NLS-EM3090
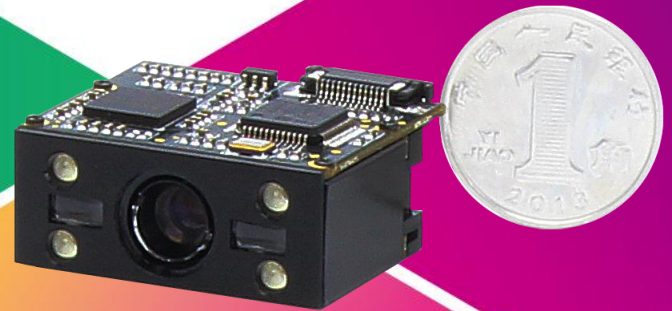
OEM Scan Engine

- ◆ **UIMG**® Technology   ◆ Compact & Lightweight Design

- ◆ Superior 1D Barcode Reading Performance

- ◆ Outstanding Power Efficiency

- ◆ Multiple Interfaces

Features

◘ UIMG® Technology

Newland's sixth-generation **UIMG**® technology gives the scan engine an edge with unrivaled decoding capabilities on 1D & 2D barcodes.

◘ Superior 1D Barcode Reading Performance

Optimized for reading 1D barcodes, the NLS-EM3090 can decode high-volume 1D barcodes and those of poor quality effortlessly.

◘ Multiple Interfaces

The NLS-EM3090 supports USB and TTL-232 interfaces to meet diverse customer needs.

◘ Compact & Lightweight Design

Seamless integration of imager and decoder board makes the scan engine extremely small and lightweight and easy to fit into space-constrained equipment.

◘ Outstanding Power Efficiency

The advanced **NLDC** technology incorporated in the scan engine helps reduce the power consumption and prolong the service life of the device.

Application Scenarios (as an accessory)

Self-service cabinets used in e-commerce, express delivery services and smart homes; ATMs; kiosks; queue machines; lottery machines; certificate makers.

NLS-EM3090

OEM Scan Engine

Performance	Image Sensor		752×480 CMOS
	Light Source		Red LED 625±10 nm
	Symbologies	2D	PDF417, QR Code (QR1/2, Micro), Data Matrix (ECC200, ECC000, 050, 080, 100, 140), Chinese Sensible Code
		1D	Code128, UCC/EAN-128, AIM128, EAN-8, EAN-13, ISBN/ISSN, UPC-E, UPC-A, Interleaved 2 of 5, ITF-6, ITF-4, Matrix 2 of 5, Industrial 25, Standard 25, Code 39, Codabar, Code 93, Code 11, Plessey, MSI-Plessey, GS1-DataBar™(RSS), (RSS-14, RSS-Limited, RSS-Expand)
	Resolution		≥5mil
	Typical Depth of Field	EAN-13	50mm-445mm (13mil)
		PDF417	70mm-170mm (6.67mil)
		Code 39	50mm-285mm(5mil)
		Data Matrix	60mm-160mm (10mil)
		QR Code	30mm-220mm (15mil)
	Symbol Contrast		≥25% reflectance difference
	Scan Angle**		Roll: 360°, Pitch: ±55°, Skew: ±55°
	Field of View		Horizontal 36°, Vertical 23°
Mechanical/ Electrical	Interface		TTL-232, USB (HID-KBW, COM Port Emulation, HID-POS)
	Operating Voltage		3.0~3.6VDC
	Current@3.3VDC	Operating	190mA
		Idle	7mA
		Sleep	<5uA
	Dimensions		28.0(W)×24.5(D)×13.9(H)mm
	Weight		9.5g
Environmental	Operating Temperature		-20℃~+55℃（-4°F~131°F）
	Storage Temperature		-40℃~+80℃（-40°F~176°F）
	Humidity		5%~95% (non-condensing)
	Ambient Light		0~100000lux (natural light)
Accessories	NLS-EVK3000		Software development board for the NLS-EM3090, equipped with a trigger button, beeper and RS-232 & USB interfaces.
	Cable	USB	Used to connect the NLS-EVK3000 to a host device.
		RS-232	Used to connect the NLS-EVK3000 to a host device.
	Power Adaptor		Used to provide power for the NLS-EVK3000. Output: DC5V, 2A; Input: AC100~240V, 50~60Hz

**Test conditions: Code 39; 3 Bytes; Resolution=10mil; W:N=3:1; PCS=0.8; Barcode Height=11mm; Scan Distance=120mm; T=23℃; Illumination=300lux.

Specifications are subject to change without notice.   Version: V1.0

Newland