# DESCRIPTION

The PT2474 is a dual channel H-bridge motor driver that operates on wide supply voltage range from 4V to 16V. The control logic pins have built-in phase generator function; it could drive a four-wire bipolar stepping motor with only 2 input pins. The input waveform is generates by the external MCU and phase relation between two input pins is a standard full-step excitation.

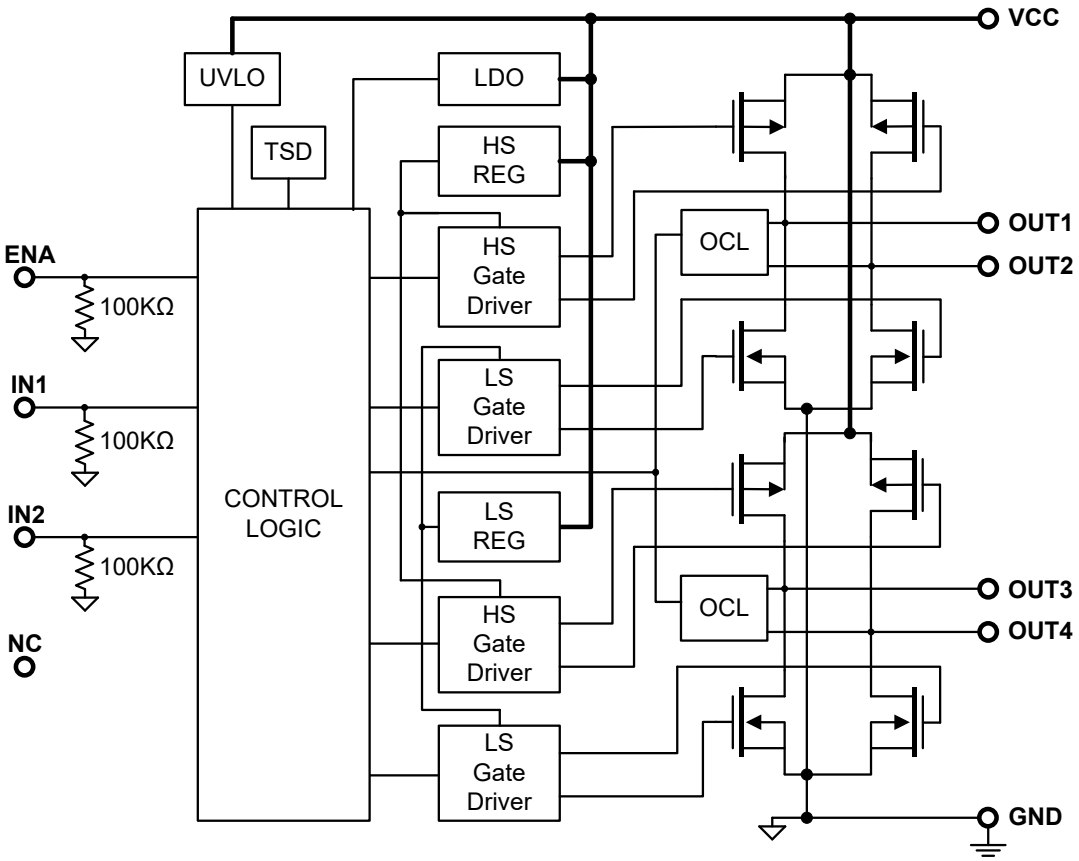
# APPLICATIONS

- Airflow flap control for refrigerators.
- Air Conditioner venting control
- Home appliance
- Office automation machines

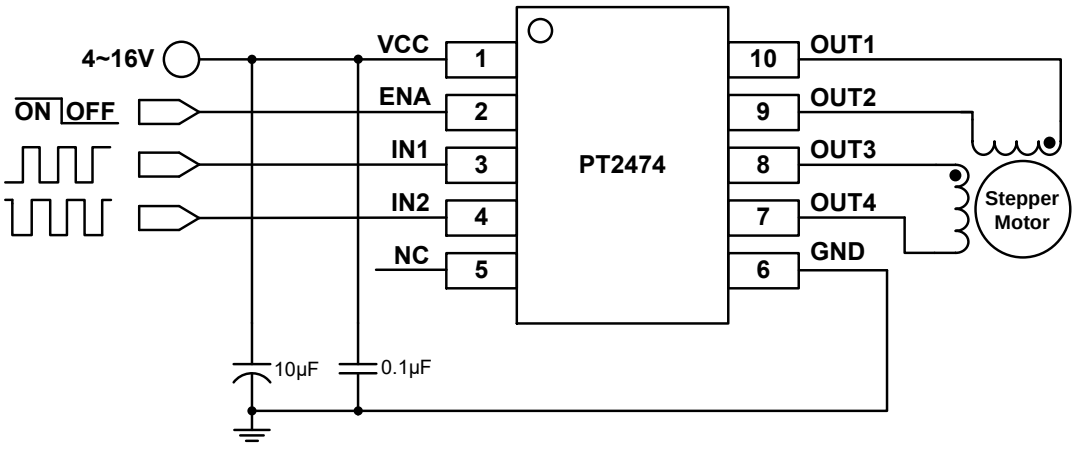
# FEATURES

- Wide Supply Voltage Range: 4V to 16V
- Single voltage supply with built-in regulator; control logic supply is not necessary.
- Dual H-bridge Drivers for a bipolar stepping motor
- MOSFET RDS(on) Resistance, HS + LS =1.2Ω
- Maximum Output Current: 1.0 Amp (Peak), 700mA (RMS).
- Low Power Sleep mode
- Built-in Protection Circuits with Thermal Shutdown (TSD), Under Voltage Lock-Out (UVLO)
- Output current limiting (OCL) during output terminal shorted to GND.
- 10Pins Small Outline Package (SOP), Pitch=1.0mm.

# BLOCK DIAGRAM



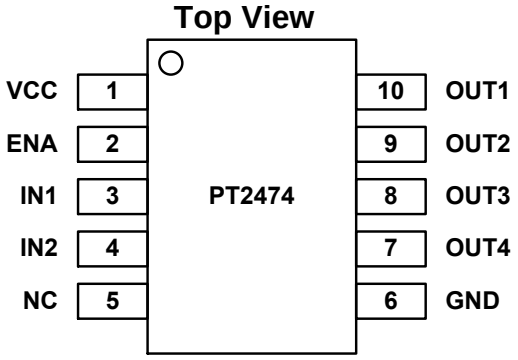
# APPLICATION CIRCUIT




# ORDER INFORMATION

| Valid Part Number | Package Type | Top Code |
|---|---|---|
| PT2474-S | 10Pins, SOP | PT2474-S |

# PIN CONFIGURATION




# PIN DESCRIPTION

| Pin Name | I/O | Description | Pin No. |
|---|---|---|---|
| VCC | Power | Power input pin, the operation voltage is from 4V to 16V. Connects a 0.1μF bypass capacitor between VCC and GND pin and add at least 10μF capacitor in the power line. | 1 |
| ENA | I | Chip Enable control input, Logic H=enable, logic L=stand-by. | 2 |
| IN1 | I | Control input pin 1 for H-bridge driver 1, built-in a 100KΩ pull-down resistor. | 3 |
| IN2 | I | Control input pin 2 for H-bridge driver 1, built-in a 100KΩ pull-down resistor. | 4 |
| NC | -- | No connect. Do not connects this pin to any circuit. | 5 |
| GND | Power | Ground pin | 6 |
| OUT4 | O | OUT4 of H-bridge driver 2 | 7 |
| OUT3 | O | OUT3 of H-bridge driver 2 | 8 |
| OUT2 | O | OUT2 of H-bridge driver 1 | 9 |
| OUT1 | O | OUT1 of H-bridge driver 1 | 10 |