504525197 08/29/2017

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT4571903

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

CONVEYING PARTY DATA

| Name | Execution Date |
|--------------|----------------|
| BICHOY BAHR | 07/13/2017 |
| ALI KIAEI | 08/15/2017 |
| BAHER HAROUN | 08/18/2017 |

RECEIVING PARTY DATA

| Name: | TEXAS INSTRUMENTS INCORPORATED |
|-------------------|--------------------------------|
| Street Address: | 12500 TI BOULEVARD |
| Internal Address: | M/S3999 |
| City: | DALLAS |
| State/Country: | TEXAS |
| Postal Code: | 75243 |

PROPERTY NUMBERS Total: 1

| Property Type | Number |
|---------------------|----------|
| Application Number: | 15690144 |

CORRESPONDENCE DATA

Fax Number: (214)567-2228

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: 214-479-1230 Email: uspto@ti.com

TEXAS INSTRUMENTS INCORPORATED **Correspondent Name:**

Address Line 1: P O BOX 655474, M/S 3999 Address Line 4: DALLAS, TEXAS 75265

| ATTORNEY DOCKET NUMBER: | TI-77919 |
|-------------------------|---------------------|
| NAME OF SUBMITTER: | STEPHEN L. LEVINE |
| SIGNATURE: | /stephen I. levine/ |
| DATE SIGNED: | 08/29/2017 |

Total Attachments: 6

source=TI77919 2017 07 13 Assignment Bahr#page1.tif source=TI77919 2017 07 13 Assignment Bahr#page2.tif source=TI77919_2017_08_15_Assignment_Kiaei#page1.tif

source=TI77919_2017_08_15_Assignment_Kiaei#page2.tif source=TI77919_2017_08_18_Assignment_Haroun#page1.tif source=TI77919_2017_08_18_Assignment_Haroun#page2.tif

ASSIGNMENT

WHEREAS, I, the undersigned inventor (or one of the undersigned joint inventors), of residence as listed, having invented certain new and useful improvements as below entitled, for which application for United States Letters Patent is made.

WHEREAS, TEXAS INSTRUMENTS INCORPORATED, a corporation organized and existing under the laws of the State of Delaware, with a place of business at 12500 TI Boulevard, M/S 3999, Dallas, Texas 75243, is desirous of acquiring my entire right, title and interest in and to the said invention, and to the said application and any Letters Patent that may issue thereon.

NOW, THEREFORE, for good and valuable consideration, the receipt of which is hereby acknowledged, I hereby sell and assign to the said TEXAS INSTRUMENTS INCORPORATED, its successors and assigns, my entire right, title and interest in and to the said invention and in to the said application and all patents which may be granted therefore, and all divisions, reissues, substitutions, continuations, and extensions thereof, and I hereby authorize and request the Commissioner of Patents and Trademarks to issue all patents for said invention, or patent resulting therefrom, insofar as my interest is concerned, to the said TEXAS INSTRUMENTS INCORPORATED, as assignee of my entire right, title and interest.

I also hereby self and assign to TEXAS INSTRUMENTS INCORPORATED, its successors and assigns, my foreign rights to the invention disclosed in said application, in all countries of the world, including the right to file applications and obtain patents under the terms of the Paris Convention for the Protection of Industrial Property, and further agree to execute any and all patent applications, assignments, affidavits, and any other papers in connection therewith necessary to perfect such patent rights.

I hereby further agree that I will communicate to said TEXAS INSTRUMENTS INCORPORATED, or to its successors, assigns, and legal representatives, any facts known to me respecting said invention, and at the expense of said assignee company, testify in any legal proceedings, sign all lawful papers, execute all divisional, continuation, reissue and substitute applications, make all lawful oaths, and generally do everything possible to aid said TEXAS INSTRUMENTS INCORPORATED, its successors, assigns and nominees to obtain and enforce proper patent protection for said invention in all countries.

IN WITNESS WHEREOF, I hereunto set hand and seal this day and year;

| TITLE OF INVENTION | Beating High-Q Resonators Oscillator |
|---|--------------------------------------|
| SIGNATURE OF INVENTOR AND NAME | Bichoy Bahr |
| DATE | 07/13/2017 |
| RESIDENCE (CITY AND STATE) | Richardson, TX |

| TITLE OF INVENTION | Beating High-Q Resonators Oscillator |
|---|--------------------------------------|
| SIGNATURE OF INVENTOR AND NAME | Baher Haroun |
| DATE | |
| RESIDENCE (CITY AND STATE) | Allen, Texas |
| SIGNATURE OF INVENTOR AND NAME | Ali Kiaei |
| DATE | |
| RESIDENCE (CITY AND STATE) | San Jose, CA |

After recording, return Assignment to:

Texas Instruments Incorporated PO Box 655474, M/S 3999 Dallas, TX 75265

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|---|--------------------------------------|
| SIGNATURE OF INVENTOR AND NAME | Baher Haroun |
| DATE | |
| RESIDENCE (CITY AND STATE) | Allen, Texas |
| SIGNATURE OF INVENTOR AND NAME | Ali Kiaei <u>A. Jene</u> |
| DATE | 8/15/17 |
| RESIDENCE (CITY AND STATE) | San Jose, CA |

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| DATE | |
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PATENT REEL: 043440 FRAME: 0783

RECORDED: 08/29/2017