PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT4994725

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
AANCHAL AGGARWAL	03/17/2015
HARSH CHAUDHARY	03/17/2015
YAKUP KOÇ	03/19/2015
YOUNGHUN KIM	03/17/2015
TARUN KUMAR	03/16/2015
ABHISHEK RAMAN	03/17/2015

RECEIVING PARTY DATA

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City:	ARMONK	
State/Country:	NEW YORK	
Postal Code:	10504	

PROPERTY NUMBERS Total: 1

Property Type	Number	
Application Number:	16000818	

CORRESPONDENCE DATA

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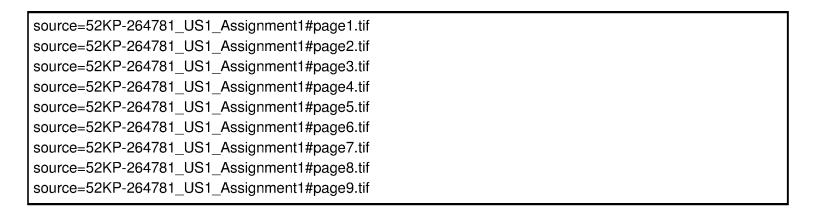
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ATTORNEY DOCKET NUMBER:	52KP-264781_US1
NAME OF SUBMITTER:	DANIEL C. KLOKE
SIGNATURE:	/Daniel C. Kloke/
DATE SIGNED:	06/06/2018

Total Attachments: 9

PATENT REEL: 046006 FRAME: 0861

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PATENT REEL: 046006 FRAME: 0862

DECLARATION (37 C.F.R. 1.63) FOR UTILITY PATENT APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76) AND ASSIGNMENT

Title of Invention: NETWORK MANAGEMENT BASED ON ASSESSMENT OF TOPOLOGICAL ROBUSTNESS AND CRITICALITY OF ASSETS

As a below named and undersigned inventor. Thereby declare that:
This declaration is directed to the attached application, or (if following box is checked):
[] United States application or PCT international application numberfiled on
The above-identified application was made or authorized to be made by me.
Uselieve that I am the original inventor or an original joint inventor of a claimed invention in the application.
I have reviewed and understand the contents of the application, including the claims.
I am aware of the duty to disclose to the United States Patent and Trademark Office all information known to me to be material to patentability as defined in 37 CFR Section 1,56.

Whereas, I ("ASSIGNOR") have made certain inventions, improvements, and discoveries (herein referred to as the "Invention") disclosed in the above-identified patent application and further identified by the IBM Docket Number provided above in the header of this document;

Whereas, International Business Machines Corporation (herein referred to as the "ASSIGNEE"), a corporation of New York having a place of business at Armonk, New York, desires to acquire, and I desire to grant to the ASSIGNEE, my entire worldwide right, title, and interest in and to the Invention and in and to any and all patent applications and patents directed thereto;

Now, therefore, for good and valuable consideration, the receipt and sufficiency thereof being hereby acknowledged. I hereby self or have sold, assign or have assigned, and otherwise transfer or have transferred to the ASSIGNEE, its successors, legal representatives, and assigns, my entire worldwide right, title, and interest in and to the Invention, the above-identified United States patent application, and any and all other patent applications and patents for the Invention which may be applied for or granted therefor in the United States and in all foreign countries and jurisdictions, including all divisions. continuations, reissues, reexaminations, renewals, extensions, counterparts, substitutes, and extensions thereof, and all rights of priority resulting from the filing of such applications and granting of such patents. In addition, I hereby authorize and request the Director of the United States Patent and Trademark Office to issue any United States Patent, and foreign patent authorities to issue any foreign patent, granted for the Invention, to the ASSIGNEE, its successors, legal representatives, and assigns, my entire worldwide right, title, and interest in and to the same to be held and enjoyed by the ASSIGNEE, its successors, legal representatives, and assigns to the full end of the terms for which any and all such patents may be granted, as fully and entirely as would have been held and enjoyed by me had this Assignment not been made; and I agree to execute any and all documents and instruments and perform all lawful acts reasonably related to recording this Assignment or perfecting fitle to the Invention and all related patents and applications, in the ASSIGNEE, its successors, legal representatives, and assigns. whenever requested by the ASSIGNEE, its successors, legal representatives, or assigns.

Page 1 of 3

IBM DOCKET NUMBER: YOR920150073USI

I acknowledge my prior and ongoing obligations to sell, assign, and transfer my rights under this Assignment to the ASSIGNEE and am unaware of any reason why I may not have the full and unencumbered right to sell, assign, and transfer my rights hereby sold, assigned, and transferred, and have not executed, and will not execute, any document or instrument in conflict herewith. I also hereby grant the ASSIGNEE, its successors, legal representatives, and assigns, the right to insert in this Assignment any further identification (including, but not limited to, patent Application Number) which may be necessary or desirable for recordation of this Assignment. This Assignment is governed by the substantive laws of the State of New York, and any disputes will be resolved in a New York state court or federal court sited in New York.

I hereby acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

(1)	Legal Name of Inventor: Aanchal Aggarwal	
	Signature: Acad L	Date: 02 17/2015
	Legal Name of Inventor: Harsh Chaudhary	
	Signature:	Date: 03/17/2015
(3)	Legal Name of Inventor; Yakup Koc	
	Signature:	Date:
(4)	Legal Name of Inventor: Younghun Kim	
	Signature:	Date: <u>//ay - /7-2-</u> 05

[IF MORE INVENTORS, ADDITIONAL SIGNATURE PAGE(S) FOLLOWS]

IBM DOCKET NUMBER: YOR920150073USI

(5)	Legal Name of Inventor: Tarun Kumar	
	Signature:	Date:
(6)	Legal Name of Inventor: Abhishek Raman	
	Signature:	Date:

IBM DOCKET NUMBER: YOR928150873USI

DECLARATION (37 C.F.R. 1.63) FOR UTILITY PATENT APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76) AND ASSIGNMENT

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Page 1 of 3

IBM DOCKET NUMBER: YOR920150073US1

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(1) Legal Name of Inventor; Annchal Aggarwal	
Signature:	Date:
(2) Legal Name of Inventor: Harsh Chaudhary	
Signature:	Date:
(3) Legal Name of Inventor: Yakup Koe Koa	
Signature:	Date: <u>\03//9/20</u> /\$`
(4) Legal Name of Inventor; Yo unghun Kim	
Signature:	Date:

[IF MORE INVENTORS, ADDITIONAL SIGNATURE PAGE(S) FOLLOWS]

Page 2 of 3

IBM DOCKET NUMBER: YOR920150073USI

(5)	Legal Name of Inventor: Tarun Kumar	
	Signature:	Date:
(6)	Legal Name of Inventor: Abhishek Raman	
	Signature:	Date:

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(1)	Legal Nan	ne of Inventor:	Aanchal A	Aggarwal				
) V.	Signature:			*****************	***************************************	***************************************	Date:	
(2)	Legal Nan	ne of Inventor	: Harsh Ch	audhary				
	Signature:						Date:	
(3)	Legal Nan	ne of Inventor	: Yakup K	oc				
	5.						Date	
	Signature:						Date:	
(4)	Legal Nan	ne of Inventor	: Younghu	n Kim				
	Signature:						Date:	***************

[IF MORE INVENTORS, ADDITIONAL SIGNATURE PAGE(S) FOLLOWS]

Page 2 of 3

IBM DOCKET NUMBER: YOR920150073US1

(5) Legal Nar	me of Inven	ntor: Tarun Kı	imar		
Signature:				Date:	
(6) Legal Nar	me of Inven	tor: Abhishek	Raman		
Signature:		Haman.		Date: 0	3/17/2015

RECORDED: 06/06/2018