PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT2909296

SUBMISSION TYPE:	NEW ASSIGNMENT		
NATURE OF CONVEYANCE:	ASSIGNMENT		

CONVEYING PARTY DATA

Name	Execution Date
DEBESH KUMAR SAHU	05/28/2014
VENKATA GIRISH VADLAMUDI	05/28/2014
AMIT MANDIL	05/28/2014
GOTTIPATI PRAVEEN KUMAR	05/28/2014
VENKATA KIVA PRASAD RAO GUDE	06/18/2014
CHINTAN SHIRISH SHAH	06/06/2014

RECEIVING PARTY DATA

Name:	QUALCOMM INCORPORATED
Street Address:	5775 MOREHOUSE DRIVE
City:	SAN DIEGO
State/Country:	CALIFORNIA
Postal Code:	92121-1714

PROPERTY NUMBERS Total: 2

Property Type	Number
Application Number:	14272260
Application Number:	61903320

CORRESPONDENCE DATA

Fax Number:

Correspondence will be sent to the e-mail address first; if that is unsuccessful, it will be sent using a fax number, if provided; if that is unsuccessful, it will be sent via US Mail.

Phone: 213-629-7400

Email: dcipdocket@arentfox.com

Correspondent Name: ARENT FOX, LLP AND QUALCOMM, INCORPORATE

Address Line 1: 1717 K STREET, NW

Address Line 4: WASHINGTON, D.C. 20036-5342

ATTORNEY DOCKET NUMBER:	030284.07647 / 140040	
NAME OF SUBMITTER:	PEGGY O'CONNOR	
SIGNATURE:	/Peggy O'Connor/	
DATE SIGNED:	06/23/2014	

Total Attachments: 9

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ASSIGNMENT

WHEREAS, WE,

- 1. Debesh Kumar SAHU, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;
- 2. Venkata Siva Prasad Rao GUDE, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of San Diego, California, U.S.:
- 3. Venkata Girish VADLAMUDI, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;
- 4. Chintan Shirish SHAH, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of San Diego, California, U.S.;
- 5. Amit MANDIL, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;
- 6. Gottipati Praveen KUMAR, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;

have conceived of one or more processes, methods, machines, articles of manufacture, designs, compositions of matter, inventions, discoveries or new or useful improvements relating to PROACTIVE RANK INDEX MANAGEMENT IN SLTE ENABLED MODEM TO ACHIEVE HIGHER THROUGHPUT (collectively the "INVENTIONS") for which WE have executed and/or may execute one or more patent applications therefor; and

WHEREAS, QUALCOMM Incorporated (hereinafter "ASSIGNEE"), a Delaware corporation, having a place of business at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., desires to acquire or otherwise obtain the entire right, title, and interest in and to said INVENTIONS, including all inventions related thereto or thereof, all patent applications therefor, and all patents that have granted or may be granted hereafter thereon, including but not limited to those identified below.

NOW, THEREFORE, for good and valuable consideration, the receipt of which is hereby acknowledged, WE do hereby acknowledge that WE have sold, assigned, conveyed, and transferred, and by these presents do hereby sell, assign, convey, and transfer, unto ASSIGNEE, its successors, its legal representatives, and its assigns, the entire right, title, and interest throughout the world in and to said INVENTIONS, including all patent applications therefor that may have been filed or may be filed hereafter for said INVENTIONS in the United States,

including but not limited to U.S. Application No(s). 14/272,260 filed and May 7, 2014, Qualcomm Reference No. 140040 and all provisional applications relating thereto, together with U.S. Provisional Application No(s). 61/903,320, filed November 12, 2013, Qualcomm Reference No. 140040P1, (and do hereby authorize ASSIGNEE and its representative to hereafter add herein such application number(s) and/or filing date(s) when known), and all divisional applications, renewal applications, continuation applications, continuation-in-part applications, and design applications thereof, and all issued patents of the United States which may have granted or may be granted hereafter thereon and all reissues, renewals, reexaminations, and extensions to any of the foregoing and all patents issuing thereon in the United States;

AND WE further do acknowledge and agree that WE have sold, assigned, conveyed, and transferred, and by these presents do hereby sell, assign, convey, and transfer, unto ASSIGNEE, its successors, its legal representatives, and its assigns, all rights of priority under International Conventions, Treaties, or Agreements, and the entire right, title, and interest throughout the world in said INVENTIONS, including all inventions related thereto or thereof, and all patent applications therefor that may have been filed or may be filed hereafter for said INVENTIONS in any foreign country, countries, or treaty/union organizations, and all divisional applications, renewal applications, continuation applications, continuation-in-part applications, patent of addition applications, confirmation applications, validation applications, utility model applications, and design applications thereof, and all issued patents which may have granted or may be granted hereafter for said INVENTIONS in any country or countries foreign to the United States, and all reissues, renewals, reexaminations, and extensions thereof;

AND WE DO HEREBY authorize and request the Commissioner of Patents of the United States, and any Official of any country or countries foreign to the United States, whose duty it is to issue patents on applications or registrations, to issue all patents for said INVENTIONS to said ASSIGNEE, its successors, its legal representatives and its assigns, in accordance with the terms of this instrument;

AND WE DO HEREBY sell, assign, transfer, and convey to said ASSIGNEE, its successors, its legal representatives, and its assigns all claims for damages and all remedies arising out of or relating to any violation(s) of any of the rights assigned hereby that have or may have accrued prior to the date of assignment to said ASSIGNEE, or may accrue hereafter, including, but not limited to the right to sue for, seek, obtain, collect, recover, and retain damages and any ongoing or prospective royalties to which WE may be entitled, or that WE may collect for any infringement or from any settlement or agreement related to any of said patents before or after issuance:

AND WE HEREBY covenant and agree that WE will communicate promptly to said ASSIGNEE, its successors, its legal representatives, and its assigns, any facts known to us respecting said INVENTIONS, and will testify in any legal proceeding, sign all lawful papers,

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execute all applications and certificates, make all rightful declarations and/or oaths, and provide all lawful assistance to said ASSIGNEE, its successors, its legal representatives and its assigns, to obtain and enforce patent protection for said INVENTIONS in all countries;

AND WE HEREBY covenant that WE will not execute any writing nor do any act whatsoever conflicting with these presents.

Done at	Hyderalical	, on	2t-05-14	Debesh Kumar SAHU
	LOCATION		DATE	Debesh Kumar SAHU
Done at		On		
	LOCATION	, on	DATE	Venkata Siva Prasad Rao GUDE
Dana àt	HUNCOARAN	- W - **	96 05 DOLA	Gialaide
Dolle at	HYDERABAO LOCATION	, on <u>_</u> _	DATE	Venkata Girish VADLAMUDI
Done at		, on		
	LOCATION		DATE	Chintan Shirish SHAH
Done at	HYDERABAD	, on	28-05-2014	Brid
	LOCATION		DATE	Amit MANDIL
	1.6.			
Done at	HYDERABAD.	, on	18-05-2014	G. Panseen Kumas.
	LOCATION		DATE	Gottipati Praveen KUMAR

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ASSIGNMENT

WHEREAS, WE,

- 1. Debesh Kumar SAHU, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;
- 2. Venkata Siva Prasad Rao GUDE, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of San Diego, California, U.S.:
- 3. Venkata Girish VADLAMUDI, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;
- 4. Chintan Shirish SHAH, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of San Diego, California, U.S.;
- 5. Amit MANDIL, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;
- 6. Gottipati Praveen KUMAR, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;

have conceived of one or more processes, methods, machines, articles of manufacture, designs, compositions of matter, inventions, discoveries or new or useful improvements relating to PROACTIVE RANK INDEX MANAGEMENT IN SLTE ENABLED MODEM TO ACHIEVE HIGHER THROUGHPUT (collectively the "INVENTIONS") for which WE have executed and/or may execute one or more patent applications therefor; and

WHEREAS, QUALCOMM Incorporated (hereinafter "ASSIGNEE"), a Delaware corporation, having a place of business at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., desires to acquire or otherwise obtain the entire right, title, and interest in and to said INVENTIONS, including all inventions related thereto or thereof, all patent applications therefor, and all patents that have granted or may be granted hereafter thereon, including but not limited to those identified below.

NOW, THEREFORE, for good and valuable consideration, the receipt of which is hereby acknowledged, WE do hereby acknowledge that WE have sold, assigned, conveyed, and transferred, and by these presents do hereby sell, assign, convey, and transfer, unto ASSIGNEE, its successors, its legal representatives, and its assigns, the entire right, title, and interest throughout the world in and to said INVENTIONS, including all patent applications therefor that may have been filed or may be filed hereafter for said INVENTIONS in the United States,

including but not limited to U.S. Application No(s). 14/272,260 filed and May 7, 2014, Qualcomm Reference No. 140040 and all provisional applications relating thereto, together with U.S. Provisional Application No(s). 61/903,320, filed November 12, 2013, Qualcomm Reference No. 140040P1, (and do hereby authorize ASSIGNEE and its representative to hereafter add herein such application number(s) and/or filing date(s) when known), and all divisional applications, renewal applications, continuation applications, continuation-in-part applications, and design applications thereof, and all issued patents of the United States which may have granted or may be granted hereafter thereon and all reissues, renewals, reexaminations, and extensions to any of the foregoing and all patents issuing thereon in the United States;

AND WE further do acknowledge and agree that WE have sold, assigned, conveyed, and transferred, and by these presents do hereby sell, assign, convey, and transfer, unto ASSIGNEE, its successors, its legal representatives, and its assigns, all rights of priority under International Conventions, Treaties, or Agreements, and the entire right, title, and interest throughout the world in said INVENTIONS, including all inventions related thereto or thereof, and all patent applications therefor that may have been filed or may be filed hereafter for said INVENTIONS in any foreign country, countries, or treaty/union organizations, and all divisional applications, renewal applications, continuation applications, continuation-in-part applications, patent of addition applications, confirmation applications, validation applications, utility model applications, and design applications thereof, and all issued patents which may have granted or may be granted hereafter for said INVENTIONS in any country or countries foreign to the United States, and all reissues, renewals, reexaminations, and extensions thereof;

AND WE DO HEREBY authorize and request the Commissioner of Patents of the United States, and any Official of any country or countries foreign to the United States, whose duty it is to issue patents on applications or registrations, to issue all patents for said INVENTIONS to said ASSIGNEE, its successors, its legal representatives and its assigns, in accordance with the terms of this instrument:

AND WE DO HEREBY sell, assign, transfer, and convey to said ASSIGNEE, its successors, its legal representatives, and its assigns all claims for damages and all remedies arising out of or relating to any violation(s) of any of the rights assigned hereby that have or may have accrued prior to the date of assignment to said ASSIGNEE, or may accrue hereafter, including, but not limited to the right to sue for, seek, obtain, collect, recover, and retain damages and any ongoing or prospective royalties to which WE may be entitled, or that WE may collect for any infringement or from any settlement or agreement related to any of said patents before or after issuance:

AND WE HEREBY covenant and agree that WE will communicate promptly to said ASSIGNEE, its successors, its legal representatives, and its assigns, any facts known to us respecting said INVENTIONS, and will testify in any legal proceeding, sign all lawful papers,

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execute all applications and certificates, make all rightful declarations and/or oaths, and provide all lawful assistance to said ASSIGNEE, its successors, its legal representatives and its assigns, to obtain and enforce patent protection for said INVENTIONS in all countries;

AND WE HEREBY covenant that WE will not execute any writing nor do any act whatsoever conflicting with these presents.

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	LOCATION	DATE	Debesh Kumar SAHU
Done at	SANDIEGO	, on & (8 2 o l	V V V V V V V V V V V V V V V V V V V
	LOCATION	DATE	Venkata Siva Prasad Kao GUDE
Done at		, on	
,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	LOCATION	DATE	Venkata Girish VADLAMUDI
Done at		, on	
	LOCATION	DATE	Chintan Shirish SHAH
Done at		, on	
	LOCATION	DATE	Amit MANDIL
Done at		, on	
	LOCATION	DATE	Gottinati Praveen KUMAR

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- 6. Gottipati Praveen KUMAR, a citizen of India, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714, and a resident of Hyderabad, India;

have conceived of one or more processes, methods, machines, articles of manufacture, designs, compositions of matter, inventions, discoveries or new or useful improvements relating to **PROACTIVE RANK INDEX MANAGEMENT IN SLTE ENABLED MODEM TO ACHIEVE HIGHER THROUGHPUT** (collectively the "INVENTIONS") for which WE have executed and/or may execute one or more patent applications therefor; and

WHEREAS, QUALCOMM Incorporated (hereinafter "ASSIGNEE"), a Delaware corporation, having a place of business at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., desires to acquire or otherwise obtain the entire right, title, and interest in and to said INVENTIONS, including all inventions related thereto or thereof, all patent applications therefor, and all patents that have granted or may be granted hereafter thereon, including but not limited to those identified below.

NOW, THEREFORE, for good and valuable consideration, the receipt of which is hereby acknowledged, WE do hereby acknowledge that WE have sold, assigned, conveyed, and transferred, and by these presents do hereby sell, assign, convey, and transfer, unto ASSIGNEE, its successors, its legal representatives, and its assigns, the entire right, title, and interest throughout the world in and to said INVENTIONS, including all patent applications therefor that may have been filed or may be filed hereafter for said INVENTIONS in the United States,

including but not limited to U.S. Application No(s). 14/272,260 filed and May 7, 2014, Qualcomm Reference No. 140040 and all provisional applications relating thereto, together with U.S. Provisional Application No(s). 61/903,320, filed November 12, 2013, Qualcomm Reference No. 140040P1, (and do hereby authorize ASSIGNEE and its representative to hereafter add herein such application number(s) and/or filing date(s) when known), and all divisional applications, renewal applications, continuation applications, continuation-in-part applications, and design applications thereof, and all issued patents of the United States which may have granted or may be granted hereafter thereon and all reissues, renewals, reexaminations, and extensions to any of the foregoing and all patents issuing thereon in the United States;

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AND WE DO HEREBY authorize and request the Commissioner of Patents of the United States, and any Official of any country or countries foreign to the United States, whose duty it is to issue patents on applications or registrations, to issue all patents for said INVENTIONS to said ASSIGNEE, its successors, its legal representatives and its assigns, in accordance with the terms of this instrument;

AND WE DO HEREBY sell, assign, transfer, and convey to said ASSIGNEE, its successors, its legal representatives, and its assigns all claims for damages and all remedies arising out of or relating to any violation(s) of any of the rights assigned hereby that have or may have accrued prior to the date of assignment to said ASSIGNEE, or may accrue hereafter, including, but not limited to the right to sue for, seek, obtain, collect, recover, and retain damages and any ongoing or prospective royalties to which WE may be entitled, or that WE may collect for any infringement or from any settlement or agreement related to any of said patents before or after issuance:

AND WE HEREBY covenant and agree that WE will communicate promptly to said ASSIGNEE, its successors, its legal representatives, and its assigns, any facts known to us respecting said INVENTIONS, and will testify in any legal proceeding, sign all lawful papers,

PATENT
QUALCOMM Ref. No. 140040
Page 3 of 3

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AND WE HEREBY covenant that WE will not execute any writing nor do any act whatsoever conflicting with these presents.

Done at		, on		
	LOCATION		DATE	Debesh Kumar SAHU
Done at		, on		
	LOCATION		DATE	Venkata Siva Prasad Rao GUDE
Done at		, on		
	LOCATION		DATE	Venkata Girish VADLAMUDI
Done at SAN	DIEGO CA LOCATION	on Ju	NE 06, 2014	hintal
	LOCATION	-	DATE / /	Chintan Shirish SHAH
	LOCATION		DATE	Amit MANDIL
Done at		, on		
A CONTRACTOR OF	LOCATION		DATE	Gottipati Praveen KUMAR

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RECORDED: 06/23/2014