

UNIT TYPE SPEED CONTROL MOTOR

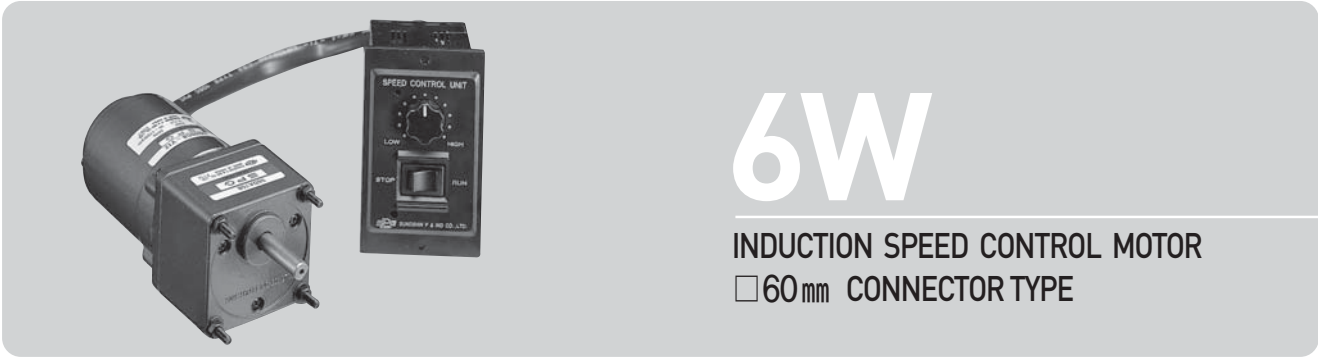


Characteristics of the unit type speed control motor

- This is a unit product that uses the separate unit type controller and motor simultaneously.
- The motor and the controller are connected with one touch.
AC power is connected and does not require a separate connection method. Speed can be controlled by a volume switch on the exterior. Therefore, it is appropriate for uses requiring remote control.
- The unit type controller has a speed controller circuit, a condenser for the motor and the volume.(By the size of the condenser, some units have to use the condenser on the outside.)
- The unit type controller does not have an instantaneous braking function.
- By using an extension cable(sold separately), it is possible to have a max distance of 2m between the motor and the controller.
- The control range is 90[rpm]~1400[rpm] for 50Hz and 90[rpm]~1700[rpm] for 60Hz.

GENERAL SPECIFICATIONS OF SPEED CONTROL MOTORS

ITEM	Specification
Insulation Resistance	100M Ω or more when 500V megger is applied between the windings and the housing after rated motor operation under normal ambient temperature and humidity
Dielectric Strength	Sufficient to withstand 1.5V at 50/60Hz applied between the windings and the case after rated motor operation under normal ambient temperature and humidity for 1min.
Temperature Rise	80°C or less increase measured by thermometer after rated operation, (45°C less than the motor with fan motors with fan)
Insulation Class	B Class (130°C)
Overheat Protection Device	Built-in thermal protector (automatic return type): Open 120°C \pm 5°C, Close 76°C \pm 15°C
Ambient Temperature	-10°C~40°C
Ambient Humidity	85% maximum(non condensing)



SIZE mm sq.	Motor Type	Controller Type	Poles	Output (W)	Voltage (V)	Freq. (Hz)	Duty	Speed Range (rpm)	Permissible Torque				Starting Torque		Cap. (μ F)
									at 1200rpm		at 90rpm		(kg-cm)	(N-m)	
60	S6I06GA-V12 S6I06GA-V12CE	SUA06IA-V12	4	6	1 ϕ 110	60	Cont.	90-1700	0.55	0.055	0.40	0.040	0.52	0.052	2.5
	S6I06GB-V12 S6I06GB-V12CE	SUA06IB-V12	4	6	1 ϕ 220	60	Cont.	90-1700	0.55	0.055	0.40	0.040	0.52	0.052	0.7
	S6I06GC-V12 S6I06GC-V12CE	SUA06IC-V12	4	6	1 ϕ 100	50	Cont.	90-1400	0.48	0.048	0.30	0.030	0.40	0.040	2.5
	60					90-1700									
	S6I06GD-V12 S6I06GD-V12CE	SUA06ID-V12	4	6	1 ϕ 200	50	Cont.	90-1400	0.48	0.048	0.30	0.030	0.40	0.040	0.7
	60					90-1700									
	S6I06GX-V12 S6I06GX-V12CE	SUA06IX-V12	4	6	1 ϕ 220	50	Cont.	90-1400	0.35	0.035	0.22	0.022	0.35	0.035	0.7
	1 ϕ 240				0.45				0.045	0.22	0.022	0.42	0.042		

- ❖ CE marked at the end of motor model name indicates that it is impedance protected type which has received CE.
- ❖ "L" or "H" type does not apply to motors under 40W.

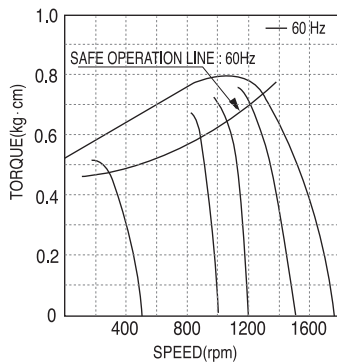
50Hz

MODEL	GEAR RATIO	rpm																								
		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	250
S6DA□B	kg-cm	1.3	1.5	2.1	2.6	3.2	3.9	4.3	5.4	6.4	7.7	7.7	9.7	11.6	13.9	15.5	17.5	21.0	26.2	30.0	30.0	30.0	30.0	30.0	30.0	30.0
	N·m	0.127	0.147	0.206	0.255	0.314	0.382	0.421	0.529	0.627	0.755	0.755	0.951	1.137	1.362	1.519	1.715	2.058	2.568	2.942	2.942	2.942	2.942	2.942	2.942	2.942

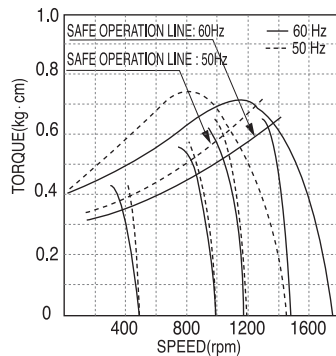
60Hz

MODEL	GEAR RATIO	rpm																								
		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	250
S6DA□B	kg-cm	1.0	1.3	1.7	2.1	2.6	3.1	3.5	4.4	5.2	6.3	6.3	7.8	9.4	11.3	12.6	14.2	17.0	21.3	25.5	28.4	30.0	30.0	30.0	30.0	30.0
	N·m	0.098	0.127	0.167	0.206	0.255	0.304	0.343	0.431	0.510	0.617	0.617	0.764	0.921	1.107	1.235	1.392	1.666	2.087	2.499	2.783	2.942	2.942	2.942	2.942	2.942

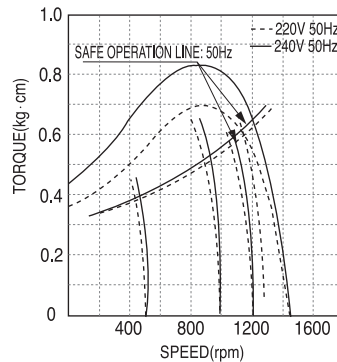
- ❖ The value in □ of gearhead model is for gear ratio.
- ❖ This is permissible torque of the assembled motor and gearhead.
- ❖ The permissible torque of the motor and inter-decimal gearhead is 30 kg-cm.
- ❖ ■ color indicates that the output shaft of the geared motor rotates in the same direction as the output shaft of the motor. Others indicate rotation in the opposite direction.
- ❖ Rpm is based on synchronous speed (50Hz: 1500rpm, 60Hz: 1800rpm) divided by gear ratio. The actual rotation speed can be 2~20% less than displayed value depending on the load.
- ❖ "L" or "H" type does not apply to motors under 40W.



▲ S6I06GA-V12, S6I06GB-V12
S6I06GA-V12CE, S6I06GB-V12CE



▲ S6I06GC-V12, S6I06GD-V12
S6I06GC-V12CE, S6I06GD-V12CE

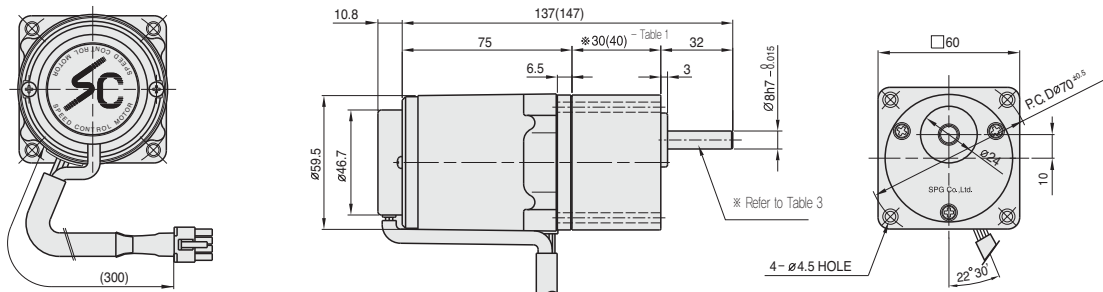


▲ S6I06GX-V12
S6I06GX-V12CE

DIMENSIONS

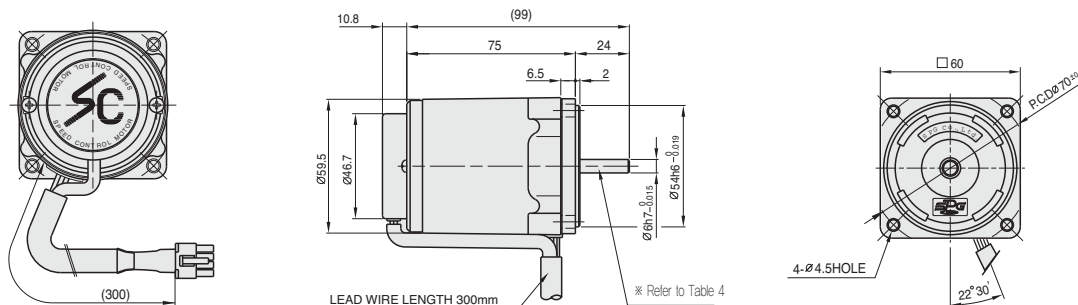
+ GEARED MOTOR

- ≒ MOTOR MODEL : S6I06G□-V12
- ≒ HEAD MODEL : S6□A3□~S6□A250□



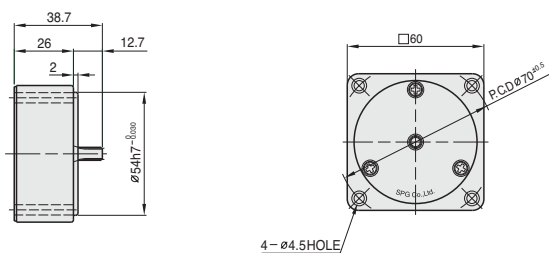
+ MOTOR

- ≒ MOTOR MODEL : S6I06□□-V12

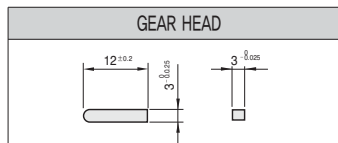


+ INTER-DECIMAL GEAR HEAD

- ≒ MODEL : S6GX10B



+ KEY SPEC



+ ※30(40) - (Table1)

GEAR RATIO	SIZE(mm)
S6□A3□ ~ S6□A18□	30
S6□A20□ ~ S6□A250□	40

+ WEIGHT - (Table2)

PART	WEIGHT(kg)	
MOTOR	0.76	
DECIMAL GEAR HEAD	0.18	
GEAR HEAD	S6□A3□ ~ S6□A18□	0.24
	S6□A20□ ~ S6□A40□	0.30
	S6□A50□ ~ S6□A250□	0.33

+ SPEC for output shaft of gearhead - (Table3)

MODEL	TYPES OF OUTPUT SHAFT
S6SA3□ ~ S6SA250□	STRAIGHT TYPE
	D-CUT TYPE
S6DA3□ ~ S6DA250□	KEY TYPE
	S6KA3□ ~ S6KA250□

+ SPEC for output shaft of motor - (Table4)

MODEL	TYPES OF OUTPUT SHAFT
S6I06G□-V12	GEAR TYPE
	STRAIGHT TYPE
S6I06S□-V12	D-CUT TYPE
	S6I06D□-V12