505940616 02/27/2020

PATENT ASSIGNMENT COVER SHEET

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SUBMISSION TYPE:		NEW ASSIGNMENT				
NATURE OF CONVEYANCE:		ASSIGNMENT				
CONVEYING PARTY D	ΑΤΑ					
		Name	Execution Date			
SACHIN J. AHIRE			02/10/2020			
MANOJ KALAMKAR			02/19/2020			
CHRISTOPHER J. RISE	BERG		02/20/2020			
RECEIVING PARTY DA	TA					
Name:	ΤΟΥΟΤΑ	TOYOTA MOTOR NORTH AMERICA, INC.				
Street Address:	6565 HEA	ADQUARTERS DRIVE W1-3C				
City:	PLANO					
State/Country:	TEXAS					
Postal Code:	75024					
PROPERTY NUMBERS Total: 1 Property Type		Number				
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Application Number:	16	803966				
CORRESPONDENCE	ΑΤΑ					
CORRESPONDENCE D		66)415-0983				
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PATENT REEL: 051957 FRAME: 0282

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

MINIMIZING TRAFFIC SIGNAL DELAYS WITH TRANSPORTS

As a below named and undersigned inventor, I hereby declare that:

This declaration is directed to the attached application, or (if following box is checked):

[X] United States application or PCT international application number 16/803,966 filed on <u>February 27, 2020</u>

The above-identified application was made or authorized to be made by me.

I believe 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 Docket Number provided above in the header of this document;

Whereas, TOYOTA MOTOR NORTH AMERICA, INC. (herein referred to as the "ASSIGNEE"), a corporation of California having a place of business at Plano, TX 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; TOYOTA MOTOR NORTH AMERICA, INC., 6565 Headquarters Drive W1-3C, Plano, TX 75024, United States.

Now, therefore, for good and valuable consideration, the receipt and sufficiency thereof being hereby acknowledged, I hereby sell 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 title to the Invention and all

> PATENT REEL: 051957 FRAME: 0283

related patents and applications, in the ASSIGNEE, its successors, legal representatives, and assigns, whenever requested by the ASSIGNEE, its successors, legal representatives, or assigns.

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 California, and any disputes will be resolved in a California state court or federal court sited in California.

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 Inven	tor: Sachin J. Ahire		
Signature:	Sami An	Date: <u>2]10/2</u> e	>2-0
2. Legal Name of Inven	tor: Manoj Kalamkar		
Signature:		Date:	
3. Legal Name of Invent	tor: Christopher J. Risberg		

Docket No. IP-A-4201

related patents and applications, in the ASSIGNEE, its successors, legal representatives, and assigns, whenever requested by the ASSIGNEE, its successors, legal representatives, or assigns.

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 California, and any disputes will be resolved in a California state court or federal court sited in California.

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1. Legal Na	nme of	Inventor: §	achin J.	Ahire						
Signature:			98 98 			49. 39. 38.	Date:	200 2003 20 		
2. Legal Na	ime of	Inventor: N	damuj K	alamkar						
Signature:	Ś	Kalyar	<u>8</u> 0				Date:	02/1	9/20	4
3. Legal Na		Inventor: (Christop	her J. Risl	verg					
Signature: "							Date:			.

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PATENT REEL: 051957 FRAME: 0285 related patents and applications, in the ASSIGNEE, its successors, legal representatives, and assigns, whenever requested by the ASSIGNEE, its successors, legal representatives, or assigns.

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 California, and any disputes will be resolved in a California state court or federal court sited in California.

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Signature:	Date:
2. Legal Name of Inventor: Manoj Kalamkar	
Signature:	Date:
3. Legal Name of Inventor: Christopher 1, Risberg	2124220
Signature: Killer	Date: <u>AMACO</u>

1. Legal Name of Inventor: Sachin J. Ahire