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08-14-2002

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	00000	Internal Address:
		Street Address:
Additional name(s) of conv attached?	veying party(ies) Yes x No	3-6, Nakamagome 1-chome, – Ohta-ku
Nature of Conveya	ance:	Tokyo 143-8555
x Assignment	Merger	JAPAN
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Execution Date:	July 17, 2002	Additional name(s) & Yes X No address(es) attached:
4. Application number	er(s) or patent number(s):	
If this document is being	filed together with a new application, the	execution date of the new application is:
A. Patent Application		B. Patent No.(s):
10/179,371		
	Additional numbers attac	ched? Yes x No
5. Name and address of	of party to whom correspondence nt should be mailed:	Total number of applications and patents involved: 1
Concerning documen		
Name: Thomas J. D'		
Name: Thomas J. D'A	Amico	Enclosed
Name: Thomas J. D' DICKSTEIN S Internal Address: Att	Amico SHAPIRO MORIN & OSHINSKY LL	Enclosed
Name: Thomas J. D'A DICKSTEIN S Internal Address: Att Street Address:	Amico SHAPIRO MORIN & OSHINSKY LL	Enclosed  X Authorized to be charged to deposit acco
Name: Thomas J. D' DICKSTEIN S Internal Address: Att	Amico SHAPIRO MORIN & OSHINSKY LL	Enclosed
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Name: Thomas J. D' DICKSTEIN S Internal Address: Att Street Address: 2101 L Street NW	Amico SHAPIRO MORIN & OSHINSKY LL ty. Dkt.: R2180.0124/P124 State: Zip:	Enclosed  X Authorized to be charged to deposit accommunity (Form 2038 enclosed)  8. Deposit account number:
Name: Thomas J. D'A DICKSTEIN S Internal Address: Att Street Address:	Amico SHAPIRO MORIN & OSHINSKY LL ty. Dkt.: R2180.0124/P124 State: Zip: DC 20037-1526	Enclosed  X Authorized to be charged to deposit acco X Authorized to be charged to credit card (Form 2038 enclosed)  8. Deposit account number:  04-1073  (Attach duplicate copy of this page if paying by deposit account
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## ASSIGNMENT BY INVENTORS

THIS ASSIGNMENT, made this 17th day of July, 2002, by Takaaki Negoro and Keiji Fujimoto (hereinafter referred to as Assignors), residing at Kishiwada-shi, Osaka-fu, JAPAN; and Takarazuka-shi, Hyogo-ken, JAPAN, respectively;

WHEREAS, Assignors have invented certain new and useful improvements in SEMICONDUCTOR DEVICE AND METHOD FOR FABRICATING SUCH DEVICE, set forth in a Patent application for Letters Patent of the United States, already filed on June 26, 2002 as U.S. application No. \_\_\_\_\_10/179,371

WHEREAS, Ricoh Company, Ltd., a corporation organized under and pursuant to the laws of Japan having its principal place of business at 3-6, Nakamagome 1-chome, Ohta-ku, Tokyo 143-8555, JAPAN (hereinafter referred to as Assignee), is desirous of acquiring the entire right, title and interest in and to said inventions and said Application for Letters Patent of the United States, and in and to any Letters Patent of the United States to be obtained therefore and thereon.

NOW, THEREFORE, in consideration of One Dollar (\$1.00) and other good and sufficient consideration, the receipt of which is hereby acknowledged, Assignors have sold, assigned, transferred and set over, and by these presents do sell, assign, transfer and set over, unto Assignee, its successors, legal representatives and assigns, the entire right, title and interest in and to the above-mentioned inventions and application for Letters Patent, and in and to any and all direct and indirect divisions, continuations and continuations-in-part of said application, and any and all Letters Patent in the United States and all foreign countries which may be granted therefore and thereon, and reissues, reexaminations and extensions of said Letters Patent, and all rights under the International Convention for the Protection of Industrial Property, the same to be held and enjoyed by Assignee, for its own use and benefit and the use and benefit of its successors, legal representatives and assigns, to the full end of the term or terms for which

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PATENT REEL: 013178 FRAME: 0852 Letters Patent may be granted and/or extended, as fully and entirely as the same would have been held and enjoyed by Assignors, had this sale and assignment not been made.

AND for the same consideration, Assignors hereby represent and warrant to Assignee, its successors, legal representatives and assigns, that, at the time of execution and delivery of these presents, except for any rights, titles and/or interests that have arisen to Assignee under law or that have already been transferred to Assignee, Assignors are the sole and lawful owners of the entire right, title and interest in and to the said inventions and application for Letters Patent above-mentioned, and that the same are unencumbered and that Assignors have good and full right and lawful authority to sell and convey the same in the manner herein set forth.

AND for the same consideration, Assignors hereby covenant and agree to and with Assignee, its successors, legal representatives and assigns, that Assignors will sign all papers and documents, take all lawful oaths and do all acts necessary or required to be done for the procurement, maintenance, enforcement and defense of any Letters Patent and applications for Letters Patent for said inventions, without charge to Assignee, its successors, legal representatives and assigns, whenever counsel of Assignee, or counsel of its successors, legal representatives and assigns, shall advise: that any proceeding in connection with said inventions, or said Patent application for Letters Patent, or any proceeding in connection with any Letters Patent or applications for Letters Patent for said inventions in any country, including but not limited to interference proceedings, is lawful and desirable; or, that any division, continuation or continuation-in-part of any application for Letters Patent, or any reissue, reexamination or extension of any Letters Patent, to be obtained thereon, is lawful and desirable.

AND Assignors hereby request the Commissioner of Patent and Trademarks to issue said Letters Patent of the United States to Assignee, as Assignee of said inventions and the Letters Patent to be issued thereon, for the sole use and benefit of Assignee, its successors, legal representatives and assigns.

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AND Assignors hereby grant the following individuals the power to insert on this Assignment any further identification which may be necessary or desirable in order to comply with the rules of the United States Patent and Trademark Office for recordation of this document:

## DICKSTEIN SHAPIRO MORIN & OSHINSKY LLP

Gary M. Hoffman	26,411	Richard LaCava	41,135	Ellen S. Tao	43,383
Thomas J. D'Amico	28,371	John C. Luce	34,378	Gary L. Veron	39,057
Donald A. Gregory	28,954	Peter McGee	35,947	Steven I. Weisburd	27,409
James W. Brady, Jr.	32,115	Edward A. Meilman	24,735	Mialeeka C. Williams-Bibbs	48,037
Jon D. Grossman	32,699	Edwin Oh	45,319	Jeremy A. Cubert	40,399
Mark J. Thronson	33,082	William E. Powell, III	39,803	Gianni Minutoli	41,198
Eric Oliver	35,307	Steven Rubin	43,063	Michael Bergman	42,318
Laurence E. Fisher	37,131	Michael J. Scheer	34,425	Salvatore P. Tamburo	45,153
Gabriela Coman	50,515	Stephen A. Soffen	31,063	Peter A. Veytsman	45,920
Ryan H. Flax	48,141	Christopher M. Tanner	41,518	Christopher S. Chow	46,493

AND Assignors acknowledge an obligation of assignment of this invention to Assignee at the time the invention was made.

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PATENT REEL: 013178 FRAME: 0854

	July 17. 2002	Jakaaki Nigoro
Date		Takaaki Negoro
Witness:		
	July 17. 2002	Satoshi Kono
Date	7 0	
Witness:		

Date

July 11. 2002	Keiji Fizimoco
Date	Keiji Fujimoto
Witness: July 17. 2002	Satoshi Kono
Date	
Witness:	
Date	

**RECORDED: 08/08/2002**