

EQUIPMENT

- 1. PENETROMETER: including 50.0 ± 0.05 g and 100.0 ± 0.05 g?
2. NEEDLES: as per ASTM D5, certified by an accredited agency?
3. TIMER: graduated to 0.1 s and accurate to 0.1s for 60 s?
4. WATER BATH: minimum capacity 10 L?
5. THERMOMETER: calibrated Hg thermometer having subdivisions and maximum scale error of 0.1°C or any other thermometric device having equal accuracy, precision and sensitivity,
6. TRANSFER DISH: minimum 350 ml capacity with assured firm support?
7. TEST SAMPLE CONTAINER: Cylindrical metal or glass of essentially the following dimensions?
Penetrations < 200: diameter = 55mm , internal depth = 35mm?
Penetrations 200 to 350mm: diameter =55mm , internal depth = 70mm?

[Fill in Y for Yes - N for No - NA for not applicable (NOTE: N or NA requires comment)]

COMMENTS:
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PROCEDURE

Sample Preparation:

- 1. Heating - maximum temperature Sft. Pt. + 90°C?
2. Mixing - horizontal - no air entrainment?
3. Maximum time at temperature - 30 minutes?
4. Pouring - slowly - no air bubbles?
5. Sample on insulating surface - cover loosely to protect from dust?

Temperature History:

- 1. (a) In air: 85 ml (3 oz.) can, 1.0 - 1.5 h: 170 ml (6 oz) can 1.5 - 2.0 h?
(b) In water: 85 ml (3 oz) can, 1.0 - 1.5 h: 170 ml (6 oz) can 1.5 - 2.0 h?

Testing:

- 1. Needle - clean - fix in place?
2. Weight - as required (50 g for 100 g / 5 sec specification) unless otherwise specified?
3. Check zero position on penetrometer dial?
4. Check position of needle vis-a-vis asphalt surface?
5. Timing correct?
6. Adjust needle dial and read?
7. Any motion of container during test?

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8. Distance between container side and/or needles not < 10 mm? .....

9. If transfer dish is used, return to the water bath before the next determination?.....

10. For pen >200 leave needles in sample? .....

**Results:**

1. Average of three values within specified range as shown below? .....

Penetration	0 to 49	50 to 149	150 to 249	250 to 500
Maximum difference between highest and lowest penetration	2	4	12	20

[Fill in Y for Yes - N for No - NA for not applicable (**NOTE:** N or NA requires comment)]

COMMENTS: \_\_\_\_\_  
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Name of Laboratory: \_\_\_\_\_ Date: \_\_\_\_\_  
Inspector: \_\_\_\_\_ Inspection No: \_\_\_\_\_