Wetting tension test mixture

We offer 33 items of Wetting tension test mixture as test mixtures based on Plastics – Film and Sheet – Wettability Tension Test Method (**JIS K 6768**). This mixture is prepared by mixing water, methanol, formamide, and ethylene glycol monoethyl ether in steps. Since this test is sensitive to temperature and humidity, the wetting tension test mixture is used under the prescribed standard laboratory atmosphere (temperature 23 ℃, relative humidity 50%). We look forward to your continued patronage.

Product List

Product Name	Grade	Package	Cat. Code
Wetting tension test mixture 22.6mN/m	for detection of wetting tension	50 mL	45007-96
Wetting tension test mixture 25.4mN/m	for detection of wetting tension	50 mL	45008-96
Wetting tension test mixture 27.3mN/m	for detection of wetting tension	50 mL	45009-96
Wetting tension test mixture 30.0mN/m	for detection of wetting tension	50 mL	45010-96
Wetting tension test mixture 31.0mN/m	for detection of wetting tension	50 mL	45011-96
Wetting tension test mixture 32.0mN/m	for detection of wetting tension	50 mL	45012-96
Wetting tension test mixture 33.0mN/m	for detection of wetting tension	50 mL	45013-96
Wetting tension test mixture 34.0mN/m	for detection of wetting tension	50 mL	45014-96
Wetting tension test mixture 35.0mN/m	for detection of wetting tension	50 mL	45015-96
Wetting tension test mixture 36.0mN/m	for detection of wetting tension	50 mL	45016-96
Wetting tension test mixture 37.0mN/m	for detection of wetting tension	50 mL	45017-96
Wetting tension test mixture 38.0mN/m	for detection of wetting tension	50 mL	45018-96
Wetting tension test mixture 39.0mN/m	for detection of wetting tension	50 mL	45019-96
Wetting tension test mixture 40.0mN/m	for detection of wetting tension	50 mL	45020-96
Wetting tension test mixture 41.0mN/m	for detection of wetting tension	50 mL	45021-96
Wetting tension test mixture 42.0mN/m	for detection of wetting tension	50 mL	45022-96
Wetting tension test mixture 43.0mN/m	for detection of wetting tension	50 mL	45023-96
Wetting tension test mixture 44.0mN/m	for detection of wetting tension	50 mL	45024-96
Wetting tension test mixture 45.0mN/m	for detection of wetting tension	50 mL	45025-96
Wetting tension test mixture 46.0mN/m	for detection of wetting tension	50 mL	45026-96
Wetting tension test mixture 48.0mN/m	for detection of wetting tension	50 mL	45027-96
Wetting tension test mixture 50.0mN/m	for detection of wetting tension	50 mL	45028-96
Wetting tension test mixture 52.0mN/m	for detection of wetting tension	50 mL	45029-96
Wetting tension test mixture 54.0mN/m	for detection of wetting tension	50 mL	45030-96
Wetting tension test mixture 56.0mN/m	for detection of wetting tension	50 mL	45031-96
Wetting tension test mixture 58.0mN/m	for detection of wetting tension	50 mL	45032-96
Wetting tension test mixture 59.0mN/m	for detection of wetting tension	50 mL	45033-96
Wetting tension test mixture 60.0mN/m	for detection of wetting tension	50 mL	45034-96
Wetting tension test mixture 61.0mN/m	for detection of wetting tension	50 mL	45035-96
Wetting tension test mixture 62.0mN/m	for detection of wetting tension	50 mL	45036-96
Wetting tension test mixture 63.0mN/m	for detection of wetting tension	50 mL	45037-96
Wetting tension test mixture 64.0mN/m	for detection of wetting tension	50 mL	45038-96
Wetting tension test mixture 65.0mN/m	for detection of wetting tension	50 mL	45039-96

Reference

The Wetting tension test method was originally specified in JIS K 6768(Testing Method Of Wettability Of Polyethylene And Polypropylene Films), but was revised in 1999 based on ISO 8296:1987 in order to align it with ISO international standards. This revision has made the test method applicable not only to polyethylene and polypropylene films, but also to plastic films and sheets in general.

How to make a wet judgment

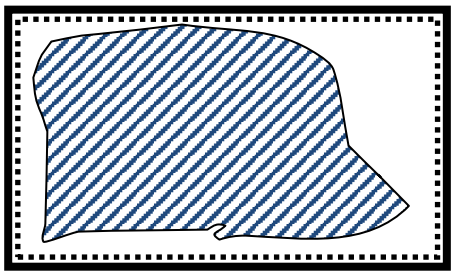
Apply a series of mixtures with different surface wetting tensions to a plastic film in order of number, so that the film is properly wetted, and thus determine the value of the surface wetting tension (μN/cm) {dyn/cm *} of the mixture. The unit mN/m indicates the value of this surface wetting tension, i.e., the reagent name labelled No. 30. For example, the surface wetting tension of NO.30 is 30.0 mN/m (300 μN/cm)

* dyn/cm = 1 mN/m (=10 μN/cm) (Uniformity of SI units).

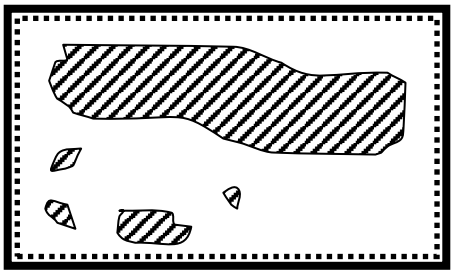
1）Whether or not the sample is wetted by the reagent is judged by the state of the center of the liquid film after 2 seconds have elapsed since the reagent was applied. If the applied liquid film maintains its original state, the sample is “wet”; if the film is broken, the sample is "not wet.

2）If the liquid film does not maintain its original state after 2 seconds of application, even if it is not broken, it is not considered “wet”. Since the amount of liquid applied is large or may shrink slightly, it is necessary to repeat the test using reagents with different surface tensions.

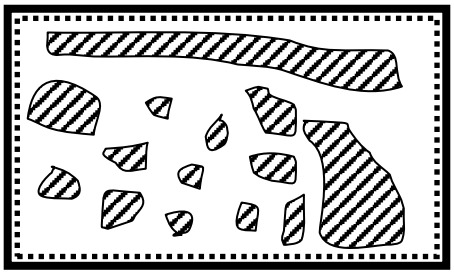
Reference : JIS K6768:1999 Plastics−Film and sheeting−Determination of wetting tension



Wet



Not wet



Not wet

- Please use the products listed in the catalog as reagents (chemicals used for testing or research purpose).
- Product information is subject to change without notice. For the latest information, please have a look at our website "Cica-Web".

KANTO CHEMICAL CO., INC.

REAGENT DIVISION

2-1, Nihonbashi Muromachi 2-chome, Chuo-ku, Tokyo, 103-0022, Japan

TEL : +81-3-6214-1092

E-mail : kanto-61@kanto.co.jp

Website: https://www.kanto.co.jp