505559912 07/08/2019

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT5606709

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
SOMDUTTA ROY	04/13/2017
LAURA SAUNDERS	04/20/2017
CASEY FRANKLIN	04/12/2017
KEVIN MARTINEZ	04/20/2017
SARAH FONG	04/12/2017
ZHAO HUANG	04/13/2017
SILVIA JUAREZ	04/20/2017
ALINA HE	04/20/2017
KATHRYN A. LOVING	04/20/2019
SANDRO VIVONA	04/19/2017

RECEIVING PARTY DATA

Name:	ABBVIE STEMCENTRX LLC	
Street Address: 1 NORTH WAUKEGAN ROAD		
City:	NORTH CHICAGO	
State/Country:	ILLINOIS	
Postal Code: 60064		

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16095057

CORRESPONDENCE DATA

Fax Number: (919)484-2064

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: 9194842304

Email: Casey.Donahoe@wbd-us.com

WOMBLE BOND DICKINSON (US) LLP Correspondent Name:

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Address Line 2: IP DOCKET DEPARTMENT

Address Line 4: ATLANTA, GEORGIA 30357-0037

ATTORNEY DOCKET NUMBER: S69697 1400US.PCT

REEL: 049686 FRAME: 0611 505559912

PATENT

NAME OF SUBMITTER:	CASEY D. DONAHOE, PH.D.		
SIGNATURE:	/casey d donahoe/		
DATE SIGNED:	07/08/2019		
Total Attachments: 15			
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Attorney Docket No.: sc9101WOO1

S69697 1400WO

ASSIGNMENT OF PATENT APPLICATION

WHEREAS, <u>Somdutta ROY</u> of San Bruno, California, USA, <u>Laura SAUNDERS</u> of San Francisco, California, USA, <u>Casey FRANKLIN</u> of Pacifica, California, USA, <u>Kevin MARTINEZ</u> of Davis, California, USA, <u>Sarah FONG</u> of Oakland, California, USA, <u>Zhao HUANG</u> of Burlingame, California, USA, <u>Silvia JUAREZ</u> of Millbrae, California, USA, <u>Alina HE</u> of San Francisco, CA, USA, <u>Kathryn A. LOVING</u> of Berkeley, CA, USA, and <u>Sandro VIVONA</u> of Emerald Hills, CA, USA; hereinafter referred to as "Assignors," are the inventors of the invention described and set forth in the below-identified patent application:

Title of Invention: NOVEL ANTI-BMPRIB ANTIBODIES AND METHODS OF USE.

Filed on April 21, 2017 as International Application No. PCT/US2017/028772 which claims priority of U.S. Provisional Patent Application No. 62/325,981 filed April 21, 2016, U.S. Provisional Patent Application No. 62/443,404 filed January 6, 2017, and U.S. Provisional Patent Application No. 62/486,140 filed April 17, 2017

WHEREAS, AbbVie Stemcentrx LLC, a limited liability company organized and existing under the laws of the state of Delaware, and having its registered office at 1 North Waukegan Road, North Chicago, Illinois 60064 USA (hereinafter referred to as "Assignee"), is desirous of acquiring all of Assignors' right, title, and interest in and to said invention, the right to file applications on said invention, and the right, title and interest in and to any applications, including provisional applications, for Letters Patent of the United States or other countries claiming priority to said applications, and in and to any Letters Patent or Patents, United States or foreign, to be obtained therefor and thereon;

NOW, THEREFORE, TO ALL WHOM IT MAY CONCERN: Be it known that, for good and valuable consideration, receipt of which is hereby acknowledged by Assignors, Assignors have sold, assigned, transferred, and set over, and by these presents does sell, assign, transfer, and set over unto the Assignee, and Assignees' successors, legal representatives, and assigns, all of the Assignors' right, title, and interest in and to the above-mentioned invention, the right to file applications on said invention and the right, title and interest in and to any applications, including provisional applications, for Letters Patent of the United States or other countries claiming priority to said applications, and any and all Letters Patent or Patents of the United States of America and all foreign countries that have been or may be granted therefor and thereon, and in and to any and all applications claiming priority to said applications, divisions, renewals, substitutions, conversions, continuations, and continuations-in-part of said applications, and reissues, prolongations and extensions of said Letters Patent or Patents, and all rights under the International Convention for the Protection of Industrial Property, the same to be held and enjoyed by the Assignee, for its own use and behalf and the use and behalf of its successors, legal representatives, and assigns, to the full end of the term or terms for which Letters Patent or Patents may be granted as fully and entirely as the same would have been held and enjoyed by the Assignors had his/her sale and assignment not been made.

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sc9101WOO1

Page 2 of 5

AND Assignors hereby covenant that Assignors have the full right to convey the interest assigned by this Assignment, and Assignors have not executed and will not execute any agreement in conflict with this Assignment,

AND for the same consideration, the Assignors hereby covenant and agree to and with the Assignee, its successors, legal representatives, and assigns, that the Assignors will, whenever counsel of the Assignee, or the counsel of its successors, legal representatives, and assigns, shall advise that any proceeding in connection with said invention or said applications for Letters Patent or Patents, or any proceeding in connection with Letters Patent or Patents for said inventions in any country, including interference proceedings, is lawful and desirable, or that any application claiming priority to said application, division, continuation, or continuation-in-part of any applications for Letters Patent or Patents, or any reissue or extension of any Letters Patent or Patents to be obtained thereon, is lawful and desirable, sign all papers and documents, take all lawful oaths, and do all acts necessary or required to be done for the procurement, maintenance, enforcement and defense of Letters Patent or Patents for said inventions, without charge to the Assignce, its successors, legal representatives, and assigns, but at the cost and expense of the Assignee, its successors, legal representatives, and assigns;

AND Assignors hereby authorize and request that the attorneys having Power of Attorney this application in insert International herein the Application PCT/US2017/ **028772** for the application filed April 21, 2017, and for the priority U.S. Provisional Patent Application No. 62/486,140 filed April 17 ,2017, when said application numbers are assigned.

IN TESTIMONY WHEREOF, Assignors have signed their names on the date indicated:

1.

Witness

Printed Name of Witness

sc9101WOO1 Page 3 of 5

4/z0/17	Lui Sainte
Date	Laura SAUNDERS
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Date	Witness
	Chris Many
	Printed Name of Witness
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4/12/2017	A Commence of the Commence of
Date	
	Casey FRANKIAN
4/12/2017	
Date	Witness
	Deborah A. Mojarro
	Printed Name of Witness
8	
1/20/H	
Date	Kevin MARTINEZ
4/20/2017	
Date	Witness
	Printed Name of Witness
	Tarried statue of Williams
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1647	
Date	Sarah FONG
4/12/2017	100 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0
Date	MATTER STATE OF THE STATE OF TH
17810	Witness
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Printed Name of Witness

A Mariana Co Porton, de Nove e proposado y vincionado
Attorney Docket No.: S69697 1400WO sc9101WOO1
Page 4 of 5
Zhao HUANG
"1944 OQ/VX
Witness
Deborah A. Mojarvo
Printed Name of Witness
Silvia JUAREZ
Witness
Chic Pat
Printed Name of Witness
4624
Alina HE

Printed Name of Witness

Kathryn A. LOVING

Witness

Printed Name of Witness

Date

6.

Date

Date

sc9101WOO1 Page 5 of 5

- Apr/19/2acz	N 1 1 NAS
Date	Sandro VIVONA
4/19/17	
Date	Witness
	Clara Data.
	Printed Name of Witness
IN TESTIMONY WHEREOF, Assig	gnee has signed his/her name on the date indicated
IN TESTIMONY WHEREOF, Assig	gnee has signed his/her name on the date indicated ABBVIE STEMCENTRY LLC
	ABBVIE STEMCENTRX LLC Johanna M. Corbin
Date	ABBVIE STEMCENTRX LLC
	ABBVIE STEMCENTRX LLC Johanna M. Corbin

Attorney Docket No.: sc9101WOO1

S69697 1400WO

ASSIGNMENT OF PATENT APPLICATION

WHEREAS, <u>Somdutta ROY</u> of San Bruno, California, USA, <u>Laura SAUNDERS</u> of San Francisco, California, USA, <u>Casey FRANKLIN</u> of Pacifica, California, USA, <u>Kevin MARTINEZ</u> of Davis, California, USA, <u>Sarah FONG</u> of Oakland, California, USA, <u>Zhao HUANG</u> of Burlingame, California, USA, <u>Silvia JUAREZ</u> of Millbrae, California, USA, <u>Alina HE</u> of San Francisco, CA, USA, <u>Kathryn A. LOVING</u> of Berkeley, CA, USA, and <u>Sandro VIVONA</u> of Emerald Hills, CA, USA; hereinafter referred to as "Assignors," are the inventors of the invention described and set forth in the below-identified patent application:

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NOW, THEREFORE, TO ALL WHOM IT MAY CONCERN: Be it known that, for good and valuable consideration, receipt of which is hereby acknowledged by Assignors, Assignors have sold, assigned, transferred, and set over, and by these presents does sell, assign, transfer, and set over unto the Assignee, and Assignees' successors, legal representatives, and assigns, all of the Assignors' right, title, and interest in and to the above-mentioned invention, the right to file applications on said invention and the right, title and interest in and to any applications, including provisional applications, for Letters Patent of the United States or other countries claiming priority to said applications, and any and all Letters Patent or Patents of the United States of America and all foreign countries that have been or may be granted therefor and thereon, and in and to any and all applications claiming priority to said applications, divisions, renewals, substitutions, conversions, continuations, and continuations-in-part of said applications, and reissues, prolongations and extensions of said Letters Patent or Patents, and all rights under the International Convention for the Protection of Industrial Property, the same to be held and enjoyed by the Assignce, for its own use and behalf and the use and behalf of its successors, legal representatives, and assigns, to the full end of the term or terms for which Letters Patent or Patents may be granted as fully and entirely as the same would have been held and enjoyed by the Assignors had his/her sale and assignment not been made.

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sc9101WOO1 Page 2 of 5

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AND for the same consideration, the Assignors hereby covenant and agree to and with the Assignee, its successors, legal representatives, and assigns, that the Assignors will, whenever counsel of the Assignee, or the counsel of its successors, legal representatives, and assigns, shall advise that any proceeding in connection with said invention or said applications for Letters Patent or Patents, or any proceeding in connection with Letters Patent or Patents for said inventions in any country, including interference proceedings, is lawful and desirable, or that any application claiming priority to said application, division, continuation, or continuation-in-part of any applications for Letters Patent or Patents, or any reissue or extension of any Letters Patent or Patents to be obtained thereon, is lawful and desirable, sign all papers and documents, take all lawful oaths, and do all acts necessary or required to be done for the procurement, maintenance, enforcement and defense of Letters Patent or Patents for said inventions, without charge to the Assignee, its successors, legal representatives, and assigns, but at the cost and expense of the Assignee, its successors, legal representatives, and assigns;

	s applicat	ion insert	herein	the	International	Application	No.
PCT/US2	017/ 028772					017, and for the	
U.S. Prov	visional Pater	it Application	No. 62/4	86,140	filed April	17 ,2017, wh	en said

IN TESTIMONY WHEREOF, Assignors have signed their names on the date indicated:

1.	Date	Somdutta ROY
	Date	Witness
		Printed Name of Witness

WCSR 38426215v1

sc9101WOO1 Page 3 of 5

Date	Laura SAUNDERS
Date	Witness
	Printed Name of Witness
Date	Casey FRANKLIN
Date	Witness
	Printed Name of Witness
Date	Kevin MARTINEZ
Date	Witness
	Printed Name of Witness
Date	Sarah FONG
Date	Witness
	Printed Name of Witness

sc9101WOO1 Page 4 of 5

Date	Zhao HUANG
Date	Witness
	Printed Name of Witness
Date	Silvia JUAREZ
Date	Witness
	Printed Name of Witness
Date	Alina HE
Date	Witness
	Printed Name of Witness
<u>4/22/2013</u> Date	Kathryn A. I/OVING
4/20/2017 Date	
Date	Witness <u>GA/GN</u> S. OVING Printed Name of Witness

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Date	Sandre VIVONA
Date	Witness
	Printed Name of Witness
IN TESTIMONIV WH	
KA ATOTIMAAA E WAT	EREOF, Assignee has signed his/her name on the date indicated: ABBVIE STEMCENTRY LLC
Date	ABBVIE STEMCENTRX LLC Johanna M. Corbin

Attorney Docket No.: sc9101WOO1

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ASSIGNMENT OF PATENT APPLICATION

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in Pert	this application	insert herein	test that the attorneys have the International on filed April 21 , 20	Application No.
U.S.	Provisional Patent Apication numbers are ass	oplication No. 62/486	5,140 filed April	17, and for the priority 17, 2017, when said
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	IN TESTIMONY W	HEREUF, Assignors	have signed their names	on the date indicated:
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1.	Date		Somdutta ROY	

Witness

Printed Name of Witness

WCSR 38426215v1

Date

sc9101WOO1 Page 3 of 5

Date	Laura SAUNDERS
Date	Witness
	Printed Name of Witness
Date	Casey FRANKLIN
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	Printed Name of Witness
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Date	Witness
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Date	Sarah FONG
Date	Witness
	Printed Name of Witness

sc9101WOO1 Page 4 of 5

6.		
	Date	Zhao HUANG
	Date	Witness
		Printed Name of Witness
7.		
, ,	Date	Silvia JUAREZ
	Date	Witness
		Printed Name of Witness
8.	Date	
		Alina HE
	Date	Witness
		Printed Name of Witness
9.	Plant	
	Date	Kathryn A. LOVING
	Date	Witness
		Printed Name of Witness

sc9101WOO1 Page 5 of 5

ute	Witness Printed Name of Witness
	Printed Name of Witness
	e has signed his/her name on the date indicated:
	ABBVIE STEMCENTRX LLC
<i>P/3/4_25</i> , <u>20/7</u> ite	Johanna M. Corbin
	Assistant Secretary
<i>27.11</i>	<u>Zun Zou Zamonski</u> Witness
	FILEEN ROSE KAMINSKI