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LAMPIRAN

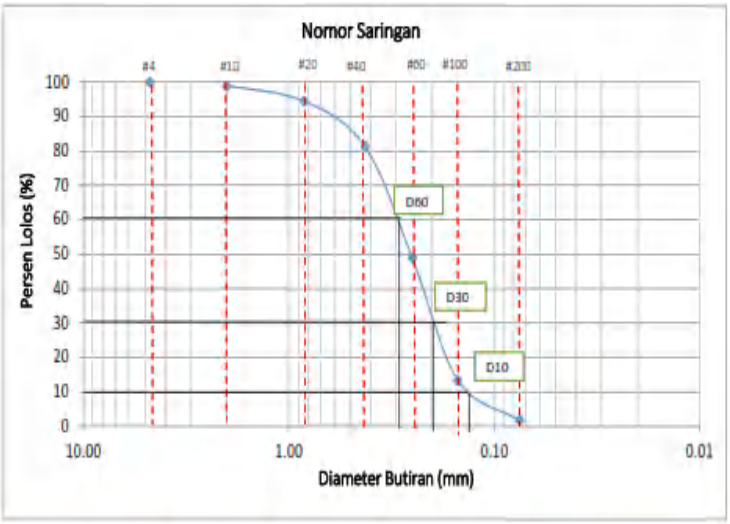
Lampiran 1 Data Pengujian Aalisa Saringan

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 2 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 2	Tanggal	: September 2023

Berat Tanah Kering		300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.34	0.34	0.1	99.9
10	2.000	3.41	3.75	1.3	98.8
20	0.840	13.18	16.93	5.6	94.4
40	0.425	39.51	56.44	18.8	81.2
60	0.250	96.73	153.17	51.1	48.9
100	0.150	106.88	260.05	86.7	13.3
200	0.075	34.89	294.94	98.3	1.7
Pan	-	5.06	300	100.0	0.0



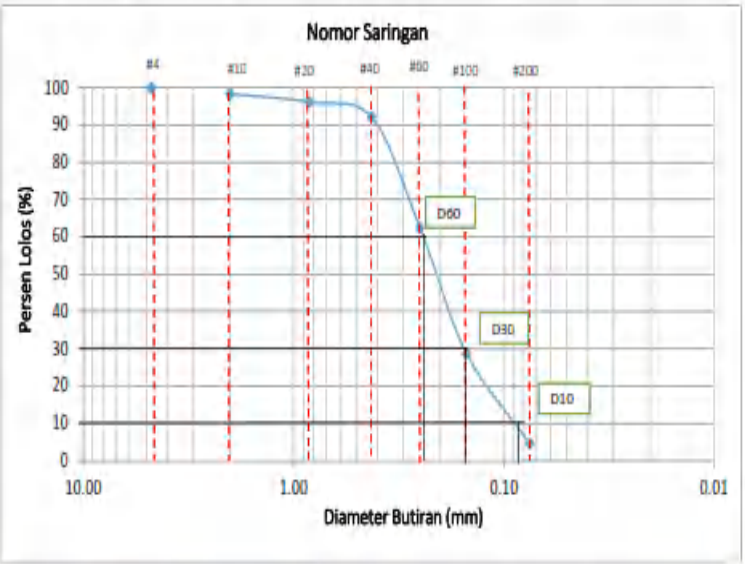
Rekapitulasi	D10	D30	D60	Cu	Cc
	0.129 mm	0.197 mm	0.310 mm	2.410	0.972

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 3 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 3	Tanggal	: September 2023

Berat Tanah Kering		300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.4	0.4	0.1	99.9
10	2.000	4.66	5.06	1.7	98.3
20	0.840	6.45	11.51	3.8	96.2
40	0.425	12.21	23.72	7.9	92.1
60	0.250	88.96	112.68	37.6	62.4
100	0.150	101.48	214.16	71.4	28.6
200	0.075	72.02	286.18	95.4	4.6
Pan	-	13.82	300	100.0	0.0



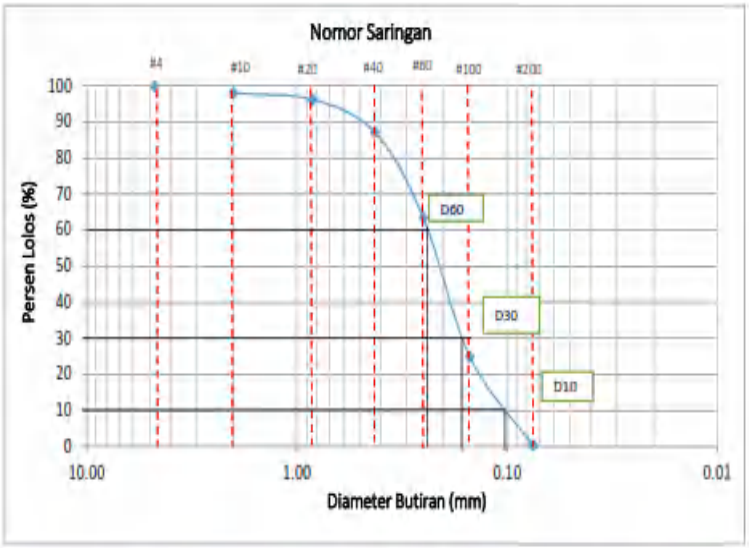
Rekapitulasi	D10	D30	D60	Cu	Cc
	0.092 mm	0.154 mm	0.243 mm	2.643	1.065

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 4 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 4	Tanggal	: September 2023

Berat Tanah Kering		300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.43	0.43	0.1	99.9
10	2.000	5.63	6.06	2.0	98.0
20	0.840	5.45	11.51	3.8	96.2
40	0.425	27.2	38.71	12.9	87.1
60	0.250	70.76	109.47	36.5	63.5
100	0.150	116.11	225.58	75.2	24.8
200	0.075	73.4	298.98	99.7	0.3
Pan	-	1.02	300	100.0	0.0



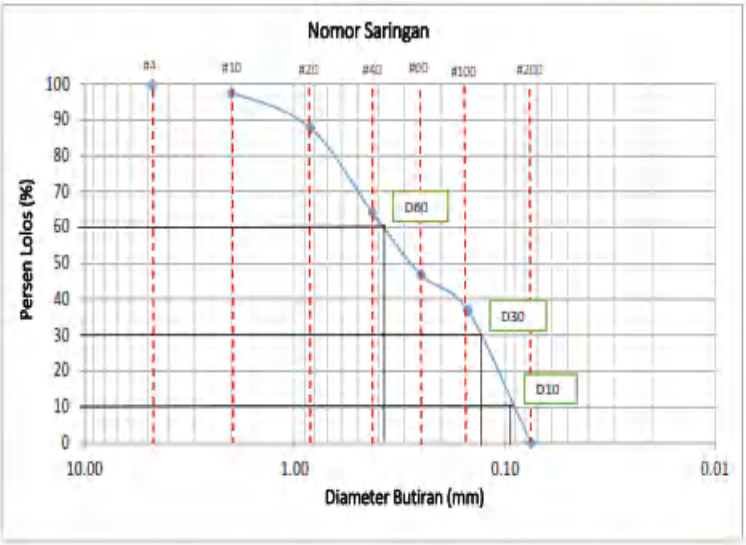
Rekapitulasi	D10	D30	D60	Cu	Cc
	0.105 mm	0.163 mm	0.241 mm	2.303	1.060

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 5 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 5	Tanggal	: Septembers 2023

Berat Tanah Kering		300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.85	0.85	0.3	99.7
10	2.000	6.77	7.62	2.5	97.5
20	0.840	29.2	36.82	12.3	87.7
40	0.425	70.91	107.73	35.9	64.1
60	0.250	51.91	159.64	53.2	46.8
100	0.150	29.55	189.19	63.1	36.9
200	0.075	110.68	299.87	100.0	0.0
Pan	-	0.13	300	100.0	0.0



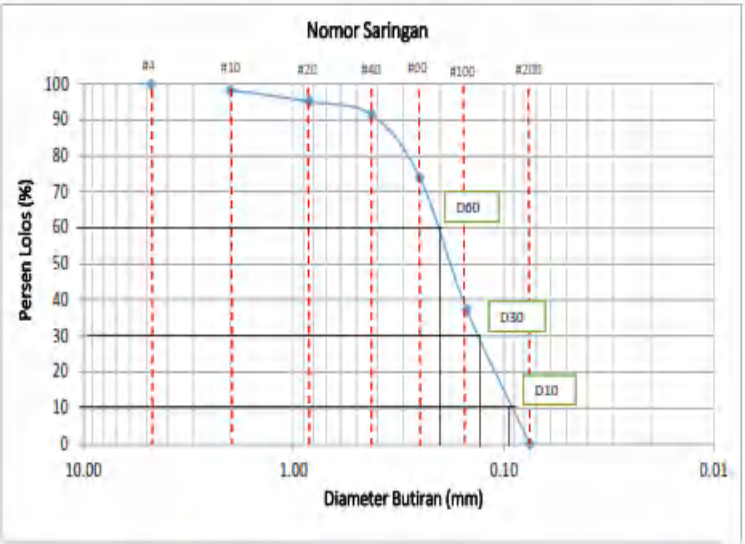
Rekapitulasi	D10	D30	D60	Cu	Cc
	0.095 mm	0.136 mm	0.384 mm	4.028	0.505

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 6 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 6	Tanggal	: Septembers 2023

Berat Tanah Kering		300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.66	0.66	0.2	99.8
10	2.000	4.76	5.42	1.8	98.2
20	0.840	9.2	14.62	4.9	95.1
40	0.425	11.02	25.64	8.5	91.5
60	0.250	52.8	78.44	26.1	73.9
100	0.150	109.5	187.94	62.6	37.4
200	0.075	111.89	299,83	99.9	0.1
Pan	-	0.17	300	100.0	0.0



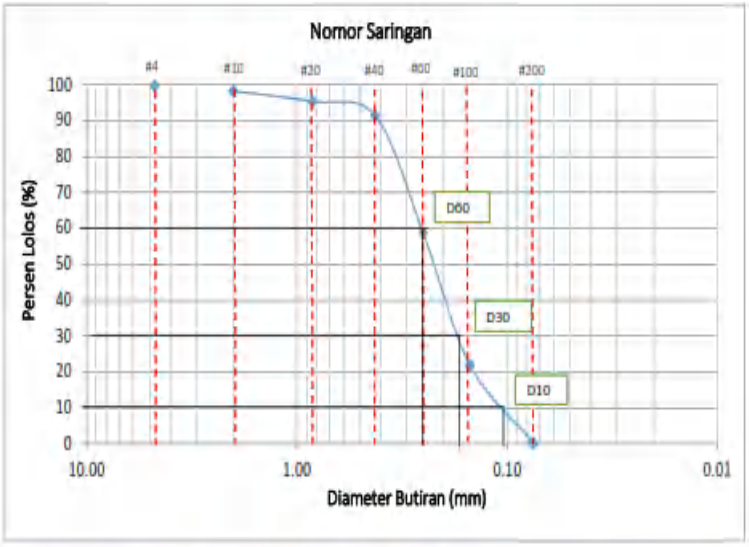
Rekapitulasi	D10	D30	D60	Cu	Cc
	0.095 mm	0.135 mm	0.212 mm	2.232	0.908

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 9 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 9	Tanggal	: Septembers 2023

Berat Tanah Kering		300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.89	0.89	0.3	99.7
10	2.000	4.67	5.56	1.9	98.1
20	0.840	8.46	14.02	4.7	95.3
40	0.425	11.51	25.53	8.5	91.5
60	0.250	98.56	124.09	41.4	58.6
100	0.150	110.23	234.32	78.1	21.9
200	0.075	64.83	299.15	99.7	0.3
Pan	-	0.85	300	100.0	0.0



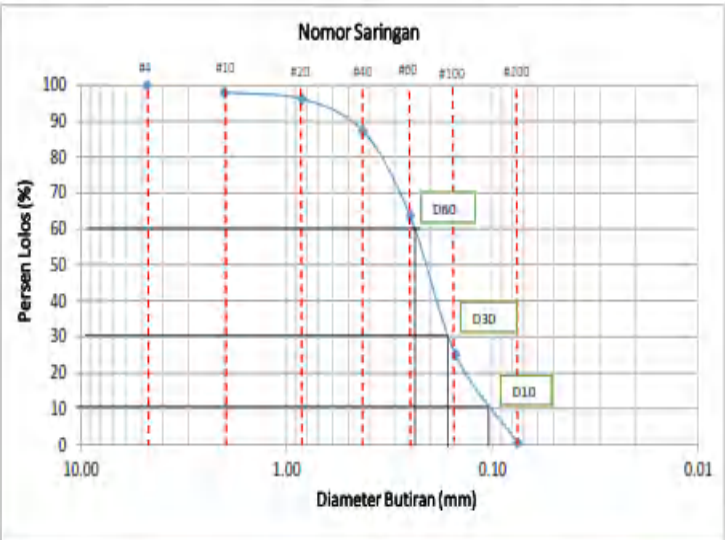
Rekapitulasi	D10	D30	D60	Cu	Cc
	0.109 mm	0.172 mm	0.257 mm	2.366	1.058

HASIL PENGUJIAN ANALISA SARINGAN

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 10 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar 10	Tanggal	: Septembers 2023

Berat Tanah Kering	300 gram

Saringan No.	Diameter (mm)	Berat Tertahan (gram)	Berat Kumulatif (gram)	Persen (%)	
				Tertahan	Lolos
3"	0.00	0	0	0.0	0.0
2"	0.00	0	0	0.0	0.0
11/2"	0.00	0	0	0.0	0.0
1"	0.00	0	0	0.0	0.0
3/4"	0.00	0	0	0.0	0.0
3/8"	0.000	0	0	0.0	0.0
4	4.750	0.43	0.43	0.1	99.9
10	2.000	5.63	6.06	2.0	98.0
20	0.840	5.56	11.62	3.9	96.1
40	0.425	26.71	38.33	12.8	87.2
60	0.250	71.14	109.47	36.5	63.5
100	0.150	116.11	225.58	75.2	24.8
200	0.075	73.4	298.98	99.7	0.3
Pan	-	1.02	300	100.0	0.0



Rekapitulasi	D10	D30	D60	Cu	Cc
	0.105 mm	0.163 mm	0.241 mm	2.303	1.060

Lampiran 2 Data Pengujian Analisa Hidrometer

HASIL PENGUJIAN ANALISA SARINGAN DAN HIDROMETER

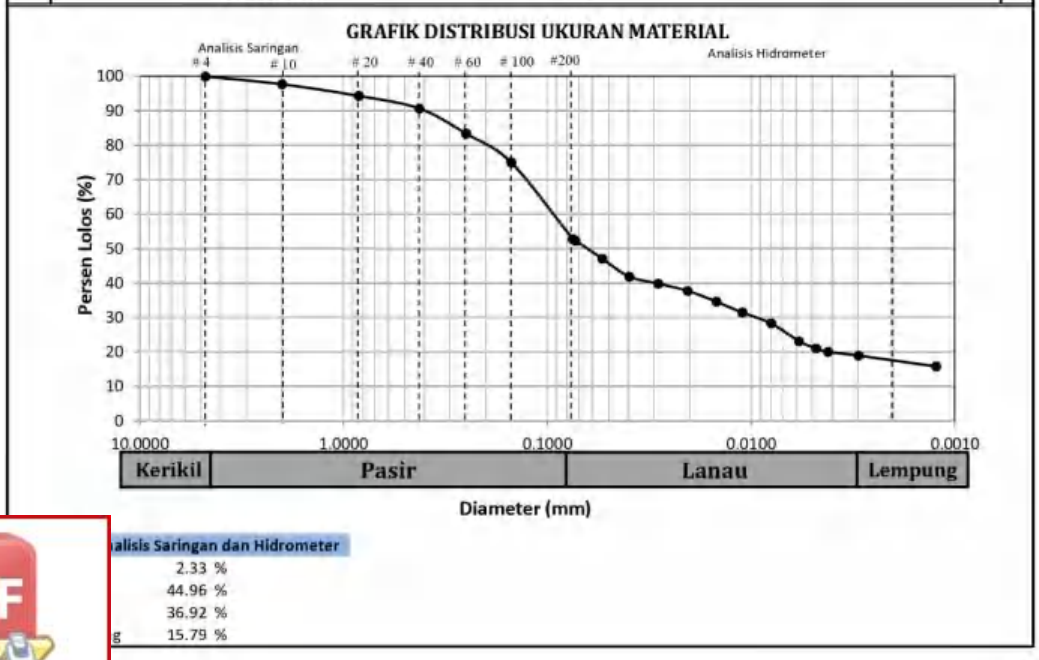
(Sieve-Mechanical and Hydrometer Methods)

Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 0.0 - 1.0 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	Ansar-Hidro 1	Tanggal	: September 2023

Berat Tanah Kering :	300	gram	Berat Jenis (Gs)	2.700	Suhu (T)	28.0	°C

Analisa Saringan						Analisa Hidrometer							
Saringan No.	Diameter (mm)	Berat Tertahan (Gram)	Berat Kumulatif (gram)	Persen Kumulatif Tertahan (%)	Persen Lolos (%)	Waktu (menit)	R	Rcp =R+Ft-Fz	% Lolos = ((a x Rcp)/Ws)x100% * % Lolos Analisa Saringan	RcL= R + Fm	L (cm)	A	D=AvL/t (mm)
4	4.75	0.23	0.23	0.076667	99.9233	0.25	47	50.2	52.3	48	8.60	0.0124	0.0727
10	2	6.77	7	2.333333	97.6667	0.5	42	45.2	47.1	43	9.40	0.0124	0.0538
20	0.84	10.2	17.2	5.733333	94.2667	1	37	40.2	41.9	38	10.20	0.0124	0.0396
40	0.425	10.91	28.11	9.37	90.63	2	35	38.2	39.8	36	10.60	0.0124	0.0285
60	0.25	21.91	50.02	16.67333	83.3267	4	33	36.2	37.7	34	10.90	0.0124	0.0205
100	0.15	25.22	75.24	25.08	74.92	8	30	33.2	34.6	31	11.40	0.0124	0.0148
200	0.075	66.63	141.87	47.29	52.71	15	27	30.2	31.4	28	11.90	0.0124	0.0110
Pan	-	158.13	300	100	0	30	24	27.2	28.3	25	12.40	0.0124	0.0080
						60	19	22.2	23.1	20	13.20	0.0124	0.0058
						90	17	20.2	21.0	18	13.50	0.0124	0.0048
						120	16	19.2	20.0	17	13.70	0.0124	0.0042
						240	15	18.2	18.9	16	13.80	0.0124	0.0030
						1440	12	15.2	15.8	13	14.30	0.0124	0.0012

Berat jenis air terhadap temperatur, $g_{wat\,T}$	=	0.99624
faktor, K = (1000 x Gs x $g_{wat\,T}$)/(10 x Ws(Gs -1))	=	3.1645
Faktor Kt = f(Gs,T)	=	0.0124
Suhu Terkoreksi (Ft) = -4.85 + 0.25 T)	=	2.15
Koreksi Nol (Fz)	=	-1.0
Koreksi Meniskus (Fm)	=	1
Koreksi Berat Jenis	=	0.99



alisis Saringan dan Hidrometer

	2.33 %
	44.96 %
	36.92 %
g	15.79 %

HASIL PENGUJIAN ANALISA SARINGAN DAN HIDROMETER

(Sieve-Mechanical and Hydrometer Methods)

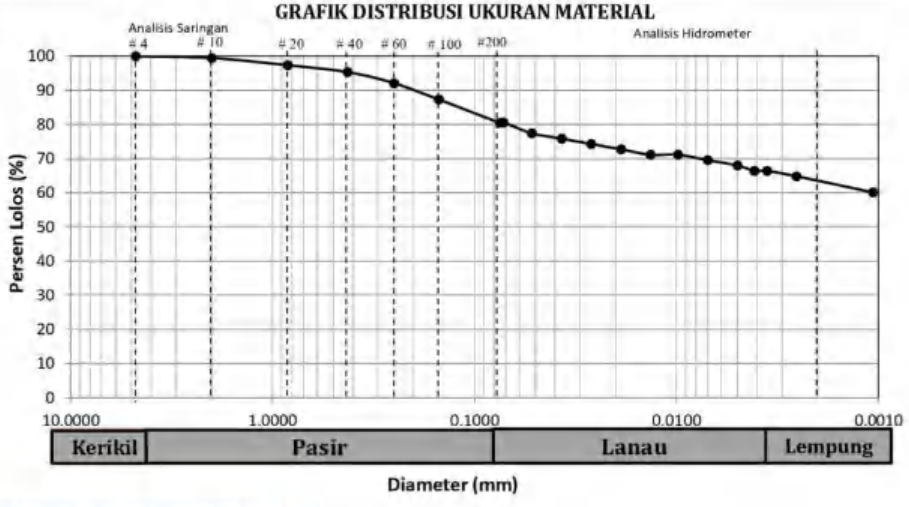
Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 6.1 - 7.0 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	Ansar-Hidro 7	Tanggal	: September 2023

Berat Tanah Kering :	300	gram	Berat Jenis (Gs)	2.748	Suhu (T)	28.0	°C

Analisa Saringan						Analisa Hidrometer							
Saringan No.	Diameter (mm)	Berat Tertahan (Gram)	Berat Kumulatif (gram)	Persen Kumulatif Tertahan (%)	Persen Lolos (%)	Waktu (menit)	R	Rcp =R+Ft-Fz	% Lolos = ((a x Rcp)/Ws)x100% * % Lolos Analisa Saringan	Rcl = R + Fm	L (cm)	A	D=AvL/t (mm)
4	4.75	0.13	0.13	0.043333	99.9567	0.25	48	51.2	80.6	49	8.40	0.0124	0.0719
10	2	1.77	1.9	0.633333	99.3667	0.5	46	49.2	77.4	47	8.80	0.0124	0.0520
20	0.84	6.2	8.1	2.7	97.3	1	45	48.2	75.8	46	8.90	0.0124	0.0370
40	0.425	5.91	14.01	4.67	95.33	2	44	47.2	74.3	45	9.10	0.0124	0.0265
60	0.25	9.9	23.91	7.97	92.03	4	43	46.2	72.7	44	9.20	0.0124	0.0188
100	0.15	14.22	38.13	12.71	87.29	8	42	45.2	71.1	43	9.40	0.0124	0.0134
200	0.075	20.51	58.64	19.54667	80.4533	15	42	45.2	71.1	43	9.40	0.0124	0.0098
Pan	-	241.36	300	100	0	30	41	44.2	69.5	42	9.60	0.0124	0.0070
						60	40	43.2	68.0	41	9.70	0.0124	0.0050
						90	39	42.2	66.4	40	9.90	0.0124	0.0041
						120	39	42.2	66.4	40	9.90	0.0124	0.0036
						240	38	41.2	64.8	39	10.10	0.0124	0.0025
						1440	35	38.2	60.1	36	10.60	0.0124	0.0011

Berat jenis air terhadap temperatur, $g_{wat\ T}$	=	0.99624
faktor, K = (1000 x Gs x $g_{wat\ T}$)/(10 x Ws(Gs -1))	=	3.1323
Faktor Kt = f(Gs,T)	=	0.0124
Suhu Terkoreksi (Ft) = -4.85 + 0.25 T)	=	2.15
Koreksi Nol (Fz)	=	-1.0
Koreksi Meniskus (Fm)	=	1
Koreksi Berat Jenis	=	0.98

GRAFIK DISTRIBUSI UKURAN MATERIAL



Hasil Analisis Saringan dan Hidrometer

Kerikil	0.63 %
	18.91 %
	20.37 %
ng	60.09 %

HASIL PENGUJIAN ANALISA SARINGAN DAN HIDROMETER

(Sieve-Mechanical and Hydrometer Methods)

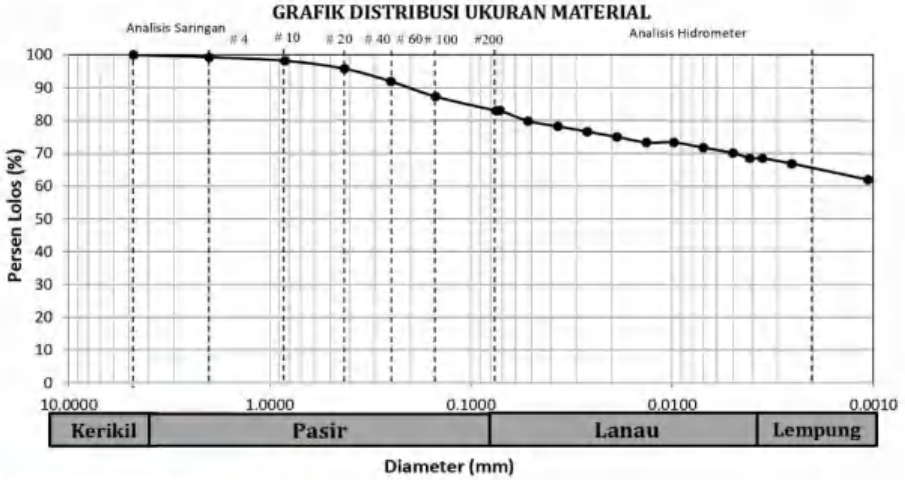
Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 7.1 - 8.0 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	Ansar-Hidro 8	Tanggal	: September 2023

Berat Tanah Kering :	300	gram	Berat Jenis (Gs)	2.748	Suhu (T)	28.0	°C

Analisa Saringan						Analisa Hidrometer							
Saringan No.	Diameter (mm)	Berat Tertahan (Gram)	Berat Kumulatif (gram)	Persen Kumulatif Tertahan (%)	Persen Lolos (%)	Waktu (menit)	R	Rcp =R+Ft-Fz	% Lolos = (a x Rcp)/Ws)x100% * % Lolos Analisa Saringan	RcL= R + Fm	L (cm)	A	D=AVL/t (mm)
4	4.75	0.15	0.15	0.05	99.95	0.25	48	51.2	83.0	49	8.40	0.0124	0.0719
10	2	2.14	2.29	0.763333	99.2367	0.5	46	49.2	79.8	47	8.80	0.0124	0.0520
20	0.84	3.23	5.52	1.84	98.16	1	45	48.2	78.2	46	8.90	0.0124	0.0370
40	0.425	7.22	12.74	4.246667	95.7533	2	44	47.2	76.6	45	9.10	0.0124	0.0265
60	0.25	11.72	24.46	8.153333	91.8467	4	43	46.2	74.9	44	9.20	0.0124	0.0188
100	0.15	13.79	38.25	12.75	87.25	8	42	45.2	73.3	43	9.40	0.0124	0.0134
200	0.075	12.95	51.2	17.06667	82.9333	15	42	45.2	73.3	43	9.40	0.0124	0.0098
Pan	-	248.8	300	100	0	30	41	44.2	71.7	42	9.60	0.0124	0.0070
						60	40	43.2	70.1	41	9.70	0.0124	0.0050
						90	39	42.2	68.4	40	9.90	0.0124	0.0041
						120	39	42.2	68.4	40	9.90	0.0124	0.0036
						240	38	41.2	66.8	39	10.10	0.0124	0.0025
						1440	35	38.2	61.9	36	10.60	0.0124	0.0011

Berat jenis air terhadap temperatur, $g_{wat\,T}$	=	0.99624
faktor, K = [1000 x Gs x $g_{wat\,T}$)/(10 x Ws(Gs -1)]	=	3.1323
Faktor Kt = f(Gs,T)	=	0.0124
Suhu Terkoreksi (Ft) = 4.85 + 0.25 T)	=	2.15
Koreksi Nol (Fz)	=	-1.0
Koreksi Meniskus (Fm)	=	1
Koreksi Berat Jenis	=	0.98

GRAFIK DISTRIBUSI UKURAN MATERIAL



Hasil Analisis Saringan dan Hidrometer

Kerikil	0.76	%
Pasir	16.30	%
Lanau	20.99	%
Lempung	61.94	%

HASIL PENGUJIAN ANALISA SARINGAN DAN HIDROMETER

(Sieve-Mechanical and Hydrometer Methods)

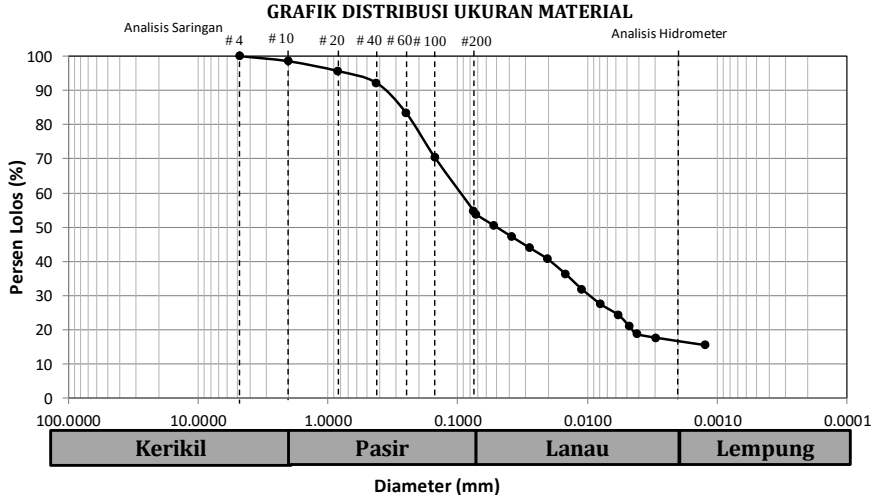
Pekerjaan	: Laporan Penyelidikan Tanah		
Lokasi	: Bontomarannu		
Kedalaman Sampel	: 10.1-11.0 m		
Metode Pengujian	: ASTM D-6913, ASTM D-7928, SNI 3423:2008		
Laboratorium	: Universitas Hasanuddin	Dikerjakan	: Nurhasanah
Nama Sampel	: Ansar-Hidro 11	Tanggal	: September 2023

Berat Tanah Kering :	300	gram	Berat Jenis (Gs)	2.650	Suhu (T)	28.0	°C

Analisa Saringan						Analisa Hidrometer							
Saringan No.	Diameter (mm)	Berat Tertahan (Gram)	Berat Kumulatif (gram)	Persen Kumulatif Tertahan (%)	Persen Lolos (%)	Waktu (menit)	R	Rcp =R+Ft-Fz	% Lolos = ((a x Rcp)/Ws)x100% * % Lolos Analisa Saringan	Rcl= R + Fm	L (cm)	A	D=AVL/t (mm)
4	4.75	0.3	0.3	0.1	99.9	0.25	46	49.2	53.74	47	8.60	0.0124	0.0727
10	2	4.53	4.83	1.61	98.39	0.5	43	46.2	50.5	44	9.00	0.0124	0.0526
20	0.84	8.49	13.32	4.44	95.56	1	40	43.2	47.2	41	9.60	0.0124	0.0384
40	0.425	10.24	23.56	7.853333	92.1467	2	37	40.2	43.9	38	10.10	0.0124	0.0279
60	0.25	26.32	49.88	16.62667	83.3733	4	34	37.2	40.6	35	10.70	0.0124	0.0203
100	0.15	39.06	88.94	29.64667	70.3533	8	30	33.2	36.2	31	11.30	0.0124	0.0147
200	0.075	47.06	136	45.33333	54.6667	15	26	29.2	31.9	27	11.95	0.0124	0.0111
Pan	-	164	300.00	100	0	30	22	25.2	27.5	23	12.30	0.0124	0.0079
						60	19	22.2	24.2	20	12.90	0.0124	0.0057
						90	16	19.2	20.9	17	13.20	0.0124	0.0047
						120	14	17.2	18.8	15	13.50	0.0124	0.0042
						240	13	16.2	17.7	14	13.90	0.0124	0.0030
						1440	11	14.2	15.5	12	14.30	0.0124	0.0012

Berat jenis air terhadap temperatur, $g_{wet\,T}$	=	0.99624
faktor, K = (1000 x Gs x $g_{wet\,T}$)/(10 x Ws(Gs -1))	=	3.2000
Faktor Kt = f(Gs,T)	=	0.0124
Suhu Terkoreksi (Ft) = -4.85 + 0.25 T)	=	2.15
Koreksi Nol (Fz)	=	-1.0
Koreksi Meniskus (Fm)	=	1
Koreksi Berat Jenis	=	1.00

GRAFIK DISTRIBUSI UKURAN MATERIAL



Hasil Analisis Saringan dan Hidrometer

Kerikil	1.61 %
Pasir	43.72 %
Lanau	39.20 %
Lempung	15.47 %

HASIL PENGUJIAN ANALISA SARINGAN DAN HIDROMETER

(Sieve-Mechanical and Hydrometer Methods)

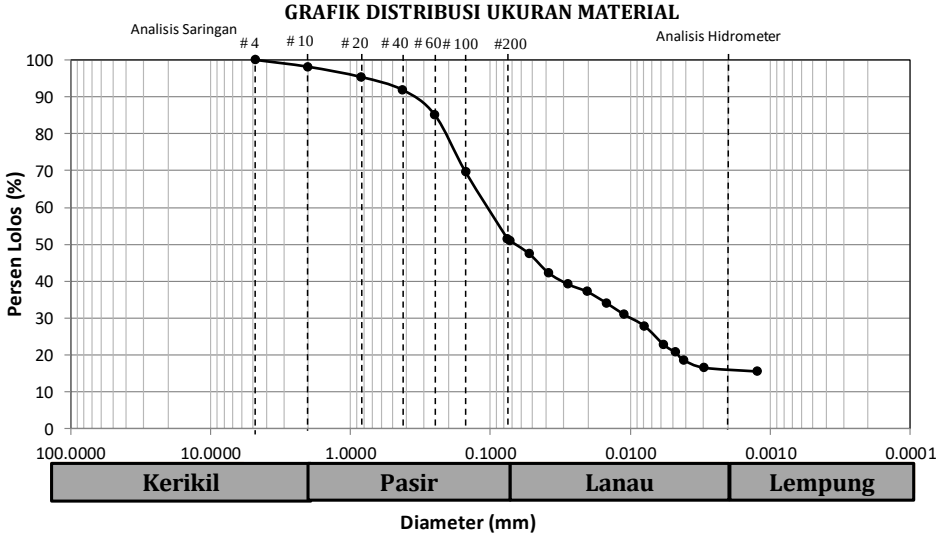
Pekerjaan : Laporan Penyelidikan Tanah
Lokasi : Bontomarannu
Kedalaman Sampel : 12 m
Metode Pengujian : ASTM D-6913, ASTM D-7928, SNI 3423:2008
Laboratorium : Universitas Hasanuddin — Dikerjakan : Nurhasanah
Nama Sampel : Ansar-Hidro 12 — Tanggal : September 2023

Berat Tanah Kering :	300	gram	Berat Jenis (Gs)	2.650	Suhu (T)	28.0	^{0}C

Analisa Saringan						Analisa Hidrometer							
Saringan No.	Diameter (mm)	Berat Tertahan (Gram)	Berat Kumulatif (gram)	Persen Kumulatif Tertahan (%)	Persen Lolos (%)	Waktu (menit)	R	Rcp =R+Ft-Fz	% Lolos = ((a x Rcp)/Ws)x100% * % Lolos Analisa Saringan	RcL= R + Fm	L (cm)	A	D=AVL/t (mm)
4	4.75	0.24	0.24	0.08	99.92	0.25	47	49.7	51.0	48	8.60	0.0124	0.0727
10	2	5.57	5.81	1.936667	98.0633	0.5	43	46.2	47.4	44	9.00	0.0124	0.0526
20	0.84	8.25	14.06	4.686667	95.3133	1	38	41.2	42.3	39	9.60	0.0124	0.0384
40	0.425	10.43	24.49	8.163333	91.8367	2	35	38.2	39.2	36	10.10	0.0124	0.0279
60	0.25	20.23	44.72	14.90667	85.0933	4	33	36.2	37.1	34	10.70	0.0124	0.0203
100	0.15	46.68	91.4	30.46667	69.5333	8	30	33.2	34.0	31	11.30	0.0124	0.0147
200	0.075	54.54	145.94	48.64667	51.3533	15	27	30.2	31.0	28	11.95	0.0124	0.0111
Pan	-	154.06	300.00	100	0	30	24	27.2	27.9	25	12.30	0.0124	0.0079
						60	19	22.2	22.7	20	12.90	0.0124	0.0057
						90	17	20.2	20.7	18	13.20	0.0124	0.0047
						120	15	18.2	18.6	16	13.50	0.0124	0.0042
						240	13	16.2	16.6	14	13.90	0.0124	0.0030
						1440	12	15.2	15.6	13	14.30	0.0124	0.0012

Berat jenis air terhadap temperatur, $g_{Wet\,T}$	=	0.99624
faktor, K = (1000 x Gs x $g_{wet\,T}$)/(10 x Ws(Gs -1))	=	3.2000
Faktor Kt = f(Gs,T)	=	0.0124
Suhu Terkoreksi (Ft) = -4.85 + 0.25 T)	=	2.15
Koreksi Nol (Fz)	=	-1.0
Koreksi Meniskus (Fm)	=	1
Koreksi Berat Jenis	=	1.00

GRAFIK DISTRIBUSI UKURAN MATERIAL



lisis Saringan dan Hidrometer

1.94 %
46.71 %
35.79 %
15.56 %

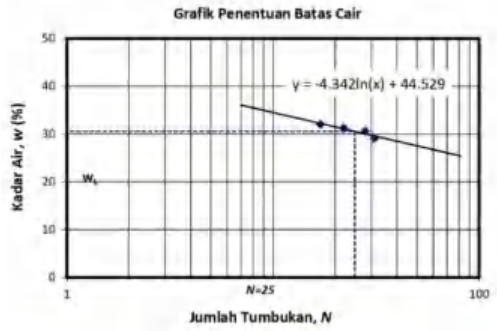
Lampiran 3 Data Pengujian Atterberg

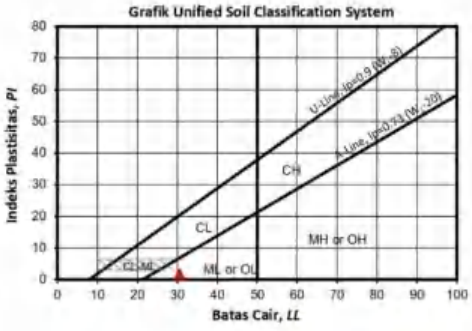
PEMERIKSAAN BATAS-BATAS ATTERBERG

(Atterberg Limit Test)

Pekerjaan	: Laporan Penyelidikan Tanah
Lokasi	: Bontomarannu
Laboratorium	: Universitas Hasanuddin
Metode Pengujian	: SNI 1966:2008, SNI 1967:2008, SNI 3422:2008
Dikerjakan	: Nurhasanah
Tanggal	: September 2023

Nomor Sampel		BH 01										
Kedalaman Sampel	m	0.0 - 1.0										
	Satuan	**Batas Plastis**		**Batas Cair**								**Batas Susut**
Nomor Uji	-	*1*	*2*	*1*		*2*		*3*		*4*		*1*
Jumlah Tumbukan, **N**	-	-	-	17		22		28		31		-
Nama Cawan	-	*A1*	*A2*	*B1*	*B2*	*C1*	*C2*	*D1*	*D2*	*E1*	*E2*	*F1*
Berat Cawan + Tanah Basah, ***W1***	gram	15.66	13.66	18.88	23.98	19.65	19.92	32.64	25.82	28.70	28.72	73.96
Berat Cawan + Tanah Kering, ***W2***	gram	15.21	13.20	16.01	20.44	16.90	17.25	28.65	23.09	25.65	25.71	51.94
Berat Air, ***Ww = W1-W2***	gram	0.45	0.46	2.87	3.54	2.75	2.67	3.99	2.73	3.05	3.01	22.02
Berat Cawan, ***W3***	gram	13.61	11.65	7.90	8.10	8.51	8.29	15.14	14.46	15.32	15.22	10.78
Berat Tanah Kering, ***Ws=W2-W3***	gram	1.60	1.55	8.11	12.34	8.39	8.96	13.51	8.63	10.33	10.49	41.16
Kadar Air, ***w=Ww/Ws*100%***	%	28.1	29.7	35.4	28.7	32.8	29.8	29.5	31.6	29.5	28.7	53.5
Kadar Air Rata-rata, ***w***	%	28.9		32.0		31.3		30.6		29.1		53.5
Berat Cawan Gelas + Raksa, ***W4***	gram											532.33
Berat Cawan Gelas, ***W5***	gram											32.98
Berat Cawan Gelas + Sisa Raksa	gram											406.5
Berat Jenis Raksa	gr/cm³											13.6
Volume Tanah Basah	cm³											38.35
Volume Tanah Kering	cm³											27.46
Batas Susut	%											27





Batas - Batas Atterberg	Nilai
Batas Plastis, ***PL***	29
Batas Cair, ***LL***	31
Indeks Plastisitas, ***PI = LL - PL***	2
Batas Susut, ***SL***	27

Klasifikasi berdasarkan USCS	ML

▲ : Klasifikasi Sampel pada Grafik

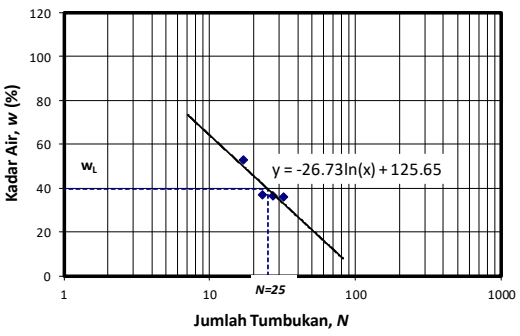
PEMERIKSAAN BATAS-BATAS ATTERBERG

(Atterberg Limit Test)

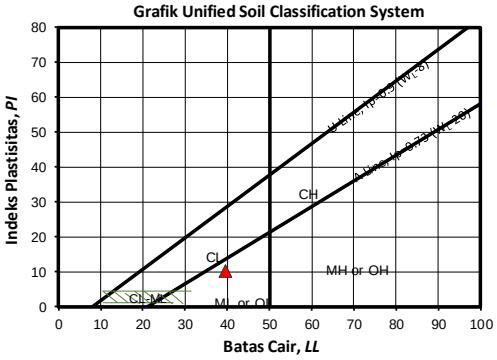
Pekerjaan : Laporan Penyelidikan Tanah
Lokasi : Bontomarannu
Laboratorium : Universitas Hasanuddin
Metode Pengujian : SNI 1966:2008, SNI 1967:2008, SNI 3422:2008
Dikerjakan : Nurhasanah
Tanggal : September 2023

Nomor Sampel		7m										
Kedalaman Sampel		6,1-7,0										
	Satuan	**Batas Plastis**		**Batas Cair**								**Batas Susut**
Nomor Uji	-	*1*	*2*	*1*		*2*		*3*		*4*		*1*
Jumlah Tumbukan, **N**	-	-	-	17		23		26		33		-
Nama Cawan	-	*A1*	*A2*	*B1*	*B2*	*C1*	*C2*	*D1*	*D2*	*E1*	*E2*	*F1*
Berat Cawan + Tanah Basah, ***W1***	gram	16.82	16.60	18.36	18.21	23.20	24.05	20.42	19.20	20.25	18.83	70.15
Berat Cawan + Tanah Kering, ***W2***	gram	16.19	16.26	15.43	15.38	21.38	21.91	17.72	16.99	16.48	15.81	48.35
Berat Air, ***Ww = W1-W2***	gram	0.63	0.34	2.93	2.83	1.82	2.14	2.70	2.21	3.77	3.02	21.8
Berat Cawan, ***W3***	gram	14.05	15.04	9.06	9.13	17.17	16.96	11.17	11.38	7.05	5.98	10.62
Berat Tanah Kering, ***Ws=W2-W3***	gram	2.14	1.22	6.37	6.25	4.21	4.95	6.55	5.61	9.43	8.19	37.73
Kadar Air, ***w=Ww/Ws*100%***	%	29.4	27.9	46.0	45.3	43.2	43.2	41.2	39.4	40.0	36.9	57.8
Kadar Air Rata-rata, ***w***	%	28.7		45.6		43.2		40.3		38.4		57.8
Berat Cawan Gelas + Raksa, ***W4***	gram											535
Berat Cawan Gelas, ***W5***	gram											34
Berat Cawan Gelas + Sisa Raksa	gram											402
Berat Jenis Raksa	gr/cm³											13.6
Volume Tanah Basah	cm³											38.56
Volume Tanah Kering	cm³											27.06
Batas Susut	%											27

Grafik Penentuan Batas Cair



Grafik Unified Soil Classification System



Batas - Batas Atterberg	Nilai
Batas Plastis, ***PL***	29
Batas Cair, ***LL***	41
Indeks Plastisitas, ***PI = LL - PL***	13
Batas Susut, ***SL***	27

Klasifikasi berdasarkan USCS	CL

▲ : Klasifikasi Sampel pada Grafik

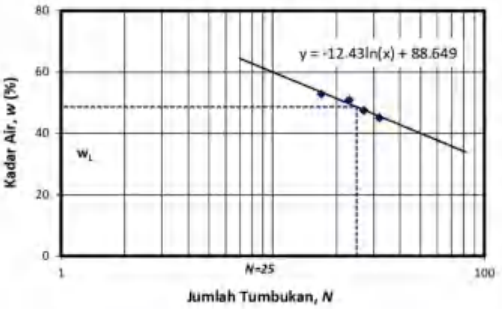
PEMERIKSAAN BATAS-BATAS ATTERBERG

(Atterberg Limit Test)

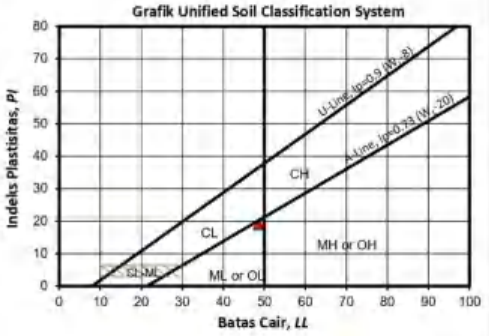
Pekerjaan	: Laporan Penyelidikan Tanah
Lokasi	: Bontomarannu
Laboratorium	: Universitas Hasanuddin
Metode Pengujian	: SNI 1966:2008, SNI 1967:2008, SNI 3422:2008
Dikerjakan	: Nurhasanah
Tanggal	: September 2023

Nomor Sampel		BH 01										
Kedalaman Sampel	m	7.1 - 8.0										
	Satuan	**Batas Plastis**		**Batas Cair**								**Batas Susut**
Nomor Uji	-	*1*	*2*	*1*		*2*		*3*		*4*		*1*
Jumlah Tumbukan, N	-	-	-	17		23		27		32		-
Nama Cawan	-	*A1*	*A2*	*B1*	*B2*	*C1*	*C2*	*D1*	*D2*	*E1*	*E2*	*F1*
Berat Cawan + Tanah Basah, ***W1***	gram	16.97	14.45	17.30	22.64	24.94	25.63	21.22	20.35	21.27	19.89	70.08
Berat Cawan + Tanah Kering, ***W2***	gram	16.29	14.10	14.82	16.74	18.33	20.94	16.39	17.07	17.03	16.37	48.38
Berat Air, ***Ww = W1-W2***	gram	0.68	0.35	2.48	5.90	6.61	4.69	4.83	3.28	4.24	3.52	21.7
Berat Cawan, ***W3***	gram	14.03	12.89	8.07	8.18	8.17	8.19	8.15	8.07	8.11	8.12	10.84
Berat Tanah Kering, ***Ws=W2-W3***	gram	2.26	1.21	6.75	8.56	10.16	12.75	8.24	9.00	8.92	8.25	37.54
Kadar Air, ***w=Ww/Ws*100%***	%	30.1	28.9	36.7	68.9	65.1	36.8	58.6	36.4	47.5	42.7	57.8
Kadar Air Rata-rata, ***w***	%	29.5		52.8		50.9		47.5		45.1		57.8
Berat Cawan Gelas + Raksa, ***W4***	gram											529.21
Berat Cawan Gelas, ***W5***	gram											33.01
Berat Cawan Gelas + Sisa Raksa	gram											400.37
Berat Jenis Raksa	gr/cm³											13.6
Volume Tanah Basah	cm³											38.12
Volume Tanah Kering	cm³											27.01
Batas Susut	%											28

Grafik Penentuan Batas Cair



Grafik Unified Soil Classification System



Batas – Batas Atterberg	Nilai
Batas Plastis, ***PL***	30
Batas Cair, ***LL***	49
Indeks Plastisitas, ***PI = LL - PL***	19
Batas Susut, ***SL***	28

Klasifikasi berdasarkan USCS	CL

▲ : Klasifikasi Sampel pada Grafik

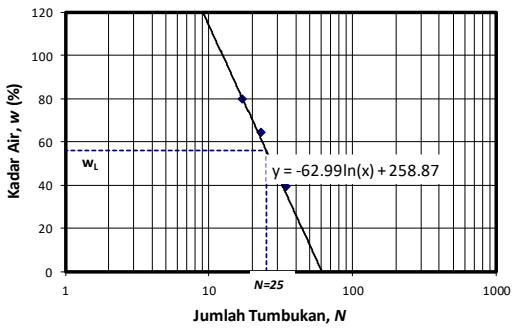
PEMERIKSAAN BATAS-BATAS ATTERBERG

(Atterberg Limit Test)

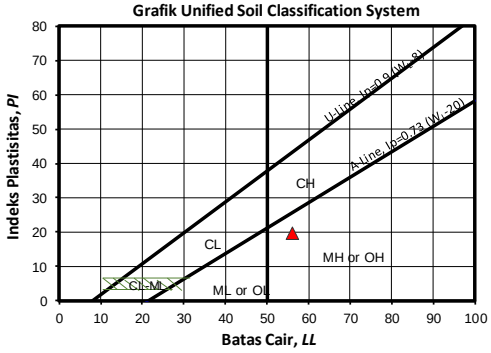
Pekerjaan : Laporan Penyelidikan Tanah
Lokasi : Bontomarannu
Laboratorium : Universitas Hasanuddin
Metode Pengujian : SNI 1966:2008, SNI 1967:2008, SNI 3422:2008
Dikerjakan : Nurhasanah
Tanggal : September 2023

Nomor Sampel		BH-01										
Kedalaman Sampel		10,01-11,00 m										
	Satuan	**Batas Plastis**		**Batas Cair**								**Batas Susut**
Nomor Uji	-	*1*	*2*	*1*		*2*		*3*		*4*		*1*
Jumlah Tumbukan, **N**	-	-	-	17		23		28		34		-
Nama Cawan	-	*A1*	*A2*	*B1*	*B2*	*C1*	*C2*	*D1*	*D2*	*E1*	*E2*	*F1*
Berat Cawan + Tanah Basah, ***W1***	gram	14.87	14.60	15.65	16.76	17.43	18.43	17.43	19.43	19.43	19.54	64.29
Berat Cawan + Tanah Kering, ***W2***	gram	14.20	13.87	11.87	13.54	12.97	15.64	14.87	15.76	16.89	15.76	33.54
Berat Air, ***Ww = W1-W2***	gram	0.67	0.73	3.78	3.22	4.46	2.79	2.56	3.67	2.54	3.78	30.75
Berat Cawan, ***W3***	gram	12.43	11.79	8.09	8.19	8.15	8.07	8.20	8.16	8.07	8.18	10.54
Berat Tanah Kering, ***Ws=W2-W3***	gram	1.77	2.08	3.78	5.35	4.82	7.57	6.67	7.60	8.82	7.58	23
Kadar Air, ***w=Ww/Ws*100%***	%	37.9	35.1	100.0	60.2	92.5	36.9	38.4	48.3	28.8	49.9	133.7
Kadar Air Rata-rata, ***w***	%	36.5		80.1		64.7		43.3		39.3		133.7
Berat Cawan Gelas + Raksa, ***W4***	gram											578
Berat Cawan Gelas, ***W5***	gram											30.42
Berat Cawan Gelas + Sisa Raksa	gram											232
Berat Jenis Raksa	gr/cm³											13.6
Volume Tanah Basah	cm³											41.73
Volume Tanah Kering	cm³											14.82
Batas Susut	%											17

Grafik Penentuan Batas Cair



Grafik Unified Soil Classification System



Batas - Batas Atterberg	**Nilai**
Batas Plastis, ***PL***	36
Batas Cair, ***LL***	56
Indeks Plastisitas, ***PI = LL - PL***	20
Batas Susut, ***SL***	17

Klasifikasi berdasarkan USCS	MH

▲ : Klasifikasi Sampel pada Grafik

z

ss

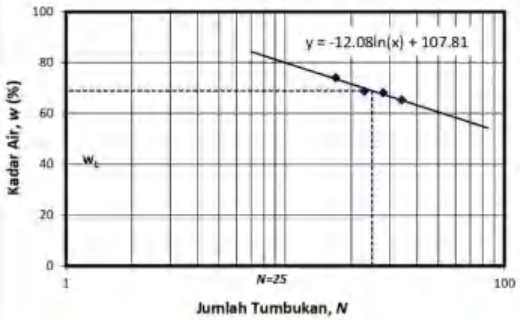
PEMERIKSAAN BATAS-BATAS ATTERBERG

(Atterberg Limit Test)

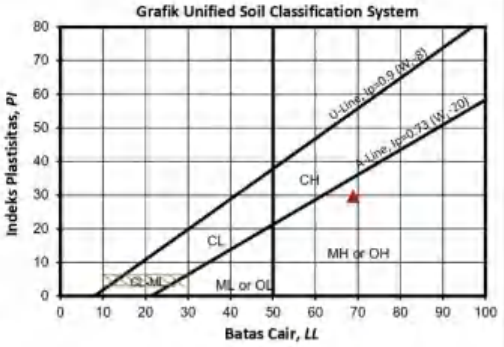
Pekerjaan	: Laporan Penyelidikan Tanah
Lokasi	: Bontomarannu
Laboratorium	: Universitas Hasanuddin
Metode Pengujian	: SNI 1966:2008, SNI 1967:2008, SNI 3422:2008
Dikerjakan	: Nurhasanah
Tanggal	: September 2023

Nomor Sampel		BH 01										
Kedalaman Sampel	m	11.5 - 12.0										
	Satuan	**Batas Plastis**		**Batas Cair**								**Batas Susut**
Nomor Uji	-	*1*	*2*	*1*		*2*		*3*		*4*		*1*
Jumlah Tumbukan, **N**	-	-	-	17		23		28		34		-
Nama Cawan	-	*A1*	*A2*	*B1*	*B2*	*C1*	*C2*	*D1*	*D2*	*E1*	*E2*	*F1*
Berat Cawan + Tanah Basah, ***W1***	gram	15.44	13.25	16.56	16.28	16.82	17.94	23.80	25.01	24.76	25.69	63.31
Berat Cawan + Tanah Kering, ***W2***	gram	14.64	12.58	12.89	12.81	13.43	14.03	20.32	20.75	21.10	21.61	34.89
Berat Air, ***Ww = W1-W2***	gram	0.80	0.67	3.67	3.47	3.39	3.91	3.48	4.26	3.66	4.08	28.42
Berat Cawan, ***W3***	gram	12.74	10.74	7.92	8.14	8.53	8.31	15.21	14.50	15.46	15.40	10.52
Berat Tanah Kering, ***Ws=W2-W3***	gram	1.90	1.84	4.97	4.67	4.90	5.72	5.11	6.25	5.64	6.21	24.37
Kadar Air, ***w=Ww/Ws*100%***	%	42.1	36.4	73.8	74.3	69.2	68.4	68.1	68.2	64.9	65.7	116.6
Kadar Air Rata-rata, ***w***	%	39.3		74.1		68.8		68.1		65.3		116.6
Berat Cawan Gelas + Raksa, ***W4***	gram											522
Berat Cawan Gelas, ***W5***	gram											32.96
Berat Cawan Gelas + Sisa Raksa	gram											258.86
Berat Jenis Raksa	gr/cm³											13.6
Volume Tanah Basah	cm³											37.61
Volume Tanah Kering	cm³											16.61
Batas Susut	%											30

Grafik Penentuan Batas Cair



Grafik Unified Soil Classification System



Batas - Batas Atterberg	Nilai
Batas Plastis, ***PL***	39
Batas Cair, ***LL***	69
Indeks Plastisitas, ***PI = LL - PL***	30
Batas Susut, ***SL***	30

Klasifikasi berdasarkan USCS	MH

▲ : Klasifikasi Sampel pada Grafik

Lampiran 4 Dataset CPT

Data ke-	Depth	qc	fs	Rf	Tf	Klasifikasi
	m	(kg/cm²)	(kg/cm²)	(%)	(kg/cm)	
1	0.2	48.54	0.14	0.28	2.71	ML
2	0.4	26.29	0.61	2.323	14.93	ML
3	0.6	20.22	0.14	0.671	17.64	ML
4	0.8	22.25	0.27	1.22	23.07	ML
5	1	20.22	0.07	0.336	24.43	ML
6	1.2	13.15	0.2	1.549	28.5	ML
7	1.4	11.12	0.07	0.61	29.86	ML
8	1.6	28.31	0.14	0.479	32.57	ML
9	1.8	30.34	0.2	0.671	36.64	ML
10	2	35.39	0.2	0.575	40.72	SP
11	2.2	33.37	0.07	0.203	42.07	SP
12	2.4	35.39	0.07	0.192	43.43	SP
13	2.6	41.46	0.07	0.164	44.79	SP
14	2.8	28.31	0.07	0.24	46.14	SP
15	3	30.34	0.14	0.447	48.86	SP
16	3.2	24.27	0.07	0.28	50.22	SP
17	3.4	28.31	0.14	0.479	52.93	SP
18	3.6	21.24	0.07	0.32	54.29	SP
19	3.8	29.33	0.07	0.231	55.64	SP
20	4	22.25	0.07	0.305	57	SP
21	4.2	28.31	0.07	0.24	58.36	SP
22	4.4	26.29	0.2	0.774	62.43	SP
23	4.6	35.39	0.07	0.192	63.79	SP
24	4.8	26.29	0.2	0.774	67.86	SP
25	5	27.3	0.07	0.249	69.22	SP
26	5.2	30.34	0.48	1.566	78.72	SP
27	5.4	38.43	0.07	0.177	80.07	SP
28	5.6	30.34	0.07	0.224	81.43	SP
29	5.8	28.31	0.14	0.479	84.15	SP
30	6	26.29	0.14	0.516	86.86	SP
31	6.2	11.12	0.27	2.44	92.29	SP
32	6.4	14.16	0.07	0.479	93.65	SP
33	6.6	11.12	0.48	4.27	103.15	SP
34	6.8	10.11	0.2	2.013	107.22	SP
	7	9.1	0.07	0.746	108.57	CL
	7.2	10.11	0.14	1.342	111.29	CL
	7.4	8.09	0.2	2.516	115.36	CL
	7.6	9.1	0.07	0.746	116.72	CL

Data ke-	Depth	qc	fs	Rf	Tf	Klasifikasi
	m	(kg/cm²)	(kg/cm²)	(%)	(kg/cm)	
39	7.8	11.12	0.07	0.61	118.08	CL
40	8	15.17	0.07	0.447	119.43	CL
41	8.2	16.18	0.07	0.419	120.79	CL
42	8.4	21.24	0.07	0.32	122.15	CL
43	8.6	17.19	0.07	0.395	123.5	CL
44	8.8	22.25	0.48	2.135	133	CL
45	9	23.26	0.14	0.584	135.72	SP
46	9.2	35.39	0.07	0.192	137.08	SP
47	9.4	30.34	0.27	0.895	142.5	SP
48	9.6	36.4	0.95	2.61	161.51	SP
49	9.8	45.51	0.07	0.149	162.86	SP
50	10	50.56	0.34	0.671	169.65	SP
51	10.2	40.45	0.34	0.839	176.43	SP
52	10.4	35.39	1.36	3.835	203.58	SP
53	10.6	30.34	1.02	3.355	223.94	SP
54	10.8	121.35	1.36	1.118	251.08	SP
55	11	151.69	0.34	0.224	257.87	SM
56	11.2	101.12	1.02	1.007	278.22	SM
57	11.4	48.54	0.14	0.28	280.94	SM
58	11.6	101.12	1.7	1.678	314.87	SM
59	11.8	146.63	0.34	0.231	321.65	SM
60	12	156.74	0.34	0.216	328.44	SM
62	0.2	15.17	0.07	0.447	1.36	ML
63	0.4	20.22	0.95	4.697	20.36	ML
64	0.6	22.25	0.88	3.965	38	ML
65	0.8	23.26	0.95	4.085	57	ML
66	1	25.28	1.36	5.368	84.15	ML
67	1.2	25.28	1.22	4.832	108.57	ML
68	1.4	22.25	0.54	2.44	119.43	ML
69	1.6	25.28	0.54	2.147	130.29	ML
70	1.8	12.13	0.61	5.033	142.5	ML
71	2	8.09	0.95	11.743	161.51	SP
72	2.2	12.13	0.75	6.151	176.43	SP
73	2.4	121.35	0.34	0.28	183.22	SP
74	2.6	96.07	5.43	5.651	291.79	SP
75	2.8	50.56	3.05	6.039	352.87	SP
	3	50.56	3.05	6.039	413.94	SP
	3.2	80.9	0.68	0.839	427.51	SP
	3.4	31.35	0.34	1.082	434.3	SP
	3.6	20.22	0.81	4.026	450.59	SP
	3.8	25.28	1.02	4.026	470.94	SP

Data ke-	Depth	qc	fs	Rf	Tf	Klasifikasi
	m	(kg/cm²)	(kg/cm²)	(%)	(kg/cm)	
81	4	30.34	0.2	0.671	475.01	SP
82	4.2	29.33	0.07	0.231	476.37	SP
83	4.4	15.17	0.34	2.237	483.16	SP
84	4.6	10.11	0.14	1.342	485.87	SP
85	4.8	18.2	0.34	1.864	492.66	SP
86	5	25.28	0.14	0.537	495.37	SP
87	5.2	60.67	0.34	0.559	502.16	SP
88	5.4	50.56	0.34	0.671	508.94	SP
89	5.6	35.39	0.34	0.959	515.73	SP
90	5.8	55.62	0.34	0.61	522.52	SP
91	6	75.84	0.34	0.447	529.3	SP
92	6.2	85.96	0.2	0.237	533.37	SP
93	6.4	65.73	0.34	0.516	540.16	SP
94	6.6	75.84	0.34	0.447	546.95	SP
95	6.8	91.01	0.34	0.373	553.73	SP
96	7	80.9	0.34	0.419	560.52	CL
97	7.2	70.79	0.34	0.479	567.3	CL
98	7.4	60.67	0.34	0.559	574.09	CL
99	7.6	55.62	0.34	0.61	580.88	CL
100	7.8	60.67	0.34	0.559	587.66	CL
101	8	75.84	0.34	0.447	594.45	CL
102	8.2	60.67	0.34	0.559	601.23	CL
103	8.4	45.51	0.34	0.746	608.02	CL
104	8.6	70.79	0.34	0.479	614.8	CL
105	8.8	65.73	0.34	0.516	621.59	CL
106	9	55.62	0.34	0.61	628.38	SP
107	9.2	65.73	0.34	0.516	635.16	SP
108	9.4	91.01	0.34	0.373	641.95	SP
109	9.6	85.96	0.34	0.395	648.73	SP
110	9.8	91.01	0.34	0.373	655.52	SP
111	10	111.24	0.34	0.305	662.31	SP
112	10.2	101.12	0.34	0.336	669.09	SP
113	10.4	156.74	0.34	0.216	675.88	SP
114	10.6	151.69	0.34	0.224	682.66	SP
117	0.4	50.56	0.14	0.268	2.71	ML
	0.6	26.29	0.14	0.516	5.43	ML
	0.8	17.19	0.14	0.789	8.14	ML
	1	25.28	0.2	0.805	12.21	ML
	1.2	20.22	0.2	1.007	16.29	ML
	1.4	45.51	0.34	0.746	23.07	ML

Data ke-	Depth	qc	fs	Rf	Tf	Klasifikasi
	m	(kg/cm²)	(kg/cm²)	(%)	(kg/cm)	
123	1.6	40.45	0.34	0.839	29.86	ML
124	1.8	50.56	0.34	0.671	36.64	ML
125	2	30.34	0.34	1.118	43.43	SP
126	2.2	50.56	0.34	0.671	50.22	SP
127	2.4	55.62	0.34	0.61	57	SP
128	2.6	55.62	0.34	0.61	63.79	SP
129	2.8	45.51	0.34	0.746	70.57	SP
130	3	35.39	0.34	0.959	77.36	SP
131	3.2	40.45	0.34	0.839	84.15	SP
132	3.4	30.34	0.34	1.118	90.93	SP
133	3.6	25.28	0.34	1.342	97.72	SP
134	3.8	30.34	0.34	1.118	104.5	SP
135	4	40.45	0.34	0.839	111.29	SP
136	4.2	20.22	0.34	1.678	118.08	SP
137	4.4	35.39	0.34	0.959	124.86	SP
138	4.6	45.51	0.34	0.746	131.65	SP
139	4.8	50.56	0.34	0.671	138.43	SP
140	5	35.39	0.34	0.959	145.22	SP
141	5.2	40.45	0.34	0.839	152	SP
142	5.4	45.51	0.34	0.746	158.79	SP
143	5.6	25.28	0.34	1.342	165.58	SP
144	5.8	20.22	0.34	1.678	172.36	SP
145	6	35.39	0.34	0.959	179.15	SP
146	6.2	45.51	0.34	0.746	185.93	SP
147	6.4	25.28	1.02	4.026	206.29	SP
148	6.6	35.39	0.34	0.959	213.08	SP
149	6.8	55.62	0.34	0.61	219.86	SP
150	7	25.28	0.34	1.342	226.65	CL
151	7.2	38.43	0.14	0.353	229.36	CL
152	7.4	30.34	0.54	1.789	240.22	CL
153	7.6	30.34	0.68	2.237	253.79	CL
154	7.8	30.34	0.34	1.118	260.58	CL
155	8	35.39	0.14	0.383	263.29	CL
156	8.2	20.22	0.34	1.678	270.08	CL
157	8.4	15.17	0.34	2.237	276.87	CL
158	8.6	45.51	0.68	1.491	290.44	CL
	8.8	55.62	0.34	0.61	297.22	CL
	9	65.73	0.34	0.516	304.01	SP
	9.2	75.84	0.34	0.447	310.8	SP
	9.4	85.96	0.34	0.395	317.58	SP
	9.6	85.96	0.34	0.395	324.37	SP

Data ke-	Depth	qc	fs	Rf	Tf	Klasifikasi
	m	(kg/cm²)	(kg/cm²)	(%)	(kg/cm)	
164	9.8	75.84	0.34	0.447	331.15	SP
165	10	96.07	0.34	0.353	337.94	SP
166	10.2	75.84	0.34	0.447	344.72	SP
167	10.4	85.96	0.34	0.395	351.51	SP
168	10.6	96.07	0.34	0.353	358.3	SP
169	10.8	85.96	0.34	0.395	365.08	SP
170	11	101.12	0.34	0.336	371.87	SM
171	11.2	126.4	0.34	0.268	378.65	SM
172	11.4	146.63	0.34	0.231	385.44	SM
173	11.6	151.69	0.34	0.224	392.23	SM
174	11.8	156.74	0.34	0.216	399.01	SM

Lampiran 5 Dokumentasi Penelitian