

PATENT ASSIGNMENT

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SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT
CONVEYING PARTY DATA	
Name	Execution Date
Wenyue Xu	06/10/2009
Marc Jean Thiercelin	06/10/2009
RECEIVING PARTY DATA	
Name:	Schlumberger Technology Corporation
Street Address:	One Hampshire Street
City:	Cambridge
State/Country:	MASSACHUSETTS
Postal Code:	02139
PROPERTY NUMBERS Total: 1	
Property Type	Number
Application Number:	12479335
CORRESPONDENCE DATA	
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<i>Correspondence will be sent via US Mail when the fax attempt is unsuccessful.</i>	
Phone:	617 768-2268
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Correspondent Name:	Schlumberger Technology Corporation
Address Line 1:	P.O. Box 425045
Address Line 4:	Cambridge, MASSACHUSETTS 02142
ATTORNEY DOCKET NUMBER:	122.0048 US NP
NAME OF SUBMITTER:	Barbara Kilfoyle

Total Attachments: 5
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Assignment

WHEREAS, the undersigned inventors hereinafter referred to as the "Inventors" each said Inventor's address being listed below

Wenyue Xu a citizen of China, residing at 18824 Fortson Avenue, Dallas, Texas 75252, USA and

Marc Jean Thiercelin a citizen of France, residing at 6908 Vineridge Drive, Dallas, Texas, 75248, USA

Has/have invented certain new and useful improvements in:

METHOD AND APPARATUS FOR EFFICIENT REAL-TIME CHARACTERIZATION OF HYDRAULIC FRACTURES AND FRACTURING OPTIMIZATION BASED THEREON

as described and set forth in an application for Letters Patent of the United States of America, filed with the United States Patent and Trademark Office on June 5, 2009, Serial No. 12/479,335 (Docket No. 122.0048 US NP).

WHEREAS each of the undersigned persons warrants that no person other than these undersigned persons are inventors of the above-described invention;

AND WHEREAS, the "COMPANIES", listed in Schedule A, are desirous of acquiring or confirming their acquisition of the entire right, title and interest in and to said invention, inventions or improvements, and in and to said application, and in and to any and all patents, both of the United States and of all foreign countries, that may be obtained therefore as outlined in Schedule A;

NOW, THEREFORE, TO ALL WHOM IT MAY CONCERN, BE IT KNOWN, that the undersigned Inventors, for good and valuable considerations, the receipt and sufficiency of which hereby acknowledge, have sold, assigned, transferred and conveyed, and by this assignment do sell, assign, transfer and convey, unto said COMPANIES, their successors and assigns, the entire right, title and interest throughout the world, in and to the above-described invention, inventions or improvements described or set forth in said application, in any form or embodiment thereof, and in and to said application, and in and to any applications filed in any foreign country based thereon, including the right to file foreign applications under the provisions of any convention or treaty; and in and to any confirmation, divisional, continuation, continuation-in-part, or substitute application which may be filed on said invention, inventions or improvements in the United States or in any foreign country; and in and to any and all patents, certificates, utility models, reissues, extensions, additions or confirmations thereof which may be granted in the United States or in any foreign country upon said invention, inventions or improvements,

TO HAVE AND TO HOLD the same to the full end of the term or terms for which any and all such United States and foreign patents and grants may be issued on said invention, inventions or improvements.

AND said Inventors do hereby authorize and request the issuing authority to issue any and all of said United States and foreign patents on said application or applications to said **COMPANIES**, their successors and assigns, as the assignee of the entire right, title and interest in and to the same, for the sole use and benefit of said **COMPANIES**, their successors and assigns.

AND said Inventors do hereby covenant and warrant that said Inventors have full right to convey the entire right, title and interest herein assigned free and clear of all licenses, encumbrances and liens whatsoever, and that no said Inventors has executed and will execute any instruments in conflict herewith.

AND said Inventors, for the conditions aforesaid, do hereby covenant and agree to and with the said **COMPANIES**, their successors and assigns, that each Inventor, his or her executors, administrators, or other personal representatives, shall and will do all lawful acts and things, make all rightful oaths, and make, execute and deliver any and all other instruments in writing, and any and all further applications, papers, powers, affidavits, assignments, disclaimers and other documents, which in the opinion of counsel for said **COMPANIES**, their successors and assigns, may be required or necessary in this or in any foreign country more effectually to secure to and vest in said **COMPANIES**, their successors and assigns, the entire right, title and interest in and to said invention, inventions or improvements, application or applications, patents, rights, titles, benefits, privileges, and advantages hereby sold, assigned, confirmed, transferred and conveyed.

Assignment
Application Filing Date: ~~May 27, 2009~~

Attorney Docket No. 122.0048 US NP
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IN WITNESS WHEREOF, I sign this 10th day of June, 2009.

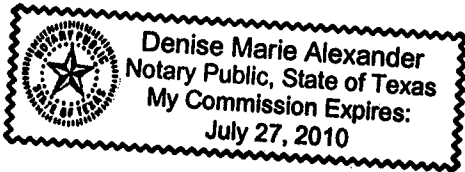
Wenyue Xu
Wenyue Xu

STATE OF Texas)
COUNTY OF Dallas)

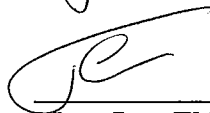
BE IT KNOWN, that on this 10th day of June,
2009, **Wenyue Xu** personally appeared to me and executed this assignment.

Denise Marie Alexander
Notary Public
Denise Marie Alexander

SEAL



IN WITNESS WHEREOF, I sign this 10 day of June, 2009.



Marc Jean Thiercelin

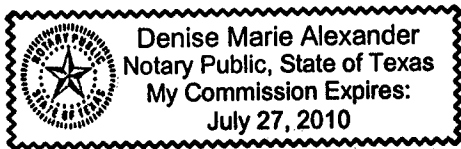
STATE OF TX)
COUNTY OF DALLAS }

BE IT KNOWN, that on this 10th day of June,
2009, **Marc Jean Thiercelin** personally appeared to me and executed this assignment.



Notary Public
Denise Marie Alexander

SEAL



Schedule A
“COMPANIES”

SCHLUMBERGER CANADA LIMITED

Corporation of: Canada
Located at: 525-3rd Avenue S.W., Calgary, Alberta, CA T2P 0G4
Assignee for applications in: Canada

SCHLUMBERGER TECHNOLOGY CORPORATION

Corporation of: USA
Located at: One Hampshire Street, Cambridge, MA 02139
Assignee for applications in: USA

SERVICES PETROLIERS SCHLUMBERGER

Corporation of: France
Located at: 42 rue Saint Dominique, 75007 Paris, FR
Assignee for applications in: France

SCHLUMBERGER HOLDINGS LIMITED

Corporation of: British Virgin Islands
Located at: PO Box 71, Craigmuir Chambers, Road Town, Tortola, BVI
Assignee for applications in: Japan, the Netherlands, Saudi Arabia, United Kingdom

SCHLUMBERGER TECHNOLOGY B.V.

Corporation of: the Netherlands
Located at: Parkstraat 83-89, 2514 JG The Hague, The Netherlands
Assignee for applications in: Albania, Argentina, Australia, Azarbaijan, Brunei, Bulgaria, Colombia, Czech Republic, Denmark, Faroe Islands, Germany, Greece, Hungary, Indonesia, Ireland, Israel, Italy, Kazakhstan, Korea, Kuwait, Lithuania, Malaysia, Mexico, New Zealand, Norway, Oman, Pakistan, Poland, Qatar, Romania, Russia, Slovakia, Slovenia, South Africa, Thailand, Trinidad, Tunisia, Turkey, Turkmenistan, Ukraine, Uzbekistan, Venezuela

PRAD RESEARCH AND DEVELOPMENT LIMITED

Corporation of: British Virgin Islands
Located at: PO Box 71, Craigmuir Chambers, Road Town, Tortola, BVI
Assignee for applications in: Countries not Otherwise Listed