

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
 Stylesheet Version v1.2

EPAS ID: PAT4419635

|                                                                                                                                                                                                 |                                                 |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------|
| <b>SUBMISSION TYPE:</b>                                                                                                                                                                         | NEW ASSIGNMENT                                  |
| <b>NATURE OF CONVEYANCE:</b>                                                                                                                                                                    | ASSIGNMENT                                      |
| <b>CONVEYING PARTY DATA</b>                                                                                                                                                                     |                                                 |
| <b>Name</b>                                                                                                                                                                                     | <b>Execution Date</b>                           |
| CHENG-YU CHEN                                                                                                                                                                                   | 05/17/2017                                      |
| CHIH-CHING CHIEN                                                                                                                                                                                | 05/17/2017                                      |
| YEN-CHUNG CHEN                                                                                                                                                                                  | 05/17/2017                                      |
| <b>RECEIVING PARTY DATA</b>                                                                                                                                                                     |                                                 |
| <b>Name:</b>                                                                                                                                                                                    | REALTEK SEMICONDUCTOR CORPORATION               |
| <b>Street Address:</b>                                                                                                                                                                          | NO. 2, INNOVATION ROAD II, HSINCHU SCIENCE PARK |
| <b>City:</b>                                                                                                                                                                                    | HSINCHU                                         |
| <b>State/Country:</b>                                                                                                                                                                           | TAIWAN                                          |
| <b>Postal Code:</b>                                                                                                                                                                             | 300                                             |
| <b>PROPERTY NUMBERS Total: 1</b>                                                                                                                                                                |                                                 |
| <b>Property Type</b>                                                                                                                                                                            | <b>Number</b>                                   |
| <b>Application Number:</b>                                                                                                                                                                      | 15598307                                        |
| <b>CORRESPONDENCE DATA</b>                                                                                                                                                                      |                                                 |
| <b>Fax Number:</b>                                                                                                                                                                              | (888)388-6582                                   |
| <i>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.</i> |                                                 |
| <b>Phone:</b>                                                                                                                                                                                   | 8883886609                                      |
| <b>Email:</b>                                                                                                                                                                                   | info@ckc-ip.com                                 |
| <b>Correspondent Name:</b>                                                                                                                                                                      | CKC & PARTNERS CO., LTD.                        |
| <b>Address Line 1:</b>                                                                                                                                                                          | ROOM 1901, 19/F, LEE GARDEN ONE,                |
| <b>Address Line 2:</b>                                                                                                                                                                          | 33 HYSAN AVENUE, CAUSEWAY BAY                   |
| <b>Address Line 4:</b>                                                                                                                                                                          | HONG KONG, HONG KONG                            |
| <b>ATTORNEY DOCKET NUMBER:</b>                                                                                                                                                                  | TWT05245/US                                     |
| <b>NAME OF SUBMITTER:</b>                                                                                                                                                                       | JAMES LYNN O'SULLIVAN                           |
| <b>SIGNATURE:</b>                                                                                                                                                                               | /James Lynn O'Sullivan/                         |
| <b>DATE SIGNED:</b>                                                                                                                                                                             | 05/18/2017                                      |
| <b>Total Attachments: 2</b>                                                                                                                                                                     |                                                 |
| source=TWT05245US-Assignment#page1.tif                                                                                                                                                          |                                                 |
| source=TWT05245US-Assignment#page2.tif                                                                                                                                                          |                                                 |

**ASSIGNMENT**

This assignment agreement is applicable to an invention entitled (Invention Title)\_\_\_\_\_

**SYSTEM AND METHOD FOR DIRECT DISK ACCESSING**

The PATENT RIGHTS referred to in this agreement are:

- (check one) ☒ a patent application for this invention, executed by the ASSIGNOR(S) concurrently with this assignment.
- ☐ U.S. patent application Serial No.\_\_\_\_\_, filed \_\_\_\_\_
- ☐ a U.S. patent application based on PCT International Application No.\_\_\_\_\_ filed on (date)\_\_\_\_\_(U.S. patent application Serial No.\_\_\_\_\_, if known).
- ☐ U.S. patent No.\_\_\_\_\_, issued\_\_\_\_\_.

The PATENT RIGHTS also include all divisions, reissues, continuations and extensions of the patents and patent applications identified above.

The PATENT RIGHTS assigned under this agreement are:

- (check one) ☒ U.S. patent rights only.
- ☐ Worldwide patent rights. In this case, the assignee shall have the right to claim the benefit of the filing date of any U.S. or foreign patent application for this invention.

The ASSIGNOR(S) referred to in this agreement is (or are) the inventor(s) whose signatures appear on page 2 of this Assignment and any Supplemental Sheet(s).

The ASSIGNEE referred to in this agreement is:

(Name of Assignee) Realtek Semiconductor Corporation

(Address) No. 2, Innovation Road II, Hsinchu Science Park, Hsinchu 300, Taiwan, R.O.C.

The ASSIGNEE is:

- (check one) ☐ An individual.
- ☐ A Partnership.
- ☒ A Corporation of TAIWAN, R.O.C. (specify state or country)
- ☐ (other)\_\_\_\_\_

The ASSIGNOR(S), in consideration of \$10.00 paid by the ASSIGNEE, and other good and valuable consideration, receipt of which is acknowledged, hereby assign(s) the following rights to the ASSIGNEE, its successors and assigns:

the full and exclusive right to the invention;

the entire right, title and interest in and to the PATENT RIGHTS;

the right to sue and recover for any past infringement; and

the right to claim priority under 35 USC 119, 35 USC 120, or any other applicable provisions, based on any earlier patent applications for this invention.

THIS IS PAGE 2 OF AN ASSIGNMENT FROM THE INVENTOR(S) TO  
 ASSIGNEE: Realtek Semiconductor Corporation  
 INVENTION TITLE:

SYSTEM AND METHOD FOR DIRECT DISK ACCESSING

As to all U.S. patent applications assigned under this agreement, the ASSIGNOR(S) hereby authorize(s) and request(s) the Commissioner of Patents and Trademark to issue all Letters Patent to the ASSIGNEE as the assignee of the entire right, title and interest, for the sole use and enjoyment of said ASSIGNEE, its successors and assigns.

Further, the ASSIGNOR(S) agree(s) to communicate to said ASSIGNEE, or its representatives, any fact known to the ASSIGNOR(S) with respect to said invention, and testify in any legal proceeding, sign all lawful papers, execute all divisional, continuation, substitute, renewal, reexamination and reissue applications, execute all necessary assignment papers to cause and all Letter Patent to be issued to said ASSIGNEE, make all rightful oaths and generally do everything necessary or desirable to aid said ASSIGNEE, its successors and assigns, to obtain and enforce proper protection for said invention.

The ASSIGNOR(S) authorize(s) the attorneys and agents who have the power of attorney in this application to check any appropriate boxes and to insert the Serial Number and filing date in this document after it has been executed.

Cheng-Yu CHEN

Name of sole or first inventor

Cheng-Yu Chen  
 Signature

2017/05/17

Date

Chih-Ching CHIEN

Name of second inventor, if any

Chih-Ching Chien  
 Signature

2017/05/17

Date

Yen-Chung CHEN

Name of third inventor, if any

Yen-Chung Chen  
 Signature

2017/05/17

Date