

Title (en)

OPTICS FOR GENERATION OF HIGH CURRENT DENSITY PATTERNED CHARGED PARTICLE BEAMS

Title (de)

OPTIK ZUR ERZEUGUNG VON STRUKTURIERTEN STRAHLEN GELADENER TEILCHEN MIT HOHER STROMDICHTHE

Title (fr)

OPTIQUE POUR LA GENERATION DE FAISCEAUX DE FORME DONNEE A PARTICULES CHARGEES PRESENTANT UNE DENSITE DE COURANT ELEVEE

Publication

EP 2005460 A1 20081224 (EN)

Application

EP 06758214 A 20060327

Priority

US 2006011303 W 20060327

Abstract (en)

[origin: WO2007111603A1] A charged particle beam lithography system and/or method, which comprises a patterned beam defining aperture (212) for generating a high current density shaped beams (222) without the need for multiple beam shaping apertures, lenses (205, 216) for focusing charged particle beams (222) on a wafer (221), and blanking deflectors (277, 278) for deflecting the charged particle beams (222) without the need for an intermediate crossover between an electron source (201) and the wafer (221).

IPC 8 full level

H01J 37/302 (2006.01)

CPC (source: EP)

B82Y 10/00 (2013.01); **B82Y 40/00** (2013.01); **H01J 37/3174** (2013.01); **H01J 2237/043** (2013.01); **H01J 2237/045** (2013.01); **H01J 2237/049** (2013.01); **H01J 2237/10** (2013.01); **H01J 2237/30472** (2013.01); **H01J 2237/30477** (2013.01); **H01J 2237/31754** (2013.01); **H01J 2237/31761** (2013.01); **H01J 2237/31776** (2013.01); **H01J 2237/31793** (2013.01)

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)

WO 2007111603 A1 20071004; CN 101443877 A 20090527; EP 2005460 A1 20081224; EP 2005460 A4 20101124; JP 2009531855 A 20090903

DOCDB simple family (application)

US 2006011303 W 20060327; CN 200680054644 A 20060327; EP 06758214 A 20060327; JP 2009502733 A 20060327