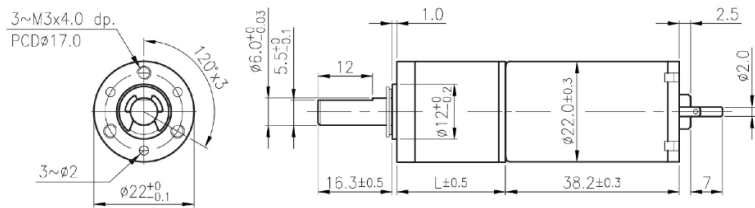


DRAWING (mm)



PHOTO



MODEL NO. DESIGNATION EXAMPLE

1 - 2 - 3 - 4

1 = empty → sleeve bearing
1B = ball bearing
2F = emc filter varistor / capacitor
3E = magnetic encoder
4 = empty → no encoder rear cover cap
4C = magnetic encoder rear cover cap

PD1230 - VOLTAGE - REDUCTION - B - F - E - C

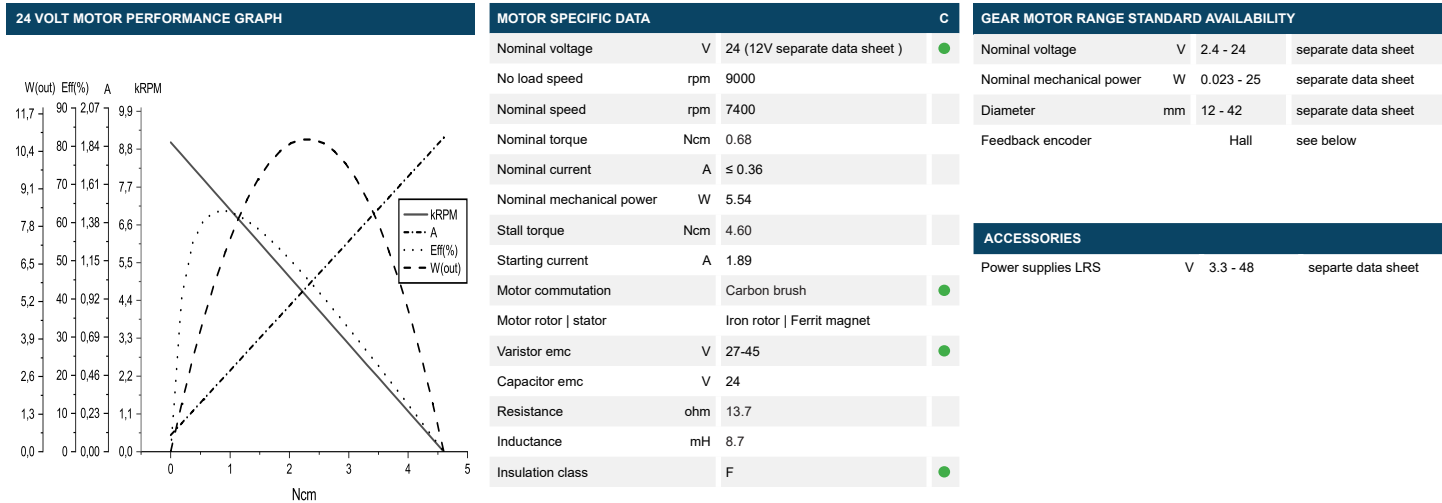
OPTIONS ENCODERS AND POWER SUPPLIES



● C = customizations are offered on demand even for smaller quantities. Typical customizations indicated with green dot at column end. Please contact us for any customization request

GEAR MOTOR DATA																				C		
Gear reduction		1:5	1:18	1:20	1:25	1:66	1:77	1:90	1:110	1:136	1:246	1:336	1:393	1:484	1:597	1:735	1:1079	1:1475	1:2124	1:3968		
Nominal torque ^ gear box limit		mNm	25.5	83.4	98.1	118	265	314	363	392^	392^	490^	490^	490^	490^	490^	588^	588^	588^	588^		
Nominal speed		rpm	1500	400	340	280	105	92.0	79.0	64.0	52.0	29.4	22.4	19.6	16.0	12.9	10.5	7.4	5.5	4.0	2.0	
Peak torque ^ gear box limit		mNm	294	883	883^	883^	1177	1177^	1177^	1177^	1471	1471^	1471^	1471^	1471^	1471^	1765^	1765^	1765^	1765^		
Mechanical power		W	3.213	2.451	2.451	2.422	1.752	1.819	1.806	1.582	1.071	0.757	0.577	0.505	0.412	0.332	0.270	0.183	0.136	0.099	0.049	
Efficiency gear head		%	80	70	70	70	60	60	60	60	50	50	50	50	50	50	40	40	40	40		
Length gear box = L		mm	23.3	29.5	29.5	29.5	35.7	35.7	35.7	35.7	41.9	41.9	41.9	41.9	41.9	41.9	48.1	48.1	48.1	48.1		
Weight		g	97	102	102	102	109	109	109	109	109	116	116	116	116	116	116	123	123	123	123	

GEAR MOTOR COMBINED DATA			C	GEAR BOX SHAFT DATA			C	GEAR BOX SPECIFIC DATA			C
Service life brush wear	500 h continuous operation		●	Radial play thrust play	mm	≤ 0.05 ≤ 0.3		Material gear stage	Ratio 1:5 sintered steel		●
Performance tolerances	% ± 15			Shaft axial load	N	6.9		Material > 1:5 ratio / stage	POM first + sintered steel		●
Operating temperature	-10....+60 °C		●	Radial load	N	11.8		Direction of rotation	CW or CCW by reversed V polarity		
IP code	30			Press fit force max.	N	58.8		Assembly front bell	mm	Maximum screw depth 4.0	
Manufacturing standard	ISO9001 ISO 14001 TS16949			Backlash no load	°	≤ 2.5					
Compliance	RoHS and REACH			Bearing type shaft material		Ball bearing AISI 1144					
Label CE UL	CE no UL no			Motor pinion material shape		Brass straight	●				



ENCODER OPTIONS		MAGNETIC HALL SENSOR		C
Pulses per revolution		3 x 2		●
Channels phase shift		2 90° ±(1/6)T		
Encoder rear cover		Cover cap in ABS plastic		
Sensor technical data		Refer externally to brand and part UTC-SK1816		
Size		Ø 22 x 12.6		
Harness connector		JST PHR-6 P=2-6P		●
Harness cable		UL1007 AWG24 100 mm		●
Connection		BLK M- RED M+ BRN Vcc GRN GND BLU A VIO B		
Supply voltage Vcc		min.3.5 ref - max. 20 V		
Supply Current Ice		Vcc 20V open output min. - ref. 5 max. 10 mA		
Open collector output		Requires external output resistors		