11-24-20	000 —————	
FORM PTO-1595 1-31-92	U.S. Department of Commerce	
To the Honorable Commissioner of Pate Please record the attached original docu	01 ATTN. BOX ASSIGNMENTS	
Name of conveying party(ies):	2. Name and address of receiving party(ies)	
Ching-Fang Chang Naofumi Yanagihara	Name: Sony Corporation	
Additional name(s) of conveying party(ies) attached?  Yes No	Internal Address:	
3. Nature of conveyance:	Street Address: 1 Sony Drive	
Assignment Merger (NC) 1 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7	City: Park Ridge	
Security Change of Name Agreement	State: NJ Zip Code: 07656	
Other:	Additional name(s) & Address(es) attached?	
Execution Date: 10/19/00 and 10/18/00	☐ Yes ⊠ No	
4. Application number(s) or patent number(s): If this document is the application:	being filed together with a new application, the execution date of	
A. Patent Application Number(s):	B. Patent Number(s):	
09/497,434		
Hab to 27 00 Additional numbers attached?	☐ Yes	
5. Name and address of party to whom correspondence concerning document should be mailed:	6. Total number of applications and registrations involved: 1	
Name:	7. Total fee (37 CFR 3.41): \$40	
	Enclosed (Please charge deficiency to deposit account)	
	Authorized to be charged to deposit account	
Internal Address: FINNEGAN, HENDERSON, FARABOW, GARRET & DUNNER, L.L.P.	Т	
Street Address: 1300 I Street, N.W.		
City: Washington		
State: D.C. Zip: 20005-3315	8. Deposit Account No.: <u>06-0916</u>	
9. Statement and signature.		
To the best of my knowledge and belief, the foregoing information is true document.	ue and correct and any attached copy is a true copy of the original	
Sunda y V	haye 10/26/00	
Linda J. Thayer, Reg. No. 45,681 // Signature/ Date		
Total number of pages including cover sheet, attachments and documents: 5		
1/2000 GTEFFERA 00000006 09497434		

40.00 DP /

10/20/00 15:03 FAX 408 955 5490

SONY USRL MEDIASOFT

**2**002 Z 003 Ø 002

10/20/00 11:13 FAX 408 955 5724 SONY US 10/17/00 12:57 FAX 408 955 5490 SEL IPD

OCT 06 2000 15:53 FR FINNEGAN HENDERSON 650 849 6666 TO 14089555490 P. 02

Attorney Docket No.: 7095.0038-00

PATENT

SOLE/JOINT INVENTION (Worldwide Rights)

Sony Ref. No.: 50N3470

## ASSIGNMENT

WHEREAS WE, the below named inventors, [hereinafter referred to as Assignors], have made an invention entitled:

## METHOD AND APPARATUS FOR REDUCTION OF PREDICTION MODES IN MOTION ESTIMATION

for which we executed an application for United States Letters Patent concurrently herewith or filed an application for United States Letters Patent on February 3, 2000 (Serial No. 09/497,434); and

WHEREAS, (1) Sony Corporation, a corporation of Tokyo, Japan; and (2) Sony Electronics, Inc., a Delaware corporation whose post office address is 1 Sony Dr., Park Ridge, New Jersey 07656 (hereinafter collectively referred to as Assignees), are desirous of securing the entire right, title, and interest in and to this invention in all countries throughout the world, and in and to the application for United States Letters Patent on this invention and the Letters Patent to be issued upon this application;

NOW THEREFORE, be it known that for and in consideration of the sum of One Dollar (\$1.00) in hand paid and other good and valuable consideration the receipt of which from assignee is hereby acknowledged, we, as assignors, have sold, assigned, transferred, and set over, and do hereby sell, assign, transfer, and set over unto the Assignees, their lawful successors and assigns. our entire right, title, and interest in and to this invention and this application, and all divisions, and continuations thereof, and all Letters Patent of the United States which may be granted thereon, and all reissues thereof, and all rights to claim priority on the basis of such application, and all applications for Letters Patent which may hereafter be filed for this invention in any foreign country and all Letters Patent which may be granted on this invention in any foreign country, and all extensions, renewals, and reissues thereof; and we hereby authorize and request the Commissioner of Patents and Trademarks of the United States and any official of any foreign country whose duty it is to issue patents on applications as described above, to issue all Letters Patent for this invention to Assignees, their successors and assigns, in accordance with the terms of this Assignment;

AND, WE HEREBY covenant that we have the full right to convey the interest assigned by this Assignment, and we have not executed and will not execute any agreement in conflict with this Assignment;

AND. WE HEREBY further covenant and agree that we will, without further consideration, communicate with Assignees, their successors and assigns, any facts known to us respecting this invention, and testify in any legal proceeding, sign all lawful papers when called upon to do so. execute and deliver any and all papers that may be necessary or desirable to perfect the title to this invention in said Assignees, their successors or assigns, execute all divisional, continuation, and reissue applications, make all rightful oaths and generally do everything possible to aid Assignees, their successors and assigns, to obtain and enforce proper patent protection for this invention in

PATENT

REEL: 011258 FRAME: 0537

execution of such papers shall be borne by the Assignees, their successors and assigns.
IN TESTIMONY WHEREOF, we have hereunto set our hands.
Ching-Fang CHANG
Full Name Of Sole/First Assignor
6560 Capri Way Street Address
San Jose, CA 95129
City and State/Country
On- In Oly / oct. 19, 2000
Sole/First Assignor's Signature/Date
Naofumi YANAGIHARA Full Name Of Second Assignor
3-16-1-407 Unaki Street Address
Ota-ku, Tokyo, JAPAN City and State/Country

10/20/00 15:03 FAX 408 955 5490 SEL JPD

SONY USRL MEDIASOFT

SEL IPD

the United States and any foreign country, it being understood that any expense incident to the

OCT 06 2000 16:54 FR FINNEGAN HENDERSON 650 849 6666 TO 14089555490

10/20/00 11:13 FAX 408 955 5724

10/17/00 12:57 FAX 408 955 5490

Second Assignor's Signature/Date

SOLE/JOINT INVENTION (Worldwide Rights)

- 2 -

**PATENT REEL: 011258 FRAME: 0538** 

**2**003 **2004** 

Ø 003

Attorney Docket No.: 7095,0038-00

Sony Ref. No.: 50N3470

P.03 PATENT

10/20/00 15:03 FAX 408 955 5490 10/20/00 11:13 FAX 408 955 5724

SEL IPD

SONY USRL MEDIASOFT

**2**002 Ø1003 Z 002

10/17/00 12:57 FAX 408 955 5490 SEL IPD OCT 06 2000 16:53 FR FINNEGAN HENDERSON 650 849 6666 TO 14089555490

P.02 PATENT

Attorney Docket No.: 7095.0038-00

Sony Ref. No.: 50N3470

SOLE/JOINT INVENTION (Worldwide Rights)

## ASSIGNMENT

WHEREAS WE, the below named inventors, [hereinafter referred to as Assignors], have made an invention entitled:

## METHOD AND APPARATUS FOR REDUCTION OF PREDICTION MODES IN MOTION ESTIMATION

for which we executed an application for United States Letters Patent concurrently herewith or filed an application for United States Letters Patent on February 3, 2000 (Serial No. 09/497,434); and

WHEREAS, (1) Sony Corporation, a corporation of Tokyo, Japan; and (2) Sony Electronics. Inc., a Delaware corporation whose post office address is 1 Sony Dr., Park Ridge, New Jersey 07656 (hereinafter collectively referred to as Assignees), are desirous of securing the entire right, title, and interest in and to this invention in all countries throughout the world, and in and to the application for United States Letters Patent on this invention and the Letters Patent to be issued upon this application;

NOW THEREFORE, be it known that for and in consideration of the sum of One Dollar (\$1.00) in hand paid and other good and valuable consideration the receipt of which from assignee is hereby acknowledged, we, as assignors, have sold, assigned, transferred, and set over, and do hereby sell, assign, transfer, and set over unto the Assignees, their lawful successors and assigns. our entire right, title, and interest in and to this invention and this application, and all divisions, and continuations thereof, and all Letters Patent of the United States which may be granted thereon. and all reissues thereof, and all rights to claim priority on the basis of such application, and all applications for Letters Patent which may hereafter be filed for this invention in any foreign country and all Letters Patent which may be granted on this invention in any foreign country, and all extensions, renewals, and reissues thereof; and we hereby authorize and request the Commissioner of Patents and Trademarks of the United States and any official of any foreign country whose duty it is to issue patents on applications as described above, to issue all Letters Patent for this invention to Assignees, their successors and assigns, in accordance with the terms of this Assignment;

AND, WE HEREBY covenant that we have the full right to convey the interest assigned by this Assignment, and we have not executed and will not execute any agreement in conflict with this Assignment;

AND, WE HEREBY further covenant and agree that we will, without further consideration, communicate with Assignees, their successors and assigns, any facts known to us respecting this invention, and testify in any legal proceeding, sign all lawful papers when called upon to do so. execute and deliver any and all papers that may be necessary or desirable to perfect the title to this invention in said Assignees, their successors or assigns, execute all divisional, continuetion, and reissue applications, make all rightful oaths and generally do everything possible to aid Assignees. their successors and assigns, to obtain and enforce proper patent protection for this invention in

PATENT

REEL: 011258 FRAME: 0539

Ø 004

NO.819

₽. 31003

10/2000-10-182810:00408 95550NY ITC SEL IPM OCT 05 2000 16:54 FR FINNEGAN HENDERSON 650 849 6666 TO 14089555490

PATENT

P.03

Attorney Docket No.: 7095.0038-00

Sony Ref. No.: 50N3470

SOLE/JOINT INVENTION (Worldwide Rights)

the United States and any foreign country, it being understood that any expense incident to the execution of such papers shall be borne by the Assignees, their successors and assigns.

IN TESTIMONY WHEREOF, we have hereunto set our hands.

Ching-Fang CHANG	
Full Name Of Sole/First Assignor	
6560 Capri Way	
Street Address	
San Jose, CA 95129	
City and State/Country	
Sole/First Assignor's Signature/Date	
Naofumi YANAGIHARA	
Full Name Of Second Assignor	
3-16-1-407 Unaki	
Street Address	
Ota-ku, Tokvo, JAPAN	
City and State/Country	
anfris Gyilmo	Oct. 18, 2000
Second Assignor's Signature/Date	

**RECORDED: 10/27/2000** 

**PATENT REEL: 011258 FRAME: 0540**