MALÅ Shielded Antennas

MALÅ Shielded Antennas are designed for use in urban areas or sites with a lot of background noise. A MALÅ Shielded Antenna consists of both transmitter and receiver antenna elements in a single housing. The design ensures that the transmitted radar energy is only emitted from the bottom of the antenna housing, where it is in contact with the ground and protects the receiver element from external signals (noise) from directions other than the bottom of the housing, where it is located.

All MALÅ Shielded Antennas are equipped with a pulling eye on the front of the housing for attaching tow handles or straps.

A fastening block at the back of the housing allows connection of a distance-measuring wheel. The wheel operates as a triggering device instructing the radar system to collect traces at operator pre-set distant intervals. Removable skid / wear plates protect the bottom of the antenna housing ensuring they last and thereby protect the user’s investment.

Like all MALÅ GPR systems, the MALÅ Shielded Antennas are modular by design. This means that antenna electronics, pulling devices and measuring wheels are compatible and interchangeable. This reduces the cost for owning or expanding a system.
**Brief Description & Technical Specification**

MALÅ Shielded Antennas are operated with MALÅ X3M and/or MALÅ ProEx¹ control units for many different applications. Today, MALÅ Geoscience offers different shielded antennas, each with different features;

### 100MHz
The MALÅ Shielded 100MHz antenna is the lowest frequency shielded antenna commercially available. It is used for medium to low resolution investigations.

**Dimensions:** 125 x 78 x 20 cm - Weight: 25.5 kg

**Applications:** Geological and geotechnical applications.

### 250MHz
The MALÅ Shielded 250MHz antenna is a general purpose antenna, generally used for investigations that require medium depth penetration and medium resolution.

**Dimensions:** 74 x 44 x 16 cm – Weight: 7.85 kg

**Applications:** Utility detection, Underground Storage Tank (UST) and void detection.

### 500MHz
The MALÅ Shielded 500MHz antenna is MALÅ Geoscience’s most popular general purpose GPR antenna and offers good resolution for shallow to medium depth investigations.

**Dimensions:** 50 x 30 x 16 cm – Weight: 5.0 kg

**Applications:** Utility detection, road and pavement surveys.

### 800MHz
The MALÅ Shielded 800MHz antenna offers high resolution for shallow depth investigations.

**Dimensions:** 38 x 20 x 12 cm – Weight: 2.6 kg

**Applications:** Road / pavement surveys and concrete / structural investigations.

**Accessories**
A number of accessories are available for the MALÅ Shielded Antennas, including:
- Pulling handles and devices
- Skid plates
- Measurement triggering wheels
- MALÅ Rough Terrain Cart (RTC)

¹Requires MALÅ Shielded Antenna electronics (22-001267).

See our webpage for latest information