

R&S® EVS300 ILS/VOR Analyzer Specifications



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Definitions

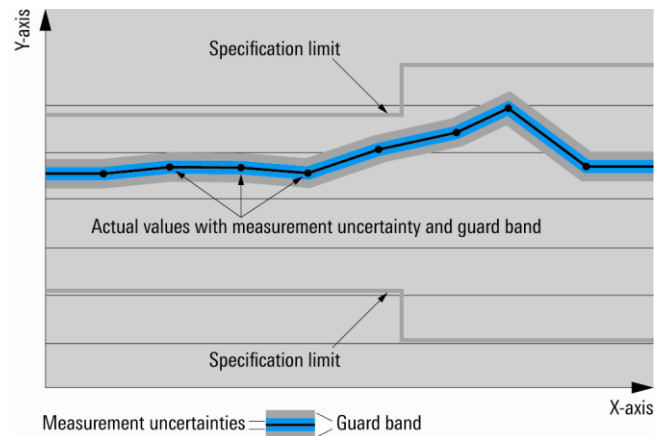
General

Product data applies under the following conditions:

- Three hours storage at ambient temperature followed by 30 minutes warm-up operation
- Specified environmental conditions met
- Recommended calibration interval adhered to
- All internal automatic adjustments performed, if applicable

Specifications with limits

Represent warranted product performance by means of a range of values for the specified parameter. These specifications are marked with limiting symbols such as $<$, \leq , $>$, \geq , \pm , or descriptions such as maximum, limit of, minimum. Compliance is ensured by testing or is derived from the design. Test limits are narrowed by guard bands to take into account measurement uncertainties, drift and aging, if applicable.



Specifications without limits

Represent warranted product performance for the specified parameter. These specifications are not specially marked and represent values with no or negligible deviations from the given value (e.g. dimensions or resolution of a setting parameter). Compliance is ensured by design.

Typical data (typ.)

Characterizes product performance by means of representative information for the given parameter. When marked with $<$, $>$ or as a range, it represents the performance met by approximately 80 % of the instruments at production time. Otherwise, it represents the mean value.

Nominal values (nom.)

Characterize product performance by means of a representative value for the given parameter (e.g. nominal impedance). In contrast to typical data, a statistical evaluation does not take place and the parameter is not tested during production.

Measured values (meas.)

Characterize expected product performance by means of measurement results gained from individual samples.

Uncertainties

Represent limits of measurement uncertainty for a given measurand. Uncertainty is defined with a coverage factor of 2 and has been calculated in line with the rules of the Guide to the Expression of Uncertainty in Measurement (GUM), taking into account environmental conditions, aging, wear and tear.

Device settings and GUI parameters are indicated as follows: "parameter: value".

Typical data as well as nominal and measured values are not warranted by Rohde & Schwarz.

Specifications

Frequency

Frequency range		70 MHz to 350 MHz
Preselection filter ranges	marker beacon	74.7 MHz to 75.3 MHz
	ILS LLZ	108 MHz to 112 MHz
	ILS GS	320 MHz to 340 MHz
	VOR, GBAS	108 MHz to 118 MHz
Frequency resolution		100 Hz
Temperature drift	-10 °C to +55 °C	1 ppm
Aging per year	after 30 days of uninterrupted operation	1 ppm

Level

Absolute level		
Maximum input power		+13 dBm
Display ranges ¹	low noise mode (preamplifier on)	-120 dBm to -20 dBm
	normal mode (preamplifier off)	-110 dBm to -10 dBm
	low distortion mode (RF attenuator on)	-100 dBm to +20 dBm
	aurorange mode	-120 dBm to +20 dBm
Level resolution		0.1 dB
Accuracy	at -30 dBm	< 0.8 dB
Linearity error	in range from -70 dBm to 0 dBm	< 0.5 dB
Additional deviation	for two frequency ILS signals in wideband mode	< 0.9 dB
Inherent noise	low noise mode	< -115 dBm
Spurious response, inherent	without input signal, low noise mode	< -90 dBm
Intermodulation		
Third-order intercept point (TOI)	2 × 10 dBm, Δf > 200 kHz, low distortion	> 20 dBm

ILS signal analysis

R&S®EVS300 measurement mode: single. At an input level > -70 dBm, specifications apply even with a measurement time of 10 ms.

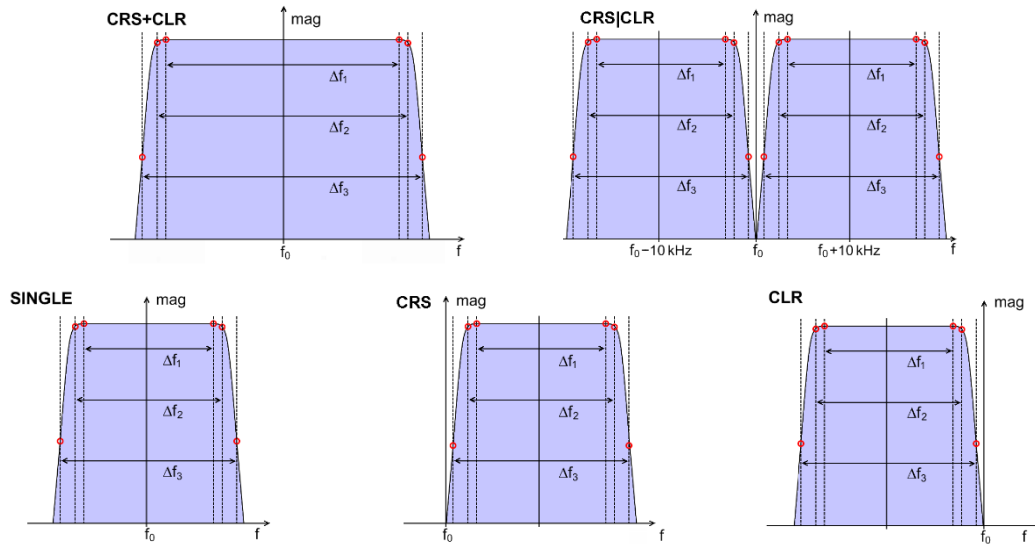
Input level range		-80 dBm to +10 dBm
Modulation depth (0 % to 95 %)		
Resolution		0.01 %
Accuracy	90/150 Hz ± 2.5 % ²	≤ 0.5 %
	voice/identifier	≤ 1.0 %
AF		
Accuracy	90/150 Hz ± 5 Hz	≤ 0.05 Hz
	1020 Hz ± 50 Hz	≤ 5.0 Hz
Phase angle 90/150 Hz		
Measurement range		0° to +120° or -60° to +60°
Resolution		0.1°
Accuracy		≤ 0.2°
DDM measurement, localizer mode		
Accuracy	≤ ±10 % DDM	≤ 0.04 % DDM ± 0.1 % of reading
	> ±10 % DDM	≤ 0.04 % DDM ± 0.2 % of reading
DDM measurement, glideslope mode		
Accuracy	≤ ±20 % DDM	≤ 0.08 % DDM ± 0.1 % of reading
	> ±20 % DDM	≤ 0.08 % DDM ± 0.2 % of reading

¹ Overload display if in-band or out-of-band signals are overloading.

² Max. frequency drift of modulation signal.

ILS demodulation filters (for DDM and SDM calculation)

Measurement modes		Single	CRS+CLR	CRS	CLR	CRS CLR
Δf_1	filter flatness (ripple < 0.1 dB)	12.4 kHz	32.0 kHz	12.4 kHz	12.4 kHz	12.4 kHz
Δf_2	-3 dB bandwidth	14.8 kHz	34.9 kHz	14.8 kHz	14.8 kHz	14.8 kHz
Δf_3	-60 dB stopband attenuation	18.8 kHz	39.1 kHz	18.8 kHz	18.8 kHz	18.8 kHz



ILS demodulation filters (for DDM and SDM calculation). Filter for wideband mode identical to CRS+CLR mode.

Marker beacon signal analysis

Input level range		-80 dBm to +10 dBm
Modulation depth (80 % to 100 %)		
Resolution		0.01 %
Accuracy	400/1300/3000 Hz $\pm 2\%$ ³	$\leq 0.5\%$
	ID tone 1020 Hz $\pm 2\%$ ³	$\leq 1.0\%$
AF		
Accuracy	400/1300/3000 Hz ± 50 Hz ³	≤ 0.5 Hz
	ID tone 1020 Hz ± 50 Hz ³	≤ 5.0 Hz

VOR signal analysis

Input level range		-90 dBm to +10 dBm ⁴
Azimuth		
Resolution		0.01°
Accuracy		$\leq \pm 0.1^\circ$ ⁵
AM modulation depth (0 % to 50 %)		
Resolution		0.01 %
Accuracy	30/9960 Hz $\pm 2\%$ ³	$\leq 0.5\%$
	voice/identifier	$\leq 1.0\%$
	AM distortion	$\leq 1.0\%$
AF frequency		
Accuracy	30 Hz ± 3 Hz ³	≤ 0.03 Hz
	1020 Hz ± 50 Hz ³	≤ 5.0 Hz
	9960 Hz ± 100 Hz ³	≤ 0.5 Hz
FM accuracy		
Resolution		0.1 Hz
Accuracy		≤ 0.1 Hz $\pm 0.5\%$ of reading

³ Max. frequency drift of modulation signal.

⁴ Measurement time for input range -90 dBm to -80 dBm: 500 ms.

⁵ Azimuth accuracy for input level -90 dBm to -80 dBm: $\pm 0.3^\circ$.

Frequency scan (R&S®EVS-K1 option)

Frequency range		70 MHz to 350 MHz
Start/stop or center/span		user-selectable in range from 70 MHz to 350 MHz
Level measurement range	selectable	-120 dBm to +13 dBm
Resolution bandwidths		1/3/10/30 kHz
Trace functions		clear/write, average, peak hold, view

FFT mode (R&S®EVS-K4 option)

Frequency range		20/10/5/2.5/1.25/0.625 kHz
Window functions		none/Hann/flat top
Window flatness	none	+0/-4 dB
	Hann	+0/-1.5 dB
	flat top	+0/-0.1 dB
-3 dB bandwidth	none	0.2 % of span
	Hann	0.31 % of span
	flat top	0.8 % of span
Trace functions		clear/write, average, peak hold, view

Support for Rohde & Schwarz power sensors (R&S®EVS-K5 option)

Supported sensors	USB connector	R&S®NRP-Z81, R&S®NRP-Z51, R&S®NRP-Z21
	RS-232 connector	R&S®NRT-Z14, R&S®NRT-Z44
Displayed values	R&S®NRP-Zxx	average power
		peak power (with R&S®NRP-Z81 only)
	R&S®NRT-Zxx	power forward (average or PEP)
		power reverse (average or PEP)
		return loss, VSWR
Input range	depending on power sensor	see data sheet of respective power sensor
Units	power	W/dBm/dB (to reference level)
	return loss (R&S®NRT-Zxx)	dB
Resolution	power (R&S®NRP-Zxx)	0.01 mW/dBm/dB
	power (R&S®NRT-Zxx)	0.01 W/dBm/dB
	VSWR (R&S®NRT-Zxx)	0.01
	return loss (R&S®NRT-Zxx)	0.01 dB
Accuracy	depending on power sensor	see data sheet of respective power sensor
Measurement time	R&S®NRP-Zxx	10 ms to 2000 ms
	R&S®NRT-Zxx	50 ms to 2000 ms

DME pulse shape view (R&S®EVS-K6 option)

Supported sensor	R&S®EVS-K5 required	R&S®NRP-Z81
Input range		1 nW to 100 mW (-60 dBm to +20 dBm)
Units		dBm/W/V
Data acquisition	sample rate	2.5/10/40/80 MHz
	buffer size	0.5/1/2/4/8 ksample
Trigger settings	trigger mode	normal/single shot
	trigger source	continuous/level/extern (R&S®NRP-Z3 required for external triggering)
	trigger level	variable within input range
	trigger slope	positive/negative
	trigger delay	-50.00 µs to 9999.00 µs
Averaging		1/4/16/64/256/1024
Pulse analysis functions	for unit V only	rise time, fall time, pulse width, pulse spacing
Resolution	time values pulse analysis	0.01 µs
Accuracy	depending on power sensor	see data sheet of respective power sensor

Oscilloscope mode (R&S®EVS-K7 option)

Input range	baseband range 5 V	0.8/1.6/4/8/16 V
	baseband range 500 mV	80/160/400/800/1600 mV
	RF input, modulation depth	8/16/40/80/200 %
Resolution	8 div	40 pixel/div
Accuracy	baseband range 5 V	≤ (50 mV + 1 pixel)
	baseband range 500 mV	≤ (5 mV + 1 pixel)
	RF input	≤ (1.0 % + 2 % of value + 1 pixel)
Time range		10/20/40/80/160/320 ms
Resolution	10 div	45 pixel/div
Accuracy	time measurements	≤ 2 pixel

GBAS mode (R&S®EVS-K9 option)

Input level ⁶		
Range		–90 dBm to +10 dBm
Resolution		0.1 dB
Accuracy	at –30 dBm	< 1.0 dB
Linearity error	in range from –70 dBm to 0 dBm	< 0.8 dB
Inherent noise	low noise mode	< –115 dBm
Slots		A to H
Simultaneously measured values	in every slot	<ul style="list-style-type: none"> station ID transmission length message block ID TRAIN FEC, APPLIC FEC message type (of all possible eight messages in slot view)
Supported message types		<ul style="list-style-type: none"> message type 1 GPS correction data message type 4 final approach segment data block (FAS DB)

SCAT I mode (R&S®EVS-K10 option)

Input level ⁶		
Range		–90 dBm to +10 dBm
Resolution		0.1 dB
Accuracy	at –30 dBm	< 1.0 dB
Linearity error	in range from –70 dBm to 0 dBm	< 0.8 dB
Inherent noise	low noise mode	< –115 dBm
Slots		A to H
Simultaneously measured values	in every slot	<ul style="list-style-type: none"> station ID transmission length message block ID TRAIN FEC, APPLIC FEC message type (of all possible eight messages in slot view)
Supported message types		<ul style="list-style-type: none"> message type 1 GPS correction data message type 4 final approach segment data block (FAS DB)

⁶ GBAS/SCAT burst in time slots A to H.

Data logger

Simultaneously recorded parameters per record set (selectable)	ILS	Measurement modes					
		Single	CRS+CLR	CRS	CLR	CRS CLR	
		STIOCP	✓	✓	✓	✓	✓
		Index	✓	✓	✓	✓	✓
		Date	✓	✓	✓	✓	✓
		Time	✓	✓	✓	✓	✓
		CRS/SINGLE [kHz]	✓	✓	✓		✓
		CLR [kHz]		✓		✓	✓
		LEVEL [dBm; dBμV]	✓	✓			✓
		AM-MOD./90 Hz [%]	✓	✓			
		AM-MOD./150 Hz [%]	✓	✓			
		DDM [μA; %, 1]	✓	✓			✓
		SDM [μA; %, 1]	✓	✓			✓
		FREQ_90 [Hz]	*1	*1	*1	*1	
		FREQ_150 [Hz]	*1	*1	*1	*1	
		PHI-90/150 [°]	*1	*1	*1	*1	
		Voice-Mod. [%]	*1	*1	*1	*1	
		ID-Mod. [%]	*1	*1	*1	*1	
		ID-F. [Hz]	*1	*1	*1	*1	
		ID-Code	✓	✓	✓	✓	✓
		LEV_CLR [dBm; dBμV]		✓		✓	✓
		LEV_CRIS [dBm; dBμV]		✓	✓		✓
		AM-MOD_CLR/90 Hz [%]				✓	✓
		AM-MOD_CLR/150 Hz [%]				✓	✓
		DDM_CLR [μA; %, 1]				✓	✓
		SDM_CLR [μA; %, 1]				✓	✓
		AM-MOD_CRIS/90 Hz [%]			✓		✓
		AM-MOD_CRIS/150 Hz [%]			✓		✓
		DDM_CRIS [μA; %, 1]			✓		✓
		SDM_CRIS [μA; %, 1]			✓		✓
		PHI-90/90 [°]					✓
		PHI-150/150 [°]					✓
		K2/90 Hz [%]	*2	*2	*2	*2	
		K2/150 Hz [%]	*2	*2	*2	*2	
		K3/90 Hz [%]	*2	*2	*2	*2	
		K3/150 Hz [%]	*2	*2	*2	*2	
		THD/90 Hz [%]	*2	*2	*2	*2	
		THD/150 Hz [%]	*2	*2	*2	*2	
		MeasTime [ms]	✓	✓	✓	✓	✓
		MeasMode	✓	✓	✓	✓	✓
		LLZ_GS	✓	✓	✓	✓	✓
	VOR	STIOCP					
		Index					
		Date					
		Time					
		FREQ [MHz]					
		MEAS.FREQ [MHz]					
		LEVEL [dBm]					
		AM-MOD./30 Hz [%]					
		AM-MOD./9960 Hz [%]					
		AM-DIST./9960 Hz [%]					
		FREQ_30 [Hz]					
		FREQ_9960 [Hz]					
		FREQ_FM30 [Hz]					
		BEARING (from) [°]					
		FM-DEV. [Hz]					
		FM-INDEX					
		Voice-Mod. [%]					
		ID-Mod. [%]					
		ID-F. [Hz]					
		ID-Code					

marker beacon	STIOCP Index Date Time FREQ [MHz] MEAS.FREQ [MHz] LEVEL [dBm] AM-MOD./3000 Hz [%] AM-MOD./1300 Hz [%] AM-MOD./4000 Hz [%] FREQ_3000 [Hz] FREQ_1300 [Hz] FREQ_400 [Hz] ID-Mod. [%] ID-F. [Hz] ID-CODE	
GBAS	Channel STIOCP Index Date Time Temp [°C] SLOT FREQ [MHz] F_DEV [kHz] LEVEL [dBm] SID Len [bit] Train.FEC Applic.FEC MBI MT 1 (present) MT 4 (present) GPS_Dist [m] GPS_Angle [°] ATT.MODE MT1 GBAS: MB CRC MB ID St.ID MsgLen [byte] Z-Cnt [m:s] Add.Msg.Flag NrOfMeasn MeasnType EphDecorPar [m/m] EphemCrcMSB EphemCrcLSB SrcAvailDur [sec] — 32* for all satellites — SatID IOD PRC [m] RRCor [m/s] S_pr_gnd [m] DiffnprcB1 [m] DiffnprcB2 [m] DiffnprcB3 [m] DiffnprcB4 [m] — 32* for all satellites — MT4 GBAS: MB CRC MB ID St.ID	

	<p>MsgLen [byte] DataSetLen</p> <p>– max 256* (per FASDB) –</p> <p>OpType SbasServProv AirportID RunwayNo RunwayLtr ApproachPerfDesig RouteInd RPDS RefPathID LTP_FTP_Lat [°] LTP_FTP_Long [°] LTP_FTP_Height [m] DeltaFPAP_Lat [°] DeltaFPAP_Long [°] TCH UnitTCH GPA [°] CourseWidth [m] DeltaLenOffset [m] VertAlertLim [m] LatrAlertLim [m] FASCRC DataSetLen</p> <p>– max 256* (per FASDB) –</p>	
<p>SCAT I</p>	<p>Channel STIOCP Index Date Time Temp [°C] SLOT FREQ [MHz] F_DEV [kHz] LEVEL [dBm] SID Len [bit] Train.FEC Applic.FEC MBI MT 1 (present) MT 4 (present) GPS_Dist [m] GPS_Angle [°] ATT.MODE MT1 SCAT: MB CRC MB ID St.ID MsgLen [byte] Z-Cnt [m:s] Acc.Err.Bnd. [m/s*s] K_md_gnd</p> <p>— 32* for all satellites —</p> <p>SatID PRC [m] IOD RRCor [m/s] S_pr_gnd [m] B_pr_gnd [m] S_fail_gnd [m]</p>	

	<p>B_fail_gnd [m]</p> <p>— 32* for all satellites —</p> <p>MT4 DATA: MB CRC MB ID St.ID MsgLen [byte]</p> <p>– max 256* (per FASDB) –</p> <p>OpType AirportID RunwayNo RunwayLtr RouteInd ValInd RPDS RefPathID ThDP_Lat [°] ThDP_Long [°] ThDP_Height [m] DERP_Lat [°] DERP_Long [°] TCH [ft] GPA [°] FASCRC</p> <p>– max 256* (per FASDB) –</p>	
Additionally recorded parameters in all modes	GPS_lat. GPS_long. GPS_alt [m] GPS_speed [km/h] GPS_date GPS_time GPS_Sat GPS_Status GPS_Fix GPS_HDOP GPS_VDOPTemp [°C] MeasTime [ms] ATT.Mode TrigCounter	

Data rate		up to 100 record sets/s
Number of record sets per data list		1 000 000
Number of data lists per mode	ILS, VOR, marker beacon, GBAS, SCAT I	999
Graphical representation of data logger content	ILS mode	up to 3 traces
Selectable parameters for graphical representation	ILS mode	DDM [µA]
		DDM_CRIS [µA]
		DDM_CLR [µA]
		SDM [1]
		SDM_CRIS [1]
		SDM_CLR [1]
		LEVEL [dBm]
Display functions	ILS mode	marker, marker to peak
		vertical scaling
		horizontal scaling
Graphical representation of data logger content	GBAS/SCAT I mode	LEVEL [dBm], 32*PRC [m], distance from reference [m]

Inputs and outputs (front)

RF input	channel 1	N connector, 50 Ω
	channel 2, R&S®EVS-B1 option	N connector, 50 Ω
AF output		3.5 mm female connector
Antenna supply		output for feeding active antennas
USB	double connector	USB stick for data storage and software updates

Inputs and outputs (rear)

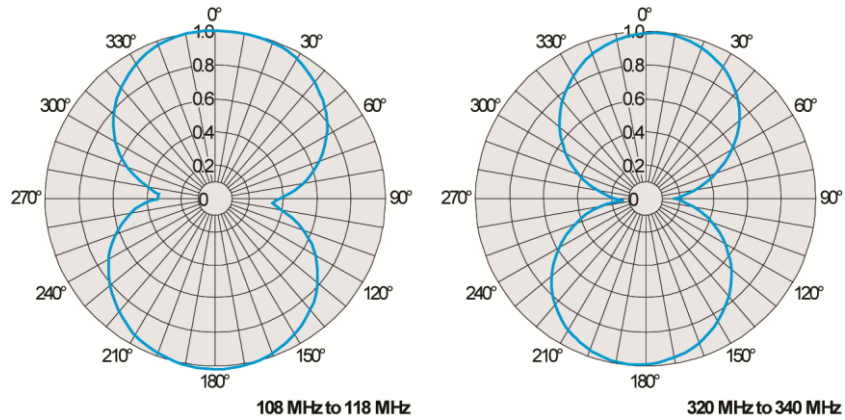
Remote interface		RS-232, 9-pin D-Sub connector
GPS interface	R&S®EVS-K2 options	RS-232, 9-pin D-Sub connector
LAN interface		RJ-45, 100BASE-T
DC output		12 V, max. 300 mA
DC input		10 V to 28 V
Baseband/trigger input		BNC connector
	impedance	1 M Ω , nominal
	baseband level for 100 % modulation depth (selectable)	500 mV/5 V
	trigger level	3.3 V to 12 V, nominal
Analog output	two outputs	BNC connector
	impedance	50 Ω , nominal

General data

Display		16.4 cm/6.4" TFT color display
Resolution		640 x 480 pixel
Temperature range	operating temperature range	-10 °C to +55 °C
	storage temperature range	-35 °C to +70 °C
Power supply		
AC supply		100 V to 240 V AC, 1 A to 0.6 A, 47 Hz to 63 Hz
Safety		in line with EN 61010-1
Internal battery	R&S®EVS-B3 option	NiMH battery
Battery operating time	between +10 °C and +45 °C	8 h to 10 h
Recharging time		4 h
External DC power supply		10 V to 28 V, max. 3 A
Mechanical resistance		
Vibration	sinusoidal	in line with IEC 68-2-6
	random	10 Hz to 100 Hz, acceleration 1 g (RMS)
Shock		40 g shock spectrum, in line with MIL-STD-810D and MIL-T-28800D
Calibration interval	recommended for highest accuracy	12 months
	for general test and measurement applications	24 months
Material		
R&S®EVS-Z1		polyamide (nylon)
R&S®EVS-Z2		alloy
Dimensions		
R&S®EVS300	W x H x D	342 mm x 157 mm x 219 mm (13.46 in x 6.18 in x 8.62 in)
R&S®EVS-Z1	W x H x D	400 mm x 250 mm x 250 mm (15.75 in x 9.84 in x 9.84 in)
R&S®EVS-Z2	W x H x D	500 mm x 400 mm x 200 mm (19.69 in x 15.75 in x 7.87 in)
R&S®EVS-Z3	L x H	3.05 m x 1.05 m (120.08 in x 41.34 in) (stand dimensions, extended/retracted)
R&S®EVS-Z4	W x H x D	1200 mm x 300 mm x 80 mm (47.24 in x 11.81 in x 3.15 in)
R&S®EVS-Z5	W x H x D	108 mm x 35 mm x 115 mm (4.25 in x 1.38 in x 4.53 in)
R&S®EVS-Z6	W x H x D	345 mm x 160 mm x 51 mm (13.58 in x 6.30 in x 2.01 in)
R&S®EVS-Z7	W x H x D (mounted on R&S®EVS300)	480 mm x 133 mm x 298 mm (18.90 in x 5.24 in x 11.73 in)
R&S®EVS-Z21	W x H x D	108 mm x 35 mm x 122 mm (4.25 in x 1.38 in x 4.80 in)
Weight		
R&S®EVS300	with internal battery (R&S®EVS-B3 option)	5.7 kg (12.57 lb)
R&S®EVS-Z1		1.0 kg (2.20 lb)
R&S®EVS-Z2		4.4 kg (9.70 lb)
R&S®EVS-Z3		2.5 kg (5.51 lb)
R&S®EVS-Z4		2.5 kg (5.51 lb)
R&S®EVS-Z5		0.5 kg (1.10 lb)
R&S®EVS-Z6		0.24 kg (0.53 lb)
R&S®EVS-Z7		1.2 kg (2.69 lb)
R&S®EVS-Z21		0.34 kg (0.75 lb)

ILS (LLZ/GS)/VOR dipole antenna (R&S®EVS-Z3 option)

Frequency range		108 MHz to 118 MHz 320 MHz to 340 MHz
Impedance		50 Ω (nom.)
Gain		-1 dBi (nom.)
Polarization		horizontal
Radiation pattern		see typical directional receiving pattern
Connector		BNC female



Typical directional receiving pattern of the R&S®EVS-Z3.

Ordering information

Designation	Type	Order No.
ILS/VOR Analyzer	R&S®EVS300	3544.4005.02
Options		
Second Signal Processing Unit	R&S®EVS-B1	5200.6625.02
Battery Pack	R&S®EVS-B3	5200.8240.02
Frequency Scan	R&S®EVS-K1	5200.6554.00
GPS Mode	R&S®EVS-K2	5200.6548.00
CRS/CLS Mode	R&S®EVS-K3	5200.9082.00
FFT Mode	R&S®EVS-K4	5201.5922.00
Support for Rohde & Schwarz power sensors	R&S®EVS-K5	5201.8644.02
DME Pulse Shape View	R&S®EVS-K6	5201.8650.02
Oscilloscope Mode	R&S®EVS-K7	5201.8667.02
R&S®EVS-K5 plus R&S®EVS-K6 Package	R&S®EVS-K8	5201.8696.02
GBAS Mode	R&S®EVS-K9	5202.8154.02
SCAT Mode	R&S®EVS-K10	5201.7783.00
Recommended extras		
Weather Protection Bag	R&S®EVS-Z1	5200.5812.00
Rugged Transport Case	R&S®EVS-Z2	5200.6525.00
ILS (LLZ/GS)/VOR Dipole Antenna	R&S®EVS-Z3	5200.6577.02
Carrying Bag for ILS (LLZ/GS)/VOR Dipole Antenna	R&S®EVS-Z4	5200.9999.00
DC/DC Converter (10 V to 34 V, 3 A at 24 V)	R&S®EVS-Z5	5200.6619.02
Protective Hard Cover	R&S®EVS-Z6	5201.7760.00
19" Adapter	R&S®EVS-Z7	5201.8680.00
Verification Test Software	R&S®EVS-Z11	1329.8144.00
DC Buffer	R&S®EVS-Z21	5201.9470.02
Service manual, English		3544.4486.22
Service manual, German		3544.4486.21
Documentation of Calibration Values	R&S®DCV-2	5201.4349.02
Accessories supplied		
External power supply (100 V to 240 V)		5200.9118.02
User manual, English		3544.4486.12
User manual, German		3544.4486.11

Warranty		
Base unit		3 years
All other items ⁷		1 year
Options		
Extended Warranty, one year	R&S®WE1	Please contact your local Rohde & Schwarz sales office.
Extended Warranty, two years	R&S®WE2	
Extended Warranty with Calibration Coverage, one year	R&S®CW1	
Extended Warranty with Calibration Coverage, two years	R&S®CW2	
Extended Warranty with Accredited Calibration Coverage, one year	R&S®AW1	
Extended Warranty with Accredited Calibration Coverage, two years	R&S®AW2	

Extended warranty with a term of one and two years (WE1 and WE2)

Repairs carried out during the contract term are free of charge ⁸. Necessary calibration and adjustments carried out during repairs are also covered.

Extended warranty with calibration coverage (CW1 and CW2)

Enhance your extended warranty by adding calibration coverage at a package price. This package ensures that your Rohde & Schwarz product is regularly calibrated, inspected and maintained during the term of the contract. It includes all repairs ⁸ and calibration at the recommended intervals as well as any calibration carried out during repairs or option upgrades.

Extended warranty with accredited calibration (AW1 and AW2)

Enhance your extended warranty by adding accredited calibration coverage at a package price. This package ensures that your Rohde & Schwarz product is regularly calibrated under accreditation, inspected and maintained during the term of the contract. It includes all repairs ⁸ and accredited calibration at the recommended intervals as well as any accredited calibration carried out during repairs or option upgrades.

For product brochure, see PD 5213.6070.12 and www.rohde-schwarz.com

⁷ For options that are installed, the remaining base unit warranty applies if longer than 1 year. Exception: all batteries have a 1 year warranty.

⁸ Excluding defects caused by incorrect operation or handling and force majeure. Wear-and-tear parts are not included.

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Rohde & Schwarz

The Rohde & Schwarz electronics group offers innovative solutions in the following business fields: test and measurement, broadcast and media, secure communications, cybersecurity, monitoring and network testing. Founded more than 80 years ago, the independent company which is headquartered in Munich, Germany, has an extensive sales and service network with locations in more than 70 countries.

Certified Quality Management
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Rohde & Schwarz GmbH & Co. KG

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R&S®EVS300 ILS/VOR Analyzer

Data without tolerance limits is not binding | Subject to change

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