

# MWA-6

## Microwave antenna

### User's manual

The MWA-6 antenna is a perfect addition to any RF device, including RF detectors, spectrum analyzer, receiver, etc. It is particularly good for the location of GSM, CDMA, 3G, 4G (LTE, Wi-Max), Wi-Fi 2.4GHz, Bluetooth, Wi-Fi 5GHz, DECT and other transmissions on frequencies above 800 MHz.

Thanks to its directivity it allows the operator to pinpoint the source easily. At the same time the detection distance comparing to the omnidirectional antennas is at least 2 times longer (gain 6dB). On frequencies above 2GHz the difference between the MWA-6 and a rod antenna is even more (up to 4 times longer detection distance).

Comparing to the MWA-12 and the Micro-Pointer antenna, the MWA-6 covers frequencies on lower bands – starting from 800 MHz. It covers the CDMA, low LTE, GSM 900, GSM 1800 and GSM 1900, and then above 2GHz it coincides with the MWA-12 (Micro-Pointer) and receives UMTS (3G), Wi-Fi, and other signals.

#### Features:

- Frequency range 800-6500 MHz
- Directed (log-periodic)
- Typical forward gain: 6 dBi
- Tripod mountable (tripod supplied)
- The tripod can convert to a hand-held unit for manual probing (locating procedure)
- Connector type: SMA
- 80 cm cable
- Dimensions (without tripod) 18 x 14.5 x 0.7 cm
- Mode of use: receive
- Indoor use only

#### Usage with Protect 1206i

The Micro-Pointer antenna which is supplied with the new version of the Protect 1206i covers frequencies starting from 2GHz. The MWA-6 allows reception starting from 800 MHz, therefore it can increase detection distance to such signals as CDMA, low LTE, GSM 900, GSM 1800, GSM 1900. Connect it to ANT1 and perform search as it is described in the User's Manual for the detector.

Since the efficient range starts from 800 MHz, the signals with lower frequency will be omitted. Therefore repeat sweeping procedure with the standard rod antenna on ANT1 to detect other.

Connection to ANT2 has no sense as the standardly supplied Micro-Pointer antenna covers all the frequencies detected by ANT2 and is more convenient.

#### Usage with Protect 1207i

Thanks to its frequency characteristics the MWA-6 perfectly suits to the Protect 1207i as it covers all detected by the device frequencies. The antenna will increase detection distance at least 2 times, comparing to the standard rod antenna and its directivity will significantly help at locating (pinpointing) the source. When antenna points to the source the signal level will be the highest.

If you wish to use MWA-6 for channels 'LTE-L', 'GSM 900', 'GSM 1800', '3G, DECT', 'Wi-Fi-L/Bluetooth' then connect it to the right 'red' socket instead of the rod antenna marked by red color.

If you wish to increase sensitivity on the 6<sup>th</sup> channel 'LTE-h Wi-Fi-h Mi-Max', then connect MWA-6 to the left 'blue' connector instead of the 'blue' rod antenna.

Since the sensitivity increases and bargraphs may show full lighting, the Attenuator function will be convenient during the locating (pinpointing) the source.