FORM PTO-1594 01-10-96:CMG	REC	08-02-2001	U.S. DEPARTMENT OF COMMERC Patent and Trademark Offic	
Atty Ref/Docket No.: 600.515US1				
To the Honorable Commissioner of Patents and Trad	emarks: F	101795819	ereof.	
1. Name of conveying party(ies):		2. Name and address o	f receiving party(ies):	
Haiying Liu, Wei Chen and Kamil Ugurbil	(6-0)	Name: Regents of t	he University of Minnesota	
Additional name(s) of conveying party(ies) attached?  3. Nature of conveyance:	'[]Yes[X]No	Street Address: 450 McNamara Alumni Center 200 Oak Street S.E.  City: Minneapolis State: MN ZIP: 55455-2070		
[X] Assignment [] Merger [] Security Agreement [] Change of Nam [] Other	e			
Execution Date: July 6, 2001, July 6, 2001 and July	10, 2001	Additional name(s) & a	ddress(es) attached? [ ]Yes [X]No	
4. Application number(s) or patent number(s):				
If this document is being filed together with a new	w application, t	he execution date of the application is:	_	
A. Patent Application No.(s)		B. Patent N	0.(8)	
Serial No. 09/824,511, filed April 2, 2001				
Additional numbers attached? [ ]Yes [X]No				
5. Name and address of party to whom correspondence concerning document should be mailed:		6. Total number of app	olications and patents involved: 1	
Name: Joseph E. Gortych		7. Total fee (37 CFR 3	7. Total fee (37 CFR 3.41):\$_40.00	
Address: Schwegman, Lundberg, Woessner & Kluth, P.A. P.O. Box 2938 Minneapolis, MN 55402		[X] Enclosed [] Authorized to	be charged to deposit account	
		Please charge any additional fees or credit any overpayments to our Deposit account number:      19-0743		
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9. Statement and signature.				
To the best of my knowledge and belief, the foreg	going information	on is true and correct and any attached copy	is a true copy of the original document.	
Joseph E. Gortych/Reg. No. 41,791  Name of Person Signing	_ Jose	Signature Stocky	Date Total number of pages including cover sheet: 4	
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HA 7/6/2001

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WHEREAS, WE, Haiying Liu, residing at 1021 29th Avenue SE, Suite A, Minneapolis, MN 55414, and Wei Chen, residing at 371 Millwood Ave., Roseville, MN 55113, and Kamil Ugurbil, residing at 2812 Benton Boulevard, Minneapolis, MN 55416, made certain new and useful inventions and improvements for which We filed an application for Letters Patent of the United States on April 2, 2001, which application was assigned U.S. patent application serial number 09/824,511, and is entitled NMR SPECTROSCOPY DATA RECOVERY METHOD AND APPARATUS.

AND WHEREAS, Regents of the University of Minnesota, a corporation organized and existing under and by virtue of the laws of the State of Minnesota, and having an office and place of business at 450 McNamara Alumni Center, 200 Oak Street S.E., Minneapolis, MN 55455-2070, (hereinafter "Assignee") is desirous of acquiring the entire right, title and interest in and to said inventions, improvements and application and in and to the Letters Patent to be obtained therefore;

NOW, THEREFORE, to all whom it may concern, be it known that for good and valuable consideration, the receipt and sufficiency whereof is hereby acknowledged, we have sold, assigned, and transferred, and by these presents do sell, assign and transfer unto said Assignee, its successors or assigns, the entire right, title and interest for all countries in and to all inventions and improvements disclosed in the aforesaid application, and in and to the said application, all divisions, continuations, continuations-in-part, or renewals thereof, all Letters Patent which may be granted therefrom, and all reissues or extensions of such patents, and in and to any and all applications which have been or shall be filed in any foreign countries for Letters Patent on the said inventions and improvements, including an assignment of all rights under the provisions of the International Convention, and all Letters Patent of foreign countries which may be granted therefrom; and we do hereby authorize and request the Commissioner of Patents and Trademarks to issue any and all United States Letters Patent for the aforesaid inventions and improvements to the said Assignee as the assignee of the entire right, title and interest in and to the same, for the use of the said Assignee, its successors and assigns.

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AND, for the consideration aforesaid, we do hereby agree that we and our executors and legal representatives will make, execute and deliver any and all other instruments in writing including any and all further application papers, affidavits, assignments and other documents, and will communicate to said Assignee, its successors and representatives all facts known to us relating to said improvements and the history thereof and will testify in all legal proceedings and generally do all things which may be necessary or desirable more effectually to secure to and vest in said Assignee, its successors or assigns the entire right, title and interest in and to the said improvements, inventions, applications, Letters Patent, rights, titles, benefits, privileges and advantages hereby sold, assigned and conveyed, or intended so to be.

AND, furthermore we covenant and agree with said Assignee, its successors and assigns, that no assignment, grant, mortgage, license or other agreement affecting the rights and property herein conveyed has been made to others by me/us and that full right to convey the same as herein expressed is possessed by us.

IN TESTIMONY WHEREOF, I have hereunto set my hand this 6 day of Jaly, 2001.

STATE OF MINNESOTA)

COUNTY OF #ENWEPIN)

On this 6 day of pelo, 2001 before me personally appeared Haiying Liu to me

known and known to me to be the person described in and who executed the foregoing instrument, and

he/she duly acknowledged to me that he/she executed the same for the uses and purposes therein set

forth.

[SEAL]

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IN TESTIMONY WHEREOF, I have hereunto set my hand this <u>06</u> day of <u>July</u>, 2001. STATE OF MINNESOTH) COUNTY OF HENNEPIN On this 6 day of field, 2001 before me personally appeared Wei Chen to me known and known to me to be the person described in and who executed the foregoing instrument, and he/she duly acknowledged to me that he/she executed the same for the uses and purposes therein set forth. [SEAL] IN TESTIMONY WHEREOF, I have hereunto set my hand this 10 day of July, 2001.

Kamil Ugurbil STATE OF MINNESOTH COUNTY OFHENNEPIND On this 10 day of July, 2001 before me personally appeared Kamil Ugurbil to me known and known to me to be the person described in and who executed the foregoing instrument, and he/she duly acknowledged to me that he/she executed the same for the uses and purposes therein set

[SEAL]

forth.



RECORDED: 07/26/2001

Julie C. Figg

PATENT REEL: 012021 FRAME: 0421