505016720 07/24/2018

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT5063468

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
HONGMIN CHEN	07/19/2018
QIANFAN XU	05/22/2017
LI YANG	11/06/2017
XIAO SHEN	11/06/2017
DAWEI ZHENG	07/19/2018
YUSHENG BAI	11/06/2017
HONGBING LEI	11/06/2017
ERIC DUDLEY	07/19/2018

RECEIVING PARTY DATA

Name:	Futurewei Technologies, Inc.
Street Address:	5700 Tennyson Parkway
Internal Address:	Suite 600
City:	Plano
State/Country:	TEXAS
Postal Code:	75024

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	14689601

CORRESPONDENCE DATA

Fax Number: (972)731-2289

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: 972-731-2288

Email: dallaspatents@dfw.conleyrose.com

Correspondent Name: WILLIAM H. DIETRICH

Address Line 1: 5601 GRANITE PARKWAY, SUITE 500

Address Line 4: PLANO, TEXAS 75024-6616

ATTORNEY DOCKET NUMBER: 4194-94201 (91015803US02)

NAME OF SUBMITTER: **GAYATRY S. NAIR**

SIGNATURE:	/Gayatry S. Nair/
DATE SIGNED:	07/24/2018
Total Attachments: 7	
source=4194-94201 Filed Assignment#p	page1.tif
source=4194-94201 Filed Assignment#page2.tif	
source=4194-94201 Filed Assignment#page3.tif	
source=4194-94201 Filed Assignment#page4.tif	
source=4194-94201 Filed Assignment#page5.tif	
source=4194-94201 Filed Assignment#page6.tif	
source=4194-94201 Filed Assignment#page7.tif	

WHEREAS, I/We, the undersigned inventor(s) (or one of the undersigned joint inventors), of residence as listed below, having invented certain new and useful improvements as below entitled, for which application for United States Letters Patent is made, the said application having been executed on the date set forth below; and

WHEREAS, Futurewei Technologies, Inc. ("Assignee"), a corporation organized and existing under the laws of Texas, with its principal office at 5340 Legacy Drive, Suite 175, Plano, TX 75024 is desirous of acquiring my/our entire right, title and interest in the said invention, and to the said application and any Letters Patent that may issue thereon in the United States and all other countries throughout the world;

NOW, THEREFORE, for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, I/we will assign, and hereby assign and transfer to the Assignee and the Assignee's legal representatives, successors and assigns the full and exclusive right, title and interest in and to the invention in the United States and every foreign country and the entire right, title, and interest in and to the patent application and other such applications (e.g., provisional applications, non-provisional applications, continuations, continuations-in-part, divisional, reissues, reexaminations, National Phase applications, including petty patent applications, and utility model applications) that may be filed in the United States and every foreign country on the invention, and the patents, extensions, or derivations thereof, both foreign and domestic, that may issue thereon, and I/we do hereby authorize and request the Commissioner for Patents to issue U.S. patents for said invention, or patent resulting therefrom, insofar as my interest is concerned, to the Assignee agreeably with the terms of this assignment document.

I also hereby agree to sell and to assign, and sell and assign to Assignee, its successors and assigns, my foreign rights to the invention disclosed in said application, in all countries of the world, including, but not limited to, the right to file applications and obtain patents under the terms of the International Convention, and further agree to execute any and all patent applications, assignments, affidavits, and any other papers in connection therewith necessary to perfect such patent rights.

I hereby further agree that I will communicate to Assignee, or its successors, assigns, and legal representative, any facts known to me respecting said invention or the file history thereof, and at the expense of said assignee company, testify in any legal proceedings, sign all lawful papers, execute all divisional, continuation, reissue and substitute applications, make all lawful oaths, and generally do everything possible to aid such Futurewei, its successors, assigns and nominees to obtain and enforce proper patent protection for said invention in all countries.

Futurewei Technologies, Inc. Patent Reference No. 91015803US02 Conley Rose File: 4194-94201

Page 1 of 2

IN WITNESS WHEREOF, I hereunto set my hand and seal this day and year;

Title of Invention	MOS Capacitor Optical Modulator with Transparent Conductive and Low-Refractive-Index Gate	
11	Appl. No. '	Filing Date:
	14/689,601	April 17, 2015
Signature of		
Inventor) Cz Z	
Inventor Name	Hongmin Chen	Dawei Zheng
Date	07/19/20/8	
Residence (City/State)	Davis, California	Irvine, California
Signature of Inventor		
Inventor Name	Qianfan Xu	Yusheng Bai
Date		
Residence (City/State)	San Jose, California	Los Altos Hills, California
Signature of Inventor		
Inventor Name	Li Yang	Hongbing Lei
Date		
Residence	San Jose, California	San Jose, California
(City/State)	•	
Signature of Inventor		
Inventor Name	Xiao Shen	Eric Dudley
Date		
Residence (City/State)	San Bruno, California	San Jose, California

Futurewei Technologies, Inc. Patent Reference No. 91015803US02 Conley Rose File: 4194-94201

Page 2 of 2

IN WITNESS WHEREOF, I hereunto set my hand and seal this day and year;

Title of Invention	MOS Capacitor Optical Modulator with Transparent Conductive at Low-Refractive-Index Gate	
	Appl. No. 14/689,601	Filing Date: April 17, 2015
Signature of Inventor		
Inventor Name	Hongmin Chen	Dawei Zheng
Date		
Residence (City/State)	Davis, California	Irvine, California
Signature of Inventor	ar u	
Inventor Name	Qianfan Xu	Yusheng Bai
Date	5/22/2017	
Residence (City/State)	San Jose, California	Los Altos Hills, California
Signature of Inventor		
Inventor Name Date	Li Yang	Hongbing Lei
Residence (City/State)	San Jose, California	San Jose, California
Signature of Inventor		
Inventor Name Date	Xiao Shen	Eric Dudley
Residence (City/State)	San Bruno, California	San Jose, California

Futurewei Technologies, Inc. Patent Reference No. 91015803US02 Conley Rose File: 4194-94201 Page 2 of 2

IN WITNESS WHEREOF, I hereunto set my hand and seal this day and year;

Title of Invention	MOS Capacitor Optical Modulator with Transparent Conductive and Low-Refractive-Index Gate	
	Appl. No. 14/689,601	Filing Date: April 17, 2015
Signature of Inventor		
Inventor Name	Hongmin Chen	Dawei Zheng
Date		
Residence (City/State)	Davis, California	Irvine, California
Signature of Inventor		
Inventor Name	Qianfan Xu	Yusheng Bai
Date		
Residence (City/State)	San Jose, California	Los Altos Hills, California
Signature of Inventor	ins di	ferrei
Inventor Name	Li Yang	. Hongbing Lei
Date	11/6/2017	11/6/2017
Residence (City/State)	San Jose, California	San Jose, California
Signature of Inventor	Mohin	
Inventor Name	Xiao Shen	Eric Dudley
Date	11/6/2017	
Residence (City/State)	San Bruno, California	San Jose, California

Futurewei Technologies, Inc. Patent Reference No. 91015803US02 Conley Rose File: 4194-94201

Page 2 of 2

Title of Invention	MOS Capacitor Optical Modulator with Transparent Conductive and	
	Low-Refractive-Index Gate	
10 The Control of the	Appl. No.	Filing Date:
	14/689,601	April 17, 2015
Signature of		0 0
Inventor		Laughes
Inventor Name	Hongmin Chen	Dawei Zheng
Date		July 19,2018
Residence (City/State)	Davis, California	Irvine, California
Signature of		
Inventor		
Inventor Name	Qianfan Xu	Yusheng Bai
Date		
Residence	San Jose, California	Los Altos Hills, California
(City/State)	San 3030, Camonna	Los mos mis, Camoma
Signature of		
Inventor		
Inventor Name	Li Yang	Hongbing Lei
Date		
Residence	Con Iosa California	San Jana California
(City/State)	San Jose, California	San Jose, California
Signature of		
Inventor		
Inventor Name	Xiao Shen	Eric Dudley
Date		
Residence	San Bruno, California	San Jose, California
(City/State)		Jan 1999, Camania

IN WITNESS WHEREOF, I hereunto set my hand and seal this day and year;

Title of Invention		odulator with Transparent Conductive and fractive-Index Gate	
	Appl. No.	Filing Date:	
	14/689,601	April 17, 2015	
Signature of			
Inventor			
Inventor Name	Hongmin Chen	Dawei Zheng	
Date			
Residence	Davis, California	Irvine, California	
(City/State)	Davie, Camerina		
Signature of		129 A	
Inventor		1//	
Inventor Name	Qianfan Xu	Yusheng Bai	
Date		11/6/2017	
Residence	San Jose, California	Los Altos Hills, California	
(City/State)	San vose, Camornia	Los mos mis, cumoma	
Signature of			
Inventor			
Inventor Name	Li Yang	Hongbing Lei	
Date			
Residence	Son Loop California	Can Ioan California	
(City/State)	San Jose, California	San Jose, California	
Signature of			
Inventor			
Inventor Name	Xiao Shen	Eric Dudley	
Date			
Residence (City/State)	San Bruno, California	San Jose, California	

Futurewei Technologies, Inc. Patent Reference No. 91015803US02 Conley Rose File: 4194-94201

Page 2 of 2

IN WITNESS WHEREOF, I hereunto set my hand and seal this day and year;

Title of Invention	MOS Capacitor Optical Modulator with Transparent Conductive and Low-Refractive-Index Gate	
	Appl. No.	Filing Date:
	14/689,601	April 17, 2015
Signature of		
Inventor		
Inventor Name	Hongmin Chen	Dawei Zheng
Date		
Residence	Davis, California	Irvine, California
(City/State)	Davis, Camorina	nvine, cumomu
Signature of		
Inventor		
Inventor Name	Qianfan Xu	Yusheng Bai
Date		
Residence	San Jose, California	Los Altos Hills, California
(City/State)	Sui soot, Cuiiioiliu	Dos rintos rinis, Camonia
Signature of		
Inventor		
Inventor Name	Li Yang	Hongbing Lei
Date		
Residence	San Jose, California	San Jose, California
(City/State)	San Jose, Camornia	San Jose, Camonna
Signature of		Ecc Dudley
Inventor		
Inventor Name	Xiao Shen	Eric Dudley
Date		7/19/2018
Residence	San Bruno, California	San Jose, California
(City/State)	San Diuno, Camonia	bun 5000, Camonia

Futurewei Technologies, Inc. Patent Reference No. 91015803US02 Conley Rose File: 4194-94201

RECORDED: 07/24/2018

Page 2 of 2