504925131 05/22/2018

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 EPAS ID: PAT4971877 Stylesheet Version v1.2

SUBMISSION TYPE: NEW ASSIGNMENT NATURE OF CONVEYANCE: ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
TATSUO SHIMIZU	05/09/2018
TAKASHI SHINOHE	05/10/2018
RYOSUKE IIJIMA	05/11/2018

RECEIVING PARTY DATA

Name:	KABUSHIKI KAISHA TOSHIBA
Street Address:	1-1, Shibaura 1-chome, Minato-Ku
City:	Tokyo
State/Country:	Japan
Postal Code:	105-8001

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	15891935

CORRESPONDENCE DATA

Fax Number: (703)413-2220

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: (703) 413-3000

Email: dgebremichael@oblon.com

Correspondent Name: OBLON, ET AL. Address Line 1: 1940 DUKE STREET

Address Line 4: ALEXANDRIA, VIRGINIA 22314

ATTORNEY DOCKET NUMBER:	511231US
NAME OF SUBMITTER:	DEJEN GEBREMICHAEL
SIGNATURE:	/Dejen Gebremichael/
DATE SIGNED:	05/22/2018
	This document serves as an Oath/Declaration (37 CFR 1.63).

Total Attachments: 3

source=511231usAssignment#page1.tif source=511231usAssignment#page2.tif source=511231usAssignment#page3.tif

> **PATENT REEL: 045870 FRAME: 0140** 504925131

DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76) AND ASSIGNMENT FOR SINGLE ASSIGNEE

Title of Invention	SEMICONDUCTOR DEVICE, INVERTER CIRCUIT, DRIVE DEVICE, VEHICLE, AND ELEVATOR
As the below name	d inventor, I hereby declare that:
This declaration	The attached application, or
is directed to:	United States application or PCT international application number 15/891,935 filed on February 8, 2018
The above-identifie	ed application was made or authorized to be made by me.
I believe that I am t	he original inventor or an original joint inventor of a claimed invention in the application.
(hereinafter referre 105-8001, Japan, i	d to as "ASSIGNEE") having places of business at: 1-1 Shibaura 1-chome, Minato-ku, Tokyo, s desirous of acquiring the entire right, title and interest in and to said invention and in and to any may be granted therefore in the United States and its territorial possessions and in any and all
acknowledged, and said ASSIGNEE, the and in all foreign cother relevant Inter- interest in and to a	FORE, in consideration of the sum of FIVE DOLLARS (\$5.00), the receipt whereof is hereby for other good and valuable consideration, I, by these presents do sell, assign and transfer unto the full and exclusive right to the said invention in the United States and its territorial possessions countries (including the right to claim priority under the terms of the International Convention and mational Treaties and Arrangements from the aforesaid application) and the entire right, title and may and all Letters Patent which may be granted therefor in the United States and its territorial and any and all foreign countries and in and to any and all divisions, reissues, continuations, newals thereof.
any and all foreign assignee of my ent (his) successors an	ze and request the Patent Office Officials in the United States and its territorial possessions and countries to issue any and all of said Letters Patent, when granted, to said ASSIGNEE as the ire right, title and interest in and to the same, for the sole use and behoof of said ASSIGNEE, its d assigns, to the full end of the term for which said Letters Patent may be granted, as fully and a would have been held by me had this Assignment and sale not been made.
respecting said in continuation, subst all of said Letters possible to aid said	that I will communicate to said ASSIGNEE or its (his) representatives any facts known to me vention, and testify in any legal proceeding, sign all lawful papers, execute all divisional, itute, renewal and reissue applications, execute all necessary assignment papers to cause any and Patent to be issued to said ASSIGNEE, make all rightful oaths, and, generally do everything ASSIGNEE, its (his) successors and assigns, to obtain and enforce proper protection for said ited States and its territorial possessions and in any and all foreign countries.
	redge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 ment of not more than five (5) years, or both.
LEGAL NAME OF	INVENTOR
Inventor: Tatsuo	SHIMIZU Date: May 9, 22/3
Signature: 7.1	The Olivery 10

OBLON, McCLELLAND, MAIER & NEUSTADT, L.L.P.

ATTORNEYS AT LAW 1940 DUKE STREET ALEXANDRIA, VIRGINIA 22314

> PATENT REEL: 045870 FRAME: 0141

DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76) AND ASSIGNMENT FOR SINGLE ASSIGNEE

Invention	VEHICLE, AND ELEVATOR
As the below name	d inventor, I hereby declare that:
This declaration	The attached application, or
is directed to:	United States application or PCT international application number 15/891,935 filed on February 8, 2018
The above-identifie	ed application was made or authorized to be made by me.
I believe that I am t	he original inventor or an original joint inventor of a claimed invention in the application.
(hereinafter referre 105-8001, Japan, i	d to as "ASSIGNEE") having places of business at: 1-1 Shibaura 1-chome, Minato-ku, Tokyo, s desirous of acquiring the entire right, title and interest in and to said invention and in and to any may be granted therefore in the United States and its territorial possessions and in any and all
NOW, THEREI acknowledged, and said ASSIGNEE, the and in all foreign cother relevant Inter- interest in and to a	FORE, in consideration of the sum of FIVE DOLLARS (\$5.00), the receipt whereof is hereby for other good and valuable consideration, I, by these presents do sell, assign and transfer unto the full and exclusive right to the said invention in the United States and its territorial possessions countries (including the right to claim priority under the terms of the International Convention and mational Treaties and Arrangements from the aforesaid application) and the entire right, title and may and all Letters Patent which may be granted therefor in the United States and its territorial and any and all foreign countries and in and to any and all divisions, reissues, continuations, mewals thereof.
any and all foreign assignee of my ent (his) successors an	ze and request the Patent Office Officials in the United States and its territorial possessions and a countries to issue any and all of said Letters Patent, when granted, to said ASSIGNEE as the ire right, title and interest in and to the same, for the sole use and behoof of said ASSIGNEE, its d assigns, to the full end of the term for which said Letters Patent may be granted, as fully and e would have been held by me had this Assignment and sale not been made.
respecting said in continuation, subst all of said Letters possible to aid said	that I will communicate to said ASSIGNEE or its (his) representatives any facts known to me vention, and testify in any legal proceeding, sign all lawful papers, execute all divisional, itute, renewal and reissue applications, execute all necessary assignment papers to cause any and Patent to be issued to said ASSIGNEE, make all rightful oaths, and, generally do everything d ASSIGNEE, its (his) successors and assigns, to obtain and enforce proper protection for said lited States and its territorial possessions and in any and all foreign countries.
	vledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 ment of not more than five (5) years, or both.
LEGAL NAME O	FINVENTOR
Inventor: Takash	i SHINOHE Date: May 10, 2018
Signature:	Takashi Slimbe

OBLON, McCLELLAND, MAIER & NEUSTADT, L.L.P.

ATTORNEYS AT LAW 1940 DUKE STREET ALEXANDRIA, VIRGINIA 22314

> PATENT REEL: 045870 FRAME: 0142

DECLARATION (37 CFR 1.63) FOR UTILITY OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 CFR 1.76) AND ASSIGNMENT FOR SINGLE ASSIGNEE

Title of SEMICONDUCTOR DEVICE, INVERTER CIRCUIT, DRIVE DEVICE, VEHICLE, AND ELEVATOR
As the below named inventor, I hereby declare that:
This declaration [] The attached application, or
is directed to: United States application or PCT international application number 15/891,935 filed on February 8, 2018
The above-identified application was made or authorized to be made by me.
I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.
WHEREAS, Kabushiki Kaisha Toshiba (hereinafter referred to as "ASSIGNEE") having places of business at: 1-1 Shibaura 1-chome, Minato-ku, Tokyo, 105-8001, Japan, is desirous of acquiring the entire right, title and interest in and to said invention and in and to any Letters Patent that may be granted therefore in the United States and its territorial possessions and in any and all foreign countries;
NOW, THEREFORE, in consideration of the sum of FIVE DOLLARS (\$5.00), the receipt whereof is hereby acknowledged, and for other good and valuable consideration, I, by these presents do sell, assign and transfer unto said ASSIGNEE, the full and exclusive right to the said invention in the United States and its territorial possessions and in all foreign countries (including the right to claim priority under the terms of the International Convention and other relevant International Treaties and Arrangements from the aforesaid application) and the entire right, title and interest in and to any and all Letters Patent which may be granted therefor in the United States and its territorial possessions and in any and all foreign countries and in and to any and all divisions, reissues, continuations, substitutions and renewals thereof.
I hereby authorize and request the Patent Office Officials in the United States and its territorial possessions and any and all foreign countries to issue any and all of said Letters Patent, when granted, to said ASSIGNEE as the assignee of my entire right, title and interest in and to the same, for the sole use and behoof of said ASSIGNEE, its (his) successors and assigns, to the full end of the term for which said Letters Patent may be granted, as fully and entirely as the same would have been held by me had this Assignment and sale not been made.
Further, I agree that I will communicate to said ASSIGNEE or its (his) representatives any facts known to me respecting said invention, and testify in any legal proceeding, sign all lawful papers, execute all divisional, continuation, substitute, renewal and reissue applications, execute all necessary assignment papers to cause any and all of said Letters Patent to be issued to said ASSIGNEE, make all rightful oaths, and, generally do everything possible to aid said ASSIGNEE, its (his) successors and assigns, to obtain and enforce proper protection for said invention in the United States and its territorial possessions and in any and all foreign countries.
I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.
LEGAL NAME OF INVENTOR
Inventor: Ryosuke IIJIMA Date: May 11, 2018
Signature: Re sales living

 $OBLON, McCLELLAND, MAIER \&\ NEUSTADT, L.L.P.$

ATTORNEYS AT LAW 1940 DUKE STREET ALEXANDRIA, VIRGINIA 22314

> PATENT REEL: 045870 FRAME: 0143

RECORDED: 05/22/2018