11/02/2021 506954927

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT7001765

| SUBMISSION TYPE: | NEW ASSIGNMENT |
|-----------------------|----------------|
| NATURE OF CONVEYANCE: | ASSIGNMENT |

CONVEYING PARTY DATA

| Name | Execution Date |
|-------------------|----------------|
| OLIVER LEI | 09/07/2021 |
| CYNTHIA NEUBECKER | 09/08/2021 |
| ADIL SIDDIQUI | 09/07/2021 |
| ROBERT PARENTI | 09/07/2021 |
| ANDREA CHOWANIC | 09/16/2021 |

RECEIVING PARTY DATA

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

PROPERTY NUMBERS Total: 1

| Property Type | Number |
|---------------------|----------|
| Application Number: | 17515764 |

CORRESPONDENCE DATA

Fax Number: (404)853-8806

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.

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Address Line 4: ATLANTA, GEORGIA 30309

| ATTORNEY DOCKET NUMBER: | 84405049 (35136-2012) |
|-------------------------|-----------------------|
| NAME OF SUBMITTER: | JEREMY D. SPIER |
| SIGNATURE: | /Jeremy D. Spier/ |
| DATE SIGNED: | 11/02/2021 |

Total Attachments: 5

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| Attorney Docket Number | 84405049 |
|------------------------|----------|

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 | Systems And Methods For Providing Off-Track Drivability Guidance | |
|--|--|--|
| This declaration is directed | ed to: | |
| United | ached application, or States application or PCT international application number filed on (I hereby authorize the insertion of the application filing date and ten they become known.) | |
| The above-identified app | fication was made or authorized to be made by me. | |
| I hereby state that I hav including the claims. | e reviewed and understand the contents of the specification in the above-identified application, | |
| I believe that I am the ori | ginal 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. | | |
| 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 dis name or names, or in my insert the serial/applicat | nent 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 a having its principal place of business at Dearborn, County of Wayne, and State of Michigan, 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 accoveries 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 ion number and filing date of the application to receive Letters Patent herein: Serial No. | |
| 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 INV | | |
| Inventor: Oliver Lei | usigned by: | |
| Signature: | Ceuler | |
| | Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. In form for each additional inventor. | |

| Attorney Docket Number | 84405049 |
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| 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. 17/515,764 Filing Date November 1, 2021 , 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 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 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 th | nat any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine nore than five (5) years or both. | |
| LEGAL NAME OF INV | 9/0/2021 | |
| Inventor: Cynthia N Signature: Cynthia N | Venhecker Date: | |
| 7FD6/ | A64205DE44E | |
| * * | a Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. | |

| Attorney Docket Number | 84405049 |
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| 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. 17/515,764 , Filing Date November 1, 2021 , 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 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 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 INV | | |
| Inventor: Adil Siddi | Date: | |
| | Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. In form for each additional inventor. | |

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| 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. | | |
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| LEGAL NAME OF INV | 4///0// | |
| Inventor: Robert Pa | renti Date: 9///2021 Signed by: | |
| Signature. | M Paredi: | |
| Note: An Application Data | Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. In form for each additional inventor. | |

PATENT

REEL: 057991 FRAME: 0940

| Attorney Docket Number | 84405049 |
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| LEGAL NAME OF INV | 9/10/2021 | |
| Inventor: Andrea Cl | howanic Date: | |
| | A67537194DA | |
| Note: An Application Data | n Sheet (PTO/SB/14 or equivalent), including naming the entire inventive entity, must accompany this form. In form for each additional inventor. | |

PATENT
REGORDED: 11/02/2021 REEL: 057991 FRAME: 0941