

# Empower your success



# CLNX Plus Technical Specifications

PRINTING SPECIFICATION		CL4NX PLUS			CL6NX PLUS		
Printing Method		Direct Thermal / Thermal Transfer			Direct Thermal / Thermal Transfer		
Print Mode		Continuous, Tear-off, Cutter, Rotary Cutter, Dispenser, Linerless, Continuous, Tear-off, Cutter, Dispenser.					
Print Resolution		8 dots/mm (203 dpi)	12 dots/mm (305 dpi)	24 dots/mm (609 dpi)	8 dots/mm (203 dpi)	12 dots/mm (305 dpi)	
Max. Print Speed		14 ips (355 mm/sec)	14 ips (355 mm/sec)	6 ips (152 mm/sec)	2-10 ips, (default 6 ips)	2-8 ips, (default 6 ips)	
Max. Print Area	Width	104mm (4.09")			167.5 mm (6.5")		
	Length	2500mm (98.42")	1500mm (59.05")	400mm (15.75")	203 dpi: 2500mm	305 dpi: 1500mm	
Processor		Dual CPU & Dual OS: CPU1: 800MHz for Linux OS, CPU2: 800MHz for ITRON OS					
Printer Memory		CPU1: 2GB ROM, 256MB RAM, CPU2: 4MB ROM, 64MB RAM					
CONSUMABLE SPECIFICATION		CL4NX PLUS			CL6NX PLUS		
(Recommended to use consumables manufactured or supplied by SATO)							
Sensor Type		I-mark Sensor (Reflective), Label Gap Sensor (Transmissive).					
Media Type		Roll or fan-fold die cut labels, Plain paper face stock, Synthetics and Continuous stock.					
Media Thickness		0.060 - 0.268mm (0.0024" - 0.011")					
Label Shape	Diameter	Maximum 265mm (10.43"), Core diameter: Ø76mm (3.0"), Ø101mm (4.0")			Maximum 220mm (8.6"), Core diameter: Ø76mm (3.0"), Ø101mm (4.0")		
	Wind Direction	Face In / Face Out. No Setting Change Required.					
Label Size (Without Liner)	Continuous	Width	22 - 128mm (0.87" - 5.04")	22 - 128mm (0.87" - 5.04")	22 - 128mm (0.87" - 5.04")	47-177mm (1.85" - 6.97")	47-177mm (1.85" - 6.97")
		Length	6 - 2497mm (0.24" - 98.30")	6 - 1497mm (0.24" - 58.94")	6 - 397mm (0.24" - 15.63")	6 - 2497mm (0.24" - 98.3")	6 - 1497mm (0.24" - 58.94")
	Tear-off/Cutter	Width	22 - 128mm (0.87" - 5.04")	22 - 128mm (0.87" - 5.04")	22 - 128mm (0.87" - 5.04")	47-177mm (1.85" - 6.97")	47-177mm (1.85" - 6.97")
		Length	17 - 2497mm (0.67" - 98.30")	17 - 1497mm (0.67" - 58.94")	17 - 397mm (0.67" - 15.63")	17 - 2497mm (0.67" - 98.3")	17 - 1497mm (0.67" - 58.94")
	Dispenser	Width	22 - 128mm (0.87" - 5.04")	22 - 128mm (0.87" - 5.04")	22 - 128mm (0.87" - 5.04")	47-177mm (1.85" - 6.97")	47-177mm (1.85" - 6.97")
		Length	10 - 397mm (0.39" - 15.63") <sup>†1</sup>	10 - 397mm (0.39" - 15.63") <sup>†1</sup>	10 - 397mm (0.39" - 15.63") <sup>†1</sup>	10 - 397mm (0.39" - 15.63")	10 - 397mm (0.39" - 15.63")
	Linerless	Width	60 - 118mm (2.36" - 4.65")	60 - 118mm (2.36" - 4.65")	60 - 118mm (2.36" - 4.65")	Not available	Not available
		Length	30 - 120mm (1.18" - 4.72")	30 - 120mm (1.18" - 4.72")	30 - 120mm (1.18" - 4.72")	Not available	Not available
Ribbon	Size	Max. Length: 600m (1968.5"). 450m (1476.4") when ribbon width is 39.5mm (1.55") Max. Roll Diameter: 90mm (3.5"), Ribbon width: 39.5mm (1.55") to 128mm (5.04")			Max. Length: 600m (1968.5"). 450m (1476.4") when ribbon width is 39.5mm (1.55") Max. Roll Diameter: 90mm (3.5") when ribbon width: 39.5mm (1.55") to 177mm (7.0")		
	Other	Core diameter: Ø25.4mm (1"), Wind direction : Face In/ Face Out, No Setting Change Required, Tubeless wind method.					
FONTS / SYMBOLOGIES		CL4NX PLUS			CL6NX PLUS		
Internal Fonts	Standard Bitmap	U, S, M, WB, WL, XS, XU, XM, XB, XL, X20, X21, X22, X23, X24, OCR-A, OCR-B					
	Scalable Fonts	30 SATO Fonts, 2 Outline Fonts.					
	Encoding	Major Latin and Pan-European Code Pages (WGL4), GB18030 (simplified), KSX1001 (Korean), BIG5 (traditional), JIS, SHIFT-JIS also supported.					
Barcode	Linear	UPC-A/UPC-E, JAN/EAN-13/8, CODE39, CODE93, CODE128, GS1-128(UCC/EAN128), CODABAR(NW-7), ITF, Industrial 2 of 5, Matrix 2 of 5, MSI, POSTNET, UPC add-on code, BOOKLAND, USPS code, GS1 DataBar Omnidirectional, GS1 DataBar Truncated, GS1 DataBar Stacked, GS1 DataBar Stacked Omnidirectional, GS1 DataBar Limited, GS1 DataBar Expanded, GS1 DataBar Expanded Stacked.					
	2D Symbolologies	QR Code, Micro QR Code, PDF417, Micro PDF, Maxi Code, GS1 Data Matrix, Data Matrix (ECC200), Aztec Code, GS1QR Code and Composite Symbolologies.					
Print Direction		Character data rotation: 0°, 90°, 180°, 270°					
User Downloadable Fonts, Graphics or Formats		Maximum 100MB					
INTERFACE CHARACTERISTICS AND INTEGRATION		CL4NX PLUS			CL6NX PLUS		
Standard Interfaces		USB 2.0 (Type A & B), RS232C, IEEE1284, EXT, Bluetooth Ver. 3.0*2, NFC, Ethernet (IPv4/v6) supporting:TCP/IP, LPR, FTP, SNMPv3, NTP, HTTP, DHCPv4, wired 802.1x, Stateless Auto Configuration, Stateful Auto Configuration (DHCPv6)					
Optional Interface		Wireless LAN, WiFi Certified, WiFi Direct, IEEE 802.11 a/b/g/n/ac Dual Band (2.4GHz, 5GHz) Security: WEP, WPA, WPA2, Dynamic WEP, DHCP Option 81					
Remote Access		SNMP Ver.3, HTTPs, SATO Alerte					
Supported printer protocols		Standard: SBPL (SATO Barcode Printer Language) Emulation Language: Auto detect - SZPL, SDPL, SIPL, STCL, SEPL					
OPERATING CHARACTERISTICS		CL4NX PLUS			CL6NX PLUS		
Power Requirements		AC100V ~ AC240V±10%, 50/60 Hz, Auto-ranging Power Supply			AC100V ~ AC240V±10%, 50/60 Hz, Auto-ranging Power Supply		
Environment	Operating	0 - 40°C / 30 - 80% RH (without condensation)					
	Operating Linerless	5 - 35°C / 30 - 75% RH (without condensation)					
	Storage	-20 - 60°C / 30 - 90% RH (without condensation)					
Dimensions		271mm (10.67") × 457mm (18.00") × 321mm (12.64")					
Weight		15.1kg (33.28 lbs)			20Kg (42 lbs)		
Display Panel		TFT Full Color LCD, 3.5"(320 x 240 RGB)					
MISCELLANEOUS		CL4NX PLUS			CL6NX PLUS		
UHF and HF options standard		UHF:a ISO 18000-6 Type C HF: ISO 1569593 & ISO 14443 Type A. Phase Jitter Modulation: 100% reading accuracy even when tags are stacked.			UHF: ISO 18000-6 Type C		
RFID Features		Fully integrated UHF RFID Reader / Encoder Module. Void marking of damaged or unreadable transponders, RFID data verification after programming. Multiple RFID power settings allow users to use individual transponder sizes, DIP (Direct Inlay Printing) allows use of short pitch labels. PWP allows flexible inlay positions, TID reading and printing as text and barcode.					
Functions – Useful features		Micro Label Printing, SATO Application Enabled Printing, SATO Online Services, 18 User Guidance Videos on Color LCD, Space for Customized Videos, Multi Language Support LCD Message (31 Languages), Energy Saving, Large Status LED, Multiple Interfaces-Auto-Switching, USB Memory for Data Copy, Status Return, Alarm Sound					
Functions – Self Diagnosis Checking		Thermal head check, Paper end detection, Ribbon end detection, Test print, Head lift detection					

\* CL6NX with RFID only supports UHF standard.

