

## PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1  
Stylesheet Version v1.2

Assignment ID: PATI835944

<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>SEQUENCE:</b>	1
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
Lenovo (Singapore) Pte Ltd.	04/01/2022
<b>RECEIVING PARTY DATA</b>	
<b>Company Name:</b>	Lenovo PC International Limited
<b>Street Address:</b>	23/F, Lincoln House
<b>Internal Address:</b>	979 King's Road
<b>City:</b>	Quarry Bay
<b>State/Country:</b>	HONG KONG
<b>PROPERTY NUMBERS Total: 65</b>	
<b>Property Type</b>	<b>Number</b>
Patent Number:	11215519
Patent Number:	11216043
Patent Number:	11216053
Patent Number:	11216065
Patent Number:	11216093
Patent Number:	11216473
Patent Number:	11217220
Patent Number:	11218377
Patent Number:	11218856
Patent Number:	11221653
Patent Number:	11221689
Patent Number:	11221749
Patent Number:	11222515
Patent Number:	11224131
Patent Number:	11226686
Patent Number:	11226715
Patent Number:	11227577
Patent Number:	11231753
Patent Number:	11231833

Property Type	Number
Patent Number:	11233651
Patent Number:	11233923
Patent Number:	11234123
Patent Number:	11234510
Patent Number:	11237466
Patent Number:	11237641
Patent Number:	11237710
Patent Number:	11238177
Patent Number:	11238863
Patent Number:	11238865
Patent Number:	11240057
Patent Number:	11243965
Patent Number:	11245541
Patent Number:	11245957
Patent Number:	11249516
Patent Number:	11249661
Patent Number:	11250144
Patent Number:	11250227
Patent Number:	11250861
Patent Number:	11256301
Patent Number:	11256302
Patent Number:	11256410
Patent Number:	11256526
Patent Number:	11258417
Patent Number:	11262806
Patent Number:	11263301
Patent Number:	11265509
Patent Number:	11266040
Patent Number:	11269382
Patent Number:	11269388
Patent Number:	11269430
Patent Number:	11269667
Patent Number:	11269893
Patent Number:	11270115
Patent Number:	11272160
Patent Number:	11275410
Patent Number:	11275825
Patent Number:	11277402

Property Type	Number
Patent Number:	11281265
Patent Number:	11281421
Patent Number:	11281859
Patent Number:	11282528
Patent Number:	11287854
Patent Number:	11287856
Patent Number:	11288030
Patent Number:	11270571

#### CORRESPONDENCE DATA

**Fax Number:** 4127419292

*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:** 4127418400

**Email:** assignments@ferencelaw.com

**Correspondent Name:** Stanley D. Ference III

**Address Line 1:** Ference & Associates LLC

**Address Line 2:** 409 Broad Street

**Address Line 4:** Pittsburgh, PENNSYLVANIA 15143

**ATTORNEY DOCKET NUMBER:** LAP #2

**NAME OF SUBMITTER:** Jennifer Farone

**SIGNATURE:** /Jennifer Farone/

**DATE SIGNED:** 02/19/2025

#### Total Attachments: 8

source=FY21Q4#page1.tiff

source=FY21Q4#page2.tiff

source=FY21Q4#page3.tiff

source=FY21Q4#page4.tiff

source=FY21Q4#page5.tiff

source=FY21Q4#page6.tiff

source=FY21Q4#page7.tiff

source=FY21Q4#page8.tiff

## ASSIGNMENT OF PATENT RIGHTS

WHEREAS, Lenovo (Singapore) Pte Ltd. a limited liability company organized under the laws of the Republic of Singapore, with its principal place of business at 151 Lorong Chuan, #02-01 New Tech Park, Singapore, 55674 (ASSIGNOR) is the owner of certain rights, title and interest in and to the patents, patent applications and invention disclosures set forth in *Exhibit A* hereto;

WHEREAS, it is the intention of ASSIGNOR and Lenovo PC International Limited, a limited liability company organized under the laws of Hong Kong having its principal place of business at 23/F, Lincoln House, 979 King's Road, Quarry Bay, Hong Kong (hereinafter ASSIGNEE), that ASSIGNEE own all of ASSIGNOR'S right, title and interest in and to the patents, patent applications and invention disclosures; and

WHEREAS, ASSIGNOR and ASSIGNEE entered into an Intellectual Property Sale and Transfer Agreement effective April 1, 2013 and a Periodic Intellectual Property Sale and Transfer Agreement effective April 1, 2013 (collectively the "AGREEMENTS") in which ASSIGNOR assigned intellectual property rights to ASSIGNEE and agreed to periodically assign additional intellectual property rights to ASSIGNEE.

NOW, THEREFORE, in consideration of the mutual promises contained in the AGREEMENTS and other good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, pursuant to this Assignment of Patent Rights, and subject to the AGREEMENTS, ASSIGNOR hereby sells, assigns, transfers, and conveys to ASSIGNEE, its permitted successors and assigns, all of ASSIGNOR'S right, title, and interest in and to the patents, patent applications, and invention disclosures being made for Letters Patent set forth on *Exhibit A*, and (a) all foreign and U.S. counterpart patents and patent applications claiming priority from the patents and the applications Letters Patents listed in *Exhibit A*, and (b) all continuations, continuations-in-part, divisionals, reissues, renewals, reexaminations, substitutions, and extensions thereof (including equivalents to any of the foregoing in non-U.S. jurisdictions) that may be granted or issue from and claim priority to the foregoing (hereinafter collectively referred to as the "Sold Patents"), and including the right to own and prosecute in ASSIGNEE's own name any reexaminations, reissues, interferences, and all claims and causes of action now in existence or arising in the future resulting from past, present, and future infringement of any of the Sold Patents, including, without limitation, the right to sue and recover for past, present, and future infringement of any of the Sold Patents. ASSIGNOR authorizes and requests the Director of Patents and Trademarks of the United States of America and the empowered officials of all other governments to issue or transfer all said Letters Patents to ASSIGNEE, as ASSIGNEE of the entire right, title, and interest therein or otherwise as ASSIGNEE may direct.

IN TESTIMONY WHEREOF, ASSIGNOR and ASSIGNEE have hereunto executed this Assignment effective April 1, 2022, by their duly authorized representatives.

Lenovo (Singapore) Pte Ltd.

By: 

Name: Chen Lei  
Title: Director  
Place: Singapore

Lenovo PC International Ltd.

By: 

Name: Wong Wai Ming  
Title: Director  
Place: Raleigh

**EXHIBIT A**

<b>Case Reference</b>	<b>Country</b>	<b>Grant Date</b>	<b>Grant Number</b>	<b>Internal Title</b>
RPS920200036TEST-US-NP	United States	1/1/2022	123123123	Method for adaptive phone determination
RPS920190096-US-NP	United States	2/1/2022	11,238,863	Query Disambiguation using environmental Audio
RPS920190099-US-NP	United States	1/18/2022	11,226,715	Element Display Using Universal size Designation
RPS920180092-US-NP	United States	2/15/2022	11,250,144	APPARATUS, METHOD, AND PROGRAM PRODUCT FOR OPERATING A DISPLAY IN PRIVACY MODE
RPS920190036-US-NP	United States	2/15/2022	11,250,861	Audio Input Filtering Based on User Verification
RPS920200130-US-NP	United States	3/22/2022	11,281,421	Enhancing Multiple Monitor Arrangements.
RPS920190095-US-NP	United States	1/4/2022	11,216,473	Qualitative Modifier in Query
RPS920180120-US-NP	United States	3/1/2022	11263301	User Authentication Using Variant Illumination
RPS920190023-US-NP	United States	3/15/2022	11,275,825	UPDATING A PASSWORD FOR A CREDENTIAL
RPS920200021-US-NP	United States	3/1/2022	11,265,509	Computing System
RPS920190211-US-NP	United States	1/4/2022	11,215,519	DEVICE COMPONENT SWELLING DETECTION
RPS920200041-US-NP	United States	3/8/2022	11269667	Techniques to Switch between Different types of Virtual Assistance based on threshold being met.
RPS920170070-US-NP	United States	3/22/2022	11,282,528	DIGITAL ASSISTANT ACTIVATION BASED ON WAKE WORD ASSOCIATION

Case Reference	Country	Grant Date	Grant Number	Internal Title
RPS920170036-US-NP	United States	3/8/2022	11,272,160	TRACKING A POINT OF INTEREST IN A PANORAMIC VIDEO
RPS920160032-US-NP	United States	1/11/2022	11,221,749	ELECTRONIC DEVICE WITH TOUCHPAD DISPLAY
RPS920160011-US-NP	United States	2/15/2022	11,249,516	MULTIPLE DISPLAY DEVICE WITH ROTATING DISPLAY
RPS920150226-US-NP	United States	2/22/2022	11,256,302	MAGNETIC HINGE ASSEMBLIES
RPS920140169-US-NP	United States	2/1/2022	11,237,710	MULTI-FUNCTION SLIDE CONTROL
RPS920140115-US-NP	United States	1/11/2022	11,221,689	VOICE MODIFIED DRAWING
RPS920190193-US-NP	United States	1/25/2022	11,234,123	Obscuring Application Windows based on User Security Permissions
RPS920180038-US-NP	United States	1/11/2022	11,222,515	Device Tamper Detection
RPS920200044-US-NP	United States	1/4/2022	11,216,043	System Hinge Assembly
RPS920200038-US-NP	United States	2/15/2022	11,250,227	Description of Quick response or other code to present contact on display.
RPS920180001-US-NP	United States	2/1/2022	11,240,057	ALTERNATIVE OUTPUT RESPONSE BASED ON CONTEXT
RPS920170104-US-NP	United States	2/8/2022	11,243,965	METHOD AND APPARATUS TO CORRELATE MOBILE DEVICE WIRELESS ACTIVITY AND SECURITY DATA
RPS920180025-US-NP	United States	1/11/2022	11,224,131	SYSTEMS AND METHODS FOR SURFACE MOUNTING CABLE CONNECTIONS
RPS920200078-US-NP	United States	1/4/2022	11,217,220	Controlling Devices to Mask Sound in Areas proximate in the devices.

Case Reference	Country	Grant Date	Grant Number	Internal Title
RPS920190180-US-NP	United States	3/8/2022	11,269,430	STYLUS INK PARAMETER SETTING
RPS920130057-US-NP	United States	3/29/2022	11,288,030	USING INFORMATION HANDLING DEVICE FOOTPRINT FOR TRANSFER
RPS920130186-US-NP	United States	2/22/2022	11,256,410	AUTOMATIC LAUNCH AND DATA FILL OF APPLICATION
RPS920130222-US-NP	United States	1/18/2022	11,226,686	Confidence level of gesture recognition == Interactive User Gesture Inputs.
RPS920190061-US-NP	United States	3/15/2022	11,277,402	Two Factor Authentication using a Digital One-time pad
RPS920190157-US-NP	United States	3/8/2022	11270115	Presentation of Augmented Reality Content Based on Identification of Trigger Accompanying Video Content.
RPS920190147-US-NP	United States	2/1/2022	11,237,466	Controlling Projection Based on Viewing Context
RPS920190042-US-NP	United States	1/25/2022	11,233,651	Password Protection Using chain of random hashing functions.
RPS920190084-US-NP	United States	1/4/2022	11,218,377	Prediction of loss of Network Connection and Caching of Content.
RPS920190089-US-NP	United States	1/4/2022	11,218,856	Data Sharing with Multiple Bluetooth devices
RPS920190140-US-NP	United States	2/1/2022	11,238,865	Function Performance Based on Input Intonation
RPS920190080-US-NP	United States	2/1/2022	11,238,177	Multiuser Information Exchange Management
RPS920190125-US-NP	United States	3/22/2022	11,281,859	DETERMINING STRUCTURE FROM A LANGUAGE BLOCK
RPS920190077-US-NP	United States	1/4/2022	11,216,065	Input Control Display Based on eye Gaze
RPS920190110-US-NP	United	2/22/2022	11,256,526	Contextual Item Management

Case Reference	Country	Grant Date	Grant Number	Internal Title
	States			
RPS920180043-US-NP	United States	1/25/2022	11,233,923	Display-Covered Camera
RPS920200031-US-NP	United States	1/18/2022	11,227,577	Noise Cancellation Using Dynamic Latency Value
RPS920200032-US-NP	United States	2/8/2022	11,245,541	Required Meeting Participant Identification.
RPS920200015-US-NP	United States	2/1/2022	11,237,641	Palm based Object Position Adjustment.
RPS920190038-US-NP	United States	2/1/2022	11,234,510	Device and Stand Assembly
RPS920190037-US-NP	United States	2/8/2022	11,245,957	User Profile Sharing
RPS920180113-US-NP	United States	3/8/2022	11269893	Query-Answering Source for a User Query
RPS920190111-US-NP	United States	1/25/2022	11,231,833	Prioritizing Information when app display size is reduced.
RPS920190108-US-NP	United States	2/22/2022	11,258,417	Techniques for Using Computer Vision to alter Operation of Speaker(s) and/ or Microphone(s) of device
RPS920210004-US-NP	United States	3/8/2022	US11270571	Sanitary Enforcement Action for Device.
JP920190007-US-NP	United States	3/1/2022	11,266,040	Heat Transport Device
JP920190038-US-NP	United States	3/29/2022	11,287,854	Portable Information Apparatus.
JP920190023-US-NP	United States	1/11/2022	11,221,653	Apparatus and Method for Determining Positional State based on magnetic Flux
JP920180101-US-NP	United States	3/29/2022	11,287,856	HPD Power optimization



Case Reference	Country	Grant Date	Grant Number	Internal Title
JP920190043-US-NP	United States	1/4/2022	11,216,093	Systems, Apparatus and method for Detecting Computing Device Inputs by a pointing body.
JP920190029-US-NP	United States	1/25/2022	11,231,753	Electronic Apparatus having an Antenna Device.
JP920190037-US-NP	United States	3/8/2022	11269382	Electronic Apparatus
JP920190052-US-NP	United States	2/15/2022	11,249,661	The method to revcover UEFI FW settings
JP920190078-US-NP	United States	1/4/2022	11,216,053	Graceful Standby by utilizing EC
JP920190109-US-NP	United States	2/22/2022	11,256,301	Modern Standby Mode Management Solution
JP920200078-US-NP	United States	3/1/2022	11,262,806	Fixing method LCD to the dome-shaped A-cover
JP920190110-US-NP	United States	3/8/2022	11269388	KBD intake with waterproof structure
JP920200060-US-NP	United States	3/15/2022	11,275,410	The new structure to avoid the friction noise caused by the kickstand assembled to the system with diagonal angle
JP920190065-US-NP	United States	3/22/2022	11,281,265	M.2 module fix method on FPC for thin and light system
RPS920170091-CN-NP	China	1/4/2022	109300449	Improved screen color calibration using an internal screen target
RPS920140079-DE-NP	Germany	2/24/2022	102015109590	Auto failover method to enable spelling of unknown words
JP920160024-CN-NP	China	1/4/2022	ZL20171034731 2.3	A method of Human Presence Detection
JP920140075-CN-NP	China	1/14/2022	2015107070974	Active Pen, movable contact structure
JP920180122-CN-NP	China	3/1/2022	201911308171.	Floating Structure

Case Reference	Country	Grant Date	Grant Number	Internal Title
			X	
JP920180001-GB-NP	Great Britain	2/23/2022	2573366	Thermal Control method of battery charge
JP920210024-JP-RD	Japan	2/4/2022	1707419	Light Guide for virtual TrackPoint buttons
JP920210006-JP-NP	Japan	3/7/2022	7036975	CV-HPD dynamic range and detection method control
JP920200052-JP-NP	Japan	2/28/2022	7032497	Power reduction by turning off VBUS in ModS state
JP920200042-JP-NP	Japan	1/4/2022	7002618	Vital Signs - A method to reduce CPU utilization
JP920200002-JP-NP	Japan	1/12/2022	7008104	Dynamic mode control
JP920200107-JP-NP	Japan	3/24/2022	7046247	Flip folio KBD for foldable device
JP920200114-JP-NP	Japan	3/24/2022	7046244	Step control structure for foldable hinge
JP920200112-JP-NP	Japan	1/17/2022	7011094	Hinge Structure for stand FF
JP920200024-JP-NP	Japan	2/8/2022	7022176	Microphone holder for Air tightness
JP920200068-JP-NP	Japan	3/1/2022	7033181	Automatic Recording System for online meetings
JP920200092-JP-NP	Japan	3/24/2022	7046238	Multiple resonator
JP920190091-JP-NP	Japan	2/21/2022	7032371	Dynamic FoV
JP920200071-JP-NP	Japan	1/13/2022	7008784	System design for narrow bezel Yoga convertible PC
JP920200069-JP-NP	Japan	2/9/2022	7022812	OLED PCB cooling design
JP920200091-JP-NP	Japan	3/23/2022	7045496	Loop heat pipe in MWS
JP920200006-JP-NP	Japan	1/20/2022	7012776	Pressure free thermal module for high power PoP SoC
JP920200004-JP-NP2	Japan	2/18/2022	7027488	FCC learning method at higher capacity condition

Case Reference	Country	Grant Date	Grant Number	Internal Title
JP920200057-JP-NP	Japan	1/12/2022	7008120	Configuration and algorithm to solve the problems in network storage about confidentiality and redundancy
JP920200048-JP-NP	Japan	1/18/2022	7011697	auto backup data by validation with dual digital signature
JP920200047-JP-NP	Japan	1/27/2022	7016399	Secured Patchable Parameters
JP920200043-JP-NP	Japan	1/18/2022	7011696	Supervised learning for CPU slow performance detection