



Product	Nominal torque	Self-holding torque	Nominal rated speed
PSS 301-8	1 Nm	0.5 Nm	210 rpm
PSS 302-8	2 Nm	1 Nm	115 rpm
PSS 305-8	5 Nm	2.5 Nm	40 rpm

Data interfaces

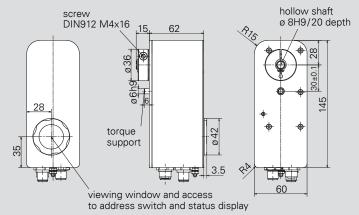
CANopen, PROFIBUS DP, DeviceNet, Modbus RTU, Sercos, EtherCAT, PROFINET, EtherNet/IP, POWERLINK, IO-Link

Ctart are duration	20.0/ /b-sain time 600.a)	
Start-up duration	20% (basis time 600s) at nominal torque	
Mode of operation	S3	
Supply voltage	24 V DC ± 10 % galvanically separated between control and motor and bus	
Nominal current	2.2 A	
Power consumption (control unit)	0.1 A	
Positioning accuracy absolute measurement of position taken directly at the output shaft	0.9°	
Positioning range	250 rotations not subject to mechanical limits	
Shock resistance in accordance with IEC/DIN EN 60068-2-27	50 g 11 ms	
Vibration resistance in accordance with IEC/DIN EN 60068-2-6	1055 Hz 1.5 mm/ 551 000 Hz 10 g/ 102 000 Hz 5 g	
Output shaft	8 mm solid shaft or 8 mm hollow shaft with adjustable collar	
Maximum axial force	20 N	
Maximum radial force	40 N	
Ambient temperature	045°C	
Storage temperature	-1070°C	
Protection class	IP65 under installed and wired conditions 1)	
Material	as for PSE, but with stainless steel housing	
Weight	650 g	
Certificates	CE, optional: NRTL (UL, CSA, ANSI)	

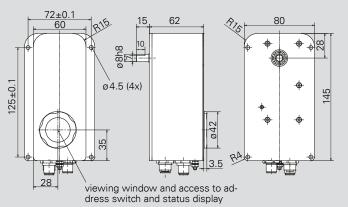
¹⁾ welded V2A housing, ball bearings at the output shaft with sealing disc

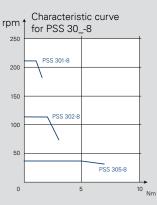
The order key and accessories can be found on p. 18/19.

PSS 30_-8 (with hollow shaft)



PSS 30_-8-V (with solid shaft)





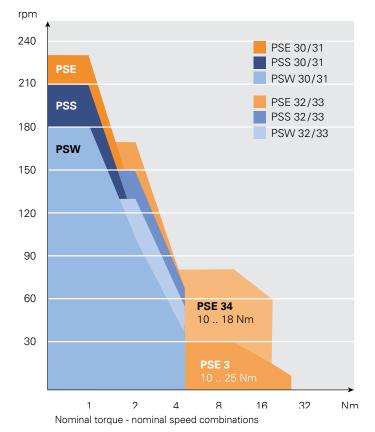
For details of the connections please see also p. 47 and the instruction manual.

ORDER KEY PSE/PSS/PSW 3 SERIES

All the positioning systems in the PSE/PSS/PSW 3 series share the same order key.

To provide the best possible overview and to simplify customer documentation, the diverse range of options available for the PSE/PSS/PSW 3 series has been organised in a shared order key.

Order key PSE/PSS/PSW: Pro-С D tection Design Туре Bus communication Connections Brake NRTL certification (see p. 11) class (see p. 7) Positioning System CANopen **Efficient** IP 54 PS**E** 0: without, **C**€only PROFIBUS DP DP: 0: without jog (see p. 20-25)1) N: with NRTL DN: DeviceNet keys certification Positioning System 30x-8/-14 (V)2) MB: Modbus RTU T: with jog keys³⁾ (in accordance with UL, **Stainless IP65** PS**S** 31x-8/-14 (V)2) Sercos Y: 1 connector, 0: without CSA, ANSI and CE) (see p. 28-31) 32x-14 (V)2) EC: **EtherCAT** Y-encoded M4): with 33x-14 (V)2) PN: **PROFINET** 7. 1 connector Positioning System EI: EtherNet/IP Y-encoded, Washable IP 68 PS**W** PL **POWERLINK** with jog keys 3) (see p. 32-35) IO-Link ¹⁾ You can find the order key for the PSE 34_-14 on page 26. 3) not for PSW or IO-Link, always via an extra connector 2) (V) not for PSE 4) only with 14 mm out-put shafts Standard equipment (Connections) Form/Type Output shaft Torque second databus connection $\mathbf{x} = 1 \text{ Nm}$ always provided (not for IO-Link 30 horizontal **x** = 2 Nm 8 = 8 mm hollow shaft or Y-encoded connector) 31 vertical x = 5 Nm14 = 14 mm hollow shaft address switches always 32 $x = 10 \text{ Nm}^{5}$ 8V = 8 mm solid shaft 6) horizontal provided (also IE-buses, not for $x = 18 \text{ Nm}^{5}$ 14V = 14 mm solid shaft 6) vertical 33 Examples of orders IO-Link) $x = 25 \text{ Nm}^{5}$ provided below. For further information on connections only for PSE 18 Nm: horiz. 25 Nm: long. 6) only for PSS/PSW and address settings see also "Overview: bus communication" on p.47.



TORQUES AND SPEEDS

Example 1

You require the protection class IP54 and a maximum torque of 2 Nm. The speed should be greater than 100 rpm. An 8 mm hollow shaft and longitudinal construction meet the requirements of your application.

Your wish to use EtherNet/IP as the bus and connect the PSE to the control unit using a hybrid connector and hub. You do not require an additional holding brake in your application.

→ PSE 312-8-EI-Y-0-0

Example 2

IP68, max. 3 Nm, > 100 rpm, horizontal construction, 14 mm solid circular shaft, IO-Link via a connector, with brake.

→ PSW 325-14V-IO-0-M-0

ACCESSORIES PSE/PSS/PSW 3 SERIES

The connectors shown here can be used for all three types of device (PSE/PSS/PSW). This ensures that the PSE (IP54) and PSS (IP65) comply with the IP protection classes. We will also be pleased to help you find a suitable mating connector for the PSW (IP68) if necessary – just ask us!



¹⁾ see under "D" in the order key 2) not for PSW 3) power supply and bus via one cable, without second databus connector

PSS/PSW: OPTIMUM HYGIENIC DESIGN



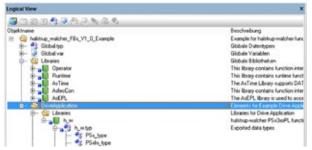
Our stainless steel positioning systems follows the **hygienic design** recommendations (construction design, selection and treatment of materials) of the Chair of Apparatus and Plant Design at the Technical University of Munich, Weihenstephan Science Centre.



Screw cap to cover the second bus connection (for PSS/PSW)

Order no. 9601.0176

MODULES AND DESCRIPTION FILES



Take advantage of our functional modules or description files for the various buses. You can download the files on our Website:

www.halstrup-walcher.de/en/software