Form PTO-1595 (Rev. 06/04)	U.S. DEPARTMENT OF COMMERCE United States Patent and Trademark Office	
RECORDATION FORM COVER SHEET PATENTS ONLY		
To the Director of the U.S. Patent and Trademark Office. Please record the attached documents or the address(es) below		
Name of conveying party(ies)/Execution Date(s):	2. Name and address of receiving party(ies):	
1) ARITAS GROUP, INC. Execution Date(s): MAY 29, 2012 Additional name(s) of conveying party(ies) attached? attached? Yes No	ITG SOFTWARE SOLUTIONS, INC. 400 Corporate Pointe #600 Culver City, CA 90230	
3. Name of Conveyance: Assignment	Additional name(s) & addresses(es) attached?	
4. Application number(s) or patent number(s):		
A. Patent Application No.(s)	B. Patent No.(s)	
See Continuation of Box A	See Continuation of Box B	
Additional numbers attached? X Yes No		
Name and address of party to whom correspondence concerning document should be	Total number of applications and patents involved: 29	
mailed: Name: Brian A. Tollefson Address: Rothwell, Figg, Ernst & Manbeck Suite 800 Street Address: 607 14 th Street, Suite 800 City: Washington, State: D.C. Zip: 20005	7. Total fee (37 CFR 3.41): \$1,160.00 Enclosed Authorized to be charged to deposit account None required (government Interest not affecting title)	
Telephone No.: 202/783-6040 Facsimile No.: 202/783-6031 Email Address: Attorney Docket No.: 2566-0000	8. Deposit account number: 02-2135 Authorized User Name Brian A. Tollefson	
DO NOT USE THIS SPACE		
9. Signature.		
/Brian A. Tolletson/	June 28, 2012	
Signature	Date	
Brian A. Tollefson, Req. No. 46,338 Total number of pages including cover sheet, attachments and documents: 7 Name of Person Signing		

Schedule 1

U.S. Patent Rights

TTTLE	
SYSTEM AND METHOD FOR DISPLAYING MARKET INFORMATION	7,308,428
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,356,500
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	8,010,438
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,428,506
CONFIDENTIAL BLOCK TRADING SYSTEM AND METHOD	7,685,052
SYSTEM FOR PROVIDING ANONYMOUS REQUESTS FOR QUOTES	7,680,715
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,814,000
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,865,425
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,877,318
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,908,205
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,908,206
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	7,917,425
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	8,041,628
CONFIDENTIAL BLOCK TRADING SYSTEM AND METHOD	12/692,147
METHOD FOR DIRECTING AND EXECUTING CERTIFIED TRADING INTERESTS	13/235,898
METHOD AND SYSTEM FOR MANAGING DISTRIBUTED TRADING DATA	7,565,313
METHOD AND SYSTEM FOR MANAGING DISTRIBUTED TRADING DATA	7,778,919
BLOCK TRADING SYSTEM & METHOD PROVIDING PRICE IMPROVEMENT TO AGGRESSIVE ORDERS	8,069,106
METHOD FOR INCREASING PARTICIPATION OF LIQUIDTY PROVIDERS	7,996,261
BLOCK TRADING SYSTEM & METHOD PROVIDING PRICE IMPROVEMENT TO AGGRESSIVE ORDERS	7,882,015
BLOCK TRADING SYSTEM & METHOD PROVIDING PRICE IMPROVEMENT TO AGGRESSIVE ORDERS	8,095,456
BLOCK TRADING SYSTEM AND METHOD PROVIDING PRICE IMPROVEMENT	8,165,954
SYSTEMS AND METHODS REGARDING TARGETED DISSEMINATION	8,103,579
METHOD AND APPARATUS FOR IMPROVED ELECTRONIC TRADING	12/285,394
BLOCK TRADING SYSTEM AND METHOD PROVIDING PRICE IMPROVEMENT	12/419,867
SYSTEM FOR PROVIDING ANONYMOUS REQUESTS FOR QUOTES	12/695,243
SYSTEMS AND METHODS RELATED TO LIQUIDITY AGGREGATION	13/114,822
SYSTEMS AND METHODS FOR INCREASING PARTICIPATION OF LIQUIDITY PROVIDERS ON CROSSING SYSTEM	13/170,817
SYSTEMS AND METHODS REGARDING TARGETED DISSEMINATION	13/330,904

Continuation of Box A of PTO-1595

12/692,147

13/235,898

12/285,394

12/419,867

12/695,243

13/114,822

13/170,817

13/330,904

Continuation of Box B of PTO-1595

7,308,428 7,356,500 8,010,438 7,428,506

7,685,052 7,680,715

7,814,000 7,865,425

7,877,318

7,908,205 7,908,206

7,908,200

8,041,628

7,565,313

7,778,919 8,069,106

7,996,261

7,882,015

8,095,456

8,165,954

8,103,579

Ø 003

PATENT ASSIGNMENT

THIS ASSIGNMENT (the "Assignment"), effective as of May 29, 2012 is made by and between by and between ITG Software Solutions, Inc. ("Assignee"), and Aritas Group, Inc, a Delaware corporation (the "Assignor"). Assignee and Assignor are referred to herein as the "Parties" and each individually as a "Party."

WITNESSETH:

WHEREAS, the Parties entered into that certain Asset Purchase Agreement, dated as of May 29, 2012, by and among Assignor and Assignee (the "Purchase Agreement");

WHEREAS, pursuant to the Purchase Agreement, Assignor agreed to transfer to Assignee all of the right, title and interest of Assignor in and to certain assets, properties, rights and interests, including without limitation, certain Patents Rights (as defined in the Purchase Agreement and as set forth in Schedule 1 hereto);

WHEREAS, Assignee is desirous of acquiring (and Assignor is desirous of assigning to Assignee) the entire right, title and interest in and to the Patent Rights and the inventions disclosed and/or claimed in the Patent Rights, and in and to any and all patents worldwide which may be obtained therefor;

NOW, THEREFORE, for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged:

- 1. Assignor does hereby sell, assign, transfer, and convey to Assignee free and clear of all liens or other encumbrances, except for those Encumbrances (as such term is defined in the Purchase Agreement) listed in <u>Exhibit C</u> to the Purchase Agreement, and to the maximum extent provided under law, all of Assignor's entire worldwide right, title and interest in, to, and under the Patent Rights, the same to be held and enjoyed by Assignee for its own use and enjoyment and the use and enjoyment of its successors, assigns or other legal representatives, as fully and entirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not been made, as assignee of its entire right, title and interest therein and in and to all income, royalties, damages and payments now or hereafter due or payable with respect thereto in and to all causes of action (either in law or in equity) and the right to sue, counterclaim, and recover for past, present and future infringement of the rights assigned or to be assigned under this Assignment.
- 2. Assignor hereby covenants and agrees that Assignor will not execute any writing or do any act whatsoever conflicting with this Assignment, and that Assignor will, at any time upon request, without further or additional consideration but at the expense of Assignec, execute such additional assignments and other writings and do such additional acts as Assignee may deem necessary or desirable to perfect Assignee's enjoyment of this grant, and render all necessary or desirable assistance in making application for and obtaining original, divisional, continuations, continuation-in-part, reexamined, reissued, or

extended letters patent or of any and all foreign countries on said inventions, and in enforcing any rights or causes of action accruing as a result of such applications or patents, by giving testimony in any proceedings or transactions involving such applications or patents, and/or by executing preliminary statements and other affidavits.

- 3. The Parties authorize and request that the Commissioner of Patents and Trademarks of the United States, and the corresponding entities or agencies in any applicable foreign countries, record Assignee as the owner of record for the Patent Rights and issue the patent for the pending Patent Rights to the Assignee upon issuance.
- 4. All disputes, claims or controversies arising out of this Assignment, or the negotiation, validity or performance of this Assignment, or the transactions contemplated hereby shall be governed by and construed in accordance with the laws of the State of New York without regard to its rules of conflict of laws.
- 5. This Assignment shall be binding upon and inure to the benefit of the Parties and their respective successors and assigns.
- 6. If any provision of this Assignment or the application of any such provision to any person or circumstance shall be held invalid, illegal or unenforceable in any respect by a court of competent jurisdiction, such invalidity, illegality or unenforceability shall not affect any other provision hereof.
- 7. This Assignment may be executed in counterparts, each of which when so executed and delivered shall be deemed an original, and such counterparts together shall constitute one and the same instrument.

ISIGNATURE PAGES FOLLOW

IN WITNESS WHEREOF, Assignor and Assignee have caused this Patent Assignment to be duly executed in duplicate originals by their duly authorized representative as of the day and year first above written.

ARITAS GROUP, INC.

(as Assignor)

By:_ Allen Name: E. Reid Curley

Chief Operating Officer Title:

ITG SOFTWARE SOLUTIONS, INC.

(as Assignee)

Ву:___ Name: Robert C. Gasser

Chief Executive Officer Title:

[Signature Page to Patent Assignment]

PATENT

REEL: 028457 FRAME: 0408

RECORDED: 06/28/2012