

**KANSAS DEPARTMENT OF TRANSPORTATION  
SPECIAL PROVISION TO THE  
STANDARD SPECIFICATIONS, 1990 EDITION**

NOTE: This special provision is generally written in the imperative mood. The subject, "the *Contractor*" is implied. Also implied in this language are "*shall*", "*shall be*", or similar words and phrases. The word "*will*" generally pertains to decisions or actions of the Kansas Department of Transportation.

**Page 841. Delete Subsection 1406 and replace it with the following:**

**SUBSECTION 1406**

**LIQUID MEMBRANE FORMING COMPOUNDS**

**1406.01 DESCRIPTION.**

This specification covers liquid membrane forming compounds suitable for spraying on horizontal and vertical concrete surfaces to retard the loss of water during the early hardening period and subsequent curing period.

**1406.02 REQUIREMENTS.**

**a.** Provide liquid membrane forming compound that conforms to the AASHTO M148 requirements for Type 1-D, clear or translucent with fugitive dye, or Type 2, white pigmented compound, as specified in the Contract documents.

**b.** For this specification, Type 2 white pigmented compound will be further classified into Type 2 (Wax Based) and Type 2 (Other). This is to allow specifying of wax based compound for certain applications where a bond breaker is desired. Either formulation base may be supplied except when wax based is specified.

**c.** Do not allow water-emulsion based material to freeze. Material that has been subjected to freezing temperatures will be rejected.

**1406.03 TEST METHODS.**

Test materials in accordance with AASHTO M 148. Water emulsion based material is not subject to the long term settling test by the freeze thaw cycling method. Fingerprinting and screening of verification samples by infrared spectroscopy is done according to ASTM E 1252.

#### **1406.04 PREQUALIFICATION.**

Submit a sample of at least 1 quart of material and a copy of the manufacturer's test results on samples of the same lot of material to the Engineer of Tests. Also include a copy of the Material Safety Data Sheet (MSDS). For Type 2 white pigmented compounds, include a statement regarding whether the formulation is wax based or other, unless it is specifically addressed in the MSDS.

Samples will be tested for compliance with any or all requirements of this specification. The manufacturer will be notified of the test results on the samples submitted.

Results of tests from the AASHTO National Transportation Product Evaluation Program (NTPEP) will be accepted in lieu of the sample requested above. Include the NTPEP test report along with the other documentation requested. Include evidence that the product being offered is identical to the one reported in the NTPEP report.

Manufacturers whose samples comply with the requirements of this specification will be placed on a prequalified list. No material may be furnished under this specification unless the manufacturer's product has been prequalified. Manufacturers will remain on the list as long as the results of verification samples and performance in the field are satisfactory. Any changes in formulation will require resubmittal for prequalification testing.

Verification samples will be taken by each District at the rate of 2 per product, per manufacturer, per year, of the manufacturers supplying to that District. Samples will be forwarded to the Materials and Research Center for verification testing.

#### **1406.05 BASIS OF ACCEPTANCE.**

- a.** Prequalification as required by **subsection 1406.04.**
- b.** Receipt and approval of a Type C certification as set forth in **Section 2600.**

07-22-99 M & R (JLC)