

Technical Data

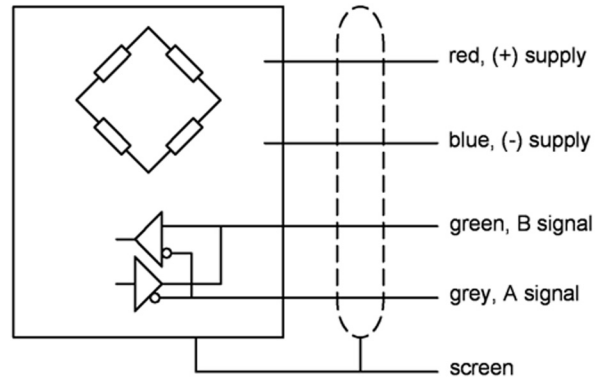
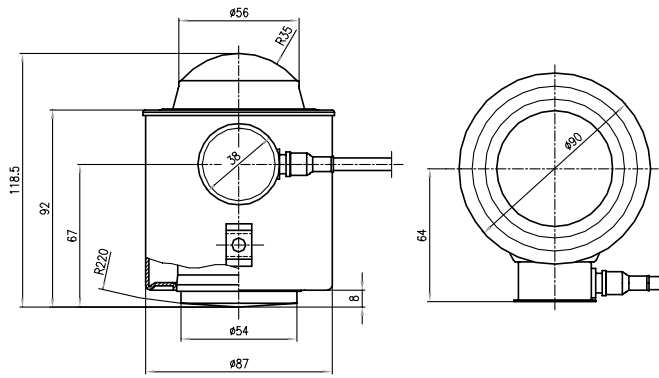
Maximum capacity	Highest limit of specified measuring range	E_{max}	25	50	t
Max. usable load	Upper limit for measurements	E_u	37.5	75	t
Destructive load	Danger of mechanical destruction	E_d	>75	>150	t
Nominal deflection		S_{nom}	0.5	0.8	mm

Accuracy class

			C3	C6 (not yet available)	
Accuracy class			0.015	0.008	
Minimum dead load	Lowest limit of specified measuring range	E_{min}	0	0	% C_n
Minimum LC verification interval	Minimum load cell verification interval ($v_{min} = E_{max}/Y$)	Y	14,000	20,000	
Creep divisions factor	Factor for min. dead load output return ($DR=0.5 E_{max}/Z$)	Z	3,000	8,000	
Tolerance on rated output	Permissible deviation from rated output	d_c	< 0.07	< 0.07	% C_n
Zero output signal	Load cell output signal under unloaded conditions	S_{min}	< 1	< 1	% C_n
Repeatability error	Max. change in load cell output for repeated loading	ϵ_R	< 0.005	< 0.005	% C_n
Creep during 30 min.	Max. change in load cell output under nominal load	d_{cr}	< 0.015	< 0.008	% C_n
Non-linearity	Max. deviation from the best straight line through zero	d_{lin}	< 0.01	< 0.01	% C_n
Hysteresis	Max. diff. in LC output between loading and unloading	d_{hy}	< 0.0165	< 0.008	% C_n
Temperature effect on S_{min}	Max. change of $S_{min}/10K \Delta T$ over B_T referred to C_n	$TK_{S_{min}}$	< 0.01	< 0.007	% $C_n/10K$
Temperature effect on C_n	Max. change of $C_n/10K \Delta T$ over B_T referred to C_n	TK_c	< 0.01	0.005	% $C_n/10K$
Insulation impedance	Between circuit and housing at 50 V DC	R_{IS}	> 1,000	> 1,000	M Ω
Nominal supply voltage		U_N	24	24	VDC
Supply voltage range	To hold the specified performance	B_U	20... 28	20... 28	VDC
Nominal ambient temp. range	To hold the specified performance	B_T	-10.. +40	-10.. +40	°C
Usable ambient temp. range	Permissible for continuous operation without damage	B_{Tu}	-30.. +70	-30.. +70	°C
Storage temp. range	Transportation and storage	B_{Tl}	-40.. +95	-40.. +95	°C
Permissible eccentricity	Permissible displacement from nominal load line	S_{ex}	10	10	mm
Vibration resistance	Resistance against oscillation (IEC 68-2-6 Fc)		20g, 100h, 10Hz... 150Hz	20g, 100h, 10Hz... 150Hz	
Air pressure effect	Influence of ambient air pressure on S_{min}	$PK_{S_{min}}$	<500	<500	g/kPa

Definitions acc. to VDI/VDE 2637.

The technical data given here serve only as a product description and must not be interpreted as guaranteed characteristics in the legal sense.



Dimensions in mm

Restoring force

For each mm of movement that the top of the load cell shifts from the vertical axis, a horizontal restoring force of 1.55 % of the applied vertical load is generated.

Load cell housing construction

Deep draw pulled housing, membrane and measuring element hermetically sealed, welded, filled with inert gas,

Material-Nr.

1.4301 (DIN 17440), 304 S15 (B.S.)

Ingress Protection

IP 68, IEC 529 /EN 60529: 1.5 m water column /10,000 h
 IP 69K, DIN 40 050: water under high pressure, steam cleaning
 Sealing equivalent to NEMA 6

Cable

robust, flexible, screened,
 sheath: TPE-U,
 colour: black,
 diameter: 5 mm, 4 x AWG22 (0.35 mm²),
 length: 16 m

Bending radius

Fixed installation: ≥ 50 mm
 Flexible installation: ≥ 150 mm

Digital Interface

Serial 2-Wire RS485 Interface for up to 8 load cells

Order information

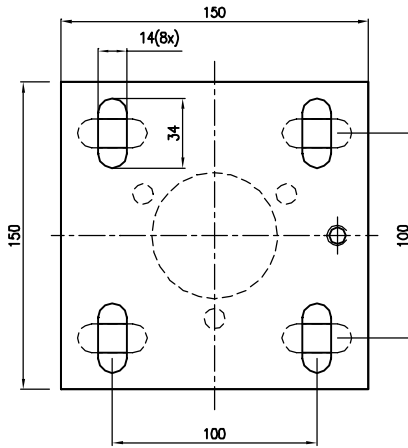
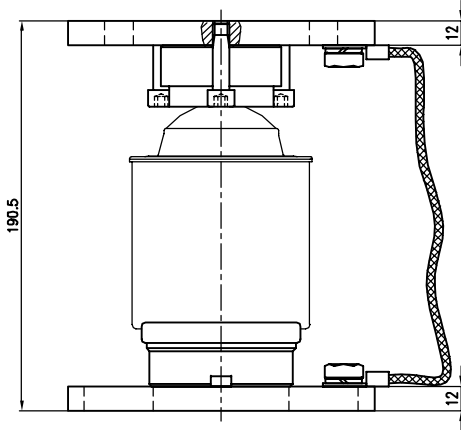
Type	Nominal load E_{max}	Version	Max. usable load E_{max} (in % of E_{max})	Destructive load (in % of E_{max})
PR6224/25t	25t	C3/C6	150	> 300
PR6224/50t	50t	C3/C6	150	> 300

For using the digital load cells all components of the measuring chain are required.
 Suitable Terminal: Combics Pro Truck

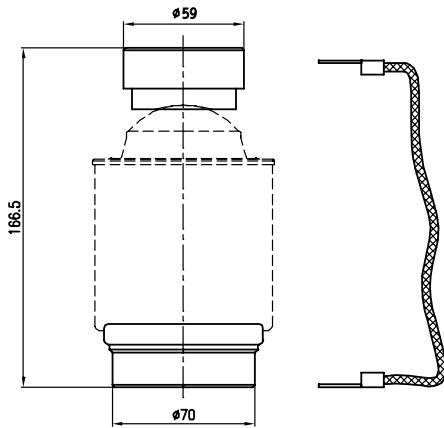
For professional applications further options and a wide range of additional mounting kits are available:

Type	Accessories	Order Number
PR6021/00N	Load and bottom disc set of top and bottom load disc, tool steel, anti-corrosion coating	9405 360 21001
PR6021/01N	Mounting Kit for PR 6221, including top and bottom load disc, anti-corrosion coating	9405 360 21011
PR6024/68	digital stainless steel-cable junction box for up to 8 digital load cells, made of stainless steel 1.4404	9405 360 24682
PR6024/62	24 VDC power supply for up to 8 digital load cells, made of stainless steel 1.4404	9405 360 24022
PR6124 P	Power cable screened power cable for a safe power supply in various lengths	9405 361 24xx3
PR6124 D	Data cable screened data connection cable in various lengths	9405 361 24xx4

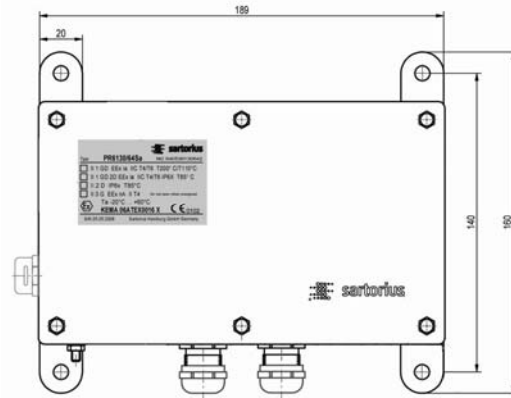
PR 6021/01N, Mounting kit



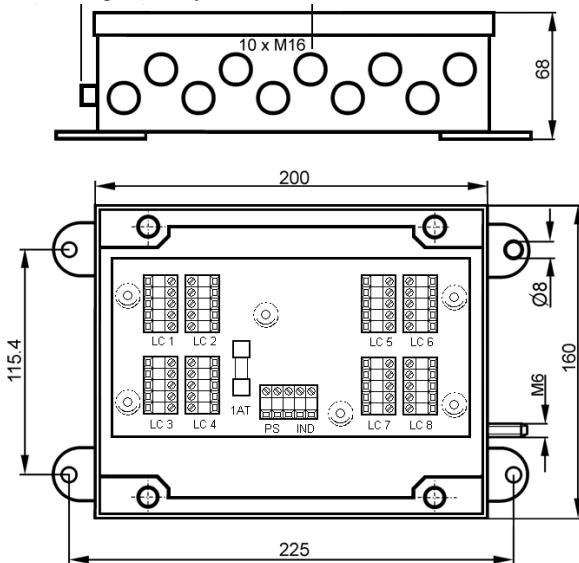
PR 6021/00N, Top and bottom load disc incl. rubber ring and earthing strap



PR 6024/62S Power Supply



PR 6024/68S, Digital cable junction box



* Dimensions in mm

Specifications subject to change without notice.
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