

# LITHOGRAPHIC, DRY OFFSET, GRAVURE, FLEXOGRAPHIC AND ROTARY SUMMARY FOR SHEN'S ART PRINTING CO., LTD - GMI ID: SD8C2

ON-SITE 1 STATUS IS FULL CERTIFICATION

## Underlying purpose of the Onsite Evaluation

To assist the printer in the ability to produce packaging materials to the brand owner print standards. The standards follow industry guidelines and accepted practices.

## Framework of the Onsite Evaluation

We use two primary tools during the evaluation: 1) Print Test Kit 2) Onsite Evaluation Document.

### Print Test Form

Each printer is required to produce a Print Test Form while a Certification Engineer is present.

1. This print test will be used to evaluate their ability to accomplish a number of critical components required to produce to the required standards, including:

2. The printer can produce a set of plates from the provided files that meet the established requirements
3. The printer can produce a printed product from those plates that meet the established requirements
4. Measured technical data embedded in the printed product meets the established requirements

### Onsite Evaluation Document

This document, and the site evaluation itself, is organized around **3 primary areas of production:**

1. Prepress
2. Image Carriers
3. Ink & Press

Each of the 3 primary areas of production are divided into subcategories to determine how well a printer is able to control the process within various disciplines.

The subcategories are then measured and scored based on **5 standard evaluation criteria:**

1. Documentation
2. Maintenance
3. Operator Capability
4. Performance
5. Training

Scoring for each of the 5 standard evaluation criteria is based on a 0-3 scale:

- 0 = Fully Compliant
- 1 = Minor Defect (compliant but needs improvement)
- 2 = Major Defect (intent to meet compliance)
- 3 = Critical Defect

The final score for each subcategory is calculated as a weighted average of the numerical values applied to the standard evaluation criteria.

There are 3 possible outcomes from the evaluation:

1. Full Certification - requires a weighted average score of 1.00 or less in every subcategory
2. Certification Pending - requires a weighted average score of 1.50 or less in every subcategory
3. No Certification - requires a score of 3 in any of the 5 standard evaluation criteria

Category	Subcategory	Weighted Average Score	Defect Summary
Prepress	1.1 Digital Artwork File Acceptance and Processing	0.67	2 Minor Defects, 0 Major Defects, 0 Critical
	1.2 Proofing	0.50	2 Minor Defects, 0 Major Defects, 0 Critical
	1.3 Barcode Grader	0.00	0 Minor Defects, 0 Major Defects, 0 Critical
Image Carriers	2.1 Image Carrier Equipment Maintenance	0.00	0 Minor Defects, 0 Major Defects, 0 Critical
	2.2 Image Carrier Quality, Defect Control and Measuring	0.40	0 Minor Defects, 1 Major Defects, 0 Critical
	2.3 Image Carrier Room Climate Control	0.00	0 Minor Defects, 0 Major Defects, 0 Critical
Ink & Press	3.1 Ink Management	0.50	2 Minor Defects, 0 Major Defects, 0 Critical
	3.2 Color Viewing Area	0.00	0 Minor Defects, 0 Major Defects, 0 Critical
	3.3 Handheld Color Measurement Device	0.80	2 Minor Defects, 1 Major Defects, 0 Critical
	3.4 Press Maintenance	0.40	0 Minor Defects, 1 Major Defects, 0 Critical
	3.5 Press Room Climate Control	0.00	0 Minor Defects, 0 Major Defects, 0 Critical
	3.6 General Consumables	0.00	0 Minor Defects, 0 Major Defects, 0 Critical
	3.7 Substrate Management and Substrate Normalization	0.00	0 Minor Defects, 0 Major Defects, 0 Critical

PREPRESS

1.1 DIGITAL ARTWORK FILE ACCEPTANCE AND PROCESSING

<p>This subcategory evaluates the prepress facility procedures regarding how digital artwork files are received (file transfer), preflighted, trapped, normalized (ripped). Review of digital infrastructure; security, backup and recovery, and disaster recovery plan availability.</p> <p>*If outsourced, verification process of File Processing Methods will be audited (preflight, submission, transfer, receiving and trapping of files).</p>	1.1.1	Documentation	Operational procedures for digital artwork file acceptance and processing is documented, approved by management and posted/readily available to staff.	1
	1.1.3	Operator Capability	Operator(s) displays adequate skill and knowledge to execute digital artwork acceptance and processing based on approved standard operating procedures.	1
	1.1.4	Performance	Digital artwork file acceptance and processing are performing at optimum levels to the defined approved facility and manufacturer requirements.	0
				<b>0.67</b>
				Weighted Average Score:

Comments: The SOP file should be more details and same with check list.

1.2 PROOFING

<p>This subcategory evaluates the presence of proofing equipment and the capability for proofing in-house including the ability to replicate the press output. Review of proofer maintenance and calibration procedures to ensure repeatable results. Profile management system for managing the simulation of various print conditions and proof validation process.</p>	1.2.1	Documentation	Operational procedures for proofing is documented, approved by management and posted/readily available to staff.	1
	1.2.2	Maintenance	Maintenance is executed in accordance with established standard operating procedures for proofing.	1
	1.2.3	Operator Capability	Operator(s) displays adequate skill and knowledge to operate the proofing equipment based on approved standard operating procedures.	0
	1.2.4	Performance	Proofing is performing at its optimum level based on the defined approved facility and client requirements.	0
				Weighted Average Score: <b>0.50</b>

Comments: The checklist of digital proof need more details.

1.3 BARCODE GRADER

<p>This subcategory evaluates the presence of a barcode grader and related procedures for use, reporting, calibration and maintenance.</p>	1.3.1	Documentation	Operational procedures for barcode grading is documented, approved by management and posted/readily available to staff.	0
	1.3.2	Maintenance	Maintenance is executed in accordance with established standard operating procedures for the barcode grader.	0
	1.3.3	Operator Capability	Operator(s) displays adequate skill and knowledge to operate the barcode grader based on approved standard operating procedures.	0
	1.3.4	Performance	The barcode grader is performing at its optimum level based on the defined facility and manufacturer requirements.	0
				Weighted Average Score: <b>0.00</b>

Comments:

IMAGE CARRIERS

2.1 IMAGE CARRIER EQUIPMENT MAINTENANCE

This subcategory evaluates operational ability and function of the image carrier imaging RIP, image carrier imaging unit, image carrier developing unit including waste management of used consumables. \* If outsourced, verification process of incoming image carriers is required (metric results, thickness, dots, curves, etc.).

2.1.1	Documentation	Operational procedures for the plate imaging RIP is documented, approved by management and posted/readily available to staff.	0
2.1.2	Maintenance	Maintenance is executed in accordance with established standard operating procedures for the plate imaging RIP.	0
2.1.4	Performance	The plate imaging RIP is performing at its optimum level to the defined manufacturer requirements.	0
Weighted Average Score: 0.00			

Comments:

2.2 IMAGE CARRIER QUALITY, DEFECT CONTROL AND MEASURING

This subcategory evaluates quality of the image carrier (including low process). The existence of a quality control method for ensuring proper dot percentages and/or curves, commonly in the form of a control wedge or scale. The presence of a reader; tonal reading capability, magnification capability, proof of calibration of the reader and operator knowledge.

2.2.1	Documentation	Operational procedures for the plate reader is documented, approved by management and posted/readily available to staff.	0
2.2.2	Maintenance	Maintenance is executed in accordance with established standard operating procedures for the plate reader. Calibration procedures and schedule of the device is available.	2
2.2.3	Operator Capability	Operator(s) displays adequate skill and knowledge to operate the plate reader based on approved standard operating procedures.	0
2.2.4	Performance	The plate reader is performing at its optimum level based on defined manufacturer requirements.	0
2.2.5	Training	Established training program with regular training sessions and readily available self training reference material.	0
Weighted Average Score: 0.40			

Comments:

The daily screen dot record need to be more details.

2.3 IMAGE CARRIER ROOM CLIMATE CONTROL

This subcategory evaluates the environmental condition of the plate room; verifies that the room temperature and humidity levels enable optimum equipment and substrate performance, and that those specific levels are monitored and maintained.

2.3.1	Documentation	Operational procedures for plate room climate control is documented, approved by management and posted/readily available to staff.	0
2.3.4	Performance	Plate room climate control is performing at its optimum level to the defined facility and manufacturer requirements.	0
Weighted Average Score: 0.00			

Comments:

## INK & PRESS

### 3.1 INK MANAGEMENT

This subcategory evaluates the resources available for proper measuring process color, spot color, brand color and expanded color ink sets. Includes verification that print facility is tracking and/or retaining ink manufacturer Certificate of Analysis; drawdown, ink batch, and dryback testing performed on process color and expanded gamut color ink sets; tracking and documentation related to fade resistance of process color and expanded color ink sets.

3.1.1	Documentation	Operational procedures for process and expanded ink measurement goals, dryback results, fade resistance, and Certificate of Analysis tracking is documented, approved by management and posted/readily available to staff.	1
3.1.3	Operator Capability	Operator(s) displays adequate skill and knowledge to evaluate process and expanded inks and review and retain the Certificate of Analysis from ink manufacturer based on approved standard operating procedures.	1
3.1.4	Performance	Process and expanded inks are performing at their optimum level to the defined client specifications. Evidence process colors meet the Packaging Printing Process Control Guidelines. Established tolerance for process colors must be at or below E 3.5 utilizing E2000 color difference model.	0
3.1.5	Training	Established training program with regular training sessions and readily available self training reference material.	0
Weighted Average Score: <b>0.50</b>			

Comments:

The ink formula record is too simple, need to improve.

### 3.2 COLOR VIEWING AREA

This subcategory evaluates the presence of a color viewing area and compliance to specified lighting temperature and viewing conditions. Color viewing area must have proper D50 lighting conditions. Color viewing is monitored and recorded regularly to for optimum viewing conditions.

3.2.1	Documentation	Operational procedures for the color viewing area is documented, approved by management and posted/readily available to staff.	0
3.2.4	Performance	Color viewing area is performing at its optimum level based on the defined approved facility and manufacturer requirements. Facility has proper tools and/or devices to measure bulb performance in relation to meeting D50 lighting compliance.	0
Weighted Average Score: <b>0.00</b>			

Comments:

### 3.3 HANDHELD COLOR MEASUREMENT DEVICE

This subcategory evaluates the presence of a handheld device used for color critical analysis and its capability to measure L\*a\*b\* values. The press operator's ability to use the device to measure spot and process color in a D50 viewing environment; confirm proof of device calibration and that operator has a thorough understanding of theory and practice.

3.3.1	Documentation	Operational procedures for the handheld color measurement device is documented, approved by management and posted/readily available to staff. If using a NetProfiler or comparable service, documentation of calibration and profiles to be provided.	0
3.3.2	Maintenance	Maintenance is executed in accordance with established standard operating procedures for the handheld color measurement device. Calibration procedure with schedule of the device is available. Calibration certificate is valid and available to GMI auditor for reference. If using a NetProfiler or comparable service, maintenance scheduling of each device is posted and readily available.	0
3.3.3	Operator Capability	Operator(s) displays adequate skill and knowledge to operate the handheld color measurement device based on approved standard operating procedures. If using a NetProfiler or comparable service, demonstration of the calibration practice.	1
3.3.4	Performance	The handheld color measurement device is performing at its optimum level to the defined manufacturer requirements.	2
3.3.5	Training	Established training program with regular training sessions and readily available self training reference material.	1
Weighted Average Score: <b>0.80</b>			

Comments:

Operators are lack of knowledge for eXact.Need more training.

### 3.4 PRESS MAINTENANCE

This subcategory evaluates but not limited to the equipment manufacturers recommended maintenance schedule; regularly scheduled maintenance and a preventative maintenance program.

3.4.1	Documentation	Operational procedures for press maintenance is documented, approved by management and posted/readily available to staff. Documentation should include the details of the roller settings maintenance.	0
3.4.2	Maintenance	Maintenance is executed in accordance with established standard operating procedures for press maintenance. Maintenance schedule should include inking system and ink rollers.	2
3.4.3	Operator Capability	Operator(s) displays adequate skill and knowledge to execute press maintenance based on approved standard operating procedures.	0
3.4.4	Performance	Press is performing at its optimum level to the defined manufacturer requirements.	0
3.4.5	Training	Established training program with regular training sessions and readily available self training reference material.	0
Weighted Average Score: <b>0.40</b>			

Comments:

The record is simple.

3.5 PRESS ROOM CLIMATE CONTROL

This subcategory evaluates the environmental condition of the press room; verifies that the room temperature and humidity levels enable optimum equipment and substrate performance, and that those specific levels are monitored and maintained.

3.5.4	Performance	Press room climate control is performing at its optimum level to the defined manufacturer requirements.	0
			0.00
			Weighted Average Score:

Comments:

3.6 GENERAL CONSUMABLES

This subcategory evaluates procedures in place for ordering and evaluating incoming consumables with correlating Certificate of Analysis.

3.6.4	Performance	Performance of general consumables are at its optimum level to the defined manufacturer requirements.	0
			0.00
			Weighted Average Score:

Comments:

3.7 SUBSTRATE MANAGEMENT AND SUBSTRATE NORMALIZATION

This subcategory evaluates substrate management; verification of incoming materials with correlating Certificate of Analysis, normalization, storage and staging policies.

3.7.1	Documentation	Operational procedures for substrate management and normalization, and correlating Certificate of Analysis is documented, approved by management and posted/readily available to staff. Documentation to be on hand for; incoming substrate identity and use, substrate disposal, substrate defect and substrate return policy.	0
3.7.4	Performance	Substrate management and normalization is performing at its optimum level to the defined manufacturer and client specifications. Evidence storage is shielded from rain, snow, dust and direct sun light. Evidence of a substrate normalizing process.	0
			0.00
			Weighted Average Score:

Comments: