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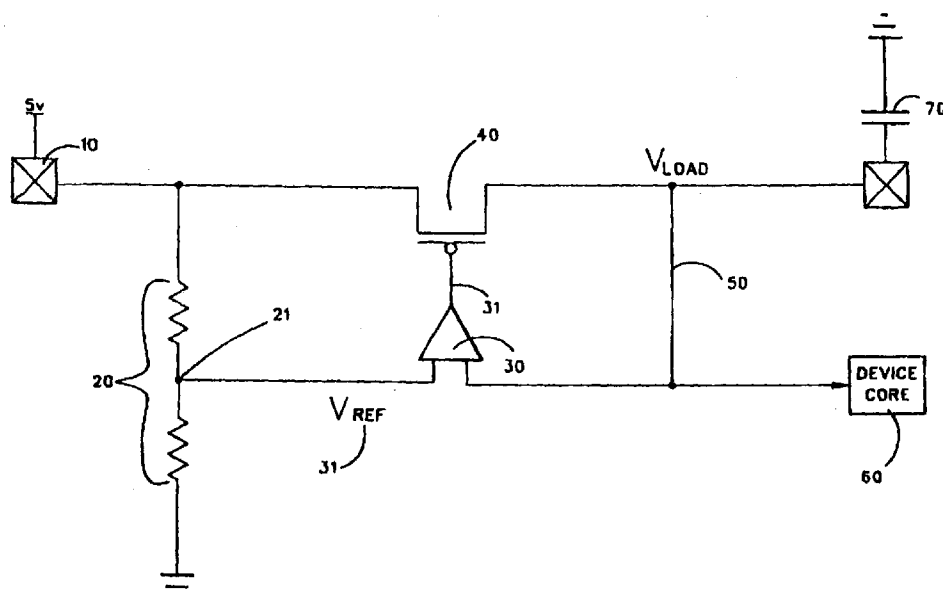
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(54) CMOS on-board voltage regulator

(57) A voltage regulator for regulating the voltage at a predetermined node connected to the core of a semiconductor device comprising reference voltage means for generating a reference voltage, an op-amp having said reference voltage as its reference input and the

voltage at said predetermined node as its another input for adjusting the node voltage to match said reference voltage, series dropping means for supplying current load to the core, and filter capacitor coupled to said series dropping means for supplying transient current to said predetermined node.

**FIG. 1****EP 0 651 309 A3**



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EUROPEAN SEARCH REPORT

Application Number
EP 94 11 4202

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.6)
X	US 5 132 555 A (TAKAHASHI TOSHIRO) 21 July 1992 * column 2, line 40 - line 51 * * column 8, line 42 - column 10, line 41; figure 5 *	1-5,8	G05F1/46 G05F1/56
Y	* column 9, line 7 - line 13 * ---	6,7	
X	EP 0 539 593 A (FUJITSU LTD) 5 May 1993 * column 3, line 12 - column 5, line 39; figures 1,2 *	1-5,8	
A	* column 5, line 13 - line 39 * ---	6,7	
X	US 5 083 043 A (YOSHIDA MAKOTO) 21 January 1992 * the whole document *	1-5,8	
A	---	6,7	
A	US 4 806 844 A (CLAYDON GLENN S ET AL) 21 February 1989 * column 1, line 63 - column 2, line 3; figure 1 * * column 2, line 18 - line 24 *	6,7	TECHNICAL FIELDS SEARCHED (Int.Cl.6)
Y	US 5 168 209 A (THIEL V FRANK L) 1 December 1992 * column 5, line 43 - line 48; figures 1,2 * -----	6,7	G05F
The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 6 May 1997	Examiner Lampe, S
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			

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