

Title (en)  
High-pressure discharge lamp

Title (de)  
Hochdruckentladungslampe

Title (fr)  
Lampe à décharge à haute pression

Publication  
**EP 1722399 A3 20080611 (DE)**

Application  
**EP 06001319 A 20060123**

Priority  
GB 0504548 A 20050304

Abstract (en)  
[origin: GB2423862A] A high-pressure discharge lamp comprising a pressure chamber having two opposite ends and defined by a cylindrical envelope (1) made of glass, wherein an anode(3) and a cathode (4) are provided at respective ends of the tube. These electrodes projects into the pressure chamber, and a discharge chamber is defined between them. The two end regions of the pressure chamber are designed differently at least outside the discharge chamber. The differences of the regions being smaller flow resistance at the anode, the spacial position of the electrodes in the envelope, and axial and radial bores in the anode. The differences in the end regions create asymmetric flow conditions in the discharge chamber which reduces devitrification of the glass which makes up the pressure chamber and prolongs the life of the high-pressure discharge lamp. This is especially applicable in high-pressure discharge lamps used as flash lights.

IPC 8 full level  
**H01J 61/073** (2006.01); **H01J 61/30** (2006.01); **H01J 61/36** (2006.01); **H01J 61/82** (2006.01); **H01J 61/90** (2006.01)

CPC (source: EP US)  
**H01J 61/0732** (2013.01 - EP US); **H01J 61/30** (2013.01 - EP US); **H01J 61/366** (2013.01 - EP US); **H01J 61/90** (2013.01 - EP US)

Citation (search report)  
• [XY] US 6531832 B1 20030311 - HIRATA SHINJI [JP], et al  
• [X] DE 3009733 A1 19810115 - USHIO ELECTRIC INC  
• [X] JP H08124521 A 19960517 - FUJI ELECTRIC CO LTD  
• [X] US 2004169476 A1 20040902 - EHRLICHMANN DIETMAR [DE], et al  
• [X] GB 2199693 A 19880713 - NOBLELIGHT LTD  
• [X] US 3474278 A 19691021 - THOURET WOLFGANG E, et al  
• [Y] SU 1356038 A1 19871130 - DILOYAN ARIK A [SU]

Designated contracting state (EPC)  
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)  
AL BA HR MK YU

DOCDB simple family (publication)  
**GB 0504548 D0 20050413**; **GB 2423862 A 20060906**; EP 1722399 A2 20061115; EP 1722399 A3 20080611; JP 2006245004 A 20060914; US 2006202604 A1 20060914; US 7489078 B2 20090210

DOCDB simple family (application)  
**GB 0504548 A 20050304**; EP 06001319 A 20060123; JP 2006057964 A 20060303; US 36679106 A 20060302