PATENT ASSIGNMENT COVER SHEET

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SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
JIANHUA YANG	01/01/2009
DUNCAN STEWART	03/11/2009
PHILIP J KUEKES	01/13/2010
WILLIMA M TONG	01/21/2009

RECEIVING PARTY DATA

Name:	HEWLETT-PACKARD DEVELOPMENT COMPANY, L.P.
Street Address:	11445 COMPAQ CENTER DRIVE WEST
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State/Country:	TEXAS
Postal Code:	77070

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	14286513

CORRESPONDENCE DATA

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Address Line 2: INTELLECTUAL PROPERTY ADMINISTRATION

Address Line 4: FORT COLLINS, COLORADO 80528

ATTORNEY DOCKET NUMBER:	83927754	
NAME OF SUBMITTER:	DENISE HENNING-WILSON	
SIGNATURE:	/Denise Henning-Wilson/	
DATE SIGNED:	02/05/2015	

Total Attachments: 3

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PATENT REEL: 034892 FRAME: 0204 HEWLETT-PACKARD COMPANY Intellectual Property Administrator P.O. Box 272400 Fon Collins, Colorado 80527-2490

PATENT APPLICATION

ATTORNEY DOCKET NO. 200802336-1

ASSIGNMENT OF PATENT APPLICATION

We, the undersigned (each) have agreed and hereby agree to assign to HEWLETT-PACKARD DEVELOPMENT COMPANY, L.P., a Texas Limited Pertnership having its principal place of business in Houston, Texas, (hereinafter HPDC), in furtherance of my/our obligations to the Hewlett-Packard Company and its subskitaries and affiliates, and do hereby assign and transfer to HPDC, its successors and assigns, the entire right, title and interest, including the right of priority, in, to and under an application for Letters Patent of the United States

THEREIN

Piling Date:

Application No.:

and the invention(s) and improvement(s) set forth therein, and any and all continuations, continuations-in-part (C-I-P's), divisionals, and renewals of and substitutes for said application for said Letters Patent, and any and all Letters Patent of the United States and of countries foreign thereto which may be granted thereon or therefore; and any relisation, or reexaminations, or extensions of said Letters Patent:

I/we additionally authorize HPDC to file applications in my/our name for Letters Patent in any country, to be held and enjoyed by HPDC, its successors, assigns, nominees or legal representatives, to the full end of the term or terms for which said Letters Patent respectively may be granted, reissued or extended, as fully and entirely as the

same would have been held and enjoyed by me/us had this assignment, and transfer not been made;

AND I/we hereby coverant that I/we have full right to convey the entire interest herein assigned, and that I/we have not executed and will not execute any agreement in conflict herewith, and I/we further coverant and agree that I/we will, each time a request is made, and without undue delay, execute and deliver all such papers as may be necessary or desirable to perfect the title to said invention(s) or improvement(s), said application and said Letters Patent, to HPDC, its successors, assigns, nominees or legal representatives, and I/we agree to communicate to HPDC, or to its nominee, all known facts respecting said invention(s) or improvement(s), said application and said Letters Patent, to testify in any legal proceedings, to sign all lawful papers, to execute all disclaimers and divisionals, continuations, C-I-P's, reissue and foreign applications, to make all rightful oaths and dectarations, and generally to do everything possible to aid HPDC, its successors, assigns, nominees and legal representatives to obtain and columns for its or their own benefit, proper patent protection for said invention(s) or improvement(s) in any and all countries provided the expenses which may be incurred by me/us in lending such cooperation and assistance are paid by HPDC:

AND I/we hereby authorize and request the Commissioner of Patents and Trademarks of the United States and any official of any country or countries foreign to the United States whose duty it is to issue patents on applications as aforesaid, to issue to HPDC, as assignee of the entire right, title and interest, any and all Letters Patent for said invention(s) or improvement(s), including any and all Letters Patent of the United States which may be issued and granted on or as a result of the application aforesaid, in accordance with the terms of this assignment.

I/we further authorize and direct the attorneys of record to insert the serial number and filing date of said application now identified by the attorney docket number and title set forth above as soon as the same shall have been made known to them by the United States Patent and Trademark Office.

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Inventor's Signature (Seal)	*************************************	Date Assignment Signed	a minimum minimum saint
Jianhua Yang	*	Jan/o	109
Inventor's Typed Name		Date Application Signed	
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HEWLETT-PACKARD COMPANY Imeliectual Property Administrator P.O. 80x 272800 Fon Collins, Colorado 80527-2400

PATENT APPLICATION

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/ IN MITHERSON IES	REST, I've hereunte set my/our hand(s) ar	nd sealist:
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Philip J. Kuskas	<u> </u>	- JAN 18, 2010
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Rev 10/07 (Addignment)	Page 2 of 3	A second manager of August

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HEWLETT-PACKARD COMPANY Intellectual Property Administrator P.O. Box 272400 Fort Collins, Colorado 88527-2400

PATENT APPLICATION

ATTORNEY DOCKET NO. _____200802336-1

ASSIGNMENT OF PATENT APPLICATION (cont.)

IN WITNESS WHEREOF, I'we hereunto set my/our hand(s) and seal(s):

Inventor's Signature (Seal)	() () () () () () () () () ()	Date Assignment Signed
Duncan Stewart		
Inventor's Typed Namo	***************************************	Date Application Signed
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orace or)	
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Before me this day of	, , , , , , , , , , , , , , , , , , ,	
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RECORDED: 02/05/2015