505394238 03/26/2019

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2

IBMISSION TYPE: CORRECTIVE ASSIGNMENT

EPAS ID: PAT5441032

SUBMISSION TYPE:	CORRECTIVE ASSIGNMENT
NATURE OF CONVEYANCE:	Corrective Assignment to correct the ASSIGNEE'S ADDRESS previously recorded on Reel 048074 Frame 0471. Assignor(s) hereby confirms the ASSIGNMENT.

CONVEYING PARTY DATA

Name	Execution Date
JUI-YAO LAI	04/22/2016
YING-YAN CHEN	04/22/2016
YEN-MING CHEN	04/22/2016
SAI-HOOI YEONG	04/22/2016
YUNG-SUNG YEN	04/22/2016
RU-GUN LIU	04/22/2016

RECEIVING PARTY DATA

Name:	TAIWAN SEMICONDUCTOR MANUFACTURING CO., LTD.	
Street Address:	dress: NO. 8, LI-HSIN RD. 6, SCIENCE-BASED INDUSTRIAL PARK	
City:	HSINCHU	
State/Country:	TAIWAN	
Postal Code:	300	

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16206803

CORRESPONDENCE DATA

Fax Number: (202)756-8087

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: 202-756-8000

Email: bpugh@mwe.com, WDCIPPTSClerks@mwe.com,

ipdocketmwe@mwe.com

Correspondent Name: MCDERMOTT WILL & EMERY, LLP Address Line 1: THE MCDERMOTT BUILDING

Address Line 2: 500 NORTH CAPITOL STREET, N.W.

Address Line 4: WASHINGTON, D.C. 20001

ATTORNEY DOCKET NUMBER: 095714-0846

NAME OF SUBMITTER: BRENDA PUGH

SIGNATURE: /Brenda Pugh/

505394238 REEL: 048711 FRAME: 0343

DATE SIGNED:	03/26/2019	
Total Attachments: 6		
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PATENT REEL: 048711 FRAME: 0344 Assignment Page 1 of 3

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2

SUBMISSION TYPE: CORRECTIVE ASSIGNMENT	
NATURE OF CONVEYANCE:	Corrective Assignment to correct the EXECUTION DATE OF THE FIFTH AND SIXTH INVENTORS TO READ 04/22/2016 previously recorded on Reel 047645 Frame 0946. Assignor(s) hereby confirms the ASSIGNMENT.

CONVEYING PARTY DATA

Name	Execution Date
JUI-YAO LAI	04/22/2016
RU-GUN LIU	04/22/2016
SAI-HOOI YEONG	04/22/2016
YEN-MING CHEN	04/22/2016
YUNG-SUNG YEN	04/22/2016
YING-YAN CHEN	04/22/2016

RECEIVING PARTY DATA

· Nama·	TAIWAN SEMICONDUCTOR	
T (allie)	MANUFACTURING COMPANY, LTD.	
Street	NO. 8 LI-HSIN RD. 6, SCIENCE-BASED	
Address:	INDUSTRIAL PARK	
City:	HSINCHU	
State/Country:	TAIWAN	
Postal Code:	300	

Assignment Page 2 of 3

PROPERTY NUMBERS Total: 1

Property Type	Number	
Application Number:	16206803	

CORRESPONDENCE DATA

Fax Number: (202)756-8087 **Phone:** 202-756-8000

bpugh@mwe.com,

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WDCIPPTSClerks@mwe.com

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.

Correspondent

MCDERMOTT WILL & EMERY LLP

Name:

Address Line 1: THE MCDERMOTT BUILDING

Address Line 2: 500 NORTH CAPITOL STREET, N.W.

Address Line 4: WASHINGTON, D.C. 20001

ATTORNEY	[
-----------------	---

DOCKET NUMBER:

095714-0846

NAME OF SUBMITTER:

BRENDA PUGH

Signature:

/Brenda Pugh/

Date:

01/15/2019

Total Attachments: 6

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RECEIPT INFORMATION

EPAS ID: PAT5325382 **Receipt Date:** 01/15/2019

COMBINED DECLARATION AND ASSIGNMENT FOR PATENT APPLICATION

As a below named inventor, I hereby declare that:

Sylais 2016/04/22 09:50:29

I believe I am the original or an original joint inventor of a claimed invention in the application for which a patent is sought on the invention entitled:

SEM	ICONDUCTOR DEVICE AND A METHOD FOR FABRICATING THE SAME
which	application is:
\boxtimes	attached, or
	United States application number or PCT international application number filed on
The ab	ove-identified application was made or authorized to be made by me.
execute request	event that the filing date and/or application number are not entered above at the time I this document, and if such information is deemed necessary, I hereby authorize and the registered practitioners of McDermott Will & Emery LLP , associated with the ner Number 20277, to insert above the filing date and/or application number of the ation.
	by acknowledge that any willful false statement made in this declaration is punishable 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

Page 1 of 3

DM_US 72128248-1.095714.0118

PATENT REEL: 048711 FRAME: 0348

ASSIGNMENT

ivhaif 2018/00/22 09:55.25

For good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, I hereby assign to:

TAIWAN SEMICONDUCTOR MANUFACTURING COMPANY, LTD.

having an address at No. 8, Li-Hsin Rd. 6, Hsinchu Science-Based Industrial Park, Hsinchu 300, Taiwan (hereinafter designated as the Assignee), the entire (100%) right, title and interest for the United States as defined in 35 USC §100, in the invention described in the application identified in this document.

I hereby confirm any prior assignment to Assignee, and to the extent that I have not already done so, agree to assign, and hereby do, sell, assign and transfer unto Assignee and its successors in interest, the full and exclusive right, title and interest in the United States of America and throughout the world, including the right to claim priority under the laws of the United States, the Paris Convention, and any foreign countries, to the inventions as described in the aforesaid application, to the aforesaid application itself, and all divisions, continuations, continuations-in-part, or other applications claiming priority directly or indirectly from the aforesaid application, and any United States or foreign Letters Patent, utility model, or other similar rights which may be granted thereon, including reissues, reexaminations and extensions thereof, and all copyright rights throughout the world in the aforesaid application and the subject matter disclosed therein, these rights, title and interest to be held and enjoyed by Assignee to the full end of the term for which the Letters Patent, utility model, or other similar rights, are granted and any extensions thereof as fully and entirely as the same would have been held by the undersigned had this assignment and sale not been made, and the right to sue for, and recover for past infringements of, or liabilities for, any of the rights relating to any of the applications, patents, utility models, or other similar rights, resulting therefrom, and the copyright rights:

I hereby covenant and agree to execute all instruments or documents required or requested for the making and prosecution of any applications of any type for patent, utility model, or other similar rights, and for copyright, in the United States and in all foreign countries including, but not limited to, any provisional, continuation, continuation-in-part, divisional, renewal or substitute thereof, and as to letters patent any reissue, re-examination, or extension thereof, and for litigation regarding, or for the purpose of protecting title and to the said invention, the United States application for patent, or Letters Patent therefor, and to testify in support thereof, for the benefit of Assignee without further or other compensation than that above set forth;

I hereby covenant that no assignment, sale, license, agreement or encumbrance has been or will be entered into which would conflict with this Assignment.

PATENT REEL: 048711 FRAME: 0349

Legal name of first inventor	
Jui-Yao LAI	
First inventor's signature	Date
教授 Jui Jao, Law	2016.4.22
,	
Legal name of second inventor, if any	VVVV
RU-GUN LIU	NET EFFECT OF THE STATE OF THE
Second inventor's signature	Date
Ru-Gum LM.	2016.4.37
	/
Legal name of third inventor, if any	
Sai ₇ Hooi YEONG	
Third inventor's signature	Date
女人 本稿で筒	2016/4(22
V ,	
Legal name of fourth inventor, if any Von Ming CHENI	
Yen-Ming CHEN Fourth inventor's signature	Floric
"(Cn-My Chen.	2016/4/72
(0.10)	
Legal name of fifth inventor, if any	***************************************
Yung-Sung YEN	
Fifth inventor's signature	Date
Cung-Sung Cer	12016, 4.22
	777 10 E 10 C
Legal name of sixth inventor, if any	
Ying-Yan CHEN	***************************************
Sixth inventor's signature	Date
3 中 6	2016,4,22
1 1/2 1111	1 - 1 /