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PATENT ASSIGNMENT COVER SHEET

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SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
HSIU YU	03/12/2020
CHENGSHENG HUANG	03/06/2019
HAW-WEI SHU	08/26/2019
YIFANG CHANG	03/06/2019

RECEIVING PARTY DATA

Name:	HUAWEI TECHNOLOGIES CO., LTD.	
Street Address:	HUAWEI ADMINISTRATION BUILDING	
Internal Address:	BANTIAN, LONGGANG DISTRICT	
City:	SHENZHEN, GUANGDONG	
State/Country:	CHINA	
Postal Code:	518129	

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16099407

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:
 8586785070

 Email:
 apsi@fr.com

Correspondent Name: FISH & RICHARDSON P.C. (HUAWEI TECHNOLOGIES)

Address Line 1: P.O. BOX 1022

Address Line 4: MINNEAPOLIS, MINNESOTA 55440-1022

ATTORNEY DOCKET NUMBER:	43968-0375US1	
NAME OF SUBMITTER:	JOHN D. GUSTAV-WRATHALL	
SIGNATURE:	/John D. Gustav-Wrathall/	
DATE SIGNED:	03/17/2020	

Total Attachments: 6

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PATENT

Attorney Docket No. <u>43968-0375US1</u> Client Reference No. 84593904US06

ASSIGNMENT

WHEREAS, WE,

Hsiu Yu Huawei Administration Building Bantian, Longgang District Shenzhen, 518129, Guangdong P.R.CHINA; and

HAW-WEI SHU Huawei Administration Building Bantian, Longgang District Shenzhen, 518129, Guangdong P.R.CHINA; and Chengsheng Huang 18/F, No. 99, Sec. 2, Dun Hua South Road, Da An Distric, Taipei 106, Taiwan; and

Yifang Chang 18/F, No. 99, Sec. 2, Dun Hua South Road, Da An Distric, Taipei 106, Taiwan.

have invented and own a certain invention entitled:

NETWORK SEARCH METHOD AND TERMINAL DEVICE

for which invention we have executed an application (provisional or non-provisional) for a U.S. patent, which was filed on 2018-11-06, under U.S. Application No. 16099407 and

WHEREAS, HUAWEI TECHNOLOGIES CO.,LTD., Huawei Administration Building Bantian, Longgang District Shenzhen, 518129, Guangdong P.R.CHINA;, hereinafter referred to as Assignee, is desirous of acquiring the entire domestic and foreign right, title, and interest in and under the invention described in the patent application.

Now, THEREFORE, for good and valuable considerations, the receipt and sufficiency of which are hereby acknowledged, we assign and transfer to the Assignee and the Assignee's legal representatives, successors and assigns the full and exclusive rights in and to the invention in the U.S. 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, divisionals, 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 we do hereby authorize and request the Commissioner of Patents to issue U.S. patents to the above-mentioned Assignee agreeably with the terms of this assignment document.

WE HEREBY AUTHORIZE the Assignee to insert in this assignment document the filing date and application number of the application if the date and number are unavailable at the time this document is executed.

in re Appin, of Yu et al. Attorney Docket No. <u>43968-0375US1</u>

WE DO HEREBY COVENANT and agree with the Assignee that we will not execute any writing or do any act whatsoever conflicting with the terms of this assignment document set

forth herein, and that we will at any time upon request, without further or additional consideration, but at the expense of the Assignee, execute such additional assignments and other writings and do such additional acts as the Assignee may deem necessary or desirable to perfect the Assignee's enjoyment of this assignment, and render all necessary assistance in making application for and obtaining original, continuation, continuation-in-part, divisional, reissued, reexamined, and National phase patents of the U.S. or of any and all foreign countries on the invention, and in enforcing any rights or chooses in action accruing as a result of such applications or patents, and by executing statements and other affidavits, it being understood that the foregoing covenant and agreement shall bind, and inure to the benefit of, the assigns and legal representatives of all parties hereto.

IN WITNESS WHEREOF, We have hereunder set our hands on the dates shown below.

Date May 12, 2020	HSIU YU Hsin Yn
Dote	Chengsheng Huang
Date	HAW-WEI SHU
Date	Yifang Chang

PATENT

Attorney Docket No. 43968-0375US1 Client Reference No. 84593904US06

ASSIGNMENT

WHEREAS, WE,

Hsiu Yu Huawei Administration Building Bantian, Longgang District Shenzhen, 518129, Guangdong

P.R.CHINA; and

HAW-WEI SHU Huawei Administration Building Bantian, Longgang District Shenzhen, 518129, Guangdong

P.R.CHINA; and

Chengsheng Huang

18/F, No. 99, Sec. 2, Dun Hua South Road, Da An Distric, Taipei

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In re Appln. of Yu et al. Attorney Docket No. 43968-0375US1

making application for and obtaining original, continuation, continuation-in-part, divisional, reissued, reexamined, and National phase patents of the U.S. or of any and all foreign countries on the invention, and in enforcing any rights or chooses in action accruing as a result of such applications or patents, and by executing statements and other affidavits, it being understood that the foregoing covenant and agreement shall bind, and inure to the benefit of, the assigns and legal representatives of all parties hereto.

IN WITNESS WHEREOF, We have hereunder set our hands on the dates shown below.

Date	Hsiu Yu
Date Mar 06, 2019	Chang Shang Heconey Chengsheng Huang
Date	HAW-WEI SHU
Date Mar 06, 2019	Y, Fang Chang Yifang Chang

PATENT

Attorney Docket No. <u>43968-037</u>5US1 Client Reference No. 84593904US06

ASSIGNMENT

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P.R.CHINA; and

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P.R.CHINA; and

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In re Appln. of Yu et al. Attorney Docket No. 43968-0375US1

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IN WITNESS WHEREOF, We have hereunder set our hands on the dates shown below.

Date	
	Hsiu Yu
Date	
	Chengsheng Huang
Date 2019 8 - 26	; 4 15 8th Junish
	HAW-WEISHU "
Date	
	Vifana Chana