ASSIGNMENT RECORDATION FO

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To Commission on fan Detauts:	### ### #### ### ### #### ####	D-4 A	:	
To: Commissioner for Patents:	02718457	Attorney Docket No. 50	pril 1, 2004 649-1100IP	
Please record the attached original documents or copy the				
1. Name of conveying party(ies):	2. Name and address	s of receiving party(ies):	0	
[1.] Min-sang Park [2.] Jin-seok Kwak [3.] Seong-jin Jang	Samsung Electronics 416 Maetan-dong, Y Suwon-si, Gyeonggi Republic of Korea	eongtong-gu	22859 U.S. PTC 10/815505	
Additional name(s) of conveying party(ics) attached?Yes_X_N	lo .		22	
3. Nature of conveyance:				
XAssignmentMergerSecurity AgreementChange of NameOther Execution Date: [1.] March 30, 2004 [2.] March 30, 2004 [3.] March 30,	. 2004 Additional name(s) & ad	idress(es) attached? Yes X No		
4. Application Serial NoPatent NoPatent NoPolyPatent NoPolyPatent NoPolyPolyPolyPolyPolyPolyPolyPolyNoPolyNoPolyNoPolyNoNo	plication, the execution date of	the application		
Name and address of party to whom correspondence concerning document should be mailed: Grant J. Scott	6. Total number of a 7. Total fee (37 CFF Enclosed	pplications and patents involved R 3.41) \$40.00	l: <u> 1 </u>	
Myers Bigel Sibley & Sajovec P. O. Box 37428 Raleigh NC 27627				
Kaleigii NC 27027	8. Deposit account n	umber: 50-0220		
DO NOT USE THIS SPACE				
9. Statement and signature To the best of my knowledge and belief, the foregoing of the original document. Grant J. Scott #36,925 Name of Person Signing Total number of pages including cover sheet, attachment	April 1	et and any attached copy is a true 1, 2004 Date	е сору	
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PATENT REEL: 015192 FRAME: 0793

Attorney Docket 5649-1100IP

ASSIGNMENT

THIS ASSIGNMENT, made by us, Min-sang Park, citizen of the Republic of Korea, residing at 476-243, Gongse 1-ri, Giheung-eub, Yongin-si, Gyeonggi-do, Republic of Korea; Jin-seok Kwak, citizen of the Republic of Korea, residing at 915-505, Byukjeokgol Jugong Apt., 970-3, Yeongtong-dong, Yeongtong-gu, Suwon-si, Gyeonggi-do, Republic of Korea; and Seong-jin Jang, citizen of the Republic of Korea, residing at 104-704, Geumgang Apt., 122, Imae-dong, Bundang-gu, Seongnam-si, Gyeonggi-do, Republic of Korea;

WITNESSETH: That,

WHEREAS, we are the joint inventors of certain new and useful improvements in INTEGRATED CIRCUIT DEVICES HAVING DATA INVERSION CIRCUITS
THEREIN WITH MULTI-BIT PREFETCH STRUCTURES AND METHODS OF OPERATING SAME for which an application for United States Letters Patent has been filed, or is being filed concurrently, in the United States Patent and Trademark Office. We hereby authorize and request Myers Bigel Sibley & Sajovec, P.A., to insert here in parentheses (Application No. ________, filed _______) the filing date and application number of said application when known or to file this Assignment concurrently with the application, and

WHEREAS, Samsung Electronics Co., Ltd., a Korean corporation having a principal place of business at 416 Maetan-dong, Yeongtong-gu, Suwon-si, Gyeonggi-do, Republic of Korea, hereinafter referred to as assignee, is desirous of acquiring the entire right, title and interest in and to said invention as described in said application, and in and to any and all Letters Patent which shall be granted therefor in the United States of America and all foreign countries;

NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, we have sold and by these presents do hereby sell, assign, transfer and convey unto the said assignee, its successors and assigns, the entire right, title and interest in and to the said invention and application, and in and to any and all continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the United States of America and all foreign countries or reissues thereof which may be granted therefor or thereon, for the full end of the term for which said Letters Patent may be granted, together with the right to claim the priority of said application in all foreign countries in accordance with the International Convention, the same to be held and enjoyed by said assignee, its successors and assigns, as

Page 1 of 2

fully and entirely as the same would have been held and enjoyed by us if this assignment and sale had not been made.

We hereby request that said Letters Patent be issued in accordance with this assignment.

We further covenant and agree that, at the time of the execution and delivery of these presents, we possess full title to the invention and application above-mentioned, and that we have the unencumbered right and authority to make this assignment.

We further covenant and agree to bind our heirs, legal representatives and assigns, promptly to communicate to said assignee or its representatives any facts known to us relating to said invention, to testify in any interference or legal proceedings involving said invention, to execute any additional papers which may be requested to confirm the right of the assignee, its representatives, successors or assigns to secure patent or similar protection for the said invention in all countries and to vest in the assignee complete title to the said invention and Letters Patent, without further compensation, but at the expense of said assignee, its successors, assigns and other legal representatives.

IN WITNESS WHEREOF, we have hereunto set our hands and seals on this 30th day of <u>March</u> _, 2004.

Min-sang Park

Min-sang Park

Jin Seok Kwak

Jin-seok Kwak

Seony Jin Jung

Seong-jih-Jang

Witnessed by:

Date:

Page 2 of 2