

EOS-271 U9

TACEOS

Datasheet

Versatile and Manageable ARC C2 Spec Certification

The EOS-271 U9 inlay combines easy-to-handle dimensions with superior performance on cardstock, plastic and rubber surfaces. Featuring an advanced antenna design and latest-generation IC technology, the inlay measures 46 mm x 9 mm (antenna size) and offers certified compliance with ARC specification C2. This makes the EOS-271 U9 a highly versatile product for many item-level applications in non-food retail (cosmetics, DIY & sporting goods, toys, ...) and supply chain management.

EOS-271 U9 is based on NXP's UCODE 9 RAIN RFID chip. Equipped with 96-bit EPC memory, the IC provides 96-bit EPC; kill password; EPC and kill password permalock; self-adjusting impedance; and memory integrity safeguards. It lends itself to solutions that include high-speed inventory counting, loss prevention with frictionless self-checkout, and embedded tagging with seamless product returns.



EOS-271 U9 is available in dry, wet, and paper-face delivery formats.

Tageos was one of the first companies to qualify for ARC Quality Certification for its manufacturing operations from Auburn University RFID Lab.

Like all Tageos' RFID products, EOS-271 U9 complies with ISO 9001:2015 Quality Management System and ISO 14001:2015 Environmental Management System, as well as Environmental Directives RoHS and REACH, utilizing sustainable manufacturing processes and materials, such as FSC®-certified paper whenever possible.

Overview

IC: NXP UCODE 9 EPC/User Memory: 96 bit / - bit

TID Memory: 96 bit incl. 48 bit unique S/N

Frequency Band: 860 - 960 MHz
Protocol: EPC Class 1 Gen 2 - ISO 18000-63

Application Areas

- Beauty & Cosmetics
- Home Goods
- Inventory Visibility
- Item Level Tagging
- Supply Chain Management









TACEOS

Technical Overview

	Dry	Wet	Paper-face
Product Code	2700000005	2700000006	2700000007
Antenna Size	46 x 9 mm	46 x 9 mm	46 x 9 mm
	1.81 x 0.35 in	1.81 x 0.35 in	1.81 x 0.35 in
Finish Size	-	49 x 12 mm	49 x 12 mm
	-	1.93 x 0.47 in	1.93 x 0.47 in
Web Width	54.00 ± 1 mm	54.00 ± 1 mm	54.00 ± 1 mm
	2.126 ± 0.04 in	2.126 ± 0.04 in	2.126 ± 0.04 in
Pitch	15.02 ± 0.2 mm	15.02 ± 1 mm	15.02 ± 1 mm
	0.591 ± 0.01 in	0.591 ± 0.04 in	0.591 ± 0.04 in
ARC Approval	C2	C2	C2
FSC® Certification	-	-	-
Antenna Material	Aluminium	Aluminium	Aluminium
Front Face	-	PET clear	Paper TT
Inlay Substrate	PET Clear 50μm	PET Clear 50μm	PET Clear 50μm
Inlay Adhesive	-	permanent	permanent
Liner	-	Paper	Paper
Operating Temperature	-40°C / +85°C -40°F / +185°F	-40°C / +85°C -40°F / +185°F	-40°C / +85°C -40°F / +185°F
	@20% to 90% RH	@20% to 90% RH	@20% to 90% RH
Shelf Life	2 years @ +25°C/40%RH	2 years @ +25°C/40%RH	2 years @ +25°C/40%RH
Final Inspection	100% tested	100% tested	100% tested









Graphs: All the graphs are indicative: performance in real life applications may vary. The data has been determined based on calculations for transmitters with a normal output power level and respective IC silicon. Storage & handling precautions: Observe standard storage and handling practices to minimize Electro Static Discharge. Tageos reserves the right to change its products and services at any time without notice. As our products are used in circumstances beyond our control, we cannot be held liable for any damages caused through their use. This is a general purpose product not designed or intended for any specific application.

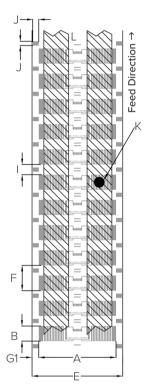
© 2024 Tageos All rights reserved. The pictures and illustrations found on this document are for illustration purposes only, and do not necessarily represent the exact products. Tageos is a registered trademark. All other trademarks are the property of their respective owners. Reproduction in whole or in part is prohibited without the prior written consent of the copyright owner. The information presented in this document does not form part of any quotation or contract, is believed to be accurate and reliable and may be changed without notice. No liability will be accepted by the publisher for any consequence of its use.

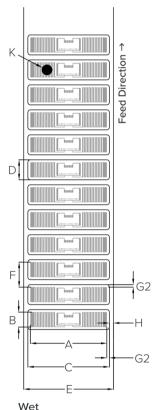


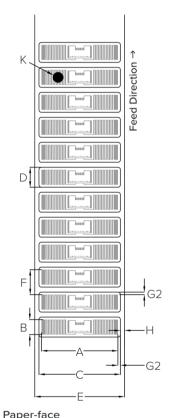
TAGEOS

Product Specifications

Mechanical Dimensions







		Dry	Wet	Paper-face
Product Code		2700000005	2700000006	2700000007
Antenna Size	AxE	3 46 x 9 mm / 1.81 x 0.35 in	46 x 9 mm / 1.81 x 0.35 in	46 x 9 mm / 1.81 x 0.35 in
Finish Size	$C \times E$) - / -	49 x 12 mm / 1.93 x 0.47 in	49 x 12 mm / 1.93 x 0.47 in
Web Width	Е	54.00 ± 1 mm / 2.126 ± 0.04 in	54.00 ± 1 mm / 2.126 ± 0.04 in	54.00 ± 1 mm / 2.126 ± 0.04 in
Pitch	F	15.02 ± 0.2 mm / 0.591 ± 0.01 in	15.02 ± 1 mm / 0.591 ± 0.04 in	15.02 ± 1 mm / 0.591 ± 0.04 in
Antenna to Web Edge	e G1	4.0 ± 1 mm / 0.157 ± 0.04 in	-	
Antenna to Die-cut	G2	-	1.5 ± 1 mm / 0.059 ± 0.04 in	1.5 ± 1 mm / 0.059 ± 0.04 in
Die-cut to Web Edge	Н	-	2.5 ± 1 mm / 0.098 ± 0.04 in	$2.5 \pm 1 \text{mm} / 0.098 \pm 0.04 \text{in}$
Antenna Gap	I	6.04 mm / 0.238 in	-	-
Converting Spot	J	3.50 x 2.50 mm / 0.138 x 0.098 in	-	-
Bad Mark	K	0 6.0 mm / 0.236 in	0 6.0 mm / 0.236 in	0 6.0 mm / 0.236 in
Interleaves	L	Yes	No	No



TAGEOS

Packing Details

	Dry	Wet	Paper-face
Product Code	2700000005	2700000006	2700000007
Delivery Format	Roll (single row)	Roll (single row)	Roll (single row)
Core Inner Diameter	76 mm / 2.99 in	76 mm / 2.99 in	76 mm / 2.99 in
Roll Outer Diameter	321 mm / 12.64 in	336 mm / 13.23 in	200 mm / 7.87 in
Unwinding Direction	Inlay on outside of roll	Inlay on outside of roll	Inlay on outside of roll
Standard Roll Size	50 000 (-0% +1.5%)	32 000 (-0% +1.5%)	7 000 (-0% +1.5%)
Min. Guar. Yield/Roll	98.5%	98.5%	98.5%
Box Dimensions	39.5 x 39.0 x 17.0 cm /	39.5 x 39.0 x 17.0 cm /	26.0 x 26.0 x 37.0 cm /
	15.56 x 15.35 x 6.69 in	15.56 x 15.35 x 6.69 in	10.24 × 10.24 × 14.57 in
Roll/Box	2	2	6
Inlays/Box	100 000	64 000	42 000
Box Gross Weight	9.16 kg / 20.2 lbs	9.63 kg / 21.24 lbs	8.62 kg / 19 lbs
Pallet Dimensions	120 x 80 x 151 cm /	120 x 80 x 151 cm /	120 x 80 x 126 cm /
	47.2 x 31.5 x 59.4 in	47.2 x 31.5 x 59.4 in	47.2 x 31.5 x 49.6 in
Boxes/Pallet	48	48	36
Inlays/Pallet	4 800 000	3 072 000	1 512 000
Pallet Gross Weight	465 kg / 1 025 lbs	487 kg / 1 074 lbs	335 kg / 739 lbs





