Secured by HBM

DWS2103

## Legal-for-trade digital scale display

Special features

– **For connection of digital load cells and amplifiers of the AED… transducer electronics**
– **Alibi memory for settings**
– **Encrypted data transfer between DWS2103 and connected load cells or AED… components**
– **COM-Port for a printer (RS232 or USB)**
– **PS2 connection for external keyboard**
– **Additional interfaces for data exchange of host systems**
– **Eight European menu languages selectable**

Dimensions (in mm; 1 mm= 0.03937 inches)

120

245

Depth: 49

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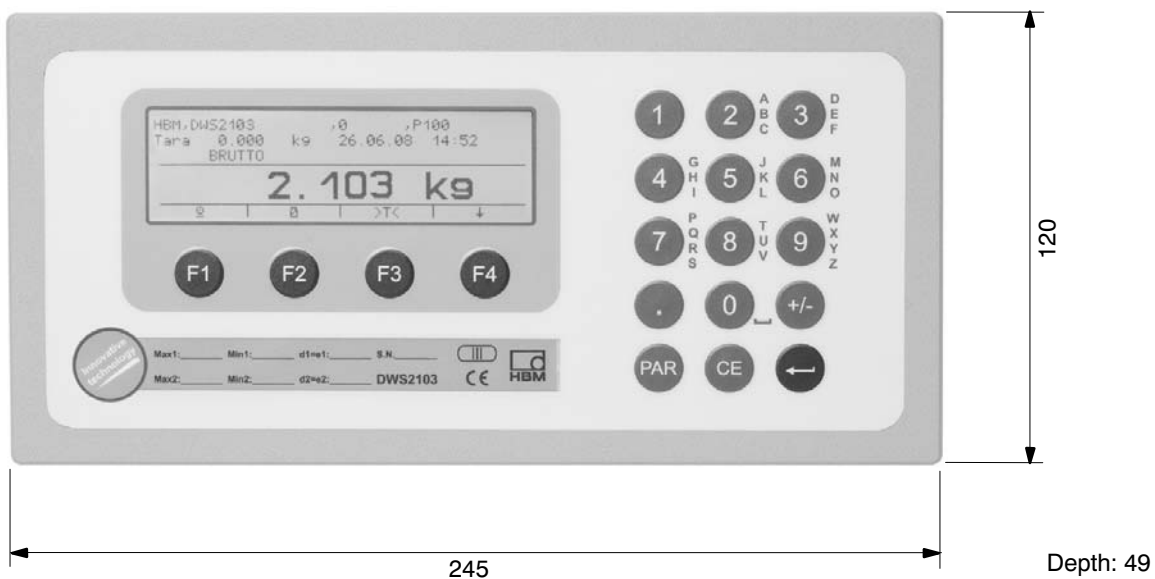
Dimensions (Cutout in the panel-frame); (in mm; 1 mm= 0.03937 inches)
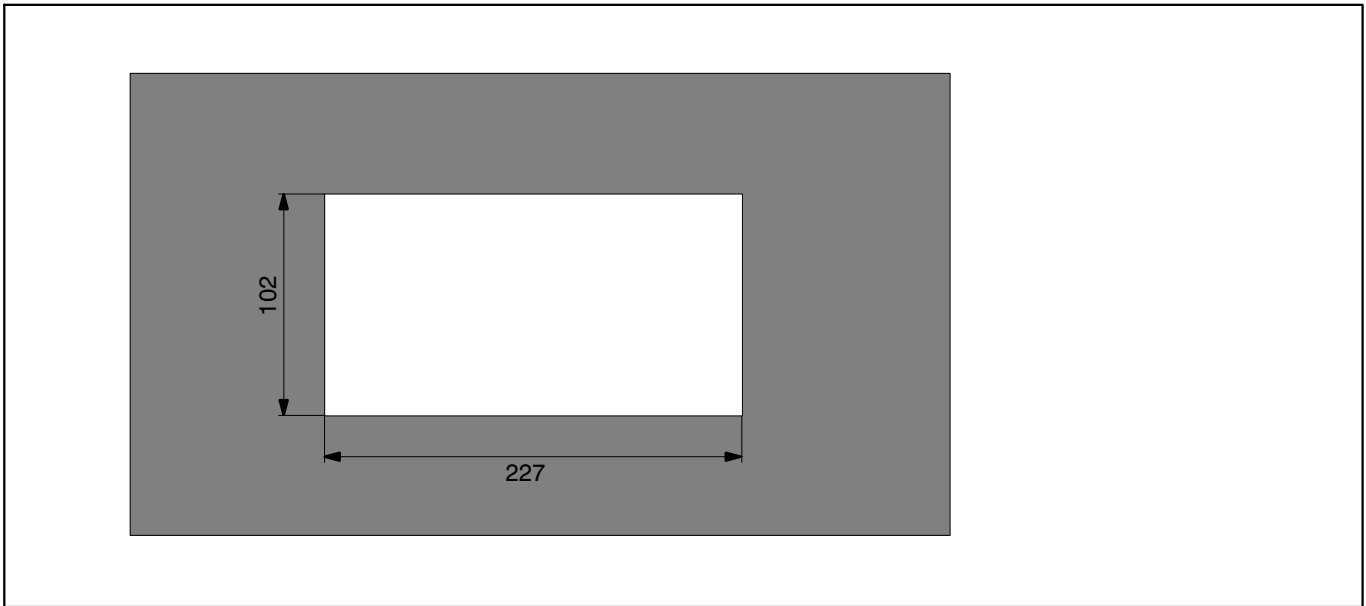
Dimensions (desktop housing, also for wall mounting); (in mm; 1 mm= 0.03937 inches)

Material: Aluminum, powder coated
(RAL7035, light gray)
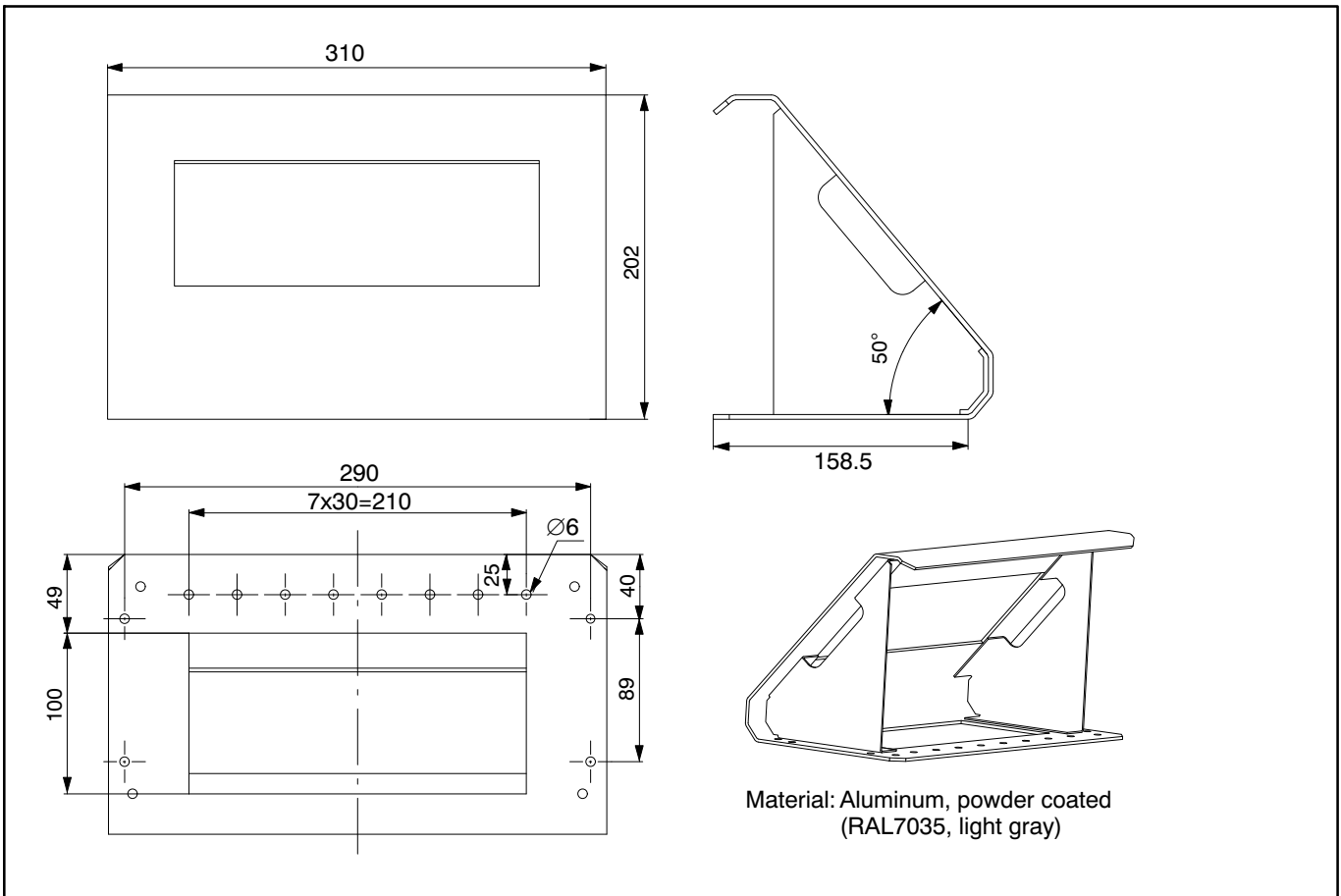
Specifications

Type (NAWI, non automatic weighing indicator)		DWS2103
Voltage supply UB		
Range	V_{DC}	10 … 30 (24 nominal)
Power consumption (without outputs)	W	0.88
Current consumption (with 24 V)	mA	40
Connector for digital load cells or AED… electronics		RS485 interface COM1
Supply voltage OUT1	V_{DC}	10 … 30
Output current	A	< 1
Display		
LCD with backlighting and status symbols	Pixel	240x64
Character height (measured value)	mm	8
Output rate	/ s	5
Keys		
Number		15
Function keys		4
Serial interface RS-485 (COM1), Load cells		
Baud rate	bit/s	9600, …,115200
Node		0 … 89
Type		RS485 (2/4−wire)
RS485, 2−wire, signals		TRxA, TRxB
RS485, 4−wire, signals	−	TRA, TRB, TXA, TXB
Max. cable length RS485	m	500
Serial interface (COM1), CANopen, Load cells		
Protocol		CANopen
Bit rate	kbit/s	10 … 1000
Node		1 … 127
Interface cable length	m	5000 … 25
Serial interface (COM2), PC/PLC		
Baud rate	bit/s	1200, …,115200
Parity bit		Even, odd, none
Data bits	bit	8
Stop bit	bit	1
Type		RS232
RS232, signals		RxD, TxD, GND
Max. cable length RS232	m	25
Serial interface (COM3), Printer		
Baud rate (RS232)		1200, …,115200
Parity bit (RS232)		Even, odd, none
Data bits (RS232)	bit	8
Stop bit (RS232)	bit	1
Type		RS232
RS232, signals		RxD, TxD, GND, DTR
Max. cable length RS232	m	25
USB (COM3), Printer		
Max. cable length	m	5
Printer language		PCL1 … 5
Serial interface (COM4), Second display		
Baud rate	bit/s	1200, …,115200
Parity bit		Even, odd, none
Data bits	bit	8
Stop bit	bit	1
Type		RS232
RS232, signals		RxD, TxD, GND, DTR
Max. cable length RS232	m	25
PS2 interface, standard keyboard		
Output current	mA	< 100

Specifications (Continuation)

Ambient conditions		
Nominal temperature range	°C [°F]	−10 … +50 [14 … 122]
Operating temperature range	°C [°F]	−20 … +60 [−4 … 140]
Storage temperature range	°C [°F]	−30 … +80 [−22 … 176]
Relative humidity, non-condensing		
in operation	%	20 … 85
Storage	%	10 … 90
Housing		
Degree of protection per EN 60529 (IEC 529)		IP20
Degree of protection per EN 60529 (IEC 529) for front panel when installed		IP65
Material		Aluminum
Weight, approx.	g	540

The DWS2103 is not sensitive to HF irradiation and conducted interference in accordance with OIML R 76, EN 45501:1992(B3), EN 61326: 2006 emission (EME) class B, Immunity from interference: industrial environment.
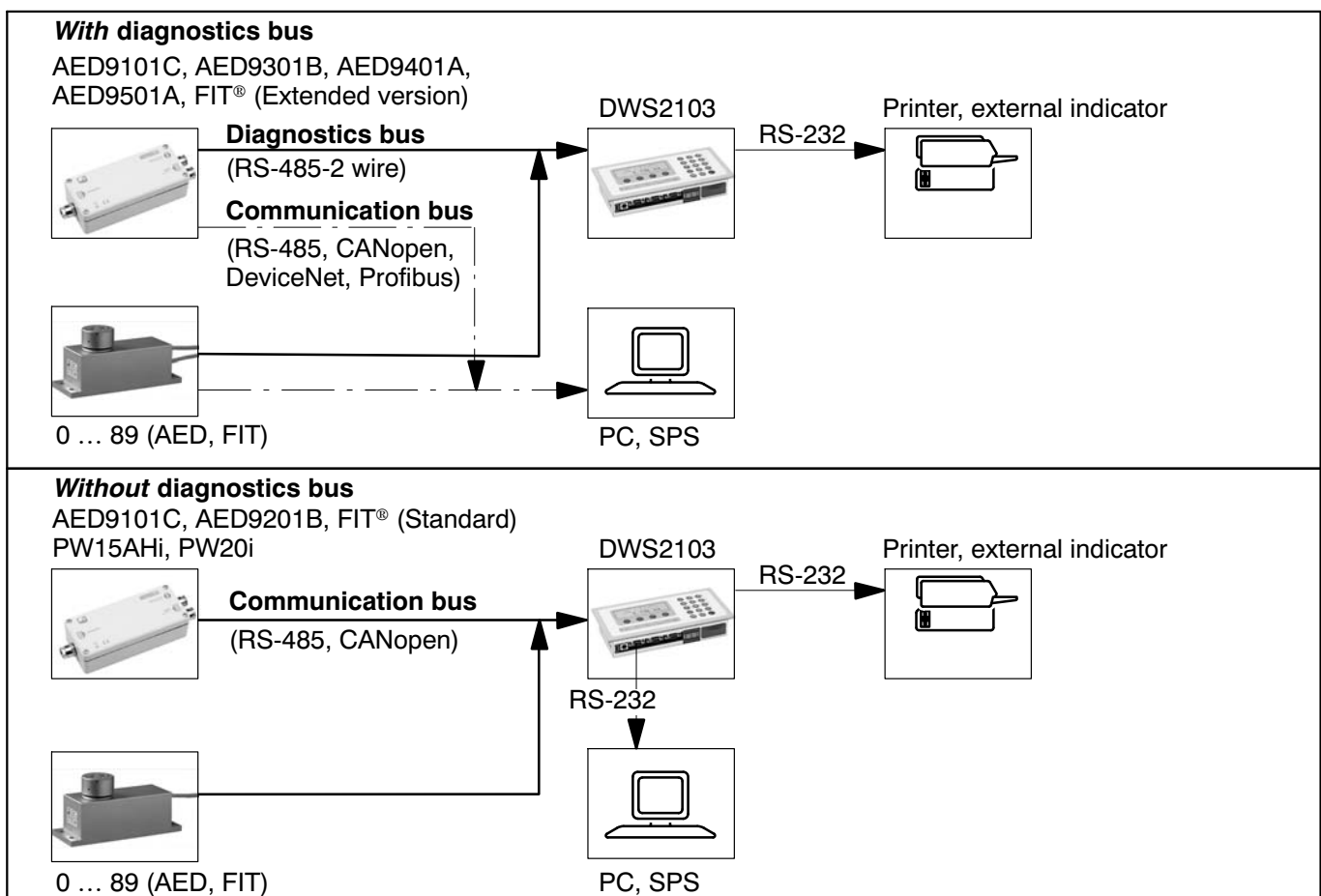
Accessories, included in the scope of supply
– System-CD–ROM 1-DWS2103-DOC, with Communication Protocol for PC and documentation

Accessories, to be ordered separately
– Power supply unit AC/DC15 V / 530mA
– Desktop or wall mounted housing, 1-TG2116

Communication in the measurement chain *with* and *without* diagnostics bus

With diagnostics bus
AED9101C, AED9301B, AED9401A, AED9501A, FIT® (Extended version)
Diagnostics bus (RS-485-2 wire)
Communication bus (RS-485, CANopen, DeviceNet, Profibus)
0 … 89 (AED, FIT)
DWS2103
RS-232
Printer, external indicator
PC, SPS

Without diagnostics bus
AED9101C, AED9201B, FIT® (Standard) PW15AHi, PW20i
Communication bus (RS-485, CANopen)
0 … 89 (AED, FIT)
DWS2103
RS-232
RS-232
Printer, external indicator
PC, SPS

measure and predict with confidence

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