UHF RFID LABEL · UNIVERSAL TAG

RFID label UL6025

One Label, Any Surface — On Metal or Off Metal



The **UL6025** is a flexible UHF RFID label built to read reliably on **metal and non-metal surfaces alike** — no separate SKUs, no guesswork at the point of application. A thin anti-metal foam layer decouples the antenna from the surface beneath it.

Built on the Impinj M730 chip with EPC Gen2 / ISO 18000-6C, it stays thin and bendable enough for curved assets while standing up to −20 °C to +80 °C operating environments.

On + Off	Up to 11 m	60×25 mm	100K
METAL, ONE LABEL	READ RANGE ON METAL	1.2 MM THIN	WRITE CYCLES

KEY FEATURES

Truly universal mounting

Rated for both metal and non-metal application — one SKU covers mixed-surface fleets.

Anti-metal foam spacer

A 1 mm IXPE foam layer isolates the antenna, keeping tuning stable on steel or aluminum.

Impinj M730 engine

EPC Global Class1 Gen2 / ISO 18000-6C with strong sensitivity across 860–960 MHz.

Region-flexible frequency

865–868 MHz (EU) or 902–928 MHz (US) — the same construction, tuned to your market.

SUPPLIED ON-REEL — Self-adhesive backing · Die-cut perforations · Apply straight off the roll

TECHNICAL SPECIFICATIONS

Full Datasheet

ELECTRICAL PARAMETERS

IC type	Impinj M730
Air interface	EPC Global Class1 Gen2 / ISO 18000-6C
Frequency	865–868 MHz (EU) or 902–928 MHz (US)
Application surface	Metal and non-metal surfaces
Reading range	Up to ~11 m on metal · ~7 m off metal (1 W handheld)
Memory	EPC 128 bits · TID 96 bits · User memory: none
IC life	100,000 write cycles
Data retention	10 years

MECHANICAL PARAMETERS

Tag dimensions	60 × 25 × 1.2 mm
Face material	Bright white PET, 50 µm + glue
Spacer / inlay	1 mm IXPE foam + glue (anti-metal layer)
Liner material	Glassine
Tag pitch	31 mm
Reel inner diameter	76.2 mm

STRUCTURE DIAGRAM

- **Face material** — 50 µm PET + glue
- **Inlay** — antenna + Impinj M730 chip
- **1 mm IXPE foam + glue** — anti-metal spacer
- **Coating**
- **Bottom paper / liner**

ENVIRONMENT & CERTIFICATION

Operating temp.	−20 °C to +80 °C
Storage temp.	−30 °C to +100 °C
Customization	Printing, coding, writing data, etc.
Certification	RoHS

ON METAL VS. OFF METAL

~11 m
Peak range mounted on steel (920 MHz)

~7 m
Off-metal range, 1 W handheld

APPLICATION AREAS

- Mixed-material asset & IT equipment tracking
- Retail & apparel inventory
- Tool & equipment check-in/out
- Warehouse racking & metal container tagging
- Logistics & supply chain labelling
- Library & archive management

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Talk to Bulgaria's RFID team

End-to-end deployment: consulting, hardware, software, install & support.

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