

Title (en)  
ELECTRON EMITTING SEMICONDUCTOR DEVICE

Publication  
**EP 0416626 A3 19910529 (EN)**

Application  
**EP 90117200 A 19900906**

Priority  
• JP 22171390 A 19900822  
• JP 23394389 A 19890907  
• JP 23394589 A 19890907

Abstract (en)  
[origin: EP0416626A2] An electron emitting semiconductor device comprises a P-semiconductor layer (14) formed on a semiconductive substrate (11); a Schottky barrier electrode (16) formed on the P-semiconductor layer; plural P<+>-area units (15) positioned under and facing to the Schottky barrier electrode; and an N<+>-area (13) in the vicinity of said P<+>-area units.

IPC 1-7  
**H01J 1/30; H01J 9/02**

IPC 8 full level  
**H01J 1/308** (2006.01)

CPC (source: EP)  
**H01J 1/308** (2013.01)

Citation (search report)  
• [A] EP 0331373 A2 19890906 - CANON KK [JP]  
• [A] US 4766340 A 19880823 - VAN DER MAST KAREL D [NL], et al

Cited by  
EP0481419A3; US5414272A; WO2021233501A3

Designated contracting state (EPC)  
DE FR GB

DOCDB simple family (publication)  
**EP 0416626 A2 19910313; EP 0416626 A3 19910529; EP 0416626 B1 19940601**; DE 69009357 D1 19940707; DE 69009357 T2 19941006

DOCDB simple family (application)  
**EP 90117200 A 19900906**; DE 69009357 T 19900906