mail

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832 Email & Skype: info@chipsmall.com Web: www.chipsmall.com Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



ON Semiconductor[®]



40WLEDBULBGEVB: Dimmable 120 Vac, 6.5 W Input Parallel-to-Series Lighting Circuit Evaluation Board

The 40WLEDBULBGEVB showcases an enhanced parallel-to-series LED lighting circuit. It uses updated control circuitry that allows the ability to accommodate multiple LED voltages by simply adjusting a single resistor (R3) as well as



compensating for drift in LED voltage with temperature. It also has superb PF, THD performance, dimmability, and efficiency at a low cost.

ON Semiconductor's parallel-to-series topology dynamically adjusts LED load voltage as the instantaneous bridge output voltage varies. While a switch-mode power supply (a buck converter) reconfigures the input voltage to match the load, this circuit reconfigures the load to match the input voltage. When the instantaneous input voltage is relatively low, the LEDs are configured in parallel. When the instantaneous input voltage is relatively high, the LEDs are configured in series.

The circuit is designed for input voltages between 100 Vac and 140 Vac. ON Semiconductor CCRs are used to provide constant LED current and to protect LEDs from over-voltage conditions. The circuit employs an additional CCR (shown as CCR2) to increase LED current at high voltages for improved PF and THD performance.

Evaluation/Development Tool Information				
Product	Status	Compliance	Short Description	Parts Used
40WLEDBULBGEVB	Active		Dimmable 120 Vac, 6.5 W Input Parallel-to-Series Lighting Circuit Evaluation Board	NSIC2020JBT3G , NSIC2030JBT3G

http://www.onsemi.com/PowerSolutions/evalBoard.do?id=40WLEDBULBGEVB 5-11-17