

HFH2-Z1 HFH2-Z2 on Tripod HFU-Z

## **Rod Antenna HFH2-Z1**

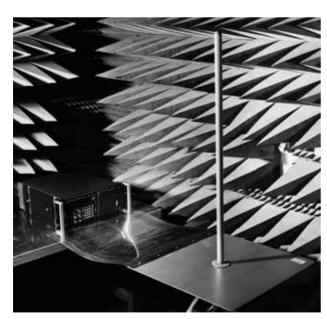
Broadband active rod antenna for use as a general-purpose receiving antenna and for measuring the electrical field-strength components, preferably in open-area measurements.

## Loop Antenna HFH 2-Z2

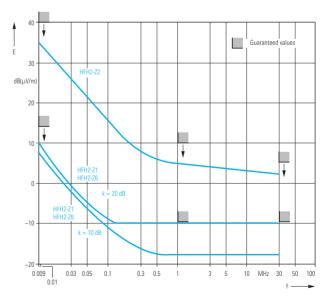
Broadband active loop antenna for measuring the magnetic field-strength components.

## Rod Antenna HFH2-Z6

Broadband active rod antenna for measuring the electrical component of radiated EMI in test setups to MIL-STD-461/462 and similar MIL standards.



HFH2-Z6



Smallest detectable field-strength level (for S/N=1) of HFH2-Z1, -Z2 and -Z6 (frequency-dependent, average indication, IF bandwidth 200 Hz); with quasi-peak indication the level in the range 9 kHz to 149.9 kHz (band A) increases by approx. 3 dB, in the range 150 kHz to 30 MHz (band B) by approx. 23 dB.

# **Specifications**

1			
	Rod Antenna HFH 2-Z1	Loop Antenna HFH 2-Z2	Rod Antenna HFH2-Z6
Frequency range	9 kHz to 30 MHz	9 kHz to 30 MHz	9 kHz to 30 MHz
Transducer factor <sup>1)</sup> k (referred to 1/m) Accuracy	10/20 dB, selectable 1 dB	20 dB (E field) <sup>2)</sup> 1 dB	10/20 dB, selectable 1 dB
Measurement range (IF bandwidth 200 Hz, AV ind.) Lower limit, frequency-dependent (see also diagram on page 10)	$+15$ dB( $\mu$ V/m) to $-10$ dB( $\mu$ V/m)	9 kHz dB(μV/m) to 1 MHz: +40 dB(μV/m) to +10 dB(μV/m) 1 MHz to 30 MHz: +10 dB(μV/m) to +5 dB(μV/m)	+15 dB(μV/m) to −18 dB(μV/m)
Upper limit at $k = 20 \text{ dB}$ Upper limit at $k = 10 \text{ dB}$	140 dB(μV/m) 130 dB(μV/m)	140 dB(μV/m) —	140 dB(μV/m) 130 dB(μV/m)
Source impedance	50 Ω	50 Ω	50 Ω
Max. output voltage into 50 $\Omega$	1 V	1 V	1 V
General Data			
Nominal temperature range	-10°C to +55°C	−10°C to +55°C	−10°C to +55°C
Storage temperature range	−25°C to +70°C	−25°C to +70°C	−25°C to +70°C
Connectors  RF  Supply and coding (antenna factor)  Length of connecting cable	BNC female 12-contact Tuchel female 10 m		
Current drain (±10 V, dep. on drive level)	<40 mA	<40 mA	<45 mA
Dimensions (see also drawing below)	ground net dia: 2510 mm, rod height: 1092 mm	loop dia: 590 mm	base: 60 mm x 60 mm, rod height: 1000 mm
Weight without cable	8 kg (in transit case)	12 kg (in transit case)	5 kg

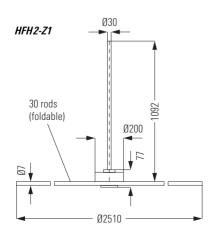
<sup>1)</sup> The transducer factor (= log of antenna factor) is automatically considered in the display of Rohde & Schwarz test receivers and spectrum analyzers.

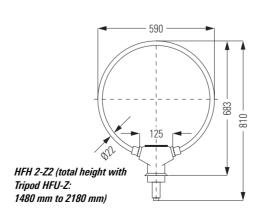
## Ordering information

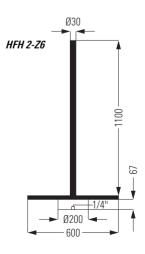
Order No.	0335.3215.52	0335.4711.52	0837.1866.54	
Accessories supplied Coaxial cable (10 m) (0335.3609.00) Supply and coding cable (10 m) (0335.3 12-contact Tuchel female (0018.5079.00)				
Recommended extras Power Supply HZ-9 (page 12) Wooden Tripod HZ-1 (page 16) (only for I Tripod HFU-Z (page 16) (only for HFH 2-For shielded rooms see 1) (only for HFH	Z2) .			

<sup>1)</sup> For use in shielded rooms: Feeder Cable HZ-3 or HZ-4 (page 12) and Coaxial Cable HZ-5, 0816.0819.02 (3 m) or HZ-6, 0816.0860.02 (10 m).

# Antenna dimensions (in mm)







<sup>20</sup> dB (1/m) applies to the far field; in the near field the transducer factor  $k_h = -31.5 \text{ dB}(1/\Omega \text{ x m})$  is used for the magnetic field strength.