

(19) World Intellectual Property  
Organization  
International Bureau



(43) International Publication Date  
14 October 2004 (14.10.2004)

PCT

(10) International Publication Number  
WO 2004/088710 A3

(51) International Patent Classification<sup>7</sup>: H01J 37/32

(21) International Application Number:  
PCT/DK2004/000240

(22) International Filing Date: 2 April 2004 (02.04.2004)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:  
PA 2003 00504 2 April 2003 (02.04.2003) DK

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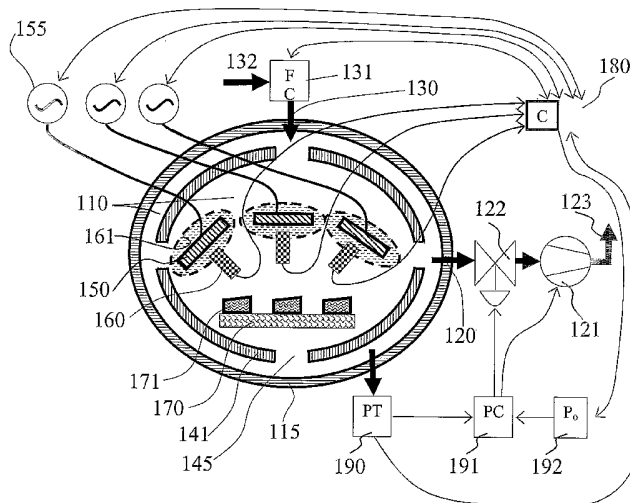
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(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK,

[Continued on next page]

(54) Title: METHOD AND APPARATUS FOR GAS PLASMA TREATMENT WITH CONTROLLED EXTENT OF GAS PLASMA, AND USE THEREOF



(57) Abstract: A method of controlling the extent of gas plasma, the method comprising: (A) providing a gas zone (110), said gas zone comprising a gas having a pressure; said gas comprising at least one gas component allowing generation of a plasma; (B) generating a plasma in said gas zone by supplying a potential difference between at least two electrodes (150); said at least two electrodes being configured to wholly or partly encompass said gas zone; and (C) controlling the extent of said generated plasma by controlling at least one of: said gas, said pressure, said potential difference, and said configuration of said at least two electrodes; a plasma treatment apparatus comprising at least one plasma measuring means (160) for measuring the extent of the plasma, and at least one controlling means (180, 191, 131) for controlling the extent of the plasma; and use of the method and apparatus in plasma treatment and/or plasma-assisted surface modification of electrodes and/or substrates.

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TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

*For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.*

**Published:**

- *with international search report*
- *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments*

**(88) Date of publication of the international search report:**

8 December 2005

# INTERNATIONAL SEARCH REPORT

Internatic	plication No
PCT/DK2004/000240	

**A. CLASSIFICATION OF SUBJECT MATTER**  
 IPC 7 H01J37/32

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 H01J

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, WPI Data, PAJ

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X Y	US 5 997 686 A (LARDON MARCEL ET AL) 7 December 1999 (1999-12-07) abstract  column 4, line 40 - column 5, line 32; figures	1,10,11  2-6, 21-26, 31,32, 36-38, 59-61
X A	EP 1 164 206 A (AGILENT TECHNOLOGIES INC) 19 December 2001 (2001-12-19) paragraph '0040!; figures	1,7-11, 20 21,28, 29,32, 36,42, 48,59
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Patent family members are listed in annex.

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Date of the actual completion of the international search

5 October 2005

Date of mailing of the international search report

03/11/2005

Name and mailing address of the ISA

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PCT/DK2004/000240

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