

10/04/03

20 03020054

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

CORRECTED VERSION

(19) World Intellectual Property
Organization
International Bureau



(43) International Publication Date
20 February 2003 (20.02.2003)

PCT

(10) International Publication Number
WO 2003/013993 A1

(51) International Patent Classification⁷: **B65G 49/07**,
H01L 21/68

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(21) International Application Number:
PCT/US2002/025271

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(22) International Filing Date: 12 August 2002 (12.08.2002)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
09/925,722 10 August 2001 (10.08.2001) US

(81) Designated States (*national*): AE, AG, AL, AM, AT, AU,
AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU,
CZ, DE, DK, DM, DZ, EC, EE, 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, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG,
SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VC,
VN, YU, ZA, ZM, ZW.

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(84) Designated States (*regional*): ARIPO patent (GH, GM,
KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW),
Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),
European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE,
ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK,
TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ,
GW, ML, MR, NE, SN, TD, TG).

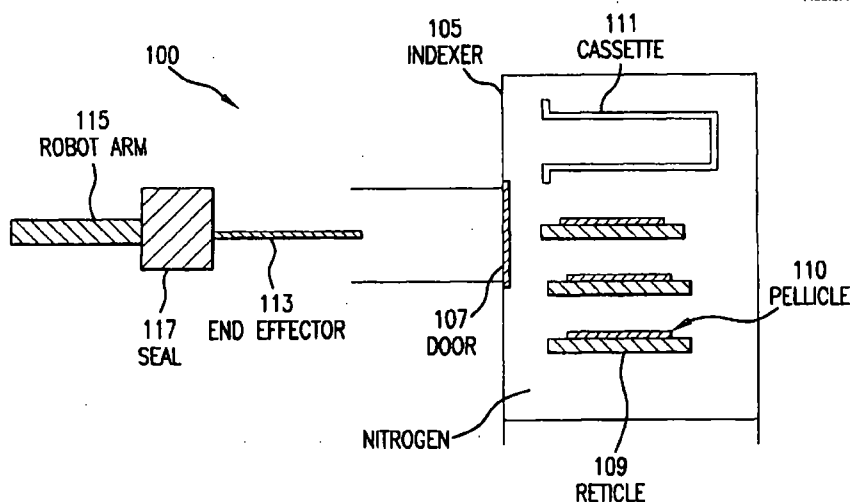
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[Continued on next page]

(54) Title: RETICLE PROTECTION AND TRANSPORT



162162



(57) Abstract: A substrate protection and transport system and method for transitioning a substrate from atmospheric pressure to vacuum in a lithography tool. The system includes one or more removable substrate transport cassettes (111). Each cassette has at least one vent and at least one filter. The system further includes an end effector (113) coupled to a robotic arm (115) to enable the substrate (109) to be positioned within one of the cassettes (111), thereby forming a cassette-substrate arrangement. The system further includes a box (701) having a base (711) and a lid (713). The box (701) holds one or more of the cassette-substrate arrangements. In this way, a box-cassette-substrate arrangement is provided. To transport the substrate, the substrate (109) is first loaded into a removable substrate transport cassette (111). Next, the cassette-substrate arrangement is loaded into the box (701). The box-cassette-substrate arrangement is then transported to a shelf of an out of vacuum storage rack.

WO 2003/013993 A1



ACTION

WO 2003/013993 A1

Published:

— with international search report

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.

(48) Date of publication of this corrected version:

23 December 2004

(15) Information about Correction:

see PCT Gazette No. 52/2004 of 23 December 2004, Section II