

Title (en)

POWER SEMICONDUCTOR DEVICE WITH INTERCONNECTED GATE TRENCHES

Title (de)

STROMHALBLEITERVORRICHTUNG MIT VERBUNDENEN GATE-GRÄBEN

Title (fr)

DISPOSITIF SEMI-CONDUCTEUR DE PUISSANCE COMPRENANT DES TRANCHEES DE GRILLE INTERCONNECTEES

Publication

EP 1917683 A4 20081105 (EN)

Application

EP 06801678 A 20060816

Priority

- US 2006032060 W 20060816
- US 70902005 P 20050817
- US 50474006 A 20060815

Abstract (en)

[origin: WO2007022316A2] A power semiconductor device which includes a plurality of gate trenches and a perimeter trench intersecting the gate trenches.

IPC 8 full level

H01L 29/78 (2006.01); **H01L 29/423** (2006.01); **H01L 29/40** (2006.01); **H01L 29/417** (2006.01); **H01L 29/739** (2006.01)

CPC (source: EP US)

H01L 29/4238 (2013.01 - EP); **H01L 29/7811** (2013.01 - EP US); **H01L 29/7813** (2013.01 - EP US); **H01L 29/407** (2013.01 - EP); **H01L 29/41766** (2013.01 - EP); **H01L 29/4236** (2013.01 - EP); **H01L 29/42368** (2013.01 - EP); **H01L 29/42372** (2013.01 - EP); **H01L 29/7397** (2013.01 - EP)

Citation (search report)

- [X] EP 1351313 A2 20031008 - SILICONIX INC [US]
- [X] WO 0042665 A1 20000720 - FRAUNHOFER GES FORSCHUNG [DE], et al
- [A] JP H01192174 A 19890802 - HITACHI LTD
- [A] US 6309929 B1 20011030 - HSU CHIH-WEI [TW], et al
- See references of WO 2007022316A2

Citation (examination)

- JP H10214968 A 19980811 - HITACHI LTD, et al
- US 2004173844 A1 20040909 - WILLIAMS RICHARD K [US], et al

Designated contracting state (EPC)

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