Avery Dennison Smartrac Product Data Sheet

# AD Dogbone<sup>®</sup> M730 Dura 2.0

#### Overview

Frequency Band UHF 860 - 960 MHz

**Chip** Impinj M730

Chip Attachment Technology Direct chip attach (DCA)

**Antenna Dimensions** 94 x 24 mm / 3.70 x 0.90 in

International Standard ISO 18000-63 EPC class 1 Gen 2

Industry Segments Industry Logistics Automotive

Applications Pallet tracking Returnable transportation items (RTI)

**RoHS** EU Directive 2011/65/EC and Directive (EU) 2015/863

REACH Regulation (EC) No. 1907/2006



# Adding robustness to excellent performance on demanding applications

Our AD Dogbone<sup>®</sup> M730 Dura 2.0 UHF RFID inlays and tags combine excellent performance on different materials with outstanding robustness and water resistance, washing and heat resistance, vibration, mechanical shock, making them an excellent choice for demanding global supply chain and industrial applications in harsh environments.

AD Dogbone® M730 Dura 2.0 features thick, semi-stiff thermosetting layers attached to both sides of the antenna/IC structure, offering effective protection against mechanical and environmental stresses without affecting the performance of the underlying inlay design. The encasement provides an IP68 rating and is ATEX compatible. It has been tested to meet EN60068-2-27 (mechanical shock) and EN60068-2-6 (vibration) standards. Additionally, it has been subjected to wash cycle testing, demonstrating resistance up to 60 cycles of 60°C home washing and tumble dry, as per ISO6330 and 5A ISO 6330 : 1984 standards. Moreover, it has been tested for heat transfer, enduring 160°C from both sides for 20 seconds.

AD Dogbone<sup>®</sup> M730 Dura 2.0 provides a level of durability that is comparable to hard tags, and is equipped with the M730 IC from Impinj. The IC comes with 128-bit EPC memory and offers an enhanced an autotune feature, which helps the AD Dogbone<sup>®</sup> M730 Dura 2.0 to work at peak efficiency.

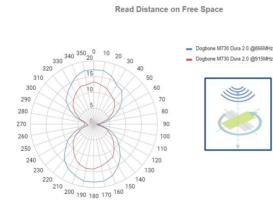
Our inlays and tags are compliant with ISO 9001:2015 Quality Management and ISO 14001:2015 Environmental Management, which ensure a reliable and state-of-the-art product that meets a variety of application needs, enhancing RFID usage for difficult-to-tag materials.



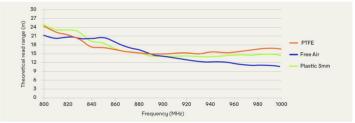
#### **Technical features**

Chip	Impinj M730
Chip attachment technology	Direct chip attach (DCA)
EPC and User Memory	128-bit and 0-bit
TID Memory	96-bit / 48-bit unique serial number
Product Code	3009540 / IL-609916
Delivery Format	Dura
Die-Cut Dimension	97 x 27 mm / 3.819 x 1.063 in
Inlay Substrate	PET
Face Sheet	White PET 50 UL
Total Thickness	321 µm
Standard Pitch	30 mm / 1.181 in
Web Width	100 mm / 3.937 in
Core Size	76 mm / 3 in
Quantity / Reel	1,000 pcs/reel 2,000 pcs/box
Operating Temperature	40 °C to 85 °C / -40 °F to 185 °F

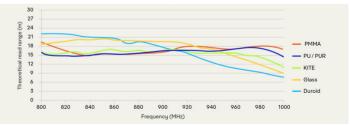
## Orientation sensitivity



## Theoretical read range in Class 1 materials

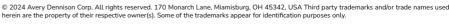


# Theoretical read range in Class 2 materials



All graphs are indicative: performance in real life applications may vary.





Warranty: Please refer to Avery Dennison standard terms and conditions: rfid.averydennison.com/termsandconditions

Care and handling: RFID inlays are sensitive to ESD. Observe standard industry practices relating to electronics / RFID to keep environmental impact and static charge to a minimum.

Applications: This product should be tested by the customer / user thoroughly under end use conditions to ensure the product meets the particular requirements. Avery Dennison does not represent that this product is fit for any particular purpose or use. Avery Dennison reserves the right to modify, change, supplement or discontinue product offerings at any time without notice. The information contained herein is believed to be reliable but Avery Dennison makes no representation concerning the accuracy or correctness of the data.

