Mid Range RFID UHF Antenna
MIRA-100-circular-FCC
Order-No. 52010083

KATHREIN
RFID

Technical features:	• compact design

• small dimensions

• typical read range *: up to 2 m

• integration possible in applications where space is limited

• various transponder types possible to use

• suitable for use in industrial environments

• use in transition range between near field and far field applications

• suitable for bulk and single tag applications

• high IP 67 degree of protection; suitable for outdoor use

* depending on tag properties, environment and requirements

Order-No.		**52010083**
Frequency range	MHz	902-928
Polarization		circular
Antenna gain	dBiC	2.5 (at 915 MHz)
Axial ratio	dB	typ. 2.5
VSWR		typ. 1.5:1
Impedance	Ω	50
Front-to-back ratio	dB	> 10
max. input power (FCC 15.247)	dBm	+30 (at antenna port)
Far field half-power beam width	°	100
Connection		TNC female
Operating temperature range	°C	-20 to +55
Storage temperature range	°C	-40 to +85
Degree of protection		IP 67
Weight	kg	0.32
Dimensions (L x W x H)	mm	156 x 143.8 x 36
Packing size (L x W x H)	mm	approx. 230 x 160 x 81

Material:	• Antenna cover:	tough, weather-resistant polymer blend, colour: RAL7045

Mounting options:	• four through-holes Ø 4.2 mm for M4 screws

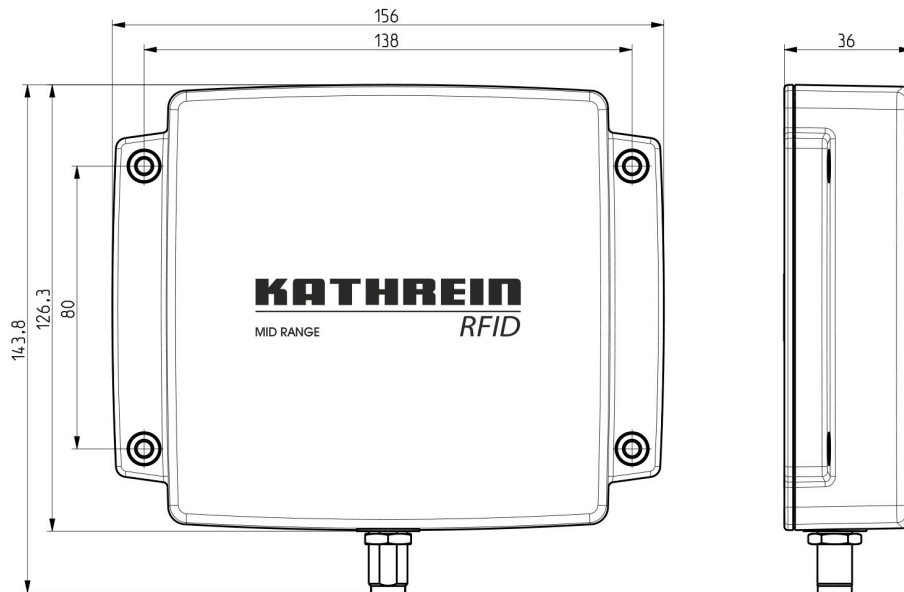| **Accessories (optional):**	• wall/mast bracket (Order-No. 52010128), mounting kit for outdoor use
	• wall bracket (Order-No. 52010261), mounting kit for indoor use only

Made in Germany

RoHS ✓ COMPLIANT

Dimensions in [mm]:

Description:

The mid-range antenna (MIRA) was developed for applications in range between the near and far field. The focus of the compact design was for integration in space-critical applications. Reading distances of up to 5 m are still possible with dimensions of 143.8 x 156 mm. In this case, however, the reading range is very wide.

In most cases the MIRA is used for reading distances up to 2 m, for which it features sufficient selectivity. Therefore, this antenna design is especially suitable for applications in the so-called transition area with different tag types.

Example applications:

- logistics applications: installing to corridor conveyor vehicles
- materials handling applications
- Gate applications for goods registration
- Bulk and single tag applications
- access systems (e.g. ski lifts, control systems for tickets)