

**Optocoupler Drive Push-Pull 1-CH 30V 1500V 8-Pin SO Tube**

Images are for reference only

[Inquiry](#)**Manufacturer:** [Broadcom Corporation](#)**Package/Case:** SOP-8**Product Type:** Optoelectronics**RoHS:** RoHS Compliant/Lead free **Lifecycle:** Active**General Description**

The ACPL-K342/ACPL-H342 contains an AlGaAs LED, which is optically coupled to an integrated circuit with a power output stage. This optocoupler is ideally suited for driving power IGBTs and MOSFETs used in motor control inverter applications. The high operating voltage range of the output stage provides the drive voltages required by gate controlled devices. The voltage and high peak output current supplied by this optocoupler make it ideally suited for direct driving IGBT with gate drives rated up to 1200V/150A. For IGBTs with higher ratings, the ACPL-H342/ACPL-K342 can be used to drive a discrete power stage which drives the IGBT gate. The ACPL-H342 and ACPL-K342 have the highest insulation voltage of  $V_{IORM} = 891V_{peak}$  and  $1140V_{peak}$  respectively in the IEC/ EN/DIN EN 60747-5-5.

## Key Features

2.5 A Maximum Peak Output Current

2.0A Minimum Peak Output Current

Built-in Active Miller Clamp

Rail-to-Rail Output Voltage

Fast Propagation Delay to minimize Dead Time

tPHL < tPLH to provide “Anti-Cross” Conduction

LED input threshold current hysteresis

ICC = 2.5 mA Maximum Supply Current to allow bootstrap power supply

Under Voltage Lock-Out Protection (UVLO) with Hysteresis

40 kV/μs Minimum Common Mode Rejection (CMR) at VCM = 1500 V

Wide Operating VCC Range: 15 to 30 Volts

Industrial Temperature Range: -40°C to 105°C

Safety Approval:

UL Recognized 3750/5000 VRMS for 1min.

CSA

IEC/EN/DIN EN 60747-5-5 VIORM = 891/1140 Vpeak

Options available are:060 = IEC/EN/DIN EN 60747-5-2, VIORM = 630 VPEAK500 = Tape and Reel Packaging OptionXXXE = Lead Free Option

## Application

IGBT/MOSFET gate drive

AC/Brushless DC motor drives

Industrial inverters

Switching Power Supplies (SPS)

## Recommended For You

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### ACPL-P314-000E

Broadcom Corporation

SOP6

### ACPL-P343-000E

Broadcom Corporation

SOP6

### ACPL-K342-000E

Broadcom Corporation

DIPSOP

### ACNW3190-300E

Broadcom Corporation

DIPSOP8

### ACNV3130-500E

Broadcom Corporation

SOP-10

### ACPL-W302-000E

Broadcom Corporation

SOP6

### ACPL-W314-000E

Broadcom Corporation

SOP6

### ACPL-P340-000E

Broadcom Corporation

SOP6

### ACPL-H312-000E

Broadcom Corporation

DIPSOP

**ACPL-W340-000E**

Broadcom Corporation

SOP6

**ACPL-T350-300E**

Broadcom Corporation

SOP8

**HCNW3120-500E**

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