

Procedure Checklist AASHTO T-88 Hydrometer

		P	F	NA
Dispersing Agent				
1.	40 g Sodium Hexametaphosphate per Liter of solution.			
2.	Date of preparation marked on bottle containing solution			
3.	Fresh solution made monthly.			
Preparation				
4.	Sample prepare by AASHTO R – 58.			
5.	Coarse material separated on No.4 No.10, and No.40 sieve?			
6.	Hygroscopic and hydrometer samples weighed to 0.01 g.			
7.	Hygroscopic moisture sample weighs at least 10 g.			
8.	Dried to a constant mass at 110 ± 5°C (230 ± 9° F).			
Coarse Sieve Analysis				
9.	Sieve analysis performed on material retained on No. 10 sieve.			
10.	Sieving continued until no more than 1% of material on sieve passes during 60 seconds of continuous sieving?			
Hydrometer Analysis				
11.	Composite correction for hydrometer reading determined?			
12.	Test sample weighs approximately 100 g (sandy) or 50 g (clay or silt).			
13.	Sample placed in beaker, 125 mL of dispersing agent added, and stirred with glass rod.			
14.	Sample soaked at least 12 hours in dispersing agent?			
15.	Sample washed into dispersion cup with distilled water until cup is more than half full?			
16.	Mechanical dispersion: Dispersed for 60 seconds?			
17.	Mixture transferred to cylinder, suspension made up to 1000 mL with distilled water, (allowed to obtain uniform temperature)?			
18.	Cylinder and contents turned upside down and back for approximately 60 turns in 60 seconds.			
19.	Hydrometer readings taken at 2, 5, 15, 30, 60, 250, and 1440 minutes.			
20.	Note: Additional readings OK....____ Note, Material clinging to the inside walls of the cylinder may be rinsed in with a small amount of water.			
21.	Hydrometer slowly placed in suspension about 25 or 30 seconds before reading.			
22.	Hydrometer floats freely and does not touch wall of cylinder?			
23.	Hydrometer read at top of meniscus nearest 0.5 g/L.			
24.	Hydrometer removed from suspension between readings and placed in graduate of clean water with spinning motion.			
25.	Temperature recorded after each hydrometer reading?			
Fine Sieve Analysis				
26.	After final hydrometer reading, specimen washed over No. 200 sieve?			
27.	Material retained on No 200 sieve oven-dried at 110 ± 5°C (230 ± 9° F).			
28.	Sieve analysis performed on No 40 and No 200 sieve material.			
Calculations				
29.	Calculations performed in accordance with test method?			

Remarks:

Date: _____ Technician: _____ IA Observer: _____

Technician's E-mail Address: _____

Employer's/ Supervisor's E-mail Address: _____