

Technical Data Sheet

Item	Description	Yes	No	Detail
Firmware	ORBI MiniAVL V25.05.12r956	•		Improved functions for Orbitrix SaaS platform for GPS tracking
Electrical characteristics	Power supply	•		Battery powered
	Working voltage range	•		DC 9V - 90V
	Working voltage	•		12 V / average 35mA
	Sleep current	•		12V / less than 10mA
	Built-in battery capacity	•		250mAh 3.7V
Environmental characteristics	Working temperature	•		-20°C - 75°C
	Storage temperature	•		-30°C - 80°C
	Working humidity	•		10% - 85% RH non-condensing
Communication characteristics	Brand	•		4G
		•		2G
	2G	•		Micro SIM Card
	SIM Card	•		Built-in antenna
	Communication antenna	•		FPC antenna
GPS / BD positioning characteristics	Antenna specifications	•		1AT6558R
	Positioning module brand / chip model	•		GPS + BDS
	Positioning method	•		Average 32 seconds
	Hot start time	•		Average 1 second
	Tracking sensitivity	•		-162 dBm
	Positioning antenna	•		Built-in antenna
	Antenna specifications	•		25mm * 25mm * 4mm
	GPS band	•		L1: 1575.42 ± 1.023 MHz
	Beidou band	•		BI: 1561.098 ± 2.046 MHz
	Satellite channels	•		32
	Positioning accuracy	•		≤ 5m
	Timing accuracy	•		< 30ns (1σ)
	Speed measurement accuracy	•		< 0.1m/s (1σ)
	Acceleration	•		4g
	Maximum speed	•		515 m/s
Maximum height	•		18000 m	
External interface	Power off	•		1 way
	SOS	•		1 way
	ACC detection input	•		1 way
Form factor	Host size (length, width, height)	•		84 * 38 * 19 mm
	Shell material	•		ABS + PC (V0)
	IP protection level	•		IP67