

WEST VIRGINIA DEPARTMENT OF TRANSPORTATION
DIVISION OF HIGHWAYS
MATERIALS CONTROL, SOILS AND TESTING DIVISION

MATERIALS PROCEDURE

PERCENT OF SOLIDS IN THE LATEX USED IN LATEX
MODIFIED COMPOSITIONS

1.0 PURPOSE

1.1 To set forth a procedure for determining the solids content of the latex for use in latex modified compositions.

2.0 SCOPE

2.1 This procedure shall be used to determine the solids content of all latex materials used in latex modified compositions.

3.0 EQUIPMENT

3.1 Aluminum weighing dishes (approximately six centimeters in diameter and two centimeters deep), Fisher 8-732 or equivalent.

3.2 Glass vials with cork stoppers, (one dram capacity), Owens-Illinois 60900 or equivalent.

3.3 Analytical balance (accurate to 0.1 milligram)

4.0 PROCEDURE

4.1 Weigh three aluminum dishes individually to 0.1 milligram. This is weight A.

4.2 Mix sample thoroughly.

4.3 Place sample into three vials, fill to approximately 2/3 of capacity, stopper immediately.

4.4 Weigh each vial and stopper. This is weight B.

- 4.5 Place approximately one gram of sample from the vial into the preweighed dish. Care should be taken to avoid getting the sample on outside of vial.
- 4.6 Immediately reweigh the vial and stopper. This is weight C.
- 4.7 Place samples in the oven at $141 \pm 2^{\circ}\text{C}$ for two hours.
- 4.8 Place samples in desiccator to cool.
- 4.9 Reweigh samples. This is weight F.
- 5.0 CALCULATIONS
- 5.1 $D = B - C$
Where D = sample weight
- 5.2 $E = F - A$
Where E = weight of solids
- 5.3 $S = \frac{E}{D} \times 100$
Where S = total solids in percent
- 5.4 The solids content of the sample is the average of the three tests.
- 5.5 If the range of the three tests exceeds 1.00 percent, repeat the test procedure.


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