

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
 Stylesheet Version v1.2

EPAS ID: PAT4839947

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
MARK KRANS	02/23/2018
THEODORE PAUL DALE	02/06/2018
ANDREA N. PARA	02/23/2018
MATHIAS CHARLES GLIMSDALE	02/06/2018
THOMAS M. BENSON	02/07/2018
PETER N. BRAIDO	02/21/2018
<b>RECEIVING PARTY DATA</b>	
<b>Name:</b>	ST. JUDE MEDICAL, CARDIOLOGY DIVISION, INC.
<b>Street Address:</b>	177 EAST COUNTY ROAD B
<b>City:</b>	ST. PAUL
<b>State/Country:</b>	MINNESOTA
<b>Postal Code:</b>	55117
<b>PROPERTY NUMBERS Total: 1</b>	
<b>Property Type</b>	<b>Number</b>
Application Number:	15077070
<b>CORRESPONDENCE DATA</b>	
<b>Fax Number:</b>	(908)654-0415
<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>	(908) 518-6335
<b>Email:</b>	assignment@lernerdavid.com
<b>Correspondent Name:</b>	LERNER, DAVID, LITTENBERG, KRUMHOLZ & MENTLIK, LLP
<b>Address Line 1:</b>	600 SOUTH AVENUE WEST
<b>Address Line 4:</b>	WESTFIELD, NEW JERSEY 07090
<b>ATTORNEY DOCKET NUMBER:</b>	STJUDE 3.0F-349
<b>NAME OF SUBMITTER:</b>	KATHLEEN REYNOLDS
<b>SIGNATURE:</b>	/Kathleen Reynolds/
<b>DATE SIGNED:</b>	02/26/2018
<b>Total Attachments: 6</b>	

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source=STJUDE 3.0-349 (1984) Assignment#page6.tif

## ASSIGNMENT OF UTILITY APPLICATION

Docket Number (Optional)

STJUDE 3.0F-349

Whereas, I, Mark Krans of  
738 Drillane Circle; Hopkins, Minnesota 55305

hereafter referred to as assignor, have with others invented certain new and useful improvements in  
PROSTHETIC MITRAL VALVE

☒ for which an application for a United States Letters Patent was filed on March 22, 2016

Application Number 15/077,070

☐ for which an application for a United States Letters Patent was executed by me on \_\_\_\_\_,  
 and \_\_\_\_\_

Whereas, St. Jude Medical, Cardiology Division, Inc.  
 a corporation of Delaware herein referred to as "assignee" whose mailing address is  
177 East County Road B; St. Paul, Minnesota 55117

is desirous of acquiring the entire right, title and interest in the same;

NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00 ), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.

I, as assignor, hereby assign to said assignee all of my right, title and interest in United States Provisional Application No. 62/137,444, filed March 24, 2015, and in the invention disclosed thereto in all countries of the world including the right to claim priority or benefit of said Application No. 62/137,444 pursuant to any law or treaty in the countries of the world.

And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.

23 Feb 2018

(Date)

Mark Krans

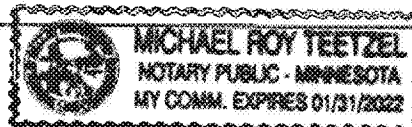
(Signature)

State of Minnesota ) SS:  
 County of Anoka )

On this 23 day of February, 2018 before me personally came the above-named Mark Krans, to me personally known as the individual who executed the foregoing instrument, who acknowledged to me that the same was executed by him/her of his/her own free will for the purposes therein set forth.

Michael Roy Teetzal  
 (Notary Public)

☒ \*Total of 6 forms are submitted.



## ASSIGNMENT OF UTILITY APPLICATION

Docket Number (Optional)

STJUDE 3.0F-349

Whereas, I, Theodore Paul Dale of  
6905 Old Settlers Road; Corcoran, Minnesota 55340  
 hereafter referred to as assignor, have with others invented certain new and useful improvements in  
PROSTHETIC MITRAL VALVE

☒ for which an application for a United States Letters Patent was filed on March 22, 2016

Application Number 15/077,970

☐ for which an application for a United States Letters Patent was executed by me on \_\_\_\_\_  
 and \_\_\_\_\_

Whereas, St. Jude Medical, Cardiology Division, Inc.  
 a corporation of Delaware herein referred to as "assignee" whose mailing address is  
177 East County Road B; St. Paul, Minnesota 55117  
 is desirous of acquiring the entire right, title and interest in the same;

NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00 ), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.

I, as assignor, hereby assign to said assignee all of my right, title and interest in United States Provisional Application No. 62/137,444, filed March 24, 2015, and in the invention disclosed thereto in all countries of the world including the right to claim priority or benefit of said Application No. 62/137,444 pursuant to any law or treaty in the countries of the world.

And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.

Tuesday February 6 2018  
 (Date)

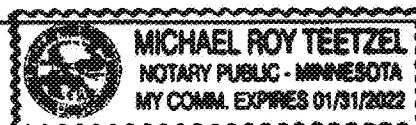
T. J. Dale  
 (Signature)

State of Minnesota ) SS:  
 County of Anoka )

On this 6 day of February, 2018 before me personally came the above-named Theodore Paul Dale to me personally known as the individual who executed the foregoing instrument, who acknowledged to me that the same was executed by him/her of his/her own free will for the purposes therein set forth.

Michael Roy Teetzel  
 (Notary Public)

☒ \*Total of 6 forms are submitted.



# ASSIGNMENT OF UTILITY APPLICATION

Docket Number (Optional)

STJUDE 3 OF-349

Whereas, I, Andrea N. Para of 7732 Gannon Ave., Apt. 2F, St. Louis, Missouri 63130

hereafter referred to as assignor, have with others invented certain new and useful improvements in

PROSTHETIC MITRAL VALVE

☒ for which an application for a United States Letters Patent was filed on March 22, 2016

Application Number 15/077,070

☐ for which an application for a United States Letters Patent was executed by me on \_\_\_\_\_, and

Whereas, St. Jude Medical, Cardiology Division, Inc. a corporation of Delaware herein referred to as "assignee" whose mailing address is 177 East County Road B, St. Paul, Minnesota 55117

is desirous of acquiring the entire right, title and interest in the same;

NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00 ), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.

I, as assignor, hereby assign to said assignee all of my right, title and interest in United States Provisional Application No. 62/137,444, filed March 24, 2015, and in the invention disclosed thereto in all countries of the world including the right to claim priority or benefit of said Application No. 62/137,444 pursuant to any law or treaty in the countries of the world.

And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.

23 Feb 18

(Date)

Andrea Para

(Signature)

State of Missouri ) SS:  
County of St. Louis )

On this 23 day of February, before me personally came the above-named Andrea N. Para, to me personally known as the individual who executed the foregoing instrument, who acknowledged to me that the same was executed by him/her of his/her own free will for the purposes therein set forth.

Jessica Andrea Coleman  
(Notary Public)

JESSICA ANDREA COLEMAN  
Notary Public - Notary Seal

STATE OF MISSOURI  
St. Louis County

My Commission Expires: Dec. 20, 2021  
Commission # 17867974

☒ \*Total of 6 forms are submitted.

PATENT

REEL: 045037 FRAME: 0488

REEL: 045037 FRAME: 0489

## ASSIGNMENT OF UTILITY APPLICATION

Docket Number (Optional)

STJUDE 3.0F-349

Whereas, I, Thomas M. Benson of  
3423 Tyler Street NE; Minneapolis, Minnesota 55418

hereafter referred to as assignor, have with others invented certain new and useful improvements in

PROSTHETIC MITRAL VALVE

☒ for which an application for a United States Letters Patent was filed on March 22, 2016

Application Number 15/077,070

☐ for which an application for a United States Letters Patent was executed by me on \_\_\_\_\_  
 and \_\_\_\_\_

Whereas, St. Jude Medical, Cardiology Division, Inc.  
 a corporation of Delaware herein referred to as "assignee" whose mailing address is  
177 East County Road B; St. Paul, Minnesota 55117

is desirous of acquiring the entire right, title and interest in the same;

NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00 ), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.

I, as assignor, hereby assign to said assignee all of my right, title and interest in United States Provisional Application No. 62/137,444, filed March 24, 2015, and in the invention disclosed thereto in all countries of the world including the right to claim priority or benefit of said Application No. 62/137,444 pursuant to any law or treaty in the countries of the world.

And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.

7-FEB-2016

(Date)

Thomas M. Benson

(Signature)

State of \_\_\_\_\_ ) SS:  
 County of \_\_\_\_\_ )

On this \_\_\_\_\_ day of \_\_\_\_\_, \_\_\_\_\_ before me personally came the above-named Thomas M. Benson, to me personally known as the individual who executed the foregoing instrument, who acknowledged to me that the same was executed by him/her of his/her own free will for the purposes therein set forth.

\_\_\_\_\_  
 (Notary Public)

☒ Total of 6 forms are submitted.

<b>ASSIGNMENT OF UTILITY APPLICATION</b>	Docket Number (Optional) <b>STJUDE 3.0F-349</b>
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Whereas, I, Peter N. Braid of 21460 Heidelberg St. NE; Wyoming, Minnesota 55092

hereafter referred to as assignor, have with others invented certain new and useful improvements in PROSTHETIC MITRAL VALVE

☒ for which an application for a United States Letters Patent was filed on March 22, 2016

Application Number 15/077,070

☐ for which an application for a United States Letters Patent was executed by me on \_\_\_\_\_, and \_\_\_\_\_

Whereas, St. Jude Medical, Cardiology Division, Inc. a corporation of Delaware herein referred to as "assignee" whose mailing address is 177 East County Road B; St. Paul, Minnesota 55117

is desirous of acquiring the entire right, title and interest in the same;

NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00 ), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.

I, as assignor, hereby assign to said assignee all of my right, title and interest in United States Provisional Application No. 62/137,444, filed March 24, 2015, and in the invention disclosed thereto in all countries of the world including the right to claim priority or benefit of said Application No. 62/137,444 pursuant to any law or treaty in the countries of the world.

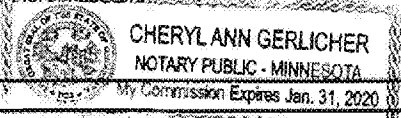
And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.

21 Feb 2018 (Date) Peter N. Braid (Signature)

State of MINNESOTA ) SS:  
County of ANKA )

On this 22nd day of FEBRUARY, 2018, before me personally came the above-named Peter N. Braid, to me personally known as the individual who executed the foregoing instrument, who acknowledged to me that the same was executed by him/her of his/her own free will for the purposes therein set forth.

C. Gerlicher  
(Notary Public)



\*Total of 6 forms are submitted.