

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
 Stylesheet Version v1.2

EPAS ID: PAT5810886

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
EUGENE CHARLES JANSEN	06/13/2018
JEFFREY CHEN	06/22/2018
<b>RECEIVING PARTY DATA</b>	
<b>Name:</b>	THERMAL AND FLUIDS SOLUTIONS GROUP, LLC
<b>Street Address:</b>	357 DECATUR ROAD
<b>City:</b>	STAFFORD
<b>State/Country:</b>	VIRGINIA
<b>Postal Code:</b>	22554
<b>PROPERTY NUMBERS Total: 1</b>	
<b>Property Type</b>	<b>Number</b>
<b>Application Number:</b>	16611932
<b>CORRESPONDENCE DATA</b>	
<b>Fax Number:</b>	
<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>	202-776-7800
<b>Email:</b>	amherrman@duanemorris.com
<b>Correspondent Name:</b>	DUANE MORRIS LLP (RRC)
<b>Address Line 1:</b>	505 9TH ST. NW
<b>Address Line 2:</b>	SUITE 1000
<b>Address Line 4:</b>	WASHINGTON, D.C. 20004
<b>ATTORNEY DOCKET NUMBER:</b>	G3106-00302 / LWA12264
<b>NAME OF SUBMITTER:</b>	D. JOSEPH ENGLISH
<b>SIGNATURE:</b>	/D. Joseph English/
<b>DATE SIGNED:</b>	11/08/2019
<b>Total Attachments: 5</b>	
source=G3106-00302_Jansen_TFSG_Assignment#page1.tif	
source=G3106-00302_Jansen_TFSG_Assignment#page2.tif	
source=G3106-00302_Chen_TFSG_Assignment#page1.tif	
source=G3106-00302_Chen_TFSG_Assignment#page2.tif	



## ASSIGNMENT

Name of Inventor: Eugene Charles Jansen

For good and valuable consideration, sufficiency and receipt of which is hereby acknowledged by the undersigned, the undersigned agrees to assign, and hereby does assign, transfer and set over to

Name of Assignee: Thermal and Fluids Solutions Group, LLC

Address of Assignee: 357 Decatur Road  
Stafford, VA 22554

and its successors, legal representatives and assigns (hereinafter designated as the Assignee) the entire right, title and interest in the invention disclosed and/or claimed in the application for patent identified below, the application for patent from which it claims priority, as well as all applications for patent and any Letters Patent which may be granted therefor and therefrom in the United States of America and all foreign countries, and in and to any and all divisions, continuations, continuations-in-part of said applications, or re-issues or extensions of said patents or Letters Patent, and all rights under the International Convention for the Protection of Industrial Property, including but not limited to the right to claim damages and seek all other remedies against any third party's infringement of said patents which occurred prior to or after the assignment, the right and interests to claim priority related to said applications and patents as well as all other emoluments, interests, profits, and benefits arising therefrom:

Title: TWO-PHASE THERMAL PUMP

Application Number: PCT/US18/33543

Date filed: May 18, 2018

claiming priority of:

Title: SINGLE-PASS EXPENDABLE TWO-PHASE THERMAL PUMPER WITH POWER RECOVERY

Application Number: 62/508,074

Date filed: May 18, 2017

The undersigned further agrees to cooperate with the Assignee in every way possible and to do all affirmative acts, and to execute all papers which counsel for Assignee shall advise are necessary and/or desirable without charge to Assignee in connection with said applications including, without limitation, the execution of separate assignments in connection with such applications, claims or provisions of the International Convention for Protection of Industrial Property or similar agreements.

The undersigned hereby authorizes and requests the Commissioner of Patents to issue any and all Letters Patent of the United States resulting from said application or any division or divisions or continuing applications thereof to said Assignee, as Assignee of the entire interest, and hereby covenants that he has full right to convey the entire interest herein assigned, and that he not executed and will not execute, any agreement in conflict herewith.

In witness whereof, executed by the undersigned on the date indicated.

Date 6/13/18

Signature of Inventor [Signature]  
Eugene Charles Jansen

STATE OF Virginia

COUNTY OF Stafford

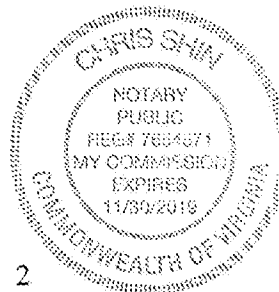
SS.

On this, the 13 day of June, 2018, before me, Chris Shin, personally appeared Eugene Charles Jansen, known to me (or satisfactorily proven) to be Eugene Charles Jansen, being authorized to do so, executed the foregoing instrument for the purposes therein contained.

IN WITNESS WHEREOF, I have hereunto set my hand and official seal.

[Signature]  
NOTARY PUBLIC

My commission expires: 11/30/2019



## ASSIGNMENT

Name of Inventor: Jeffrey Chen

For good and valuable consideration, sufficiency and receipt of which is hereby acknowledged by the undersigned, the undersigned agrees to assign, and hereby does assign, transfer and set over to

Name of Assignee: Thermal and Fluids Solutions Group, LLC

Address of Assignee: 357 Decatur Road

Stafford, VA 22554

and its successors, legal representatives and assigns (hereinafter designated as the Assignee) the entire right, title and interest in the invention disclosed and/or claimed in the application for patent identified below, the application for patent from which it claims priority, as well as all applications for patent and any Letters Patent which may be granted therefor and therefrom in the United States of America and all foreign countries, and in and to any and all divisions, continuations, continuations-in-part of said applications, or re-issues or extensions of said patents or Letters Patent, and all rights under the International Convention for the Protection of Industrial Property, including but not limited to the right to claim damages and seek all other remedies against any third party's infringement of said patents which occurred prior to or after the assignment, the right and interests to claim priority related to said applications and patents as well as all other emoluments, interests, profits, and benefits arising therefrom:

Title: TWO-PHASE THERMAL PUMP

Application Number: PCT/US18/33543

Date filed: May 18, 2018

claiming priority of:

Title: SINGLE-PASS EXPENDABLE TWO-PHASE THERMAL PUMPER WITH POWER RECOVERY

Application Number: 62/508,074

Date filed: May 18, 2017

**PATENT**

**REEL: 050956 FRAME: 0494**

The undersigned further agrees to cooperate with the Assignee in every way possible and to do all affirmative acts, and to execute all papers which counsel for Assignee shall advise are necessary and/or desirable without charge to Assignee in connection with said applications including, without limitation, the execution of separate assignments in connection with such applications, claims or provisions of the International Convention for Protection of Industrial Property or similar agreements.

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In witness whereof, executed by the undersigned on the date indicated.

Date 6/22/18

Signature of Inventor

Jeffrey Chen  
Jeffrey Chen

STATE OF \_\_\_\_\_:

COUNTY OF \_\_\_\_\_:

SS.

SEE ATTACHED  
CALIFORNIA  
ACKNOWLEDGEMENT

On this, the \_\_\_\_\_ day of \_\_\_\_\_, 2018, before me, \_\_\_\_\_, personally appeared Eugene Charles Jansen, known to me (or satisfactorily proven) to be Eugene Charles Jansen, being authorized to do so, executed the foregoing instrument for the purposes therein contained.

IN WITNESS WHEREOF, I have hereunto set my hand and official seal.

\_\_\_\_\_  
NOTARY PUBLIC

My commission expires:

**ACKNOWLEDGMENT**  
(CALIFORNIA CIVIL CODE 1189)

A notary public or other officer completing this certificate verifies only the identity of the individual who signed the document to which this certificate is attached, and not the truthfulness, accuracy, or validity of that document.

State of California }  
County of Orange } ss.

On JUNE 22<sup>ND</sup> 2018 before me, RANA AMIRANI, Notary Public,  
(Name and title of the officer)

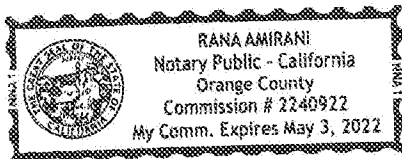
personally appeared JEFFREY CHEN,

Name(s) of Signer(s)

Who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that he executed the same in his authorized capacity, and that by his signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.

I certify under PENALTY OF PERJURY under the laws of the State of California that the forgoing paragraph is true and correct.

WITNESS my hand and official seal.



Place Notary Seal Above

Signature Rana Amirani  
Signature of Notary Public

**OPTIONAL INFORMATION**

Description of Attached Document: ASSIGNMENT

Number of Pages: 2

Document Date: JUNE 22<sup>ND</sup> 2018