



CONSIDERING DOP PLATES?

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offset printing industry.

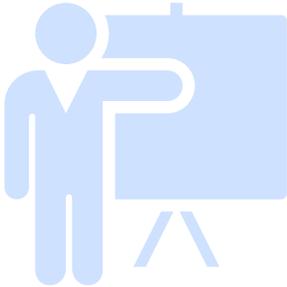
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INTRO TO DOP PLATES



Develop on Press (DOP) offset plate technology has matured into a reliable substitute for wet process plates in many shops.

DOP plates simplify production and reduce costs.

DOP plates send an eco-friendly message to print buyers.

The DOP process is simple:

- Image the plate
- Mount the plate
- Dampen the plate
- Engage the ink rollers and feed the paper

During this process the unexposed plate emulsion is carried away by the early makeready sheets on the way to getting up to color.

DOP offset plates are negative working and imaged on 830nm thermal CTP devices.

DOP plate applications may vary between plate brands.

IS DOP RIGHT FOR YOU?



DOP ADVANTAGES



- Eco-friendly
- Reduced total pre-press cost
- No processor
 - No chemistry
 - No water
 - No processor maintenance

DOP DISADVANTAGES



- Not for the longest press runs
- Not bakeable
- Some brands unsuitable for UV ink
- Less tolerant of poor press maintenance

KNOW YOUR PLATE

FIND THE BALANCE THAT SUITS YOUR OPERATION

TECHNICAL

- Application
 - Cold Web, Heat Web, Sheetfed, UV
- Run Length for your applications
- Sensitivity (exposure power required)
- Platesetter compatibility (inc. GLV devices)
- Resolution for AM & FM Screening (inc. Square Spot)
- Post exposure visible image
- Chemical resistance
- Scratch resistance
- Roll-up (number of sheets required)
- Dot loss (sharpening) across press run

HANDLING

- White Light Handling
- Safelight Handling
- Length of time between exposure & press
- Temperature & Humidity
 - Storage environment
 - Work environment
- Storage life

SUPPLY CHAIN

- Sizes & grain direction for your application
- Lead time for delivery
- Plate pricing

COMMON QUESTIONS

DOP plate specs will vary between manufacturers. DOP plates within a manufacturer can also have multiple plate generations with each successive generation offering improvement over the previous. The point being don't assume all DOP plates have the same attributes.



Will DOP plates contaminate my ink?

The DOP development process includes the mechanical removal of unexposed emulsion via the press sheet. The emulsion is not chemically dissolved.

Reports of contamination can often be traced to over dampening, improper exposure or mishandling of plates. Please consult with your plate manufacturer for their exact recommendations.

Common press problems such as calcium build up or blanket/roller glazing may be more evident with DOP plates.



What DOP run lengths can I expect?

Run lengths depend on press conditions and paper stock.

Each generation of DOP plates improves run length. It is common to see the latest rated up to the following number of impressions:

Sheet Fed - It is common to see ratings of 150,000 impressions with some plates rated from 200,000 to 250,000

Web - it is common to see ratings of 200,000 - 250,000 Impressions with some plates rated to 400,000

UV Ink - it is common to see ratings of 50,000 impressions with some plates rated to 100,000

COMMON QUESTIONS

3

What sort of CTP device can be used?

DOP plates are 830nm negative thermal for external drum devices. Most DOP plates can be exposed in a range of 800nm to 850nm.

Some DOP plates are not suitable for GLV devices.

4

Can the plate be handled in white light?

Pre-exposure – The length of white light handling will vary by manufacturer. Many plates are also sensitive to daylight which contains UV.

Post-exposure storage – This must also be considered since the unexposed emulsion remains on the plate until it is developed on press. Consult your DOP manufacturer for their handling specs.

The use of G10 yellow safelights is very common.

5

Is there a visible image after exposure?

Most plates today will have adequate post exposure contrast for make easy cylinder identification.

Generally this image is inadequate for initial plate linearization without the use of an image enhancing fluid

6

What sort of resolution can be expected?

DOP Plates suitable for sheetfed will typically resolve up to 1-99% @ 200lpi or 20 micron stochastic.

Resolution is dependent on the imaging device and the screening.

MANUFACTURERS & BRANDS

MANUFACTURER BRANDS

- Agfa Azura TE
- Agfa Eclipse
- Fuji Superia XD
- IBF Eco DOP
- Kodak Sonora X
- Kodak Sonora XP
- Kodak Sonora XTRA
- Konita KTP-NP

MANUFACTURER NEWS PLATE BRANDS

- Agfa Avatar ZP
- Fuji Ecomaxx TN
- Kodak Sonora X-N
- Kodak Sonora XP News

DISTRIBUTOR BRANDS

- Certus Verde NP
- Dotworks Insta-Print HD
- New Century ECO-PRO DOP
- New Century NP
- New Century NP-LR
- Presstek Anthem Elite DOP

SUMMARY



- Today's DOP plates are ideal for a large number of offset environments and applications.
- The technology is evolving and not all DOP plates have the same attributes.
- DOP Plates will simplify your pre-press and reduce your overall costs.

Please address questions or comments to:

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