600V Half-Bridge Pre-Driver

Description

The BP6904A is a high voltage, high speed half-bridge pre-driver for power MOSFET and IGBT. It has one input for high side and low side, and two output channels with internal dead time to avoid cross-conduction.

The input logic level is compatible with 3.3V/5V/15V signal. The floating high side channel can drive a N-channel power MOSFET or IGBT up to 600V.

Features

- Floating channel operation up to 600V
- Single input for high side and low side
- Shut down input turns off both channels
- Robust at negative transient voltage
- Gate drive supply range from 10V to 20V
- 3.3V, 5V and 15V input logic compatible
- UVLO for both high side and low side
- Built-in dead time
- Available in SOP8 package

Typical Application

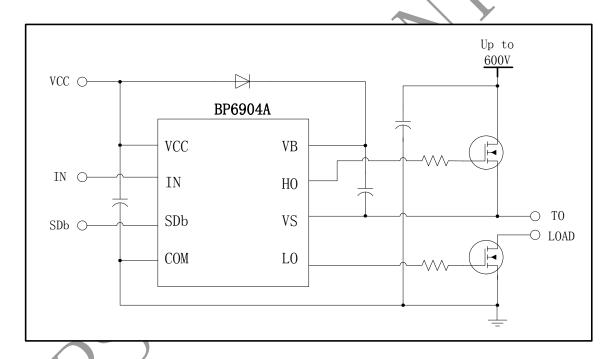


Figure 1. Typical application circuit

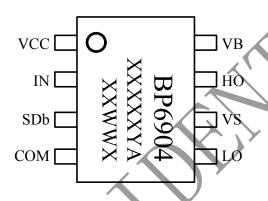
BP6904A

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Ordering Information

Part Number	Package	Operation Temperature	Package Method	Marking
BP6904A	SOP8	-40 °C to 105 °C	Tape	BP6904 XXXXXYA XXWWX
			4,000 Piece/Roll	

Pin Configuration and Marking Information



XXXXXYA: lot code XX: Fab code WW: Week X: Special code

Figure 2. Pin configuration

Pin Definition

Pin No.	Name	Description	
1	VCC	Low side and logic supply voltage	
2	IN	Logic input for high side and low side, in phase with HO	
3	SDb	Logic input for shut down	
4	СОМ	Logic ground and low side driver return	
5	LO	Low side driver output	
6	VS	High side driver return	
7	НО	High side driver output	
8	VB	High side floating supply	



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