PATENT ASSIGNMENT

Electronic Version v1.1

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SUBMISSION TYPE:		NEW ASSIGNMENT					
NATURE OF CONVEYANCE:			ASSIGNMENT				
CONVEYING PARTY DA	CONVEYING PARTY DATA						
	Name Execution Date						
Alfio Guarnera				10/10/2008			
Mario Giuseppe Saggio				10/06/2008			
Ferruccio Frisina				10/06/2008			
RECEIVING PARTY DAT	ГА						
Name:	STMicroelectro	nics S.	r.l.				
Street Address:	Via C. Olivetti, 2	2					
City:	Agrate Brianza						
State/Country:	ITALY						
Postal Code:	20041						
PROPERTY NUMBERS Total: 1							
Property Ty	pe		Number				
Application Number: 134346			586		G		
CORRESPONDENCE DATA							
Fax Number:	Fax Number: (617)646-8646				13		
Phone:	617-646-8	3000			80		
Email:			reenfield.com		\$40.00		
Correspondence will be s	sent to the e-ma	nil addri	ess first; if that is unsuccessful, it will be sent via U	5			
Correspondent Name: James H. Morris					ЧO		
Address Line 1: Wolf, Greenfield & Sacks, P.C.							
Address Line 2: 600 Atlantic Avenue							
Address Line 4: Boston, MASSACHUSETTS 02210							
ATTORNEY DOCKET NUMBER:			S102271719US01				
NAME OF SUBMITTER:			Gail Driscoll				
Total Attachments: 3 source=13434686#page1.tif source=13434686#page2.tif source=13434686#page3.tif							

ASSIGNMENT OF U.S. AND FOREIGN RIGHTS IN INVENTION

In consideration of the payment by ASSIGNEE to ASSIGNORS of good and valuable consideration the adequacy and receipt of which are hereby acknowledged,

ASSIGNOR <u>Alfio Guarnera</u> residing or having a principal place of business at <u>Via del Caravaggio, 7, I-95039 Trecastagni, Italy</u>, and a citizen or juristic entity of <u>Italy</u>.

ASSIGNOR <u>Mario Gluseppe Saggio</u> residing or having a principal place of business at <u>Via Stazione, 40B, I-95021 Acicastello, Italy</u>, and a citizen or juristic entity of Italy,

ASSIGNOR Ferruccio Frisina residing or having a principal place of business at Via Tre Torri, 11, I-95030, Sant'Agata Li Battiati, Italy, and a citizen or juristic entity of Italy,

hereby sell, assign, and transfer to:

ASSIGNEE STMicroelectronics S.r.I., residing or having a principal place of business at Via C. Olivetti. 2, I-20041, Agrate Brianza (Italy) and a citizen or juristic entity of Italy, and the successors, assigns, and legal representatives of the ASSIGNEE, the entire right, title, and interest in the United States and in all foreign countries, including all rights to claim priority, in and to any and all improvements which are disclosed in the invention entitled PROCESS FOR MANUFACTURING A POWER SEMICONDUCTOR DEVICE HAVING CHARGE-BALANCE COLUMNAR STRUCTURES ON A NON-PLANAR SURFACE, AND CORRESPONDING POWER SEMICONDUCTOR DEVICE and which is found in United States patent application serial number ____ filed (if not present when this instrument is executed, on applicant's attorney or agent is authorized to enter the application serial number and filing date upon receipt of the same from the United States Patent and Trademark Office), and in and to all Letters Patent to be obtained from said invention by the above application or any continuation, division, renewal, or substitute thereof, and as to Letters Patent from any reissue or re-examination thereof.

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

ASSIGNORS further covenant that ASSIGNEE will, upon its request, be provided promptly with all pertinent facts, documents relating to said invention and said Letters Patent and legal equivalents as may be known and accessible to ASSIGNORS and will testify as to the same in any interference, litigation, or proceeding related thereto and will promptly execute and deliver to ASSIGNEE or its legal 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 purpose thereof.

ASSIGNORS:

Name: <u>Alfio G</u> u	Jarnera			**************************************		
Signature:	del.	Hupan	P			
Title (if applicat	ole):	2 ⁵³				
EXECUTED O	N, and effec	tive from this _	10th	day of	October	, 2008

I hereby declare that I was personally present and did see the ASSIGNOR, who is personally known to me to be a person named in the assignment, duly sign and execute the same on this <u>10th</u> day of <u>October</u>, 2008 of his/her own free will for the purpose therein expressed at the following location: <u>Catania</u>

WITNESS

Name:	Eth	ANGECE	7 7 7 7 7	
Signature:_		angel	May	

Name: Mario Gluseppe Saggio	******			
Signature: 135. Give 14. Say			and get light methodologic and a survey of the get of the survey to be	
Title (if applicable):		an a	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	
EXECUTED ON, and effective from this at	6th	day of	October	, 2008

I hereby declare that I was personally present and did see the ASSIGNOR, who is personally known to me to be a person named in the assignment, duly sign and execute the same on this <u>6th</u> day of <u>October</u>, 2008 of his/her own free will for the purpose therein expressed at the following location: <u>Catania</u>

WITNESS

Name:	ANGOLO	MAGRI	
Signature:	angel	Mig	

2

PATENT REEL: 028326 FRAME: 0288

www.

Name: Ferruccio Frisina	<u> </u>				
Signature:	21 Marsa	12			
Title (if applicable):	. <u> </u>	1847) - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847 - 1847			
EXECUTED ON, and effective	e from this	10th	day of	October	_, 2008
at <u>Catania</u>	*****				

I hereby declare that I was personally present and did see the ASSIGNOR, who is personally known to me to be a person named in the assignment, duly sign and execute the same on this <u>10th</u> day of <u>October</u>, 2008 of his/her own free will for the purpose therein expressed at the following location: <u>Catania</u>

WITNESS

Name:	ANGELO MAGAN	
Signature:	and my	
	star starter starter	

PATENT REEL: 028326 FRAME: 0289

RECORDED: 06/06/2012