![Newland — SCANNING MADE SIMPLE]

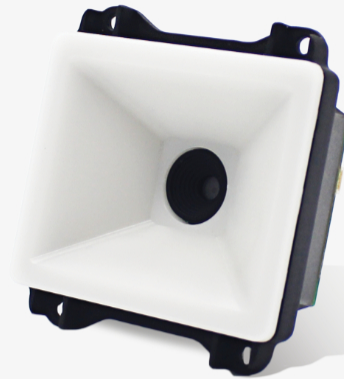**1d** | **2d** | **cmos** CMOS | **easyset** | **usb** | **ttl-232** TTL-232

EM20-80
oem scan engines

Features

Optimized on-screen barcode capture.

Making it incredibly reader friendly, the CPU powered EM20-80 is ready for whatever smartphone or tablet is presented to it. Not only is the EM20-80 optimized for screens, but also features excellent near field reading, a wide view angle and snappy barcode reading.

Designed for reliability.

The single PCB construction and vibration proof connectors make the EM20-80 resistant against vibration and improve reliability.

Compact construction.

The updated EM20-80 is the newest generation in the EM20 series and is lighter, thinner and more compact than ever. No matter the device, the EM20-80 can be easily integrated.

Power efficiency.

The advanced technology incorporated in the EM20-80 helps reduce its power consumption and lengthens service life.

Multiple Interfaces.

The EM20-80 supports USB, RS-232 and TTL-232 interfaces to meet diverse industry needs.

Application Scenarios

mobile payment | self service | smart home

EM20-80 technical specifications

Performance	Image Sensor	640x480 CMOS
	Illumination	White LED
	Depth of Field EAN13 (13mil)	25mm-110mm
	Depth of Field PDF417 (6.67mil)	35mm-45mm
	Depth of Field Data Matrix (10mil)	35mm-50mm
	Depth of Field QR (15mil)	0mm-90mm
	Minimal Print Contrast	30%
	Scan Angle Roll	360°
	Scan Angle Pitch	±40°
	Scan Angle Skew	±45°
	Field of View Horizontal	68°
	Field of View Vertical	51°

Data capture	1D	EAN-8, EAN-13, UPC-E, UPC-A, Code 128, UCC/EAN128, I2Of5, ITF-14, ITF-6, Matrix 25, CodaBar, Code 39, Code 93, ISSN, ISBN, Industrial 25, Standard 25, Plessey, Code11, MSI-Plessey, UCC/EAN Composite, GS1 Databar, Code 49, Code 16K
	2D	PDF 417, QR Code, Micro QR, Data Matrix, Aztec, Maxicode, Chinese Sensible Code, GM Code, Micro PDF417 Code, Code One

Physical	Dimensions (mm)	61.5(W)x65.5(D)x31.9(H)mm (max)
	Weight	33g
	Interfaces	TTL-232, RS-232, USB
	Notifications	Beeper, Green LED Indicator
	Input Voltage	12-pin FPC connector: 3.3-5VDC±5% 4-pin box connector: 3.3-5VDC±5%
	Current @ 3.3VDC Operating	335mA (typical), 479mA (max)
	Current @ 3.3VDC Standby	93mA
	Current @ 5VDC Operating	237mA (typical), 319mA (max)
	Current @ 5VDC Standby	69mA
	Power Consumption	3.3VDC: 1103mW (typical) 5VDC: 1129mW (typical)

Environmental	Ambient Light	0~100,000lux (natural light)
	Operating Temperature	-40°C to 60°C
	Storage Temperature	-40°C to 75°C
	Humidity	5% to 95% (non-condensing)

Accessories	Optional	USB, RS-232, DC5V power adapter with RS-232 cable
	Standard	180mm FFC

Device Management	Software	EasySet (configuration)

Certifications	Certifications	FCC Part15 Class B, CE EMC Class B

Warranty	Warranty	2 years

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