### (19) World Intellectual Property Organization

International Bureau





(43) International Publication Date 29 December 2004 (29.12.2004)

PCT

# (10) International Publication Number $WO\ 2004/113932\ A3$

(51) International Patent Classification<sup>7</sup>: 27/42, G01B 11/00, G06K 9/00

G03B 27/00,

(21) International Application Number:

PCT/IL2004/000525

(22) International Filing Date: 17 June 2004 (17.06.2004)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:

156589

23 June 2003 (23.06.2003)

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

#### **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

[Continued on next page]

(54) Title: METHOD AND SYSTEM FOR AUTOMATIC TARGET FINDING

# USING LOW-MAGNIFICATION CHANNEL TO DEFINE A REGION OF INTEREST (ROI)

USING HIGH-MAGNIFICATION CHANNEL FOR SCANNING ROI TO LOCATE TARGET

USING HIGH-MAGNIFICATION CHANNEL TO VERIFY THE TARGET LOCATION

(57) Abstract: A method and system are presented for automatic target finding by using two imaging channels with relatively low and high magnifications, using the low magnification channel (relatively large field of view) for finding a region of interest (i.e., that of the targets location within the field), scanning this zone by grabbing images via the high magnification channel (relatively small field of view) and marking the overlay targets using image processing algorithms.

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(88) Date of publication of the international search report: 31 March 2005

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.

## INTERNATIONAL SEARCH REPORT

International application No.

PCT/IL04/00525

A. CLASSIFICATION OF SUBJECT MATTER			
IPC(7) : G03B 27/00, 42; G01B 11/00; G06K 9/00 US CL : 355/18, 53; 356/400, 401; 382/145; 702/155			
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) U.S.: 355/18, 53; 356/237.4, 237.5 400, 401; 382/103, 145, 148; 702/35, 155			
Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched NONE			
Electronic data base consulted during the international search (name of data base and, where practicable, search terms used) EAST TEXT (low adj magnification) and (high adj magnification) and (wafer or substrate or pattern)			
C. DOCUMENTS CONSIDERED TO BE RELEVANT			
Category *	Citation of document, with indication, where a	ppropriate, of the relevant passages	Relevant to claim No.
X	US 6,166,801 A (DISHON ET AL) 26 December 2000 (26.12.2000) see Figures 2A, 2B, and 9, and column 2, lines 51-67, column 12, lines 38-54, and column 14, lines 4-22		1, 3-5, 12-14
			2 6 1 1
Α			2, 6-11
A	US 5,438,413 A (MAZOR ET AL) 01 August 199	5 (01.08.1995) see entire document	1-14
A	US 6,337,472 B1 (GARNER ET AL) 08 January 2002 (08.01.2002) see column 7, lines 46-50, and column 10, lines 33-36		1-14
Α	US 6,486,954 B1 (MICHER ET AL) 26 November 2002 (26.11.2002) see entire document		1-14
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"P" document published prior to the international filing date but later than the priority date claimed		"&" document member of the same patent family	
Date of the actual completion of the international search		Date of mailing of the international search report 18 FEB 2005	
13 January 2005 (13.01.2005)  Name and mailing address of the ISA/US		Anthorized officer ( )	11
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