## PATENT ASSIGNMENT

# Electronic Version v1.1 Stylesheet Version v1.1

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

## **CONVEYING PARTY DATA**

Name	Execution Date
James R. Vash	12/20/2010
Pritpal S. Ahuja	12/17/2010
Bongjin Jung	12/28/2010
Jeffrey D. Chamberlain	12/22/2010

## **RECEIVING PARTY DATA**

Name:	Intel Corporation
Street Address:	2200 Mission College Blvd.
City:	Santa Clara
State/Country:	CALIFORNIA
Postal Code:	95052

## **PROPERTY NUMBERS Total: 1**

Property Type	Number
Application Number:	12978592

# **CORRESPONDENCE DATA**

Fax Number: (612)332-8352

Correspondence will be sent via US Mail when the fax attempt is unsuccessful.

Email: sarora@cpaglobal.com
Correspondent Name: Caven & Aghevli LLC
Address Line 1: c/o CPA Global
Address Line 2: PO Box 52050

Address Line 4: Minneapolis, MINNESOTA 55402

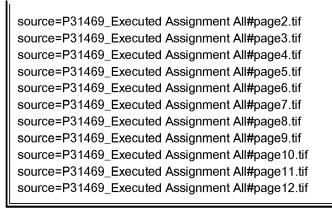
ATTORNEY DOCKET NUMBER: P31469

NAME OF SUBMITTER: Ramin Aghevli

Total Attachments: 12

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PATENT REEL: 026429 FRAME: 0216 \$40.00 129



WHEREAS, We, James R. Vash, residing at 85 Grist Mill Road, Littleton, MA 01460, and Pritpal S. Ahuja, residing at 420 Fernwood Lane, Clinton, MA 01510, and Bongjin Jung, residing at 4 Sweetwood Circle, Westford, MA 01886, and Jeffrey D. Chamberlain, residing at 465 Cape Breton Lane, Tracy, CA 95377, made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States entitled MULTIPLE-OUBUE MULTIPLE-RESOURCE ENTRY SLEEP AND WAKEUP FOR POWER SAVINGS AND BANDWIDTH CONSERVATION IN A RETRY BASED PIPELINE:

WHEREAS, We hereby authorize and request our attorneys, associated with Customer Number 50890, to insert here in parentheses (SER. No.  $\frac{12/978,592}{}$ ; Filing Date: December 26, 2010 ) the filing date and application number of said application when known

AND WHEREAS, Intel Corporation, a corporation organized and existing under and by virtue of the laws of the State of <u>Delaware</u>, and having an office and place of business at <u>2200</u> <u>Mission College Blvd.</u> Santa Clara, CA 95052 (hereinafter "Assignee"), is desirous of acquiring the entire right, title and interest in and to said inventions, improvements and application and in and to the Letters Patent to be obtained therefore:

NOW, THEREFORE, to all whom it may concern, be it known that for good and valuable consideration, the receipt and sufficiency whereof is hereby acknowledged, we have sold, assigned, and transferred, and by these presents do sell, assign and transfer unto said Assignee, its successors or assigns, the entire right, title and interest for all countries in and to all inventions and improvements disclosed in the aforesaid application, and in and to the said application, all divisions, continuations, continuations-in-part, or renewals thereof, all Letters Patent which may be granted there from, and all reissues or extensions of such patents, and in and to any and all applications which have been or shall be filed in any foreign countries for Letters Patent on the said inventions and improvements, including an assignment of all rights under the provisions of the International Convention, and all Letters Patent of foreign countries

which may be granted there from; and we do hereby authorize and request the Commissioner of Patents and Trademarks to issue any and all United States Letters Patent for the aforesaid inventions and improvements to the said Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the said Assignee, its successors and assigns.

AND, for the consideration aforesaid, we do hereby agree that we and our executors and legal representatives will make, execute and deliver any and all other instruments in writing including any and all further application papers, affidavits, assignments and other documents, and will communicate to said Assignee, its successors and representatives all facts known to us relating to said improvements and the history thereof and will testify in all legal proceedings and generally do all things which may be necessary or desirable more effectually to secure to and vest in said Assignee, its successors or assigns the entire right, title and interest in and to the said improvements, inventions, applications, Letters Patent, rights, titles, benefits, privileges and advantages hereby sold, assigned and conveyed, or intended so to be.

AND, furthermore, we covenant and agree with said Assignee, its successors and assigns, that no assignment, grant, mortgage, license or other agreement affecting the rights and property herein conveyed has been made to others by us and that full right to convey the same as herein expressed is possessed by us.

IN TESTIMONY WHEREOF, I have hereunto set my hand this 20 day of Decarles, 20	10
James R. Vash	
James R. Vash	
IN TESTIMONY WHEREOF, I have hereunto set my hand this day of, 20	10
Pritpal S. Ahuja	

Dooket No: P31469 Page 3 of 3	····	
IN TESTIMONY WHEREOF, I have hereunto set my hand this	day of	, 2010.
Bongjin Jung		
IN TESTIMONY WHEREOF, I have hereunto set my hand this	day of	, 2010.
Jeffrey D. Chamberlain		

PATENT

REEL: 026429 FRAME: 0220

WHEREAS, We, James R. Vash, residing at 85 Grist Mill Road, Littleton, MA 01460, and Pritpal S. Ahuja, residing at 420 Fernwood Lane, Clinton, MA 01510, and Bongjin Jung, residing at 4 Sweetwood Circle, Westford, MA 01886, and Jeffrey D. Chamberlain, residing at 465 Cape Breton Lane, Tracy, CA 95377, made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States entitled MULTIPLE-QUEUE MULTIPLE-RESOURCE ENTRY SLEEP AND WAKEUP FOR POWER SAVINGS AND BANDWIDTH CONSERVATION IN A RETRY BASED PIPELINE;

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AND WHEREAS, <u>Intel Corporation</u>, a corporation organized and existing under and by virtue of the laws of the State of <u>Delaware</u>, and having an office and place of business at <u>2200 Mission College Blvd.</u>, <u>Santa Clara, CA 95052</u> (hereinafter "Assignee"), is desirous of acquiring the entire right, title and interest in and to said inventions, improvements and application and in and to the Letters Patent to be obtained therefore:

NOW, THEREFORE, to all whom it may concern, be it known that for good and valuable consideration, the receipt and sufficiency whereof is hereby acknowledged, we have sold, assigned, and transferred, and by these presents do sell, assign and transfer unto said Assignee, its successors or assigns, the entire right, title and interest for all countries in and to all inventions and improvements disclosed in the aforesaid application, and in and to the said application, all divisions, continuations, continuations-in-part, or renewals thereof, all Letters Patent which may be granted there from, and all reissues or extensions of such patents, and in and to any and all applications which have been or shall be filed in any foreign countries for Letters Patent on the said inventions and improvements, including an assignment of all rights under the provisions of the International Convention, and all Letters Patent of foreign countries

which may be granted there from; and we do hereby authorize and request the Commissioner of Patents and Trademarks to issue any and all United States Letters Patent for the aforesaid inventions and improvements to the said Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the said Assignee, its successors and assigns.

AND, for the consideration aforesaid, we do hereby agree that we and our executors and legal representatives will make, execute and deliver any and all other instruments in writing including any and all further application papers, affidavits, assignments and other documents, and will communicate to said Assignee, its successors and representatives all facts known to us relating to said improvements and the history thereof and will testify in all legal proceedings and generally do all things which may be necessary or desirable more effectually to secure to and vest in said Assignee, its successors or assigns the entire right, title and interest in and to the said improvements, inventions, applications, Letters Patent, rights, titles, benefits, privileges and advantages hereby sold, assigned and conveyed, or intended so to be.

AND, furthermore, we covenant and agree with said Assignee, its successors and assigns, that no assignment, grant, mortgage, license or other agreement affecting the rights and property herein conveyed has been made to others by us and that full right to convey the same as herein expressed is possessed by us.

IN TESTIMONY WHEREOF, I have be	day of		, 2010	
	James R. Vash			
IN TESTIMONY WHEREOF, I have be	reunto set my hand this	Z day of	Dec	, 2010
	P.Alm	7./1		
	Pritpal S. Ahuja			

Docket No.: P3 (469 Page 3 of 3		
IN TESTIMONY WHEREOF, I have hereunto set my hand this	day of	. 2010.
Bongjin Lung		
IN TESTIMONY WHEREOF, I have hereunto set my hand this	day of	. 2010.

Jeffrey D. Chamberlain

WHEREAS, We, James R. Vash, residing at 85 Grist Mill Road, Littleton, MA 01460, and Pritpal S. Ahuja, residing at 420 Fernwood Lane, Clinton, MA 01510, and Bongjin Jung, residing at 4 Sweetwood Circle, Westford, MA 01886, and Jeffrey D. Chamberlain, residing at 465 Cape Breton Lane, Tracy, CA 95377, made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States entitled MULTIPLE-QUEUE MULTIPLE-RESOURCE ENTRY SLEEP AND WAKEUP FOR POWER SAVINGS AND BANDWIDTH CONSERVATION IN A RETRY BASED PIPELINE;

WHEREAS, We hereby authorize and request our attorneys, associated with Customer Number 50890, to insert here in parentheses (SER. No. 12/978, 592; Filing Date: December 26, 2010 ) the filing date and application number of said application when known

AND WHEREAS, Intel Corporation, a corporation organized and existing under and by virtue of the laws of the State of Delaware, and having an office and place of business at 2200 Mission College Blvd., Santa Clara, CA 95052 (hereinafter "Assignee"), is desirous of acquiring the entire right, title and interest in and to said inventions, improvements and application and in and to the Letters Patent to be obtained therefore;

NOW, THEREFORE, to all whom it may concern, be it known that for good and valuable consideration, the receipt and sufficiency whereof is hereby acknowledged, we have sold, assigned, and transferred, and by these presents do sell, assign and transfer unto said Assignee, its successors or assigns, the entire right, title and interest for all countries in and to all inventions and improvements disclosed in the aforesaid application, and in and to the said application, all divisions, continuations, continuations-in-part, or renewals thereof, all Letters Patent which may be granted there from, and all reissues or extensions of such patents, and in and to any and all applications which have been or shall be filed in any foreign countries for Letters Patent on the said inventions and improvements, including an assignment of all rights under the provisions of the International Convention, and all Letters Patent of foreign countries

PATENT

REEL: 026429 FRAME: 0224

Docket No: P31469 Page 2 of 3

which may be granted there from; and we do hereby authorize and request the Commissioner of Patents and Trademarks to issue any and all United States Letters Patent for the aforesaid inventions and improvements to the said Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the said Assignee, its successors and assigns.

AND, for the consideration aforesaid, we do hereby agree that we and our executors and legal representatives will make, execute and deliver any and all other instruments in writing including any and all further application papers, affidavits, assignments and other documents, and will communicate to said Assignee, its successors and representatives all facts known to us relating to said improvements and the history thereof and will testify in all legal proceedings and generally do all things which may be necessary or desirable more effectually to secure to and vest in said Assignee, its successors or assigns the entire right, title and interest in and to the said improvements, inventions, applications, Letters Patent, rights, titles, benefits, privileges and advantages hereby sold, assigned and conveyed, or intended so to be.

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IN TESTIMONY WHEREOF, I have hereunto set my hand this day o	or, 2010
James R. Vash	
IN TESTIMONY WHEREOF, I have hereunto set my hand this day of	of,2010
Pritpal S. Ahuja	

REEL: 026429 FRAME: 0225

Page 3 of 3
IN TESTIMONY WHEREOF, I have hereunto set my hand this 2 day of December, 2010.
Bongin Jung
IN TESTIMONY WHEREOF, I have hereunto set my hand this day of , 2010.
Jeffrey D. Chamberlain

WHEREAS, Wc, James R. Vash, residing at 85 Grist Mill Road. Littleton, MA 01460, and Pritpal S. Ahuja, residing at 420 Fernwood Lane, Clinton, MA 01510, and Bonglin Jung, residing at 4 Sweetwood Circle, Westford, MA 01886, and Jeffrey D. Chamberlain, residing at 465 Cape Breton Lane, Tracy, CA 95377, made certain new and useful inventions and improvements for which we filed an application for Letters Patent of the United States entitled MULTIPLE-QUEUE MULTIPLE-RESOURCE ENTRY SLEEF AND WAKEUP FOR POWER SAVINGS AND BANDWIDTH CONSERVATION IN A RETRY BASED PIPELINE:

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IN TESTIMONY WHEREOF, I have hereunto set my hand this	day of	, 2010.
James R. Vash		100000000000000000000000000000000000000
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Pritpal S. Ahuja	oonaan aan aan aan aan aan ah baan aan aan aan aan aan aan aan aan aa	managang ji Uusi sananananananananananana

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**RECORDED: 06/10/2011**