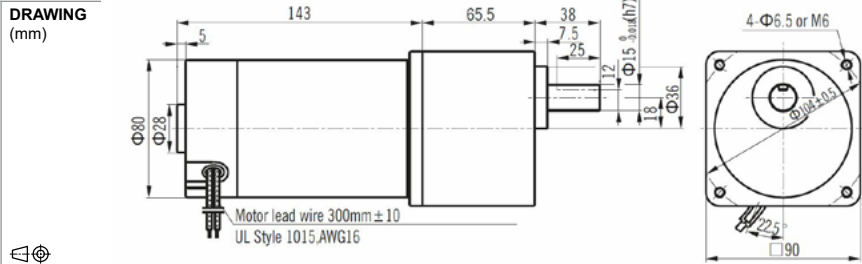


SDS90143B 90W



MODEL NO. DESIGNATION

SDS90143B - VOLTAGE - REDUCTION

Torque unit: **Nm** (newton meter)

Speed unit: **rpm** (revolutions per minute)

GEAR MOTOR DATA																												
Reduction	3	3,6	5	6	7,5	9	10	12,5	15	18	20	25	30	36	40	50	60	75	90	100	120	150	180	200				
Nominal torque 12V	0.8	1	1.3	1.6	2	2.4	2.4	3	3.6	4.3	4.4	5.5	6.5	7.8	8.7	10.9	13.1	16.3	17.5	19.5	20	20	20	20				
Nominal speed 12V	867	722	520	433	347	289	260	208	173	144	130	104	87	72	65	52	43	35	29	26	22	17	14	13				
Nominal torque 24V	0.8	0.9	1.2	1.5	1.9	2.2	2.2	2.8	3.4	4	5	6	7.3	8.1	10.1	12.4	15.1	16.3	18.1	20	20	20	20	20				
Nominal speed 24V	933	778	560	467	373	311	280	224	187	156	140	112	93	78	70	56	47	37	31	28	23	19	16	14				
Length (mm)	208.5																											
Weight (kg)	3.7																											

Torque unit: **Nm** (newton meter)

GEAR HEAD DATA																													
Reduction	3	3,6	5	6	7,5	9	10	12,5	15	18	20	25	30	36	40	50	60	75	90	100	120	150	180	200					
Max. continuous torque	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20					
Efficiency (%)	81	81	81	81	81	81	73	73	73	73	66	66	66	66	66	66	66	66	59	59	59	59	59	53					
Radial F 20 mm shaft N	350	350	350	350	350	350	350	350	350	350	450	450	450	450	450	450	450	450	450	450	450	450	450	450					
Max. thrust load N	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100					
Rotation when in cw	cw	cw	cw	cw	cw	cw	cw	cw	cw	cw	ccw	ccw	ccw	ccw	cw	cw	cw	cw	cw	cw	cw	cw	cw	cw					
Length (mm)	65.5																												
Weight (kg)	1.5																												

GEAR MOTOR FEATURES		STANDARD	CUSTOMIZATION
Motor type		Spur geared brush DC motor	Voltage
Insulation Class		Class B (130°C)	Class F (155°C)
EMC filter		No	
Speed tolerance		± 5%	
Cables		AWG16, 300mm ± 10	Harness with connector
Housing materials		Aluminum	
Gears and shaft material		Metal, 40cr alloy steel	Shaft dimensions
Bearings type		Ball bearing	
Operating temperature		-10-...+40 °C	-40-...+40 °C
Manufacturing quality standards		ISO 9001	
RoHS compliance		Yes	
CE label		No	
UL approval		No	
IP rating		IP20	

Insulation Resistance
20 MΩ or more when 500 VDC megger is applied between the windings and the case after rated operation under normal ambient temperature and humidity.

Temperature Rise
The temperature rise should be lower than 80°C measured by resistance method when the motor is working.

Dielectric Strength
In the circumstance of normal ambient temperature and humidity, there will be no problem to withstand 1.5kV at 50/60hz between the windings and the frame for 1 minute after rated motor operation.

MOTOR DATA		
Nominal voltage (V)	12	24
No load speed (rpm)	3100	3300
No load current (A)	2.0 Max.	1.0 Max.
Nominal speed (rpm)	2600	2800
Nominal torque (mNm)	330	307
Nominal current (A)	12	5
Output (W)	90	90
Length (mm)	143	
Weight (kg)	2.2	

