# LINX 8940 SPECTRUM



# High performance, high contrast pigmented coding with the Linx 8940 Spectrum

The Linx 8940 Spectrum provides reliable printing with high contrast pigmented inks, onto surfaces such as plastic cabling, extruded products and coloured glass.

Designed to print quality codes in challenging environments, and on high speed lines, **up to 10 m/s**, the Linx 8940 Spectrum also incorporates advanced features and capabilities, including

**live message creation and editing while printing** and accurate **'metre marking'** for cable and wire applications. Innovative hardware increases production uptime and extends maintenance intervals, providing reliable startups, even after **up to one month shutdown**.





# **Innovative**

- Best in class extended service interval of up to 8,000 hours or 12 months, with a range of inks
- Patent-pending PureFlow® is an innovative, powerful filtration system for opaque print and a cleaner nozzle
- Premium print quality and trouble-free restarts from patentpending Vortex®, a robust mixing tank with a unique method of re-dispersing the settled heavy pigment



# Reliable

- Optimum performance, including in extreme environments and up to one month shutdown. The printer is ready to print first time, with no need for flushing or to be permanently powered on
- Linx robust sealed printhead means fewer interventions and less cleaning, typically only once per week, even when running continuously
- AutoFlush unique printhead cleaning sequence leaves the printhead and conduit clean and dry, ready for every startup



# **Easy to Use**

- Self-service option with an on-screen wizard to guide through the servicing process
- Simple user interface with large, icon-driven touch screen, with production-rate visibility
- ✓ Mistake-free one-touch, fluid cartridge refills during printing
- Linx PrinterNet<sup>®</sup> ready, for remote monitoring and control via a secure cloud-based service

# Linx 8940 Spectrum

#### **PRINTHEAD**

60mm minimum bend radius in static applications. 180mm minimum bend radius in dynamic applications.



#### SIDE ELEVATION



#### FRONT ELEVATION



#### 90° PRINTHEAD OPTION

270 degree adjustable positioning



# **Technical Specifications**

#### **PRINT SPEEDS AND SIZES**

Printhead:	Mk11 Midi	Mk11 Midi plus
Nozzle size:	62 µm	75 μm
Lines of print:	Up to 6	Up to 6
Character height range:	1.8 to 16 mm	2.1 to 17mm
Maximum speed for single line print (5 dot high characters):	7.50 m/s (0.469 mm drop pitch)	9.10 m/s (0.569 mm drop pitch)
Maximum speed for single line print - ultra fast tower print style (5 dot high characters):	-	10 m/s (0.625 mm drop pitch)
Maximum number of characters per second (10 m/s speed, 0.625mm pitch):	-	2666
Recommended distance from printhead to substrate:	12 mm	20 mm
Recommended distance from printhead to substrate - for high speed cabling:	-	5 mm

#### HARDWARE FEATURES

Easi-Change® Service Module, change interval: up to 12 months (8,000 hours)\*

Unique AutoFlush automatic printhead flushing and conduit clearing

Sealed printhead typically only requires cleaning once per week  $\ensuremath{^{*^*}}$ 

Printhead jet-speed control and temperature sensing for consistent printing in changing ambient temperatures

Mistake-proof, mess-free ink and solvent refilling while printing (0.5 litre ink cartridge, 1 litre solvent cartridge)

10-inch full colour touch screen with tough, solventresistant polymer cover

Fit-for-life ink pump with no scheduled changes required

Extended shutdowns (up to 28 days) without printer flushing or draining

Robust, flexible dual-tube conduit for static and moving printhead applications

#### **SOFTWARE FEATURES**

Single-press start print, pause print and jet shutdown

Auto power-off after jet shutdown

Simple message creation and editing with drag-and-drop field positioning, zoom function and insert mode for long messages

Total print count, message count and batch count

Message store display and message style selection

Password-protected functions, with customisable user profiles

Message creation/editing while printing

On-screen output rate measurement and production stoppage log. Downloadable onto USB

On-screen fluid level indicators, 12 hour running from fluid refill warning to printer stop in most applications

On-screen help and diagnostics information

PrintSync® automatic font and message format selection, based on message style selected and production line speed

Multiple operator languages (user selectable) with on-screen keyboards, secondary keyboard for multi-language printing

Simple line speed and shaft encoder setup wizard, for installation on new production lines

Up to 50 lines settings can be stored, with individual line names

Dynamic orientation for printing on traverse applications

Message store and printer settings backup, copy and restore using USB storage device

Saving remote field data over a power cycle

Linx Remote Communications Interface for connection to PCs or PLCs using Ethernet port or optional RS232 port

QuickSwitch® message selection, remote field update and message select-and-populate text field, using barcode scanner

Linx PrinterNet printer health and production monitoring with remote control (VNC) (option)

# MESSAGE PRINTING FACILITIES

Text, symbols and numbers

Prompted fields for one-step message editing with customisable on-screen prompts

Height, width and delay functions for easy code sizing and positioning

Automatic formats for printing dates, times and date rounding (using the printer's internal clock)

Custom date and time editor to create different date formats as required

Automatic date forward function. Add number of seconds, minutes, hours to the current time, or number of days, weeks or months to the current date

Automatic time adjustment option for daylight savings time

Sequential numbering, forward and backward counting, variable intervals, multiple number ranges, alphanumeric sequencing

One touch sequential number reset option from the printer screen, and reset using external trigger

Sequential text fields, increment and reset sequences using external triggers, optional one touch sequence reset from the printer screen

'Production Schedule' function, to print a sequence of messages automatically, with different orientation, repeat and delay options

Number of messages stored: up to 1000 using internal printer memory (depending on message content), more can be stored using a USB storage device

Variable character spacing for improved readability and vision system recognition

Rotated character (tower) printing

Reverse and inverted printing

Accurate marking at regular intervals i.e. 'metre marking', with rollback to detect lines running backwards and high precision calculation options

Logos and graphics can be imported into the printer as monochromatic bitmap files using the USB port

Shift coding (message content changes automatically at defined times)

Barcodes (ITF 2 of 5, Code 39, Code 128, EAN 13, EAN 8, UPCA, Pharmacode, Data Matrix, QR Code, RM4SCC-Type C)

#### **PRINTHEAD OPTIONS**

2m conduit

4m conduit (option)

90° printhead configuration (option)

Positive air purge to printhead (provides improved reliability in dusty or humid environments) (option)

Air dryer (provides improved reliability for certain inks at high humidity and temperature) (option)

#### INK RANGE

Linx MEK base high opacity pigmented inks

## CONNECTIONS/INTERFACING FOR

Product detector

Shaft encoder/secondary product detector

Multiple printer triggering from single product detector/shaft encoder including quadrature encoders for directional applications

USB – for printer settings and customer data backup, and Wi-Fi connection for Linx PrinterNet

Ethernet - for Remote Communications Interface and Linx PrinterNet

Volt-free contact alarm connection (e.g. for use with external mains-driven alarm) (option)

Dual alarm output (Volt-free and/or 24V output) (option) with multi-stage alarm option

RS232 (option) and Parallel I/O (option)

# PHYSICAL CHARACTERISTICS

Base and enclosure: Stainless steel

IP65 environmental protection rating\*\*\*

Mounting options: Static stand, mobile stand, bench, shelf for wall mounting

Operating temperature range: 5 – 45°C

Humidity range (r.h., non-condensing): 90% max

Power supply: 100-230V, 50/60Hz

Power consumption: 38W (typical when printing)

Power rating: 120 W

Weight: 24.7kg (including fluids and 2m printhead)

## **REGULATORY APPROVALS**

·CE ·UKCA ·UL ·CAN/CSA ·FCC ·BIS

\*Interval may be adjusted in certain environments and applications to provide reliable running between service module changes

\*\*\*When printing up to 16 hours a day, 5 days a week
\*\*\*IP rating is independently verified – certificates available
on request



