# 504436804 06/29/2017

# PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT4483505

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

#### **CONVEYING PARTY DATA**

Name	Execution Date
RAMI ALISAWI	10/28/2014
ARI BACKHOLM	10/28/2014
HUAJIE HU	10/20/2014
ALEXANDR SELEZNYOV	10/17/2014
JIE WEI	10/27/2014
SUNGWOOK YOON	10/14/2014

## **RECEIVING PARTY DATA**

Name:	SEVEN NETWORKS, INC.	
Street Address:	959 SKYWAY ROAD	
Internal Address:	SUITE 100	
City:	SAN CARLOS	
State/Country:	CALIFORNIA	
Postal Code:	94070	

## **PROPERTY NUMBERS Total: 1**

Property Type	Number	
Application Number:	15630523	

# **CORRESPONDENCE DATA**

**Fax Number:** (919)882-8195

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.

**Phone:** 919-348-2194

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Correspondent Name: JUSTIN R. NIFONG

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ATTORNEY DOCKET NUMBER:	455/171/4 UTIL
NAME OF SUBMITTER:	JUSTIN R. NIFONG
SIGNATURE:	/Justin R. Nifong/
DATE SIGNED:	06/29/2017

# **Total Attachments: 22** source=455-171-4UTIL-Dec-assign-all-signed#page1.tif source=455-171-4UTIL-Dec-assign-all-signed#page2.tif source=455-171-4UTIL-Dec-assign-all-signed#page3.tif source=455-171-4UTIL-Dec-assign-all-signed#page4.tif source=455-171-4UTIL-Dec-assign-all-signed#page5.tif source=455-171-4UTIL-Dec-assign-all-signed#page6.tif source=455-171-4UTIL-Dec-assign-all-signed#page7.tif source=455-171-4UTIL-Dec-assign-all-signed#page8.tif source=455-171-4UTIL-Dec-assign-all-signed#page9.tif source=455-171-4UTIL-Dec-assign-all-signed#page10.tif source=455-171-4UTIL-Dec-assign-all-signed#page11.tif source=455-171-4UTIL-Dec-assign-all-signed#page12.tif source=455-171-4UTIL-Dec-assign-all-signed#page13.tif source=455-171-4UTIL-Dec-assign-all-signed#page14.tif source=455-171-4UTIL-Dec-assign-all-signed#page15.tif source=455-171-4UTIL-Dec-assign-all-signed#page16.tif source=455-171-4UTIL-Dec-assign-all-signed#page17.tif source=455-171-4UTIL-Dec-assign-all-signed#page18.tif source=455-171-4UTIL-Dec-assign-all-signed#page19.tif source=455-171-4UTIL-Dec-assign-all-signed#page20.tif source=455-171-4UTIL-Dec-assign-all-signed#page21.tif source=455-171-4UTIL-Dec-assign-all-signed#page22.tif

As a below named inventor (hereinafter designated as the undersigned or the Assignor, where appropriate), I hereby declare that:

The application is as identified by the attorney docket number, title, Filing Date, or Application Title as set forth in the following Table I:

The application in Table I was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application(s) listed in Table I.

The undersigned hereby acknowledges that any willful false statement made in this declaration is punishable under 18 U.S.C. § 1001 by fine or imprisonment of not more than five (5) years, or both.

TABLE I

Attorney Docket			
No.	Application No.	Title	Filing Date
		OFFLOADING APPLICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY	
455/171 PROV	61/833,844	PROTOCOLS	6/11/2013
455/171 PCT	PCT/US14/42006	OFFLOADING APPLICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY	6/11/2014
433/171763	1 (1) (314) 42000	PROTOCOLS OFFLOADING APPLICATION TRAFFIC TO A	0/11/2014
455/171/2 PCT-		SHARED COMMUNICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY	
CON	14/474,329	PROTOCOLS	9/2/2014

FURTHERMORE, WHEREAS, the undersigned, Ari Backholm, (hereinafter "Assignor") has invented certain new and useful improvements described in the applications identified in Table I.

AND, WHEREAS, Seven Networks, Inc., having a place of business at 959 Skyway Road, Suite 100, San Carlos, CA 94070 (hereinafter "Assignee"), has already acquired an interest in the applications identified in Table I by and through an employment or other agreement between Assignor and Assignee.

However, in the avoidance of doubt and as confirmation of the already acquired interest by Assignee, NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor has assigned and by these presents does hereby sell, assign, transfer, and convey unto the Assignee, its successors and assigns, his entire right, title, and interest in and to the invention and application, including the right to sue for past infringements and any other prior occurring rights, provided any such rights exist, and in and to any and all domestic and foreign patent applications filed on the invention, and in and to any and all continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the United States of America, and all foreign countries or reissues thereof which may be granted therefor or thereon, for the full end of the term for which said Letters Patent may be granted, together with his right to claim the priority of said application in all foreign countries in accordance with the International Convention, the same to be held and enjoyed by said Assignee, its successors and assigns, as fully and entirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not been made. Assignor further assigns to Assignee the right to claim entitlement and/or priority to any applications that entitlement or priority may be claimed for this or any later filed application. The assignment of the right to claim entitlement and/or priority is executed nunc pro tunc and is considered effective as of the filing date of the earliest application to which priority and/or entitlement is claimed.

Assignor hereby requests that said Letters Patent be issued in accordance with this assignment.

Assignor further covenants and agrees that, at the time of the execution and delivery of these presents, Assignor possesses full title to the invention and application above-mentioned, and that he has the unencumbered right and authority to make this assignment.

Assignor further covenants and agrees, and likewise binds his heirs, legal representatives and assigns, to promptly communicate to said Assignee or its representatives any facts known to him relating to said invention, to testify in any interference or legal proceedings involving said invention, to execute any additional papers which may be requested to confirm the right of the Assignee, its representatives, successors and assigns to secure patent or similar protection for the said invention in all countries and to vest in the Assignee complete title to the said invention and Letters Patent, without further compensation, but at the expense of said Assignee, its successors, assigns and other legal representatives.

Executed this ZB day of Chiber, 2014.

Ari Backholm

WHEREAS, the undersigned, Huajie Hu, (hereinafter "Assignor") has invented certain new and

useful improvements described in the applications identified in Table I.

AND, WHEREAS, Seven Networks, Inc., having a place of business at 959 Skyway Road, Suite

100, San Carlos, CA 94070 (hereinafter "Assignee"), has already acquired an interest in the applications

identified in Table I by and through an employment or other agreement between Assignor and Assignee.

I further authorize an agent of the Assignee to insert the filing date, application number, and any other

identifying particulars as required for perfecting these assignment papers.

However, in the avoidance of doubt and as confirmation of the already acquired interest by

Assignee, NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable

consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor has assigned and

by these presents does hereby sell, assign, transfer, and convey unto the Assignee, its successors and

assigns, his entire right, title, and interest in and to the invention and application, including the right to

sue for past infringements and any other prior occurring rights, provided any such rights exist, and in and

to any and all domestic and foreign patent applications filed on the invention, and in and to any and all

continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the

United States of America, and all foreign countries or reissues thereof which may be granted therefor or

thereon, for the full end of the term for which said Letters Patent may be granted, together with his right

to claim the priority of said application in all foreign countries in accordance with the International

Convention, the same to be held and enjoyed by said Assignee, its successors and assigns, as fully and

entirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not

been made. Assignor further assigns to Assignee the right to claim entitlement and/or priority to any

applications that entitlement or priority may be claimed for this or any later filed application, including

the assignment of any provisionals or other priority documents to which the inventions claim priority to.

The assignment of the right to claim entitlement and/or priority is executed nunc pro tunc and is

considered effective as of the filing date of the earliest application to which priority and/or entitlement is

claimed.

Assignor hereby requests that said Letters Patent be issued in accordance with this assignment.

455/misc

Assignor further covenants and agrees that, at the time of the execution and delivery of these

presents, Assignor possesses full title to the invention and application above-mentioned, and that he has

the unencumbered right and authority to make this assignment.

Assignor further covenants and agrees, and likewise binds his heirs, legal representatives and

assigns, to promptly communicate to said Assignee or its representatives any facts known to him relating

to said invention, to testify in any interference or legal proceedings involving said invention, to execute

any additional papers which may be requested to confirm the right of the Assignee, its representatives,

successors and assigns to secure patent or similar protection for the said invention in all countries and to

vest in the Assignee complete title to the said invention and Letters Patent, without further compensation,

but at the expense of said Assignee, its successors, assigns and other legal representatives.

Furthermore, as a below named inventor (hereinafter designated as the undersigned or the

Assignor, where appropriate), I hereby declare that:

The application is as identified by the attorney docket number, title, Filing Date, or Application

Title as set forth in the following Table I.

The application in Table I was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the

applications in Table I.

The undersigned hereby acknowledged that any willful false statement made in this declaration is

punishable under 18 U.S.C. § 1001 by fine or imprisonment of not more than five (5) years, or both

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TABLE I and Signature Page follows

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TABLE I

	Attorney Docket		
Application No.	No.	Filing Date	Title
61/833,796	455/169 PRO	6/11/2013	APPLICATION AND/OR SERVER STABILITY IN SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY PROTOCOLS
PCT/US14/42017	455/169/1 PCT	6/11/2014	APPLICATION AND/OR SERVER STABILITY IN SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY PROTOCOLS
61/836,091	455/169/1 PRO	6/17/2013	APPLICATION AND/OR SERVER STABILITY IN SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY PROTOCOLS
01,030,031	455/169/2	5/2//2023	APPLICATION AND/OR SERVER STABILITY IN SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY
14/474,231	PCT/CON	9/1/2014	PROTOCOLS
PCT/US14/42006	455/171 PCT	6/11/2014	OFFLOADING APPLICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY PROTOCOLS
14/474,329	455/171/2-PCT-CON	9/2/2014	OFFLOADING APPLICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY PROTOCOLS
			BLOCKING/UNBLOCKING ALGORITHMS FOR SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON-PROPRIETARY
PCT/US14/40772		6/3/2014	PROTOCOLS  BLOCKING/UNBLOCKING ALGORITHMS FOR SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING
14/474,278	455/178/2 PCT/CON	9/1/2014	PROPRIETARY AND NON-PROPRIETARY PROTOCOLS

Executed this 20 day of 0ct 2014.

Huajie Hu

Huajie Hu

WHEREAS, the undersigned, Jie Wei, (hereinafter "Assignor") has invented certain new and useful improvements described in the applications identified in Table I.

AND, WHEREAS, Seven Networks, Inc., having a place of business at 959 Skyway Road, Suite 100, San Carlos, CA 94070 (hereinafter "Assignee"), has already acquired an interest in the applications identified in Table 1 by and through an employment or other agreement between Assignor and Assignee.

However, in the avoidance of doubt and as confirmation of the already acquired interest by Assignce, NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged. Assignor has assigned and by these presents does hereby sell, assign, transfer, and convey unto the Assignee, its successors and assigns, his entire right, title, and interest in and to the invention and application, including the right to sue for past infringements and any other prior occurring rights, provided any such rights exist, and in and to any and all domestic and foreign patent applications filed on the invention, and in and to any and all continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the United States of America, and all foreign countries or reissues thereof which may be granted therefor or thereon, for the full end of the term for which said Letters Patent may be granted, together with his right to claim the priority of said application in all foreign countries in accordance with the International Convention, the same to be held and enjoyed by said Assignee, its successors and assigns, as fully and emirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not been made. Assignor further assigns to Assignee the right to claim entitlement and/or priority to any applications that entitlement or priority may be claimed for this or any later filed application, including the assignment of any provisionals or other priority documents to which the inventions claim priority to. The assignment of the right to claim entitlement and/or priority is executed nanc pro nano and is considered effective as of the filing date of the earliest application to which priority and/or entitlement is claimed.

Assignor hereby requests that said Letters Patent be issued in accordance with this assignment.

Assignor further covenants and agrees that, at the time of the execution and delivery of these presents. Assignor possesses full title to the invention and application above-mentioned, and that he has the unencombered right and authority to make this assignment.

Assignor further covenants and agrees, and likewise binds his heirs, legal representatives and assigns, to promptly communicate to said Assignee or its representatives any facts known to him relating to said invention, to testify in any interference or legal proceedings involving said invention, to execute any additional papers which may be requested to confirm the right of the Assignee, its representatives, successors and assigns to secure patent or similar protection for the said invention in all countries and to vest in the Assignee complete title to the said invention and Letters Patent, without further compensation, but at the expense of said Assignee, its successors, assigns and other legal representatives.

Furthermore, as a below named inventor (hereinafter designated as the undersigned or the Assignor, where appropriate), I hereby declare that:

The application is as identified by the attorney docket number, title, Filing Date, or Application Title as set forth in the following Table I:

The application in Table I was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the applications in Table I.

The undersigned hereby acknowledged that any willful false statement made in this declaration is punishable under 18 U.S.C. § 1001 by fine or imprisonment of not more than five (5) years, or both

\* See Table I follows See See

# TABLE I

Application No.	Attorney Docket No.	Filing Date	Title
	35068608 3403	374846	OFFLOADING APPLICATION TRAFFIC TO A
			SHARED COMMUNICATION CHANNEL FOR
			SIGNAL OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/171/2-		PROPRIETARY AND NON-PROPRIETARY
14474329	PCT-CON	9/2/2014	PROTOCOLS
			BLOCKING/UNBLOCKING ALGORITHMS FOR
			SIGNALING OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/178/2		PROPRIETARY AND NON-PROPRIETARY
14474278	PCT/CON	9/1/2014	PROTOCOLS
			APPLICATION AND/OR SERVER STABILITY IN
			SIGNALING OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/169/2		PROPRIETARY AND NON-PROPRIETARY
. 14474231	PCT/CON	9/1/2014	PROTOCOLS
			APPLICATION AND/OR SERVER STABILITY IN
			SIGNALING OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
acada a como o como o como	455/169/1		PROPRIETARY AND NON-PROPRIETARY
PCT/US14/42017	BCT	6/11/2014	PROTOCOLS
			OFFLOADING APPLICATION TRAFFIC TO A
			SHARED COMMUNICATION CHANNEL FOR
			SIGNAL OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
by ancients year end a complete of	is allow the agency and accounting		PROPRIETARY AND NON-PROPRIETARY
PCT/US14/42006	A33/1/1 PC1	6/11/2014	
			BLOCKING/UNBLOCKING ALGORITHMS FOR
			SIGNALING OPTIMIZATION IN A WIRELESS
	x marry makirk		NETWORK FOR TRAFFIC UTILIZING
Dennis (en alabaman	455/178/1	£277.00 1 7	PROPRIETARY AND NON-PROPRIETARY
PCT/US14/40772	TAI	6/3/2014	PROTOCOLS

Executed this day of, 2014.	
Jie Wei	

2014 Jie Wei

WHEREAS, the undersigned, Rami Alisawi, (hereinafter "Assignor") has invented certain new and useful improvements described in the applications identified in Table I.

AND, WHEREAS, Seven Networks, Inc., having a place of business at 959 Skyway Road, Suite 100, San Carlos, CA 94070 (hereinafter "Assignee"), has already acquired an interest in the applications identified in Table I by and through an employment or other agreement between Assignor and Assignee. I further authorize an agent of the Assignee to insert the filing date, application number, and any other identifying particulars as required for perfecting these assignment papers.

However, in the avoidance of doubt and as confirmation of the already acquired interest by Assignee, NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor has assigned and by these presents does hereby sell, assign, transfer, and convey unto the Assignee, its successors and assigns, his entire right, title, and interest in and to the invention and application, including the right to sue for past infringements and any other prior occurring rights, provided any such rights exist, and in and to any and all domestic and foreign patent applications filed on the invention, and in and to any and all continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the United States of America, and all foreign countries or reissues thereof which may be granted therefor or thereon, for the full end of the term for which said Letters Patent may be granted, together with his right to claim the priority of said application in all foreign countries in accordance with the International Convention, the same to be held and enjoyed by said Assignee, its successors and assigns, as fully and entirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not been made. Assignor further assigns to Assignee the right to claim entitlement and/or priority to any applications that entitlement or priority may be claimed for this or any later filed application, including the assignment of any provisionals or other priority documents to which the inventions claim priority to. The assignment of the right to claim entitlement and/or priority is executed nunc pro tunc and is considered effective as of the filing date of the earliest application to which priority and/or entitlement is claimed.

Assignor hereby requests that said Letters Patent be issued in accordance with this assignment.

455/misc

Assignor further covenants and agrees that, at the time of the execution and delivery of these

presents, Assignor possesses full title to the invention and application above-mentioned, and that he has

the unencumbered right and authority to make this assignment.

Assignor further covenants and agrees, and likewise binds his heirs, legal representatives and

assigns, to promptly communicate to said Assignee or its representatives any facts known to him relating

to said invention, to testify in any interference or legal proceedings involving said invention, to execute

any additional papers which may be requested to confirm the right of the Assignee, its representatives,

successors and assigns to secure patent or similar protection for the said invention in all countries and to

vest in the Assignee complete title to the said invention and Letters Patent, without further compensation,

but at the expense of said Assignee, its successors, assigns and other legal representatives.

Furthermore, as a below named inventor (hereinafter designated as the undersigned or the

Assignor, where appropriate), I hereby declare that:

The application is as identified by the attorney docket number, title, Filing Date, or Application

Title as set forth in the following Table I.

The application in Table I was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the

applications in Table I.

The undersigned hereby acknowledged that any willful false statement made in this declaration is

punishable under 18 U.S.C. § 1001 by fine or imprisonment of not more than five (5) years, or both

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TABLE I and Signature Page follows

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TABLE I

	Attorney Docket	1	
Application No.	No.	Filing Date	Title
		1 1 1 1 1	OFFLOADING APPLICATION TRAFFIC TO A
			SHARED COMMUNICATION CHANNEL FOR
		1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	SIGNAL OPTIMIZATION IN A WIRELESS
		1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	NETWORK FOR TRAFFIC UTILIZING
		6 8 8 8 8	PROPRIETARY AND NON-PROPRIETARY
PCT/US14/42006	455/171 PCT	6/11/2014	PROTOCOLS
			OFFLOADING APPLICATION TRAFFIC TO A
			SHARED COMMUNICATION CHANNEL FOR
			SIGNAL OPTIMIZATION IN A WIRELESS
		1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	NETWORK FOR TRAFFIC UTILIZING
	455/171/2-PCT-		PROPRIETARY AND NON-PROPRIETARY
14/474,329	CON	9/2/2014	PROTOCOLS

Executed this in Espoo day of 28 Oct, 2014.

Rami Alisawi

WHEREAS, the undersigned, Sungwook Yoon, (hereinafter "Assignor") has invented certain new and useful improvements described in the applications identified in Table I.

AND, WHEREAS, Seven Networks, Inc., having a place of business at 959 Skyway Road, Suite 100, San Carlos, CA 94070 (hereinafter "Assignee"), has already acquired an interest in the applications identified in Table I by and through an employment or other agreement between Assignor and Assignee.

However, in the avoidance of doubt and as confirmation of the already acquired interest by Assignee, NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor has assigned and by these presents does hereby sell, assign, transfer, and convey unto the Assignee, its successors and assigns, his entire right, title, and interest in and to the invention and application, including the right to sue for past infringements and any other prior occurring rights, provided any such rights exist, and in and to any and all domestic and foreign patent applications filed on the invention, and in and to any and all continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the United States of America, and all foreign countries or reissues thereof which may be granted therefor or thereon, for the full end of the term for which said Letters Patent may be granted, together with his right to claim the priority of said application in all foreign countries in accordance with the International Convention, the same to be held and enjoyed by said Assignee, its successors and assigns, as fully and entirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not been made. Assignor further assigns to Assignee the right to claim entitlement and/or priority to any applications that entitlement or priority may be claimed for this or any later filed application, including the assignment of any provisionals or other priority documents to which the inventions claim priority to. The assignment of the right to claim entitlement and/or priority is executed nunc pro tunc and is considered effective as of the filing date of the earliest application to which priority and/or entitlement is claimed.

Assignor hereby requests that said Letters Patent be issued in accordance with this assignment.

Assignor further covenants and agrees that, at the time of the execution and delivery of these presents, Assignor possesses full title to the invention and application above-mentioned, and that he has the unencumbered right and authority to make this assignment.

455/misc

Assignor further covenants and agrees, and likewise binds his heirs, legal representatives and assigns, to promptly communicate to said Assignee or its representatives any facts known to him relating to said invention, to testify in any interference or legal proceedings involving said invention, to execute any additional papers which may be requested to confirm the right of the Assignee, its representatives, successors and assigns to secure patent or similar protection for the said invention in all countries and to vest in the Assignee complete title to the said invention and Letters Patent, without further compensation, but at the expense of said Assignee, its successors, assigns and other legal representatives.

Furthermore, as a below named inventor (hereinafter designated as the undersigned or the Assignor, where appropriate), I hereby declare that:

The application is as identified by the attorney docket number, title, Filing Date, or Application Title as set forth in the following Table I:

The application in Table I was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the applications in Table I.

The undersigned hereby acknowledged that any willful false statement made in this declaration is punishable under 18 U.S.C. § 1001 by fine or imprisonment of not more than five (5) years, or both

<--- Table I follows >>>>

TABLE

Application Number	Attorney Docket Number	Filing Date	Title
(N 11111) 1993 (N 1111)	455/174	F 134318 X 174410	3 8.8%:
14/500.241	UTIL	9/29/2014	Optimizing Traffic by Controlling Keep-Alives
170000,471	0338	27,427,433,539	OFFLOADING APPLICATION TRAFFIC TO A
			SHARED COMMUNICATION CHANNEL FOR
			SIGNAL OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/171/2-		PROPRIETARY AND NON-PROPRIETARY
14/474,329	PCT-CON	9/2/2014	PROTOCOLS
			OFFLOADING APPLICATION TRAFFIC TO A
<i>30</i>			SHARED COMMUNICATION CHANNEL FOR
			SIGNAL OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/171		PROPRIETARY AND NON-PROPRIETARY
PCT/US14/42006	PCT	6/11/2014	PROTOCOLS
			BLOCKING/UNBLOCKING ALGORITHMS FOR
	******		SIGNALING OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/178/1		PROPRIETARY AND NON-PROPRIETARY
PCT/US14/40772	PCT	6/3/2014	PROTOCOLS
•	455/174		
PCT/US14/40575	PCT	6/2/2014	Optimizing Traffic by Controlling Keep-Alives
	488/173/3		Detection and Reporting of Keepalive Messages for
14/266,759	UTIL	4/30/2014	Optimization of Keepalive Traffic in a Mobile Network
			BLOCKING/UNBLOCKING ALGORITHMS FOR
			SIGNALING OPTIMIZATION IN A WIRELESS
			NETWORK FOR TRAFFIC UTILIZING
	455/178/2		PROPRIETARY AND NON-PROPRIETARY
14/474,278	PCT-CON	9/1/2014	PROTOCOLS

Executed this /4\_day of 001\_\_\_\_\_,2014.

-Wangwook Yoon

WHEREAS, the undersigned, Alexandr Seleznyov, (hereinafter "Assignor") has invented certain new and useful improvements described in the applications identified in Table 1.

AND, WHEREAS, Seven Networks, Inc., having a place of business at 959 Skyway Road, Suite 100, San Carlos, CA 94070 (hereinafter "Assignee"), has already acquired an interest in the applications identified in Table I by and through an employment or other agreement between Assignor and Assignee. I further authorize an agent of the Assignee to insert the filing date, application number, and any other identifying particulars as required for perfecting these assignment papers.

However, in the avoidance of doubt and as confirmation of the already acquired interest by Assignee, NOW, THEREFORE, To Whom It May Concern, be it known that for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor has assigned and by these presents does hereby sell, assign, transfer, and convey unto the Assignee, its successors and assigns, his entire right, title, and interest in and to the invention and application, including the right to sue for past infringements and any other prior occurring rights, provided any such rights exist, and in and to any and all domestic and foreign patent applications filed on the invention, and in and to any and all continuations, continuations-in-part, or divisions thereof, and in and to any and all Letters Patent of the United States of America, and all foreign countries or reissues thereof which may be granted therefor or thereon, for the full end of the term for which said Letters Patent may be granted, together with his right to claim the priority of said application in all foreign countries in accordance with the International Convention, the same to be held and enjoyed by said Assignee, its successors and assigns, as fully and entirely as the same would have been held and enjoyed by Assignor if this assignment and sale had not been made. Assignor further assigns to Assignee the right to claim entitlement and/or priority to any applications that entitlement or priority may be claimed for this or any later filed application, including the assignment of any provisionals or other priority documents to which the inventions claim priority to. The assignment of the right to claim entitlement and/or priority is executed munc pro tune and is considered effective as of the filing date of the earliest application to which priority and/or entitlement is claimed.

Assignor hereby requests that said Letters Patent be issued in accordance with this assignment.

Assignor further covenants and agrees that, at the time of the execution and delivery of these presents, Assignor possesses full title to the invention and application above-mentioned, and that he has the unencumbered right and authority to make this assignment.

Assignor further covenants and agrees, and likewise binds his heirs, legal representatives and assigns, to promptly communicate to said Assignee or its representatives any facts known to him relating to said invention, to testify in any interference or legal proceedings involving said invention, to execute any additional papers which may be requested to confirm the right of the Assignee, its representatives, successors and assigns to secure patent or similar protection for the said invention in all countries and to vest in the Assignee complete title to the said invention and Letters Patent, without further compensation, but at the expense of said Assignee, its successors, assigns and other legal representatives.

Furthermore, as a below named inventor (hereinafter designated as the undersigned or the Assignor, where appropriate), I hereby declare that:

The application is as identified by the attorney docket number, title, Filing Date, or Application Title as set forth in the following Table I.

The application in Table I was made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the applications in Table I.

The undersigned hereby acknowledged that any willful false statement made in this declaration is punishable under 18 U.S.C. § 1001 by fine or imprisonment of not more than five (5) years, or both

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TABLE I and Signature Page follows

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TABLE I

Application No.	Attorney Docket No.	Filing Date	Title
PCT/US14/42006	455/171 PCT	6/11/2014	OFFLOADING APPLICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON- PROPRIETARY
14/474,329	455/171/2-PCT-CON	9/2/2014	OFFLOADING APPLICATION TRAFFIC TO A SHARED COMMUNICATION CHANNEL FOR SIGNAL OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON- PROPRIETARY
PCT/US13/61488	455/177 PCT	9/24/2013	SELECTIVE ACTIVATION OF NETWORK MANAGEMENT POLICIES OF MOBILE DEVICES IN A MOBILE NETWORK
61/835,783	455/177 PRO	6/17/2013	SELECTIVE ACTIVATION OF NETWORK MANAGEMENT POLICIES OF MOBILE DEVICES IN A MOBILE NETWORK

14/025,765	455/177/1 UTIL	9/12/2013	SELECTIVE ACTIVATION OF NETWORK MANAGEMENT POLICIES OF MOBILE DEVICES IN A MOBILE NETWORK
14/025,788	455/177/2 UTIL.	9/12/2013	SYSTEMS FOR SELECTIVE ACTIVATION OF NETWORK MANAGEMENT POLICIES OF MOBILE DEVICES IN A MOBILE NETWORK
PCT/US14/40772	455/178/1 PCT	6/3/2014	BLOCKING/UNBLOCKING ALGORITHMS FOR SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON- PROPRIETARY PROTOCOLS
14/474,278	455/178/2 PCT/CON	9/1/2014	BLOCKING/UNBLOCKING ALGORITHMS FOR SIGNALING OPTIMIZATION IN A WIRELESS NETWORK FOR TRAFFIC UTILIZING PROPRIETARY AND NON- PROPRIETARY PROTOCOLS
PCT/US14/42817	455/180 PCT	6/17/2014	SECURE MECHANISM TO DELIVER MOBILE TRAFFIC MANAGEMENT CONFIGURATION UPON STUB ACTIVATION ON A MOBILE DEVICE OF A GLOBAL SERVICE DISCOVERY SERVER

14/474,326	455/180/2-PCT-CON	9/2/2014	SECURE MECHANISM TO DELIVER MOBILE TRAFFIC MANAGEMENT CONFIGURATION UPON STUB ACTIVATION ON A MOBILE DEVICE OF A GLOBAL SERVICE DISCOVERY SERVER
14/474,327	455/180/3-PCT-CON	9/2/2014	SECURE MECHANISM TO DELIVER MOBILE TRAFFIC MANAGEMENT CONFIGURATION UPON STUB ACTIVATION ON A MOBILE DEVICE OF A GLOBAL SERVICE DISCOVERY SERVER

Executed this 17 day of October, 2014.

Alexandr Seleznyov

PATENT REEL: 043038 FRAME: 0101

RECORDED: 06/29/2017