PATENT ASSIGNMENT

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SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
Brent A. Buchine	11/18/2009
Faris Modawar	11/18/2009
Marcie R. Black	11/17/2009

RECEIVING PARTY DATA

Name:	Bandgap Engineering Inc.
Street Address:	1344 Main St.
City:	Waltham
State/Country:	MASSACHUSETTS
Postal Code:	02451

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	12576490

CORRESPONDENCE DATA

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ATTORNEY DOCKET NUMBER:	36860-504001US

NAME OF SUBMITTER: Flavio M. Rose

Total Attachments: 4

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PATENT 501046309 REEL: 023678 FRAME: 0187

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> PATENT REEL: 023678 FRAME: 0188

ASSIGNMENT

We, Brent A. Buchine, Faris Modawar and Marcie R. Black, the undersigned, for good and valuable consideration, the receipt of which is hereby acknowledged, confirm that we have sold and assigned, and do hereby assign, sell and transfer to Bandgap Engineering Inc., with offices at 1344 Main St., Waltham, MA 02451, and to its successors, assigns and legal representatives, collectively hereinafter referred to as the ASSIGNEE: (1) our entire right, title and interest for the United States and in all countries, in and to any and all inventions, discoveries and applications which are disclosed in (a) the application for United States Letters Patent entitled:

PROCESS FOR STRUCTURING SILICON

filed with the U.S. Patent and Trademark Office on **October 9, 2009**, and assigned Application No. 12/576,490, (b) U.S. Provisional Patent Applications Nos. 61/195,872 and 61/142,608, and/or (c) any subsequently filed utility applications, which claim priority to Application Nos. 61/195,872, 61/142,608, and/or 12/576,490, including any renewals, revivals, reissues, reexaminations, extensions, continuations and divisionals thereof and any substitute applications therefor; (2) the full and complete right to file patent applications in the name of the ASSIGNEE, its designee, or in my/our names as the ASSIGNEE, or its designee's election, on the aforesaid inventions, discoveries and applications in all countries of the world; (3) the entire right, title and interest in and to any Letters Patent which may issue thereon in the United States or in any country, and any renewals, revivals, reissues, reexaminations and extensions thereof, and any patents of confirmation, registration and importation of the same; and (4) the entire right, title and interest in all Convention and Treaty Rights of all kinds thereon, including without limitation all rights of priority in any country of the world, in and to the above inventions, discoveries and applications.

We hereby authorize and request the competent authorities to grant and to issue any and all such Letters Patent in the United States and throughout the world to the ASSIGNEE of the entire right, title and interest therein, as fully and entirely as the same would have been held and enjoyed by us had this assignment, sale and transfer not been made.

We agree, at any time, upon the request of the ASSIGNEE, to execute and to deliver to the ASSIGNEE any additional applications for patents for said inventions and discoveries, or any part or parts thereof, and any applications for patents of confirmation, registration and importation based on any Letters Patent issuing on said inventions, discoveries, or applications and divisions, continuations, renewals, revivals, reissues, reexaminations and extensions thereof.

We further agree at any time to execute and to deliver upon request of the ASSIGNEE such additional documents, if any, as are necessary or desirable to secure patent protection on said inventions, discoveries and applications throughout all countries of the world, and otherwise to do the necessary to give full effect to and to perfect the rights of the ASSIGNEE under this Assignment, including the execution, delivery and procurement of any and all further documents evidencing this assignment, transfer and sale as may be necessary or desirable.

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

PATENT

REEL: 023678 FRAME: 0189

First Inventor: **Application No.: 12/576,490**

Brent A. Buchine

File:

October 9, 2009

Page 2 of 4

We 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 of the claims as may be known and accessible to ASSIGNOR 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 purposes thereof.

Date: 11-18-09	Signature of: Brent A. Buc	chine
IN WITNESS WHEREOF, I,	Janet Moran (Printed Name of Witness	, hereby declare
that I was personally present and disassignment.	d see the above named person duly sign	
Jonet Moran		
(Signature of Witness)		

Application No.: 12/576,490 File: October 9, 2009 Page 3 of 4	
Date: ////8/01	Da a Mal
	Signature of: Faris Modawar
IN WITNESS WHEREOF, I,	Janet Moran, hereby declare (Printed Name of Witness)
that I was personally present and	lid see the above named person duly sign and execute the
assignment. Janet Monan	
(Signature of Witness)	
Date: 11-18-09	

First Inventor: Brent A. Buchine

First Inventor: Brent A. Buchine Application No.: 12/576,490
File: October 9, 2009

Page 4 of 4

Date: 1/// > / 0~9	mah h	
	Signature of: Marcie R. Black	
IN WITNESS WHEREOF, I,	Janet Moran	, hereby declare
· · ·	(Printed Name of Witnes	ss)
that I was personally present and did see t	the above named person duly si	gn and execute the
assignment. Somet Moran		
(Signature of Witness)		
Date:	š .	

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