

# MS-Film

SBQ type Capillary Film



# MURAKAMI CO., LTD.

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URL <http://www.murakami.co.jp/english/index.html>

## Features/Application

- Ready to use, Pre-sensitized capillary film (no diazo)
- Flat surface profile, Low Rz value, superior dot to dot, line to line reproduction
- Consistent EOM value from screen to screen
- Fast stencil turnaround, simple application (capillary or direct/indirect method)
- Suitable for PCB, plastic, flat stocks, paper or plastic printing applications
- Suitable for solvent based, UV inks or electronic pastes
- Fast exposure time
- Long shelf life

## Specifications

<b>Emulsion Thickness</b>		12, 15, 20 $\mu$ m (MS-Film Dark)
		25, 30, 35, 40, 50, 80, 100 $\mu$ m (MS-Film)
<b>Cut Sheet Size</b>		MAX1,000 $\times$ 1,000mm
<b>Roll</b>	<b>Length</b>	10, 30, 50m
	<b>Width</b>	300, 640, 1000, 1200mm

\*Custom cut size available (min. order qty required. Contact us)

\*Emulsion to laminate for Direct/Indirect method: BC-10 or BC-100 recommended

## Solvent Resistance Rating

Water	Poor	Methyl Cellosolve	Poor
Toluene	Good	Isophorone	Good
Acetone	Fair	PGMEA	Fair
Ethyl Acetate	Fair	Isopropyl alcohol	Good
Buthyl Cellosolve	Good	Methyl ethyl ketone	Fair
N-methylpyrrolidone	Poor	Butyl carbitol acetate	Good
Cyclohexanone	Fair	Methanol	Poor
Xylene	Good	Terpineol	Good

※24hours swelling/absorption test results.

## Instructions

- Wash, degrease and dry screen mesh. Remove grease and foreign contaminants with MSP cleanser.
- Place cut film on flat work table, emulsion side facing up.  
On the top of cut film, place stretched screen (print side facing down) in a proper position.
- Spray water evenly over screen mesh from squeegee side. Tap the frame to spread water.
- Press film 1-2 times by the squeegee, then make a single squeegee stroke across the squeegee side.  
Wipe off any excess water.
- Dry it completely at temperatures up to 40°C(104°F) before exposure.
- For extended durability, use BC-10 or BC-100 emulsion to laminate MS-Film (Direct/Indirect method).  
( Contact Murakami for more technical information about how to use Direct/Indirect method)

## [Remarks]

- Keep MS-FILM in a cool UV light safe area and avoid high temperature and humidity.
- Store MS-FILM roll in a vertically standing position.

## Exposure Data

Screen mesh, Color	Film Thickness /E.O.M.	*3kw methal halide lamp (UV42 Intensity : 12mW/cm2)
Polyester 27/cm (70/inch) W	50/30	120-150sec.
Polyester 100/cm (250/inch) Y	20/11	65-85sec.
Polyester 140/cm (350/inch) Y	12/5	20-40sec.
Polyester 31/cm $\Phi$ 100 (80/inch) W	100+100/170	180-210sec
<b>Laminating process</b>	Manual : P↑S↑⇒ Laminate film↑ ⇒ S↑ ⇒ Drying	
	Machine : P↑S↑ ⇒ Laminate film↑ ⇒ S↑ ⇒ Drying	

\* Laminating emulsion: BC-10, \* Machine: Automatic coating machine, \* P:Print side, S: Squeegee side

\* Capillary application with water only yields E.O.M. value less than direct/indirect method.

Consequently, exposure time will be faster. Take a step wedge test to locate optimum exposure time.

※ The above is for guideline purposes only. Please use a gray scale exposure calculator to identify the optimal time.