

# YGS INK

(FOR TOUCH PANEL : CURABLE AT LOW TEMPERATURE)

## INTRODUCTIONS

YGS INK was developed for **the window frame of touch panel**. YGS dries at low temperature and its opacity and insulation properties are excellent. YGS adheres to hard-coated surface as well as tempered glass. As it dries at 80 degrees Celsius, it is suitable for the materials such as hard-coated PMMA and PC that do not have good heat-resistance.

## CHARACTERISTICS

- Good adhesion can be obtained on tempered glass and hard-coated surface by the drying at low temperature (80°C).
- The opacity is better than that of other ink series for glass.
- Non-yellowing matt finish.

## APPLICATIONS

Tempered glass, hard-coated surface, thermo-setting resin, aluminum, heat-resistant plastics such as polyester film, polycarbonate

## HOW TO USE

< Drying at low temperature (80°C) >

- YGS Ink : 100
- Hardener YGS-50 : 10
- Teton thinner : 10 - 20

\* Pot life of the mixture : 1 - 4 hours at 25°C

< Drying for long pot life (120°C) >

- YGS Ink : 100
- Hardener YGS-90 : 15
- Additive JA-1080 : 1 - 5
- Teton thinner : 5 - 15

\* Pot life of the mixture : 8 hours at 25°C

## DRYING

20 - 60 minutes at recommended drying temperature

## STENCIL & WASHING UP

Use photo-stencil. Vinyl cleaning thinner is recommended for washing up.

## COLOR RANGE AND TYPE OF PACKING

07 OPAQUE WHITE, 92 BLACK, 1kg can

## PROPERTIES

- Ink : YGS INK 92 BLACK
- Hardener : YGS-50 (10 parts)
- Substrate : tempered glass
- Mesh : 300 meshes per inch
- Drying temperature : 80°C 30min

TEST ITEMS	TEST METHODS	RESULTS
Heat/humidity resistance	65°C, 95%, 72 hours	No problem
Boiling resistance	1 hour	No problem
Acid resistance	5% H2SO4 solution. 40°C×5 min.	No problem
Alkali resistance	5% NaOH solution. 40°C×5 min.	No problem
Alcohol resistance	IPA rubbing with 1-kg-load	No problem by 50 rubs
Yellowing resistance (07 OPAQUE WHITE)	250°C×30 min.	Approx.ΔE=1.0
Transmittance density		5.5
Resistance value	100V	$1.0 \times 10^{14} \Omega$

## PROPERTIES -2

INK / SPEC	YGS INK 92 BLACK			
	Hardener : YGS-50(10parts)		Hardener : YGS-90(15parts)	
	-		Additive : JA-1080(5parts)	
Pot life (25°C)	1~4 hours		8 hours	
Transmittance density	5.5		5.9	
Drying	80°C30min	120°C30min	120°C30min	
Initial adhesion	next day	fair	good	good
Boiling resistance	1hour	good	good	good
Warm-water resistance	80°C4hours	good	good	good
Acid resistance	5% H2SO4	good	good	good
Alkali resistance	5% NaOH	good	good	good
Alcohol resistance	IPA rubbing	50times	>100times	>100times
Resistance value	100V	$1.0 \times 10^{14} \Omega$	$1.0 \times 10^{14} \Omega$	$1.0 \times 10^{14} \Omega$

1. Evaluation of adhesion : good=no peel-off with nail , fair=peeled-off with strong scratch
2. The mixture of ink and hardener becomes viscous with time, which leads to poor printability and degrading properties. Hardener YGS-90 has the advantage over YGS-50 due to its longer pot life of 8 hours.

## PRECAUTIONS

1. The above results were obtained at our lab test and not guaranteed information.
2. This ink is subject to the change of specification by the further improvement...
3. Please ask our sales department for the samples.