

# Vehicle Antennas

• JEBSEE •

## AN8220

### 4-in-1 Combination External Antenna

**TPMS 315MHz/433MHz**  
**2.4-5.0-6.0GHz/Wi-Fi 7/BT/ISM**  
**2x UWB 6-9GHz**

#### Features

- **Cost-Effective Wireless Connectivity Solution**

This solution integrates a built-in UWB anchor antenna array for PDOA in-vehicle positioning in UWB Channels 9-15, along with a 315/433MHz dipole antenna designed for TPMS systems. Additionally, it includes a 2.4-5.0-6.0 GHz Wi-Fi/BT antenna for versatile connectivity options.

- **Versatile Mounting Design**

Crafted for mounting on or beneath vehicle dashboards, this antenna also adapts to any non-conductive surface, ensuring flexible installation options.

#### Application

- **Precise PDoA In-Car Positioning**

Two integrated UWB antennas enable highly accurate Position Difference of Arrival (PDoA) technology, enhancing real-time vehicle positioning and tracking in complex environments.

- **Wireless Solutions for Connected Vehicles and Bluetooth Devices**

Enables seamless communication for vehicle tracking, infotainment systems, and Bluetooth devices like headsets and speakers.

- **Wireless Systems for TPMS and Keyless Access**

Enables efficient communication for tire pressure monitoring, remote entry, and other automotive wireless applications.



Model No.		AN8220			
Item					
Antenna 1		433MHz			
Frequency Range	MHz	430-435			
Peak Gain	dBi	4.1			
Efficiency	%	85 typ.			
Output VSWR	:1	1.4 max.			
Polarization		Linear			
Radiation Pattern		Omni-Directional			
Cable		RG174/U, 1000mm (Any Cable Length Available)			
Antenna 2		2.4-5.0-6.0GHz/Wi-Fi 7/BT/ISM			
Frequency Range	MHz	2410-2490	4920-5925	5925-7125	
Peak Gain	dBi	2.0	2.0	2.0	
Efficiency	%	60 typ.	50 typ.	50 typ.	
Output VSWR	:1	2.2 max.	2.2 max.	2.2 max.	
Polarization			Linear		
Radiation Pattern			Omni-Directional		
Cable			RTK031, 1000mm (Any Cable Length Available)		
Antenna 3-4		2x UWB 6-9GHz			
Frequency Range	MHz	6240.0 – 8237.2			
Peak Gain	dBi	2.13			
Efficiency	%	52 typ.			
Output VSWR	:1	2.0 max.			
Polarization		Linear			
Radiation Pattern		Omni-Directional			
Cable		RTK031, 1000mm (Any Cable Length Available)			
		Mechanical			
Mounting		Adhesive			
IP Rating		IP67			
Connector		4-pos MATE-AX (Other Connector Available)			
Dimensions		200(W) x 100(L) x 20(H) mm			