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

(19) World Intellectual Property Organization
International Bureau

(43) International Publication Date
3 April 2008 (03.04.2008)

PCT

(10) International Publication Number
WO 2008/039067 A3

(51) International Patent Classification:
H01L 31/18 (2006.01) *H01L 31/0216* (2006.01)

(21) International Application Number:
PCT/NL2007/050459

(22) International Filing Date:
20 September 2007 (20.09.2007)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
2000248 25 September 2006 (25.09.2006) NL

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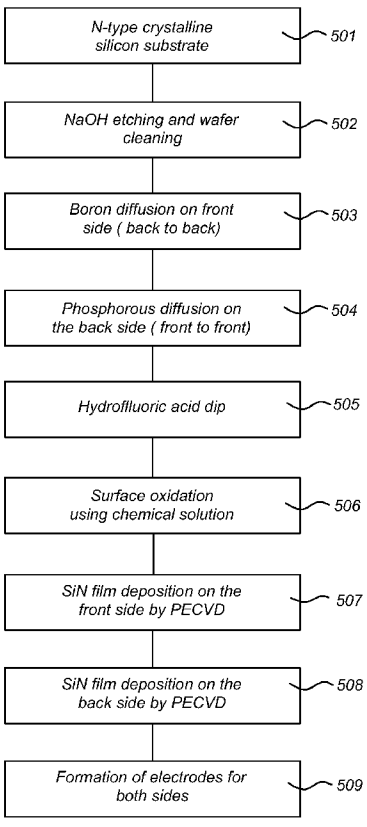
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(81) Designated States *(unless otherwise indicated, for every kind of national protection available)*: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH,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

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(54) Title: METHOD OF MANUFACTURING CRYSTALLINE SILICON SOLAR CELLS WITH IMPROVED SURFACE PASSIVATION



(57) Abstract: The present invention provides a method of manufacturing a crystalline silicon solar cell, comprising: - providing a crystalline silicon substrate having a front side and a back side; - forming a thin silicon oxide film on at least one of the front and the back side by soaking the crystalline silicon substrate in a chemical solution; - forming a dielectric coating film on the thin silicon oxide film on at least one of the front and the back side. The thin silicon oxide film may be formed with a thickness of 0.5-10 nm. By forming a oxide layer using a chemical solution, it is possible to form a thin oxide film for surface passivation wherein the relatively low temperature avoids deterioration of the semiconductor layers.

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FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, MT, 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*

(88) Date of publication of the international search report:
19 June 2008