

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1
 Stylesheet Version v1.2

EPAS ID: PAT5263102

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT
CONVEYING PARTY DATA	
Name	Execution Date
FRANCOIS DRUILHE	08/13/2018
RECEIVING PARTY DATA	
Name:	STMICROELECTRONICS (ALPS) SAS
Street Address:	12 RUE JULES HOROWITZ
City:	GRENOBLE
State/Country:	FRANCE
Postal Code:	F-38000
PROPERTY NUMBERS Total: 1	
Property Type	Number
Application Number:	16207696
CORRESPONDENCE DATA	
Fax Number:	(254)870-4338
<i>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.</i>	
Phone:	2144202164
Email:	IPDAL@crowedunlevy.com
Correspondent Name:	CROWE & DUNLEVY - ST-EP INTELLECTUAL PRO
Address Line 1:	1919 MCKINNEY AVENUE
Address Line 2:	SUITE 100
Address Line 4:	DALLAS, TEXAS 75201
ATTORNEY DOCKET NUMBER:	50649-01387 ALPS
NAME OF SUBMITTER:	ANDRE M. SZUWALSKI
SIGNATURE:	/Andre M. Szuwalski/
DATE SIGNED:	12/03/2018
Total Attachments: 2	
source=50649_01387_SignedAssn_Alps#page1.tif	
source=50649_01387_SignedAssn_Alps#page2.tif	

CUSTOMER NO. 117381

PATENT APPLICATION
Attorney Docket No. 50649-01387

ASSIGNMENT

Application Number: **Filed Concurrently Herewith or Filed on _____, 2018,**
as US Serial No. _____

Application Country/Region: **US**

Application Title: **CONTROL OF A QUARTZ CRYSTAL OSCILLATOR
FREQUENCY TUNING ARRAY**

Assignee: **STMicroelectronics (Alps) SAS**

Assignee being a company, corporation, or juristic entity of: **FRANCE**

Assignee's principal place of business:

12 rue Jules Horowitz, Grenoble F-38000, FRANCE

I, the below identified and undersigned inventor or co-inventor, as the case may be, of residence listed below, for and in consideration of good and valuable consideration, the receipt, sufficiency, and adequacy of which are hereby acknowledged, hereby transfer and assign to Assignee, its legal representatives, successors, and assigns, my entire right, title, and interest in and to the inventions for which the above identified patent application is made and describes (hereinafter referred to as "the Patent Rights"), together with any and all patents or patent applications anywhere worldwide to which any of the Patent Rights directly or indirectly claims priority, including but not limited to provisional applications thereof, or for which any of the Patent Rights directly or indirectly forms a basis for priority, together with all existing and/or future continuations, continuations-in-part, continuing prosecution applications, requests for continuing examinations, divisions, reissues, reexaminations, extensions, registrations, and foreign counterparts of any item in any of the foregoing, together with the right to sue for and be entitled to any damages, injunctive relief, and any other remedies of any kind for past, current, and future infringement thereof, together with all rights worldwide in the Patent Rights; said entire right, title, and interest, to be held and enjoyed by the Assignee for its own use and enjoyment and for the use and enjoyment of its legal representatives, successors, and assigns to the full end of the term for which the aforementioned rights may be granted anywhere in the world.

I hereby further agree to assist in and execute all documents needed now or in the future to perfect, obtain, and secure the aforementioned rights to Assignee, its legal representatives, successors, and assigns, for any jurisdiction in the world. At the expense of Assignee, or its legal representatives, successors, or assigns, I agree to assist in any legal proceedings, sign all lawful papers, make all lawful oaths, and generally do everything possible to aid Assignee, its legal representatives, successors, and assigns, to enforce the aforementioned rights in any and all countries and regions worldwide.

ST Docket Number: 17-GR2-0824US01
3366223.1

2

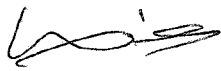
**PATENT
REEL: 047659 FRAME: 0433**

CUSTOMER NO. 117381

PATENT APPLICATION
Attorney Docket No. 50649-01387

I hereby grant Assignee, along with the following Assignee representatives, the power to insert in this Assignment any further identification that may be necessary or desirable in order to comply with the rules for recordation of this document any place in the world: All practitioners at Customer Number 117381.

If there are co-inventors listed below, the signatures of all the inventors need not appear on the same page, and each inventor may sign this Assignment in multiple counterparts, such that each separately signed counterpart of this Assignment constitutes an original Assignment for the inventor(s) that signed such counterpart.

Inventor Name	Residence (City, State, Country)	Inventor Signature	Date Signed
Francois DRUILHE	180 rue LAMARTINE Le Versoud 38420 FR		August 13 th , 2018