

<b>PATENT ASSIGNMENT COVER SHEET</b>
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Electronic Version v1.1  
 Stylesheet Version v1.2

EPAS ID: PAT5396454

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
CHRISTOPHE THERENE	01/30/2019
NEDELJKO VARNICA	01/31/2019
KONSTANTIN KUDRYAVTSEV	01/31/2019
MANISH SHRIVASTAVA	01/30/2019
MATS OBERG	01/31/2019
LEO JIANG	01/31/2019
<b>RECEIVING PARTY DATA</b>	
<b>Name:</b>	MARVELL SEMICONDUCTOR, INC.
<b>Street Address:</b>	5488 MARVELL LANE
<b>City:</b>	SANTA CLARA
<b>State/Country:</b>	CALIFORNIA
<b>Postal Code:</b>	95054
<b>PROPERTY NUMBERS Total: 1</b>	
<b>Property Type</b>	<b>Number</b>
<b>Application Number:</b>	16264473
<b>CORRESPONDENCE DATA</b>	
<b>Fax Number:</b>	(408)222-2755
<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>	
<b>Phone:</b>	4082222500
<b>Email:</b>	syzemore@marvell.com
<b>Correspondent Name:</b>	KELVIN VIVIAN
<b>Address Line 1:</b>	5488 MARVELL LANE
<b>Address Line 4:</b>	SANTA CLARA, CALIFORNIA 95054
<b>ATTORNEY DOCKET NUMBER:</b>	MP11060
<b>NAME OF SUBMITTER:</b>	KELVIN VIVIAN
<b>SIGNATURE:</b>	/Kelvin Vivian/
<b>DATE SIGNED:</b>	02/27/2019
<b>Total Attachments: 6</b>	

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## ASSIGNMENT

For good and valuable consideration, the receipt and sufficiency for which is hereby acknowledged, I or We, the undersigned,

**Christophe Therene, Nedeljko Varnica, Konstantin Kudryavtsev, Manish Shrivastava,  
Mats Oberg, and Leo Jiang**

who have created a certain invention for which one or more patent applications identified below (hereinafter "the Patent Application(s)") have been, or are to be, filed:

<u>Marvell Case No.</u>	<u>Application No.</u>	<u>Filing Date</u>	<u>Title</u>
MP11060PR	62/714,563	August 3, 2018	SYSTEM-ON-CHIP (SOC) STORAGE CONTROLLER WITH ARTIFICIAL INTELLIGENCE (AI) ENGINE
MP11060	To be Assigned	Herewith	STORAGE EDGE CONTROLLER WITH A METADATA COMPUTATIONAL ENGINE


Do hereby confirm any prior assignment, and to the extent that I or We have not already done so, agree to sell, assign, and transfer, and do hereby sell, assign and transfer to Marvell Semiconductor, Inc., a corporation of California, having a place of business at 5488 Marvell Lane, Santa Clara, California 95054, and its successors or assigns (hereinafter "Assignee"), the entire rights, title, and interest, including all priority rights, in or to any and all inventions described in the Patent Application(s), the Patent Application(s), and all continuations in whole or in part, divisions, and other applications claiming priority directly or indirectly from the Patent Application(s) which have been or are to be filed in the United States and/or any foreign countries including national stage applications, and any patents, including utility models and other similar registrations, in the United States and/or any foreign countries which may be granted thereon, including but not limited to reissues, renewals, and reexaminations thereof;

Authorize and request that the attorneys of record in any of the Patent Application(s) insert in this assignment the filing date(s) and application number(s) of the Patent Application(s) when officially known (the Assignee authorizes and requests the same);

Agree that Assignee may apply for and receive patents including utility models and other similar registrations for the foregoing rights, title and interest in its own name, in the United States and/or any foreign countries; and that, when requested to carry out in good faith the intent and purpose of this assignment, at the expense of the Assignee, and its successors or assigns, the undersigned will execute all rightful oaths, declarations, assignments, powers of attorney and other papers, testify in any legal or quasi legal proceedings; communicate to the Assignee, and its successors or assigns all facts known to the undersigned relating to the foregoing rights, title and interest; and generally do everything possible and reasonable which the Assignee, and its successors, or assigns consider necessary, desirable or expedient for aiding in securing, maintaining and enforcing proper protection for applicable patent rights and for vesting applicable title in the Assignee and its successors or assigns; and

Covenant with the Assignee, and its successors or assigns that no assignment, grant, mortgage, license or other agreement affecting the rights and property herein conveyed has been made to others by the undersigned, there are no outstanding encumbrances, liens or other obligations or restrictions on the rights, titles and interests herein assigned, and that full right to convey the same as herein expressed is possessed by the undersigned.

IN TESTIMONY WHEREOF I or We have hereunto set my signature or our signatures on the date(s) indicated below.

Full Name of Sole/First Inventor: Christophe Therene	
Inventor's Signature: 	Date: Month/Day/Year January 30, 2019

Full Name of Second Inventor, if any: Nedeljko Varnica	
Inventor's Signature:	Date: Month/Day/Year

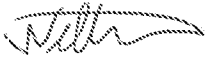
Full Name of Third Inventor, if any: Konstantin Kudryavtsev	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Fourth Inventor, if any: Manish Shrivastava	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Fifth Inventor, if any: Mats Oberg	
Inventor's Signature:	Date: Month/Day/Year

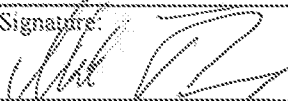
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Full Name of Sole/First Inventor: Christophe Therene	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Second Inventor, if any: Nedeljko Varnica	
Inventor's Signature: 	Date: Month/Day/Year 1 / 31 / 2019

Full Name of Third Inventor, if any: Konstantin Kudryavtsev	
Inventor's Signature:	Date: Month/Day/Year

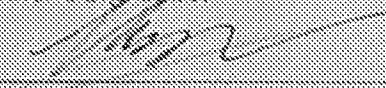
Full Name of Fourth Inventor, if any: Manish Shrivastava	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Fifth Inventor, if any: Mats Oberg	
Inventor's Signature: 	Date: Month/Day/Year 1 / 31 / 19

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Full Name of Sole/First Inventor: Christophe Therene	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Second Inventor, if any: Nedeljko Varnica	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Third Inventor, if any: Konstantin Kudryavtsev	
Inventor's Signature: 	Date: Month/Day/Year Jan 31, 2019

Full Name of Fourth Inventor, if any: Manish Shrivastava	
Inventor's Signature:	Date: Month/Day/Year

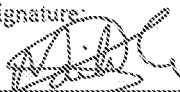
Full Name of Fifth Inventor, if any: Mats Oberg	
Inventor's Signature:	Date: Month/Day/Year

IN TESTIMONY WHEREOF I or We have hereunto set my signature or our signatures on the date(s) indicated below.

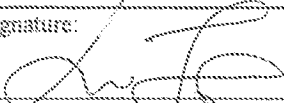
Full Name of Sole/First Inventor: Christophe Therene	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Second Inventor, if any: Nedeljko Varnica	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Third Inventor, if any: Konstantin Kudryavtsev	
Inventor's Signature:	Date: Month/Day/Year

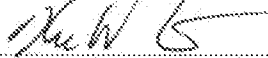
Full Name of Fourth Inventor, if any: Manish Shrivastava	
Inventor's Signature: 	Date: Month/Day/Year 01/30/2019

Full Name of Fifth Inventor, if any: Mats Oberg	
Inventor's Signature:	Date: Month/Day/Year

Full Name of Sixth Inventor, if any: Leo Jiang	
Inventor's Signature: 	Date: Month/Day/Year 1/31/2019

Accepted by:

MARVELL SEMICONDUCTOR, INC.

By: 

Name: Kelvin Vivian

Title: Director, Assistant General Counsel, IP Development

Date: 11 FEBRUARY 2019