

LAMPIRAN

°C	0	1	2	3	4	5	6	7	8	9
0	0,9999	0,9999	1.0000	1.0000	1.0000	1.0000	1.0000	0,9999	0,9999	0,9998
10	0,9997	0,9996	0,9995	0,9994	0,9993	0,9991	0,9990	0,9988	0,9986	0,9984
20	0,9982	0,9980	0,9978	0,9976	0,9973	0,9971	0,9968	0,9965	0,9963	0,9960
30	0,9957	0,9954	0,9951	0,9947	0,9944	0,9941	0,9937	0,9934	0,9930	0,9926
40	0,9922	0,9919	0,9915	0,9911	0,9907	0,9902	0,9898	0,9894	0,9890	0,9885
50	0,9881	0,9876	0,9872	0,9867	0,9862	0,9857	0,9852	0,9848	0,9842	0,9838
60	0,9832	0,9827	0,9822	0,9817	0,9811	0,9806	0,9800	0,9795	0,9789	0,9784
70	0,9778	0,9772	0,9767	0,9761	0,9755	0,9749	0,9743	0,9737	0,9731	0,9724
80	0,9718	0,9712	0,9706	0,9699	0,9693	0,9686	0,9680	0,9673	0,9667	0,9660
90	0,9653	0,9647	0,9640	0,9633	0,9626	0,9619	0,9612	0,9605	0,9598	0,9590

L.1 Data Specific Gravity of Water

JENIS TANAH	GS
Pasir	2,65 - 2,67
Lanau (Silt)	2,68 - 2,72
Lanau dengan sedikit bahan organik	2,40 - 2,50
Lempung (Clay)	2,40 - 2,90
Lempung (Bentonite)	2,35
Gambut (Peat)	1,26 - 1,80

L.2 Data Specific Gravity Beberapa Jenis Tanah

TABLE 1 Soil Classification Chart

Criteria for Assigning Group Symbols and Group Names Using Laboratory Tests ^a		Soil Classification	
Group Symbol	Group Name ^b	Group Symbol	Group Name ^b
Coarse-Grained Soils More than 50 % retained on No. 200 sieve	Gravels More than 50 % of coarse fraction retained on No. 4 sieve	Cu ≥ 4 and 1 ≤ Cc ≤ 3 ^f	Well-graded gravel ^f
		Cu < 4 and/or 1 > Cc > 3 ^f	Poorly graded gravel ^f
	Clean Gravels Less than 5 % fines ^c	Fines classify as ML or MH	Silty gravel ^{f,G,H}
	Gravels with Fines More than 12 % fines ^c	Fines classify as CL or CH	Clayey gravel ^{f,G,H}
	Sands 50 % or more of coarse fraction passes No. 4 sieve	Cu ≥ 6 and 1 ≤ Cc ≤ 3 ^f	Well-graded sand ^f
		Cu < 6 and/or 1 > Cc > 3 ^f	Poorly graded sand ^f
	Sands with Fines More than 12 % fines ^b	Fines classify as ML or MH	Silty sand ^{f,G,H,I}
		Fines classify as CL or CH	Clayey sand ^{f,G,H,I}
Fine-Grained Soils 50 % or more passes the No. 200 sieve	Silts and Clays Liquid limit less than 50	PI > 7 and plots on or above "A" line ^f	Lean clay ^{K,L,M}
		PI < 4 or plots below "A" line ^f	Silt ^{K,L,M}
	inorganic	Liquid limit - oven dried < 0.75	Organic clay ^{K,L,M,N}
	organic	Liquid limit - not dried < 0.75	Organic silt ^{K,L,M,O}
	inorganic	PI plots on or above "A" line	Fat clay ^{K,L,M}
	organic	PI plots below "A" line	Elastic silt ^{K,L,M}
Highly organic soils	Primarily organic matter, dark in color, and organic odor	Liquid limit - oven dried < 0.75	Organic clay ^{K,L,M,P}
		Liquid limit - not dried < 0.75	Organic silt ^{K,L,M,Q}
			Peat

^a Based on the material passing the 3-in. (75-mm) sieve.
^b If field sample contained cobbles or boulders, or both, add "with cobbles or boulders, or both" to group name.
^c Gravels with 5 to 12 % fines require dual symbols: GW-GM well-graded gravel with silt GP-GC poorly graded gravel with clay GP-GC poorly graded gravel with clay
^d Sands with 5 to 12 % fines require dual symbols: SW-SM well-graded sand with silt SW-SC poorly graded sand with clay SP-SM poorly graded sand with silt SP-SC poorly graded sand with clay
^e Cu = D₆₀/D₁₀ Cc = (D₃₀)² / (D₁₀ × D₆₀)
^f If soil contains ≥ 15 % sand, add "with sand" to group name.
^g If fines classify as CL-ML, use dual symbol GC-GM, or SC-SM.
^h If fines are organic, add "with organic fines" to group name.
ⁱ If soil contains ≥ 15 % gravel, add "with gravel" to group name.
^j If Atterberg limits plot in hatched area, soil is a CL-ML, silty clay.

^k If soil contains 15 to 29 % plus No. 200, add "with sand" or "with gravel," whichever is predominant.
^l If soil contains ≥ 30 % plus No. 200, predominantly sand, add "sandy" to group name.
^m If soil contains ≥ 30 % plus No. 200, predominantly gravel, add "gravelly" to group name.
ⁿ PI ≥ 4 and plots on or above "A" line.
^o PI < 4 or plots below "A" line.
^p PI plots on or above "A" line.
^q PI plots below "A" line.

L.3 Soil Classification Chart