

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
Stylesheet Version v1.2

EPAS ID: PAT3905229

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
SHUZHONG DONG	10/31/2014
ALEXANDER PASTERNAK	10/24/2014
XIN GU	10/24/2014
QINGHONG FU	10/24/2014
JINLONG JIANG	10/24/2014
FA-XIANG DING	10/24/2014
HAIFENG TANG	10/24/2014
REYNALDA K. DEJESUS	10/24/2014
<b>RECEIVING PARTY DATA</b>	
<b>Name:</b>	MERCK SHARP & DOHME CORP.
<b>Street Address:</b>	126 EAST LINCOLN AVENUE
<b>Internal Address:</b>	RY86-2011A
<b>City:</b>	RAHWAY
<b>State/Country:</b>	NEW JERSEY
<b>Postal Code:</b>	07065
<b>PROPERTY NUMBERS Total: 1</b>	
<b>Property Type</b>	<b>Number</b>
Application Number:	15101481
<b>CORRESPONDENCE DATA</b>	
<b>Fax Number:</b>	(732)594-4000
<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>	732 594-4000
<b>Email:</b>	us_efs@merck.com
<b>Correspondent Name:</b>	MERCK & CO., IN.C
<b>Address Line 1:</b>	P. O. BOX 2000
<b>Address Line 2:</b>	RY86-2011A
<b>Address Line 4:</b>	RAHWAY, NEW JERSEY 07065
<b>ATTORNEY DOCKET NUMBER:</b>	23699-US-PCT
<b>NAME OF SUBMITTER:</b>	PAMELA SPALDING

PATENT

<b>SIGNATURE:</b>	/Pamela Spalding/
<b>DATE SIGNED:</b>	06/07/2016
<b>Total Attachments: 10</b> source=23699USPCT-ASSIGN-07JUN2016#page1.tif source=23699USPCT-ASSIGN-07JUN2016#page2.tif source=23699USPCT-ASSIGN-07JUN2016#page3.tif source=23699USPCT-ASSIGN-07JUN2016#page4.tif source=23699USPCT-ASSIGN-07JUN2016#page5.tif source=23699USPCT-ASSIGN-07JUN2016#page6.tif source=23699USPCT-ASSIGN-07JUN2016#page7.tif source=23699USPCT-ASSIGN-07JUN2016#page8.tif source=23699USPCT-ASSIGN-07JUN2016#page9.tif source=23699USPCT-ASSIGN-07JUN2016#page10.tif	

**WORLDWIDE ASSIGNMENT**

WHEREAS, I/WE,

- (1) Shuzhi Dong, located at Plainsboro, NJ,
- (2) Alexander Pasternak, located at Princeton, NJ,
- (3) Xin Gu, located at, Scotch Plains, NJ,
- (4) Qinghong Fu, located at Plainsboro, NJ,
- (5) Jinlong Jiang, located at Scotch Plains, NJ,
- (6) Fa-Xiang Ding, located at, Staten Island, NY,
- (7) Haifeng Tang, located at, Metuchen, NJ,
- (8) Reynalda K. DeJesus, located at East Brunswick, NJ

(hereinafter ASSIGNOR(S)), together with Takao Suzuki, located at Shanghai, China,

are the inventors of the invention described in an application for Patents having the Attorney Docket Number indicated above and the following Title of the Invention:

**INHIBITORS OF THE RENAL OUTER MEDULLARY POTASSIUM CHANNEL**

and/or in the following application(s):

U.S. Provisional Application No. \_\_\_\_\_ filed on \_\_\_\_\_ ;  
U.S. Application No. 15/101,481 having a filing date of 6/3/2016 ; and  
PCT International Application No. PCT/CN2013/090335 having a filing date of December 24, 2013.

PCT International Application No. PCT/US2014/071336 having a filing date of December 19, 2014.

WHEREAS I/WE covenant that the rights and property herein conveyed are free and clear of any encumbrance, and that I/we have the full right to convey the same as herein expressed.

WHEREAS, Merck Sharp & Dohme Corp., a corporation organized under the laws of the State of New Jersey, having an office at 126 East Lincoln Avenue, Rahway, New Jersey 07065, and its successors, assigns and legal representatives (hereinafter **ASSIGNEE**), is desirous of obtaining the entire right, title and interest in, to and under the invention disclosed in said application or applications;

NOW, THEREFORE, for good and valuable consideration, the receipt of which is hereby acknowledged, I/we, said ASSIGNOR(S), do each hereby sell, assign and transfer or confirm the grant and assignment to said **ASSIGNEE** my/our entire right, title and interest in all countries of the world in and to my/our invention described in said application for Patents, in and to the right to file patent applications in the name of **ASSIGNEE**, its designee, or in any or all of our names, at its election, on the aforesaid invention in all countries of the world, together with all rights of priority in the aforesaid countries deriving from the above-identified application for Patents under the International Convention for the Protection of Industrial Property, under the Inter-American Convention relating to Inventions, Patents, Designs and Industrial Models and under any other international arrangement relating to patents or intellectual property, in and to any and all Letters Patent that are granted from the aforesaid application for Patents, in and to any applications claiming priority benefits to a provisional patent application or other applications filed on said invention, and in and to any continuations, divisions, reexaminations, reissues, renewals and extensions thereof of any of said Letters Patent, the same to be held and enjoyed by said **ASSIGNEE**, to the full ends of the terms for which all Letters Patent therefore may be granted, as fully and entirely as the same would have been held and enjoyed by us if this assignment and sale had not been made.

AND I/WE HEREBY covenant and agree that we will at any time, upon the request and at the expense of **ASSIGNEE**, without further compensation or charge to said **ASSIGNEE**, execute and deliver any and all documents that may be necessary or desirable to perfect the title to the foregoing invention, patent applications, and Letters Patent and continuations, divisions, reexaminations, reissues, renewals and extensions thereof in the name of **ASSIGNEE**, including the execution and procurement of any and all further documents evidencing this assignment and sale as may be necessary or desirable for recording the same in the Patent Office of any country concerned, and will make all rightful oaths and declarations and do all lawful acts requisite for procuring the same or for aiding therein.

I/WE HEREBY authorize **ASSIGNEE** to insert in this instrument the Application Number(s) and the filing date(s) of said application for Patents when officially notified thereof.

This document may be executed in any number of counterparts, each of which so executed shall be deemed to be an original, but all such components shall together constitute but one and the same document.

Executed this 31 day of October, 2014

Shuzhi Dong  
Shuzhi Dong

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY )  
County of UNION ) s.s.:

On this 31 day of October, 2014, personally appeared before me **Shuzhi Dong** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

[Signature]  
Notary Public

Executed this 24 day of October, 2014

[Signature]  
Alexander Pasternak

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY )  
County of UNION ) s.s.:

On this 24 day of October, 2014, personally appeared before me **Alexander Pasternak** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

[Signature]  
Notary Public

**PIA ROCEL S. PARAS-SANJURJO**  
NOTARY PUBLIC OF NEW JERSEY  
My Commission Expires September 14, 2017



Executed this 24 day of Oct., 2014

[Signature]  
Jinlong Jiang

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY )  
 ) s.s.:  
County of UNION )

On this 24 day of October, 2014, personally appeared before me **Jinlong Jiang** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

[Signature]  
Notary Public

**PIA ROCEL S. PARAS-SANJURJO**  
**NOTARY PUBLIC OF NEW JERSEY**  
My Commission Expires September 14, 2017

Executed this 24 day of October, 2014

[Signature]  
Fa-Xiang Ding

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY )  
 ) s.s.:  
County of UNION )

On this 24 day of October, 2014, personally appeared before me **Fa-Xiang Ding** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

[Signature]  
Notary Public

**PIA ROCEL S. PARAS-SANJURJO**  
**NOTARY PUBLIC OF NEW JERSEY**  
My Commission Expires September 14, 2017

Attorney Docket No.: 23699

Executed this 24<sup>th</sup> day of October, 2014

[Signature]  
Haifeng Tang

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY

County of UNION

)  
) s.s.:

On this 24 day of October, 2014, personally appeared before me **Haifeng Tang** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

[Signature]  
Notary Public

**PIA ROCEL S. PARAS-SANJURJO**  
**NOTARY PUBLIC OF NEW JERSEY**  
My Commission Expires September 14, 2017

Executed this 24<sup>th</sup> day of October, 2014

[Signature]  
Reynalda K. DeJesus

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY

County of UNION

)  
) s.s.:

On this 24 day of October, 2014, personally appeared before me **Reynalda K. DeJesus** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

[Signature]  
Notary Public

**KAREN ANN MARGIOTTO**  
Commission # 2215590  
Notary Public, State of New Jersey  
My Commission Expires  
**October 22, 2018**

**WORLDWIDE ASSIGNMENT**

WHEREAS, I/WE,

- (1) Shuzhi Dong, located at Plainsboro, NJ,
- (2) Alexander Pasternak, located at Princeton, NJ,
- (3) Xin Gu, located at, Scotch Plains, NJ,
- (4) Qinghong Fu, located at Plainsboro, NJ,
- (5) Jinlong Jiang, located at Scotch Plains, NJ,
- (6) Fa-Xiang Ding, located at, Staten Island, NY,
- (7) Haifeng Tang, located at, Metuchen, NJ,
- (8) Reynalda K. DeJesus, located at East Brunswick, NJ

(hereinafter ASSIGNOR(S)), together with Takao Suzuki, located at Shanghai, China,

are the inventors of the invention described in an application for Patents having the Attorney Docket Number indicated above and the following Title of the Invention:

**INHIBITORS OF THE RENAL OUTER MEDULLARY POTASSIUM CHANNEL**

and/or in the following application(s):

U.S. Provisional Application No. \_\_\_\_\_ filed on \_\_\_\_\_ ;  
U.S. Application No. 15/101,481 having a filing date of 6/3/2016 ; and  
PCT International Application No. PCT/CN2013/090335 having a filing date of December 24, 2013.  
PCT International Application No. PCT/US2014/071336 having a filing date of December 19, 2014

WHEREAS I/WE covenant that the rights and property herein conveyed are free and clear of any encumbrance, and that I/we have the full right to convey the same as herein expressed.

WHEREAS, Merck Sharp & Dohme Corp., a corporation organized under the laws of the State of New Jersey, having an office at 126 East Lincoln Avenue, Rahway, New Jersey 07065, and its successors, assigns and legal representatives (hereinafter **ASSIGNEE**), is desirous of obtaining the entire right, title and interest in, to and under the invention disclosed in said application or applications;

NOW, THEREFORE, for good and valuable consideration, the receipt of which is hereby acknowledged, I/we, said ASSIGNOR(S), do each hereby sell, assign and transfer or confirm the grant and assignment to said **ASSIGNEE** my/our entire right, title and interest in all countries of the world in and to my/our invention described in said application for Patents, in and to the right to file patent applications in the name of **ASSIGNEE**, its designee, or in any or all of our names, at its election, on the aforesaid invention in all countries of the world, together with all rights of priority in the aforesaid countries deriving from the above-identified application for Patents under the International Convention for the Protection of Industrial Property, under the Inter-American Convention relating to Inventions, Patents, Designs and Industrial Models and under any other international arrangement relating to patents or intellectual property, in and to any and all Letters Patent that are granted from the aforesaid application for Patents, in and to any applications claiming priority benefits to a provisional patent application or other applications filed on said invention, and in and to any continuations, divisions, reexaminations, reissues, renewals and extensions thereof of any of said Letters Patent, the same to be held and enjoyed by said **ASSIGNEE**, to the full ends of the terms for which all Letters Patent therefore may be granted, as fully and entirely as the same would have been held and enjoyed by us if this assignment and sale had not been made.

AND I/WE HEREBY covenant and agree that we will at any time, upon the request and at the expense of **ASSIGNEE**, without further compensation or charge to said **ASSIGNEE**, execute and deliver any and all documents that may be necessary or desirable to perfect the title to the foregoing invention, patent applications, and Letters Patent and continuations, divisions, reexaminations, reissues, renewals and extensions thereof in the name of **ASSIGNEE**, including the execution and procurement of any and all further documents evidencing this assignment and sale as may be necessary or desirable for recording the same in the Patent Office of any country concerned, and will make all rightful oaths and declarations and do all lawful acts requisite for procuring the same or for aiding therein.

I/WE HEREBY authorize **ASSIGNEE** to insert in this instrument the Application Number(s) and the filing date(s) of said application for Patents when officially notified thereof.

This document may be executed in any number of counterparts, each of which so executed shall be deemed to be an original, but all such components shall together constitute but one and the same document.



Executed this 24<sup>th</sup> day of October, 2014

\_\_\_\_\_  
Xin Gu

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY                    )  
  ) s.s.:  
County of UNION                            )

On this \_\_\_\_\_ day of \_\_\_\_\_, 2014, personally appeared before me **Xin Gu** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

\_\_\_\_\_  
Notary Public

Executed this 24 day of October, 2014

  
\_\_\_\_\_  
Qinghong Fu

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY                    )  
  ) s.s.:  
County of UNION                            )

On this 24<sup>th</sup> day of OCTOBER, 2014, personally appeared before me **Qinghong Fu** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

  
\_\_\_\_\_  
Notary Public



**CLAIRE BETTY PELLENBERG**  
**NOTARY PUBLIC OF NEW JERSEY**  
**My Commission Expires July 17, 2019**



Executed this \_\_\_\_ day of \_\_\_\_\_, 2014

\_\_\_\_\_  
**Jinlong Jiang**

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY                    )  
  ) s.s.:  
County of UNION                            )

On this \_\_\_\_ day of \_\_\_\_\_, 2014, personally appeared before me **Jinlong Jiang** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

\_\_\_\_\_  
Notary Public

Executed this \_\_\_\_ day of \_\_\_\_\_, 2014

\_\_\_\_\_  
**Fa-Xiang Ding**

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY                    )  
  ) s.s.:  
County of UNION                            )

On this \_\_\_\_ day of \_\_\_\_\_, 2014, personally appeared before me **Fa-Xiang Ding** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

\_\_\_\_\_  
Notary Public

Attorney Docket No.: 23699

Executed this \_\_\_\_ day of \_\_\_\_\_, 2014

\_\_\_\_\_  
**Haifeng Tang**

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY                    )  
  ) s.s.:  
County of UNION                         )

On this \_\_\_\_ day of \_\_\_\_\_, 2014, personally appeared before me **Haifeng Tang** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

\_\_\_\_\_  
Notary Public

Executed this \_\_\_\_ day of \_\_\_\_\_, 2014

\_\_\_\_\_  
**Reynalda K. DeJesus**

**ACKNOWLEDGEMENT**

STATE OF NEW JERSEY                    )  
  ) s.s.:  
County of UNION                         )

On this \_\_\_\_ day of \_\_\_\_\_, 2014, personally appeared before me **Reynalda K. DeJesus** to me known, and known by me to be the same person described in and who executed the foregoing instrument, and acknowledged that he (she) executed the same, of his (her) own free will for the purpose set forth.

(Seal)

\_\_\_\_\_  
Notary Public