504662635 11/29/2017

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT4709357

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
MICHAEL ADEL AWAD ALLA	11/13/2017
CHERI LYN HANSEN	11/09/2017
JEFFREY YIZHOU HU	11/09/2017
JOSEPH F. STANEK	11/14/2017
DOUGLAS SCOTT RHODE	11/13/2017

RECEIVING PARTY DATA

Name:	FORD GLOBAL TECHNOLOGIES, LLC
Street Address:	330 TOWN CENTER DRIVE, SUITE 800
City:	DEARBORN
State/Country:	MICHIGAN
Postal Code:	48126

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	15826030

CORRESPONDENCE DATA

Fax Number:

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: 313-528-4882

Email: docket@b2iplaw.com

Correspondent Name: BEJIN BIENEMAN PLC FORD GLOBAL TECHNOLOG

Address Line 1: 300 RIVER PLACE

Address Line 2: SUITE 1650

Address Line 4: DETROIT, MICHIGAN 48207

ATTORNEY DOCKET NUMBER:	83905029(65080-2751)
NAME OF SUBMITTER:	BRYAN T. HART
SIGNATURE:	/BRYAN T. HART/
DATE SIGNED:	11/29/2017
	This document serves as an Oath/Declaration (37 CFR 1.63).

PATENT 504662635 REEL: 044251 FRAME: 0932

Total Attachments: 5

source=83905029 - Signed Combined Declaration and Assignment with filing info (65080-2751) - all 5 inventors#page1.tif

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Title of Invention

Attorney	Docket Number	1	83905029(65080-2751)

ASSIGNMENT AND DECLARATION (37 C.F.R. 1.63) FOR UTILITY, PROVISIONAL OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76)

AUTOMOTIVE CONTROL

The attached application, or United States application or PCT international application number 15/826,030 filed on 11/29/2017 (I hereby authorize the insertion of the application filing date and number into this form when they become known.)
The above-identified application was made or authorized to be made by me.
I hereby state that I have reviewed and understand the contents of the specification in the above-identified application, including the claims.
I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.
I am aware of the duty to disclose information which is material to patentability as defined in 37 C.F.R. 1.56, including for continuation-in-part applications, material information which became available between the filing date of the prior application and the national or PCT international filing date of the continuation-in-part application.
Pursuant to my employment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto FORD GLOBAL TECHNOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws of the State of Delaware, having its principal place of business at Dearborn, County of Wayne, and State of Michigan, hereinafter referred to as the ASSIGNEE, its successors, assigns or other legal representatives, the entire right, title and interest, domestic and foreign, in and to the inventions and discoveries in the above-identified invention including the right of the ASSIGNEE, its successors, assigns or other legal representatives to make applications and to receive Letters Patent for the inventions and discoveries in any and all countries, entities and intergovernmental organizations, in its or their own name or names, or in my name, at its or their election (and I hereby authorize the ASSIGNEE or ASSIGNEE's attorney to insert the serial/application number and filing date of the application to receive Letters Patent herein: Serial No. 15/826,030
And I hereby agree for myself, my heirs, successors, assigns or other legal representatives to execute any and all papers, including applications for Letters Patent of any and all kinds and in any and all countries, entities and intergovernmental organizations, and to perform any and all acts which the ASSIGNEE, its successors, assigns or other legal representatives may deem necessary to secure thereto the rights herein sold, assigned and set over.
And I hereby represent and warrant that I have not granted any rights inconsistent with the rights granted herein.
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.
LEGAL NAME OF INVENTOR Inventor: Michael Adel Awad Alla Date: Nov 13 / 20/7
A In I
Signature:
Note: An Application Data Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. Use an additional declaration form for each additional inventor.

Title of Invention

. 75	83905029(65080-2751)
Attorney Docket Number	[] & AU[] & [] U[A S[] & [] [] 7 / \$ []
Addition Donner Manage	[03703047(03000~47J17

ASSIGNMENT AND DECLARATION (37 C.F.R. 1.63) FOR UTILITY, PROVISIONAL OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76)

AUTOMOTIVE CONTROL

The above-identified application was made or authorized to be made by me. I hereby state that I have reviewed and understand the contents of the specification in the above-identified application, including the claims. I believe that I am the original inventor or an original joint inventor of a claimed invention in the application. I am aware of the duty to disclose information which is material to patentability as defined in 37 C.F.R. 1.56, including for continuation-in-part applications, material information which became available between the filling date of the prior application and the national or PCT international filling date of the continuation-in-part application. Pursuant to my employment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto EORD GLOB AL TECHNOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws of the State of Delaware, having its principal place of business at Dearborn, County of Wayne, and State of Michigan, hereinafter referred to as the ASSIGNEE, its successors, assigns or other legal representatives, the entire right, title and interest, domestic and foreign, in and to the inventions and discoveries in the above-identified invention including the right of the ASSIGNEE, its successors, assigns or other legal representatives make applications, in its or their own name or names, or in my name, at its or their election (and I hereby authorize the ASSIGNEE) restatorney to insert the serial/application, number and filling date of the application to receive Letters Patent herein: Serial No. 15/826,030 Filing Date 11/29/2017 ASSIGNEE, its successors, assigns or other legal representatives, all rights of priority, including any provisional applications, in and to the inventions and discoveries in any and all countries, entities and intergovernmental organizations including applications, in and to the inventions and discoveries in any and all countries, entities and intergovernmental organizations or Letters P	This declaration is directed to:
I hereby state that I have reviewed and understand the contents of the specification in the above-identified application, including the claims. I believe that I am the original inventor of an original joint inventor of a claimed invention in the application. I'am aware of the duty to disclose information which is material to patientability as defined in 37 C.F.R. 1.56, including for continuation-in-part applications, material information which became available between the filling date of the prior application and the national or PCT international filling date of the continuation-in-part application. Pursuant to my employment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto EORD GLOBAL TECHNOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws of the State of Delaware, having its principal place of business at Dearborn, County of Wann, and State of Michigan, hereinafter referred to as the ASSIONEE, its successors, assigns or other legal representatives, the entire right, title and interest, domestic and foreign, in and to the inventions and discoveries in the above-identified invention including the right of the ASSIONEE, its successors, assigns or other legal representatives to make applications and to receive Letters Patent for the inventions and discoveries in any and all countries, entities and intergovernmental organizations, in its or their own name or names, or in my name, at its or their election (and I hereby authorize the ASSIONEE or ASSIONEE is autories to insert the serial/application number and filing date of the application to receive Letters Patent herein: Serial No. 15/826,030 p. Filing Date 11/29/2017 p. and I hereby sell, assign and set over to the ASSIONEE, its successors, assigns or other legal representatives, all rights of priority, including any provisional applications and reissue applications. And I hereby agree for myself, my heirs, successors, assigns or other legal representatives to execute any and a	15/826,030 filed on 11/29/2017. (I hereby authorize the insertion of the application filing date and
I believe that I am the original inventor or an original joint inventor of a claimed invention in the application. I am aware of the duty to disclose information which is material to patentability as defined in 37 C.F.R. 1:56, including for continuation-in-part applications, material information which became available between the filing date of the prior application and the national or PCT international filing date of the continuation-in-part application. Pulsuant to my employment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto FORD GLOBAL TECHNOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws of the State of Delaware, having its principal place of business at Dearborn, County of Wayne, and State of Michigan, hereinafter referred to us the ASSIGNEE, its successors, assigns or other legal representatives, the entire right, title and interest, domestic and foreign, in and to the inventions and discoveries in the above-identified invention including the right of the ASSIGNEE, its successors, assigns or other legal representatives to make applications and to receive Letters Patent for the inventions and discoveries in any and all countries, entities and intergovernmental organizations, in its or their election (and I hereby authorize the ASSIGNEE or ASSIGNEE's attorney to insert the serial/application number and filing date of the application to receive Letters Patent herein: Serial No. 15/826,030	The above-identified application was made or authorized to be made by me.
I am aware of the duty to disclose information which is inaterial to patentability as defined in 37 C.F.R. 1.56, including for continuation-in-part applications, material information which became available between the filing date of the prior application and the national or PCT international filing date of the continuation-in-part application. Pursuant to my employment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto PORD GLOB AL TECHNOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws of the State of Delaware, having its principal place of business at Dearborn, County of Wayne, and State of Michigan, hereinafter referred to as the ASSIGNEE, its successors, assigns or other legal representatives, the entire right, title and interest, domestic and foreign, in and to the inventions and discoveries in the above-identified invention including the right of the ASSIGNEE; its successors, assigns or other legal representatives to make applications and to receive Letters Patent for the inventions and discoveries in any and all countries, entities and intergovernmental organizations, in its or their observable of the application to receive Letters Patent herein: Serial No. 15/826,030 Filing Date 11/29/2017 and hereby sell, assign and set over to the ASSIGNEE, its successors, assigns or other legal representatives, all hereby sell, assign and set over to the state of the inventions and discoveries in any and all countries, entities and intergovernmental organizations including all applications claiming benefit of the filing date hereof, continuations, continuations-in-part, divisionals, reexaminations and reissue applications. And I hereby agree for myself, my heirs, successors, assigns or other legal representatives to execute any and all papers, including applications for Letters Patent of any and all kinds and in any and all countries, entities and intergovernmental organizations, and to perform any and all acts which the ASSIGNEE, its	I hereby state that I have reviewed and understand the contents of the specification in the above-identified application, including the claims.
continuation-in-part applications, material information which became available between the filing date of the prior application and the national or PCT international filing date of the continuation-in-part application. Pursuant to my employment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto FORD GLOBAL TECHNOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws of the State of Delaware, having its principal place of business at Dearborn, County of Wayne, and State of Michigan, hereinafter referred to as the ASSIGNEE, its successors, assigns or other legal representatives, the entire right, title and interest, domestic and foreign, in and to the inventions and discoveries in, the above-identified invention including the right of the ASSIGNEE, its successors, assigns or other legal representatives to make applications and to receive Letters Patent for the inventions and discoveries in any and all countries, entities and intergovernmental organizations, in its or their election (and I hereby authorize the ASSIGNEE or ASSIGNEE's attorney to insert the serial/application number and filling date of the application to receive Letters Patent herein: Serial No. 15/826,030 Filing Date 11/29/2017 , and I hereby sell, assign and set over to the ASSIGNEE, its successors, assigns or other legal representatives, all rights of priority, including any provisional applications, in and to the inventions and discoveries in any and all countries, entities and intergovernmental organizations, in and to the inventions and discoveries in any and all countries, entities and intergovernmental organizations, and to perform any and all acts which the ASSIGNEE, its successors, assigns or other legal representatives to execute any and all papers, including applications for Letters Patent of any and all kinds and in any and all countries, entities and intergovernmental organizations, and to perform any and all acts which the ASSIGNEE, its successors, assigns o	I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.
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including applications for Letters Patent of any and all kinds and in any and all countries, entities and intergovernmental organizations, and to perform any and all acts which the ASSIGNEE, its successors, assigns or other legal representatives may deem necessary to secure thereto the rights herein sold, assigned and set over. And I hereby represent and warrant that I have not granted any rights inconsistent with the rights granted herein. 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. LEGAL NAME OF INVENTOR Inventor: Cheri Lyn Haisen Date: Signature: Date: Manual Countries, entities and intergovernmental organizations, and all countries, entities and intergovernmental organizations, assigns or other legal representatives may deem necessary to secure thereto the rights successors, assigns or other legal representatives may deem necessary to secure thereto the rights successors, assigns or other legal representatives may deem necessary to secure thereto the rights successors, assigns or other legal representatives may deem necessary to secure thereto the rights successors, assigns or other legal representatives may deem necessary to secure thereto the rights successors, assigns or other legal representatives may deem necessary to secure thereto the rights successors, assigns or other legal representatives may deem necessary to secure thereto the rights herein sold, assigned and set over.	ASSIGNEE, its successors, assigns or other legal representatives, all rights of priority, including any provisional applications, in and to the inventions and discoveries in any and all countries, entities and intergovernmental organizations including all applications claiming benefit of the filing date hereof, continuations, continuations-in-part, divisionals,
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. LEGAL NAME OF INVENTOR Inventor: Cheri Lyn Hansen Date: Signature: Date: An Application Data Sheet (PTO/SB/14 or equivalent); including naming the entire inventive entity; must accompany this form.	
or imprisonment of not more than five (5) years or both. LEGAL NAME OF INVENTOR Inventor: Cheri Lyn Hansen Date: Signature: Date: /// Note: An Application Data Sheet (PTO/SB/14 or equivalent); including naming the entire inventive entity; must accompany this form.	And I hereby represent and warrant that I have not granted any rights inconsistent with the rights granted herein.
Inventor: Cheri Lyn Hansen Date: Signature: Note: An Application Data Sheet (PTO/SB/14 or equivalent); including naming the entire inventive entity; must accompany this form.	
Signature: Note: An Application Data Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form.	*1 / ¬ / 1 /
	in a

Attorney Docket Number	83905029(65080-2751)
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ASSIGNMENT AND DECLARATION (37 C.F.R. 1.63) FOR UTILITY, PROVISIONAL OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76)

Title of Invention	AUTOMOTIVE CONTROL		
This declaration is directed to:			
X United	tached application, or I States application or PCT international application number 6,030 filed on 11/29/2017. (I hereby authorize the insertion of the application filing date and then they become known.)		
The above-identified app	olication was made or authorized to be made by me.		
I hereby state that I hav including the claims.	we reviewed and understand the contents of the specification in the above-identified application,		
I believe that I am the ori	iginal inventor or an original joint inventor of a claimed invention in the application.		
continuation-in-part appl	o disclose information which is material to patentability as defined in 37 C.F.R. 1.56, including for discations, material information which became available between the filing date of the prior nal or PCT international filing date of the continuation-in-part application.		
FORD GLOBAL TECHN of the State of Delaware hereinafter referred to as interest, domestic and for of the ASSIGNEE, its su for the inventions and disname or names, or in my insert the serial/applicat 15/826,030 ASSIGNEE, its success applications, in and to the including all application reexaminations and reissu	ment agreement heretofore made or by contractual obligation, I do sell, assign and set over unto NOLOGIES, LLC, a Ford Motor Company subsidiary, organized and existing by virtue of the laws e, having its principal place of business at Dearborn, County of Wayne, and State of Michigan, is the ASSIGNEE, its successors, assigns or other legal representatives, the entire right, title and reign, in and to the inventions and discoveries in the above-identified invention including the right accessors, assigns or other legal representatives to make applications and to receive Letters Patent scoveries in any and all countries, entities and intergovernmental organizations, in its or their own name, at its or their election (and I hereby authorize the ASSIGNEE or ASSIGNEE's attorney to tion number and filing date of the application to receive Letters Patent herein: Serial No, Filing Date		
including applications for organizations, and to per	or Letters Patent of any and all kinds and in any and all countries, entities and intergovernmental arrorm any and all acts which the ASSIGNEE, its successors, assigns or other legal representatives ecure thereto the rights herein sold, assigned and set over.		
And I hereby represent ar	nd warrant that I have not granted any rights inconsistent with the rights granted herein.		
or imprisonment of not m	at any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine more than five (5) years or both.		
LEGAL NAME OF INV	11 // 17		
Inventor: Jeffrey Yi Signature:	izhou Hu Date: 11-9-17		
	a Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form form for each additional inventor.		

Attorney Docket Number 83905029(65080-2751)

REEL: 044251 FRAME: 0937

ASSIGNMENT AND DECLARATION (37 C.F.R. 1.63) FOR UTILITY, PROVISIONAL OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76)

Title of Invention AUTOMOTIVE CONTROL
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The attached application, or United States application or PCT international application number 15/826,030 filed on 11/29/2017 (I hereby authorize the insertion of the application filing date and number into this form when they become known.)
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I hereby state that I have reviewed and understand the contents of the specification in the above-identified application, including the claims.
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reexaminations and reissue applications
And I hereby agree for myself, my heirs, successors, assigns or other legal representatives to execute any and all papers, including applications for Letters Patent of any and all kinds and in any and all countries, entities and intergovernmental organization*, and to perform any and all acts which the ASSIGNEE, its successors, assigns or other legal representatives may deem necessary to secure thereto the rights herein sold, assigned and set over.
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Note: An Application Data Sheet PTOVSB/14 or equivalent, including naming the entire mention of the substitution from the earth authorised receipts:

Attorney Docket Number	83905029(65080-2751)
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ASSIGNMENT AND DECLARATION (37 C.F.R. 1.63) FOR UTILITY, PROVISIONAL OR DESIGN APPLICATION USING AN APPLICATION DATA SHEET (37 C.F.R. 1.76)

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or imprisonment of not mo	re than five (5) years or both.
LEGAL NAME OF INVE	/ · / · · · / ·
Signature: Douglas Sellede	
Note: An Application Data S	Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form.

Note: An Application Data Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. Use an additional declaration form for each additional inventor.

RECORDED: 11/29/2017