

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1
 Stylesheet Version v1.2

EPAS ID: PAT4080141

SUBMISSION TYPE:	NEW ASSIGNMENT	
NATURE OF CONVEYANCE:	ASSIGNMENT	
CONVEYING PARTY DATA		
	Name	Execution Date
	SHIQUN GU	09/08/2016
	CHENGJIE ZUO	09/16/2016
	STEVE FANELLI	09/28/2016
	THOMAS GEE	08/25/2016
	YOUNG KYU SONG	08/25/2016
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:	15151285	
CORRESPONDENCE DATA		
Fax Number:	(310)201-5219	
<i>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.</i>		
Phone:	310.277.7200	
Email:	Qualcomm-USPTO@seyfarth.com	
Correspondent Name:	SEYFARTH SHAW LLP	
Address Line 1:	2029 CENTURY PARK EAST, SUITE 3500	
Address Line 4:	LOS ANGELES, CALIFORNIA 90067	
ATTORNEY DOCKET NUMBER:	160625	
NAME OF SUBMITTER:	JOSEPH LUTZ	
SIGNATURE:	/JOSEPH LUTZ/	
DATE SIGNED:	10/03/2016	
Total Attachments: 12		
source=160625_Signed_Assignment_AsFiled_03October2016#page1.tif		

source=160625_Signed_Assignment_AsFiled_03October2016#page2.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page3.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page4.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page5.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page6.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page7.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page8.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page9.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page10.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page11.tif
source=160625_Signed_Assignment_AsFiled_03October2016#page12.tif

ASSIGNMENT

WHEREAS, WE,

1. **Shiqun GU**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,
2. **Chengjie ZUO**, a citizen of China, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Santee, California,
3. **Steve FANELLI**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Marcos, California,
4. **Thomas GEE**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Poway, California,
5. **Young Kyu SONG**, a citizen of Korea, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,

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 **MONOLITHIC INTEGRATION OF ANTENNA SWITCH AND DIPLEXER** (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). **15/151,285**, filed **May 10, 2016**, Qualcomm Reference No. **160625**, and all provisional applications relating thereto, together with U.S. Provisional Application No(s). **62/277,451**, filed **January 11, 2016**, Qualcomm Reference No. **160625P1**, (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 San Diego, on 9/8/2016 Shiqun GU
LOCATION DATE

Done at San Diego, on 9/16/16 Chengjie ZUO
LOCATION DATE

Done at _____, on _____ Steve FANELLI
LOCATION DATE

Done at _____, on _____ Thomas GEE
LOCATION DATE

Done at _____, on _____ Young Kye SONG
LOCATION DATE

ASSIGNMENT

WHEREAS, WE,

1. **Shiqun GU**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,
2. **Chengjie ZUO**, a citizen of China, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Santee, California,
3. **Steve FANELLI**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Marcos, California,
4. **Thomas GEE**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Poway, California,
5. **Young Kyu SONG**, a citizen of Korea, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,

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 **MONOLITHIC INTEGRATION OF ANTENNA SWITCH AND DIPLEXER** (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). 15/151,285, filed May 10, 2016, Qualcomm Reference No. 160625, and all provisional applications relating thereto, together with U.S. Provisional Application No(s). 62/277,451, filed January 11, 2016, Qualcomm Reference No. 160625P1, (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 Shiqun GU

Done at _____, on _____
LOCATION DATE Chengjie ZUO

Done at SAN DIEGO, CA, on 9/25/16
LOCATION DATE 
Steve FANELLI

Done at _____, on _____
LOCATION DATE Thomas GEE

Done at _____, on _____
LOCATION DATE Young Kyu SONG

ASSIGNMENT

WHEREAS, WE,

1. **Shiqun GU**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,
2. **Chengjie ZUO**, a citizen of China, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Santee, California,
3. **Steve FANELLI**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Marcos, California,
4. **Thomas GEE**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Poway, California,
5. **Young Kyu SONG**, a citizen of Korea, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,

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 **MONOLITHIC INTEGRATION OF ANTENNA SWITCH AND DIPLEXER** (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). **15/151,285**, filed **May 10, 2016**, Qualcomm Reference No. **160625**, and all provisional applications relating thereto, together with U.S. Provisional Application No(s). **62/277,451**, filed **January 11, 2016**, Qualcomm Reference No. **160625P1**, (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;

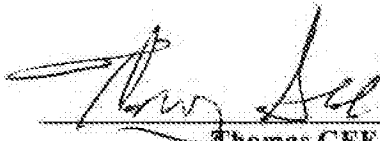
AND WE HEREBY covenant and agree that WE will communicate promptly to said ASSIGNEE, its successors, its legal representatives, and its assigns, any facts known to us respecting said INVENTIONS, and will testify in any legal proceeding, sign all lawful papers, execute all applications and certificates,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

Done at _____, on _____
LOCATION DATE Chengjie ZUO

Done at _____, on _____
LOCATION DATE Steve FANELLI

Done at San Diego, on 08/25/16
LOCATION DATE  Thomas GEE

Done at _____, on _____
LOCATION DATE Young Kyu SONG

ASSIGNMENT

WHEREAS, WE,

1. **Shiqun GU**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,
2. **Chengjie ZUO**, a citizen of China, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Santee, California,
3. **Steve FANELLI**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Marcos, California,
4. **Thomas GEE**, a citizen of The United States of America, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of Poway, California,
5. **Young Kyu SONG**, a citizen of Korea, having a mailing address located at 5775 Morehouse Drive, San Diego, California 92121-1714, U.S.A., and a resident of San Diego, California,

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 **MONOLITHIC INTEGRATION OF ANTENNA SWITCH AND DIPLEXER** (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). **15/151,285**, filed **May 10, 2016**, Qualcomm Reference No. **160625**, and all provisional applications relating thereto, together with U.S. Provisional Application No(s). **62/277,451**, filed **January 11, 2016**, Qualcomm Reference No. **160625P1**, (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 Shiqun GU

Done at _____, on _____
LOCATION DATE Chengjie ZUO

Done at _____, on _____
LOCATION DATE Steve FANELLI

Done at _____, on _____
LOCATION DATE Thomas GEE

Done at San Diego, on Aug/30/2016
LOCATION DATE  Young Kyu SONG