

Title (en)

Reference DC voltage generating apparatus

Title (de)

Vorrichtung zur Erzeugung einer Referenzgleichspannung

Title (fr)

Dispositif de génération d'une tension continue de référence

Publication

EP 0923014 B1 20030709 (FR)

Application

EP 98403068 A 19981207

Priority

FR 9715626 A 19971210

Abstract (en)

[origin: EP0923014A1] The device has an input stage (10) forming a first potentiometer divider having a first branch (101) connected to a supply and a second branch (102) connected to earth. These two branches have an asymmetric response to variations in the ambient and/or operating temperature. The variations in operating temperature are linked to the quality of the fabrication method of the device. The first input stage (10) inputs a first continuous voltage (NGBP) to an intermediate stage (11) forming a resistive/capacitive filter; this suppresses the dynamic component of the voltage (NGBP), and outputs a second continuous voltage (NARF). An output stage (12) forms a second potentiometer divider (121) connected to the supply and with a second branch (122) connected to earth. These two connections (121, 122) have an asymmetric response similar to the connections (101,102) of the first divider. The relative voltage variations of this second divider as a function of ambient and/or operating temperature are much less than that of the first divider, and depend upon the fabrication quality. The output stage provides a third continuous voltage (NREF), whose variations as a function of ambient and operating temperature are linked to the fabrication quality and are inverted with respect to those of the second voltage (NARF). The variations of the second voltage (NARF) are thus compensated.

IPC 1-7

G05F 1/46

IPC 8 full level

G05F 1/46 (2006.01); **G05F 3/24** (2006.01)

CPC (source: EP US)

G05F 1/465 (2013.01 - EP US); **G05F 3/247** (2013.01 - EP US)

Designated contracting state (EPC)

DE GB IT NL SE

DOCDB simple family (publication)

EP 0923014 A1 19990616; EP 0923014 B1 20030709; DE 69816249 D1 20030814; DE 69816249 T2 20040415; FR 2772155 A1 19990611; FR 2772155 B1 20000211; US 5998983 A 19991207

DOCDB simple family (application)

EP 98403068 A 19981207; DE 69816249 T 19981207; FR 9715626 A 19971210; US 20761498 A 19981209