502538411 10/18/2013

PATENT ASSIGNMENT COVER SHEET

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EPAS ID: PAT2583808

SUBMISSION TYPE:	NEW ASSIGNMENT	
NATURE OF CONVEYANCE:	ASSIGNMENT	

CONVEYING PARTY DATA

Name	Execution Date
SANTOSH PAUL ABRAHAM	10/16/2013
GEORGE CHERIAN	10/01/2013
JOUNI KALEVI MALINEN	09/30/2013

RECEIVING PARTY DATA

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

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	14010440

CORRESPONDENCE DATA

Fax Number: (949)760-9502 Phone: 8587074000 Email: efiling@knobbe.com

Correspondence will be sent via US Mail when the email attempt is unsuccessful. Correspondent Name: KNOBBE, MARTENS, OLSON & BEAR, LLP

2040 MAIN STREET Address Line 1: Address Line 2: 14TH FLOOR

Address Line 4: IRVINE, CALIFORNIA 92614

ATTORNEY DOCKET NUMBER:	QLN.015A
NAME OF SUBMITTER:	GREGORY A. HERMANSON
Signature:	/Gregory A. Hermanson/
	PATENT

REEL: 031438 FRAME: 0624 502538411

Date:	10/18/2013
Total Attachments: 9 source=ASSIGNMENT#page1.tif source=ASSIGNMENT#page2.tif source=ASSIGNMENT#page3.tif source=ASSIGNMENT#page4.tif source=ASSIGNMENT#page5.tif source=ASSIGNMENT#page6.tif source=ASSIGNMENT#page7.tif source=ASSIGNMENT#page8.tif source=ASSIGNMENT#page9.tif	

ASSIGNMENT

WHEREAS, WE,

- 1. Santosh Paul Abraham, a citizen of United States, having a mailing address located 5775 Morehouse Drive, San Diego, CA 92121-1714 and a resident of San Diego, CA,
- 2. George Cherian, a citizen of United States, having a mailing address located 5775 Morehouse Drive, San Diego, CA 92121-1714 and a resident of San Diego, CA,
- 3. Jouni Kalevi Malinen, a citizen of Finland, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714 and a resident of Tuusula, Finland,

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 APPARATUS AND METHODS OF POWER SAVE FOR WIRELESS ACCESS POINTS AND MULTI-HOP RELAYS (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. 14/010,440 filed August 26, 2013, Qualcomm Reference No. 123942, and all provisional applications relating thereto, together with U.S. Provisional Application Nos. 61/698,392, filed September 7, 2012, Qualcomm Reference No. 123942P1; 61/698,397, filed September 7, 2012, Qualcomm Reference No. 123942P2; and 61/698,955, filed September 10, 2012, Qualcomm Reference No. 123942P3, (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, 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;

PATENT QUALCOMM Ref. No. 123942 Page 3 of 3

	and the second of the second o	BY covenant that WE will these presents.	not execute any writing or do any act
Done at	Am Diego Location	, on/0/16/2073 DATE	Santosh Paul Abraham
Done at_	LOCATION	, on	George Cherian
Done at_	LOCATION	, on	Jouni Kalevi Malinen
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ASSIGNMENT

WHEREAS, WE,

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- 3. Jouni Kalevi Malinen, a citizen of Finland, having a mailing address located at 5775 Morehouse Drive, San Diego, CA 92121-1714 and a resident of Tuusula, Finland,

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 APPARATUS AND METHODS OF POWER SAVE FOR WIRELESS ACCESS POINTS AND MULTI-HOP RELAYS (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. 14/010,440 filed August 26, 2013, Qualcomm Reference No. 123942, and all provisional applications relating thereto, together with U.S. Provisional Application Nos. 61/698,392, filed September 7, 2012, Qualcomm Reference No. 123942P1; 61/698,397, filed September 7, 2012, Qualcomm Reference No. 123942P2; and 61/698,955, filed September 10, 2012, Qualcomm Reference No. 123942P3, (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, 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 or do any act whatsoever conflicting with these presents.

Done at		, on	
	LOCATION	DATE	Santosh Paul Abraham
Done at	Sedigo	on \$10/01/2013	
	LOCATION	DATE	George Cherian
Done at		, on	
	LOCATION	DATE	Jouni Kalevi Malinen

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PATENT QUALCOMM Ref. No. 123942 Page 3 of 3

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Done at _	y.Q	n	
	LOCATION	DATE	Santosh Paul Abraham
Done at	. ប	8	
	LOCATION	DATE	George Cherian
Done at	TUUSULA, FI NIA	ND n 9/2/3/3	1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-1-
i i jamen	LOCATION	DATE	Jouni Kalevi Malinen

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RECORDED: 10/18/2013

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