505041997 08/08/2018

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT5088748

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
HIROAKI SATO	03/09/2012
TECK-GYU KANG	05/01/2012
BELGACEM HABA	01/18/2012
PHILIP R. OSBORN	05/02/2012
WEI-SHUN WANG	03/13/2012
ELLIS CHAU	03/18/2012
ILYAS MOHAMMED	03/15/2012
NORIHITO MASUDA	05/05/2012
KAZUO SAKUMA	05/01/2012
KIYOAKI HASHIMOTO	04/30/2012
KURASAWA INETARO	05/01/2012
TOMOYUKI KIKUCHI	05/02/2012

RECEIVING PARTY DATA

Name:	TESSERA, INC.
Street Address:	3025 ORCHARD PARKWAY
City:	SAN JOSE
State/Country:	CALIFORNIA
Postal Code:	95134

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16058425

CORRESPONDENCE DATA

Fax Number:

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: 4083216069

Email: karen.perricone@xperi.com

Correspondent Name: TESSERA INTELLECTUAL PROPERTIES CORP. C/

Address Line 1: 3025 ORCHARD PARKWAY Address Line 4: SAN JOSE, CALIFORNIA 95134

PATENT -

REEL: 046587 FRAME: 0466 505041997

ATTORNEY DOCKET NUMBER: ME001-0647-US-06	
NAME OF SUBMITTER: CHRISTOPHER W. LATTIN	
SIGNATURE:	/Christopher W. Lattin/
DATE SIGNED: 08/08/2018	
Total Attachments: 12	
source=ME001-0647-US-06 Parent-Assignments-Filed 2018-08-08#page1.tif	

source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page1.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page2.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page3.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page4.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page5.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page6.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page7.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page8.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page9.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page10.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page11.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page11.tif source=ME001-0647-US-06_Parent-Assignments-Filed_2018-08-08#page12.tif

PATENT REEL: 046587 FRAME: 0467

ACCIONIBETAT OF LITH ITV ADDITO ATION	Docket Number (Optional)	
ASSIGNMENT OF UTILITY APPLICATION	TESSERA 3.0-647	
Whereas, I, Hiroaki Sato	of	
Yokohama Business Park, Technical Center; 134 Goudo	3	
hereafter referred to as assignor, have with others invented cert	· · · · · · · · · · · · · · · · · · ·	
PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE	BONDS TO ENCAPSULATION SURFACE	
for which an application for a United States Letters Patent was filed on May 2, 2012 Application Number $13/462,158$		
for which an application for a United States Letters Patent was executed by me on and		
Whereas, Tessera, Inc.		
a corporation of Delaware herein referred to as "assignee" who	se mailing address is	
3025 Orchard Parkway, San Jose, California 95134		
is desirous of acquiring the entire right, title and interest in the s	ame;	
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.		
And I do hereby authorize my attorneys to insert on this deed when known.	the filing date and application number of said application	
3/9/12 (Deta)	// Such	
(Date)	(Signature)	
State of California) SS: County of Santa Clara)		
On $\frac{3/9/2012}{}$, before me,	Salina Diaz, Notary Public personally	
appeared <u>Hiroaki Sato</u> , who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that (he) she executed the same in the methorized capacity, and that by his her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.		
I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is true and correct.		
WITNESS my hand and official seal. (Notary Public)	SALINA DIAZ Commission # 1889526 Notary Public - California Santa Clara County	
x *Total of 7 forms are submitted	My UBITAR YEXBARS May 16, 2014	

A O O () A RESTRICT OF LITTE 1777 A TITLE 1 A STEAR	Docket Number (Optional)	
ASSIGNMENT OF UTILITY APPLICATION	TESSERA 3.10-647	
Whereas, I, Teck-Gyu Kang	of	
c/o Tessera, Inc.; 3025 Orchard Parkway; San Jose, California 95134		
hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION SURFACE		
for which an application for a United States Letters Patent was filed on Application Number $\frac{13}{462}$, $\frac{158}{158}$		
for which an application for a United States Letters Pater and	nt was executed by me on	
Whereas, Tessera, Inc.		
a corporation of <u>Delaware</u> herein referred to as "assignee" whos 3025 Orchard Parkway; San Jose, California 95134	se mailing address is	
is desirous of acquiring the entire right, title and interest in the sa	ame;	
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.		
And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.		
(Date)	The contract of the contract o	
(Date)	(Signature)	
State of California) SS:		
	ialina Diaz, Notary Pupic	
appeared Teck-Gyu Kang, who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that he she executed the same in his/her authorized capacity, and that by his/her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.		
I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is true and correct.		
WITNESS my hand and official seal. (Notary Public)	SALINA DIAZ Commission # 1889526 Notary Public - California Santa Clara County My Comm. Expires May 16, 2014	
x *Total of 12 forms are submitted.		

LD-527\

A dia dia paga and a superior and a	Docket Number (Optional)	
ASSIGNMENT OF UTILITY APPLICATION	TESSERA 3.0-647	
Whereas, I,Belgacem Haba	of	
c/o Tessera, Inc,; 3025 Orchard Parkway; San Jose, Cali	fornia 95134	
hereafter referred to as assignor, have with others invented certa	ain new and useful improvements in	
PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE I	BONDS TO ENCAPSULATION SURFACE	
for which an application for a United States Letters Patent was filed on May 2, 2012		
Application Number 13/462,158 for which an application for a United States Letters Pater	truce executed by me on	
and	it was executed by the on	
Whereas, Tessera, Inc.		
a corporation of <u>Delaware</u> herein referred to as "assignee" whos	se mailing address is	
3025 Orchard Parkway; San Jose, California 95134		
is desirous of acquiring the entire right, title and interest in the sa	ame;	
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.		
And I do hereby authorize my attorneys to insert on this deed t when known.	he filing date and application number of said application	
1/18/2012 (Date)		
1	(Signature)	
State of California) SS:	Retynum (Signature)	
County of Saina Clara)		
on January 18, 2012, before me, Yaren p. Perricone, Notary Public personally		
appeared Belgacem Haba, who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that he sake executed the same in his/her authorized		
capacity, and that by his her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.		
I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is true and correct. KAREN A. PERRICONE		
WITNESS my hand and official seal.	Oommission # 1890143 Notary Public - California	
(Notary Public)	Santa Clara County My Comm. Expires May 18, 2014	
(Notally Fublic)	Almonto Barrow Company	
x *Total of 7 forms are submitted,		

ASSIGNMENT OF UTILITY APPLICATION TESSERA 3.10-647	***************************************	
Whereas, I. Philip R. Osborn (2017) c/o Inversas Corporation 2702 Orchard Parkway; San Jose, California 95134	_ of	
hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION SURFACE		
for which an application for a United States Letters Patent was filed on Application Number 13/462,158		
for which an application for a United States Letters Patent was executed by me on and	,	
Whereas, Tessera, Inc.		
a corporation of <u>Delaware</u> herein referred to as "assignee" whose mailing address is 3025 Orchard Parkway; San Jose, California 95134		
is desirous of acquiring the entire right, title and interest in the same;		
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receip is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over assignee my entire right, title and interest for the United States of America and all other countries in an invention and the aforesaid utility patent application and all original, divisional, continuation, continuation substitute or reissue applications and patents applied for or granted therefor in the United States of America other countries, for said invention, including without limitation all applications and patents for said invention priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to of priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenar further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applicated Letters Patent on said improvements and all assignments thereof to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever reto testify in any interferences or other legal proceedings in which any of said applications or patents may involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignees.	er to said to said n-in-part, a and all claiming aim such issue all t therein; at without ations for te to said equested, become ignee, its expenses	
And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.		
2 MAY 2012 /KK		
2 MAY 2012 (Signature)	**	
State of California (Signature)		
County of Sents Clara)		
	ersonally	
appeared Phillip R. Osborn, who proved to me on the basis of satisfactory evidence to be the person whose subscribed to the within instrument and acknowledged to me that he/she executed the same in his/her a capacity, and that by/his/her signature on the instrument the person, or the entity upon behalf of which the persecuted the instrument.	uthorized	
I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is correct.	true and	
WITNESS my hand and official seal Witness my hand and official seal SALINA DIAZ Commission # 1889526 Notary Public - California Santa Clara County		
(Notary Public) M/NSTARY Extitles May 16, 2014	•	
X *Total of 12 forms are submitted.		

A STATE OF A LOCAL DOWN DESIGN OF A DOWN A LOCAL ASSESSMENT A LOCAL ASSESSMENT ASSESSMEN	Docket Number (Optional)	
ASSIGNMENT OF UTILITY APPLICATION	TESSERA 3.0-647	
Whereas, I, <u>Wei-Shun Wang</u>	of	
Tessera, Inc.; 3025 Orchard Parkway; San Jose, Californ	ia 95134	
hereafter referred to as assignor, have with others invented certa	ain new and useful improvements in	
PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE	BONDS TO ENCAPSULATION SURFACE	
for which an application for a United States Letters Patent was filed on May 2, 2012 Application Number $13/462,158$		
for which an application for a United States Letters Pater	nt was executed by me on	
and		
Whereas, Tessera, Inc.		
a corporation of <u>Delaware</u> herein referred to as "assignee" whos	se mailing address is	
3025 Orchard Parkway; San Jose, California 95134		
is desirous of acquiring the entire right, title and interest in the sa	ame;	
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.		
And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.		
	Ver from Wang	
(Date)	(Signature)	
State of California) SS:		
County of Jun ta Clara)		
On $3//3/20/2$, before me,	alina Diaz, Rotary Publio personally	
appeared Wei-Shun Wang, who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the within instrument and acknowledged to me that (fie/she executed the same in (fis/her authorized capacity, and that by (his/her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.		
I certify under PENALTY OF PERJURY under the laws of the S	tate of California that the foregoing paragraph is true and	
correct.	SALINA DIAZ	
WITNESS my hand and official seal	Commission # 1889526 Notary Public - California	
Market Harry	Santa Clara County	
(Notary Public)	My Comotendiseaday 16, 2014	
x *Total of 7 forms are submitted.		

	Docket Number (Optional)	
ASSIGNMENT OF UTILITY APPLICATION	TESSERA 3.0-647	
Whereas, I, Ellis Chau	of	
c/o Tessera, Inc.; 3025 Orchard Parkway; San Jose, California 95134		
hereafter referred to as assignor, have with others invented cert		
PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE	•	
for which an application for a United States Letters Patent was filed on $\frac{\text{May 2, 2012}}{13/462,158}$		
for which an application for a United States Letters Patent was executed by me on and		
Whereas, Tessera, Inc.		
a corporation of <u>Delaware</u> herein referred to as "assignee" whose 3025 Orchard Parkway; San Jose, California 95134	se mailing address is	
is desirous of acquiring the entire right, title and interest in the sa	ame;	
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.		
And I do hereby authorize my attorneys to insert on this deed t when known. \mathcal{E}	the filling date and application number of said application	
3/28/2012	and the same of th	
(Date)	(Signature)	
State of California) SS:	(Signature)	
County of Santa clara)		
	alina Diaz, Notary Public personally	
appeared Ellis Chau, who proved to me on the basis of s subscribed to the within instrument and acknowledged to me capacity, and that by his/her signature on the instrument the per executed the instrument.	atisfactory evidence to be the person whose name is a that field have executed the same in first have authorized	
I certify under PENALTY OF PERJURY under the laws of the S correct.	tate of California that the foregoing paragraph is true and	
WITNESS(my hand and official seal.	SALINA DIAZ Commission # 1889526	
11 / CE N/ 1/2/2 3	Notary Public - California	
(Notary Public)	Santa Clara County My Comin FARY's May 16, 2014	
x *Total of 7 forms are submitted.		

	Docket Number (Optional)	
ASSIGNMENT OF UTILITY APPLICATION	TESSERA 3.0-647	
	120011770.00	
Whereas, I, Ilyas Mohammed	of	
c/o Tessera, Inc.; 3025 Orchard Parkway; San Jose, California 95134		
hereafter referred to as assignor, have with others invented cert		
PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE	,	
for which an application for a United States Letters Patent was filed on May 2, 2012 Application Number 13/462,158		
for which an application for a United States Letters Pater	nt was executed by me on	
and	1	
Whereas Tossara Inc		
Whereas, Tessera, Inc. a corporation of Delaware herein referred to as "assignee" whose	ee mailing address is	
3025 Orchard Parkway; San Jose, California 95134	se maning address is	
is desirous of acquiring the entire right, title and interest in the sa	ame;	
NOW, THEREFORE, in consideration of the sum of one dollars (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, continuation-in-part, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee. And I do hereby authorize my attorneys to insert on this deed the filling date and application number of sa		
3/15/2012	(Signature)	
State of California) SS:	f	
County of Sata Clara)		
on $\frac{3}{15}/2012$, before me, $\frac{5ah}{15}$	na Diag, Notary Public personally	
appeared <u>Ilyas Mohammed</u> , who proved to me on the basis of satisfactory evidence to be the person whose name is		
subscribed to the within instrument and acknowledged to me that he executed the same in his/her-authorized capacity, and that by his/her signature on the instrument the person, or the entity upon behalf of which the person acted, executed the instrument.		
I certify under PENALTY OF PERJURY under the laws of the S correct.	tate of California that the foregoing paragraph is true and	
WITNESS my hand and official seal	SALINA DIAZ	
Man Seil See	Commission # 1889526	
(Notary Public)	Notary Public - California N. (NOTARY GHAR) COUNTY	
(trodity, dollo)	My Comm. Expires May 16, 2014	
x *Total of 7 forms are submitted.		

ASSIGNMENT OF UTILITY APPLICATION

Docket Number (Optional)

TESSERA 3.10-647

			. Business and a second	MI.B.O. J.B. How([p	and the control of the state of	***************************************
Whereas, I,	Norihito M	/lasuda			of	
Yokohama Business Park, Technical Center; 134 Goudo-cho, Hodogaya-Ku, Yokoham-shi;						
	Kanagawa; 240-0005; JAPAN					
hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION						
SURF						ļ
Tananana .	• •		States Letters Patent was filed on	May 2,	2012	
	plication Num	**************************************	13/462,158 States Letters Patent was executed by	- med and "Milked"		
	•		•	/ me on	**************************************	
<u> </u>	' Which an iii	• •	ation was filed on		, as	
And	*************************************	, desig	gnating the United States.			
	Tanana li	_				
Whereas, a corporation	Tessera, Ir		os "assinnas" whose mailinn address	ia	Andrews the state of the state	
a corporation of <u>Delaware</u> herein referred to as "assignee" whose mailing address is 3025 Orchard Parkway; San Jose, California 95134						
is desirous of acquiring the entire right, title and interest in the same;						
is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including all claims for damages by reason of past infringement with the right to sue for and collect the same for its own use and the use of its successors, assigns and legal representatives, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignse of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee.						
And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.						
: 	May 5,	2012	Neglita	Moan	la	•
	Date Norihito I			orihito Mas	suda	
	naë	masuda Vitness				:
						ļ
	Não	Masuda				
	Typed Na	ame of Witness				

*Total of

x

12

forms are submitted.

PATENT

REEL: 036586 FRAME: 0895

Docket Number (Optional) ASSIGNMENT OF UTILITY APPLICATION TESSERA 3.10-647 Whereas, I, Kazuo Sakuma Yokohama Business Park, Technical Center; 134 Goudo-cho, Hodogaya-Ku, Yokoham-shi; Kanagawa; 240-0005; JAPAN hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION SURFACE $\lceil X \rceil$ for which an application for a United States Letters Patent was filed on $\lceil May/2 \rceil$, $\lceil 2012 \rceil$ Application Number __13/462,158 for which an application for a United States Letters Patent was executed by me on for which an International Application was filed on , designating the United States. And Whereas, Tessera, Inc. a corporation of <u>Delaware</u> herein referred to as "assignee" whose mailing address is 3025 Orchard Parkway; San Jose, California 95134 is desirous of acquiring the entire right, title and interest in the same; NOW, THEREFORE, in consideration of the sum of one dollar (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including all claims for damages by reason of past infringement with the right to sue for and collect the same for its own use and the use of its successors, assigns and legal representatives, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee. And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known. 5/1/2012 Bayroo Sakuma

Masako Jakuma

Minasako Jakuma

Х

*Total of

12

forms are submitted.

PATENT REEL: 086580 FRAME: 0892

former PTO/SB/15 (8-00) Modified LDLK&M Docket Number (Optional) ASSIGNMENT OF UTILITY APPLICATION TESSERA 3.10-647 Whereas, I, Kiyoaki Hashimoto Yokohama Business Park, Technical Center: 134 Goudo-cho, Hodogava-Ku, Yokoham-shi; Kanagawa: 240-0005; JAPAN hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION SURFACE \overline{X} for which an application for a United States Letters Patent was filed on May 2, 2012 Application Number 13/462,158 for which an application for a United States Letters Patent was executed by me on for which an International Application was filed on , designating the United States. And Whereas, Tessera, Inc. a corporation of <u>Delaware</u> herein referred to as "assignee" whose mailing address is 3025 Orchard Parkway; San Jose, California 95134 is desirous of acquiring the entire right, title and interest in the same: NOW, THEREFORE, in consideration of the sum of one dollar (\$ 1.00), the receipt whereof is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including all claims for damages by reason of past infringement with the right to sue for and collect the same for its own use and the use of its successors, assigns and legal representatives, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful paths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee. And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known. Kiyoaki Hashimoto Hiroko Hashimoto Typed Name of Witness

*Total of

X

12

forms are submitted

PATENT

REEL: 088588 FRAME: 0893

former PTO/SB/15 (8-00) Modified LDLK&M Docket Number (Optional) ASSIGNMENT OF UTILITY APPLICATION TESSERA 3.10-647 Whereas, I, Kurosawa Inetaro Yokohama Business Park, Technical Center; 134 Goudo-cho, Hodogaya-Ku, Yokoham-shi; Kanagawa; 240-0005; JAPAN hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION SURFACE for which an application for a United States Letters Patent was filed on May 2, 2012 Application Number _____13/462,158 for which an application for a United States Letters Patent was executed by me on for which an International Application was filed on , designating the United States. And Whereas, Tessera, Inc. a corporation of Delaware herein referred to as "assignee" whose mailing address is 3025 Orchard Parkway, San Jose, California 95134 is desirous of acquiring the entire right, title and interest in the same;), the receipt whereof dollar (\$ 1.00 NOW, THEREFORE, in consideration of the sum of one is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesald utility patent application and all original, divisional, continuation, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including all claims for damages by reason of past infringement with the right to sue for and collect the same for its own use and the use of its successors, assigns and legal representatives, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein, and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee. And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application Unitaro Kurosayura Kurosawa Inetaro Mczuki Karosowa Witness Mizuki Kurosawa Typed Name of Witness *Total of 12 forms are submitted.

PATENT

REEL: 046480 FRAME: 0498

former PTO/SB/15 (8-00) Modified LDLK&M Docket Number (Optional) **ASSIGNMENT OF UTILITY APPLICATION** TESSERA 3.10-647 Whereas, I, Tomoyuki Kikuchi Yokohama Business Park, Technical Center; 134 Goudo-cho, Hodogaya-Ku, Yokoham-shi; Kanagawa: 240-0005; JAPAN hereafter referred to as assignor, have with others invented certain new and useful improvements in PACKAGE-ON-PACKAGE ASSEMBLY WITH WIRE BONDS TO ENCAPSULATION **SURFACE** K for which an application for a United States Letters Patent was filed on May 2, 2012 Application Number 13/462,158 for which an application for a United States Letters Patent was executed by me on for which an International Application was filed on ______, as _____, designating the United States. And Whereas, Tessera, Inc. a corporation of Delaware herein referred to as "assignee" whose mailing address is 3025 Orchard Parkway; San Jose, California 95134 is desirous of acquiring the entire right, title and interest in the same;), the receipt whereof NOW, THEREFORE, in consideration of the sum of one dollar (\$ 1.00 is acknowledged, and other good and valuable consideration, I as assignor hereby sell, assign and set over to said assignee my entire right, title and interest for the United States of America and all other countries in and to said invention and the aforesaid utility patent application and all original, divisional, continuation, substitute or reissue applications and patents applied for or granted therefor in the United States of America and all other countries, for said invention, including without limitation all applications and patents for said invention claiming priority or benefit of the aforesaid utility application pursuant to any law or treaty, and including all claims for damages by reason of past infringement with the right to sue for and collect the same for its own use and the use of its successors, assigns and legal representatives, and including the right to claim such priority or benefit and the Commissioner of Patents and Trademarks is hereby authorized and requested to issue all patents on said improvements or resulting therefrom to said assignee herein, as assignee of the entire interest therein; and the undersigned for me and my legal representatives, heirs and assigns do hereby agree and covenant without further remuneration, to execute and deliver all original, divisional, continuation, reissue and other applications for Letters Patent on said improvements and all assignments thereof to said assignee or its assigns, to communicate to said assignee or its representatives all facts known to the undersigned respecting said improvements, whenever requested, to testify in any interferences or other legal proceedings in which any of said applications or patents may become involved, to sign all lawful papers, make all rightful oaths, and to do generally everything necessary to aid assignee, its successors, assigns and nominees to obtain patent protection for said improvements in all countries, the expenses incident to said applications to be borne and paid by said assignee. And I do hereby authorize my attorneys to insert on this deed the filing date and application number of said application when known.

May. 2. 20/2

Date

May. 2. 20/2

Witness Ayano Kikuchi
Typed Name of Witness

forms are submitted.

PATENT

REEL: 036580 FRAME: 0899

Tomovuki Kikuchi

12

*Total of