

## PATENT ASSIGNMENT COVER SHEET

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Stylesheet Version v1.2

EPAS ID: PAT4585100

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT

**CONVEYING PARTY DATA**

Name	Execution Date
KABUSHIKI KAISHA TOSHIBA	06/28/2017

**RECEIVING PARTY DATA**

<b>Name:</b>	TOSHIBA MEMORY CORPORATION
<b>Street Address:</b>	1-1, SHIBAURA 1-CHOME
<b>City:</b>	MINATO-KU, TOKYO
<b>State/Country:</b>	JAPAN
<b>Postal Code:</b>	105-0023

**PROPERTY NUMBERS Total: 31**

Property Type	Number
Application Number:	14641099
Application Number:	14644106
Application Number:	14656559
Application Number:	14656506
Application Number:	14656524
Application Number:	14656405
Application Number:	14656496
Application Number:	14656413
Application Number:	14686973
Application Number:	14698297
Application Number:	14700915
Application Number:	14722606
Application Number:	14725892
Application Number:	14727069
Application Number:	14808431
Application Number:	14817625
Application Number:	14824827
Application Number:	14833632
Application Number:	14848844
Application Number:	14921708

PATENT

Property Type	Number
Application Number:	14936356
Application Number:	14942733
Application Number:	14971856
Application Number:	14757559
Application Number:	15060035
Application Number:	15061487
Application Number:	15216992
Application Number:	15266034
Application Number:	15443850
Application Number:	15443914
Application Number:	14816794

**CORRESPONDENCE DATA**

**Fax Number:**

*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:** 202-626-3600

**Email:** toshibapatents@whitecase.com

**Correspondent Name:** WHITE & CASE LLP

**Address Line 1:** 701 13TH STREET NW

**Address Line 4:** WASHINGTON, D.C. 20005

<b>ATTORNEY DOCKET NUMBER:</b>	1242236-0001_ASSIGNMENT
<b>NAME OF SUBMITTER:</b>	DAVID M. TENNANT
<b>SIGNATURE:</b>	/David M. Tennant/
<b>DATE SIGNED:</b>	09/08/2017

**Total Attachments: 4**  
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## PATENT ASSIGNMENT AGREEMENT

This Patent Assignment Agreement (the "Agreement") is made by Kabushiki Kaisha Toshiba, a corporation duly organized and existing under the laws of Japan, with offices at 1-1, Shibaura 1-chome, Minato-ku, Tokyo 105-8001, Japan ("Assignor"), and Toshiba Memory Corporation, a corporation duly organized and existing under the laws of Japan, with offices at 1-1, Shibaura 1-chome, Minato-ku, Tokyo 105-0023, Japan ("Assignee").

WHEREAS, Assignor is the sole owner of the patents and patent applications listed in Exhibit A attached to this Agreement;

WHEREAS, Assignor has agreed to sell, assign, transfer, and convey to Assignee all right, title, and interest in and to the patents and patent applications listed in Exhibit A, including the related rights described below;

WHEREAS, Assignee desires to acquire all right, title, and interest in and to the patents and patent applications listed in Exhibit A, including the related rights described below; and

WHEREAS, Assignor will therefore deliver this Agreement and any other intellectual property assignment agreements, for recording with the United States Patent and Trademark Office and corresponding entities or agencies in any applicable jurisdictions.

NOW THEREFORE, Assignor and Assignee agree as follows:

1. Assignment. For good and valuable consideration, the receipt of which is hereby acknowledged, Assignor hereby does and agrees to irrevocably sell, assign, transfer and convey to Assignee and its successors and assigns, all right, title and interest that may exist today and in the future in and to any and all:
  - (a) the patents and patent applications and inventions described therein listed in Exhibit A attached to this Agreement;
  - (b) reissues, reexaminations, extensions, continuations, continuations-in-part, continuing prosecution applications and divisions of any of the items under (a) of Section 1 of this Agreement;
  - (c) patents that issue from any of the items under (a) and (b) of Section 1 of this Agreement (collectively the items listed in (a) through (c), the "Patents");
  - (d) claims, causes of action and enforcement rights of any kind, whether currently pending, filed or otherwise, and whether known

or unknown, under or arising from any of the items under (a) through (c) of Section 1 of this Agreement, including all rights to pursue and collect damages, costs, injunctive relief and other remedies for past, current, or future infringement of the Patents; and

(e) royalties, income and other payments due as of the Effective Date or thereafter under or arising from any of the items under (a) through (d) of Section 1 of this Agreement.

2. Further Actions. Assignor shall take such steps and actions, and provide such cooperation and assistance to Assignee and its successors, assigns and legal representatives, including the execution and delivery of any affidavits, declarations, oaths, exhibits, assignments, powers of attorney, or other documents, as may be necessary to effect, evidence or perfect the assignment of the Patents contemplated hereby to Assignee, or any assignee or successor.
3. Recordation. Assignor hereby authorizes and requests the Commissioner for Patents in the United States Patent and Trademark Office and the officials in any of the corresponding patent offices in the applicable jurisdictions to issue any and all patents, utility models or other governmental grants or issuances pertaining to any of the items assigned hereunder in the name of Assignee.
4. Counterparts. This Agreement may be executed in counterparts, each of which shall be deemed an original, but all of which together shall be deemed to be one and the same agreement. A signed copy of this Agreement delivered by e-mail or other means of electronic transmission shall be deemed to have the same legal effect as delivery of an original signed copy of this Agreement.
5. Governing Law. This Agreement will be deemed to be made and in all respects will be interpreted, construed and governed by and in accordance with the laws of Japan without regard to the conflicts of laws principles thereof.
6. Successors and Assigns. This Agreement will inure to the benefit of Assignee and its successors, assigns and other legal representatives and is binding upon Assignor and its successors, assigns, heirs and legal representatives.

IN WITNESS WHEREOF, Assignor has duly executed and delivered this Agreement as of the Assignment Date.

DATE: June 28, 2017

**Kabushiki Kaisha Toshiba**

By: Ikuko SHIMOOGAWARA  
Title: General Manager, Intellectual  
Property Division

  
Signature

ACCEPTED:

DATE: July 3, 2017

**Toshiba Memory Corporation**

By: Michihito HATSUMI  
Title: General Manager, Intellectual  
Property Division

  
Signature

Exhibit A

No.	Local Agent	Appl. No.	Filing Date	Patent No.	Grant Date
1	WHITE	14/641099	2015/3/6		
2	WHITE	14/644106	2015/3/10		
3	WHITE	14/656559	2015/3/12		
4	WHITE	14/656506	2015/3/12		
5	WHITE	14/656524	2015/3/12		
6	WHITE	14/656405	2015/3/12		
7	WHITE	14/656496	2015/3/12		
8	WHITE	14/656413	2015/3/12		
9	WHITE	14/686973	2015/4/15		
10	WHITE	14/698297	2015/4/28		
11	WHITE	14/700915	2015/4/30		
12	WHITE	14/722606	2015/5/27		
13	WHITE	14/725892	2015/5/29		
14	WHITE	14/727069	2015/6/1		
15	WHITE	14/808431	2015/7/24		
16	WHITE	14/817625	2015/8/4		
17	WHITE	14/824827	2015/8/12		
18	WHITE	14/833632	2015/8/24		
19	WHITE	14/848844	2015/9/9		
20	WHITE	14/921708	2015/10/23		
21	WHITE	14/936356	2015/11/9		
22	WHITE	14/942733	2015/11/16		
23	WHITE	14/971856	2015/12/16		
24	WHITE	14/757559	2015/12/24		
25	WHITE	15/060035	2016/3/3		
26	WHITE	15/061487	2016/3/4		
27	WHITE	15/216992	2016/7/22		
28	WHITE	15/266034	2016/9/15		
29	WHITE	15/443850	2017/2/27		
30	WHITE	15/443914	2017/2/27		
31	WHITE	14/816794	2015/8/3		