

2dBi Near-Field Antenna

SBA-U2502N

SBA-U2502N is a **2dBi near-field UHF RFID antenna** with a compact, ultra-thin profile designed for precise and uniform field distribution. With a wide frequency range of 902–928 MHz, it delivers reliable short-range reads and is ideal for applications requiring high accuracy in close-proximity tag detection.

Features and Benefits:

- Frequency Range: 902–928 MHz (UHF)
- Gain: >2dBi for optimized near-field performance
- Near-Field Antenna for uniform field distribution and no blind spots
- VSWR ≤ 1.8 for stable signal reflection
- Connector Type: SMA-K
- Ultra-thin design: 190×190×2 mm, lightweight at 300g
- Material: Durable PCB construction
- IP53 protection for moderate dust and water resistance
- Operating Temperature: 0°C to +50°C



Applications:

- Jewelry anti-theft systems in retail
- POS systems for accurate item identification
- RFID applications in libraries for book tracking
- Healthcare patient asset management
- High-accuracy inventory control in retail spaces

SPECIFICATIONS

Physical Parameter

Dimensions	190mm X 190mm X 2mm
Colour	Black
Weight	0.3 Kgs
Material	PCB
Waterproof Rating	IP53

UHF Technical Parameters

Operating Frequency	902-928 MHz
Gain	Up to 2 dBi
VSWR	<=1.8
Polarization	Circular
Input Impedance	50 Ω
Maximum Input Power	100 W
Lightening Protection	DC Grounding
Connector Type	SMA-K

Environmental Parameters

Operating Temperature	0°C to +85°C
Storage Temperature	-30°C to +60°C
Working Humidity	5% to 95% RH No condensation

Soochak Bharat, with its technical expertise in RFID technology, focuses on designing, developing, innovating, and deploying RFID hardware solutions.

*Read range is dependent on tag size and design.

*Soochak Bharat reserves the right to make changes in the above specifications without notice.