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PATENT ASSIGNMENT COVER SHEET

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SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
ERIC EDWARDS	12/14/2017
JUSTIN SHAW	12/07/2017
THOMAS SILVA	12/14/2017

RECEIVING PARTY DATA

Name:	THE UNITED STATES OF AMERICA, AS REPRESENTED BY THE SECRETARY OF COMMERCE
Street Address:	NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY
Internal Address:	100 BUREAU DRIVE, MS 2200
City:	GAITHERSBURG
State/Country:	MARYLAND
Postal Code:	20899

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	15695173

CORRESPONDENCE DATA

Fax Number: (301)975-3482

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: 301-975-2691
Email: patents@nist.gov

Correspondent Name: NIST (EILEEN BRIGHT)
Address Line 1: 100 BUREAU DRIVE

Address Line 2: MS 2200

Address Line 4: GAITHERSBURG, MARYLAND 20899

ATTORNEY DOCKET NUMBER:	16-046US1
NAME OF SUBMITTER:	EILEEN BRIGHT
SIGNATURE:	/Eileen Bright/
DATE SIGNED:	12/15/2017

Total Attachments: 6

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PATENT REEL: 044407 FRAME: 0693 $source = 16\text{-}046\text{US1_EDWARDS_Assignment\#page2.} tif$

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PATENT REEL: 044407 FRAME: 0694 NIST Docket number: 16-046US1

ASSIGNMENT OF PATENT RIGHTS

I, ERIC EDWARDS, residing in BOULDER, CO invented "MAGNETIC ARTICLE AND

ROTATION OF MAGNETIC SPINS VIA SPIN-ORBIT EFFECT IN SAME" for which

has been filed an application for United States Letters Patent, Serial Number 15/695,173 on

September 5, 2017.

The invention was made while I was an employee of the United States Department of Commerce

and under such circumstances that applicable laws and regulations render the patent rights

assignable to the United States. The United States of America, represented by the Secretary of

Commerce, wishes to acquire these rights.

Therefore, I assign to the Government of the United States of America as represented by the

Secretary of Commerce, my full and exclusive world-wide rights to this invention. As

consideration for this Assignment, I will be treated as an inventor whose rights are assigned to

the Government of the United States, for royalty sharing purposes, if royalties are ever collected,

as explained in Section 3710(c) of Title 15 of the United States Code. This invention and its

derivative applications in the United States Patent and Trademark Office and United States

Letters Patent are to be held by the United States of America for the full term for which such

Letters Patent may be granted as completely as they would have been held by me had I not made

this assignment.

PATENT REEL: 044407 FRAME: 0695 I agree to make, execute, and deliver to the Secretary of Commerce all documents in such usual or other forms, terms, or contents as may be required by the Secretary for the prosecution of all applications arising from this invention, as well as after issuance of Letters Patent, and for the settlement of any derivation proceeding, post-grant review, or other action or proceeding, these applications and Letters Patent may encounter. I will aid the United States of America in every way to protect the invention as requested by the Secretary, except that any expenses arising through such assistance will be borne, through proper arrangement, by the United States of America.

I warrant that there are no outstanding assignments, grants, liens, encumbrances, or agreements, oral, written, or implied, that will impair the interests conveyed in this assignment at the time I execute this instrument.

IN TESTIMONY WHEREOF, I sign

ERIC EDWARDS

12/14/2017-

NIST Docket number: 16-046US1

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PATENT

REEL: 044407 FRAME: 0697

I agree to make, execute, and deliver to the Secretary of Commerce all documents in such usual or other forms, terms, or contents as may be required by the Secretary for the prosecution of all applications arising from this invention, as well as after issuance of Letters Patent, and for the settlement of any derivation proceeding, post-grant review, or other action or proceeding, these applications and Letters Patent may encounter. I will aid the United States of America in every way to protect the invention as requested by the Secretary, except that any expenses arising through such assistance will be borne, through proper arrangement, by the United States of America.

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IN TESTIMONY WHEREOF, I sign

JUSTIN SHAW

78 A 78

NIST Docket number: 16-046US1

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I, THOMAS SILVA, residing in BOULDER, CO invented "MAGNETIC ARTICLE AND

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PATENT

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IN TESTIMONY WHEREOF, I sign

THOMAS SILVA

PATENT EEL: 044407 FRAME: 0700

RECORDED: 12/15/2017