

PRODUCT OVERVIEW

The SS6849H is a 2-channel H-bridge driver chip. The best motor drive for 12V system products. The chip can provide a maximum peak current of 1A and root mean square current of 0.7A per H-bridge (under proper cooling conditions of 12V and $T_a = 25^\circ \text{C}$), and can drive two DC motors, a parallel DC motor, or a stepper motor drive that supports full or half step.

SS6849H internal protection turn-off function includes over-current protection, short circuit protection, under-voltage lock protection and over-temperature protection.

The SS6849H is packaged with SSOP10, small size, and lead-free product, and the pin frame is 100% Wuxi plating.

APPLICATIONS

- Refrigerator
- POS printer, label printer
- PoE point-of-sale terminals
- Clothes dryer
- Vacuum cleaner
- Stage lights

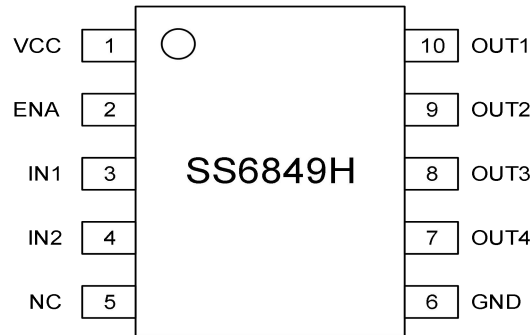
FEATURES

- $V_{CC\ max} = 20V$, $I_{o\ max} = 1A$
- 4V to 16V operating supply voltage range
- No control system 3.3V power supply is required
- N+P MOS output, $R_{on} < 1\Omega$ typ (HS+LS)
- Compact package (SSOP10)
- Zero current consumption on standby
- Can be used in parallel (parallel drive channels)
- Built-in braking function

PRODUCT INFORMATION

Product model number	Package form	Remarks
SS6849H-SS-TP	SSOP10	

PIN CONFIGURATION AND FUNCTIONALITY



PIN LIST

Pin names	Pin serial number	Pin description	External component or connection description
Power supply and ground			
VCC	1	Power supply	External 0.1uF high frequency capacitor and 47uF electrolytic capacitor
GND	6	Chip-wise	The logic and power of the chip
Control			
ENA	2	Motor drive control Enable pin	When the ENA input is low, the chip is in standby mode and the chip current can be changed to 0. When the ENA input is pulled from low to high power level, the device switches from standby state to the specified output operation mode. For digital inputs, the low level ranges from 0 to 0.4(V) and the high level ranges from 1.5 to 5.5(V). PWM can be entered. Pin built-in pull-down resistance 100k Ω .
IN1	3	Motor drive control input pin	Drive control input pins for OUT1 (PIN10) and OUT2 (PIN9). PWM can be entered. Built-in pull-down 100k Ω resistor.
IN2	4	Motor drive control input pin	Drive control input pins for OUT3 (PIN8) and OUT4 (PIN7). PWM can be entered. Built-in pull-down 100k Ω resistor.
NC	5		
Output			
OUT4	7	OUT4 Drive the output pin	The motor coil is connected between this pin and the OUT3 (PIN8).
OUT3	8	OUT3 Drive the output pin	The motor coil is connected between this pin and the OUT4 (PIN7).
OUT2	9	OUT2 Drive the output pin	The motor coil is connected between this pin and the OUT1 (PIN10).
OUT2	10	OUT1 Drive the output pin	The motor coil is connected between this pin and OUT2 (PIN9).