502951568 08/26/2014

### PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT2998166

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

#### **CONVEYING PARTY DATA**

Name	Execution Date
Wen-Yin Weng	08/04/2014
Cheng-Tung Huang	08/04/2014
Ya-Ru Yang	08/04/2014
Yi-Ting Wu	08/04/2014
Yu-Ming Lin	08/04/2014
Jen-Yu Wang	08/04/2014

#### **RECEIVING PARTY DATA**

Name:	UNITED MICROELECTRONICS CORP.	
Street Address:	No.3, Li-Hsin Road 2, Science-Based Industrial Park	
City:	Hsin-Chu City	
State/Country:	TAIWAN	

### **PROPERTY NUMBERS Total: 1**

Property Type	Number
Application Number:	14469566

#### **CORRESPONDENCE DATA**

**Fax Number:** (703)997-4517

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.

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Email: Patent.admin.uspto.cr@naipo.com

Correspondent Name: WINSTON HSU Address Line 1: P.O.BOX 506

Address Line 4: MERRIFIELD, VIRGINIA 22116

ATTORNEY DOCKET NUMBER:	NAUP2318USA
NAME OF SUBMITTER:	KATE YEH
SIGNATURE:	/KATE YEH/
DATE SIGNED:	08/26/2014

**Total Attachments: 12** source=2041269#page1.tif source=2041269#page2.tif

502951568 PATENT REEL: 033615 FRAME: 0189

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PATENT REEL: 033615 FRAME: 0190

### Title of Invention:

### SUBSTRATE OF SEMICONDUCTOR DEVICE AND METHOD FOR FABRICATING THE SAME

As the below named inventor, I here This declaration is directed to:	by declare that:				
☑ The attached application, or					
☐ United States application nu	filed on	, or			
☐ PCT international application	number	filed on	_		
The above-identified application was	made or authorized to be made	by me.			
l believe that I am the original invento application.	or or an original joint inventor of a	a claimed invention in the			
l hereby acknowledge that any willfu under18 U.S.C. 1001 by fine or impri	I false statement made in this dessenment of not more than five (5	claration is punishable i) years, or both.			
In consideration of the payment by	UNITED MICROELECTROI CORP.	NICS having a postal add	dress of		
No.3, Li-Hsin Road 2, Science	-Based Industrial Park, Hs	in-Chu City 300, Taiwaı	n, R.O.C.		
(referred to as "ASSIGNEE"below) to acknowledged, andfor other good an	I of the sum of One Dollar (\$ 1.0 d valuable consideration.	00), the receipt of which is he	ereby		
I hereby sell, assign and transfer to A the entire right, title and interest in ar invention as above-identified applicat invention by the above application or substitutes, or extensions thereof, an	nd to any and all improvements watton and, in and to, all Letters Pai any continuations, continuation-	hich are disclosed in the tent to be obtained for said in-part, divisions, renewals.			
I hereby covenant that no assignment, sale, agreement or encumbrance has been or will be made or entered into which would conflict with this assignment;					
I further covenant that ASSIGNEE wi and documents relating to said inven known and accessible to I and will te related thereto and will promptly exec	tion and said Letters Patent and stify as to the same in any interfe	legal equivalents as may be erence, litigation proceeding	cts		
representatives any and all papers, instruments or affidavits required to apply for, obtain, maintain, issue and enforce said application, said invention and said Letters Patent and said equivalents thereof which may be necessary or desirable to carry out the proposes thereof.  IN WINTNESS WHEREOF, I have hereunto set hand and seal thisAUG0_4_2014(Date of signing)					
Note: An application data sheet (PTC inventive entity, must accompany this	o/SB/14 or equivalent), including s form. Use this form for <u>each ad</u>	naming the entire			

Page 1 of 12

LEGAL NAME OF I	NVENTOR(ASS	IGNOR)				
Inventor. Wen-	Yin Weng		Date:	AUG	0 4 2014	
Signature: \	Ven - Yin	Jewy,				
		4				

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NPO#NAU-P2318-USA:0 CUST#UMCD-2014-0285

### Title of Invention:

### SUBSTRATE OF SEMICONDUCTOR DEVICE AND METHOD FOR FABRICATING THE SAME

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I hereby acknowledge that any willfu under18 U.S.C. 1001 by fine or impr	Il false statement mad isonment of not more	e in this declaration than five (5) years	on is punishab s, or both.	ole
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(referred to as "ASSIGNEE"below) to acknowledged, andfor other good ar	o I of the sum of One and valuable considerate	Dollar (\$ 1.00), the ion.	e receipt of wh	nich is hereby
I hereby sell, assign and transfer to a the entire right, title and interest in a invention as above-identified applica invention by the above application of substitutes, or extensions thereof, ar	nd to any and all impro ition and, in and to, all r any continuations, co	ovements which a Letters Patent to ontinuation-in-part	re disclosed in be obtained for divisions, ren	n the or said newals.
I hereby covenant that no assignment, sale, agreement or encumbrance has been or will be made or entered into which would conflict with this assignment;				
I further covenant that ASSIGNEE w and documents relating to said inver known and accessible to I and will te related thereto and will promptly exe	ntion and said Letters estify as to the same in	Patent and legal e any interference.	equivalents as	may be
representatives any and all papers, i maintain, issue and enforce said app equivalents thereof which may be ne IN WINTNESS WHEREOF, I have h	olication, said invention ecessary or desirable t	n and said Letters to carry out the pro	Patent and sa	aid f. (Date of signing)
Note: An application data sheet (PTC				

Page 3 of 12

NPO#NAU-P2318-USA:0 CUST#UMCD-2014-0285

Inventor: Cheng-Tung Huang

Date: AUG 0 4 2014

Signature: Cheng-Tung I Jung

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NPO#NAU-P2318-USA:0 CUST#UMCD-2014-0285

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I hereby sell, assign and transfer to a the entire right, title and interest in an invention as above-identified applica invention by the above application or substitutes, or extensions thereof, ar	nd to any and all impr tion and, in and to, al rany continuations, c	ovements which are Letters Patent to b ontinuation-in-part,	e disclosed in the be obtained for said divisions, renewals.	IEE	
I hereby covenant that no assignment, sale, agreement or encumbrance has been or will be made or entered into which would conflict with this assignment;					
I further covenant that ASSIGNEE will, upon its request, be provided promptly with all pertinent facts and documents relating to said invention and said Letters Patent and legal equivalents as may be known and accessible to I and will testify as to the same in any interference, litigation proceeding related thereto and will promptly execute and deliver to ASSIGNEE or its legal					
representatives any and all papers, in maintain, issue and enforce said app equivalents thereof which may be no IN WINTNESS WHEREOF, I have he	elication, said invention ecessary or desirable	n and said Letters F to carry out the pro	Patent and said poses thereof.	of signing)	
Note: An application data sheet (PTC inventive entity, must accompany this	D/SB/14 or equivalent s form. Use this form	), including naming for each additional i	the entire inventor.		

Page 5 of 12

LEGAL NAME OF INVENTOR(ASSIGNOR)

Inventor: Ya-Ru Yang

Date:

AUG 0 4 2014

Signature:

Tarka lang

Page 6 of 12

### Title of Invention:

### SUBSTRATE OF SEMICONDUCTOR DEVICE AND METHOD FOR FABRICATING THE SAME

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I hereby covenant that no assignmer entered into which would conflict with	nt, sale, agreement c n this assignment;	r encumbrance has	s been or will be	made or
I further covenant that ASSIGNEE w and documents relating to said inven known and accessible to I and will te related thereto and will promptly exe	ition and said Letters stify as to the same	Patent and legal e in any interference,	quivalents as ma	av be
representatives any and all papers, i maintain, issue and enforce said app equivalents thereof which may be ne IN WINTNESS WHEREOF, I have he	olication, said invention ecessary or desirable	on and said Letters to carry out the pro	Patent and said poses thereof.	Date of signing)
Note: An application data sheet (PTC inventive entity, must accompany this				

Page 7 of 12

LEGAL NAME OF INVENTOR(ASSIGNOR)	
Inventor: Yi-Ting Wu Date:	AUG 0 4 2014
Signature: Yu-Ting WU	

NPO#NAU-P2318-USA:0 CUST#UMCD-2014-0285 Page 8 of 12

F#NPO-P0002E-US1201 DSC0-103U006595

PATENT REEL: 033615 FRAME: 0198

#### Title of Invention:

### SUBSTRATE OF SEMICONDUCTOR DEVICE AND METHOD FOR FABRICATING THE SAME

As the below named inventor, I here This declaration is directed to:	by declare that:			
☑ The attached application, or				
☐ United States application nu	filed o	filed on		
☐ PCT international application	number	filed on		
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I hereby covenant that no assignment entered into which would conflict with	it, sale, agreement or i this assignment;	encumbrance has	been or will be	made or
I further covenant that ASSIGNEE wi and documents relating to said inven known and accessible to I and will te related thereto and will promptly exec	tion and said Letters I stify as to the same in	Patent and legal eq anv interference. li	uivalents as m	nav be
representatives any and all papers, in maintain, issue and enforce said app equivalents thereof which may be ne IN WINTNESS WHEREOF, I have he	lication, said inventior cessary or desirable t	n and said Letters F o carry out the prop	atent and said said said said said said said sai	d (Date of signing)
Note: An application data sheet (PTC inventive entity, must accompany this	0/SB/14 or equivalent) s form. Use this form f	, including naming or <u>each additional i</u>	the entire nventor	

Page 9 of 12

NPO#NAU-P2318-USA:0 CUST#UMCD-2014-0285

LEGAL NAME OF INVENTOR(ASSIGNOR)

Inventor.

Yu-Ming Lin

Date:

AUG 0 4 2014

Signature:

NPO#NAU-P2318-USA:0

CUST#UMCI)-2014-0285

Yu-Ming Lin

Page 10 of 12

F#NPO-P0002E-US1201 DSC0-103U006595

РАТ

PATENT REEL: 033615 FRAME: 0200

### Title of Invention:

### SUBSTRATE OF SEMICONDUCTOR DEVICE AND METHOD FOR FABRICATING THE SAME

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I hereby sell, assign and transfer to A the entire right, title and interest in ar invention as above-identified application or substitutes, or extensions thereof, an	nd to any and all improvements whition and, in and to, all Letters Pate any continuations, continuation-in	hich are disclosed in the ent to be obtained for said	IEE
I hereby covenant that no assignmen entered into which would conflict with	t, sale, agreement or encumbrand this assignment;	ce has been or will be made	or
I further covenant that ASSIGNEE wi and documents relating to said inven- known and accessible to I and will tes related thereto and will promptly exec	tion and said Letters Patent and le stify as to the same in any interfer	egal equivalents as may be rence. litigation proceeding	ts
representatives any and all papers, ir maintain, issue and enforce said appl equivalents thereof which may be ned IN WINTNESS WHEREOF, I have he	lication, said invention and said Le cessary or desirable to carry out ti	etters Patent and said he proposes thereof.	of signing)
Note: An application data sheet (PTC inventive entity, must accompany this	n/SB/14 or equivalent), including n form. Use this form for <u>each add</u>	aming the entire itional inventor.	

Page 11 of 12

NPO#NAU-P2318-USA:0 CUST#UMCD-2014-0285

LEGAL NAM	IE OF INVE	NTORMAGOR	anor)				
Inventor:	Jen-Yu W	lang .		Date:	AUG 0	4 2014	
Signature:		Jen - Yn	Wary				
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F#NPO-P0002E-US1201 DSC0-103U006595

**PATENT** 

**RECORDED: 08/26/2014** 

NPO#NAU-P2318-USA:0

CUST#UMCD-2014-0285

**REEL: 033615 FRAME: 0202**