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Declaration under Rule 4.17:

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[Continued on next page]

(54) Title: POWER CONTROLLER HAVING CURRENT LIMITED RMS VOLTAGE REGULATED OUTPUT

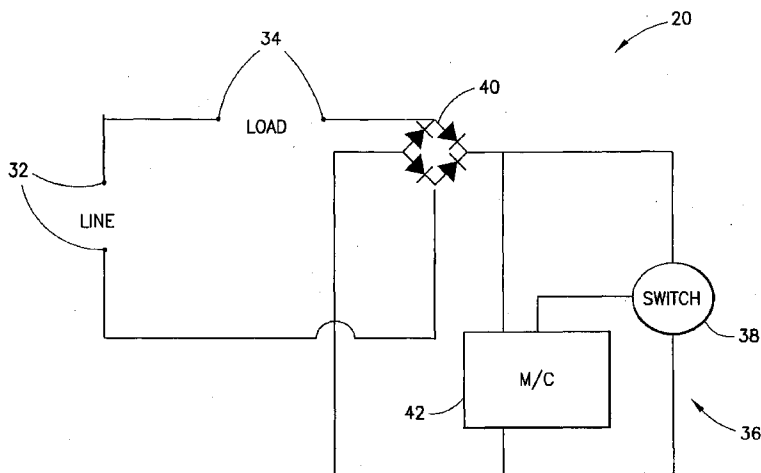


FIG. 12

(57) Abstract: A power controller converts a line voltage to an RMS load voltage for a lamp, and includes a switch and a microcontroller that operates the switch to define the RMS load voltage. The microcontroller senses a load voltage of the lamp, compares the sensed load voltage to a reference RMS voltage, and operates the switch in response to the comparison so that the RMS load voltage is substantially constant at the reference RMS voltage over an operating range of the line voltage and so that the RMS load voltage decreases with decreasing line voltage at line voltages less than the operating range. The operating range of the line voltage is defined to have a minimum that is a non-zero line voltage at which a load current is a predetermined maximum. The voltage conversion circuit may be a phase clipping circuit or a pulse width modulation circuit.

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B. FIELDS SEARCHED Minimum documentation searched (classification system followed by classification symbols) IPC(8) - H05B 39/04, 39/06, 41/392 (2008.01) USPC - 315/291, 307, 308, DIG.4; 323/299, 300, 303; 307/157 Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched Electronic data base consulted during the international search (name of data base and, where practicable, search terms used) USPTO EAST System (US, USPG-PUB, USOCR), MicroPatent, PatBase, GooglePatent		
C. DOCUMENTS CONSIDERED TO BE RELEVANT		
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 7,053,562 B2 (WEYHRAUCH et al) 30 May 2006 (30.05.2006) entire document	1-10
A	US 7,049,750 B1 (WEYHRAUCH et al) 23 May 2006 (23.05.2006) entire document	1-10
A	US 5,994,844 A (CRAWFORD et al) 30 November 1999 (30.11.1999) entire document	1-10
A	US 4,547,704 A (BRINN et al) 15 October 1985 (15.10.1985) entire document	1-10
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