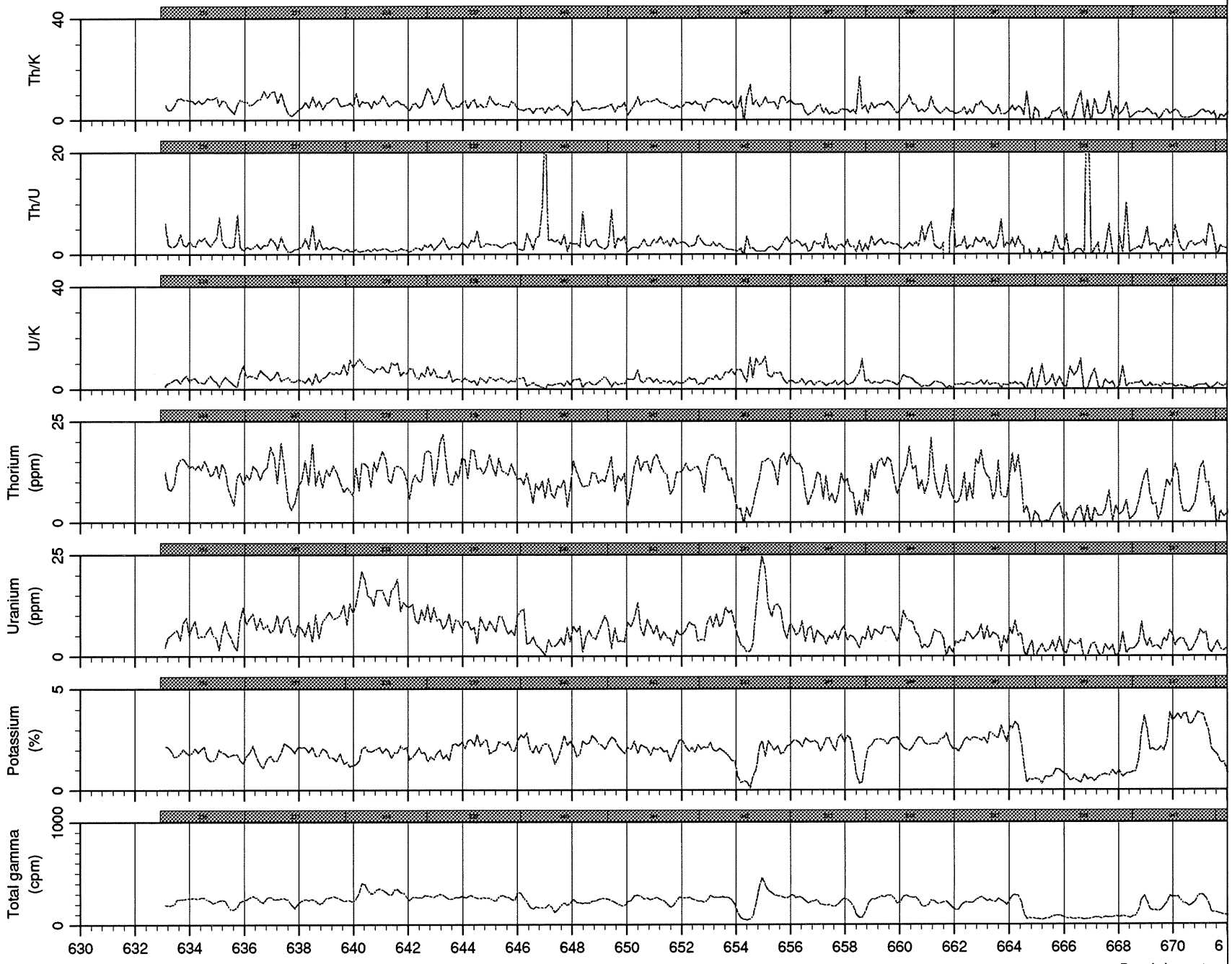
ø36mm core

Depth vs.
- Th/K
- Th/U
- U/K
- Thorium
- Uranium
- Potassium
- Total Gamma

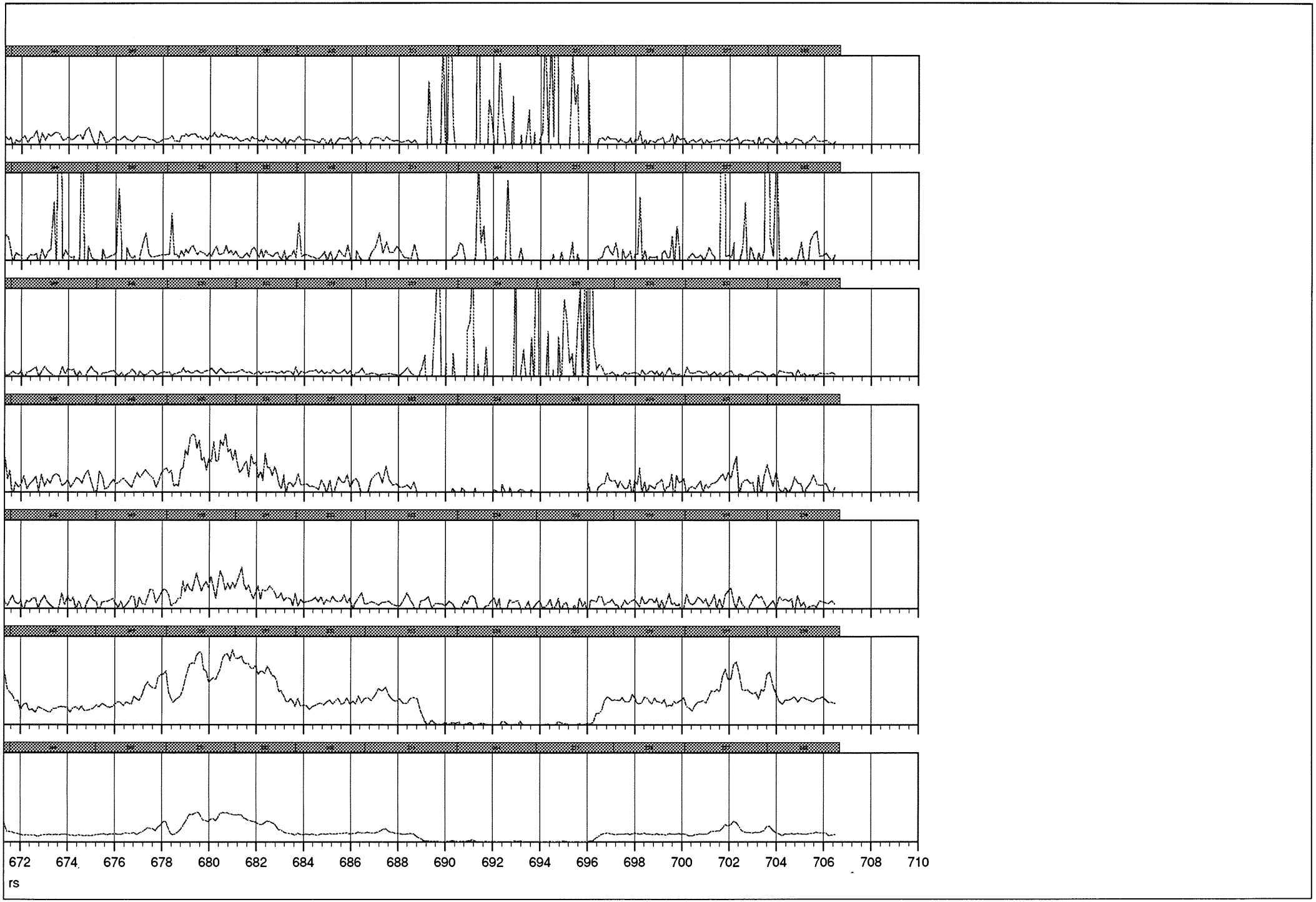
Scale 1:200

Legend

Gane 1A



GEUS Core Analysis Laboratory, 9-JAN-97


672
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5.2 Statistical information

Frequency plots of gas permeability, porosity and grain density and cross plots are made together with statistic information on GANE#1, GANE#1A and the total sum of GANE#1 and GANE#1A plugs.

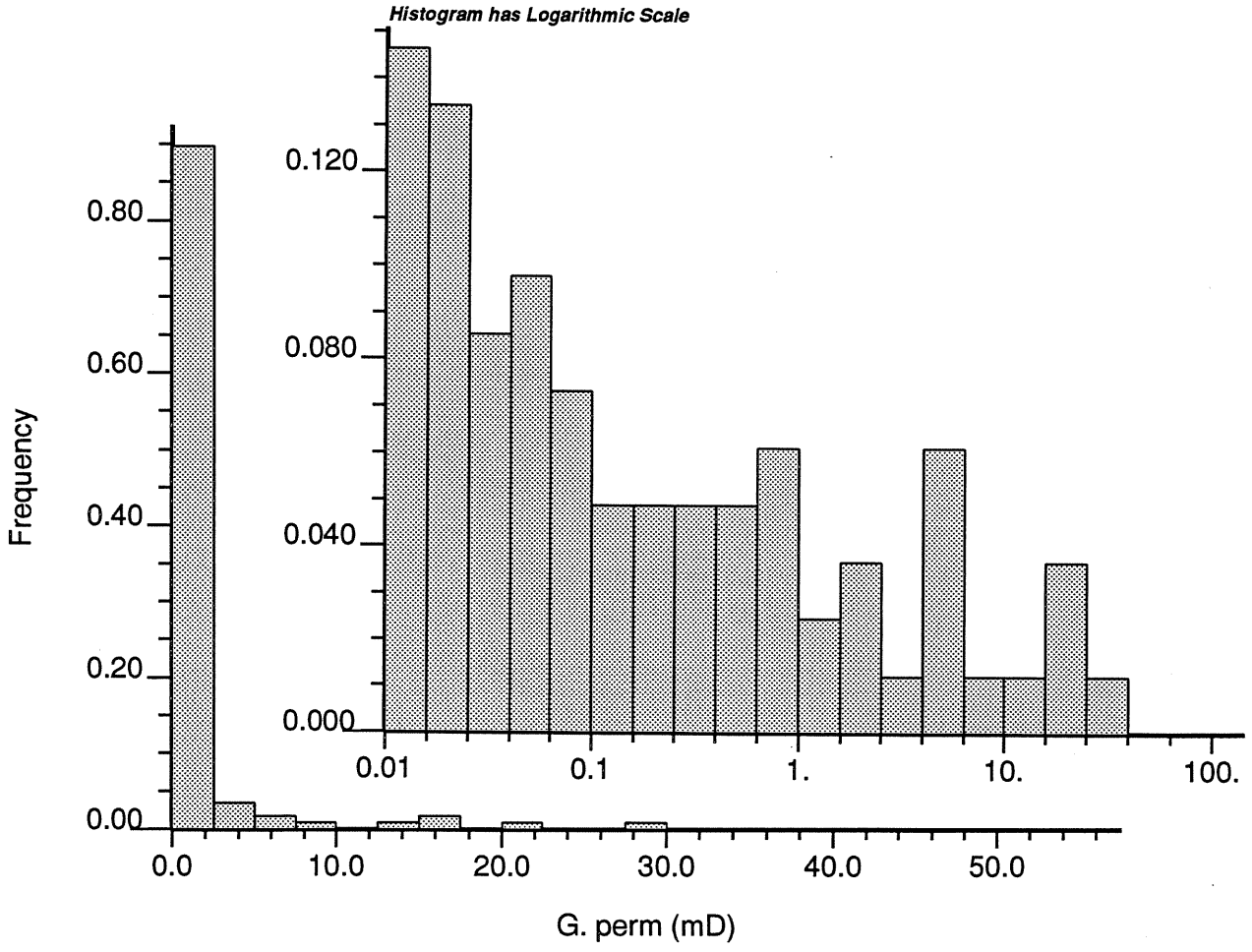
These statistical information is calculated on data only from samples with measured porosity and non-zero permeability. The numbes of these samples are shown in the Table below:

Population	Numbers of plug samples	Numbers of plugs samples used for statistic calculations
GANE#1	131	101
GANE#1A	67	53
GANE#1 and GANE#1A	198	154

5.2.1 GANE#1, Gas permeability

Permeability:

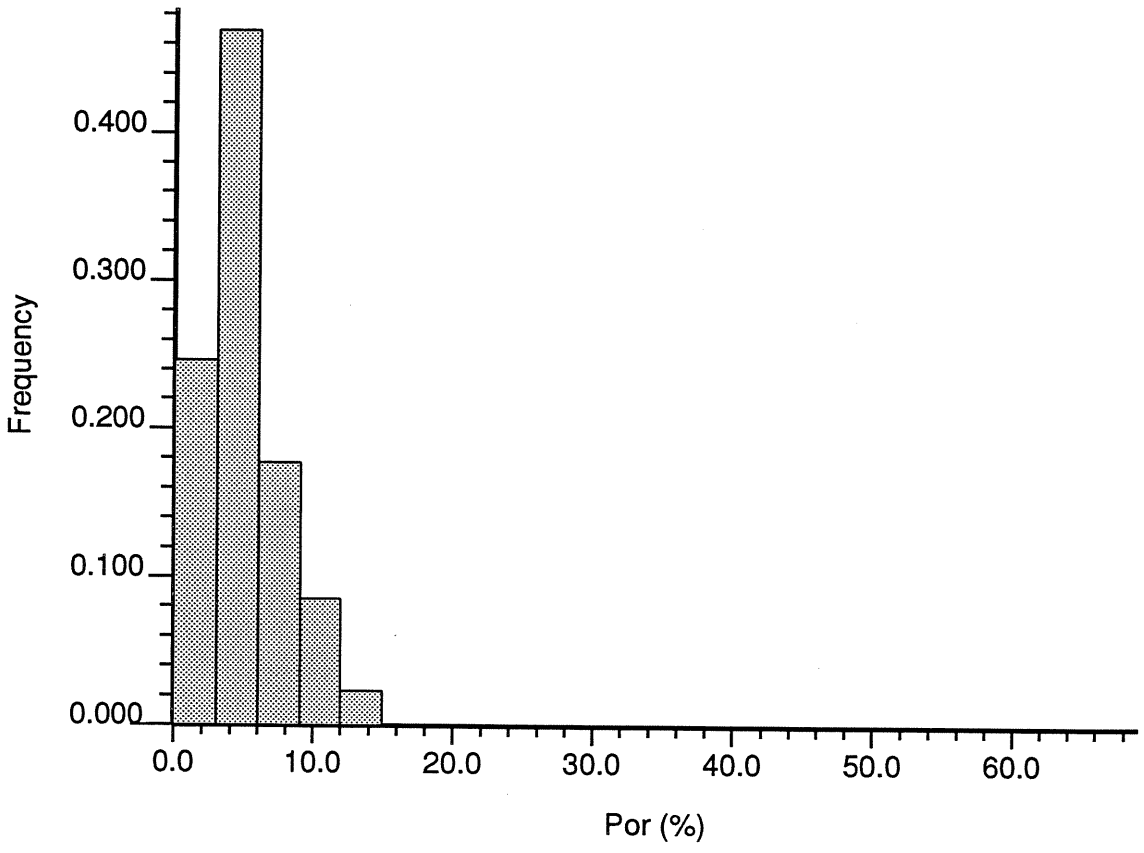
Geometric average:	0.08 mD
Aritmetric average:	1.51 mD
Harmonic average:	0.02 mD



5.2.2 GANE#1, Porosity

Porosity:

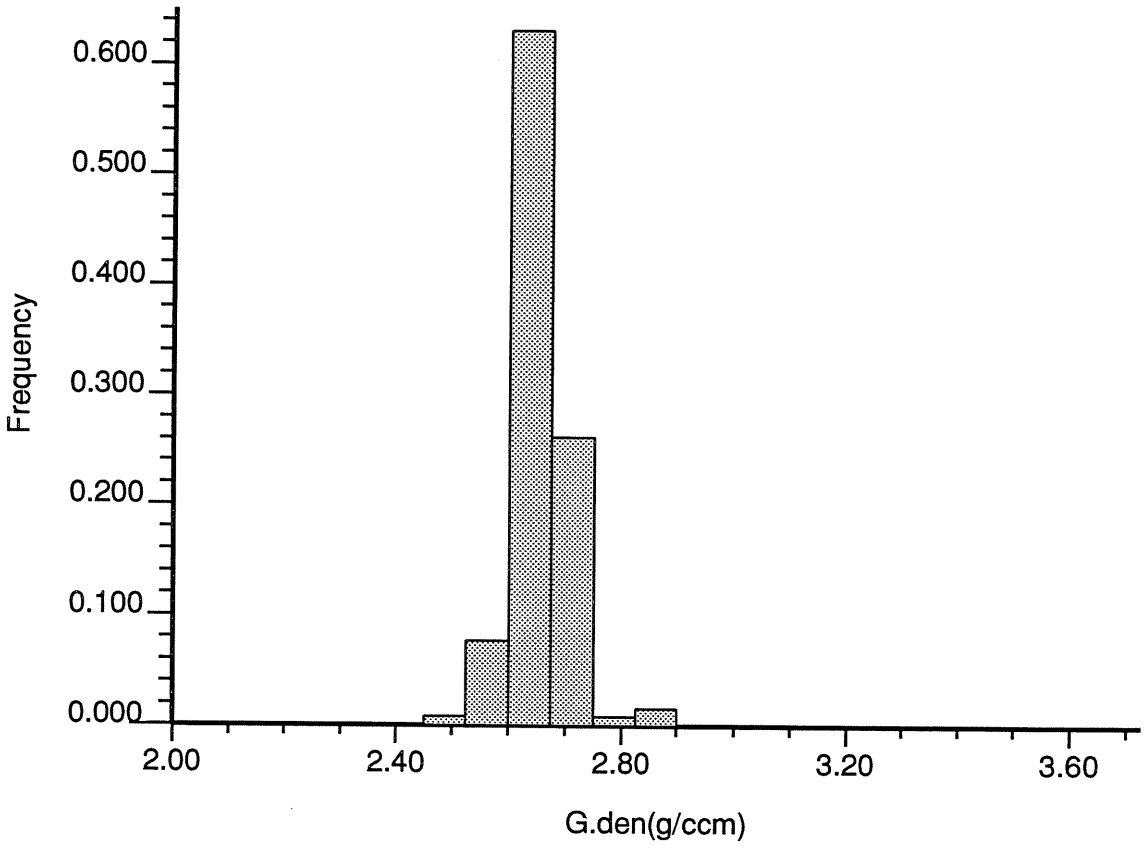
Mean porosity:	5.41 %
Variance on porosity:	8.25 %^{2}



5.2.3 GANE#1, Grain density

Grain density:

Mean grain density:	2,66	%
Variance on mean gr. den.:	0,01	$\%^2$



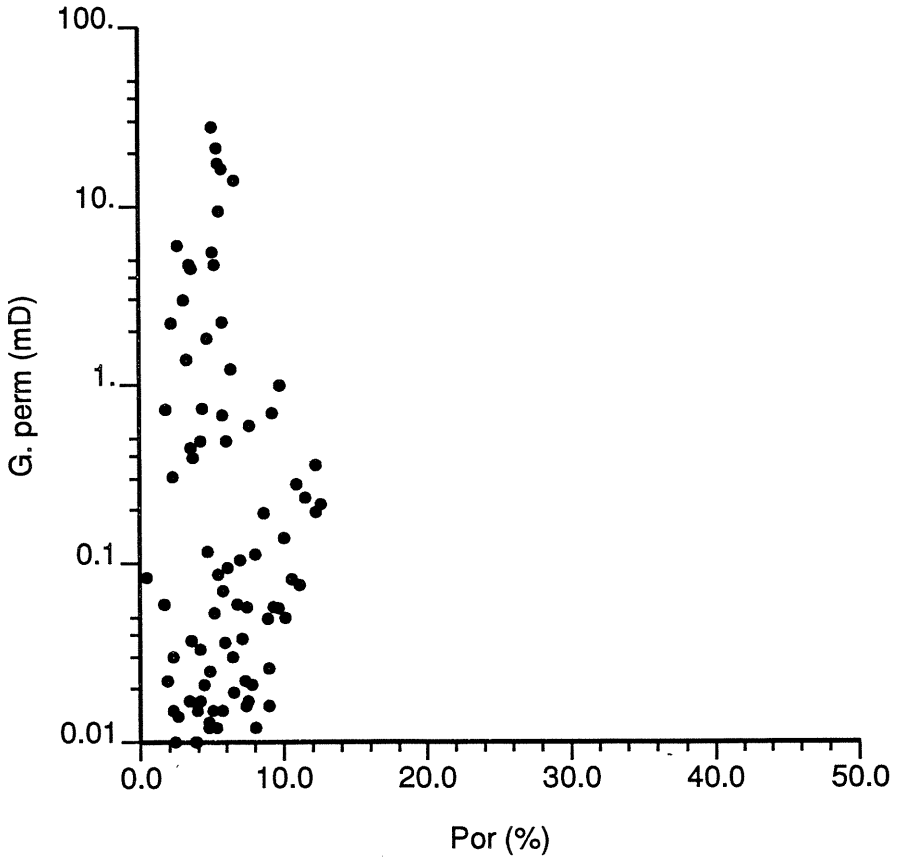
5.2.4 GANE#1, Porosity vs. gas permeability

Statistics calculated from linear regression of permeability on porosity:

Model: Log10(Permeability) = Intercept + Slope * Porosity + Residual

Degrees of freedom:	99
Coefficient of determination:	0.041
Standard error on the regression:	1.027 log(mD)
Estimated intercept:	-1.486 log(mD)
Estimated standard error of intercept :	0.219 log (mD)
Estimated slope:	0.07383 log(mD)/%
Estimated standard error of slope:	0.03576 log(mD)/%

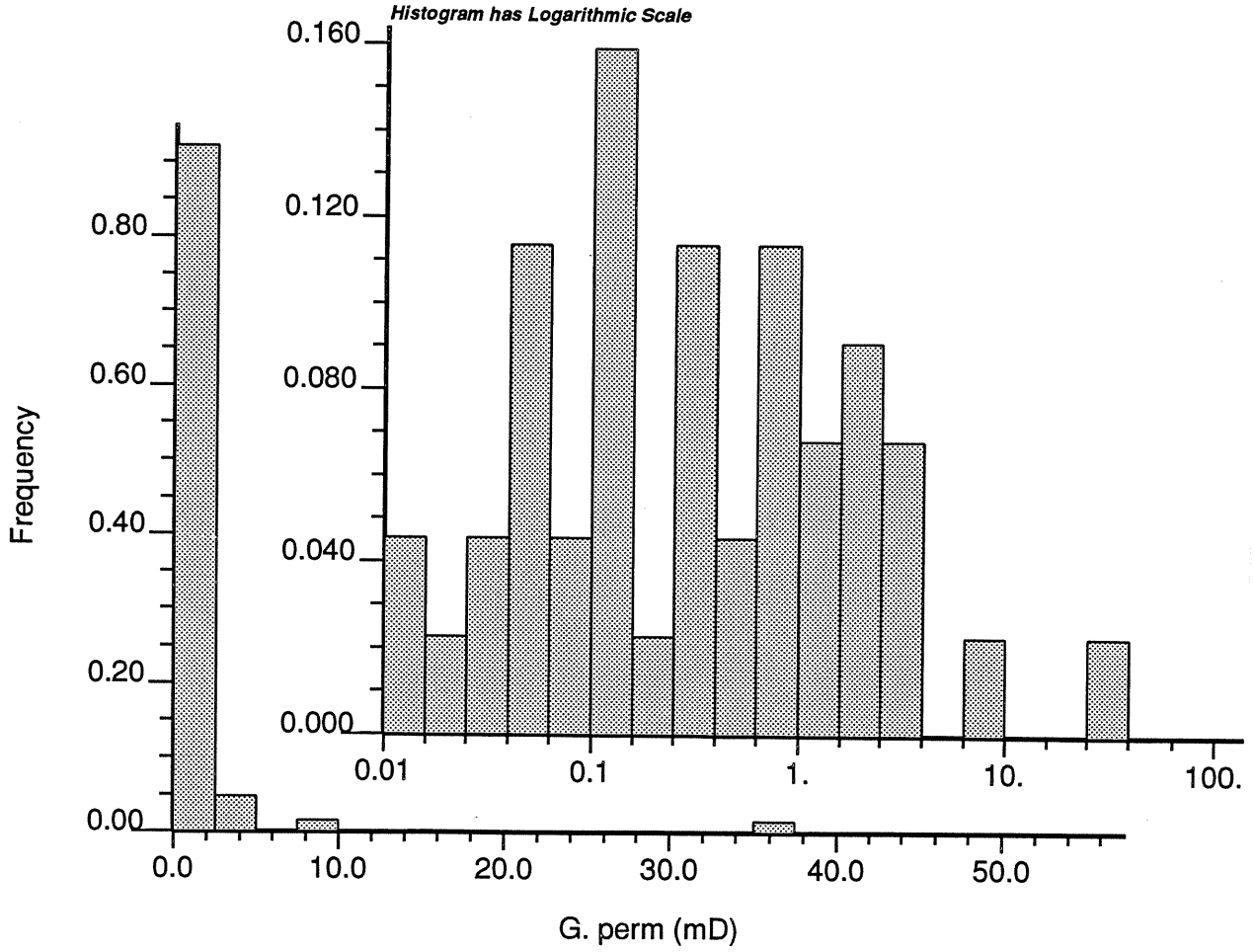
Please note that the regression statistics pertain to log permeability values.
The coefficient of determination gives the fraction of the total variation squared which is explained by the mode. The standard error on the regression gives the mean 1 sigma error on the log permeability estimates.



5.2.5 GANE#1A, Gas permeability

Permeability:

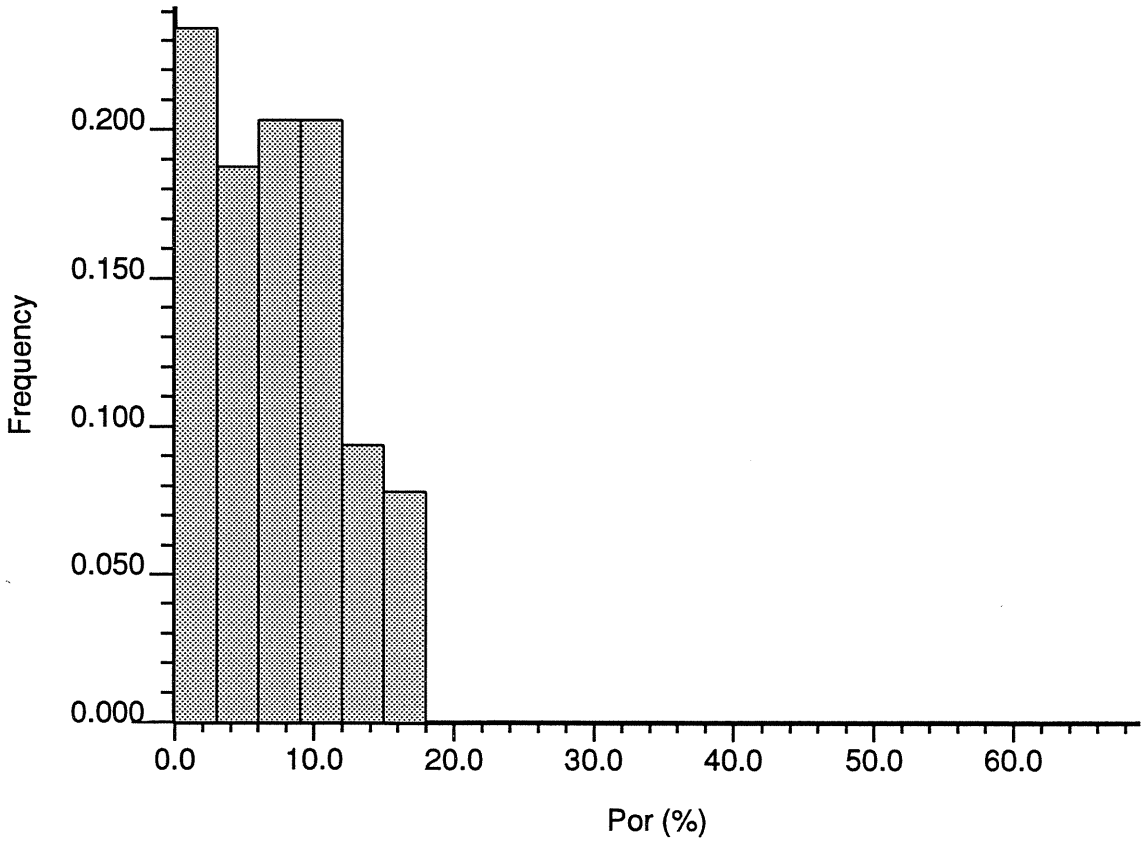
Geometric average:	0,16 mD
Aritmetric average:	1,36 mD
Harmonic average:	0,03 mD



5.2.6 GANE#1A, Porosity

Porosity:

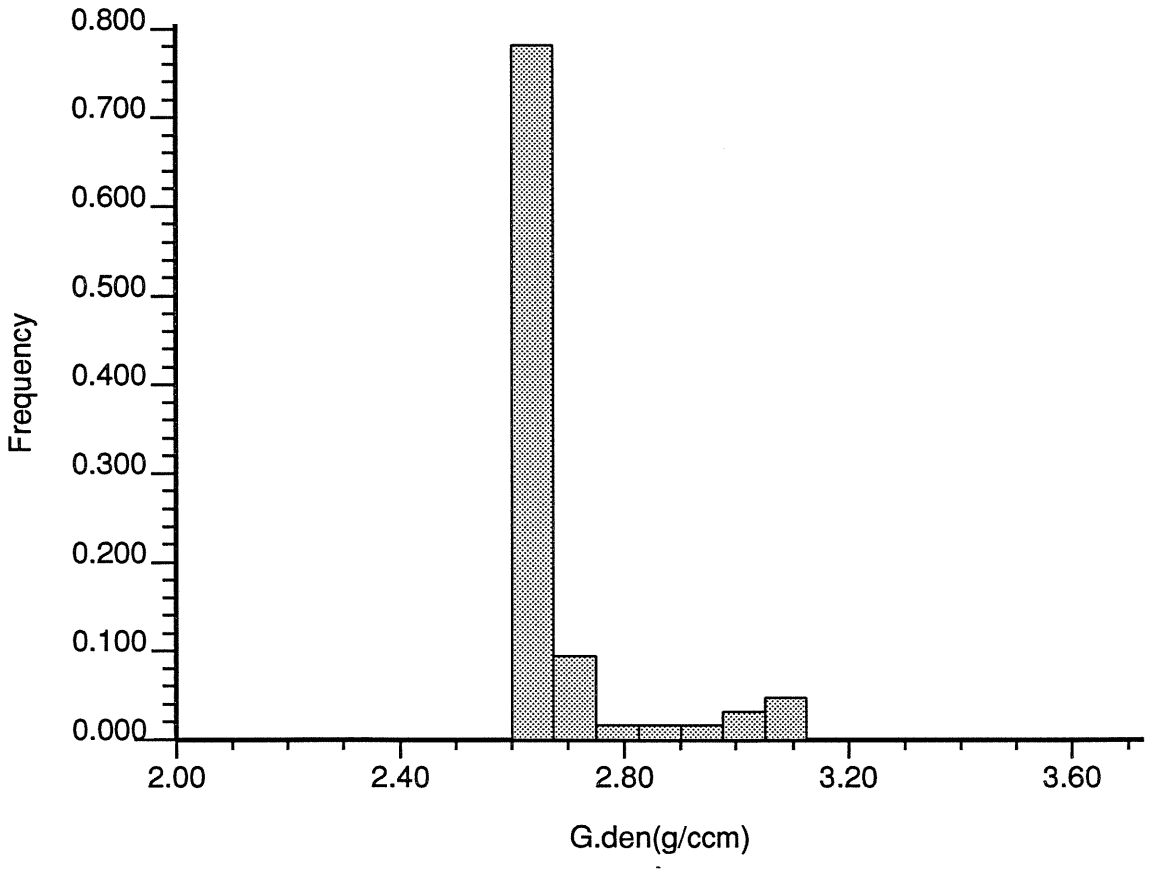
Mean porosity:	8,48 %
Variance on porosity:	16,96 $\%^2$



5.2.7 GANE#1A, Gain density

Grain density:

Mean grain density:	2,69 %
Variance on mean gr. den.:	0,01 %^{2}



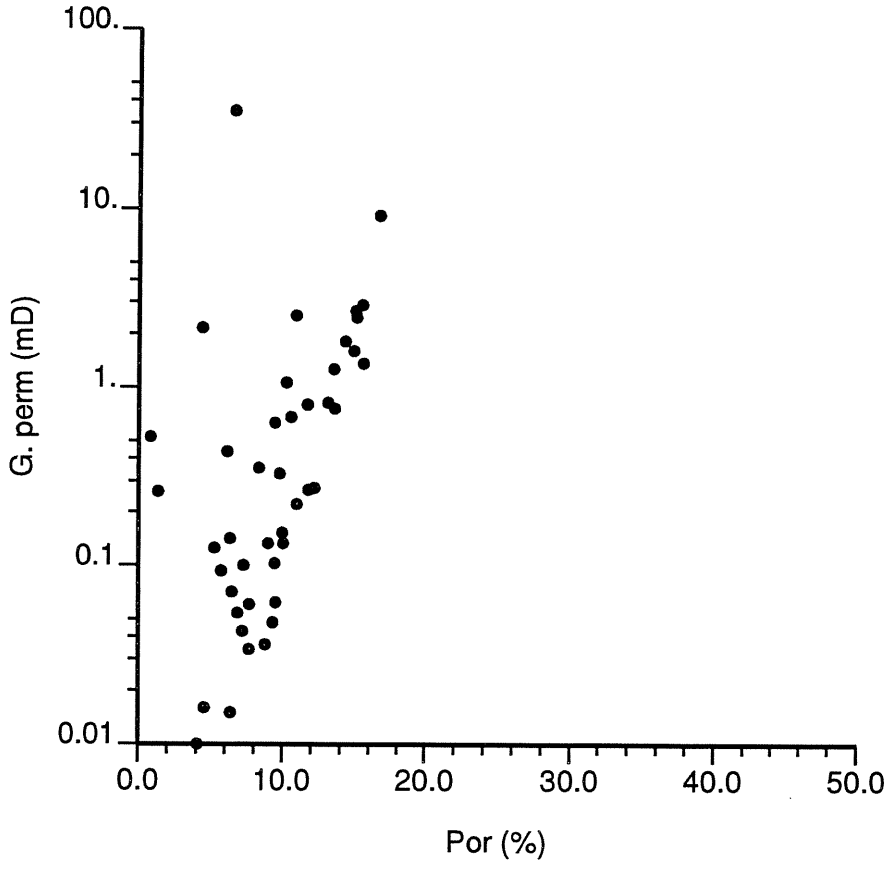
5.2.8 GANE#1A, Porosity vs. gas permeability

Statistics calculated from linear regression of permeability on porosity:

Model: Log10(Permeability) = Intercept + Slope * Porosity + Residual

Degrees of freedom:	51
Coefficient of determination:	0,464
Standard error on the regression:	0,707 log(mD)
Estimated intercept:	-2,146 log(mD)
Estimated standard error of intercept :	0,224 log (mD)
Estimated slope:	0,15809 log(mD)/%
Estimated standard error of slope:	0,02379 log(mD)/%

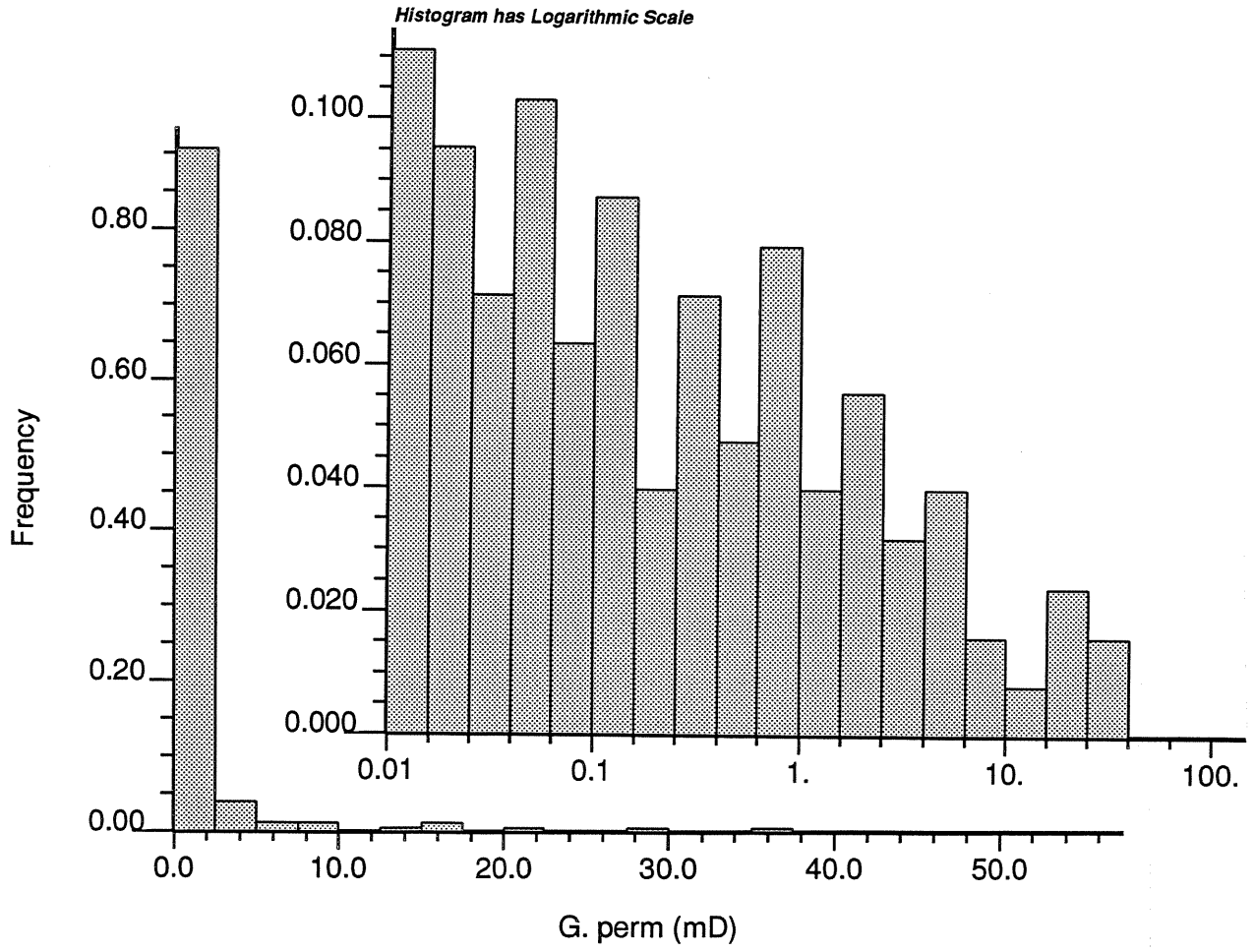
Please note that the regression statistics pertain to log permeability values.
The coefficient of determination gives the fraction of the total variation squared which is explained by the mode. The standard error on the regression gives the mean 1 sigma error on the log permeability estimates.



5.2.9 GANE#1+1A, Gas permeability

Permeability:

Geometric average:	0,10 mD
Aritmetric average:	1,46 mD
Harmonic average:	0,02 mD

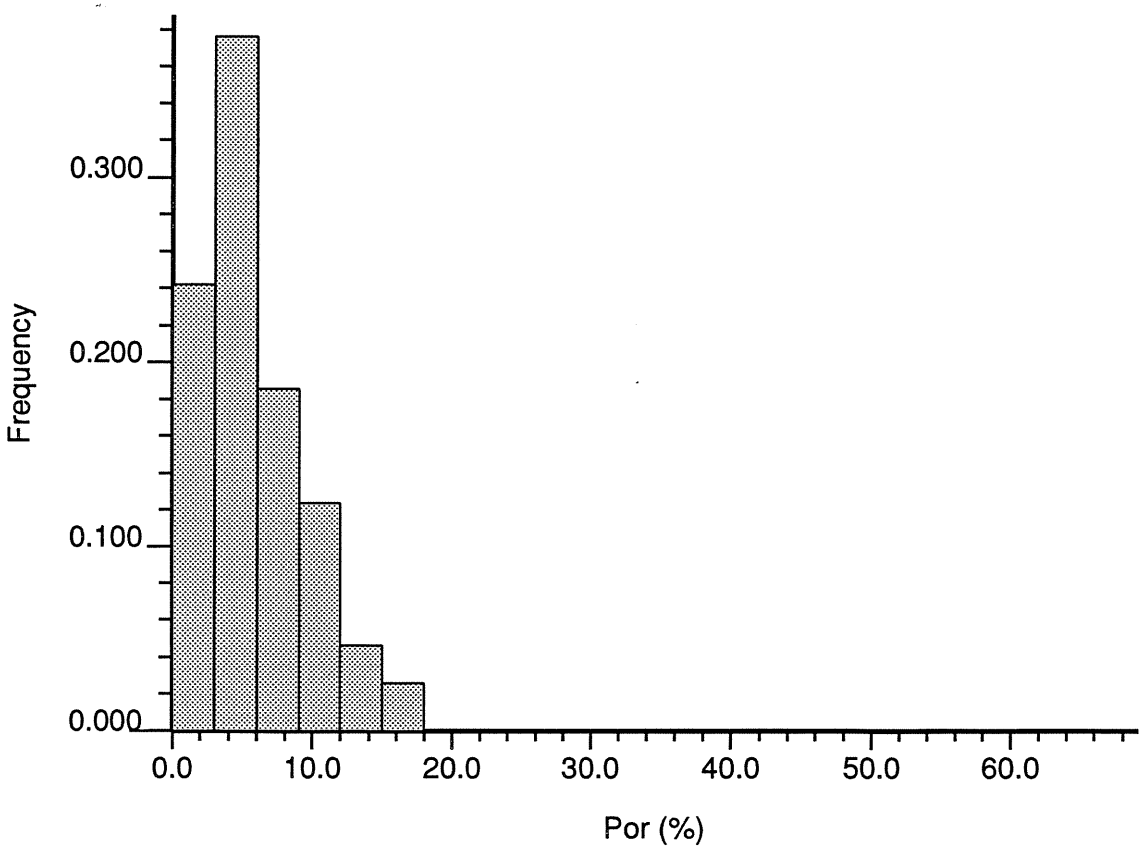


5.2.10 GANE#1+1A, Porosity

Porosity:

Mean porosity: 6,46 %

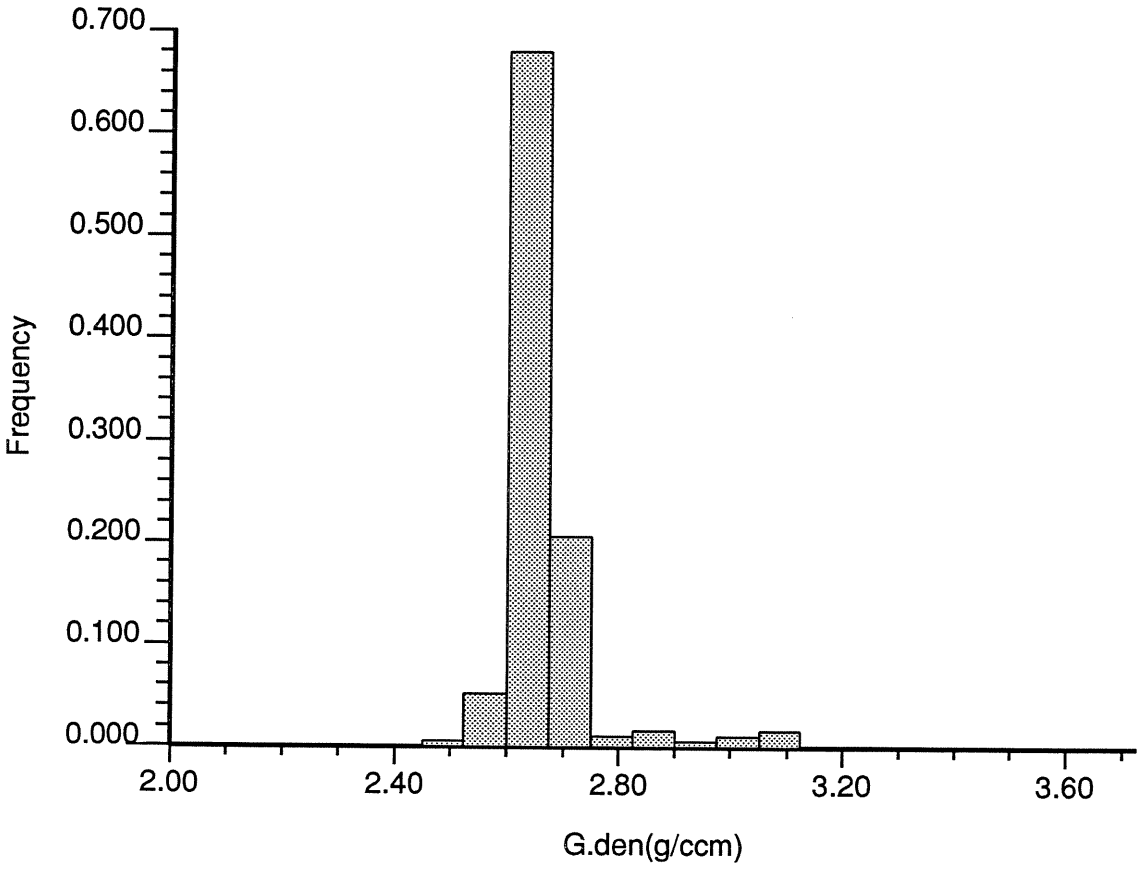
Variance on porosity: 13,29 %^{2}



5.2.11 GANE#1+1A, Grain density

Grain density:

Mean grain density:	2,67	%
Variance on mean gr. den.:	0,01	$\%^2$



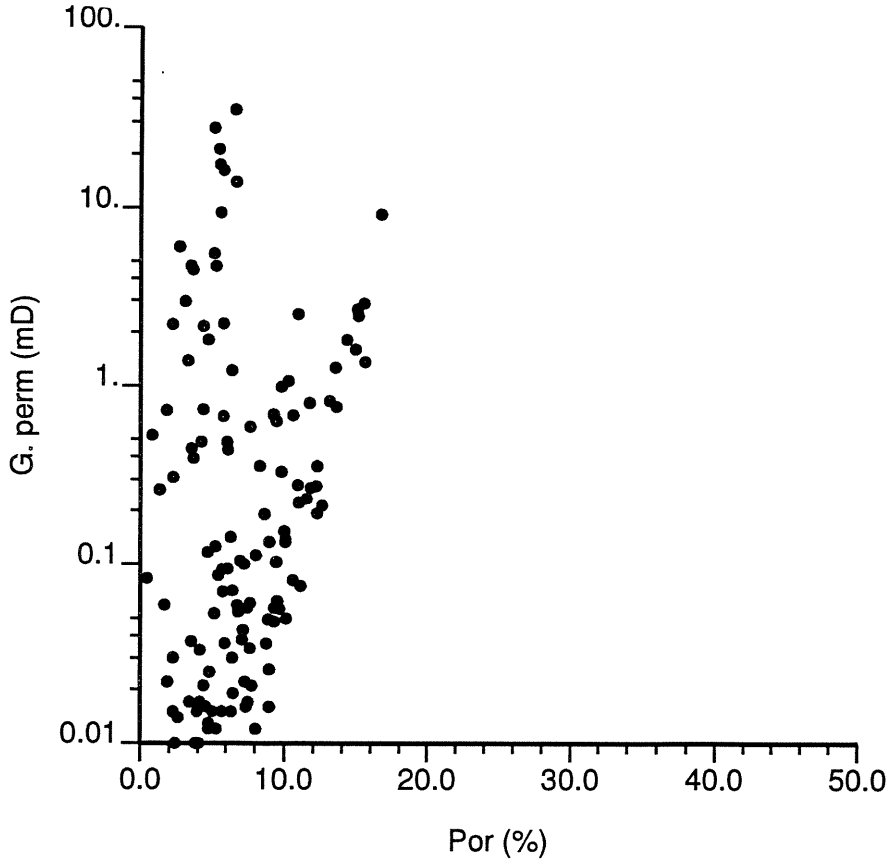
5.2.12 GANE#1+1A, Porosity vs. gas permeability

Statistics calculated from linear regression of permeability on porosity:

Model: Log10(Permeability) = Intercept + Slope * Porosity + Residual

Degrees of freedom:	152
Coefficient of determination:	0,164
Standard error on the regression:	0,936 log(mD)
Estimated intercept:	-1,722 log(mD)
Estimated standard error of intercept :	0,154 log (mD)
Estimated slope:	0,11319 log(mD)/%
Estimated standard error of slope:	0,02075 log(mD)/%

Please note that the regression statistics pertain to log permeability values.
The coefficient of determination gives the fraction of the total variation squared which is explained by the mode. The standard error on the regression gives the mean 1 sigma error on the log permeability estimates.



6. Appendix, data tabulation

6.1 Laboratory analysis, GANE#1

General information on the analysis:

Company:	GEUS	Location:	Greenland
Depth interval:	487.28-636.86	Core no. :	156-204
Depths are measured from:	KB	Analysts:	GG,HJL,MJ,LB,PET,GA
Depths are in:	METRES	Date:	301296
Well:	GANE1		

REMARKS :
If "boblepermflow" are written as 0.0ml/300sec if less than 0.1ml/100s. I.e. 0 mD
Data not measured: "-"

The Geological Survey of Denmark and Greenland is fully responsible for the analytical results in the present report. The survey, however, bears no responsibility for decisions and interpretations based on the data presented.

Sample no.	Depth m	Plug type	Gas perm mD	Porosity %	Density g/ccm
740	487,78	Hor	21,2	5,42	2,690
741	488,78	Hor	27,8	5,09	2,695
742	489,80	Hor	16,1	5,79	2,640
743	491,03	Hor	17,4	5,51	2,676
744	491,94	Hor	4,71	5,25	2,774
745	492,94	Hor	5,53	5,10	2,613
746	494,21	Hor	2,96	3,10	2,711
747	495,21	Hor	4,71	3,50	2,620
748	496,28	Hor	0,042	0,44	2,677
749	500,67	Hor	0,047	6,11	2,667
750	501,86	Hor	-	6,00	2,618
751	505,01	Hor	-	1,55	2,675
752	514,35	Hor	0,104	6,96	2,672
753	515,15	Hor	0,59	7,67	2,666
754	516,47	Hor	-	-	-
755	516,76	Hor	-	11,06	2,852
756	518,18	Hor	-	5,28	2,630
757	519,00	Hor	0	0,70	2,669
758	519,78	Hor	0	3,60	2,662
759	520,44	Hor	-	4,25	2,621
760	521,55	Hor	6,03	2,71	2,574
761	522,60	Hor	0,014	2,59	2,577
762	523,61	Hor	0,005	1,82	2,698
763	524,76	Hor	0,005	4,87	2,710
764	526,18	Hor	0,005	3,03	2,699
765	527,18	Hor	0,732	4,33	2,623
766	528,12	Hor	0,008	5,55	2,660
767	529,12	Hor	0,013	4,74	2,654
768	530,52	Hor	0,015	5,71	2,692
769	530,70	Hor	0,015	2,28	2,652
770	532,33	Hor	0,728	1,80	2,588
771	532,88	Hor	0,022	1,90	2,599
772	534,15	Hor	0,004	1,32	2,669
773	535,27	Hor	1,38	3,29	2,608
774	535,53	Hor	0,006	0,46	2,691
775	538,81	Hor	0,037	3,54	2,660
776	539,66	Hor	2,2	2,22	2,606
777	540,06	Hor	0,307	2,28	2,547
778	540,69	Hor	-	3,57	2,632
779	541,95	Hor	0	0,43	2,689
780	542,88	Hor	0,03	2,28	2,601
781	545,14	Hor	-	4,71	2,617
782	545,57	Hor	4,47	3,65	2,622
783	546,74	Hor	9,37	5,59	2,574
784	547,88	Hor	0	3,23	2,678
785	548,72	Hor	-	3,51	2,631
786	549,78	Hor	0,057	7,46	2,642
787	550,84	Hor	0,026	8,98	2,645
788	552,13	Hor	0,016	8,95	2,676

Sample no.	Depth m	Plug type	Gas perm mD	Porosity %	Density g/ccm
789	556,16	Hor	0,012	5,32	2,688
790	555,05	Hor	0,03	6,43	2,662
791	556,19	Hor	0,049	8,90	2,653
792	557,24	Hor	0,059	6,76	2,646
793	558,53	Hor	0,082	10,59	2,654
794	559,97	Hor	0,214	12,57	2,648
795	560,58	Hor	0,057	9,35	2,673
796	561,81	Hor	0,016	7,40	2,675
797	562,75	Hor	0,017	4,17	2,659
798	563,84	Hor	-	7,46	2,629
799	567,41	Hor	0,009	2,18	2,693
800	566,93	Hor	0,012	8,07	2,743
801	569,06	Hor	0,01	2,41	2,691
802	570,00	Hor	0,009	5,07	2,660
803	570,10	Hor	-	5,27	2,632
804	570,60	Hor	0,009	4,28	2,687
805	570,98	Hor	0,005	0,57	2,681
806	572,26	Hor	0,986	9,78	2,644
807	572,73	Hor	0,69	9,22	2,645
808	573,08	Hor	2,24	5,77	2,629
809	574,88	Hor	0,481	6,05	2,602
810	574,99	Hor	0,393	3,70	2,614
811	576,60	Hor	0,442	3,57	2,593
812	577,31	Hor	-	4,04	2,680
813	578,06	Hor	0,002	0,91	2,670
814	578,70	Hor	0,005	1,18	2,668
815	579,40	Hor	0,004	4,48	2,652
816	580,47	Hor	0,67	5,77	2,641
817	581,49	Hor	0,059	1,67	2,679
818	594,28	Hor	0	1,34	2,669
819	594,37	Hor	0	1,59	2,662
820	595,99	Hor	0	2,30	2,618
821	597,06	Hor	-	1,70	2,695
822	598,53	Hor	1,22	6,37	2,857
823	598,94	Hor	0	0,48	2,674
824	599,19	Hor	0	0,43	2,688
825	599,79	Hor	0,01	3,80	2,667
826	600,23	Hor	0,007	3,73	2,666
827	600,33	Hor	0,004	4,36	2,690
828	601,79	Hor	0,004	3,29	2,670
829	602,69	Hor	13,9	6,67	2,518
830	602,72	Hor	0,009	5,29	2,649
831	603,58	Hor	0,01	3,87	2,703
832	604,53	Hor	0,015	5,03	2,644
833	604,77	Hor	0,485	4,24	2,643
834	605,63	Hor	1,8	4,72	2,559
835	607,21	Hor	0,017	3,40	2,593
836	608,12	Hor	0,012	4,73	2,628
837	608,13	Hor	0,025	4,86	2,604
838	608,73	Hor	0,036	5,91	2,654

Sample no.	Depth m	Plug type	Gas perm mD	Porosity %	Density g/ccm
839	609,03	Hor	0,056	9,68	2,718
840	609,23	Hor	0,113	8,04	2,639
841	609,49	Hor	0,038	7,08	2,678
842	610,73	Hor	0,004	2,01	2,715
843	611,09	Hor	-	3,18	2,674
844	611,60	Hor	0,021	4,41	2,632
845	612,85	Hor	0,015	3,97	2,671
846	613,36	Hor	0,008	2,25	2,680
847	613,96	Hor	0	2,66	2,625
848	615,71	Hor	0,355	12,26	2,655
849	616,02	Hor	0,234	11,56	2,652
850	617,43	Hor	0	2,88	2,606
851	618,27	Hor	0,116	4,66	2,636
852	618,87	Hor	0,138	10,03	2,644
853	619,55	Hor	0,191	8,63	2,649
854	621,28	Hor	0,194	12,27	2,654
855	621,80	Hor	0,278	10,91	2,649
856	623,32	Hor	0	3,18	2,694
857	623,78	Hor	0,021	7,77	2,679
858	625,19	Hor	0,033	4,15	2,626
859	626,82	Hor	0	4,06	2,694
860	627,35	Hor	0,07	5,76	2,659
861	627,75	Hor	0,087	5,42	2,640
862	628,23	Hor	0,053	5,15	2,633
863	628,73	Hor	0,019	6,49	2,658
864	629,04	Hor	0	4,79	2,743
865	629,44	Hor	0,022	7,31	2,693
866	630,92	Hor	0,076	11,10	2,663
867	631,36	Hor	0,05	10,13	2,644
868	632,90	Hor	0	3,15	2,629
869	635,22	Hor	0,017	7,54	2,640
870	635,72	Hor	0	1,39	2,596

6.2 Laboratory analysis , GANE#1A

General information on the analysis:

Company:	GEUS	Location:	Greenland
Depth interval:	636.02 - 706.68	Core no. :	206 - 258
Depths are measured from:	KB	Analysts:	GG,HJL,MJ,LB,PET,GA
Depths are in:	METRES	Date:	301296
Well:	GANE1A		

REMARKS :
If "boblepermflow" are written as 0.0ml/300sec if less than 0.1ml/100s. I.e. 0 mD
Data not measured: "-"

The Geological Survey of Denmark and Greenland is fully responsible for the analytical results in the present report. The survey, however, bears no responsibility for decisions and interpretations based on the data presented.

Sample no.	Depth m	Plug type	Gas perm mD	Porosity %	Density g/ccm
871	633,23	Hor	0,006	3,52	2,635
872	635,42	Hor	0,006	5,40	2,663
873	363,15	Hor	0	2,54	2,617
874	637,59	Hor	0	2,62	2,656
875	644,11	Hor	0,016	4,57	2,610
876	645,23	Hor	0,44	6,12	2,611
877	646,36	Hor	0,061	7,62	2,673
878	646,51	Hor	0,015	6,38	2,669
879	646,78	Hor	0,043	7,14	2,688
880	646,88	Hor	35,1	6,56	2,715
881	647,27	Hor	0,259	1,31	2,683
882	648,89	Hor	0,007	3,87	2,623
883	649,48	Hor	2,15	4,35	2,608
884	651,09	Hor	0	1,23	2,662
885	651,29	Hor	0,524	0,83	2,670
886	653,07	Hor	0	1,14	2,649
887	654,41	Hor	0	0,91	2,972
888	654,78	Hor	0,005	2,60	2,695
889	656,79	Hor	0,006	3,47	2,607
890	657,44	Hor	0,01	4,07	2,616
891	358,09	Hor	0,007	4,15	2,631
892	658,61	Hor	0	0,65	2,792
893	659,17	Hor	0,003	2,31	2,693
894	660,68	Hor	0,007	5,36	2,612
895	661,25	Hor	0,008	4,37	2,606
896	662,10	Hor	0,126	5,20	2,650
897	663,51	Hor	0,103	9,48	2,674
898	664,81	Hor	9,08	16,76	2,650
899	665,44	Hor	2,47	15,13	2,649
900	666,58	Hor	1,81	14,33	2,850
901	667,43	Hor	2,69	15,08	2,652
902	669,31	Hor	0,681	10,60	2,654
903	670,37	Hor	0,223	11,00	2,679
904	671,48	Hor	2,91	15,52	2,656
905	672,17	Hor	1,37	15,65	2,647
906	673,05	Hor	1,6	14,97	2,653
907	674,46	Hor	0,763	13,58	2,656
908	675,68	Hor	0,817	13,11	2,654
909	676,75	Hor	0,071	6,43	2,650
910	677,71	Hor	1,27	13,57	2,656
911	678,63	Hor	0,273	12,21	2,659
912	679,86	Hor	-	12,11	2,540
913	680,78	Hor	-	20,55	2,594
914	681,62	Hor	0,8	11,71	2,608
915	682,26	Hor	0,054	6,83	2,659
916	683,74	Hor	0,036	8,75	2,660
917	684,26	Hor	0,134	8,95	2,656
918	685,03	Hor	0,133	10,05	2,655
919	686,00	Hor	0,154	10,02	2,649

Sample no.	Depth m	Plug type	Gas perm mD	Porosity %	Density g/ccm
920	687,11	Hor	0,266	11,81	2,648
921	688,07	Hor	0,062	9,54	2,648
922	688,96	Hor	0	0,28	2,995
923	690,90	Hor	0	0,15	2,989
924	691,84	Hor	0	0,23	3,066
925	693,18	Hor	-	12,27	2,691
926	694,34	Hor	0	0,53	3,056
927	695,23	Hor	0	0,24	3,111
928	696,59	Hor	0,048	9,35	2,655
929	697,41	Hor	0,034	7,61	2,651
930	698,46	Hor	0,101	7,24	2,656
931	699,29	Hor	0,353	8,32	2,650
932	700,62	Hor	1,06	10,25	2,638
933	701,86	Hor	0,094	5,73	2,653
934	702,60	Hor	0,328	9,82	2,644
935	703,71	Hor	0,143	6,30	2,672
936	704,92	Hor	0,635	9,43	2,647
937	706,20	Hor	2,54	10,93	2,642