

Title (en)

Compact source of a high-brightness X-ray beam

Title (de)

Kompakte Quelle für Röntgenstrahlenbündel sehr großer Helligkeit

Title (fr)

Source compacte à faisceau de rayons X de très grande brillance

Publication

EP 1804271 B1 20100317 (FR)

Application

EP 06127095 A 20061222

Priority

FR 0650007 A 20060103

Abstract (en)

[origin: EP1804271A2] The device has two cooling elements (8, 9) fixed to a vacuum pump stator (1b) or a sealed peripheral casing (1f) opposite to one of two main radial faces (2b, 2c) of a rotary anode (2) for absorbing radiated heat energy emitted by the anode during operation. The rotary anode is provided in a vacuum enclosure (7), driven in rotation around a rotation axis and integrated to a rotor (1a) of a vacuum pump (1). The anode receives, on its periphery (2a), electron flow (4) from a cathode (3) to emit X-rays (6) towards an outlet (11).

IPC 8 full level

H01J 35/10 (2006.01); **H01J 35/14** (2006.01); **H01J 35/26** (2006.01)

CPC (source: EP KR US)

F04D 19/042 (2013.01 - EP KR US); **H01J 35/103** (2013.01 - EP KR US); **H01J 35/106** (2013.01 - EP KR US); **H01J 35/14** (2013.01 - EP US); **H01J 35/147** (2019.04 - KR); **H01J 35/20** (2013.01 - EP KR US); **H01J 35/26** (2013.01 - EP KR US); **H05G 1/02** (2013.01 - KR)

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

DOCDB simple family (publication)

EP 1804271 A2 20070704; EP 1804271 A3 20071017; EP 1804271 B1 20100317; AT E461523 T1 20100415; CN 101026077 A 20070829; CN 101026077 B 20101110; DE 602006012924 D1 20100429; FR 2895831 A1 20070706; FR 2895831 B1 20090612; IL 180440 A0 20070603; IL 180440 A 20111229; JP 2007184277 A 20070719; KR 20070073605 A 20070710; TW 200802488 A 20080101; US 2007153978 A1 20070705; US 7515687 B2 20090407

DOCDB simple family (application)

EP 06127095 A 20061222; AT 06127095 T 20061222; CN 200710092325 A 20070104; DE 602006012924 T 20061222; FR 0650007 A 20060103; IL 18044006 A 20061228; JP 2006354766 A 20061228; KR 20070000033 A 20070102; TW 95149038 A 20061226; US 61831506 A 20061229