507030537 12/16/2021

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 **EPAS ID: PAT7077373**

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
HAWK-EYE INNOVATIONS LIMITED	05/21/2020

RECEIVING PARTY DATA

Name:	SONY EUROPE BV
Street Address:	THE HEIGHTS, BROOKLANDS
City:	WEYBRIDGE, SURREY
State/Country:	UNITED KINGDOM
Postal Code:	KT13 0XW
Name:	SONY CORPORATION
Street Address:	1-7-1 KONAN
City:	MINATO-KU, TOKYO
State/Country:	JAPAN
State/Country.	0741744

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16671214

CORRESPONDENCE DATA

Fax Number: (703)413-2220

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: (703) 413-3000

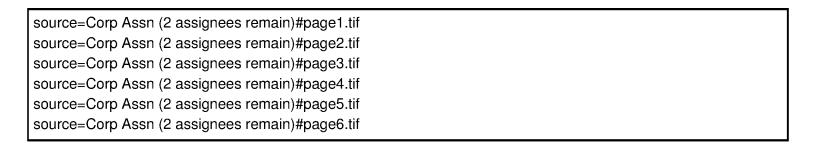
Email: corpassignments@oblon.com

Correspondent Name: OBLON, ET AL. Address Line 1: 1940 DUKE STREET

Address Line 4: ALEXANDRIA, VIRGINIA 22314

ATTORNEY DOCKET NUMBER:	524217US
NAME OF SUBMITTER:	ELLEN MURABITO
SIGNATURE:	/ELLEN MURABITO/
DATE SIGNED:	12/16/2021

Total Attachments: 6



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

IN RE APPLICATION OF: Luke DODD

SERIAL NUMBER: 16/671,214 ATTN: ASSIGNMENT BRANCH

FILING DATE: November 1, 2019

FOR: A METHOD, APPARATUS AND COMPUTER PROGRAM FOR IMAGE

PROCESSING INCLUDING GENERATING A DIFFERENT IMAGE OF AT

LEAST ONE OBJECT

IDENTIFICATION OF PATENT(S) AND PATENT APPLICATION(S) UNDER 37 C.F.R. § 3.21

COMMISSIONER FOR PATENTS ALEXANDRIA, VIRGINIA 22313

Commissioner:

The attached Assignment contains a reference to United Kingdom Priority No. 1818313.7, and is believed, in combination with the U.S. application number and filing date captioned above, to adequately identify this application in accordance with 37 C.F.R. § 3.21, as set forth in M.P.E.P. § 302.03.

Applicant respectfully requests recordation of the attached Assignment.

Respectfully Submitted,

OBLON, McCLELLAND, MAIER & NEUSTADT, L.L.P.

James Love

Registration No. 58,421

Anna Z. Lloyd

Registration No.: 65,062

Customer Number

22850

Tel. (703) 413-3000 Fax. (703) 413-2220 (OMMN 01/21/21)

FULL INVENTOR ASSIGNMENT AND ASSIGNMENT FROM HAWK-EYE TO SONY CORPORATION AND SONY EUROPE BY JOINTLY

WHEREAS, I, as a named inventor listed on the attached APPENDIX (hereinafter referred to as "APPENDIX"), have invented certain new and useful improvements in the invention(s) listed on the same, for which an application for Letters Patent was executed on the priority date included thereon:

AND WHEREAS, HAWK-EYE INNOVATIONS LIMITED, a corporation organized and existing under the laws of the United Kingdom, with offices at Legal Department, The Heights, Brooklands, Weybridge, Surrey, KT13 0XW, United Kingdom (hereinafter referenced as "ASSIGNEE HAWK-EYE"), in accordance with my employment agreement and/or with a preexisting agreement or mutual understanding between myself and ASSIGNEE HAWK-EYE, is desirous of acquiring my entire right, title and interest in, to and under said invention(s), said application(s) disclosing the invention(s) and in, to and under any Letters Patent or similar legal protection which may be granted therefor in any and all countries worldwide (including in the territory of the United States of America);

AND WHEREAS, SONY EUROPE BV, a corporation organized and existing under the laws of the Netherlands, with offices at The Heights, Brooklands, Weybridge, Surrey, KT13 0XW, United Kingdom (hereinafter referenced as "CO-ASSIGNEE SEU") is desirous of acquiring, directly or indirectly, an undivided partial interest in, to and under said invention(s), said application(s) disclosing the invention(s) and in, to and under any Letters Patent or similar legal protection which may be granted therefor in any and all countries worldwide (including in the territory of the United States of America) to be jointly held with CO-ASSIGNEE SONY as the co-owners to the rights by this assignment;

AND WHEREAS, SONY CORPORATION, a corporation organized and existing under the laws of Japan, with offices at 1-7-1 Konan, Minato-ku, Tokyo 108-0075, Japan (hereinafter referenced as "CO-ASSIGNEE SONY") is desirous of acquiring an undivided partial interest in, to and under said invention(s), said application(s) disclosing the invention(s) and in, to and under any Letters Patent or similar legal protection which may be granted therefor in any and all countries worldwide (including in the territory of the United States of America) to be jointly held with CO-ASSIGNEE SEU as the co-owners to the rights by this assignment;

NOW THEREFORE, after good and valuable consideration or in consideration of the recognized value of any past and/or potential collaborative projects in the future, the receipt and sufficiency of which are hereby acknowledged, I, as an inventor as indicated above, by these presents do hereby assign, sell and transfer unto said ASSIGNEE HAWK-EYE, the entire right, title and interest in and to the said invention(s), said application(s), including any divisions, continuations, substitutions and renewals thereof, and in and to any and all Letters Patent which may be granted for said invention(s), in any country (including the territory of the United States of America), and in and to any and all priority rights and/or convention rights under the International Convention for the Protection of Industrial Property, Inter-American Convention Relating to Patents, Designs and Industrial Models, and any other international agreements, and to

Assignment Inventor to Hawk-Eye and Assignment to SEU and Sony Corp. jointly

any other benefits accruing or to accrue to me with respect to the filing of applications for patents or securing of patents or other industrial property protection throughout the world (including in the territory of the United States of America) in respect of the inventions which are the subjects of the applications for Letters Patent described herein, and this conveyance of interest includes the right for the ASSIGNEE HAWK-EYE, or its successors, assigns, and/or legal representatives, to bring, make, oppose, defend, appeal proceedings, claims or actions and obtain relief (and to retain any damages recovered) in respect of any infringement, or any other cause of action arising from ownership, of any of the Patents or any patents granted on any of the applications for patents or filed as aforesaid, whether occurring before, on or after the date of this agreement.

I, as an inventor, further declare that I either have the obligation to assign or have already assigned the full and exclusive rights in and to any inventions made during my employment to said ASSIGNEE HAWK-EYE based on my employment contract with said ASSIGNEE HAWK-EYE, and/or that said ASSIGNEE HAWK-EYE has obtained full and exclusive rights in and to any such inventions based on applicable national law or in accordance with a preexisting agreement between myself and ASSIGNEE HAWK-EYE, and that by this Assignment such transfer of right, title and interest in such inventions to said ASSIGNEE HAWK-EYE is herewith confirmed or restated.

CONCURRENTLY HEREWITH, after good and valuable consideration or in consideration of the recognized value of any past and/or potential collaborative projects in the future, the receipt and sufficiency of which are hereby acknowledged, ASSIGNEE HAWK-EYE has already assigned, directly or indirectly, by other means to said CO-ASSIGNEE SEU and said CO-ASSIGNEE SONY jointly, or by these presents does hereby presently assign, directly or indirectly, sell and transfer unto said CO-ASSIGNEE SEU and said CO-ASSIGNEE SONY iointly, their successors, assigns, and legal representatives, the entire right, title and interest in the said invention(s), said application(s), including any divisions, continuations, substitutions and renewals thereof, and in and to any and all Letters Patent which may be granted for said invention(s), in any country (including the territory of the United States of America), and in and to any and all priority rights and/or convention rights under the International Convention for the Protection of Industrial Property, Inter-American Convention Relating to Patents, Designs and Industrial Models, and any other international agreements, and to any other benefits accruing or to accrue with respect to the filing of applications for patents or securing of patents or other industrial property protection throughout the world (including in the territory of the United States of America) in respect of the inventions which are subjects of the applications for Letters Patent described herein, and this conveyance of interest includes the right for the CO-ASSIGNEE SEU and the CO-ASSIGNEE SONY, or their successors, assigns, and/or legal representatives, to bring, make, oppose, defend, appeal proceedings, claims or actions and obtain relief (and to retain any damages recovered) in respect of any infringement, or any other cause of action arising from ownership, of any of the Patents or any patents granted on any of the applications for patents or filed as aforesaid, whether occurring before, on or after the date of this agreement.

The undersigned inventor and ASSIGNEE HAWK-EYE hereby authorize and request the Commissioner of Patents of the United States and its territorial possessions, and other appropriate officials whose duty it is to issue patents in any country in the world, to issue any and all patents resulting from the aforesaid patent applications or any divisions, continuations, substitutions and

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renewals thereof, when granted, jointly to CO-ASSIGNEE SEU and CO-ASSIGNEE SONY, as the co-assignees of the full right, title and interest in and to the same;

The undersigned inventor and ASSIGNEE HAWK-EYE further agree to execute all necessary or desirable and lawful future documents, including assignments in favor of CO-ASSIGNEE SEU and CO-ASSIGNEE SONY, or their designee or successors, without further remuneration, in order to perfect title in said invention(s), modifications, and improvements in said invention(s), applications and Letters Patent in any country in the world (including in the territory of the United States of America);

The undersigned inventor and ASSIGNEE HAWK-EYE further agree to properly execute and deliver and without further remuneration or consideration, such necessary or desirable and lawful papers for application(s) for foreign patents, for filing subdivisions of said application(s) for patent, and/or for obtaining any reissue or reissues of any Letters Patent which may be granted for the aforesaid invention(s), as CO-ASSIGNEE SEU and CO-ASSIGNEE SONY shall hereafter require and prepare at CO-ASSIGNEE SEU and CO-ASSIGNEE SONY's own expense;

The undersigned inventor and ASSIGNEE HAWK-EYE further agree that CO-ASSIGNEE SEU and CO-ASSIGNEE SONY will, upon request, be provided promptly with all pertinent facts and documents relating to said application(s), said invention(s) and said Letters Patent and legal equivalents in foreign countries as may be known and accessible and will testify as to the same in any interference or litigation related thereto;

The undersigned inventor and ASSIGNEE HAWK-EYE hereby covenant that no assignment, sale, agreement or encumbrance has been or will be made or entered into which would conflict with this assignment and sale;

And the undersigned inventor and ASSIGNEE HAWK-EYE hereby authorize and request the attorney(s) of record in this application to insert on the APPENDIX any further identification, including the filing date and application number of the country in which an application for Letters Patent has been or will be subsequently filed, which may be necessary or desirable in order to comply with the rules of the patent office of that country for recordation of this document.

This Assignment Agreement shall be governed by and construed under the laws of the State of New York, United States of America, without regard to conflict of laws principles, all rights and remedies being governed by said laws.

Assignment Inventor to Hawk-Eye and Assignment to SEU and Sony Corp. jointly

This assignment executed on the dates indicated below.

Luke	Dodd		21 May 2020
Name	of inventor	luke Podd	Execution date of this assignment [DD/MONTH/YYYY]
Signat	ure of inventor		
	12 avec-	HAWK-EY	E INNOVATIONS LIMITED $ar{k}_{\lambda}$ (
Date:	21 May 2020	В	Name: Adam Fry
	(DD/MONTH/YYY)	Ϋ́}	Name: Adam Fry Title: otrector As duly authorized officer
		, se	ONY EUROPE BV
Date:	27 May 2020	Ву	n CART
	[DD/MONTH/YYY		Name: Nicolas Rose Title: IF Senior Manager As duly authorized officer
Date:	01 /October/2020 (DD/MONTH/YYY	By	Name: Massayoshi Doshida Title: General Manager As duly authorized officer Planning & Control Department Intellectual Property Division

DocuSign Envelope ID: 05ADFBC7-7AB0-4DEA-B845-8CC4F592C524

Assignment inventor to Hawk-Eye and Assignment to SEU and Sony Corp. Jointly

APPENDIX

3	Inventors	GB Application	GB Filing Date	Sony Reference	U.S. Application	U.S. Filing Date
A METHOD, APPARATUS AND COMPUTER PROCESSING PROCESSING	DODD, Luke	Milia da distribuida de la constituida del constituida de la const	99 Nav 18	09 Nov 18 1-18-154		

PATENT REEL: 058406 FRAME: 0749

RECORDED: 12/16/2021