

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
 Stylesheet Version v1.2

EPAS ID: PAT4810685

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
ZHOU FENG	01/17/2018
NING LI	01/17/2018
HONGLIANG WU	01/17/2018
HUAFENG WANG	01/17/2018
QINGFU FENG	01/17/2018
KEWEN WANG	01/17/2018
<b>RECEIVING PARTY DATA</b>	
<b>Name:</b>	PETROCHINA COMPANY LIMITED
<b>Street Address:</b>	9 DONGZHIMEN NORTH STREET
<b>Internal Address:</b>	DONGCHENG DISTRICT
<b>City:</b>	BEIJING
<b>State/Country:</b>	CHINA
<b>Postal Code:</b>	100007
<b>PROPERTY NUMBERS Total: 1</b>	
<b>Property Type</b>	<b>Number</b>
<b>Application Number:</b>	15749290
<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>Email:</b>	ptocommunications@hoffmanwarnick.com, dcole@hoffmanwarnick.com
<b>Correspondent Name:</b>	HOFFMAN WARNICK LLC
<b>Address Line 1:</b>	540 BROADWAY
<b>Address Line 4:</b>	ALBANY, NEW YORK 12207
<b>ATTORNEY DOCKET NUMBER:</b>	GAI15CN2264P-US
<b>NAME OF SUBMITTER:</b>	STEPHEN F. SWINTON, JR.
<b>SIGNATURE:</b>	/Stephen F. Swinton, Jr./
<b>DATE SIGNED:</b>	02/05/2018

**Total Attachments: 2**

source=GAI15CN2264P-US\_Assignment\_Executed\_31JAN2018#page1.tif

source=GAI15CN2264P-US\_Assignment\_Executed\_31JAN2018#page2.tif

**ASSIGNMENT**

Whereas, we, Zhou Feng, Ning Li, Hongliang Wu, Huafeng Wang, Qingfu Feng and Kewen Wang, Owners of the entire right and interest in the invention entitled:

**Title of the Invention: STRATUM COMPONENT OPTIMIZATION DETERMINATION METHOD AND DEVICE**

and further identified by the Docket Number provided above in the header of this Assignment, for which a PCT application was filed having:

**International Application No. PCT/CN2016/101643 filed October 10, 2016**

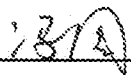
Whereas, PETROCHINA COMPANY LIMITED, 9 Dongzhimen North Street, Dongcheng District, Beijing, 100007, Republic of China (herein referred to as "ASSIGNEE"), desires to acquire, and we desire to grant to ASSIGNEE, our entire worldwide right, title, and interest in and to the Invention and in and to any and all patent applications and patents directed thereto;

Now, therefore, for good and valuable consideration, the receipt and sufficiency thereof being hereby acknowledged, we Zhou Feng, Ning Li, Hongliang Wu, Huafeng Wang, Qingfu Feng and Kewen Wang, herein referred to ("ASSIGNOR") hereby sell or have sold, assign or have assigned, and otherwise transfer or have transferred to PETROCHINA COMPANY LIMITED (the "ASSIGNEE"), its successors, legal representatives, and assigns, our entire worldwide right, title, and interest in and to the Invention, the above-identified United States patent application, and any and all other patent applications and patents for the Invention which may be applied for or granted therefor in the United States and in all foreign countries and jurisdictions, including all divisions, continuations, reissues, reexaminations, renewals, extensions, counterparts, substitutes, and extensions thereof, and all rights of priority resulting from the filing of such applications and granting of such patents. In addition, we hereby authorize and request the Director of the United States Patent and Trademark Office to issue any United States Patent, and foreign patent authorities to issue any foreign patent, granted for the Invention, to ASSIGNEE, its successors, legal representatives, and assigns, our entire worldwide right, title, and interest in and to the same to be held and enjoyed by ASSIGNEE, its successors, legal representatives, and assigns to the full end of the terms for which any and all such patents may be granted, as fully and entirely as would have been held and enjoyed by us had this Assignment not been made; and we agree to execute any and all documents and instruments and perform all lawful acts reasonably related to recording this Assignment or perfecting title to the Invention and all related patents and applications, in ASSIGNEE, its successors, legal representatives, and assigns, whenever requested by ASSIGNEE, its successors, legal representatives, or assigns.

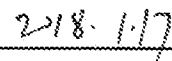
We acknowledge our prior and ongoing obligations to sell, assign, and transfer our rights under this Assignment to ASSIGNEE, and are unaware of any reason why we may not have the full and unencumbered right to sell, assign, and transfer my rights hereby sold, assigned, and transferred, and have not executed, and will not execute, any document or instrument in conflict herewith. This Assignment is governed by the substantive laws of the State of New York, and any disputes will be resolved in a New York state court or federal court sited in New York.

Zhou Feng

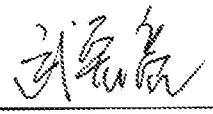
Signature: \_\_\_\_\_

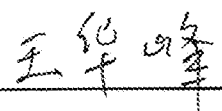


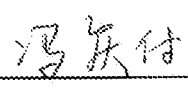
Date: \_\_\_\_\_



Ning Li  Date: 2018.1.17.

Hongliang Wu  Date: 2018.1.17

Huafeng Wang  Date: 2018.1.17

Qingfu Feng  Date: 2018.1.17

Kewen Wang  Date: 2018.1.17