

PATENT ASSIGNMENT

Electronic Version v1.1
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SUBMISSION TYPE:	NEW ASSIGNMENT												
NATURE OF CONVEYANCE:	ASSIGNMENT												
CONVEYING PARTY DATA													
<table border="1"> <thead> <tr> <th>Name</th> <th>Execution Date</th> </tr> </thead> <tbody> <tr> <td>Ian P Shaeffer</td> <td>06/06/2012</td> </tr> <tr> <td>Lei Luo</td> <td>05/29/2012</td> </tr> </tbody> </table>		Name	Execution Date	Ian P Shaeffer	06/06/2012	Lei Luo	05/29/2012						
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RECEIVING PARTY DATA													
<table border="1"> <tr> <td>Name:</td> <td>Rambus, Inc.</td> </tr> <tr> <td>Street Address:</td> <td>1050 Enterprise Way</td> </tr> <tr> <td>Internal Address:</td> <td>Suite 700</td> </tr> <tr> <td>City:</td> <td>Sunnyvale</td> </tr> <tr> <td>State/Country:</td> <td>CALIFORNIA</td> </tr> <tr> <td>Postal Code:</td> <td>94089</td> </tr> </table>		Name:	Rambus, Inc.	Street Address:	1050 Enterprise Way	Internal Address:	Suite 700	City:	Sunnyvale	State/Country:	CALIFORNIA	Postal Code:	94089
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CORRESPONDENCE DATA													
<p>Fax Number: (908)277-6373</p> <p>Phone: 9082773333</p> <p>Email: jreinhardt@wardzinna.com</p> <p><i>Correspondence will be sent to the e-mail address first; if that is unsuccessful, it will be sent via US Mail.</i></p> <p>Correspondent Name: Ward & Zinna, LLC</p> <p>Address Line 1: 382 Springfield Avenue</p> <p>Address Line 2: Suite 300</p> <p>Address Line 4: Summit, NEW JERSEY 07901</p>													
ATTORNEY DOCKET NUMBER:	69807-0001A, 69807-0001E												
NAME OF SUBMITTER:	Francis E. Morris												
<p>Total Attachments: 3</p> <p>source=2012_6_7_AsFiledAssignment698070001and0001E#page1.tif</p> <p>source=2012_6_7_AsFiledAssignment698070001and0001E#page2.tif</p> <p>source=2012_6_7_AsFiledAssignment698070001and0001E#page3.tif</p>													

CH \$80.00 61476594

ASSIGNMENT

For good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, and pursuant to an obligation to Rambus Inc. and/or its affiliates to assign intellectual property, and pursuant to any other applicable agreements among Rambus Inc. and its affiliates, the person(s)

IAN P. SHAEFFER of Los Gatos, CA
LEI LUO of Durham, NC

(hereinafter referred to as "INVENTOR" whether singular or plural) has sold, assigned, and transferred and/or does hereby sell, assign, and transfer to Rambus, Inc., having a place of business at 1050 Enterprise Way, Suite 700, Sunnyvale, CA 94089 ("ASSIGNEE"), for itself and its successors, transferees, and assignees, the following:

1. The entire worldwide right, title, and interest in all inventions and Improvements ("SUBJECT MATTER") that are disclosed in the following PCT application ("APPLICATION") entitled "Memory Circuit and Method for Its Operation", having:

 X PCT Patent Application No. PCT/US2012/034021, filed on April 18, 2012;

 X which claims priority to U.S. Patent Application No. 61/476,594 filed on April 18, 2011 ; or

 Application number (_____), filed (_____),
Inserted by (_____) on (_____) [Where
INVENTOR hereby authorizes and requests ASSIGNEE or its agents to insert here
in each parentheses the application number and filing date when known, along
with the signature and date of the person completing this section].

2. The entire worldwide right, title, and interest in and to: (a) the APPLICATION; (b) all applications claiming priority from the APPLICATION; (c) all provisional, utility, utility model, design, divisional, continuation, continued prosecution, continuation-in-part, substitute, renewal, and other applications related thereto which have been or may be filed in the United States or elsewhere in the world related to the SUBJECT MATTER; (d) all patents (including reissues, re-examinations, and extensions) which may be granted on the applications set forth in (a), (b), and (c) above; and (e) all right of priority in the APPLICATION and in any underlying provisional or foreign application, together with all rights to recover damages for infringement of provisional rights.

INVENTOR agrees that ASSIGNEE may apply for and receive patents for SUBJECT MATTER in ASSIGNEE's own name.

As part of this Assignment, INVENTOR further agrees to do the following, when requested, and without further consideration: (1) execute all oaths, declarations, assignments, powers of attorney, applications, and other papers necessary or desirable to fully secure to ASSIGNEE the rights, titles and interests herein conveyed; (2) communicate to ASSIGNEE all known facts relating to the SUBJECT MATTER; and (3) generally do all lawful acts that ASSIGNEE shall consider desirable for securing, maintaining, and enforcing worldwide patent protection relating to the SUBJECT MATTER and for vesting in ASSIGNEE the rights, titles, and interests herein conveyed. INVENTOR further agrees to

provide any successor, assign, or legal representative of ASSIGNEE with the benefits and assistance provided to ASSIGNEE hereunder.


INVENTOR represents that INVENTOR has the rights, titles, and interests to convey as set forth herein, and covenants with ASSIGNEE that the INVENTOR has not made and will not hereafter make any assignment, grant, mortgage, license, or other agreement affecting the rights, titles, and interests herein conveyed.

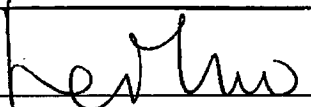
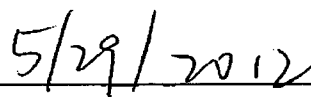
INVENTOR grants the attorney of record the power to insert on this Assignment any further identification that may be necessary or desirable in order to comply with the rules of the United States Patent and Trademark Office for recordation of this document.

The terms and covenants of this Assignment shall inure to the benefit of ASSIGNEE, its successors, assigns, and legal representatives, and shall be binding upon INVENTOR, and INVENTOR's respective heirs, legal representatives and assigns.

This Assignment may be executed in one or more counterparts, each of which shall be deemed an original and all of which may be taken together as one and the same Assignment.

Each Inventor: Please Sign and Date Below:

	<u>6/6/12</u>
Inventor Name: IAN P. SHAEFFER	Date
State of California) County of Santa Clara)	
On _____ before me, _____, Notary Public,	
personally appeared Ian P. Shaeffer, who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that he/she executed the same in his/her authorized capacity, and that by his/her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.	
I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is true and correct.	
WITNESS my hand and official seal.	
Signature: _____ (Seal)	

		
Inventor Name: Lei Luo		Date
State of North Carolina) County of Orange)		
On _____ before me, _____, Notary Public,		
personally appeared Lei Luo, who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that he/she executed the same in his/her authorized capacity, and that by his/her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.		
I certify under PENALTY OF PERJURY under the laws of the State of North Carolina that the foregoing paragraph is true and correct.		
WITNESS my hand and official seal.		
Signature: _____		(Seal)