## 502648966 01/24/2014

#### PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2

EPAS ID: PAT2695574

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

#### **CONVEYING PARTY DATA**

Name	Execution Date
NELSON TABIRIAN	01/21/2014
SARIK NERSISYAN	01/22/2014
BRIAN KIMBALL	01/24/2014
DIANE STEEVES	01/23/2014

#### **RECEIVING PARTY DATA**

Name:	U.S. GOVERNMENT AS REPRESENTED BY THE SECRETARY OF THE ARMY	
Street Address:	15 KANSAS STREET	
City:	NATICK	
State/Country:	MASSACHUSETTS	
Postal Code:	01760	

## PROPERTY NUMBERS Total: 1

Property Type	Number	
Application Number:	14162809	

#### **CORRESPONDENCE DATA**

Fax Number: (508)233-5167 Phone: 508-233-4510

Email: roger.c.phillips.civ@mail.mil

Correspondence will be sent via US Mail when the email attempt is unsuccessful.

Correspondent Name:

U.S. ARMY SOLDIER SYSTEMS CENTER LEGAL O

Address Line 1: 15 KANSAS STREET

Address Line 4: NATICK, MASSACHUSETTS 01760-5035

ATTORNEY DOCKET NUMBER:	NA-1418CIP
NAME OF SUBMITTER:	ROGER C PHILLIPS
Signature:	/Roger C. Phillips/
	PATENT

502648966 REEL: 032034 FRAME: 0764

Date:	01/24/2014
Total Attachments: 4 source=NA-1418CIPAssignments#page1.tif source=NA-1418CIPAssignments#page2.tif source=NA-1418CIPAssignments#page3.tif source=NA-1418CIPAssignments#page4.tif	

PATENT REEL: 032034 FRAME: 0765

For use of this form, see AR 27-60; the proportion against is GRUAGE

820A08AND OPTICS FOR MANIPULATING LIGHT Total of invention: BEAMS AND IMAGES
*Application Serial Ro
*Date Colli Executed. *Filing Date:
("Data not impen a) execution may be added for heller identification.)
: (We), the undereigned inventorie), in consideration of the rights of the Covernment of the United States expured by virtum of the dimensionous under which the show-entitled invention was made, rereby:
1. Assign to the Covernment of the United States, as represented by the Secretary of the Army, the entire right, title and interest throughout the United States, its Territories, Possessions, and Punto Rico, in and to the above-collited intention and application for patent and at Letters Patent residing thereon, and any continuation, continuation in our or division of said application and any release or extension of said Letters Patent.
2. Agree to extign to the Bovernment open its request, title and interest in the invention in those foreign countries in which the Government, within eight months of the filling of the United Blates application for passer, determines to cause an application for baser, determines to cause an application for baser in the invention in such toneign country or falls to make such a determination, within the said eight months, at eight, tice and interest in the invention in such tensign country shall remain in me (ast), addied to a homesclusive, immocable, myetry-flee interest to the Government in any patient which may issue on the invention in such forcign country, including the power to leave subfloomage for use in behalf of the Government and/or furtherance of the toneign policies of the Government.
<ol> <li>Agree to provide any further information within my (our) inscribings and is execute any further documents necessary to the prosecution of passed applications on the invention, the prosecution and settlement of interferences and recording of this to patient applications and patients issuing thereon.</li> </ol>
regional di resolut. <u>SUSS (1925) Vest tresolut.</u> Oran comuni, <u>Oran comuni, Oran comuni, Com</u> unica, (1930)
Dely Address 809 S. ORLANDO AVE., SUITE I, WINTER PARK, FL 32789
Date: 1/22/2614 Typed Name of Inventor: SARTK NERSTSYAN
comy or <u>Crange</u>
On the stores data known to use its he fine individual described in and who executed the integring instrument only appeared before me and asknowledged to me that the same as his own free act and sevel.
Olivari Chate
ABIGAIL CHALTON  Actory Public - Siste of Florida  Any Commission & EE 189888  My Commission & EE 189888
ingeltuelttuelttuelttuelttuelttuelttuelttu

DA FORM 2874-R, APR 1993

PEPLACES ÉS FÓRM 9874-8, MAR 14, WEICH IS OBBOLLTE.

Page

O)

Pages

22

60.5% 29:03A

For use of this form, see AR 27-60; the proponent agency is OTJAG

Title of Invention: $\widehat{B}$	roadband Optic	S for Manip	slatting Ligh	T Become + Image
Inventor(s) N. Tak	roadband Optic	IN, D. STEEL	os, B. Kiml	are
*Application Serial No.:				
*Date Oath Executed:		*Filing Date:	#	
	(*Data not known at execution may	y be added for better identif	fication.)	
	ed inventor(s), in consideration of the which the above-entitled invention		t of the United States a	cquired by virture of
interest throughout the U application for patent and	Sovernment of the United States, a inited States, its Territories, Posses all Letters Patent issuing thereon, slon of said Letters Patent.	sions, and Puerto Rico, in a	and to the above-entitle	d invention and
the Government, within e be filled; provided that if to to make such a determin- remain in me (us), subject the invention in such force	to the Government upon its reque- ight manths of the filling of the Unite he Government determines not to c ation, within the said eight months, at to a nonexclusive, irrevocable, ro- ign country, including the power to policles of the Government.	ed States application for pa eause an application to be fi all right, title and interest in yalty-free license to the Gov	tent, determines to caustied in any particular for the invention in such for vernment in any patent	se an application to eign country or fails preign country shall which may issue on
	e any further information within my applications on the invention, the p atents issuing thereon.		-	·
Signature of Inventor:	(First name)	(Middle Initial)	(Lest name)	
Duty Address:	A. K. H'CK. (Locality)	Middle Sex	(State)	
Date: 33 J	AN 14	Typed Name of Inventor:	Diane M.	Streves
State of: 10 SSC County of: 1 Sicled	chuseTts) ss		-	
	Diche Sifee egoing Instrument duty appeared be	-	n to me to be the indivi to me that the same as	<u> </u>
			9:	
(SEAL)		(Sig	mature of notary public	
		My Commission ехр	pires n	ERICA GOTTBERG Notary Public ONWEALTH OF MASSACHUSET'S My Commission Expires April 2, 2015

DA FORM 2874-R, APR 1993

REPLACES DA FORM 2874-R, MAR 74, WHICH IS OBSOLETE.

Page

of

Pages

APD PE v2.00

For use of this torm, see AR 27-80; the americant agency is OTJAG

BROADBAND OFTISS FOR HAMPULATING LIGHT
THE STREET SERVICE STREET STREET STREET STREET
MONTABIRIAN, S. NERSISYAN, D. STEEVES B. KIMBALL
*Application Serial Ro.:
*Date Oath Executed:*Filing Oate.
("Data not known at execution may be added for better identification.)
I (We), the undersigned inventorie), in consideration of the rights of the Government of the United States sequired by Virture of the Occumination in the accumination of the Constitution and the States
Assign to the Covernment of the United States, as represented by the Statestary of the Army, the entire right, this and interest throughout the United States, its Territories, Possessions, and Phen's Rick, in and to the above-entitied execution and application for pathol and all Catters Patent leading thereon, and any continuation, continuation in part or division of said application and any resous or extension of haid Letters Patent.
2. Agree to assign to the Sovernment upon its request, title and interest in the investion in trose fineign nountries in which the Government, within eight months of the litting of the United States application for passes, determines to cause an application to be filled; provided that if the Government determines not to cause an application to be filled in any particular foreign country or fails to make such a determination, within the said legist months, all aght, title and interest in the swendon in such foreign country shall name in the (us.), subject to a review discrete, increased to the Government of any patient which may issue on the invanion in such funcing country, including the power to issue sublications for treatment of the Government and/or furtherance of the foreign policies of the Government.
Agree to provide any further information within my (our) insoviedge and to execute any further documents necessary to be provided or patent applications on the invention, the provinced on and settlement of interferences and recording of title to patent applications and patents issuing thereon.  Signature of inventor  Signature of inventor.
(Park name) (Michie India) (Lesi name)
DOWNSON BOS SORLANDO AVE SUITE I WINTER PARK FLIGHTS
Date: 1 - 21 - 14 Typed States of Inventor: VELSON TABLE VAN
- Summer   <u>Flooder                                     </u>
- Sound at 2000 000 0
On the above date SRSSOS TOST COST to an end economic me to the the individual described in send who evented the foregoing instrument duty sepsemed before me and economically to the test the send as the day is a send for the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsemed before me and economically the foregoing instrument duty sepsement duty seps
802 303 300 00
raide de la
And the state of common contraction (Second contraction)
Noterly Public State of Florida  Microfile Techler  My Commission FF 064347  Explores 10/20/2017  My Commission expires on 10/130/130/13-

DA FORM 2874-R, APR 1993 PERACEYOA POPM 2014 R. MARCH. MARCH. MARCH.

Paga

Pages

APD 25 (2.00)

For use of this form, see AR 27-60; the proponent agency is OTJAG

Talle of Invention:    Consideration   Conside	
*Application Serial No.:  *Date Oath Executed:  *Plate Oath Oath Executed:  *Plate Oath Oath Oath Oath Oath Oath Oath Oath	Title of Invention: Broadhand Optics for Manipulating Light Beams and Image
*Plate Oath Executed:  (*Data not known at execution may be added for better identification.)  1 (We), the undersigned inventor(e), in consideration of the rights of the Government of the United States acquired by virture of the circumstances under which the above-entitled invention was made, hereby.  1. Assign to the Government of the United States, its Terifories, Possessions, and Puerfo Rico, in and to the above-entitled invention and application for patent and all Latters Patent resumpting thereon, and any continuation, continuation-in-part or-division of said application and any relesue or extension of said testers Patent.  2. Agree to assign to the Government upon its request, title and interest in the invention in those foreign countries in which the Government, within the patent extension that the United States application for patent, determines to cause an application to be filed in any particular foreign country or falls to make such a determination, within the said eight months, all right, title and interest in the invention in such foreign country shall remain in me (Le), subject to a nonexclusive, irrevocable, royally-free Scenes to the Government in any patent which may issue on the invention in such foreign pourity, including the power to issue sublicenses for use in behalf of the Government and/or furtherance of the foreign policies of the Government.  3. Agree to provide any further information within my (our) knowledge and to execute any further documents necessary to the prosecution of patent applications and patents issuing literoon.  (Eirst name)  (Middle Initial)  (Last name)  Typed Name of Inventor:  (Eirst name)  (State)  On the above date  And Country public)  Signature of inventor:  (State)  (State)  (State)  (State)	Inventor(s) N. Tahirjan, S. Nersisyan, D. Stocors, B. Kimball
(*Data not known at execution may be added for better identification.)  1 (We), the undersigned inventor(s), in consideration of the rights of the Government of the United States acquired by virture of the circumstances under which the above-entitled invention was made, hereby:  1. Assign to the Government of the United States, as represented by the Secretary of the Army, the entire right, title and interest throughout the United States, is it fortifortes, Possessions, and Puerto Rico, in and to the above-criticid invention and any reinsure or extension of said Latters Patent.  2. Agree to assign to the Government upon its request, title and interest in the invention in those foreign countries in which the Government, within eight months of the filling of the United States application for patent, determines to cause an application to be filed; provided that if the Government determines not to cause an application to be filed in any particular foreign country or fails to make such adetermination, within the said eight months, all right, till and inforced in the invention in such foreign country and interest in the contract in the invention in such foreign country and interest in the contract in the invention in such foreign country and interest in the contract in the invention in such foreign country and interest in the contract in the invention in such foreign country, including light months, all right, title and interest in the Government in any patent which may issue on the invention in such foreign country, including light months, all right, title and interest in the Government in any patent which may issue on the invention in such foreign country, including light months, all right, title and interest in the Government in any patent which may issue on the invention in such foreign country, including light power to Issue sublicenses for use in behalf of the Government and/or furtherance of the foreign policies of the Government.  3. Agree to provide any further information within my (our) knowledge and to exe	*Application Serial No.:
1 (We), the undersigned inventor(s), in consideration of the rights of the Government of the United States acquired by virture of the circumstances under which the above-entitled invention was made, hereby:  1. Assign to the Government of the United States, as represented by the Secretary of the Army, the entire right, title and interest throughout the United States, is Territories, Possessions, and Puerto Rico, in and to the above-criticid invention and application for patent and all Letters Patent is usually understances and any continuation, continuation-in-part or division of said application and any reissue or extension of said Letters Patent.  2. Agree to assign to the Government upon its request, title and interest in the invention in those foreign country or falls to make such a determination, within the said eight months, all right, title and interest in the invention in such foreign country or falls to make such a determination, within the said eight months, all right, title and interest in the Invention in such foreign country shall remain in me (us), subject to a nonexclusive, irrevocable, rospity-free license to the Government in any patent which may issue on the invention in such foreign country, including the power to issue sublicenses for use in behalf of the Government and/or furtherence of the foreign policies of the Government.  3. Agree to provide any further information within my (our) knowledge and to execute any further documents necessary to the prosecution of patent applications on the Invention, the prosecution and settlement of Interferences and recording of title to patent applications and patents issuing thereon.  Signature of inventor:  (First name)  (Middle Initial)  (Last name)  Now to me to be the individual described in and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.	*Date Oath Executed: *Filing Date:
1. Assign to the Government of the United States, as represented by the Secretary of the Army, the entire right, title and interest throughout the United States, list Territories, Possessions, and Poverto Rico, in and to the above-entitied invention and application for patent and all Letters Patent.  2. Agree to assign to the Government upon its request, title and interest in the invention in those foreign countries in which the Government, within eight months of the filling of the United States application for patent, determines to cause an application to be filled; provided that if the Government determines not to cause an application to be filled; provided that if the Government determines not to cause an application to be filled; provided that if the Government determines not to cause an application to be filled; provided that if the Government determines not to cause an application to be filled; provided that if the Government determines not to cause an application to be filled; provided that if the Government determines not to cause an application to the filled provided that if the Government determines not to cause an application to the filled provided that if the Government determines not to determine the filled provided that it has a patent which may issue on the fireward to a nonexclusive, irrevocable, royalty-free ficense for tase in behalf of the Government and/or furtherance of the foreign policies of the Government.  3. Agree to provide any further information within my (our) knowledge and to execute any further documents necessary to the prosecution of patent applications on the invention, the prosecution and settlement of interferences and recording of title to patent applications and patents issuing thereon.  Signature of inventor:  (First name)  (Middle Initial)  (Last name)  State of:  Typed Name of Inventor:  State of:  (Signature of notary public)  Scatter of notary public)	(*Data not known at execution may be added for better identification.)
Interest throughout the United States, its Territories, Possessions, and Poerto Rico, in and to the above-entitled invention and application for patent and all Letters Patent issuing thereon, and any continuation, continuation-in-part or division of said Letters Patent.  2. Agree to assign to the Government upon its request, title and interest in the invention in those foreign countries in which the Government, within eight months of the filling of the United States application for patent, determines to cause an application to be filed provided that if the Government determines not to eaue an application to be filed in any particular foreign country or fails to make such a determination, within the said eight months, all right, title and interest in the invention in such foreign country shall remain in me (us), subject to a nonexclusive, irrevocable, royelty-free license to the Government in any patent which may issue on the invention in such foreign country, including the power to issue sublicenses for use in behalf of the Government and/or furtherance of the foreign policies of the Government.  3. Agree to provide any further information within my (our) knowledge and to execute any further documents necessary to the prosecution of patent applications on the invention, the prosecution and settlement of interferences and recording of title to patent applications and patents issuing thereon.  Signature of inventor:  (First name)  (Middle Initial)  (Last name)  State of:  Typed Name of Inventor:  State of:  Typed Name of Inventor:  State of:  Name of Inventor to be the individual described in and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.	
the Government, within eight months of the filting of the United States application for patent, determines to cause an application to be filled in any particular foreign country or fails to make such a determination, within the said eight months, all right, title and interest in the invention in such foreign country shall remain in me (us), subject to a nonexclusive, irrevocable, royalty-free ficense to the Government in any patent which may issue on the invention in such foreign country, including the power to issue sublicenses for use in behalf of the Government and/or furtherance of the foreign policies of the Government.  3. Agree to provide any further information within my (our) knowledge and to execute any further documents necessary to the prosecution of patent applications on the invention, the prosecution and settlement of interferences and recording of title to patent applications and patents issuing thereon.  Signature of inventor:  (First name)  (Middle Initial)  (Last name)  Duty Address:  (State)  Typed Name of Inventor:  State of:  (State)  On the above date  Size of the Government duty appeared before me and acknowledged to me that the same as his own free act and deed.  (SEAL)  (Signature of notary public)	interest throughout the United States, its Territories, Possessions, and Puerlo Rico, in and to the above-entitled invention and application for patent and all Letters Patent issuing thereon, and any continuation, continuation-in-part or division of said application
the prosecution of patent applications on the invention, the prosecution and settlement of interferences and recording of title to patent applications and patents issuing thereon.  Signature of inventor:  (First name)  (Middle Initial)  (Last name)  Duty Address:  (Locality)  (County)  (Stale)  Typed Name of Inventor:  State of:  7 C S S C hust )  State of:  7 C S S C hust )  On the above date  and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.  (SEAL)  (Signature of notary public)	the Government, within eight months of the filing of the United States application for patent, determines to cause an application to be filed; provided that if the Government determines not to cause an application to be filed in any particular foreign country or fails to make such a determination, within the said eight months, all right, title and interest in the invention in such foreign country shall remain in me (us), subject to a nonexclusive, irrevocable, royalty-free license to the Government in any patent which may issue on the invention in such foreign country, including the power to issue sublicenses for use in behalf of the Government and/or
Duty Address:    Matrick   Middle Initial)   (Last name)	the prosecution of patent applications on the invention, the prosecution and settlement of interferences and recording of title to
Duty Address:    Matrick   Middle Initial)   (Last name)	
Duty Address:    Date:   Duty Address:   Matrick   Middlesex   Matrick   Mat	
State of:     Make   Ma	Duty Address: Natick Middlesex MA
On the above date  In the individual described in and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.  (Signature of notary public)	245 14 2 2 1/1
On the above date  In the individual described in and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.  (Signature of notary public)	*********
On the above date  Another the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.  (SEAL)  (Signature of notary public)	) 55
and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free act and deed.  (SEAL)  (Signature of notary public)	County or: 2 4000 (C) C2
	and who executed the foregoing instrument duly appeared before me and acknowledged to me that the same as his own free
	(SEAL)
I ▲ \ EDITA (#11 INFNI) ■	ERICA GOTTBERG
Notary Public  My Commission expire de COMMONWEATH OF MASSACHUSETTS  My Commission Expires	Notary Public  My Commission expired the COMMONWEALTH OF MASSACHUSETTS  My Commission Expires
April 2, 2015	April 2, 2015

DA FORM 2874-R, APR 1993

REPLACES DA FORM 2874-R, MAR 74, WHICH IS OBSOLETE.

Page

ol

Pages

APD PE v2.00