## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT3959338

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

## **CONVEYING PARTY DATA**

Name	Execution Date
HONGTAEK LIM	05/09/2016
KANGSOO KIM	05/13/2016
HOJUN KIM	05/09/2016
JEONGHOON NAM	05/09/2016
SEJUN PARK	05/11/2016

## **RECEIVING PARTY DATA**

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State/Country:	KOREA, REPUBLIC OF
Postal Code:	16677

## **PROPERTY NUMBERS Total: 1**

Property Type	Number
Application Number:	15208787

## **CORRESPONDENCE DATA**

**Fax Number:** (703)207-0003

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Address Line 2: SUITE 500

Address Line 4: FALLS CHURCH, VIRGINIA 22042

ATTORNEY DOCKET NUMBER:	262/1071_00
NAME OF SUBMITTER:	EUGENE M. LEE
SIGNATURE:	/Eugene M. Lee/
DATE SIGNED:	07/13/2016
	This document serves as an Oath/Declaration (37 CFR 1.63).

PATENT REEL: 039145 FRAME: 0012

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PATENT REEL: 039145 FRAME: 0013

# COMBINED DECLARATION (37 CFR §1.63) FOR UTILITY PATENT APPLICATION AND ASSIGNMENT FORM<sup>1</sup>

The undersigned acknowledges that this document is being used both as an assignment of the invention and as the declaration (37 CFR 1.63) for a Utility or Design Application.

WHEREAS, the undersigned, hereinafter referred to collectively as Assignor, has invented:

Title: GAS MIXI THE SAM	ER AND SEMICONDUCTOR DEVICE E	E FABRICATING APPA	RATUSES INCLUDING
for which Assignor patent.	r is about to make or has made U	nited States or Interna	tional application for
WHEREAS, as a be	low named inventor(s), I/(we) he	ereby declare that:	
Section I. Declara	tion		
This declaration is	directed to:		
	ned U.S. non-provisional patent a	pplication, or	
□ file	U.S. non-provisional patent a		
□ file	PCT international patent app		,
The above-identifi	ied application was made or auth	iorized to be made by i	ne (us).
	I am (we are) the original invent pove-identified application.	or (original joint invent	tors) of a claimed
- 1 Mai - 1 Tu	rowledge that any wiliful false sta 18 U.S.C. 1001 by fine or impriso		
<sup>1</sup> This form requires 1	the use of an Application Data Sheet.		
SEC Ref No.	IH-201506-011-1-US0 /	Attorney Ref No.	262/1071_00
COMBINED DECLA	ARATION (37 CFR 1.63) FOR UTILITY	PATENT APPLICATION AP	ND ASSIGNMENT FORM

PATENT

REEL: 039145 FRAME: 0014

I hereby state that I have reviewed and understand the contents of the above identified application, including the claims.

I acknowledge that I am aware of the duty to disclose information which is material to patentability as defined in 37 CFR § 1.56.

## Section II. Assignment

In consideration of the sum of One Dollar (\$1.00) and other good and valuable consideration paid to each of the undersigned, the undersigned hereby sell(s) and assign(s) to

## Samsung Electronics Co., Ltd.

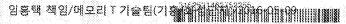
having an address at 129, Samsung-ro, Yeongtong-gu, Suwon-si, Gyeonggi-do 16677, Republic of Korea (hereinafter designated as the Assignee), the entire (100%) right, title and interest for the United States as defined in 35 USC §100, in the invention described in the application identified in Section I of this document.

Assignor hereby confirms any prior assignment to Assignee, and to the extent that Assignor has not already done so, agrees to assign, and hereby does, 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 Assignor 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;

Assignor hereby covenants and agrees 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

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COMBINED DECLARATION (37 CFR 1.63) FOR UTILITY PATENT APPLICATION AND ASSIGNMENT FORM



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:

Assignor hereby covenants that no assignment, sale, license, agreement or encumbrance has been or will be entered into which would conflict with this Assignment; and

Assignor hereby requests the United States Patent and Trademark Office to issue the Letters Patent of the United States of America to Assignee, and requests that any official of any country or countries foreign to the United States, whose duty it is to issue or grant patents and applications as aforesaid, to issue the Letters Patent, Utility Model Registration or other similar right to Assignee.

The undersigned hereby grant(s) the law firm of LEE & MORSE, PC the power to insert on this Declaration and Assignment any further identification which may be necessary or desirable in order to comply with the rules of the U.S. Patent and Trademark Office for recordation of this document.

## Section III. Inventor(s)/Assignor(s) Signature(s)

LEGAL NAME OF	Family Name	First Given Name	Second Given Name		
FIRST	LIM	Hongtaek			
SIGNATURE _	<u> </u>	DATE	2016.05.09.		

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LEGAL NAME OF	Family Name	Fir	st Given Name	Second Given Name
SECOND	KIM		Kangsoo	
<u></u>				
		2	DATE	
SIGNATURE			DATE	6t.13,2016
	<u> </u>			

LEGAL NAME OF THIRD	Family Name	First Given Name	Second Given Name
INVENTOR/ASSIGNOR	KIM	Hojun	
	114		
SIGNATURE	Jan	DATE	05.09, 2016
		현실 (1985년 - 1985년 - 1 1985년 - 1985년	

LEGAL NAME OF FOURTH	Family Name		First Given Nam	e Se	Second Given Name			
INVENTOR/ASSIGNOR	NAM		Jeonghoon					
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SIGNATURE	duly	2.	D/	ATE	Ist of	) 10 <u>5</u>		
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LEGAL NAME OF FIFTH	Family Name	First Given Nar	me Second Given Name
INVENTOR/ASSIGNOR	PARK	Sejun	
SIGNATURE	[		SATE S. 11-2016

262/1071\_00 Attorney Ref No. HI-201506-011-1-US0 SEC Ref No.

COMBINED DECLARATION (37 CFR 1.63) FOR UTILITY PATENT APPLICATION AND ASSIGNMENT FORM

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**RECORDED: 07/13/2016**