Offset

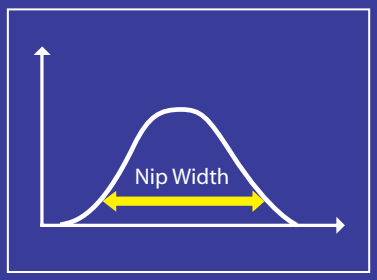
2nd Generation!

New electronics
Improved software
Higher precision

Nip Width Indicator™

Formerly Roller Nip Indicator

Nip width in millimeters or inches



nip control

Precise, Fast and Clean nip width measurements

The roller nip is critical in offset printing, both transporting and processing the ink and fountain solution. Offset technology is unique in that its process components – ink and water – are mixed under pressure.

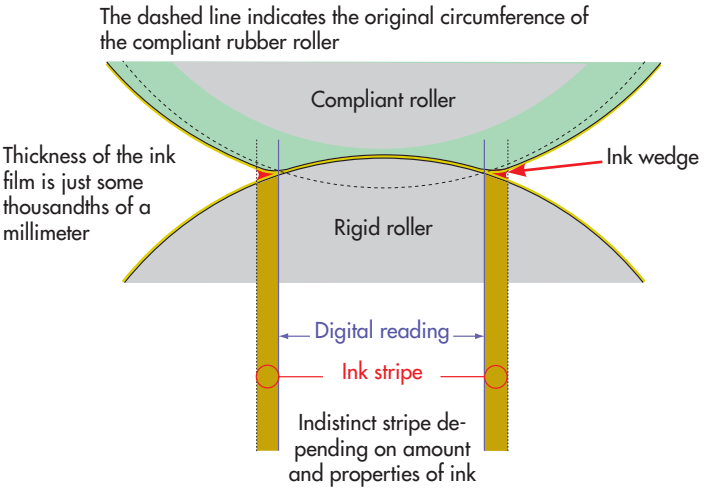
The ink stripe – indicating the visual imprint when two rollers are in contact – **varies according to type and amount of ink as well as in terms of viscosity, tack and yield value**.

Analyzing an ink stripe is not always easy or accurate, due to its indistinct edge. Pressmen sometimes estimate from the outside of the stripe, sometimes from the inside.

The Nip Width Indicator employs a different approach, measuring the nip width from the moment **actual nip pressure** is applied until it ceases. Maintaining a true, process-correct nip width at a constant level ensures the greater stability of the overall offset process.

The **Nip Width Indicator** – a high-technology digital instrument – measures nip width based on the true roller pressure contact.

Ink stripe vs digital nip width



Ink stripe (visual roller contact)...

Option

Traceable Calibration™

– the ultimate quality control feature

The standard Nip Width Indicator instrument self-checks the sensor blade during start-up. If the sensing element has become worn from usage and no longer meets specified performance parameters, a message will be displayed, warning that the blade cannot be used.

Many companies, however, follow quality standards which include measurement traceability.

Nip Control's new calibration and verification system for the **Nip Width Indicator** fulfils these demands.

Simple to use

1. Position the tip of the sensor blade between the rollers
2. The display shows readings in millimeters or inches
3. Adjust the nip width to desired level

Measurements should be taken at both ends of the roller nip and in the center. Measurement and roller settings will always be the same – whoever performs the task.

No ink is needed, so no cleaning is necessary after measurements are completed. However, if you need to troubleshoot while in production mode, measurements can be taken even with ink on the rollers.

nip control

Digital nip width measurements

Improved Productivity & Print Stability

- Measures nip width where true roller pressure starts and stops
- Correct measurement regardless of ink type and ink viscosity
- More precise than visual ink-stripe estimates
- Detect uneven nip width due to swelling, shrinking or non-parallel alignment
- Up to 50 percent quicker than estimating an ink stripe
- Pressman-independent. Objective and standardized. Facilitates printing by numbers
- Digital measuring stabilizes the offset process
- Correctly adjusted roller nips ensure process variables – ink and water – are optimally transported and mechanically processed
- Better controlled process results in more production time
- Fast and easy troubleshooting
- A cleaner measuring technique: no ink or cleaning agent

Note: the roller load and corresponding ink stripe is calculated by the press manufacturer for new rollers. Nevertheless, the rubber's characteristics change over time. The surface hardens and sometimes swells or shrinks from the effects of ink and chemicals, temperature, bulk elasticity and number of revolutions. Consequently, an initially correct nip setting can become incorrect, leading to instability and deterioration of the offset process.

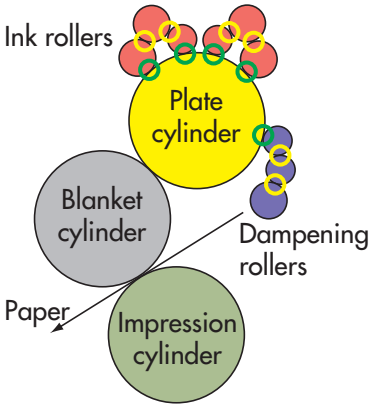
The **Nip Width Indicator** measuring system comprises a handheld instrument and a flexible sensor blade. The sensor blade is easily exchanged.

nip control

Nip Width Indicator™ measuring system

- hand device + sensor blade
- option: calibration unit

Where to measure in the offset printing press



- nips between rollers
- nips between form rollers and plate

Specification

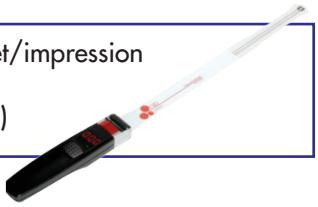
	Part No.	Nip width / calibration
Standard instrument	W102	
Instrument with calibration software	W102CAL	
Sensor blade 300 mm / 11.8″	SS30002	2–20 mm / 0.08–0.8″
Sensor blade 500 mm / 19.7″	SS50002	5–50 mm / 0.2–2″
Calibration unit	CAL10SS	Calibration of SS30002
Calibration unit	CAL30SS	Calibration of SS50002
Sensor blade thickness:	0.4 mm / 0.016″	
Nip temperature:	20–50° C / 68–122° F	
Roller diameter:	≥10 mm / 0.4″	
Cylinder surfaces:	Metal to rubber / rubber to rubber	
Rubber hardness:	20–80° shore A	
Measurements per sensor:	Tested up to 1 000 times	
Measuring units:	Millimeter or inches	
Display resolution:	0.5 mm or 1/100 inch	
Patent:	SE-519 918. Patent	
	SE-1450052-4 Patent Pending	

Simple to Use

- One-button control
- Only one operator needed
- Bright LED display for easy readings
- Standard AAA batteries and power-save function
- Sensor blades can measure with either side towards either roller
- Three-step safety design to protect the operator
- Can be used on all offset presses from any manufacturer
- Delivered in a robust instrument case

Other Nip Control Instruments

Nip pressure, not the ink stripe, processes the ink. Measure roller nips as the offset process works. Use **Pressure Indicator – *Low Pressure version*** (P102LP)



Measure nip pressure between plate/blanket, blanket/impression and blanket/blanket nips with the **Pressure Indicator – *High Pressure version*** (P102HP)

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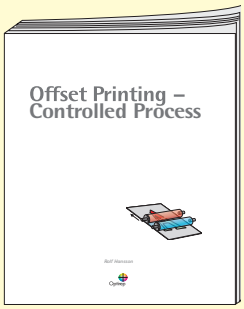
- **Fully offset process-correct**
- **Up to 50% faster**
- **Exact measurements**
- **Consistent roller setting**
- **Operator independent**
- **Measure with or without ink**
- **Traceable Calibration™**

Learn more about offset technology:



New handbook for printers and universities.
Order at **www.optirep.net**

"With standardized information and shared common measurement values work efficiency has improved".

Mr. Horiuchi, Process Manager,
Taisei Futuba, Japan

"We are really pleased with how the Nip Width Indicator performs time and time again".

Carole at Abbey Print & Design, Great Britain

"The Nip Width Indicator is great and simple to use, and we save up to 50% time when setting the rollers".

Mr. Christian Thuy, Managing Director,
Druckerei Salinger & Thuy, Germany

"The experience given from being able to control roller settings with the Nip Width Indicator was so positive that we decided to also check blankets with the Pressure Indicator from Nip Control".

Peter Johansson, Segment Manager, Strålfors, Sweden, with operations in seven countries and > €500 in revenues