

## • Handy Tips for Expert Press Operators •

### Ink Drying on the Press Rollers

#### CAUSES

- Roller pressure too great, creating high heat
- Fast drying varnishes in the ink
- Excessive drier in the ink
- Light take-off of ink



#### SOLUTIONS

- Add anti-oxidant to retard drying
- Reduce ink strength to carry more ink
- Add an alkyd varnish to increase flow/hold-out
- Adjust rollers to minimize pressure for good transfer

### Lags in Drying Time

#### CAUSES

- Interaction between ink, additives, dampening solution
- Dampening solution pH-value below 4.7
- Improperly dosed drying accelerators
- Stack temperature that is too low
- Excessively emulsified ink
- Heavy ink film



#### SOLUTIONS

- Use IR drying
- Avoid ink emulsification
- Ensure optimal tuning between ink and paper
- Only dose additives according to recommended ratios
- Avoid high ink film densities or high pigment inks
- Do not allow the pH-value of the dampening solution below 4.7

### Excessive Plate Wear

#### CAUSES

- Ink emulsification, poor transfer, mistaken for wear
- Form roller pressure too high against plate
- Plate to blanket packing is too heavy
- Plate exposure too short or too long
- Abrasive particles from paper stock
- Ink too strong for long runs
- Fountain solution too acidic
- Poorly ground ink pigment



#### SOLUTIONS

- Increase pH of fountain solution
- Reduce ink strength and carry more ink
- Check plate and blanket packing for correct gauge
- Ask your ink supplier about pigment grind spec

- Change to properly exposed/developed plate
- Switch paper if possible
- Check remedies for ink emulsification
- Check your form roller pressure setting

### Print is Mottling and has Uneven Density

#### CAUSES

- On particular papers transparent inks show mottle
- Low ink viscosity, uneven hold-out
- Too much ink being carried
- Too much impression



#### SOLUTIONS

- Run a stronger ink to permit a thinner film
- Check impression and plate to blanket pressures.
- Use higher viscosity ink; less absorption, no mottle

### Poor Ink Trapping or Overlay Between Colors During Process Printing ~ Also known as Wet Trapping

#### CAUSES

- Second-down color stronger than first-down color
- Not enough tack differential between colors
- Improper ink film thickness on rollers
- Too high of water/ink combination
- Too much hold-out on paper

#### SOLUTIONS

- Cut tack in second color ink
- Reduce water and/or ink
- Increase tack and viscosity of first-down color
- Strengthen first-down color or weaken second-down



### Printed Sheets Show Color Variation from Sheet-to-Sheet During Press Run with Unstable Ink Film Densities

#### CAUSES

- Contaminated ink fountain; dust, grit, solvents, etc.
- Low ink level in the fountain
- Ink 'backing away' from fountain roller
- Improper roller settings
- Ink emulsification
- Roller stripping

#### SOLUTIONS

- Agitate ink in the fountain
- Clean and de-glaze the rollers
- Check and reset rollers
- Increase ink flow by using longer stroke
- Decrease water or add heavy body varnish
- Remove ink, clean fountain, replace with fresh ink
- Keep ink fountains full to maintain head pressure



Winning Ink for Winning Customers

# Litho Inks



When you're looking for...

- **Trouble-Free Press Runs**
- **The Widest Choice of Colors**
- **Formulations for Most Every Application**
- **Economical Prices + FREE Shipping!**

**Our** quality litho inks are produced in small batches under stringent quality controls. Finely ground high grade pigments are used that provide a higher solids content and unmatched color strength in Pantone colors. Most of these inks have a high natural oil content with just 0-5% VOC's.

Got Ink? We've got you covered!  
'Inky'



THE PRINTERS SHOPPER

**800-341-6650**

ThePrintersShopper.com

## Most Popular Rubber Base Inks

2nd column=Can Weight ~ 3rd Column=Order Number

If you don't see what you need below just give us a call with your requirements. We can formulate any color for most any application, and include it with your order. And remember, shipping is FREE!

Pantone Yellow	1	NK10011	\$26
Pantone Warm Red	1	NK10021	\$27
Pantone Rubine Red	1	NK10031	\$25
Pantone Rhodamine Red	1	NK10041	\$34
Pantone Purple	1	NK10051	\$39
Pantone Violet	1	NK10061	\$40
Pantone Reflex Blue	1	NK10071	\$27
Pantone Reflex Blue	5	NK10075	\$100
Pantone Process Blue	1	NK10081	\$24
Pantone Green	1	NK10091	\$32
Pantone Trans. Mxng White	1	NK10101	\$25
Pantone Neutral Black	1	NK10111	\$28
Opaque White	1	NK1PQW1	\$27
PMS 021 Bright Orange	1	NK10211	\$31
PMS 032 Red	1	NK10321	\$31
PMS 185 Medium Red	1	NK11851	\$31
PMS 185 Medium Red	5	NK11855	\$121
PMS 199 Pepper Red	1	NK11991	\$31
PMS 221 Ruby Red	1	NK12211	\$31
PMS 485 Sunset Red	1	NK14851	\$31
PMS 201 Burgundy	1	NK12011	\$31
PMS 469 Autumn Brown	1	NK14691	\$31
PMS 286 Commodore Blue	1	NK12861	\$31
PMS 293 Liberty Blue	1	NK12931	\$31
PMS 300 Medium Blue	1	NK13001	\$31
PMS 072 Blue	1	NK10721	\$31
PMS 541 Blue	1	NK15411	\$31
PMS 340 Green	1	NK13401	\$31
PMS 347 Ivy Mint Green	1	NK13471	\$31
CSTM Custom Color Rubber Base	1	NK101CU	\$57
CSTM Custom Color Rubber Base	5	NK105CU	\$145

## Most Popular Oil Base Inks

2nd column=Can Weight ~ 3rd Column=Order Number

Process Yellow	5	NKY1365	\$57
Process Magenta/Red	5	NKR1635	\$59
Process Cyan/Blue	5	NKB1635	\$60
Process Black	5	NKK3345	\$60
Pantone Yellow	1	NK20011	\$22
Pantone Warm Red	1	NK20021	\$20
Pantone Rubine Red	1	NK20031	\$20
Pantone Rhodamine Red	1	NK20041	\$27
Pantone Purple	1	NK20051	\$30
Pantone Violet	1	NK20061	\$30
Pantone Reflex Blue	1	NK20071	\$24
Pantone Reflex Blue	5	NK20075	\$87
Pantone Process Blue	1	NK20081	\$21
Pantone Green	1	NK20091	\$26
Pantone Trans. Mxng White	1	NK20101	\$19
Pantone Neutral Black	1	NK20111	\$21
Opaque White	1	NK2PQW1	\$20
PMS 021 Bright Orange	1	NK20211	\$29
PMS 032 Red	1	NK20321	\$29
PMS 185 Medium Red	1	NK21851	\$29
PMS 185 Medium Red	5	NK21855	\$109
PMS 199 Pepper Red	1	NK21991	\$29
PMS 221 Ruby Red	1	NK22211	\$29
PMS 485 Sunset Red	1	NK24851	\$29
PMS 201 Burgundy	1	NK22011	\$29
PMS 469 Autumn Brown	1	NK24691	\$29
PMS 286 Commodore Blue	1	NK22861	\$29
PMS 293 Liberty Blue	1	NK22931	\$29
PMS 300 Medium Blue	1	NK23001	\$29
PMS 072 Blue	1	NK20721	\$34
PMS 541 Blue	1	NK25411	\$29
PMS 340 Green	1	NK23401	\$29
PMS 347 Ivy Mint Green	1	NK23471	\$29
CSTM Custom Color Oil Base	1	NK201CU	\$55
CSTM Custom Color Oil Base	5	NK205CU	\$133

## Most Popular Black & Metallic Inks

2nd column=Can Weight ~ 3rd Column=Order Number

Black Low Tack Oil-Base	1	NKK1461	\$19
Black Low Tack Oil-Base	5	NKK1465	\$60
Black Medium Tack Oil Base	1	NKK0631	\$19
Black Medium Tack Oil Base	5	NKK0635	\$61
Process Black Oil-Base	1	NKK1261	\$19
Process Black Oil-Base	5	NKK3345	\$60
Black Medium Tack Rubber-Base	1	NKK0501	\$22
Black Medium Tack Rubber-Base	5	NKK0505	\$75
Metallic Gold PMS 873	1	NK28731	\$41
Metallic Silver PMS 877	1	NK28771	\$36

### Auxiliary Ink Products

Drying Activator, Mix 1/4-1/2 oz/lb	1	CH7008	\$38
Lithco Anti-Skin Spray - Color-Safe	13 oz	AER-IF	\$18
Non-Aerosol Anti-Skin, Pump bottle	17 oz	CHM-IF	\$18
Semi-Flex Lamson Ink Knife, 1.75"W x 6"L		900-6	\$29

## Most Beneficial Features

- Runs on all offset presses.
  - Laser safe after 72 hours.
  - Works with all plate systems.
  - Compatible with all dampening systems.
  - Fast setting for quick work & turn.
  - High gloss and high rub resistance.
  - UV and aqueous coatable.\*
- ### Rubber Base Special Characteristics
- High body; both low and med/high tack available.
  - Rapid setting, reduced need for spray powder.
  - Retains excellent stay-open properties.
  - Optimized for use with metal plates.
  - Formulated to meet needs of small format presses.
  - Excellent performance on high speed forms presses.

### Rubber Base Black Special Characteristics

- Stays open up to several weeks.
- Perfect for numbering.
- Excellent set speeds and consistent density.
- Jet black coverage on almost any stock!

\* For any UV or aqueous coating applications, substitute inks are available for Rhodamine, Purple, Violet and Reflex.

— All pricing is subject to change without notice —  
Printed swatch colors may vary from true formulation

### X-RES DIGITAL MIXING SCALE

Mix more than 95% of all popular ink formulas in amounts as little as 1/4 lb., and even less if you prepare 'base inks' (instructions included). This high resolution scale is simple to use and economical. Add it to your next ink order to save money and time on those special colors when only a small amount is needed for a job. Order# X-RES-3, \$179

