504274342 03/16/2017

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT4321024

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

CONVEYING PARTY DATA

| Name | Execution Date | |
|---------------|----------------|--|
| MATTHEW HAYES | 12/16/2016 | |

RECEIVING PARTY DATA

| Name: | INTEL IP CORPORATION | |
|-----------------|---------------------------|--|
| Street Address: | 2200 MISSION COLLEGE BLVD | |
| City: | SANTA CLARA | |
| State/Country: | CALIFORNIA | |
| Postal Code: | 95054 | |

PROPERTY NUMBERS Total: 1

| Property Type | Number |
|---------------------|----------|
| Application Number: | 15385879 |

CORRESPONDENCE DATA

Fax Number: (617)849-5451

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.

Email: intel@vjp.de

Correspondent Name: VIERING, JENTSCHURA & PARTNER MBB

Address Line 1: C/O 3770 HIGHLAND AVE.

Address Line 2: SUITE 203

Address Line 4: MANHATTAN BEACH, CALIFORNIA 90266

| ATTORNEY DOCKET NUMBER: | P65371US |
|-------------------------|---------------------------------|
| NAME OF SUBMITTER: | KARL J. KOLBINGER |
| SIGNATURE: | /Karl J. Kolbinger, REG.#41124/ |
| DATE SIGNED: | 03/16/2017 |

Total Attachments: 2

source=P65371US_Assignment#page1.tif source=P65371US_Assignment#page2.tif

> **PATENT** REEL: 042021 FRAME: 0977 504274342

Attorney Docket No.: P65371US

ASSIGNMENT

In consideration of good and valuable consideration, the receipt of which is hereby acknowledged, we, the undersigned inventor(s):

Matthew HAYES

hereby sell, assign, and transfer to:

Intel IP Corporation

a corporation of Delaware, having a principal place of business at 2200 Mission College Boulevard. Santa Clara, California, 95054 USA ("Assignee"), and its successors, assigns, and legal representatives, the entire right, title, and interest for the United States and all other countries, in and to any and all inventions and improvements that are disclosed in the application for the patent entitled:

LEVERAGING SECONDARY SYNCHRONIZATION SIGNAL PROPERTIES TO IMPROVE SYNCHRONIZATION SIGNAL DETECTION

| (I hereby authorize | and request any | attorney having a | ppropriate authority | r from the assignee to it | asert on the |
|---------------------|---------------------|-------------------|----------------------|---------------------------|--------------|
| designated lines be | low, the filing dat | e and application | number of said appl | ication when known.) | |
| | | | | | |
| Alteria de | 10 C | | | | |

| which was filed on | | |
|---------------------------------|--------------------|--------|
| COUNTRY or International Office | Application Number | εd |

which has been executed by the undersigned prior hereto or concurrently herewith on the date(s) indicated below,

and in and to said application and all Additional Applications, and all other patent applications that have been or shall be filed in the United States and all other countries and international filing offices on any of said inventions and improvements; and in and to all original and reissued patents that have been or shall be issued in the United States and all other countries and international filing offices on said inventions and improvements; and in and to all rights of priority resulting from the filing of said applications; as used herein "Additional Applications" includes but is not limited to design, utility, utility model, divisional, continuing, continuation-in-part, substitute, renewal, reissue, and national phase applications on said inventions and improvements;

and agree that said Assignee may apply for and receive a patent or patents for said inventions and improvements in its own name; and that, when requested, without charge to, but at the expense of, said Assignee, its successors, assigns, and legal representatives, to carry out in good faith the intent and purpose of this Assignment, the undersigned will execute all Additional Applications, and all other patent applications on any and all said inventions and improvements; execute all rightful naths, assignments, powers of attorney, and other papers; communicate to said Assignee, its successors, assigns, and legal representatives all facts known to the undersigned relating to said inventions and improvements and the history thereof; and generally assist said Assignee, its successors, assigns, or legal representatives in securing and

Page 1 of 2

Attorney Docket No.: P65371US

maintaining proper patent protection for said inventions and improvements and for vesting title to said inventions and improvements, and all applications for patents and all patents on said improvements, in said Assignee, its successors, assigns, and legal representatives; and covenant with said Assignce, its successors, assigns, and legal representatives that an assignment, grant, mortgage, license, or other agreement affecting the rights and property herein conveyed has been made to others by the undersigned, and that full right to convey the same as herein expressed is possessed by the undersigned.

Matthew HAYES Date signed

Page 2 of 2