

PATENT NO.4373905 / 2009.09.11

ABSTRACTS OF JAPAN

(11)Publication number : 2006-184388

(43)Date of publication of application : 13.07.2006

(51)Int.Cl. *G02F 1/13 (2006. 01)*
B08B 1/02 (2006. 01)
B08B 1/04 (2006. 01)
B08B 3/02 (2006. 01)
G02F 1/1333 (2006. 01)

(21)Application number : 2004-375727

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(22)Date of filing : 27.12.2004

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(54) BRUSH ASSEMBLY TO CLEAN SUBSTRATE SURFACE OF LIQUID CRYSTAL DISPLAY DEVICE, AND LIQUID CRYSTAL SUBSTRATE CLEANING EQUIPMENT

(57)Abstract:

PROBLEM TO BE SOLVED: To provide a brush assembly for cleaning a substrate surface in a liquid crystal display device, and to provide liquid crystal substrate cleaning equipment.

SOLUTION: The brush assembly is constituted of a linear brush, a roll brush, and a cup brush having different shapes, where respective brushes are driven and controlled with different velocities. The linear brush conducts a reciprocating motion on the substrate surface, in a direction orthogonal to the advancing direction. The roll brush rotates on the substrate surface, in a direction of producing rolling friction. The plane of rotation of the brush is identical to the substrate surface in the cup brush. By using the brush assembly to clean the substrate surface of the liquid crystal display device, the substrate surface of the liquid crystal display device is cleaned uniformly and efficiently for all parts by combining at least two out of the linear, roll, and cup brushes and demonstrating a synergistic effect, brought about with different shapes and driving velocities

