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APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
16/555,487	08/29/2019	Robert Dean King	273252-US-13

CONFIRMATION NO. 4785

131278

Meagher Emanuel Laks Goldberg & Liao, LLP
One Palmer Square
Suite 325
Princeton, NJ 08542

POWER OF ATTORNEY NOTICE



OC000000087704580

Date Mailed: 04/25/2025

NOTICE REGARDING CHANGE OF POWER OF ATTORNEY

This is in response to the Power of Attorney filed 04/22/2025.

- The Power of Attorney to you in this application has been revoked by the applicant. Future correspondence will be mailed to the new address of record(37 CFR 1.33).

Questions about the contents of this notice and the requirements it sets forth should be directed to the Office of Data Management, Application Assistance Unit, at (571) 272-4000 or (571) 272-4200 or 1-888-786-0101.

/s/torres/



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APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
16/555,487	08/29/2019	Robert Dean King	273252-US-13

CONFIRMATION NO. 4785

POA ACCEPTANCE LETTER



OC000000087704626

27571
Ascenda Law Group, PC
2150 N First Street
Suite 420
San Jose, CA 95131

Date Mailed: 04/25/2025

NOTICE OF ACCEPTANCE OF POWER OF ATTORNEY

This is in response to the Power of Attorney filed 04/22/2025.

The Power of Attorney in this application is accepted. Correspondence in this application will be mailed to the above address as provided by 37 CFR 1.33.

Questions about the contents of this notice and the requirements it sets forth should be directed to the Office of Data Management, Application Assistance Unit, at (571) 272-4000 or (571) 272-4200 or 1-888-786-0101.

/s/torres/

STATEMENT UNDER 37 CFR 3.73(c)Applicant/Patent Owner: EDISON INNOVATIONS, LLCApplication No./Patent No.: 10,549,648 Filed/Issue Date: 02/04/2020Titled: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME
EDISON INNOVATIONS, LLC, a company

(Name of Assignee)

(Type of Assignee, e.g., corporation, partnership, university, government agency, etc.)

states that, for the patent application/patent identified above, it is (choose **one** of options 1, 2, 3 or 4 below):

1. ☒ The assignee of the entire right, title, and interest.
2. ☐ An assignee of less than the entire right, title, and interest (check applicable box):
- ☐ The extent (by percentage) of its ownership interest is _____%. Additional Statement(s) by the owners holding the balance of the interest must be submitted to account for 100% of the ownership interest.
- ☐ There are unspecified percentages of ownership. The other parties, including inventors, who together own the entire right, title and interest are:

Additional Statement(s) by the owner(s) holding the balance of the interest must be submitted to account for the entire right, title, and interest.

3. ☐ The assignee of an undivided interest in the entirety (a complete assignment from one of the joint inventors was made). The other parties, including inventors, who together own the entire right, title, and interest are:

Additional Statement(s) by the owner(s) holding the balance of the interest must be submitted to account for the entire right, title, and interest.

4. ☐ The recipient, via a court proceeding or the like (e.g., bankruptcy, probate), of an undivided interest in the entirety (a complete transfer of ownership interest was made). The certified document(s) showing the transfer is attached.

The interest identified in option 1, 2 or 3 above (not option 4) is evidenced by either (choose **one** of options A or B below):

- A. ☐ An assignment from the inventor(s) of the patent application/patent identified above. The assignment was recorded in the United States Patent and Trademark Office at Reel _____, Frame _____, or for which a copy thereof is attached.
- B. ☒ A chain of title from the inventor(s), of the patent application/patent identified above, to the current assignee as follows:

1. From: KING, ROBERT DEAN; et al. To: GENERAL ELECTRIC COMPANY

The document was recorded in the United States Patent and Trademark Office at

Reel 050337, Frame 0913, or for which a copy thereof is attached.2. From: GENERAL ELECTRIC COMPANY To: GE INTELLECTUAL PROPERTY LICENSING, LLC

The document was recorded in the United States Patent and Trademark Office at

Reel 070636, Frame 0815, or for which a copy thereof is attached.

[Page 1 of 2]

This collection of information is required by 37CFR 3.73(b). The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35U.S.C. 122 and 37 CFR 1.11 and 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450**

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.

Petitioner EX1002

Toyota v. Bunker Hill IPR2026-00250

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STATEMENT UNDER 37 CFR 3.73(c)3. From: GE INTELLECTUAL PROPERTY LICENSING, LLC To: DOLBY INTELLECTUAL PROPERTY LICENSING, LLC

The document was recorded in the United States Patent and Trademark Office at
 Reel 070643, Frame 0907, or for which a copy thereof is attached.

4. From: DOLBY INTELLECTUAL PROPERTY LICENSING, LLC To: EDISON INNOVATIONS, LLC

The document was recorded in the United States Patent and Trademark Office at
 Reel 070293, Frame 0273, or for which a copy thereof is attached.

5. From: _____ To: _____

The document was recorded in the United States Patent and Trademark Office at
 Reel _____, Frame _____, or for which a copy thereof is attached.

6. From: _____ To: _____

The document was recorded in the United States Patent and Trademark Office at
 Reel _____, Frame _____, or for which a copy thereof is attached.

☐ Additional documents in the chain of title are listed on a supplemental sheet(s).

☒ As required by 37 CFR 3.73(c)(1)(i), the documentary evidence of the chain of title from the original owner to the assignee was, or concurrently is being, submitted for recordation pursuant to 37 CFR 3.11.

[NOTE: A separate copy (i.e., a true copy of the original assignment document(s)) must be submitted to Assignment Division in accordance with 37 CFR Part 3, to record the assignment in the records of the USPTO. See MPEP 302.08]

The undersigned (whose title is supplied below) is authorized to act on behalf of the assignee.

/Tarek N. Fahmi/

Signature

Tarek N. Fahmi

Printed or Typed Name

2025-04-22

Date

41402

Title or Registration Number

[Page 2 of 2]

Privacy Act Statement

The **Privacy Act of 1974 (P.L. 93-579)** requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether disclosure of these records is required by the Freedom of Information Act.
2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.
3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.
4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).
5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.
6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).
7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (*i.e.*, GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspection or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.



UNITED STATES
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ELECTRONIC ACKNOWLEDGEMENT RECEIPT

APPLICATION # 16/555,487	RECEIPT DATE / TIME 04/22/2025 07:14:19 PM Z ET	ATTORNEY DOCKET # 273252-US-13
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Title of Invention

VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME

Application Information

APPLICATION TYPE	Utility - Nonprovisional Application under 35 USC 111(a)	PATENT #	10549648
CONFIRMATION #	4785	FILED BY	SARAH ZIZZO
PATENT CENTER #	70116971	FILING DATE	08/29/2019
CUSTOMER #	131278	FIRST NAMED INVENTOR	Robert Dean King
CORRESPONDENCE ADDRESS	-	AUTHORIZED BY	Tarek Fahmi

Documents

TOTAL DOCUMENTS: 3

DOCUMENT	PAGES	DESCRIPTION	SIZE (KB)
Edison_Exe_POA.pdf	134	Power of Attorney	1351 KB
16555487_Statement_3-73c.pdf	3	Assignee showing of ownership per 37 CFR 3.73	120 KB
16555487_ADS_GE_both.pdf	2	Application Data Sheet	149 KB

Warning: This is not a USPTO supplied ADS fillable form. Data in the form cannot be automatically loaded to other USPTO systems.

Digest

DOCUMENT MESSAGE DIGEST(SHA-512)

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Edison_Exe_POA.pdf	70037A4FEC2A63822F4A656346D25696299CADFD63189BBD FE124E26BB75CEEB71D3AB5B008D49AAB79E187DD66B1BB FCBCDA44980A8741C98797B48E0C70E6
16555487_Statement_3- 73c.pdf	9E0A5BD3853C4FF3B395C0207419497F3A1A8BBC9AB1ECDC 5CEE4144B2E5C6E109AAA634F76189571AA1AB66EE1D54481 E525CC23A657A8C935AD8152CB9CF2F
16555487_ADS_GE_both.pdf	59C7E6E2CE0AD45F1605647C8F1618AFA686C9D844AE4809A 71EE2EC12101853CE8AFA1A37B726BC3F75AAF1875E84F00B A45B52CC46A62E51C3B454E38672D4

This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503.

New Applications Under 35 U.S.C. 111

If a new application is being filed and the application includes the necessary components for filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application

National Stage of an International Application under 35 U.S.C. 371

If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course.

New International Application Filed with the USPTO as a Receiving Office

If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.

Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	16/555,487
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		

Applicant Information:

Providing assignment information in this section does not substitute for compliance with any requirement of part 3 of Title 37 of CFR to have an assignment recorded by the Office.			
Applicant 1			
If the applicant is the inventor (or the remaining joint inventor or inventors under 37 CFR 1.45), this section should not be completed. The information to be provided in this section is the name and address of the legal representative who is the applicant under 37 CFR 1.43; or the name and address of the assignee, person to whom the inventor is under an obligation to assign the invention, or person who otherwise shows sufficient proprietary interest in the matter who is the applicant under 37 CFR 1.46. If the applicant is an applicant under 37 CFR 1.46 (assignee, person to whom the inventor is obligated to assign, or person who otherwise shows sufficient proprietary interest) together with one or more joint inventors, then the joint inventor or inventors who are also the applicant should be identified in this section.			
Clear			
☒ Assignee	☐ Legal Representative under 35 U.S.C. 117	☐ Joint Inventor	
☐ Person to whom the inventor is obligated to assign.		☐ Person who shows sufficient proprietary interest	
If applicant is the legal representative, indicate the authority to file the patent application, the inventor is:			
Name of the Deceased or Legally Incapacitated Inventor:			
If the Applicant is an Organization check here. ☒			
Organization Name	~~General Electric Company~~ EDISON INNOVATIONS, LLC		
Mailing Address Information For Applicant:			
Address 1	4 River Road 812 W. McDermott Dr. #1106		
Address 2			
City	Schenectady, Allen	State/Province	NY TX
Country	US	Postal Code	12345 75013
Phone Number		Fax Number	
Email Address			
Additional Applicant Data may be generated within this form by selecting the Add button.			

Assignee Information including Non-Applicant Assignee Information:

Providing assignment information in this section does not substitute for compliance with any requirement of part 3 of Title 37 of CFR to have an assignment recorded by the Office.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	16/555,487
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		

Assignee 1

Complete this section if assignee information, including non-applicant assignee information, is desired to be included on the patent application publication. An assignee-applicant identified in the "Applicant Information" section will appear on the patent application publication as an applicant. For an assignee-applicant, complete this section only if identification as an assignee is also desired on the patent application publication.

If the Assignee or Non-Applicant Assignee is an Organization check here. ☒

Organization Name

~~General Electric Company~~ EDISON INNOVATIONS, LLC**Mailing Address Information For Assignee including Non-Applicant Assignee:**

Address 1

~~1 River Road~~ 812 W. McDermott Dr. #1106

Address 2

City

~~Schenectady~~ Allen

State/Province

~~NY~~ TXCountryⁱ

US

Postal Code

~~42346~~ 75013

Phone Number

Fax Number

Email Address

Additional Assignee or Non-Applicant Assignee Data may be generated within this form by selecting the Add button.

Signature:

NOTE: This Application Data Sheet must be signed in accordance with 37 CFR 1.33(b). However, if this Application Data Sheet is submitted with the **INITIAL** filing of the application and either box A or B is **not** checked in subsection 2 of the "Authorization or Opt-Out of Authorization to Permit Access" section, then this form must also be signed in accordance with 37 CFR 1.14(c).

This Application Data Sheet **must** be signed by a patent practitioner if one or more of the applicants is a **juristic entity** (e.g., corporation or association). If the applicant is two or more joint inventors, this form must be signed by a patent practitioner, **all** joint inventors who are the applicant, or one or more joint inventor-applicants who have been given power of attorney (e.g., see USPTO Form PTO/AIA/81) on behalf of **all** joint inventor-applicants.

See 37 CFR 1.4(d) for the manner of making signatures and certifications.

Signature	/Tarek N. Fahmi/			Date (YYYY-MM-DD)	2025-04-22
First Name	Tarek	Last Name	Fahmi	Registration Number	41402
Additional Signature may be generated within this form by selecting the Add button.					

**REVOCATION OF PREVIOUS POWERS OF ATTORNEY WITH NEW
GENERAL POWER OF ATTORNEY TO PROSECUTE APPLICATIONS AND REEXAMINATION
PROCEEDINGS BEFORE THE UNITED STATES PATENT AND TRADEMARK OFFICE**

I hereby revoke all previous powers of attorney given in the application(s), reexamination proceeding(s) and/or patent(s) listed below and appoint:

Practitioners associated with the Customer Number

27571

as attorney(s) or agent(s) to represent the undersigned before the United States Patent and Trademark Office (USPTO) in connection with any and all patent applications and reexamination proceedings assigned only to the undersigned according to the USPTO assignment records or assignment documents attached to this form in accordance with 37 CFR 3.73(b).

Please change the correspondence address for the application(s), reexamination proceeding(s) and/or patent(s) listed below to the address associated with Customer Number 27571.

Assignee Name and Address:

Edison Innovations, LLC
812 W. McDermott Dr. #1106
Allen, TX 75013

A statement under 37 CFR 3.73 is attached.

List of application(s), reexamination proceeding(s) and/or patent(s):

See attached list

SIGNATURE OF ASSIGNEE OF RECORD

The individual whose signature and title is supplied below is authorized to act on behalf of the assignee

Signature



Date: 2/19/25

Name

David Pridham

Telephone: 214-414-1164

Title

CEO

Annex A (Listed
Patents)

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
124281-US-1	US	12/18/2003	US10/707496	US7262520	8/28/2007	Robust power distribution systems and methods	Dolby Intellectual Property Licensing, LLC	Active
133987-AU-3	AU	11/18/2004	AU200429532 1A	AU2004295 321	1/6/2011	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-BR-4	BR	11/18/2004	BRPI0416414 A	BRPI041641 4	1/9/2007	Method and device for producing a tensile stress	Dolby Intellectual Property Licensing, LLC	Active
133987-CA-5	CA	11/18/2004	CA2545552A	CA2545552	7/9/2013	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-CN-6	CN	11/18/2004	CN200480034 845A	CN1886282	1/11/2012	Method and apparatus for producing traction effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-DE-13	DE	11/18/2004	EP04811389A	EP1697158	10/17/2007	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-FR-12	FR	11/18/2004	EP04811389A	EP1697158	10/17/2007	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-IN-8	IN	5/11/2006	IN2659DEN20 06A	IN301119	9/21/2018	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-IT-14	IT	11/18/2004	EP04811389A	EP1697158	10/17/2007	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-MX-9	MX	11/18/2004	MXPA060059 59A	MXPA06005 959	7/6/2006	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
133987-RU-10	RU	11/18/2004	RU200612253 1A	RU2348546	3/10/2009	Traction method and mechanism	Dolby Intellectual Property Licensing, LLC	Expired
133987-US-1	US	11/25/2003	US10/723572	US7489093	2/10/2009	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Active
133987-ZA-11	ZA	6/9/2006	ZA200604790 A	ZA20060479 0	10/31/2007	Method and apparatus for producing tractive effort	Dolby Intellectual Property Licensing, LLC	Expired
134730-JP-2	JP	3/29/2005	JP2005093545 A	JP4871520	2/8/2012	High density connection between multiple circuit boards	Dolby Intellectual Property Licensing, LLC	Active
145823-BR-3	BR	11/9/2005	BRPI0504935 A	BRPI050493 5	2/27/2018	"Electric ignition generating system"	Dolby Intellectual Property Licensing, LLC	Active
145823-DE-8	DE	11/10/2005	EP05256964A	EP1657807	6/5/2019	Bidirectional buck-boost power converter	Dolby Intellectual Property Licensing, LLC	Active
145823-EP-2	EP	11/10/2005	EP05256964A	EP1657807	6/5/2019	Bidirectional buck-boost power converter	Dolby Intellectual Property Licensing, LLC	Active
145823-JP-5	JP	11/1/2005	JP2005318000 A	JP4870968	2/8/2012	Bidirectional buck-boost power converter, electric starter generator using bidirectional buck-boost power converter, and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
145823-US-6	US	12/4/2007	US11/949963	US8138694	3/20/2012	Bidirectional buck-boost power converters	Dolby Intellectual Property Licensing, LLC	Active
146125-DE-5	DE	8/25/2005	EP05792879A	EP1784444	8/13/2014	Crosslinkable and crosslinked polymers	Dolby Intellectual Property Licensing, LLC	Active

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
146125-GB-6	GB	8/25/2005	EP05792879A	EP1784444	8/13/2014	Crosslinkable and crosslinked polymers	Dolby Intellectual Property Licensing, LLC	Active
146125-JP-4	JP	8/25/2005	JP2007530158A	JP5341349	11/13/2013	Crosslinkable and cross-linked polymers	Dolby Intellectual Property Licensing, LLC	Active
146125-NL-7	NL	8/25/2005	EP05792879A	EP1784444	8/13/2014	Crosslinkable and crosslinked polymers	Dolby Intellectual Property Licensing, LLC	Active
146125-US-1	US	8/27/2004	US10/928939	US7390857	6/24/2008	Crosslinkable and crosslinked polymers	Dolby Intellectual Property Licensing, LLC	Active
152861-CN-2	CN	9/13/2005	CN200510104181A	CN100565938	12/2/2009	Photovoltaic modules for solar concentrator	Dolby Intellectual Property Licensing, LLC	Active
152861-IT-4	IT	9/12/2005	ITMI20051676A	ITMI20051676	3/14/2006		Dolby Intellectual Property Licensing, LLC	Active
152861-US-1	US	9/13/2004	US10/939925	US7442871	10/28/2008	Photovoltaic modules for solar concentrator	Dolby Intellectual Property Licensing, LLC	Active
154645-US-1	US	11/24/2004	US10/996714	US7240353	7/3/2007	Functionality recommendation system	Dolby Intellectual Property Licensing, LLC	Active
155850-US-1	US	6/6/2005	US11/146875	US8039731	10/18/2011	Photovoltaic concentrator for solar energy system	Dolby Intellectual Property Licensing, LLC	Active
162163-US-1	US	12/15/2005	US11/303157	US7663456	2/16/2010	Micro-electromechanical system (mems) switch arrays	Dolby Intellectual Property Licensing, LLC	Active
162191-FR-7	FR	6/19/2007	EP07110554A	EP2017870	5/15/2013	Micro-electromechanical system based soft switching	Dolby Intellectual Property Licensing, LLC	Active
162191-JP-4	JP	6/12/2007	JP2007154931A	JP5149550	2/20/2013	Soft switching based on microelectromechanical systems	Dolby Intellectual Property Licensing, LLC	Active
162191-US-1	US	12/20/2005	US11/314879	US7633725	12/15/2009	Micro-electromechanical system based soft switching	Dolby Intellectual Property Licensing, LLC	Active
162667-CN-3	CN	12/20/2006	CN200680050737A	CN101356071	1/2/2013	Hybrid vehicle and method of assembling same	Dolby Intellectual Property Licensing, LLC	Active
162667-IN-5	IN	6/25/2008	IN5533DEN2008A	IN285074	7/14/2017	Hybrid vehicle and method of assembling same	Dolby Intellectual Property Licensing, LLC	Active
162667-US-1	US	1/9/2006	US11/328051	US7780562	8/24/2010	Hybrid vehicle and method of assembling same	Dolby Intellectual Property Licensing, LLC	Active
162711-US-2	US	11/28/2006	US11/563726	US7876538	1/25/2011	Micro-electromechanical system based arc-less switching with circuitry for absorbing electrical energy during a fault condition	Dolby Intellectual Property Licensing, LLC	Active
163124-US-1	US	11/22/2005	US11/285122	US7453195	11/18/2008	White lamps with enhanced color contrast	Joint ownership - Dolby Intellectual Property Licensing, LLC with Current and Savant	Active
164314-US-1	US	10/19/2005	US11/254096	US8022416	9/20/2011	Functional blocks for assembly	Dolby Intellectual Property Licensing, LLC	Active
164314-US-3	US	10/19/2005	US11/254181	US7926176	4/19/2011	Methods for magnetically directed self assembly	Dolby Intellectual Property Licensing, LLC	Active
164415-US-4	US	4/10/2006	US11/401043	US8121192	2/21/2012	Method and system for treating noise in a generated image	Dolby Intellectual Property Licensing, LLC	Active
164467-US-2	US	11/18/2005	US11/283451	US7521732	4/21/2009	Vertical heterostructure field effect transistor and associated method	Dolby Intellectual Property Licensing, LLC	Active
176303-CN-3	CN	12/15/2006	CN200680050746A	CN101356707	7/11/2012	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active

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176303-DE-8	DE	12/15/2006	EP06847706A	EP1977495	11/24/2010	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active
176303-FR-7	FR	12/15/2006	EP06847706A	EP1977495	11/24/2010	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active
176303-GB-9	GB	12/15/2006	EP06847706A	EP1977495	11/24/2010	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active
176303-IN-5	IN	6/24/2008	IN5468DEN2008A	IN313530	6/7/2019	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active
176303-JP-11	JP	5/11/2012	JP2012108971A	JP5703258	4/15/2015	Energy storage system for electric or hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
176303-JP-14	JP	3/16/2017	JP2017050687A	JP6462027	1/30/2019	Energy storage system for electric or hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
176303-JP-6	JP	12/15/2006	JP2008549486A	JP5525731	6/18/2014	Energy storage system for electric or hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
176303-US-10	US	2/10/2011	US13/025102	USRE43956	2/5/2013	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active
176303-US-12	US	11/20/2012	US13/681686	USRE45431	3/24/2015	Energy storage system for electric or hybrid vehicle	Dolby Intellectual Property Licensing, LLC	Active
176918-US-2	US	3/15/2006	US11/376545	US7388695	6/17/2008	Data storage devices and methods	Dolby Intellectual Property Licensing, LLC	Active
176918-US-4	US	9/18/2007	US11/901725	US8808944	8/19/2014	Method for storing holographic data	Dolby Intellectual Property Licensing, LLC	Active
176918-US-5	US	6/17/2008	US12/140807	US8842351	9/23/2014	Data storage method and device	Dolby Intellectual Property Licensing, LLC	Active
177675-US-1	US	11/30/2005	US11/290951	US7750641	7/6/2010	Battery system and method for monitoring a battery	Dolby Intellectual Property Licensing, LLC	Active
177675-US-2	US	5/17/2010	US12/781495	US7847558	12/7/2010	Battery system for monitoring a battery	Dolby Intellectual Property Licensing, LLC	Active
181455-US-1	US	5/16/2007	US11/749174	US7626801	12/1/2009	Integrated inductor and capacitor components and methods of manufacture	Dolby Intellectual Property Licensing, LLC	Active
182854-US-1	US	4/4/2005	US11/097294	US7492810	2/17/2009	Method and apparatus for segmented code correlation	Dolby Intellectual Property Licensing, LLC	Active
183176-DE-8	DE	12/19/2007	EP07867811A	EP2095252	11/13/2019	Piggyback networks	Dolby Intellectual Property Licensing, LLC	Active
183176-EP-4	EP	12/19/2007	EP07867811A	EP2095252	11/13/2019	Piggyback networks	Dolby Intellectual Property Licensing, LLC	Active
183176-FR-7	FR	12/19/2007	EP07867811A	EP2095252	11/13/2019	Piggyback networks	Dolby Intellectual Property Licensing, LLC	Active
183176-GB-9	GB	12/19/2007	EP07867811A	EP2095252	11/13/2019	Piggyback networks	Dolby Intellectual Property Licensing, LLC	Active
183752-US-1	US	11/11/2005	US11/271711	US7734099	6/8/2010	Method and system for generating polygonal boundary definitions for image objects	Dolby Intellectual Property Licensing, LLC	Active
187674-AU-3	AU	5/26/2008	AU2008202309A	AU2008202309	11/20/2014	Method and apparatus for assembling photovoltaic modules	Dolby Intellectual Property Licensing, LLC	Active
187674-CN-4	CN	5/26/2008	CN200810108828A	CN101320759	12/26/2012	Method and apparatus for assembling photovoltaic modules	Dolby Intellectual Property Licensing, LLC	Active
187674-DE-8	DE	5/21/2008	EP08156634A	EP1995791	7/22/2015	Method and apparatus for assembling photovoltaic modules	Dolby Intellectual Property Licensing, LLC	Active

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187674-ES-6	ES	5/21/2008	EP08156634.A	EP1995791	7/22/2015	Method and apparatus for assembling photovoltaic modules	Dolby Intellectual Property Licensing, LLC	Active
187674-IT-7	IT	5/21/2008	EP08156634.A	EP1995791	7/22/2015	Method and apparatus for assembling photovoltaic modules	Dolby Intellectual Property Licensing, LLC	Active
187674-US-2	US	5/9/2008	US12/151806	US8701360	4/22/2014	Method and apparatus for assembling photovoltaic modules	Dolby Intellectual Property Licensing, LLC	Active
189292-CN-3	CN	1/5/2007	CN200780002160A	CN101370685	12/28/2011	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
189292-DE-8	DE	1/5/2007	EP07709593.A	EP1976721	6/12/2019	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
189292-EP-4	EP	1/5/2007	EP07709593.A	EP1976721	6/12/2019	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
189292-JP-6	JP	1/5/2007	JP2008549590A	JP5079709	11/21/2012	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
189292-US-1	US	1/9/2006	US11/328000	US7568537	8/4/2009	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
193892-US-1	US	9/28/2007	US11/863722	US7898176	3/1/2011	Fluidic thermal management article and method	Dolby Intellectual Property Licensing, LLC	Active
193892-US-2	US	9/28/2007	US11/863709	US8058802	11/15/2011	Thermal management article and method	Dolby Intellectual Property Licensing, LLC	Active
193892-US-3	US	9/28/2007	US11/863690	US7742673	6/22/2010	Thermal management article having thermal wave guide	Dolby Intellectual Property Licensing, LLC	Active
195378-US-2	US	6/22/2007	US11/767067	US7906092	3/15/2011	Methods for preparing compositions which comprise magnesium borohydride, and related materials	Dolby Intellectual Property Licensing, LLC	Active
197732-CA-4	CA	1/18/2007	CA2574470A	CA2574470	5/13/2014	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-CN-5	CN	1/18/2007	CN200710086047A	CN101003259	10/12/2011	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-DE-12	DE	1/18/2007	EP07100757.A	EP1810861	8/11/2010	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-FR-11	FR	1/18/2007	EP07100757.A	EP1810861	8/11/2010	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-GB-13	GB	1/18/2007	EP07100757.A	EP1810861	8/11/2010	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-IN-7	IN	1/18/2007	IN116DE2007A	IN284145	6/16/2017	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-IT-14	IT	1/18/2007	EP07100757.A	EP1810861	8/11/2010	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-JP-15	JP	11/19/2012	JP2012252813A	JP5619115	11/5/2014	Wheel propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-JP-8	JP	1/18/2007	JP2007008873A	JP5346437	11/20/2013	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
197732-US-2	US	12/21/2006	US11/614412	US7595597	9/29/2009	Vehicle propulsion system	Dolby Intellectual Property Licensing, LLC	Active
198520-US-1	US	10/6/2006	US11/539330	US7632425	12/15/2009	Composition and associated method	Dolby Intellectual Property Licensing, LLC	Active
205275-US-1	US	12/23/2008	US12/343288	US9093082	7/28/2015	Data storage devices and methods	Dolby Intellectual Property Licensing, LLC	Active

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205374-CN-2	CN	11/28/2007	CN200710305186A	CN101226835	2/22/2012	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205374-DE-8	DE	11/26/2007	EP07121542A	EP1928006	1/20/2010	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205374-FR-7	FR	11/26/2007	EP07121542A	EP1928006	1/20/2010	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205374-GB-9	GB	11/26/2007	EP07121542A	EP1928006	1/20/2010	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205374-JP-4	JP	11/27/2007	JP2007305386A	JP5421529	2/19/2014	Switching module based on micro-electromechanical system that can be stacked in series with its other module to satisfy voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205374-KR-5	KR	11/27/2007	KR20070121507A	KR101388747	4/25/2014	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205374-MX-6	MX	11/27/2007	MX2007014966A	MX2007014966	2/19/2009	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating.	Dolby Intellectual Property Licensing, LLC	Active
205374-US-1	US	11/28/2006	US11/563774	US7332835	2/19/2008	Micro-electromechanical system based switching module serially stackable with other such modules to meet a voltage rating	Dolby Intellectual Property Licensing, LLC	Active
205555-US-1	US	8/25/2006	US11/509397	US7313965	1/1/2008	High-temperature pressure sensor	Dolby Intellectual Property Licensing, LLC	Active
205932-US-1	US	12/23/2008	US12/343296	US8084168	12/27/2011	Holographic storage devices with complementary data layer and use thereof	Dolby Intellectual Property Licensing, LLC	Active
205979-AT-13	AT	8/5/2008	EP08161865A	EP2151362	10/10/2012	Method of operating a vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-CA-18	CA	8/1/2008	CA2901866A	CA2901866	11/7/2017	Method of operating vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-CA-2	CA	8/1/2008	CA2638479A	CA2638479	11/24/2015	Method of operating vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-DK-16	DK	8/5/2008	EP08161865A	EP2151362	10/10/2012	Method of operating a vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-ES-12	ES	8/5/2008	EP08161865A	EP2151362	10/10/2012	Method of operating a vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-FR-11	FR	8/5/2008	EP08161865A	EP2151362	10/10/2012	Method of operating a vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-NL-10	NL	8/5/2008	EP08161865A	EP2151362	10/10/2012	Method of operating a vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
205979-US-17	US	3/25/2014	US14/224992	US9248825	2/2/2016	Method of operating vehicle and associated system	Dolby Intellectual Property Licensing, LLC	Active
207792-DE-13	DE	9/16/2008	EP08164432A	EP2045823	8/16/2017	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
207792-FR-14	FR	9/16/2008	EP08164432A	EP2045823	8/16/2017	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active

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207792-GB-15	GB	9/16/2008	EP08164432A	EP2045823	8/16/2017	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
207792-IT-16	IT	9/16/2008	EP08164432A	EP2045823	8/16/2017	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
207792-JP-11	JP	7/25/2008	JP2008191824A	JP5340663	11/13/2013	System with circuitry for suppressing arc formation in microelectromechanical system based switches	Dolby Intellectual Property Licensing, LLC	Active
207792-KR-12	KR	10/2/2008	KR20080097287A	KR101468743	12/10/2014	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
207792-US-2	US	10/3/2007	US11/866849	US9076607	7/7/2015	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
208273-US-1	US	12/23/2008	US12/343289	US8182966	5/22/2012	Data storage devices and methods	Dolby Intellectual Property Licensing, LLC	Active
214912-US-1	US	12/6/2006	US11/634592	US8236200	8/7/2012	Nano-composite ir window and method for making same	Dolby Intellectual Property Licensing, LLC	Active
215038-DE-7	DE	11/26/2007	EP07121476A	EP1930922	8/9/2017	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load current appropriate to such circuitry	Dolby Intellectual Property Licensing, LLC	Active
215038-FR-8	FR	11/26/2007	EP07121476A	EP1930922	8/9/2017	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load current appropriate to such circuitry	Dolby Intellectual Property Licensing, LLC	Active
215038-GB-9	GB	11/26/2007	EP07121476A	EP1930922	8/9/2017	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load current appropriate to such circuitry	Dolby Intellectual Property Licensing, LLC	Active
215038-IT-10	IT	11/26/2007	EP07121476A	EP1930922	8/9/2017	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load current appropriate to such circuitry	Dolby Intellectual Property Licensing, LLC	Active
215038-JP-4	JP	12/4/2007	JP2007312956A	JP5215648	6/19/2013	Electromechanical switching circuit in parallel with a solid-state switching circuit that can be selectively switched to transmit a load current suitable for the circuit	Dolby Intellectual Property Licensing, LLC	Active
215038-KR-5	KR	12/5/2007	KR20070125518A	KR101409119	6/17/2014	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load current appropriate to such circuitry	Dolby Intellectual Property Licensing, LLC	Active
215038-MX-6	MX	11/21/2007	MX2007014563A	MX2007014563	2/19/2009	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load current appropriate to such circuitry.	Dolby Intellectual Property Licensing, LLC	Active
215038-US-1	US	12/6/2006	US11/567296	US7643256	1/5/2010	Electromechanical switching circuitry in parallel with solid state switching circuitry selectively switchable to carry a load appropriate to such circuitry	Dolby Intellectual Property Licensing, LLC	Active
215502-US-1	US	7/31/2008	US12/183488	US7829652	11/9/2010	Polyarylether composition and membrane	Dolby Intellectual Property Licensing, LLC	Active

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215575-DE-8	DE	1/10/2008	EP08100318A	EP1944785	11/14/2018	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
215575-EP-3	EP	1/10/2008	EP08100318A	EP1944785	11/14/2018	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
215575-FR-7	FR	1/10/2008	EP08100318A	EP1944785	11/14/2018	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
215575-GB-10	GB	1/10/2008	EP08100318A	EP1944785	11/14/2018	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
215575-IT-9	IT	1/10/2008	EP08100318A	EP1944785	11/14/2018	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
215575-JP-4	JP	1/10/2008	JP2008002778A	JP5172360	3/27/2013	Gate voltage control system and method for electrostatic actuation of microelectromechanical devices	Dolby Intellectual Property Licensing, LLC	Active
215575-KR-5	KR	1/10/2008	KR20080003059A	KR101442250	9/23/2014	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
215575-US-1	US	1/12/2007	US11/622483	US7473859	1/6/2009	Gating voltage control system and method for electrostatically actuating a micro-electromechanical device	Dolby Intellectual Property Licensing, LLC	Active
216634-US-1	US	2/13/2007	US11/705860	US7648649	1/19/2010	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
217591-US-1	US	6/28/2007	US11/769913	US7978402	7/12/2011	Robust window for infrared energy	Dolby Intellectual Property Licensing, LLC	Active
218806-US-1	US	9/4/2008	US12/204013	US8207813	6/26/2012	Electronic device and method	Dolby Intellectual Property Licensing, LLC	Active
219867-CN-8	CN	8/27/2009	CN200980100173A	CN101828285	4/3/2013	Composition, energy storage device, and method	Dolby Intellectual Property Licensing, LLC	Active
219867-US-2	US	12/9/2008	US12/330714	US8304110	11/6/2012	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
219868-US-3	US	6/28/2007	US11/769752	US7632604	12/15/2009	Energy storage device and method	Dolby Intellectual Property Licensing, LLC	Active
219869-AU-3	AU	5/7/2008	AU2008266715A	AU2008266715	1/17/2013	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
219869-CN-4	CN	5/7/2008	CN200880015037A	CN101682015	3/27/2013	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
219869-DE-9	DE	5/7/2008	EP08747755A	EP2162934	1/6/2021	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
219869-EP-5	EP	5/7/2008	EP08747755A	EP2162934	1/6/2021	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
219869-FR-8	FR	5/7/2008	EP08747755A	EP2162934	1/6/2021	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
219869-GB-10	GB	5/7/2008	EP08747755A	EP2162934	1/6/2021	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active

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219869-JP-6	JP	5/7/2008	JP2010512231A	JP5570976	8/13/2014	Energy storage device and cell structure thereof	Dolby Intellectual Property Licensing, LLC	Active
219869-US-1	US	6/14/2007	US11/763083	US8110301	2/7/2012	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
219869-ZA-7	ZA	11/6/2009	ZA200907831A	ZA200907831	7/28/2010	Energy storage device and cell configuration therefor	Dolby Intellectual Property Licensing, LLC	Active
220217-US-1	US	5/7/2007	US11/745137	US8006626	8/30/2011	System and method for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220217-US-6	US	8/29/2011	US13/219954	US8720344	5/13/2014	Thermal management system and method	Dolby Intellectual Property Licensing, LLC	Active
220219-CN-3	CN	3/17/2008	CN200880023326A	CN101689683	3/27/2013	System and method for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220219-DE-6	DE	3/17/2008	EP08732331A	EP2147475	11/29/2017	System for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220219-FR-7	FR	3/17/2008	EP08732331A	EP2147475	11/29/2017	System for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220219-GB-8	GB	3/17/2008	EP08732331A	EP2147475	11/29/2017	System for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220219-JP-5	JP	3/17/2008	JP2010507491A	JP5491385	5/14/2014	System and method for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220219-US-1	US	5/7/2007	US11/745109	US7921946	4/12/2011	System and method for cooling a battery	Dolby Intellectual Property Licensing, LLC	Active
220569-US-1	US	1/8/2008	US11/971126	US8055596	11/8/2011	System and method for developing a propensity model	Dolby Intellectual Property Licensing, LLC	Active
220778-CN-3	CN	12/22/2008	CN200810185380A	CN101465242	12/14/2016	There is the mems switch that the standoff voltage of improvement controls	Dolby Intellectual Property Licensing, LLC	Active
220778-DE-7	DE	12/12/2008	EP08171425A	EP2073238	11/1/2017	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220778-FR-8	FR	12/12/2008	EP08171425A	EP2073238	11/1/2017	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220778-GB-9	GB	12/12/2008	EP08171425A	EP2073238	11/1/2017	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220778-IT-10	IT	12/12/2008	EP08171425A	EP2073238	11/1/2017	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220778-JP-5	JP	12/16/2008	JP2008319542A	JP5478060	4/23/2014	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220778-KR-6	KR	12/19/2008	KR20080130501A	KR101529731	6/17/2015	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220778-US-1	US	12/21/2007	US11/962178	US7692519	4/6/2010	Mems switch with improved standoff voltage control	Dolby Intellectual Property Licensing, LLC	Active
220787-CN-3	CN	12/22/2008	CN200810188424A	CN101533740	11/13/2013	Mems microswitch having a conductive mechanical stop	Dolby Intellectual Property Licensing, LLC	Active
220787-FR-7	FR	12/11/2008	EP08171380A	EP2073236	3/2/2011	Mems microswitch having a conductive mechanical stop	Dolby Intellectual Property Licensing, LLC	Active
220787-IT-10	IT	12/11/2008	EP08171380A	EP2073236	3/2/2011	Mems microswitch having a conductive mechanical stop	Dolby Intellectual Property Licensing, LLC	Active
220787-JP-5	JP	12/12/2008	JP2008316853A	JP5449756	3/19/2014	Mems switch with conductive mechanical stopper	Dolby Intellectual Property Licensing, LLC	Active

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220787-KR-6	KR	12/18/2008	KR20080129356A	KR101538169	7/20/2015	Mems microswitch having a conductive mechanical stop	Dolby Intellectual Property Licensing, LLC	Active
220787-US-1	US	12/20/2007	US11/961767	US7609136	10/27/2009	Mems microswitch having a conductive mechanical stop	Dolby Intellectual Property Licensing, LLC	Active
220822-JP-5	JP	10/28/2008	JP2008276338A	JP5372466	12/18/2013	System and method for avoiding contact sticking in microelectromechanical system based switches	Dolby Intellectual Property Licensing, LLC	Active
220822-KR-6	KR	10/30/2008	KR20080107293A	KR101514073	4/21/2015	System and method for avoiding contact stiction in microelectromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
220822-US-1	US	10/31/2007	US11/931353	US7808764	10/5/2010	System and method for avoiding contact stiction in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Active
220832-DE-8	DE	10/10/2008	EP08166371A	EP2050712	12/26/2018	Sealed wafer packaging of microelectromechanical systems	Dolby Intellectual Property Licensing, LLC	Active
220832-EP-4	EP	10/10/2008	EP08166371A	EP2050712	12/26/2018	Sealed wafer packaging of microelectromechanical systems	Dolby Intellectual Property Licensing, LLC	Active
220832-GB-9	GB	10/10/2008	EP08166371A	EP2050712	12/26/2018	Sealed wafer packaging of microelectromechanical systems	Dolby Intellectual Property Licensing, LLC	Active
220832-US-1	US	10/15/2007	US11/872562	US7605466	10/20/2009	Sealed wafer packaging of microelectromechanical systems	Dolby Intellectual Property Licensing, LLC	Active
220887-CN-3	CN	6/20/2007	CN200780053377A	CN101680676	5/28/2014	Micro-electromechanical system based switching in heating-ventilation-air-conditioning systems	Dolby Intellectual Property Licensing, LLC	Active
220887-DE-7	DE	6/20/2007	EP07798805A	EP2171363	8/12/2015	Micro-electromechanical system based switching in heating-ventilation-air-conditioning systems	Dolby Intellectual Property Licensing, LLC	Active
220887-JP-5	JP	6/20/2007	JP2010512139A	JP5255630	8/7/2013	Micro-electromechanical system based switching in heating, ventilation and air conditioning systems	Dolby Intellectual Property Licensing, LLC	Active
220887-KR-6	KR	6/20/2007	KR20097026184A	KR101450364	10/15/2014	Micro-electromechanical system based switching in heating-ventilation-air-conditioning systems	Dolby Intellectual Property Licensing, LLC	Active
220887-US-1	US	6/15/2007	US11/763631	US7612971	11/3/2009	Micro-electromechanical system based switching in heating-ventilation-air-conditioning systems	Dolby Intellectual Property Licensing, LLC	Active
221845-CN-3	CN	6/20/2007	CN200780053364A	CN101743606	5/8/2013	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
221845-DE-7	DE	6/20/2007	EP07798799A	EP2162897	2/27/2013	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
221845-JP-5	JP	6/20/2007	JP2010512136A	JP5124637	1/23/2013	Microelectromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
221845-US-1	US	6/15/2007	US11/763739	US8358488	1/22/2013	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
222176-US-1	US	10/14/2008	US12/250582	US8013548	9/6/2011	System, vehicle and related method	Dolby Intellectual Property Licensing, LLC	Active
222841-CN-4	CN	10/31/2008	CN200810191117A	CN101445513	1/8/2014	Metal oxide coatings	Dolby Intellectual Property Licensing, LLC	Active
222841-DE-5	DE	10/31/2008	DE102008037499A	DE102008037499	3/22/2018	Metal oxide coatings	Dolby Intellectual Property Licensing, LLC	Active
222841-JP-7	JP	10/31/2008	JP2008281374A	JP5535466	7/2/2014	Metal oxide coating	Dolby Intellectual Property Licensing, LLC	Active
222841-KR-8	KR	10/31/2008	KR20080107939A	KR101565613	11/3/2015	Metal oxide coatings	Dolby Intellectual Property Licensing, LLC	Active
222841-TW-9	TW	10/31/2008	TW97142062A	TWI437004	5/11/2014	Metal oxide coatings	Dolby Intellectual Property Licensing, LLC	Active

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222841-US-10	US	7/30/2009	US12/512152	US8624050	1/7/2014	Solution process for transparent conductive oxide coatings	Dolby Intellectual Property Licensing, LLC	Active
222841-US-2	US	10/31/2007	US11/931039	US7652157	1/26/2010	Metal oxide coatings	Dolby Intellectual Property Licensing, LLC	Active
222841-US-3	US	10/31/2007	US11/930991	US8404877	3/26/2013	Metal oxide coatings	Dolby Intellectual Property Licensing, LLC	Active
223351-DE-4	DE	9/17/2010	DE102010037609A	DE102010037609	3/28/2019	System and method for operating a magnetic resonance coil	Dolby Intellectual Property Licensing, LLC	Active
223351-JP-3	JP	9/22/2010	JP2010211475A	JP5658517	1/28/2015	Device for driving a magnetic resonance coil	Dolby Intellectual Property Licensing, LLC	Active
223351-NL-5	NL	9/20/2010	NL2005375A	NL2005375	3/28/2011	System and method for magnetic resonance coil actuation.	Dolby Intellectual Property Licensing, LLC	Active
223351-US-1	US	9/23/2009	US12/565236	US8198895	6/12/2012	System and method for magnetic resonance coil actuation	Dolby Intellectual Property Licensing, LLC	Active
224610-CN-3	CN	6/20/2007	CN200780100111A	CN101772814	4/30/2014	Resettable mems micro-switch array based on current limiting apparatus	Dolby Intellectual Property Licensing, LLC	Active
224610-DE-7	DE	6/20/2007	EP07796290A	EP2162891	8/12/2015	Resettable mems micro-switch array based on current limiting apparatus	Dolby Intellectual Property Licensing, LLC	Active
224610-KR-6	KR	6/20/2007	KR20107001156A	KR101415456	7/4/2014	Resettable mems micro-switch array based on current limiting apparatus	Dolby Intellectual Property Licensing, LLC	Active
224610-US-1	US	6/19/2007	US11/764908	US8072723	12/6/2011	Resettable mems micro-switch array based on current limiting apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-CN-3	CN	6/20/2007	CN200780100251A	CN101874333	7/31/2013	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-DE-7	DE	6/20/2007	EP07835836A	EP2162964	3/21/2018	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-FI-11	FI	6/20/2007	EP07835836A	EP2162964	3/21/2018	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-FR-8	FR	6/20/2007	EP07835836A	EP2162964	3/21/2018	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-GB-9	GB	6/20/2007	EP07835836A	EP2162964	3/21/2018	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-IT-10	IT	6/20/2007	EP07835836A	EP2162964	3/21/2018	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-JP-5	JP	6/20/2007	JP2010512132A	JP5364699	12/11/2013	Overcurrent protection device using a microelectromechanical system that can be operated remotely	Dolby Intellectual Property Licensing, LLC	Active
224631-SE-12	SE	6/20/2007	EP07835836A	EP2162964	3/21/2018	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
224631-US-1	US	6/15/2007	US11/763824	US7885043	2/8/2011	Remote-operable micro-electromechanical system based over-current protection apparatus	Dolby Intellectual Property Licensing, LLC	Active
225009-AU-17	AU	4/10/2008	AU2008247963A	AU2008247963	1/16/2014	Electric drive vehicle retrofit system and associated method	Dolby Intellectual Property Licensing, LLC	Active
225009-AU-25	AU	10/10/2014	AU2014246607A	AU2014246607	6/2/2016	Method of operating propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-AU-7	AU	4/10/2008	AU2008247961A	AU2008247961	3/6/2014	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-CN-13	CN	4/10/2008	CN200880023502A	CN101808845	8/13/2014	Method of operating propulsion system	Dolby Intellectual Property Licensing, LLC	Active

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225009-CN-18	CN	4/10/2008	CN200880023461A	CN101808844	11/6/2013	Electric drive vehicle retrofit system and the vehicle	Dolby Intellectual Property Licensing, LLC	Active
225009-CN-22	CN	4/10/2008	CN201210138641A	CN102673413	5/6/2015	Electric drive vehicle retrofit system and associated method	Dolby Intellectual Property Licensing, LLC	Active
225009-CN-23	CN	4/10/2008	CN201210419549A	CN102897044	10/28/2015	The method of operating propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-CN-24	CN	4/10/2008	CN201310273800A	CN103332121	2/24/2016	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-CN-8	CN	4/10/2008	CN200880023481A	CN102015354	5/28/2014	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-DE-30	DE	4/10/2008	EP08745446A	EP2146862	10/2/2019	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-DE-33	DE	4/10/2008	EP08745447A	EP2146863	6/23/2021	Method of operating a propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-EP-14	EP	4/10/2008	EP08745447A	EP2146863	6/23/2021	Method of operating a propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-EP-9	EP	4/10/2008	EP08745446A	EP2146862	10/2/2019	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-FR-29	FR	4/10/2008	EP08745446A	EP2146862	10/2/2019	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-FR-34	FR	4/10/2008	EP08745447A	EP2146863	6/23/2021	Method of operating a propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-GB-31	GB	4/10/2008	EP08745446A	EP2146862	10/2/2019	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-GB-35	GB	4/10/2008	EP08745447A	EP2146863	6/23/2021	Method of operating a propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-JP-10	JP	4/10/2008	JP2010507498A	JP5525441	6/18/2014	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-US-1	US	5/7/2007	US11/745179	US7723932	5/25/2010	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-US-2	US	5/7/2007	US11/745191	US9073448	7/7/2015	Method of operating propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-US-3	US	5/7/2007	US11/745180	US8001906	8/23/2011	Electric drive vehicle retrofit system and associated method	Dolby Intellectual Property Licensing, LLC	Active
225009-ZA-11	ZA	11/20/2009	ZA200908225A	ZA200908225	7/28/2010	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-ZA-16	ZA	11/20/2009	ZA200908226A	ZA200908226	7/28/2010	Method of operating propulsion system	Dolby Intellectual Property Licensing, LLC	Active
225009-ZA-21	ZA	11/20/2009	ZA200908227A	ZA200908227	7/28/2010	Electric drive vehicle retrofit system and associated method	Dolby Intellectual Property Licensing, LLC	Active
225017-US-1	US	9/17/2008	US12/211854	US8114382	2/14/2012	Myelin detection using benzofuran derivatives	Dolby Intellectual Property Licensing, LLC	Active
225160-US-1	US	12/18/2007	US11/958604	US7879963	2/1/2011	Composition, article, and associated method	Dolby Intellectual Property Licensing, LLC	Active
225349-US-1	US	10/7/2008	US12/246518	US8765275	7/1/2014	Energy storage device and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-AU-12	AU	1/29/2016	AU2016200572A	AU2016200572	12/8/2016	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active

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225533-CN-4	CN	7/14/2009	CN200980132797A	CN102124590	7/30/2014	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-DE-8	DE	7/14/2009	EP09790350A	EP2327118	4/22/2015	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-GB-9	GB	7/14/2009	EP09790350A	EP2327118	4/22/2015	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-IT-10	IT	7/14/2009	EP09790350A	EP2327118	4/22/2015	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-JP-6	JP	7/14/2009	JP2011523842A	JP5730201	6/3/2015	Seal rings and related methods	Dolby Intellectual Property Licensing, LLC	Active
225533-US-1	US	8/19/2008	US12/193796	US9166214	10/20/2015	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-US-11	US	9/3/2015	US14/844659	US9966578	5/8/2018	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225533-ZA-7	ZA	3/7/2011	ZA201101741A	ZA201101741	1/25/2012	Seal ring and associated method	Dolby Intellectual Property Licensing, LLC	Active
225698-DE-2	DE	11/27/2009	DE102009044684A	DE102009044684	6/10/2010	Apparatus for highly efficient operation of fuel cell systems and method for the production thereof	Dolby Intellectual Property Licensing, LLC	Active
225698-US-1	US	12/2/2008	US12/326171	US8486570	7/16/2013	Apparatus for high efficiency operation of fuel cell systems and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
225698-US-3	US	7/9/2013	US13/937643	US9148085	9/29/2015	Apparatus and method for high efficiency operation of fuel cell systems	Dolby Intellectual Property Licensing, LLC	Active
225698-US-4	US	9/28/2015	US14/867652	US10056630	8/21/2018	Apparatus and method for high efficiency operation of fuel cell systems	Dolby Intellectual Property Licensing, LLC	Active
225698-US-5	US	7/13/2018	US16/034817	US11075394	7/27/2021	Apparatus and method for high efficiency operation of fuel cell systems	Dolby Intellectual Property Licensing, LLC	Active
225698-US-6	US	6/18/2021	US17/351653	US11670788	6/6/2023	Apparatus and method for high efficiency operation of fuel cell systems	Dolby Intellectual Property Licensing, LLC	Active
226798-CN-2	CN	11/14/2008	CN200810176200A	CN101436048	1/13/2016	There is the programmable logic controller (plc) of the switching based on mems (micro electro mechanical system)	Dolby Intellectual Property Licensing, LLC	Active
226798-FR-8	FR	11/7/2008	EP08168549A	EP2065770	1/9/2013	Programmable logic controller having micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
226798-JP-4	JP	11/12/2008	JP2008289347A	JP5576604	8/20/2014	Programmable logic controller with switch using micro electromechanical system	Dolby Intellectual Property Licensing, LLC	Active
226798-KR-5	KR	11/13/2008	KR20080112580A	KR101519143	5/11/2015	programmable logic controller having micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
226798-MX-6	MX	11/13/2008	MX2008014542A	MX2008014542	5/27/2009	Programmable logic controller having micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
226798-US-1	US	11/14/2007	US11/939729	US7839611	11/23/2010	Programmable logic controller having micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
226893-US-3	US	10/10/2008	US12/682302	US8662155	3/4/2014	Chip cooling device having wedge element	Dolby Intellectual Property Licensing, LLC	Active
227074-US-1	US	7/15/2008	US12/173549	US8644037	2/4/2014	Ac-ac converter with high frequency link	Dolby Intellectual Property Licensing, LLC	Active
227091-CN-3	CN	4/21/2009	CN200980000313A	CN101687710	12/17/2014	Composite article and related method	Dolby Intellectual Property Licensing, LLC	Active
227091-JP-5	JP	4/21/2009	JP2011510534A	JP5492195	5/14/2014	Composite product and manufacturing method	Dolby Intellectual Property Licensing, LLC	Active

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227091-US-1	US	5/19/2008	US12/122924	US7939050	5/10/2011	Composite article and related method	Dolby Intellectual Property Licensing, LLC	Active
227305-US-1	US	12/20/2007	US11/961532	US8159002	4/17/2012	Heterostructure device and associated method	Dolby Intellectual Property Licensing, LLC	Active
227305-US-2	US	3/13/2012	US13/418566	US8697506	4/15/2014	Heterostructure device and associated method	Dolby Intellectual Property Licensing, LLC	Active
227568-TW-3	TW	7/16/2008	TW97127051A	TW1429731	3/11/2014	Red line emitting complex fluoride phosphors activated with mn4+	Dolby Intellectual Property Licensing, LLC	Active
227568-US-2	US	7/16/2008	US12/174236	US7847309	12/7/2010	Red line emitting complex fluoride phosphors activated with mn4+	Dolby Intellectual Property Licensing, LLC	Active
227731-CN-4	CN	11/14/2008	CN200880016755A	CN101730956	10/30/2013	Energy storage device and method using ternary electrolyte	Dolby Intellectual Property Licensing, LLC	Active
227731-US-1	US	12/20/2007	US11/961024	US7993768	8/9/2011	Energy storage device and method	Dolby Intellectual Property Licensing, LLC	Active
227889-CN-2	CN	10/31/2008	CN200810175980A	CN101436490	1/29/2014	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
227889-DE-7	DE	10/24/2008	EP08167480A	EP2056315	7/23/2014	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
227889-FR-8	FR	10/24/2008	EP08167480A	EP2056315	7/23/2014	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
227889-GB-9	GB	10/24/2008	EP08167480A	EP2056315	7/23/2014	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
227889-IT-10	IT	10/24/2008	EP08167480A	EP2056315	7/23/2014	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
227889-JP-4	JP	10/30/2008	JP2008279202A	JP5346551	11/20/2013	Switching based on micro electromechanical systems	Dolby Intellectual Property Licensing, LLC	Active
227889-KR-5	KR	10/30/2008	KR20080107302A	KR101503929	3/18/2015	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
227889-MX-6	MX	10/30/2008	MX2008013944A	MX2008013944	5/26/2009	Micro-electromechanical system based switching.	Dolby Intellectual Property Licensing, LLC	Active
227889-US-1	US	11/1/2007	US11/933856	US7554222	6/30/2009	Micro-electromechanical system based switching	Dolby Intellectual Property Licensing, LLC	Active
228008-US-1	US	10/15/2008	US12/251665	US9960461	5/1/2018	System and method for temperature control of multi-battery systems	Dolby Intellectual Property Licensing, LLC	Active
228038-US-1	US	9/29/2008	US12/240200	US8217751	7/10/2012	Electronic device and method	Dolby Intellectual Property Licensing, LLC	Active
228073-US-1	US	11/5/2008	US12/265037	US8047317	11/1/2011	System, vehicle, and method	Dolby Intellectual Property Licensing, LLC	Active
228080-JP-2	JP	12/1/2009	JP2009273090A	JP5639357	12/10/2014	System and method for a vehicle-based uninterruptible power supply	Dolby Intellectual Property Licensing, LLC	Active
228080-JP-3	JP	5/12/2014	JP2014098256A	JP6050780	12/21/2016	Uninterruptible power supply system using vehicles	Dolby Intellectual Property Licensing, LLC	Active
228080-US-1	US	12/2/2008	US12/326189	US7960857	6/14/2011	System and method for vehicle based uninterruptable power supply	Dolby Intellectual Property Licensing, LLC	Active
228113-AU-2	AU	5/15/2009	AU2009201940A	AU2009201940	11/7/2013	High efficiency, multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-CN-3	CN	5/22/2009	CN200910145253A	CN101594068	1/28/2015	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active

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228113-DE-5	DE	5/19/2009	EP09160660A	EP2128972	7/18/2018	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-EP-4	EP	5/19/2009	EP09160660A	EP2128972	7/18/2018	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-ES-6	ES	5/19/2009	EP09160660A	EP2128972	7/18/2018	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-GB-7	GB	5/19/2009	EP09160660A	EP2128972	7/18/2018	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-IT-8	IT	5/19/2009	EP09160660A	EP2128972	7/18/2018	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-TR-9	TR	5/19/2009	EP09160660A	EP2128972	7/18/2018	High efficiency multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228113-US-1	US	5/27/2008	US12/154745	US7929325	4/19/2011	High efficiency, multi-source photovoltaic inverter	Dolby Intellectual Property Licensing, LLC	Active
228145-US-1	US	7/31/2008	US12/183326	US8229170	7/24/2012	Method and system for detecting a signal structure from a moving video platform	Dolby Intellectual Property Licensing, LLC	Active
228145-US-2	US	7/31/2008	US12/183334	US8233662	7/31/2012	Method and system for detecting signal color from a moving video platform	Dolby Intellectual Property Licensing, LLC	Active
228276-US-1	US	8/11/2008	US12/189221	US8049097	11/1/2011	Solar cell including cooling channels and method for fabrication	Dolby Intellectual Property Licensing, LLC	Active
228365-US-1	US	12/30/2008	US12/346378	US8194520	6/5/2012	Disc structure for bit-wise holographic storage	Dolby Intellectual Property Licensing, LLC	Active
228583-CH-11	CH	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-CN-2	CN	9/10/2009	CN200910176354A	CN101673945	1/28/2015	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-DE-6	DE	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-FI-12	FI	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-FR-7	FR	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-GB-8	GB	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-IT-9	IT	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-JP-3	JP	9/8/2009	JP2009206541A	JP5448660	3/19/2014	Electrical switching device	Dolby Intellectual Property Licensing, LLC	Active
228583-KR-4	KR	9/10/2009	KR20090085284A	KR101647142	8/9/2016	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-SE-10	SE	9/4/2009	EP09169531A	EP2164089	4/12/2017	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
228583-US-1	US	9/11/2008	US12/209064	US8687325	4/1/2014	Micro-electromechanical switch protection in series parallel topology	Dolby Intellectual Property Licensing, LLC	Active
229454-US-1	US	11/13/2008	US12/270247	US8034457	10/11/2011	Seal structure and associated method	Dolby Intellectual Property Licensing, LLC	Active
229947-US-1	US	4/1/2009	US12/416292	US8054147	11/8/2011	High voltage switch and method of making	Dolby Intellectual Property Licensing, LLC	Active

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229967-CN-3	CN	12/22/2009	CN200910215175A	CN101866780	6/8/2016	Micro electro-mechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-DE-8	DE	12/8/2009	EP09178257A	EP2200063	2/27/2019	Micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-EP-4	EP	12/8/2009	EP09178257A	EP2200063	2/27/2019	Micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-FR-7	FR	12/8/2009	EP09178257A	EP2200063	2/27/2019	Micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-GB-9	GB	12/8/2009	EP09178257A	EP2200063	2/27/2019	Micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-JP-5	JP	12/16/2009	JP2009284638A	JP5588663	9/10/2014	Micro electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-KR-6	KR	12/21/2009	KR20090127639A	KR101745722	6/9/2017	Micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229967-US-1	US	12/22/2008	US12/340775	US8093971	1/10/2012	Micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
229968-CA-2	CA	12/4/2008	CA2645820A	CA2645820	3/7/2017	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-CN-3	CN	12/22/2008	CN200810188423A	CN101465243	2/4/2015	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-DE-7	DE	12/11/2008	EP08171381A	EP2073237	10/19/2016	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-FR-8	FR	12/11/2008	EP08171381A	EP2073237	10/19/2016	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-GB-9	GB	12/11/2008	EP08171381A	EP2073237	10/19/2016	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-IT-10	IT	12/11/2008	EP08171381A	EP2073237	10/19/2016	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-JP-5	JP	12/12/2008	JP2008316857A	JP5530624	6/25/2014	Mems microswitch with dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-KR-6	KR	12/18/2008	KR20080129367A	KR101541915	8/4/2015	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229968-US-1	US	12/20/2007	US11/961737	US8610519	12/17/2013	Mems microswitch having a dual actuator and a shared gate	Dolby Intellectual Property Licensing, LLC	Active
229972-US-1	US	10/3/2008	US12/245428	US8603659	12/10/2013	Sealing glass composition and article	Dolby Intellectual Property Licensing, LLC	Active
230506-US-1	US	11/13/2008	US12/270258	US8043986	10/25/2011	Sealing glass composition, method and article	Dolby Intellectual Property Licensing, LLC	Active
230521-US-3	US	1/23/2008	US12/519784	US9065133	6/23/2015	Cathode for an electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
230537-CN-3	CN	7/13/2010	CN201080049793A	CN102598348	11/25/2015	Battery pack arrangement and correlation technique	Dolby Intellectual Property Licensing, LLC	Active
230537-ZA-5	ZA	2/13/2012	ZA201201844A	ZA201201844	11/28/2012	Battery pack assembly and related processes	Dolby Intellectual Property Licensing, LLC	Active
230709-US-1	US	1/9/2009	US12/351131	US8334053	12/18/2012	Seal structure and associated method	Dolby Intellectual Property Licensing, LLC	Active
231192-CN-2	CN	8/26/2010	CN201010273552A	CN102005925	11/25/2015	There is the power supply of piezoelectric transformer and the method for power transfer	Dolby Intellectual Property Licensing, LLC	Active

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231192-JP-3	JP	8/27/2010	JP2010190196 A	JP5749906	7/15/2015	Power supply with piezoelectric transformer and method of power conversion	Dolby Intellectual Property Licensing, LLC	Active
231192-US-1	US	8/28/2009	US12/550029	US8659921	2/25/2014	Power supply with a piezoelectric transformer and method for power conversion	Dolby Intellectual Property Licensing, LLC	Active
232246-DE-2	DE	10/8/2009	DE102009044 211A	DE10200904 4211	3/21/2024	Energy management system for improving the efficiency of electric and hybrid powertrains	Dolby Intellectual Property Licensing, LLC	Active
232246-JP-3	JP	10/7/2009	JP2009232927 A	JP5736110	6/17/2015	Propulsion system, method for assembling control system, and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232246-US-1	US	10/13/2008	US12/250182	US8120290	2/21/2012	Energy management system to improve efficiency of electric and hybrid drive trains	Dolby Intellectual Property Licensing, LLC	Active
232258-CN-3	CN	4/26/2012	CN201210138 329A	CN10285610 0	9/14/2016	There are the switch arrays of the circuit of the annual distribution adjusting the gating signal being applied to switch arrays	Dolby Intellectual Property Licensing, LLC	Active
232258-US-1	US	5/29/2009	US12/474299	US8427792	4/23/2013	Method and system to enhance reliability of switch array	Dolby Intellectual Property Licensing, LLC	Active
232258-US-2	US	4/28/2011	US13/096071	US8582254	11/12/2013	Switching array having circuitry to adjust a temporal distribution of a gating signal applied to the array	Dolby Intellectual Property Licensing, LLC	Active
232260-US-1	US	4/30/2009	US12/433107	US8435673	5/7/2013	Cathode composition with phosphorus composition additive and electrochemical cell comprising same	Dolby Intellectual Property Licensing, LLC	Active
232492-US-1	US	4/4/2011	US13/066000	US9007689	4/14/2015	Method and apparatus for forming multiple images	Dolby Intellectual Property Licensing, LLC	Active
232652-AU-10	AU	4/16/2014	AU201420213 9A	AU2014202 139	2/11/2016	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-AU-3	AU	7/2/2009	AU200927429 6A	AU2009274 296	1/16/2014	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-CN-4	CN	7/2/2009	CN200980138 134A	CN10216477 2	6/3/2015	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-DE-12	DE	7/2/2009	EP09790050A	EP2307227	10/9/2019	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-EP-5	EP	7/2/2009	EP09790050A	EP2307227	10/9/2019	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-JP-9	JP	1/24/2013	JP2013010706 A	JP5675858	2/25/2015	Method and system for controlling an energy storage device for a vehicle	Dolby Intellectual Property Licensing, LLC	Active
232652-US-1	US	7/24/2008	US12/179188	US8212532	7/3/2012	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-US-8	US	7/3/2012	US13/541549	US8587260	11/19/2013	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232652-ZA-7	ZA	2/9/2011	ZA201101056 A	ZA20110105 6	10/26/2011	Method and system for control of a vehicle energy storage device	Dolby Intellectual Property Licensing, LLC	Active
232737-CN-2	CN	12/1/2009	CN200910253 369A	CN10174624 7	1/6/2016	Auxiliary drive apparatus and manufacture method thereof	Dolby Intellectual Property Licensing, LLC	Active
232737-DE-10	DE	11/20/2009	EP09176593A	EP2193954	10/21/2020	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-EP-3	EP	11/20/2009	EP09176593A	EP2193954	10/21/2020	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-ES-12	ES	11/20/2009	EP09176593A	EP2193954	10/21/2020	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-FR-9	FR	11/20/2009	EP09176593A	EP2193954	10/21/2020	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active

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232737-GB-13	GB	11/20/2009	EP09176593A	EP2193954	10/21/2020	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-IT-11	IT	11/20/2009	EP09176593A	EP2193954	10/21/2020	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-JP-7	JP	10/7/2013	JP2013209761A	JP5844787	1/20/2016	Auxiliary drive device and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
232737-KR-5	KR	12/1/2009	KR20090117742A	KR101614948	4/22/2016	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-US-1	US	12/2/2008	US12/326152	US8274173	9/25/2012	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232737-US-6	US	8/7/2012	US13/568251	US9061595	6/23/2015	Auxiliary drive apparatus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
232802-CN-2	CN	1/29/2010	CN201010114878A	CN101817342	3/26/2014	Modular auxiliary power unit assembly for an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
232802-US-1	US	1/29/2009	US12/362218	US8376070	2/19/2013	Modular auxiliary power unit assembly for an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
232802-US-5	US	2/15/2013	US13/767962	US8695739	4/15/2014	Modular auxiliary power unit assembly for an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
233177-US-1	US	9/18/2008	US12/284132	US7994418	8/9/2011	Monolithically connected photovoltaic devices on flexible substrates	Dolby Intellectual Property Licensing, LLC	Active
233585-US-1	US	12/12/2008	US12/334019	US8199681	6/12/2012	Software radio frequency canceller	Dolby Intellectual Property Licensing, LLC	Active
233619-DE-4	DE	3/23/2010	EP10157266A	EP2236370	5/16/2018	Apparatus and method for advanced anti-skid brake and traction controls	Dolby Intellectual Property Licensing, LLC	Active
233619-FR-5	FR	3/23/2010	EP10157266A	EP2236370	5/16/2018	Apparatus and method for advanced anti-skid brake and traction controls	Dolby Intellectual Property Licensing, LLC	Active
233619-GB-6	GB	3/23/2010	EP10157266A	EP2236370	5/16/2018	Apparatus and method for advanced anti-skid brake and traction controls	Dolby Intellectual Property Licensing, LLC	Active
233619-JP-3	JP	3/24/2010	JP2010067176A	JP5651357	1/14/2015	Disc brake system	Dolby Intellectual Property Licensing, LLC	Active
233619-US-1	US	3/30/2009	US12/413856	US9796364	10/24/2017	Apparatus and method for advanced anti-skid brake and traction controls	Dolby Intellectual Property Licensing, LLC	Active
233633-US-1	US	2/25/2009	US12/392609	US8688046	4/1/2014	Quiet spectrum harvester	Dolby Intellectual Property Licensing, LLC	Active
233635-AU-5	AU	6/3/2010	AU2010256533A	AU2010256533	12/15/2011	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-CA-6	CA	6/3/2010	CA2764366A	CA2764366	12/4/2018	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-CN-7	CN	6/3/2010	CN201080025128A	CN102802672	12/16/2015	The imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-DE-10	DE	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-DK-11	DK	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-FI-12	FI	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-FR-13	FR	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active

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233635-GB-14	GB	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-JP-9	JP	6/3/2010	JP2012514124A	JP5897461	3/30/2016	Imaging myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-NL-15	NL	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-NO-16	NO	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-SE-17	SE	6/3/2010	EP10728034A	EP2437792	10/21/2015	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-US-1	US	6/4/2009	US12/478300	US8617515	12/31/2013	Imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233635-US-4	US	2/21/2011	US13/031349	US8658129	2/25/2014	Agents and methods for the imaging of myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
233705-US-1	US	12/16/2008	US12/336009	US9130747	9/8/2015	Software radio frequency canceller	Dolby Intellectual Property Licensing, LLC	Active
233920-US-1	US	4/3/2009	US12/418039	US7973424	7/5/2011	Method and apparatus for producing tractive effort with interface to other apparatus	Dolby Intellectual Property Licensing, LLC	Active
234194-US-1	US	8/19/2009	US12/543785	US7885011	2/8/2011	Objective for optical imaging systems	Dolby Intellectual Property Licensing, LLC	Active
234194-US-2	US	6/23/2010	US12/821731	US8169696	5/1/2012	Systems for intraoperative nerve imaging	Dolby Intellectual Property Licensing, LLC	Active
234201-CN-2	CN	3/11/2010	CN201010144018A	CN101837775	1/6/2016	For the system and method that optimization energy reservoir part uses	Dolby Intellectual Property Licensing, LLC	Active
234201-DE-6	DE	3/8/2010	EP10155723A	EP2228275	7/4/2018	Vehicle with optimizing of the energy storage component usage	Dolby Intellectual Property Licensing, LLC	Active
234201-EP-3	EP	3/8/2010	EP10155723A	EP2228275	7/4/2018	Vehicle with optimizing of the energy storage component usage	Dolby Intellectual Property Licensing, LLC	Active
234201-FR-8	FR	3/8/2010	EP10155723A	EP2228275	7/4/2018	Vehicle with optimizing of the energy storage component usage	Dolby Intellectual Property Licensing, LLC	Active
234201-GB-7	GB	3/8/2010	EP10155723A	EP2228275	7/4/2018	Vehicle with optimizing of the energy storage component usage	Dolby Intellectual Property Licensing, LLC	Active
234201-IN-4	IN	2/25/2010	IN422DE2010A	IN339416	7/3/2020	Vehicle with optimized energy storage component	Dolby Intellectual Property Licensing, LLC	Active
234201-JP-5	JP	3/9/2010	JP2010051225A	JP5736115	6/17/2015	Vehicles that optimize the use of energy storage components	Dolby Intellectual Property Licensing, LLC	Active
234201-US-1	US	3/11/2009	US12/401726	US8024082	9/20/2011	System and method for optimizing energy storage component usage	Dolby Intellectual Property Licensing, LLC	Active
234321-US-1	US	5/1/2009	US12/433992	US8154149	4/10/2012	Method and apparatus for charging a vehicle energy storage system	Dolby Intellectual Property Licensing, LLC	Active
234422-CN-2	CN	8/13/2010	CN201010258366A	CN102176391	8/21/2013	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
234422-KR-5	KR	8/13/2010	KR20100078421A	KR101766482	8/8/2017	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
234422-US-1	US	8/14/2009	US12/541321	US7928333	4/19/2011	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
234574-US-1	US	3/30/2009	US12/414234	US7961572	6/14/2011	System and method for reading micro-holograms with reduced error rates	Dolby Intellectual Property Licensing, LLC	Active

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234577-DE-2	DE	2/9/2010	DE102010000347A	DE102010000347	8/19/2010	Electrically driven power take-off system and method for its production	Dolby Intellectual Property Licensing, LLC	Active
234577-US-1	US	2/18/2009	US12/372880	US8115334	2/14/2012	Electrically driven power take-off system and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
234828-US-1	US	2/16/2009	US12/371675	US8118237	2/21/2012	System and method for vehicle temperature control	Dolby Intellectual Property Licensing, LLC	Active
234863-US-1	US	3/30/2009	US12/414284	US8327247	12/4/2012	Bit probability estimation method for noisy modulation code	Dolby Intellectual Property Licensing, LLC	Active
234866-US-1	US	3/30/2009	US12/414310	US7916605	3/29/2011	Joint dc minimization and bit detection	Dolby Intellectual Property Licensing, LLC	Active
234874-US-1	US	3/30/2009	US12/414263	US9318145	4/19/2016	Method for decoding under optical and electronic noise	Dolby Intellectual Property Licensing, LLC	Active
234996-US-1	US	2/25/2009	US12/392751	US9563889	2/7/2017	Method and apparatus for secure wireless point of sale transactions	Dolby Intellectual Property Licensing, LLC	Active
235033-DE-7	DE	3/26/2010	EP10158010A	EP2236344	11/10/2021	System for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-EP-2	EP	3/26/2010	EP10158010A	EP2236344	11/10/2021	System for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-EP-5	EP	3/26/2010	EP21205291A	EP4009512	6/8/2022	Apparatus, method, and system for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-FR-6	FR	3/26/2010	EP10158010A	EP2236344	11/10/2021	System for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-GB-8	GB	3/26/2010	EP10158010A	EP2236344	11/10/2021	System for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-JP-3	JP	3/30/2010	JP2010076542A	JP5809392	11/10/2015	Apparatus, method and system for transporting electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-US-1	US	4/3/2009	US12/417983	US7928598	4/19/2011	Apparatus, method, and system for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235033-US-4	US	3/29/2011	US13/074323	US8154151	4/10/2012	Apparatus, method, and system for conveying electrical energy	Dolby Intellectual Property Licensing, LLC	Active
235141-CN-3	CN	3/17/2010	CN201010157228A	CN101837722	12/2/2015	For system and the manufacture method thereof of vehicle propulsion	Dolby Intellectual Property Licensing, LLC	Active
235141-JP-6	JP	3/10/2010	JP2010052445A	JP6247808	12/13/2017	System for propulsion of vehicle having cvt and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
235141-US-2	US	3/17/2009	US12/405874	US8535200	9/17/2013	Vehicle propulsion system having a continuously variable transmission and method of making same	Dolby Intellectual Property Licensing, LLC	Active
235150-BR-2	BR	10/19/2009	BRPI0904082A	BRPI0904082	5/28/2019	Engine drive circuit	Dolby Intellectual Property Licensing, LLC	Active
235150-CA-17	CA	10/15/2009	CA3005188A	CA3005188	6/30/2020	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-CA-18	CA	10/15/2009	CA3056633A	CA3056633	4/13/2021	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-CA-19	CA	10/15/2009	CA3056637A	CA3056637	9/27/2022	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-CA-3	CA	10/15/2009	CA2682843A	CA2682843	4/30/2019	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-CN-4	CN	10/22/2009	CN200910209818A	CN101729020	12/24/2014	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active

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235150-EP-22	EP	10/14/2009	EP19199167A	EP3641097	4/22/2020	Electric vehicle charging system	Dolby Intellectual Property Licensing, LLC	Active
235150-IN-6	IN	10/7/2009	IN2082DE2009A	IN329900	1/24/2020	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-JP-7	JP	10/20/2009	JP2009240958A	JP5674301	2/25/2015	Device for energy transfer using a transducer and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
235150-KR-13	KR	9/1/2016	KR20160112685A	KR101733931	5/8/2017	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-KR-8	KR	10/22/2009	KR20090100663A	KR101655411	9/7/2016	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-1	US	10/22/2008	US12/256466	US8080973	12/20/2011	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-10	US	2/27/2012	US13/406208	US9024573	5/5/2015	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-11	US	2/27/2012	US13/406241	US10131234	11/20/2018	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-12	US	1/15/2015	US14/597852	US9321367	4/26/2016	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-14	US	11/4/2016	US15/343493	US9809121	11/7/2017	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-15	US	9/7/2017	US15/697948	US9975439	5/22/2018	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-16	US	4/4/2018	US15/945168	US10604023	3/31/2020	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-23	US	2/11/2020	US16/787185	US10994623	5/4/2021	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-24	US	4/5/2021	US17/222270	US11752887	9/12/2023	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235150-US-9	US	12/8/2011	US13/314572	US9227523	1/5/2016	Apparatus for energy transfer using converter and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235152-DE-2	DE	10/16/2009	DE102009044281A	DE102009044281	4/29/2010	Device for transmitting energy by means of power electronics and machine inductance, and method for producing the same	Dolby Intellectual Property Licensing, LLC	Active
235152-JP-3	JP	10/20/2009	JP2009240959A	JP5813283	11/17/2015	Vehicle having power electronic device and device for transmitting energy using mechanical inductance	Dolby Intellectual Property Licensing, LLC	Active
235152-KR-4	KR	10/22/2009	KR20090100614A	KR101652379	8/30/2016	Apparatus for transferring energy using power electronics and machine inductance and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235152-KR-9	KR	8/7/2017	KR20170099594A	KR101829173	2/13/2018	Apparatus for transferring energy using power electronics and machine inductance and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235152-US-1	US	10/22/2008	US12/256457	US7932633	4/26/2011	Apparatus for transferring energy using power electronics and machine inductance and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235152-US-5	US	3/25/2011	US13/072085	US8653696	2/18/2014	Apparatus for transferring energy using power electronics and machine inductance and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active

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235152-US-6	US	1/31/2014	US14/169338	US9620974	4/11/2017	Apparatus for transferring energy using power electronics and machine inductance and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235152-US-8	US	11/15/2016	US15/351608	US1167654	11/9/2021	Apparatus for transferring energy using power electronics and machine inductance and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
235526-AU-2	AU	11/12/2010	AU2010241429A	AU2010241429	6/2/2011	Systems and apparatus relating to solar-thermal power generation	Dolby Intellectual Property Licensing, LLC	Active
235526-CN-3	CN	11/16/2010	CN201010564304A	CN102062066	11/26/2014	Apparatus relating to solar-thermal power generation	Dolby Intellectual Property Licensing, LLC	Active
235526-DE-5	DE	11/5/2010	EP10190274A	EP2322796	9/26/2018	Systems and apparatus relating to solar-thermal power generation	Dolby Intellectual Property Licensing, LLC	Active
235526-EP-4	EP	11/5/2010	EP10190274A	EP2322796	9/26/2018	Systems and apparatus relating to solar-thermal power generation	Dolby Intellectual Property Licensing, LLC	Active
235526-US-1	US	11/16/2009	US12/619199	US8276379	10/2/2012	Systems and apparatus relating to solar-thermal power generation	Dolby Intellectual Property Licensing, LLC	Active
235655-CH-3	CH	9/22/2010	EP10178461A	EP2306580	5/20/2015	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
235655-DE-4	DE	9/22/2010	EP10178461A	EP2306580	5/20/2015	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
235655-GB-5	GB	9/22/2010	EP10178461A	EP2306580	5/20/2015	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
235655-IT-6	IT	9/22/2010	EP10178461A	EP2306580	5/20/2015	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
235655-US-1	US	9/24/2009	US12/565842	US8178231	5/15/2012	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
235714-US-1	US	11/4/2009	US12/611993	US8343661	1/1/2013	Cathode compositions comprising zn and chalcogenide and energy storage cell comprising same	Dolby Intellectual Property Licensing, LLC	Active
235738-US-1	US	9/29/2010	US12/893661	US8329336	12/11/2012	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
235783-AU-8	AU	5/28/2015	AU2015202902A	AU2015202902	9/8/2016	Protective coating compositions and devices	Dolby Intellectual Property Licensing, LLC	Active
235783-CN-3	CN	7/23/2010	CN201010245418A	CN102031045	2/18/2015	Protective coating compositions and devices	Dolby Intellectual Property Licensing, LLC	Active
235783-DE-5	DE	7/20/2010	EP10170065A	EP2302006	11/28/2012	Protective coating compositions and devices	Dolby Intellectual Property Licensing, LLC	Active
235783-ES-6	ES	7/20/2010	EP10170065A	EP2302006	11/28/2012	Protective coating compositions and devices	Dolby Intellectual Property Licensing, LLC	Active
235783-IT-7	IT	7/20/2010	EP10170065A	EP2302006	11/28/2012	Protective coating compositions and devices	Dolby Intellectual Property Licensing, LLC	Active
235783-US-1	US	9/25/2009	US12/566962	US8216357	7/10/2012	Protective coating compositions and devices	Dolby Intellectual Property Licensing, LLC	Active
235849-AU-2	AU	12/2/2010	AU2010249139A	AU2010249139	11/5/2015	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active
235849-BR-3	BR	11/30/2010	BRPI1004671A	BRPI1004671	11/5/2019	Current control device and service meter	Dolby Intellectual Property Licensing, LLC	Active
235849-CA-4	CA	11/26/2010	CA2722635A	CA2722635	6/5/2018	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active

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235849-DE-9	DE	11/30/2010	EP10193206A	EP2330384	3/27/2019	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active
235849-EP-5	EP	11/30/2010	EP10193206A	EP2330384	3/27/2019	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active
235849-FR-8	FR	11/30/2010	EP10193206A	EP2330384	3/27/2019	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active
235849-GB-10	GB	11/30/2010	EP10193206A	EP2330384	3/27/2019	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active
235849-JP-6	JP	12/1/2010	JP2010268225A	JP5809797	11/11/2015	Method and apparatus for switching power	Dolby Intellectual Property Licensing, LLC	Active
235849-NZ-7	NZ	12/2/2010	NZ58966210A	NZ589662	11/30/2012	Current control device including a mems switch coupled between line and load sockets	Dolby Intellectual Property Licensing, LLC	Active
235849-US-1	US	12/2/2009	US12/629309	US8916995	12/23/2014	Method and apparatus for switching electrical power	Dolby Intellectual Property Licensing, LLC	Active
235896-US-1	US	4/30/2010	US12/771907	US8248755	8/21/2012	Polyimides and thin films, electronic articles and capacitors comprising these, and methods of making them	Dolby Intellectual Property Licensing, LLC	Active
236086-US-1	US	12/18/2009	US12/642501	US8753711	6/17/2014	Edge sealing method using barrier coatings	Dolby Intellectual Property Licensing, LLC	Active
236088-US-1	US	10/12/2009	US12/577629	US9472783	10/18/2016	Barrier coating with reduced process time	Dolby Intellectual Property Licensing, LLC	Active
236159-US-1	US	2/24/2010	US12/711556	US8652689	2/18/2014	Energy storage device and system	Dolby Intellectual Property Licensing, LLC	Active
236639-US-1	US	8/31/2009	US12/551410	US8124299	2/28/2012	Methods for using optical data storage media	Dolby Intellectual Property Licensing, LLC	Active
236639-US-7	US	2/27/2012	US13/405681	US8703388	4/22/2014	Optical data storage media	Dolby Intellectual Property Licensing, LLC	Active
236909-CN-2	CN	7/9/2010	CN201010231262A	CN101958651	6/19/2013	Transformer on-load tap changer using mems technology	Dolby Intellectual Property Licensing, LLC	Active
236909-JP-4	JP	7/7/2010	JP2010154403A	JP5237994	7/17/2013	Transformer tap changer using mems technology	Dolby Intellectual Property Licensing, LLC	Active
236909-US-1	US	7/9/2009	US12/500212	US8203319	6/19/2012	Transformer on-load tap changer using mems technology	Dolby Intellectual Property Licensing, LLC	Active
236987-US-1	US	3/24/2010	US12/730496	US9368774	6/14/2016	Electrolyte separator and method of making the electrolyte separator	Dolby Intellectual Property Licensing, LLC	Active
237446-US-2	US	1/27/2010	US12/694840	US8406487	3/26/2013	Method and system for contactless fingerprint detection and verification	Dolby Intellectual Property Licensing, LLC	Active
237714-CN-3	CN	3/31/2011	CN201110093474A	CN102208816	8/19/2015	Control distribution transformer and manufacture method thereof	Dolby Intellectual Property Licensing, LLC	Active
237714-DE-9	DE	3/28/2011	EP11160074A	EP2434614	6/19/2013	Distribution transformer transmitting control signals and method of making same	Dolby Intellectual Property Licensing, LLC	Active
237714-FR-10	FR	3/28/2011	EP11160074A	EP2434614	6/19/2013	Distribution transformer transmitting control signals and method of making same	Dolby Intellectual Property Licensing, LLC	Active
237714-IN-5	IN	3/15/2011	IN722DE2011A	IN341301	7/17/2020	Control distribution transformer and method making same	Dolby Intellectual Property Licensing, LLC	Active
237714-JP-6	JP	3/24/2011	JP2011065109A	JP5735828	6/17/2015	System with distribution transformer including communication module	Dolby Intellectual Property Licensing, LLC	Active
237714-US-1	US	3/31/2010	US12/751098	US8102148	1/24/2012	Augmented distribution transformer and method of making same	Dolby Intellectual Property Licensing, LLC	Active

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237714-US-2	US	3/31/2010	US12/751151	US8340833	12/25/2012	Control distribution transformer and method of making same	Dolby Intellectual Property Licensing, LLC	Active
237714-US-7	US	11/28/2011	US13/304989	US8423196	4/16/2013	Augmented distribution transformer and method of making same	Dolby Intellectual Property Licensing, LLC	Active
237714-US-8	US	12/21/2012	US13/723726	US9263182	2/16/2016	Control distribution transformer and method of making same	Dolby Intellectual Property Licensing, LLC	Active
237735-US-1	US	8/28/2009	US12/549839	US8766642	7/1/2014	Electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
237851-CN-2	CN	3/31/2011	CN201110093490A	CN102205844	8/17/2016	Equipment and manufacture method thereof for combination drive direct torque	Dolby Intellectual Property Licensing, LLC	Active
237851-DE-6	DE	3/28/2011	EP11160077A	EP2371646	11/29/2017	Apparatus for hybrid drive torque control	Dolby Intellectual Property Licensing, LLC	Active
237851-ES-10	ES	3/28/2011	EP11160077A	EP2371646	11/29/2017	Apparatus for hybrid drive torque control	Dolby Intellectual Property Licensing, LLC	Active
237851-FR-7	FR	3/28/2011	EP11160077A	EP2371646	11/29/2017	Apparatus for hybrid drive torque control	Dolby Intellectual Property Licensing, LLC	Active
237851-GB-8	GB	3/28/2011	EP11160077A	EP2371646	11/29/2017	Apparatus for hybrid drive torque control	Dolby Intellectual Property Licensing, LLC	Active
237851-IN-4	IN	3/15/2011	IN723DE2011A	IN388101	2/4/2022	Apparatus for hybrid drive torque control and method of	Dolby Intellectual Property Licensing, LLC	Active
237851-IT-9	IT	3/28/2011	EP11160077A	EP2371646	11/29/2017	Apparatus for hybrid drive torque control	Dolby Intellectual Property Licensing, LLC	Active
237851-JP-5	JP	3/24/2011	JP2011065108A	JP6389025	9/12/2018	Device for torque control of hybrid drive	Dolby Intellectual Property Licensing, LLC	Active
237851-US-1	US	3/31/2010	US12/751612	US9145048	9/29/2015	Apparatus for hybrid engine control and method of manufacture same	Dolby Intellectual Property Licensing, LLC	Active
237934-DE-5	DE	8/3/2010	EP10171761A	EP2287915	1/9/2013	Fused wiring harness for a photovoltaic system	Dolby Intellectual Property Licensing, LLC	Active
237934-ES-6	ES	8/3/2010	EP10171761A	EP2287915	1/9/2013	Fused wiring harness for a photovoltaic system	Dolby Intellectual Property Licensing, LLC	Active
237934-IT-7	IT	8/3/2010	EP10171761A	EP2287915	1/9/2013	Fused wiring harness for a photovoltaic system	Dolby Intellectual Property Licensing, LLC	Active
237954-CN-2	CN	2/25/2011	CN201110051953A	CN102189994	9/7/2016	For the electronic and system and method for motor vehicle driven by mixed power operation	Dolby Intellectual Property Licensing, LLC	Active
237954-DE-7	DE	1/25/2011	EP11152128A	EP2368751	6/14/2023	System and method for operation of electric and hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
237954-EP-3	EP	1/25/2011	EP11152128A	EP2368751	6/14/2023	System and method for operation of electric and hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
237954-FR-6	FR	1/25/2011	EP11152128A	EP2368751	6/14/2023	System and method for operation of electric and hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
237954-GB-8	GB	1/25/2011	EP11152128A	EP2368751	6/14/2023	System and method for operation of electric and hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
237954-IN-4	IN	1/25/2011	IN180DE2011A	IN414523	12/16/2022	System and method for operation of electric and hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active
237954-JP-5	JP	1/25/2011	JP2011012494A	JP5859732	2/16/2016	Electric vehicle or hybrid vehicle operating system	Dolby Intellectual Property Licensing, LLC	Active
237954-US-1	US	3/9/2010	US12/719921	US8086364	12/27/2011	System and method for operation of electric and hybrid vehicles	Dolby Intellectual Property Licensing, LLC	Active

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238115-CN-2	CN	1/13/2011	CN201110025103A	CN102131262	11/25/2015	Intelligence heterogeneous wireless switches	Dolby Intellectual Property Licensing, LLC	Active
238115-DE-8	DE	12/17/2010	EP10195582A	EP2346283	2/27/2019	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-EP-3	EP	12/17/2010	EP10195582A	EP2346283	2/27/2019	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-FR-7	FR	12/17/2010	EP10195582A	EP2346283	2/27/2019	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-GB-9	GB	12/17/2010	EP10195582A	EP2346283	2/27/2019	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-KR-4	KR	1/14/2011	KR20110004110A	KR101734556	5/11/2017	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-US-1	US	1/14/2010	US12/687673	US9473999	10/18/2016	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-US-5	US	9/27/2016	US15/277630	US10064114	8/28/2018	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238115-US-6	US	8/6/2018	US16/056007	US10750420	8/18/2020	Intelligent heterogeneous wireless handoff	Dolby Intellectual Property Licensing, LLC	Active
238312-BR-3	BR	4/25/2011	BRP11102023A	BRP11102023	1/7/2020	Power transfer systems	Dolby Intellectual Property Licensing, LLC	Active
238312-BR-9	BR	4/26/2011	BRP11101998A	BRP11101998	12/17/2019	Energy transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-CN-10	CN	5/12/2011	CN201110134191A	CN102340185	5/20/2015	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-CN-4	CN	5/12/2011	CN201110134150A	CN102244417	6/17/2015	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-DE-20	DE	5/6/2011	EP11165079A	EP2392553	8/24/2016	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-DE-22	DE	5/6/2011	EP11165080A	EP2386531	11/9/2016	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-DE-25	DE	5/6/2011	EP16179677A	EP3116002	7/3/2019	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-EP-19	EP	5/6/2011	EP16179677A	EP3116002	7/3/2019	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-FR-21	FR	5/6/2011	EP11165079A	EP2392553	8/24/2016	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-FR-23	FR	5/6/2011	EP11165080A	EP2386531	11/9/2016	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-FR-24	FR	5/6/2011	EP16179677A	EP3116002	7/3/2019	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-IN-12	IN	4/28/2011	IN1254DE2011A	IN298303	7/6/2018	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-IN-6	IN	4/27/2011	IN1246DE2011A	IN412645	12/2/2022	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-JP-13	JP	5/9/2011	JP2011103929A	JP5813364	11/17/2015	Dielectric materials for power transmission systems	Dolby Intellectual Property Licensing, LLC	Active
238312-JP-7	JP	5/9/2011	JP2011103930A	JP5802050	10/28/2015	Dielectric materials for power transmission systems	Dolby Intellectual Property Licensing, LLC	Active

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238312-SG-14	SG	5/12/2011	SG2011034204A	SG176378	12/29/2011	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-SG-17	SG	11/5/2013	201308204-5	N/A	5/9/2017		Dolby Intellectual Property Licensing, LLC	Active
238312-SG-18	SG	11/4/2013	201308177-3	N/A	6/14/2017		Dolby Intellectual Property Licensing, LLC	Active
238312-US-1	US	5/12/2010	US12/778166	US9174876	11/3/2015	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238312-US-15	US	3/30/2011	US13/075911	US8968603	3/3/2015	Dielectric materials	Dolby Intellectual Property Licensing, LLC	Active
238312-US-16	US	3/30/2011	US13/075997	US8586495	11/19/2013	Dielectric materials	Dolby Intellectual Property Licensing, LLC	Active
238312-US-2	US	5/12/2010	US12/778189	US8968609	3/3/2015	Dielectric materials for power transfer system	Dolby Intellectual Property Licensing, LLC	Active
238320-US-1	US	3/19/2010	US12/727536	US8779726	7/15/2014	Control system and method for charging sealed batteries	Dolby Intellectual Property Licensing, LLC	Active
238346-CN-2	CN	8/17/2010	CN201010262686A	CN101995433	3/12/2014	Apparatus and method for bearing condition monitoring	Dolby Intellectual Property Licensing, LLC	Active
238346-JP-4	JP	8/13/2010	JP2010181183A	JP5693083	4/1/2015	Bearing state monitoring apparatus and method	Dolby Intellectual Property Licensing, LLC	Active
238346-US-1	US	8/17/2009	US12/542046	US8229682	7/24/2012	Apparatus and method for bearing condition monitoring	Dolby Intellectual Property Licensing, LLC	Active
238407-US-1	US	8/31/2009	US12/550521	US8182967	5/22/2012	Optical data storage media and methods for using the same	Dolby Intellectual Property Licensing, LLC	Active
238407-US-7	US	12/14/2010	US12/967409	US8178261	5/15/2012	Optical data storage media and methods for using the same	Dolby Intellectual Property Licensing, LLC	Active
238413-CN-2	CN	2/1/2011	CN201110062345A	CN102158917	6/8/2016	Switching between different vocoder systems	Dolby Intellectual Property Licensing, LLC	Active
238413-KR-4	KR	2/1/2011	KR2011000998A	KR101256316	4/18/2013	Handoffs between different voice encoder systems	Dolby Intellectual Property Licensing, LLC	Active
238413-US-1	US	2/3/2010	US12/699699	US8521520	8/27/2013	Handoffs between different voice encoder systems	Dolby Intellectual Property Licensing, LLC	Active
238414-CN-2	CN	3/10/2011	CN201110064382A	CN102195806	8/17/2016	Switching for many transmission technologies is measured	Dolby Intellectual Property Licensing, LLC	Active
238414-KR-4	KR	3/10/2011	KR20110021549A	KR101787754	10/18/2017	Handoff metric for multiple transmission technologies	Dolby Intellectual Property Licensing, LLC	Active
238414-US-1	US	3/10/2010	US12/721359	US8315630	11/20/2012	Handoff metric for multiple transmission technologies	Dolby Intellectual Property Licensing, LLC	Active
238414-US-5	US	11/5/2012	US13/669253	US8688124	4/1/2014	Handoff metric for multiple transmission technologies	Dolby Intellectual Property Licensing, LLC	Active
238668-CN-2	CN	7/21/2011	CN201110280532A	CN102377333	5/13/2015	Apparatus and system for power conversion	Dolby Intellectual Property Licensing, LLC	Active
238668-DE-8	DE	7/13/2011	EP11173778A	EP2416479	5/1/2019	Apparatus and system for power conversion	Dolby Intellectual Property Licensing, LLC	Active
238668-EP-3	EP	7/13/2011	EP11173778A	EP2416479	5/1/2019	Apparatus and system for power conversion	Dolby Intellectual Property Licensing, LLC	Active
238668-IN-4	IN	7/14/2011	IN1975DE2011A	IN332567	2/28/2020	Apparatus for power conversion in a power electronic system	Dolby Intellectual Property Licensing, LLC	Active
238668-JP-5	JP	7/13/2011	JP2011154366A	JP6088126	3/1/2017	Apparatus and system for power conversion	Dolby Intellectual Property Licensing, LLC	Active

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238668-US-1	US	7/21/2010	US12/840423	US8310083	11/13/2012	Apparatus and system for power conversion	Dolby Intellectual Property Licensing, LLC	Active
238668-US-6	US	11/5/2012	US13/668660	US8541904	9/24/2013	Apparatus and system for power conversion	Dolby Intellectual Property Licensing, LLC	Active
238727-US-1	US	12/15/2009	US12/637797	US8377593	2/19/2013	Energy storage device	Dolby Intellectual Property Licensing, LLC	Active
238727-US-3	US	9/14/2012	US13/617232	US8530090	9/10/2013	Energy storage device	Dolby Intellectual Property Licensing, LLC	Active
238780-CN-2	CN	12/21/2011	CN201110463346A	CN102623221	12/7/2016	Compositions and manufacture method	Dolby Intellectual Property Licensing, LLC	Active
238780-DE-6	DE	12/14/2011	EP11193469A	EP2468928	1/26/2022	Manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
238780-EP-3	EP	12/14/2011	EP11193469A	EP2468928	1/26/2022	Manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
238780-JP-4	JP	12/16/2011	JP2011275135A	JP5872278	3/1/2016	Method of forming a microelectromechanical system device	Dolby Intellectual Property Licensing, LLC	Active
238780-KR-5	KR	12/20/2011	KR20110138516A	KR101983854	5/29/2019	Method of forming a micro-electromechanical system device	Dolby Intellectual Property Licensing, LLC	Active
238780-US-1	US	12/21/2010	US12/975090	US8826529	9/9/2014	Method of forming a micro-electromechanical system device	Dolby Intellectual Property Licensing, LLC	Active
238789-CN-2	CN	11/30/2010	CN201010586673A	CN102082043	9/23/2015	Construction of switch	Dolby Intellectual Property Licensing, LLC	Active
238789-DE-6	DE	11/19/2010	EP10191932A	EP2328160	2/28/2018	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-FI-8	FI	11/19/2010	EP10191932A	EP2328160	2/28/2018	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-FR-7	FR	11/19/2010	EP10191932A	EP2328160	2/28/2018	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-GB-9	GB	11/19/2010	EP10191932A	EP2328160	2/28/2018	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-IT-10	IT	11/19/2010	EP10191932A	EP2328160	2/28/2018	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-JP-4	JP	11/10/2010	JP2010251379A	JP5829804	12/9/2015	Switch structure	Dolby Intellectual Property Licensing, LLC	Active
238789-KR-5	KR	11/29/2010	KR20100119651A	KR101745725	6/9/2017	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-SE-11	SE	11/19/2010	EP10191932A	EP2328160	2/28/2018	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238789-US-1	US	11/30/2009	US12/627476	US8779886	7/15/2014	Switch structures	Dolby Intellectual Property Licensing, LLC	Active
238794-CN-2	CN	9/21/2010	CN201010500702A	CN102034648	6/25/2014	Switch structure and method	Dolby Intellectual Property Licensing, LLC	Active
238794-DE-6	DE	9/17/2010	EP10177345A	EP2315221	11/14/2012	Switch structure and method	Dolby Intellectual Property Licensing, LLC	Active
238794-FR-7	FR	9/17/2010	EP10177345A	EP2315221	11/14/2012	Switch structure and method	Dolby Intellectual Property Licensing, LLC	Active
238794-IT-9	IT	9/17/2010	EP10177345A	EP2315221	11/14/2012	Switch structure and method	Dolby Intellectual Property Licensing, LLC	Active

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238794-KR-5	KR	9/17/2010	KR20100091557A	KR101734547	5/11/2017	Switch structure and method	Dolby Intellectual Property Licensing, LLC	Active
238794-US-1	US	9/23/2009	US12/565127	US8354899	1/15/2013	Switch structure and method	Dolby Intellectual Property Licensing, LLC	Active
238894-CN-1	CN	11/2/2011	CN201110341544A	CN103094585	3/16/2016	Electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
238894-US-2	US	12/27/2012	US13/727666	US9159980	10/13/2015	Electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
239040-CN-2	CN	12/15/2010	CN201010616094A	CN102104280	5/18/2016	Use and share equipment and the method that power electronic devices is carried out quick charge	Dolby Intellectual Property Licensing, LLC	Active
239040-DE-7	DE	12/14/2010	EP10194998A	EP2337183	7/23/2014	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-FR-8	FR	12/14/2010	EP10194998A	EP2337183	7/23/2014	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-GB-9	GB	12/14/2010	EP10194998A	EP2337183	7/23/2014	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-JP-4	JP	12/15/2010	JP2010278693A	JP5651456	1/14/2015	Rapid charging apparatus and method using shared electric and electronic equipment	Dolby Intellectual Property Licensing, LLC	Active
239040-US-1	US	12/18/2009	US12/641359	US8698451	4/15/2014	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-US-10	US	9/14/2016	US15/265404	US9914365	3/13/2018	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-US-11	US	9/19/2017	US15/708859	US10377259	8/13/2019	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-US-12	US	2/18/2019	US16/278379	US10543755	1/28/2020	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-US-13	US	12/16/2019	US16/715508	US11400820	8/2/2022	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-US-15	US	10/31/2022	US17/977204	US11884168	1/30/2024	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239040-US-6	US	3/19/2014	US14/219201	US9789780	10/17/2017	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
239053-CN-2	CN	4/8/2011	CN201110093550A	CN102215508	12/14/2016	Without dividing duplex network	Dolby Intellectual Property Licensing, LLC	Active
239053-DE-5	DE	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-FI-6	FI	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-FR-7	FR	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-GB-8	GB	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-KR-4	KR	4/8/2011	KR20110032639A	KR101836486	3/8/2018	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-LU-9	LU	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-NL-10	NL	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active

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239053-SE-11	SE	4/4/2011	EP11160945A	EP2375620	6/8/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239053-US-1	US	4/9/2010	US12/757721	US9369260	6/14/2016	Division free duplexing networks	Dolby Intellectual Property Licensing, LLC	Active
239322-CN-2	CN	8/27/2010	CN201010272850A	CN102006006	10/2/2013	System and method for non-sinusoidal current waveform excitation of electrical machines	Dolby Intellectual Property Licensing, LLC	Active
239322-DE-6	DE	8/20/2010	EP10173623A	EP2290810	6/25/2014	System and method for non-sinusoidal current waveform excitation of electrical machines	Dolby Intellectual Property Licensing, LLC	Active
239322-FR-7	FR	8/20/2010	EP10173623A	EP2290810	6/25/2014	System and method for non-sinusoidal current waveform excitation of electrical machines	Dolby Intellectual Property Licensing, LLC	Active
239322-GB-8	GB	8/20/2010	EP10173623A	EP2290810	6/25/2014	System and method for non-sinusoidal current waveform excitation of electrical machines	Dolby Intellectual Property Licensing, LLC	Active
239322-IN-4	IN	8/13/2010	IN1912DE2010A	IN424264	3/10/2023	System and method for nonsinusoidal current waveform	Dolby Intellectual Property Licensing, LLC	Active
239322-JP-5	JP	8/24/2010	JP2010186779A	JP5674383	2/25/2015	System and method for exciting an electrical machine with an unrestricted current waveform	Dolby Intellectual Property Licensing, LLC	Active
239322-US-1	US	8/28/2009	US12/549437	US8222855	7/17/2012	System and method for non-sinusoidal current waveform excitation of electrical machines	Dolby Intellectual Property Licensing, LLC	Active
239382-CN-12	CN	6/29/2011	CN201510490106A	CN105006935	11/17/2017	The system and method for the non-sinusoidal current waveform stimulus of generator	Dolby Intellectual Property Licensing, LLC	Active
239382-CN-2	CN	6/29/2011	CN201110191425A	CN102315811	9/16/2015	The system and method for the non-sinusoidal current waveform stimulus of generator	Dolby Intellectual Property Licensing, LLC	Active
239382-DE-6	DE	6/22/2011	EP11170924A	EP2403129	8/13/2014	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239382-FR-7	FR	6/22/2011	EP11170924A	EP2403129	8/13/2014	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239382-GB-8	GB	6/22/2011	EP11170924A	EP2403129	8/13/2014	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239382-IN-4	IN	6/13/2011	IN1672DE2011A	IN413958	12/9/2022	System and method for non-sinusoidal current waveform	Dolby Intellectual Property Licensing, LLC	Active
239382-IT-10	IT	6/22/2011	EP11170924A	EP2403129	8/13/2014	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239382-SE-9	SE	6/22/2011	EP11170924A	EP2403129	8/13/2014	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239382-US-1	US	6/29/2010	US12/826076	US8901896	12/2/2014	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239382-US-11	US	11/19/2014	US14/547315	US9118271	8/25/2015	System and method for non-sinusoidal current waveform excitation of electrical generators	Dolby Intellectual Property Licensing, LLC	Active
239428-CN-2	CN	8/11/2010	CN201010260530A	CN101992678	7/30/2014	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
239428-DE-7	DE	7/27/2010	EP10170852A	EP2284037	10/11/2023	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
239428-EP-3	EP	7/27/2010	EP10170852A	EP2284037	10/11/2023	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
239428-IN-4	IN	7/28/2010	IN1764DE2010A	IN327160	12/13/2019	System for multiple energy storage and management and	Dolby Intellectual Property Licensing, LLC	Active
239428-JP-5	JP	8/9/2010	JP2010178267A	JP5674379	2/25/2015	System for storing and managing a plurality of energies and method for producing the same	Dolby Intellectual Property Licensing, LLC	Active

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239428-US-1	US	8/11/2009	US12/539056	US8026638	9/27/2011	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
239428-US-6	US	9/2/2011	US13/224669	US8922057	12/30/2014	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
239449-CN-3	CN	8/31/2010	CN201010277436A	CN102005789	4/15/2015	Apparatus for transferring energy using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
239449-DE-9	DE	8/25/2010	EP10174013A	EP2290778	4/7/2021	Apparatus for transferring energy using onboard power electronics	Dolby Intellectual Property Licensing, LLC	Active
239449-EP-4	EP	8/25/2010	EP10174013A	EP2290778	4/7/2021	Apparatus for transferring energy using onboard power electronics	Dolby Intellectual Property Licensing, LLC	Active
239449-JP-6	JP	8/31/2010	JP2010193001A	JP6068778	1/25/2017	Device for transmitting energy using in-vehicle power electronics and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
239449-JP-8	JP	11/26/2015	JP2015230270A	JP6228586	11/8/2017	Electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
239449-US-1	US	8/31/2009	US12/550504	US8030884	10/4/2011	Apparatus for transferring energy using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
239449-US-2	US	8/31/2009	US12/550536	US8421271	4/16/2013	Apparatus for transferring energy using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
239449-US-7	US	5/2/2011	US13/099053	US8487582	7/16/2013	Apparatus for transferring energy using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
239451-CN-12	CN	7/22/2011	CN201610626550A	CN106067712	1/22/2019	High power density, high efficiency, non-permanent magnet motor	Dolby Intellectual Property Licensing, LLC	Active
239451-CN-2	CN	7/22/2011	CN201110218620A	CN102347648	8/31/2016	High power density, high efficiency, non-permanent magnet motor	Dolby Intellectual Property Licensing, LLC	Active
239451-DE-7	DE	7/14/2011	EP11173959A	EP2410639	6/11/2014	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-FR-8	FR	7/14/2011	EP11173959A	EP2410639	6/11/2014	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-GB-9	GB	7/14/2011	EP11173959A	EP2410639	6/11/2014	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-IN-4	IN	7/6/2011	IN1912DEL2011A	IN334754	3/20/2020	Non-permanent magnet electric machine having high	Dolby Intellectual Property Licensing, LLC	Active
239451-IT-10	IT	7/14/2011	EP11173959A	EP2410639	6/11/2014	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-JP-5	JP	7/21/2011	JP2011159450A	JP5877968	3/8/2016	High power density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-SE-11	SE	7/14/2011	EP11173959A	EP2410639	6/11/2014	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-US-1	US	7/23/2010	US12/842142	US8310115	11/13/2012	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
239451-US-6	US	9/7/2012	US13/606080	US8587164	11/19/2013	High power-density, high efficiency, non-permanent magnet electric machine	Dolby Intellectual Property Licensing, LLC	Active
241038-CN-2	CN	1/4/2012	CN201210012987A	CN102594222	12/14/2016	Power switch system including mems (mems) array	Dolby Intellectual Property Licensing, LLC	Active

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241038-DE-6	DE	12/22/2011	EP11195092A	EP2472717	11/20/2019	Power switching system including a micro-electromechanical system (mems) array	Dolby Intellectual Property Licensing, LLC	Active
241038-EP-3	EP	12/22/2011	EP11195092A	EP2472717	11/20/2019	Power switching system including a micro-electromechanical system (mems) array	Dolby Intellectual Property Licensing, LLC	Active
241038-KR-5	KR	1/4/2012	KR20120000807A	KR101848096	5/28/2018	Power switching system including a micro-electromechanical system(mems) array	Dolby Intellectual Property Licensing, LLC	Active
241038-US-1	US	1/4/2011	US12/984338	US8350509	1/8/2013	Power switching system including a micro-electromechanical system (mems) array	Dolby Intellectual Property Licensing, LLC	Active
241238-US-1	US	8/29/2011	US13/219779	US8740793	6/3/2014	Radar based systems and methods for monitoring a subject	Dolby Intellectual Property Licensing, LLC	Active
241400-US-1	US	4/21/2010	US12/764765	US8453032	5/28/2013	Energy and space efficient detection for data storage	Dolby Intellectual Property Licensing, LLC	Active
241407-CN-2	CN	4/14/2011	CN201110102152A	CN102223643	10/21/2015	Use general method and communication system without dividing duplex	Dolby Intellectual Property Licensing, LLC	Active
241407-DE-5	DE	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-FI-7	FI	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-FR-6	FR	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-GB-8	GB	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-KR-4	KR	4/14/2011	KR20110034664A	KR101889551	8/17/2018	Generalized division free duplexing techniques for decreasing rendezvous time	Dolby Intellectual Property Licensing, LLC	Active
241407-LU-9	LU	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-NL-10	NL	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-SE-11	SE	4/11/2011	EP11161812A	EP2378731	3/30/2016	Communication method for cognitive radio	Dolby Intellectual Property Licensing, LLC	Active
241407-US-1	US	4/15/2010	US12/761129	US8379584	2/19/2013	Generalized division free duplexing techniques for decreasing rendezvous time	Dolby Intellectual Property Licensing, LLC	Active
241411-CN-2	CN	3/22/2011	CN201110080204A	CN102324943	8/3/2016	Dynamic and configurable sensor chassis	Dolby Intellectual Property Licensing, LLC	Active
241497-US-1	US	12/16/2009	US12/639060	US8054589	11/8/2011	Switch structure and associated circuit	Dolby Intellectual Property Licensing, LLC	Active
241504-US-1	US	11/13/2009	US12/617986	US8338055	12/25/2012	System and method for electrochemical energy conversion and storage	Dolby Intellectual Property Licensing, LLC	Active
241826-CN-2	CN	2/25/2011	CN201110045577A	CN102170185	1/6/2016	For the rotor structure of interior permanent magnet electromotive machine	Dolby Intellectual Property Licensing, LLC	Active
241826-IN-4	IN	2/17/2011	IN474DEL2011A	IN328880	1/10/2020	Rotor structure for interior permanent magnet	Dolby Intellectual Property Licensing, LLC	Active
241826-US-1	US	2/26/2010	US12/713242	US8541919	9/24/2013	Rotor structure for interior permanent magnet electromotive machine including laminations profiled along a segment of a bridge to define a concave and curved bridge profile	Dolby Intellectual Property Licensing, LLC	Active
241843-CN-2	CN	6/17/2011	CN201110175517A	CN102394199	11/25/2015	There is the mems switch array being arranged to the substrate conducting switching current	Dolby Intellectual Property Licensing, LLC	Active

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241843-DE-5	DE	6/14/2011	EP1169822A	EP2398028	8/12/2015	Mems switching array having a substrate arranged to conduct switching current	Dolby Intellectual Property Licensing, LLC	Active
241843-JP-4	JP	6/10/2011	JP2011129654A	JP5802060	10/28/2015	Mems switching array having a substrate configured to conduct switching current	Dolby Intellectual Property Licensing, LLC	Active
241843-US-1	US	6/17/2010	US12/817578	US8576029	11/5/2013	Mems switching array having a substrate arranged to conduct switching current	Dolby Intellectual Property Licensing, LLC	Active
242316-US-1	US	6/6/2011	US13/154231	US9030921	5/12/2015	Increased spectral efficiency and reduced synchronization delay with bundled transmissions	Dolby Intellectual Property Licensing, LLC	Active
242316-US-2	US	4/7/2015	US14/680805	US9355670	5/31/2016	Increased spectral efficiency and reduced synchronization delay with bundled transmissions	Dolby Intellectual Property Licensing, LLC	Active
242399-CN-3	CN	5/27/2011	CN201110161393A	CN102263466	1/6/2016	Motor rotor conducting bar and manufacture method thereof	Dolby Intellectual Property Licensing, LLC	Active
242399-DE-8	DE	5/25/2011	EP1167545A	EP2390987	5/4/2022	Electric machine rotor bar and method of making same	Dolby Intellectual Property Licensing, LLC	Active
242399-EP-4	EP	5/25/2011	EP1167545A	EP2390987	5/4/2022	Electric machine rotor bar and method of making same	Dolby Intellectual Property Licensing, LLC	Active
242399-IN-5	IN	5/12/2011	IN1405DE2011A	IN423284	3/3/2023	Electric machine rotor bar and method of making same	Dolby Intellectual Property Licensing, LLC	Active
242399-JP-2	JP	5/18/2011	JP2011110894A	JP5997880	9/28/2016	Electric machine rotor bar and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
242399-JP-7	JP	10/28/2015	JP2015211574A	JP6106246	3/29/2017	Electric machine rotor bar and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
242399-US-1	US	5/28/2010	US12/789580	US8274190	9/25/2012	Electric machine rotor bar and method of making same	Dolby Intellectual Property Licensing, LLC	Active
242399-US-6	US	7/23/2012	US13/555363	US9438077	9/6/2016	Electric machine rotor bar and method of making same	Dolby Intellectual Property Licensing, LLC	Active
242485-CH-9	CH	3/16/2012	EP12712027A	EP2688643	3/13/2019	System and method for contactless power transfer in implantable devices	Dolby Intellectual Property Licensing, LLC	Active
242485-CN-5	CN	3/16/2012	CN201280014305A	CN103517735	1/20/2016	For the system and method for non-contact power transfer in implantable device	Dolby Intellectual Property Licensing, LLC	Active
242485-DE-8	DE	3/16/2012	EP12712027A	EP2688643	3/13/2019	System and method for contactless power transfer in implantable devices	Dolby Intellectual Property Licensing, LLC	Active
242485-EP-3	EP	3/16/2012	EP12712027A	EP2688643	3/13/2019	System and method for contactless power transfer in implantable devices	Dolby Intellectual Property Licensing, LLC	Active
242485-FR-7	FR	3/16/2012	EP12712027A	EP2688643	3/13/2019	System and method for contactless power transfer in implantable devices	Dolby Intellectual Property Licensing, LLC	Active
242485-JP-4	JP	3/16/2012	JP2014501153A	JP5990252	9/7/2016	System and method for contactless power transfer in an implantable device	Dolby Intellectual Property Licensing, LLC	Active
242485-KR-6	KR	3/16/2012	KR20137024950A	KR102013964	8/23/2019	System and method for contactless power transfer in implantable devices	Dolby Intellectual Property Licensing, LLC	Active
242485-US-1	US	3/21/2011	US13/052196	US8849402	9/30/2014	System and method for contactless power transfer in implantable devices	Dolby Intellectual Property Licensing, LLC	Active
242491-CN-3	CN	12/19/2012	CN201210553324A	CN103177742	6/20/2017	For the method and system decoded to data	Dolby Intellectual Property Licensing, LLC	Active
242491-CN-8	CN	12/19/2012	CN201210553273A	CN103177741	3/13/2018	For the method and system decoded to data	Dolby Intellectual Property Licensing, LLC	Active
242491-DE-14	DE	12/11/2012	EP12196532A	EP2608204	7/15/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active

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242491-DE-18	DE	12/11/2012	EP12196490A	EP2608203	6/24/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-EP-4	EP	12/11/2012	EP12196532A	EP2608204	7/15/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-EP-9	EP	12/11/2012	EP12196490A	EP2608203	6/24/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-FR-13	FR	12/11/2012	EP12196532A	EP2608204	7/15/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-FR-17	FR	12/11/2012	EP12196490A	EP2608203	6/24/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-GB-16	GB	12/11/2012	EP12196532A	EP2608204	7/15/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-GB-20	GB	12/11/2012	EP12196490A	EP2608203	6/24/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-JP-10	JP	12/12/2012	JP2012270873A	JP6169842	7/26/2017	Method and system for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-JP-5	JP	12/12/2012	JP2012270874A	JP6138474	5/31/2017	Method and system for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-KR-11	KR	12/20/2012	KR20120149043A	KR101995592	7/2/2019	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-KR-6	KR	12/20/2012	KR20120149061A	KR102002649	7/22/2019	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-NL-15	NL	12/11/2012	EP12196532A	EP2608204	7/15/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-NL-19	NL	12/11/2012	EP12196490A	EP2608203	6/24/2020	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-TW-12	TW	12/18/2012	TW101148138A	TW1588822	6/21/2017	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-TW-7	TW	12/18/2012	TW101148141A	TW1597722	9/1/2017	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-US-1	US	12/20/2011	US13/331625	US8493246	7/23/2013	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242491-US-2	US	12/20/2011	US13/331708	US8493247	7/23/2013	Methods and systems for decoding data	Dolby Intellectual Property Licensing, LLC	Active
242643-CN-2	CN	4/5/2012	CN201210107782A	CN102730620	12/14/2016	For improving the system and method for mems device reliability	Dolby Intellectual Property Licensing, LLC	Active
242643-DE-3	DE	3/29/2012	DE102012102727A	DE102012102727	5/17/2023	Systems and methods for increasing operational reliability of mems devices	Dolby Intellectual Property Licensing, LLC	Active
242643-US-1	US	3/31/2011	US13/077704	US8638093	1/28/2014	Systems and methods for enhancing reliability of mems devices	Dolby Intellectual Property Licensing, LLC	Active
242864-BR-2	BR	11/4/2011	BRPI1104811A	BRPI1104811	8/3/2021	Energy and storage control system	Dolby Intellectual Property Licensing, LLC	Active
242864-CN-3	CN	11/7/2011	CN201110381828A	CN102452325	9/16/2015	For to the equipment of electric vehicle charging and method	Dolby Intellectual Property Licensing, LLC	Active
242864-CN-7	CN	11/7/2011	CN201510494062A	CN105034830	4/6/2018	For the apparatus and method to electric vehicle charging	Dolby Intellectual Property Licensing, LLC	Active
242864-DE-12	DE	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active

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242864-DE-19	DE	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-EP-17	EP	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-EP-4	EP	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-ES-14	ES	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-ES-22	ES	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-FR-11	FR	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-FR-18	FR	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-GB-16	GB	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-GB-24	GB	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-IN-5	IN	10/31/2011	IN3091DE2011A	IN426417	3/24/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-IT-13	IT	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-IT-20	IT	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-JP-10	JP	7/2/2019	JP2019123413A	JP7051758	4/11/2022	The apparatus and method which charges an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-JP-6	JP	11/1/2011	JP2011239869A	JP5908254	4/26/2016	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-JP-8	JP	10/6/2015	JP2015198092A	JP6188090	8/30/2017	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-JP-9	JP	8/1/2017	JP2017148827A	JP6553133	7/31/2019	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-NL-21	NL	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-TR-15	TR	11/1/2011	EP11187387A	EP2450221	8/18/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-TR-23	TR	11/1/2011	EP21191611A	EP3981638	12/27/2023	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242864-US-1	US	11/5/2010	US12/940085	US8378623	2/19/2013	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
242903-CH-5	CH	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
242903-CN-2	CN	11/3/2011	CN201110365774A	CN102545136	5/18/2016	Based on the switching system of mems	Dolby Intellectual Property Licensing, LLC	Active
242903-DE-6	DE	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
242903-FI-8	FI	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active

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242903-FR-7	FR	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
242903-GB-9	GB	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
242903-IT-10	IT	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
242903-JP-4	JP	10/31/2011	JP2011238092A	JP5806589	11/10/2015	Mems switching system	Dolby Intellectual Property Licensing, LLC	Active
242903-SE-11	SE	10/31/2011	EP11187315A	EP2450927	1/4/2017	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
242903-US-1	US	11/4/2010	US12/940027	US8537507	9/17/2013	Mems-based switching systems	Dolby Intellectual Property Licensing, LLC	Active
243031-US-1	US	12/22/2011	US13/335175	US8842287	9/23/2014	System and method for auto-focusing in optical coherence tomography	Dolby Intellectual Property Licensing, LLC	Active
243227-US-1	US	10/27/2011	US13/283142	US9083024	7/14/2015	Stack design for na niel battery	Dolby Intellectual Property Licensing, LLC	Active
243942-CN-3	CN	11/18/2011	CN201110385885A	CN102570967	7/6/2016	Low inductance, high efficiency induction machine and manufacture method thereof	Dolby Intellectual Property Licensing, LLC	Active
243942-IN-5	IN	9/19/2011	IN2708DE2011A	IN334026	3/13/2020	An electric drive system comprising an induction motor, a	Dolby Intellectual Property Licensing, LLC	Active
243942-US-1	US	11/19/2010	US12/949882	US9685900	6/20/2017	Low-inductance, high-efficiency induction machine and method of making same	Dolby Intellectual Property Licensing, LLC	Active
243944-BR-2	BR	11/17/2011	BRP11104890A	BRP11104890	12/8/2020	Electrical control system	Dolby Intellectual Property Licensing, LLC	Active
243944-CN-3	CN	11/18/2011	CN201110457017A	CN102545774	3/30/2018	High power density, high back-emf magneto and its manufacture method	Dolby Intellectual Property Licensing, LLC	Active
243944-CN-9	CN	11/18/2011	CN201810153887A	CN108306573	4/12/2022	High power density, high anti emf permanent magnet motor and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
243944-DE-11	DE	11/15/2011	EP11189127A	EP2456065	11/14/2018	High power-density, high back emf permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
243944-EP-4	EP	11/15/2011	EP11189127A	EP2456065	11/14/2018	High power-density, high back emf permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
243944-FR-10	FR	11/15/2011	EP11189127A	EP2456065	11/14/2018	High power-density, high back emf permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
243944-GB-12	GB	11/15/2011	EP11189127A	EP2456065	11/14/2018	High power-density, high back emf permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
243944-IN-5	IN	11/18/2011	IN3297DE2011A	IN360536	3/12/2021	High power-density, high back emf permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
243944-US-1	US	11/19/2010	US12/949925	US9780716	10/3/2017	High power-density, high back emf permanent magnet machine and method of making same	Dolby Intellectual Property Licensing, LLC	Active
243944-US-7	US	4/20/2017	US15/492544	US10946748	3/16/2021	High power-density, high back emf permanent magnet machine and method of making same	Dolby Intellectual Property Licensing, LLC	Active
243956-CN-3	CN	11/18/2011	CN201110385851A	CN102545479	3/1/2017	Integrated motor and silicon carbide power rod changer assembly and its manufacture method	Dolby Intellectual Property Licensing, LLC	Active
243963-CN-2	CN	5/27/2011	CN201110139784A	CN102263470	8/19/2015	High-speed self-cascaded electric machine	Dolby Intellectual Property Licensing, LLC	Active
243963-IN-3	IN	5/11/2011	IN1390DE2011A	IN358810	2/26/2021	High speed self cascaded electric machine	Dolby Intellectual Property Licensing, LLC	Active

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243963-JP-4	JP	5/20/2011	JP2011112985A	JP5869779	2/24/2016	High speed self cascaded electrical machine	Dolby Intellectual Property Licensing, LLC	Active
243963-US-1	US	5/28/2010	US12/790349	US8115434	2/14/2012	High-speed self-cascaded electric machine	Dolby Intellectual Property Licensing, LLC	Active
244088-US-1	US	8/13/2010	US12/855919	US9059484	6/16/2015	Rechargeable electrochemical cell and method of manufacturing a rechargeable electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
244092-CN-2	CN	7/27/2012	CN201210263056A	CN102904168	8/8/2017	Distribution system	Dolby Intellectual Property Licensing, LLC	Active
244092-FR-7	FR	7/26/2012	EP12178134A	EP2551866	4/2/2014	Electrical distribution system	Dolby Intellectual Property Licensing, LLC	Active
244092-GB-8	GB	7/26/2012	EP12178134A	EP2551866	4/2/2014	Electrical distribution system	Dolby Intellectual Property Licensing, LLC	Active
244092-IT-6	IT	7/26/2012	EP12178134A	EP2551866	4/2/2014	Electrical distribution system	Dolby Intellectual Property Licensing, LLC	Active
244092-JP-4	JP	7/25/2012	JP2012164288A	JP5973274	8/23/2016	Electric distribution system	Dolby Intellectual Property Licensing, LLC	Active
244092-US-1	US	7/29/2011	US13/194002	US8916996	12/23/2014	Electrical distribution system	Dolby Intellectual Property Licensing, LLC	Active
244295-US-1	US	4/16/2010	US12/761597	US8516302	8/20/2013	Automatic error control scheme selection for fixed-length messages based upon message payload size	Dolby Intellectual Property Licensing, LLC	Active
244409-US-1	US	9/24/2010	US12/889663	US8600123	12/3/2013	System and method for contactless multi-fingerprint collection	Dolby Intellectual Property Licensing, LLC	Active
244409-US-2	US	10/17/2013	US14/056256	US9342728	5/17/2016	System and method for contactless multi-fingerprint collection	Dolby Intellectual Property Licensing, LLC	Active
245157-US-1	US	12/22/2010	US12/976453	US8852786	10/7/2014	Ceramic-metal sealing structure, and associated method	Dolby Intellectual Property Licensing, LLC	Active
245295-US-1	US	12/14/2010	US12/967291	US8778568	7/15/2014	Optical data storage media and methods for using the same	Dolby Intellectual Property Licensing, LLC	Active
245866-US-1	US	12/15/2010	US12/968510	US8674218	3/18/2014	Restraint system for an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
246173-US-1	US	12/21/2010	US12/974512	US8665591	3/4/2014	Systems and methods to thermally manage electronic devices	Dolby Intellectual Property Licensing, LLC	Active
246181-US-1	US	1/11/2011	US13/004757	US8749237	6/10/2014	Optically controlled mems switch and method of using the same	Dolby Intellectual Property Licensing, LLC	Active
246181-US-2	US	3/4/2014	US14/196235	US9676613	6/13/2017	Optically controlled mems switch and method of using the same	Dolby Intellectual Property Licensing, LLC	Active
246390-CN-1	CN	8/9/2012	CN201210281434A	CN103579689	12/16/2015	The manufacture method of electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
246484-BR-2	BR	11/3/2011	BRPI1104833A	BRPI1104833	6/2/2020	Electronic energy driving circuit	Dolby Intellectual Property Licensing, LLC	Active
246484-CN-3	CN	11/7/2011	CN201110379597A	CN102457089	6/15/2016	Use equipment and the manufacture method thereof of the onboard power electronics transfer energy with high-frequency transformer isolation	Dolby Intellectual Property Licensing, LLC	Active
246484-CN-8	CN	11/7/2011	CN201610329902A	CN106026318	12/31/2019	Device for transferring energy using on-board power electronics with high-frequency transformer isolation and method for manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
246484-DE-10	DE	11/1/2011	EP11187389A	EP2450222	10/2/2019	Apparatus for transferring energy using onboard power electronics with high-frequency transformer isolation and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active

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246484-EP-4	EP	11/1/2011	EP11187389A	EP2450222	10/2/2019	Apparatus for transferring energy using onboard power electronics with high-frequency transformer isolation and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
246484-FR-9	FR	11/1/2011	EP11187389A	EP2450222	10/2/2019	Apparatus for transferring energy using onboard power electronics with high-frequency transformer isolation and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
246484-IN-5	IN	11/2/2011	IN3123DE201A	IN334354	3/13/2020	Apparatus for transferring energy using onboard power	Dolby Intellectual Property Licensing, LLC	Active
246484-JP-6	JP	10/31/2011	JP2011238096A	JP6093497	3/8/2017	Apparatus for energy transfer using on-board power electronic circuit with high frequency transformer isolation and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
246484-US-1	US	11/5/2010	US12/940110	US9290097	3/22/2016	Apparatus for transferring energy using onboard power electronics with high-frequency transformer isolation and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
246484-US-7	US	3/17/2016	US15/073061	US10454290	10/22/2019	Apparatus for transferring energy using onboard power electronics with high-frequency transformer isolation and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
246498-US-1	US	12/22/2011	US13/335211	US9273950	3/1/2016	System and method for auto-ranging in optical coherence tomography	Dolby Intellectual Property Licensing, LLC	Active
246687-US-1	US	1/14/2011	US13/007123	US8697279	4/15/2014	Composition and energy storage device	Dolby Intellectual Property Licensing, LLC	Active
246740-US-1	US	5/31/2011	US13/118663	US9027236	5/12/2015	Resonator structures and method of making	Dolby Intellectual Property Licensing, LLC	Active
246897-US-1	US	9/29/2011	US13/248671	US9306195	4/5/2016	Electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
246939-CA-3	CA	12/22/2011	CA2762711A	CA2762711	1/8/2019	Electric motor structure to minimize electro-magnetic interference	Dolby Intellectual Property Licensing, LLC	Active
246939-US-1	US	12/23/2010	US12/977800	US9343939	5/17/2016	Electric motor structure to minimize electro-magnetic interference	Dolby Intellectual Property Licensing, LLC	Active
246995-CN-1	CN	12/8/2011	CN201110404956A	CN103165900	3/30/2016	A kind of alkali metal-metal halide battery	Dolby Intellectual Property Licensing, LLC	Active
247031-US-1	US	11/17/2011	US13/299021	US8580463	11/12/2013	Reactants for optical data storage media and methods for use	Dolby Intellectual Property Licensing, LLC	Active
247141-US-1	US	1/31/2011	US13/017551	US9153844	10/6/2015	System and methods of using a sodium metal halide cell	Dolby Intellectual Property Licensing, LLC	Active
247243-IN-3	IN	12/22/2011	IN3785DE201A	IN348971	10/16/2020	Composition, energy storage device, and related processes	Dolby Intellectual Property Licensing, LLC	Active
247243-US-1	US	12/23/2010	US12/977471	US8603671	12/10/2013	Composition, energy storage device, and related processes	Dolby Intellectual Property Licensing, LLC	Active
247255-CN-2	CN	4/18/2012	CN201210129883A	CN102799492	2/9/2018	System, method and apparatus for solving error in systems	Dolby Intellectual Property Licensing, LLC	Active
247255-DE-6	DE	4/16/2012	EP12164343A	EP2515234	6/17/2020	System, method, and apparatus for resolving errors in a system	Dolby Intellectual Property Licensing, LLC	Active
247255-EP-3	EP	4/16/2012	EP12164343A	EP2515234	6/17/2020	System, method, and apparatus for resolving errors in a system	Dolby Intellectual Property Licensing, LLC	Active
247255-FR-5	FR	4/16/2012	EP12164343A	EP2515234	6/17/2020	System, method, and apparatus for resolving errors in a system	Dolby Intellectual Property Licensing, LLC	Active
247255-GB-7	GB	4/16/2012	EP12164343A	EP2515234	6/17/2020	System, method, and apparatus for resolving errors in a system	Dolby Intellectual Property Licensing, LLC	Active

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247255-US-1	US	4/18/2011	US13/089002	US8862938	10/14/2014	System, method, and apparatus for resolving errors in a system	Dolby Intellectual Property Licensing, LLC	Active
247550-CN-4	CN	7/13/2016	CN201610548900A	CN106356572	12/22/2020	Electrochemical cell comprising a conductive matrix	Dolby Intellectual Property Licensing, LLC	Active
247550-KR-5	KR	7/8/2016	KR20160086687A	KR101941655	1/24/2019	Electrochemical cells including a conductive matrix	Dolby Intellectual Property Licensing, LLC	Active
247550-US-3	US	7/13/2015	US14/797679	US9577297	2/21/2017	Electrochemical cells including a conductive matrix	Dolby Intellectual Property Licensing, LLC	Active
247784-CH-7	CH	6/6/2012	EP12171099A	EP2672562	8/8/2018	Systems and methods for predicting battery power-delivery performance	Dolby Intellectual Property Licensing, LLC	Active
247784-CN-2	CN	6/8/2012	CN201210336184A	CN103487755	2/17/2016	For predicting the system and method for power of battery transmission performance	Dolby Intellectual Property Licensing, LLC	Active
247784-DE-6	DE	6/6/2012	EP12171099A	EP2672562	8/8/2018	Systems and methods for predicting battery power-delivery performance	Dolby Intellectual Property Licensing, LLC	Active
247784-EP-3	EP	6/6/2012	EP12171099A	EP2672562	8/8/2018	Systems and methods for predicting battery power-delivery performance	Dolby Intellectual Property Licensing, LLC	Active
247784-FR-5	FR	6/6/2012	EP12171099A	EP2672562	8/8/2018	Systems and methods for predicting battery power-delivery performance	Dolby Intellectual Property Licensing, LLC	Active
247784-GB-8	GB	6/6/2012	EP12171099A	EP2672562	8/8/2018	Systems and methods for predicting battery power-delivery performance	Dolby Intellectual Property Licensing, LLC	Active
247784-JP-4	JP	6/7/2012	JP2012129409A	JP5674713	2/25/2015	System and method for predicting battery power supply performance	Dolby Intellectual Property Licensing, LLC	Active
247784-US-1	US	4/27/2011	US13/095743	US8872481	10/28/2014	Systems and methods for predicting battery power-delivery performance	Dolby Intellectual Property Licensing, LLC	Active
248221-DE-8	DE	3/28/2012	EP12161924A	EP2506189	11/27/2019	Apparatus for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248221-EP-2	EP	3/28/2012	EP12161924A	EP2506189	11/27/2019	Apparatus for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248221-FR-7	FR	3/28/2012	EP12161924A	EP2506189	11/27/2019	Apparatus for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248221-GB-9	GB	3/28/2012	EP12161924A	EP2506189	11/27/2019	Apparatus for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248221-JP-3	JP	3/28/2012	JP2012072648A	JP5928792	6/1/2016	Apparatus and method for non-contact high resolution bill capture	Dolby Intellectual Property Licensing, LLC	Active
248221-SG-5	SG	3/22/2012	SG10201405993WA	SG10201405993W	11/27/2014	Apparatus and method for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248221-US-1	US	3/30/2011	US13/075694	US8971588	3/3/2015	Apparatus and method for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248221-US-6	US	2/18/2015	US14/624639	US9536127	1/3/2017	Apparatus and method for contactless high resolution handprint capture	Dolby Intellectual Property Licensing, LLC	Active
248672-US-1	US	9/30/2011	US13/249830	US8816635	8/26/2014	Charging system using sodium level control in individual sealed anode tubes	Dolby Intellectual Property Licensing, LLC	Active
248678-BR-2	BR	3/22/2012	BR102012006427A	BR102012006427	9/24/2020	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
248678-CN-3	CN	3/23/2012	CN201210162119A	CN102689603	3/1/2017	For supplying system and its manufacture method of promotion energy from process auxiliary drive	Dolby Intellectual Property Licensing, LLC	Active
248678-CN-7	CN	3/23/2012	CN201611198513A	CN106956593	11/29/2019	For the system and its manufacturing method from auxiliary drive supply promotion energy	Dolby Intellectual Property Licensing, LLC	Active

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248678-DE-8	DE	3/22/2012	EP12160730A	EP2502773	6/12/2019	System for supplying propulsion energy from an auxiliary drive and method of making same	Dolby Intellectual Property Licensing, LLC	Active
248678-EP-4	EP	3/22/2012	EP12160730A	EP2502773	6/12/2019	System for supplying propulsion energy from an auxiliary drive and method of making same	Dolby Intellectual Property Licensing, LLC	Active
248678-IN-5	IN	3/13/2012	IN716DE2012A	IN402320	8/5/2022	System for supplying propulsion energy from an auxiliary	Dolby Intellectual Property Licensing, LLC	Active
248678-JP-6	JP	3/16/2012	JP2012059519A	JP6247811	12/13/2017	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
248678-US-1	US	3/23/2011	US13/069533	US8761978	6/24/2014	System for supplying propulsion energy from an auxiliary drive and method of making same	Dolby Intellectual Property Licensing, LLC	Active
248986-CN-4	CN	10/25/2012	CN201280059325A	CN103959418	10/19/2016	Micro-electromechanical switch and correlation technique thereof	Dolby Intellectual Property Licensing, LLC	Active
248986-DE-3	DE	10/25/2012	DE112012005009T	DE112012005009	9/4/2014	Microelectromechanical switch and associated method therefor	Dolby Intellectual Property Licensing, LLC	Active
249037-CN-1	CN	11/16/2011	CN201110363333A	CN103116074	9/7/2016	The change detection of ac network phase place and compensation system and method	Dolby Intellectual Property Licensing, LLC	Active
249074-DE-6	DE	1/16/2013	EP13151418A	EP2617688	5/2/2018	Sealing glass composition and article	Dolby Intellectual Property Licensing, LLC	Active
249074-FR-7	FR	1/16/2013	EP13151418A	EP2617688	5/2/2018	Sealing glass composition and article	Dolby Intellectual Property Licensing, LLC	Active
249074-GB-5	GB	1/16/2013	EP13151418A	EP2617688	5/2/2018	Sealing glass composition and article	Dolby Intellectual Property Licensing, LLC	Active
249074-JP-2	JP	1/8/2013	JP2013000762A	JP6105938	3/29/2017	Sodium battery	Dolby Intellectual Property Licensing, LLC	Active
249074-KR-3	KR	1/17/2013	KR20130005183A	KR102009796	8/13/2019	Sealing glass composition and article	Dolby Intellectual Property Licensing, LLC	Active
249074-US-1	US	1/19/2012	US13/354101	US9067818	6/30/2015	Sealing glass composition and article	Dolby Intellectual Property Licensing, LLC	Active
249090-CH-9	CH	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-DE-4	DE	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-FI-10	FI	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-FR-5	FR	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-GB-6	GB	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-IT-7	IT	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-JP-3	JP	9/20/2013	JP2013194762A	JP6243674	12/6/2017	Switching device including a gate circuit for operating a microelectromechanical system (mems) switch	Dolby Intellectual Property Licensing, LLC	Active

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249090-SE-8	SE	9/26/2013	EP13186251A	EP2713379	12/20/2017	A switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249090-US-1	US	9/28/2012	US13/630122	US8659326	2/25/2014	Switching apparatus including gating circuitry for actuating micro-electromechanical system (mems) switches	Dolby Intellectual Property Licensing, LLC	Active
249187-US-2	US	2/14/2013	US13/767048	US9130249	9/8/2015	Battery cell design and method of cooling battery cells	Dolby Intellectual Property Licensing, LLC	Active
249391-CN-1	CN	3/23/2012	CN201210080623A	CN103326350	3/16/2016	Inverter controller, energy conversion system, photovoltaic energy conversion system and method	Dolby Intellectual Property Licensing, LLC	Active
250154-DE-6	DE	12/6/2012	EP12195915A	EP2613497	3/6/2019	Method of transporting data in a sub-segmented manner	Dolby Intellectual Property Licensing, LLC	Active
250154-EP-4	EP	12/6/2012	EP12195915A	EP2613497	3/6/2019	Method of transporting data in a sub-segmented manner	Dolby Intellectual Property Licensing, LLC	Active
250154-FR-5	FR	12/6/2012	EP12195915A	EP2613497	3/6/2019	Method of transporting data in a sub-segmented manner	Dolby Intellectual Property Licensing, LLC	Active
250154-GB-7	GB	12/6/2012	EP12195915A	EP2613497	3/6/2019	Method of transporting data in a sub-segmented manner	Dolby Intellectual Property Licensing, LLC	Active
250154-JP-2	JP	12/4/2012	JP2012264822A	JP6148459	6/14/2017	How to transport data from a source node to a destination node	Dolby Intellectual Property Licensing, LLC	Active
250154-KR-3	KR	12/7/2012	KR20120142091A	KR102046792	11/20/2019	Method of transporting data from sending node to destination node	Dolby Intellectual Property Licensing, LLC	Active
250154-US-1	US	12/9/2011	US13/315955	US8976814	3/10/2015	Method of transporting data from sending node to destination node	Dolby Intellectual Property Licensing, LLC	Active
250286-US-1	US	3/20/2011	US13/052097	US8478077	7/2/2013	Optimal gradient pursuit for image alignment	Dolby Intellectual Property Licensing, LLC	Active
250286-US-7	US	7/1/2013	US13/932763	US8768100	7/1/2014	Optimal gradient pursuit for image alignment	Dolby Intellectual Property Licensing, LLC	Active
250455-CH-13	CH	12/18/2012	EP12197725A	EP2610943	2/15/2017	Rechargeable battery with insulating compression means between the cover and the cells and method of assembling the battery	Dolby Intellectual Property Licensing, LLC	Active
250455-DE-11	DE	12/18/2012	EP12197725A	EP2610943	2/15/2017	Rechargeable battery with insulating compression means between the cover and the cells and method of assembling the battery	Dolby Intellectual Property Licensing, LLC	Active
250455-FR-10	FR	12/18/2012	EP12197725A	EP2610943	2/15/2017	Rechargeable battery with insulating compression means between the cover and the cells and method of assembling the battery	Dolby Intellectual Property Licensing, LLC	Active
250455-GB-9	GB	12/18/2012	EP12197725A	EP2610943	2/15/2017	Rechargeable battery with insulating compression means between the cover and the cells and method of assembling the battery	Dolby Intellectual Property Licensing, LLC	Active
250455-IN-3	IN	12/10/2012	IN3778DE2012A	IN430715	5/5/2023	Rechargeable battery and method	Dolby Intellectual Property Licensing, LLC	Active
250455-IT-12	IT	12/18/2012	EP12197725A	EP2610943	2/15/2017	Rechargeable battery with insulating compression means between the cover and the cells and method of assembling the battery	Dolby Intellectual Property Licensing, LLC	Active
250455-JP-5	JP	12/25/2012	JP2012280441A	JP6148463	6/14/2017	Rechargeable storage battery and method	Dolby Intellectual Property Licensing, LLC	Active

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250455-KR-7	KR	12/28/2012	KR20120155823A	KR102037985	10/29/2019	Rechargeable battery with insulating compression means between cover and cells and assembling method thereof	Dolby Intellectual Property Licensing, LLC	Active
250455-US-8	US	5/9/2016	US15/149523	US10270072	4/23/2019	Rechargeable battery and method	Dolby Intellectual Property Licensing, LLC	Active
250455-ZA-4	ZA	12/14/2012	ZA201209558A	ZA201209558	12/23/2014	Rechargeable battery and method	Dolby Intellectual Property Licensing, LLC	Active
250744-US-1	US	12/29/2011	US13/339677	US9647470	5/9/2017	Rechargeable battery system	Dolby Intellectual Property Licensing, LLC	Active
250841-CA-3	CA	8/9/2012	CA2785405A	CA2785405	9/10/2019	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-CH-15	CH	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-CN-4	CN	8/13/2012	CN201210286078A	CN103116739	11/24/2017	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-DE-11	DE	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-EP-5	EP	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-ES-14	ES	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-FR-10	FR	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-GB-16	GB	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-IN-6	IN	8/8/2012	IN2483DE2012A	IN450468	9/15/2023	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-IT-12	IT	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-JP-7	JP	8/10/2012	JP2012177773A	JP6081101	2/15/2017	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-KR-8	KR	8/13/2012	KR20120088526A	KR102001678	7/18/2019	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-NL-13	NL	8/10/2012	EP12180159A	EP2581877	4/7/2021	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-US-1	US	10/13/2011	US13/272424	US8340456	12/25/2012	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
250841-US-9	US	12/19/2012	US13/719534	US8737756	5/27/2014	System and method for depth from defocus imaging	Dolby Intellectual Property Licensing, LLC	Active
251009-DE-2	DE	11/22/2012	DE102012111303A	DE102012111303	6/6/2013	Usage measurement methods and systems for interactive advertising	Dolby Intellectual Property Licensing, LLC	Active
251009-JP-5	JP	11/26/2012	JP2012257006A	JP6267861	1/24/2018	Usage measurement techniques and systems for interactive advertising	Dolby Intellectual Property Licensing, LLC	Active
251009-KR-6	KR	11/29/2012	KR20120137208A	KR102054443	12/10/2019	Usage measurement techniques and systems for interactive advertising	Dolby Intellectual Property Licensing, LLC	Active
251336-US-1	US	10/28/2011	US13/283931	US8829719	9/9/2014	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251344-CN-2	CN	7/2/2012	CN201210242220A	CN102982753	10/17/2017	Personage tracks and interactive advertisement	Dolby Intellectual Property Licensing, LLC	Active

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251344-GB-4	GB	6/28/2012	GB201211505 A	GB2494235	8/30/2017	Person tracking and interactive advertising	Dolby Intellectual Property Licensing, LLC	Active
251344-JP-5	JP	6/29/2012	JP2012146222 A	JP6074177	2/1/2017	Person tracking and interactive advertising	Dolby Intellectual Property Licensing, LLC	Active
251344-KR-6	KR	6/29/2012	KR201200713 37A	KR10198333 7	5/28/2019	Person tracking and interactive advertising	Dolby Intellectual Property Licensing, LLC	Active
251400-CN-2	CN	10/26/2012	CN201210414 745A	CN10308567 5	3/1/2017	For optionally making the energy be coupled in system and its manufacture method of load	Dolby Intellectual Property Licensing, LLC	Active
251400-CN-4	CN	10/26/2012	CN201710024 810A	CN10705409 1	8/28/2020	System for selectively coupling an energy source to a load and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251400-US-1	US	10/28/2011	US13/283748	US9073438	7/7/2015	System for selectively coupling an energy source to a load and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251400-US-3	US	6/2/2015	US14/728738	US10666045	5/26/2020	System for selectively coupling an energy source to a load and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251400-US-5	US	3/27/2019	US16/366449	US10958069	3/23/2021	System for selectively coupling an energy source to a load and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251417-US-1	US	10/28/2011	US13/283983	US8916993	12/23/2014	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251417-US-2	US	12/5/2014	US14/562042	US9809128	11/7/2017	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251425-US-1	US	10/28/2011	US13/283829	US9000614	4/7/2015	System for multiple energy storage and management and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251485-US-1	US	9/16/2011	US13/234942	US8901463	12/2/2014	Thermal management device	Dolby Intellectual Property Licensing, LLC	Active
251698-US-1	US	11/30/2011	US13/307191	US8928259	1/6/2015	Modular stacked dc architecture traction system and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251698-US-2	US	1/5/2015	US14/589195	US9586496	3/7/2017	Modular stacked dc architecture traction system and method of making same	Dolby Intellectual Property Licensing, LLC	Active
251698-US-3	US	1/25/2017	US15/415195	US10044312	8/7/2018	Modular stacked dc architecture traction system and method of making same	Dolby Intellectual Property Licensing, LLC	Active
252096-US-1	US	1/8/2009	US29/330540	USD645043	9/13/2011	Display	Dolby Intellectual Property Licensing, LLC	Active
252198-US-1	US	12/14/2011	US13/325731	US8829886	9/9/2014	Systems and methods for defect detection using exoelectrons	Dolby Intellectual Property Licensing, LLC	Active
252223-CA-6	CA	12/5/2012	CA2861780A	CA2861780	4/14/2020	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252223-CN-3	CN	12/5/2012	CN201280070 859A	CN10413732 2	3/8/2017	For controlling the method and system of energy accumulating device	Dolby Intellectual Property Licensing, LLC	Active
252223-DE-8	DE	12/5/2012	EP12814026A	EP2798693	3/4/2020	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252223-EP-4	EP	12/5/2012	EP12814026A	EP2798693	3/4/2020	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252223-FR-7	FR	12/5/2012	EP12814026A	EP2798693	3/4/2020	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252223-GB-10	GB	12/5/2012	EP12814026A	EP2798693	3/4/2020	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252223-IT-9	IT	12/5/2012	EP12814026A	EP2798693	3/4/2020	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active

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252223-JP-5	JP	12/5/2012	JP2014550312A	JP6027630	11/16/2016	Method and system for controlling an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252223-US-1	US	12/28/2011	US13/338380	US9147910	9/29/2015	Method and system for controlling energy storage device	Dolby Intellectual Property Licensing, LLC	Active
252310-BR-2	BR	8/10/2012	BR102012020043A	BR102012020043	11/17/2020	Multi-energy storage device system, method of mounting a propulsion power system and computer-readable storage medium	Dolby Intellectual Property Licensing, LLC	Active
252310-CN-3	CN	8/13/2012	CN201210286067A	CN102951034	8/3/2016	For optimizing the system and method for energy storing device cycle life	Dolby Intellectual Property Licensing, LLC	Active
252310-EP-4	EP	8/9/2012	EP12179967A	EP2556988	2/13/2013	System and method for optimizing energy storage device cycle life	Dolby Intellectual Property Licensing, LLC	Active
252310-US-1	US	8/12/2011	US13/209138	US8963365	2/24/2015	System and method for optimizing energy storage device cycle life	Dolby Intellectual Property Licensing, LLC	Active
252382-BR-2	BR	8/16/2012	BR102012020586A	BR102012020586	10/27/2020	Energy management and storage system	Dolby Intellectual Property Licensing, LLC	Active
252382-CN-3	CN	8/24/2012	CN201210304501A	CN102957188	11/7/2017	For the apparatus and method to electric vehicle charging	Dolby Intellectual Property Licensing, LLC	Active
252382-DE-8	DE	8/15/2012	EP12180556A	EP2562030	12/22/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
252382-EP-4	EP	8/15/2012	EP12180556A	EP2562030	12/22/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
252382-FR-7	FR	8/15/2012	EP12180556A	EP2562030	12/22/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
252382-GB-9	GB	8/15/2012	EP12180556A	EP2562030	12/22/2021	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
252382-JP-6	JP	8/17/2012	JP2012180693A	JP6130634	5/17/2017	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
252382-US-1	US	8/24/2011	US13/216590	US8994327	3/31/2015	Apparatus and method for charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
252471-US-1	US	11/28/2011	US13/304791	US9520741	12/13/2016	System for charging electrical storage device and method of making same	Dolby Intellectual Property Licensing, LLC	Active
252665-CN-1	CN	11/10/2011	CN201110355846A	CN103107760	5/25/2016	Motor control method and system	Dolby Intellectual Property Licensing, LLC	Active
252665-DE-6	DE	11/7/2012	EP12191698A	EP2592747	3/7/2018	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active
252665-ES-10	ES	11/7/2012	EP12191698A	EP2592747	3/7/2018	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active
252665-FR-7	FR	11/7/2012	EP12191698A	EP2592747	3/7/2018	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active
252665-GB-8	GB	11/7/2012	EP12191698A	EP2592747	3/7/2018	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active
252665-IN-3	IN	10/25/2012	IN3295DE2012A	IN421291	2/17/2023	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active
252665-IT-9	IT	11/7/2012	EP12191698A	EP2592747	3/7/2018	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active
252665-JP-4	JP	11/6/2012	JP2012244033A	JP6302158	3/28/2018	Method and system for controlling a motor	Dolby Intellectual Property Licensing, LLC	Active
252665-US-5	US	11/9/2012	US13/673240	US8963460	2/24/2015	Method and system for controlling motor	Dolby Intellectual Property Licensing, LLC	Active

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252995-US-2	US	8/27/2012	US13/595541	US8757471	6/24/2014	Active braze techniques on beta-alumina	Dolby Intellectual Property Licensing, LLC	Active
253004-US-1	US	3/28/2013	US13/852690	US9735401	8/15/2017	Sealed sodium-based thermal batteries and methods of sealing same	Dolby Intellectual Property Licensing, LLC	Active
253010-US-1	US	4/30/2012	US13/459840	US8524348	9/3/2013	Stacked film optical data storage device and method of manufacture	Dolby Intellectual Property Licensing, LLC	Active
253610-CN-1	CN	2/17/2012	CN201210037209A	CN103259488	4/27/2016	Motor control method, control system and control device	Dolby Intellectual Property Licensing, LLC	Active
253755-CN-1	CN	2/17/2012	CN201210038096A	CN103259281	12/16/2015	There is energy conversion system and the method for negative-sequence current compensation mechanism	Dolby Intellectual Property Licensing, LLC	Active
253831-JP-2	JP	10/24/2012	JP2012234250A	JP6194164	9/6/2017	Apparatus and method for quickly charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
253831-US-1	US	10/31/2011	US13/285983	US8829722	9/9/2014	Apparatus and method for rapidly charging an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
254250-US-1	US	6/26/2012	US13/533192	US9102119	8/11/2015	Encapsulated beam and method of forming	Dolby Intellectual Property Licensing, LLC	Active
254250-US-2	US	7/14/2015	US14/798837	US10183467	1/22/2019	Encapsulated beam and method of forming	Dolby Intellectual Property Licensing, LLC	Active
254256-US-1	US	11/29/2011	US13/305817	US9290107	3/22/2016	System and method for energy management in an electric vehicle	Dolby Intellectual Property Licensing, LLC	Active
254472-DE-4	DE	1/10/2013	EP13701179A	EP2810323	5/30/2018	Electrode compositions, energy storage devices and related methods	Dolby Intellectual Property Licensing, LLC	Active
254472-FR-5	FR	1/10/2013	EP13701179A	EP2810323	5/30/2018	Electrode compositions, energy storage devices and related methods	Dolby Intellectual Property Licensing, LLC	Active
254472-GB-6	GB	1/10/2013	EP13701179A	EP2810323	5/30/2018	Electrode compositions, energy storage devices and related methods	Dolby Intellectual Property Licensing, LLC	Active
254472-IT-7	IT	1/10/2013	EP13701179A	EP2810323	5/30/2018	Electrode compositions, energy storage devices and related methods	Dolby Intellectual Property Licensing, LLC	Active
254472-US-1	US	1/30/2012	US13/361317	US8993169	3/31/2015	Electrode compositions, energy storage devices and related methods	Dolby Intellectual Property Licensing, LLC	Active
254566-CN-1	CN	4/24/2012	CN201210122557A	CN103378603	3/1/2017	Open-circuit fault detection device, inverter controller, energy conversion system and method	Dolby Intellectual Property Licensing, LLC	Active
254869-CH-14	CH	10/22/2012	EP12189424A	EP2587607	7/12/2017	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active
254869-CN-4	CN	10/25/2012	CN201210412388A	CN103078389	9/12/2017	Integrated power system control method and the relevant device with energy storage elements	Dolby Intellectual Property Licensing, LLC	Active
254869-DE-13	DE	10/22/2012	EP12189424A	EP2587607	7/12/2017	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active
254869-FR-12	FR	10/22/2012	EP12189424A	EP2587607	7/12/2017	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active
254869-GB-15	GB	10/22/2012	EP12189424A	EP2587607	7/12/2017	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active
254869-ID-6	ID	10/22/2012	P00201200893	N/A	5/17/2019		Dolby Intellectual Property Licensing, LLC	Active
254869-JP-8	JP	10/23/2012	JP2012233358A	JP6188120	8/30/2017	Integrated power generation system control method with energy storage element and related apparatus	Dolby Intellectual Property Licensing, LLC	Active
254869-MY-9	MY	10/5/2012	MYPI2012004461A	MY166391	6/25/2018	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active

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254869-NG-11	NG	4/11/2013	NGC2013296	N/A	2/25/2014		Dolby Intellectual Property Licensing, LLC	Active
254869-US-2	US	7/12/2012	US13/547250	US9496748	11/15/2016	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active
254869-US-3	US	7/13/2012	US13/548665	US9257868	2/9/2016	Integrated power system control method and related apparatus with energy storage element	Dolby Intellectual Property Licensing, LLC	Active
254869-ZA-10	ZA	10/10/2012	ZA201207611A	ZA201207611	10/29/2014	Integrated power system control method and related apparatus with energystorage element	Dolby Intellectual Property Licensing, LLC	Active
254975-AU-2	AU	8/29/2012	AU2012216501A	AU2012216501	8/4/2016	Controller and method of controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254975-CN-3	CN	9/6/2012	CN201210326909A	CN102983566	4/12/2017	Controller and method of controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254975-CN-7	CN	9/6/2012	CN201710149835A	CN106877341	6/30/2020	Controller and method for controlling power system	Dolby Intellectual Property Licensing, LLC	Active
254975-DE-8	DE	8/30/2012	EP12182470A	EP2568561	10/2/2019	Controller and method of controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254975-EP-4	EP	8/30/2012	EP12182470A	EP2568561	10/2/2019	Controller and method of controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254975-JP-5	JP	9/4/2012	JP2012193660A	JP6068063	1/25/2017	Controller and method for controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254975-KR-6	KR	9/5/2012	KR20120098131A	KR101998411	7/9/2019	Controller and method of controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254975-US-1	US	9/6/2011	US13/225975	US8326467	12/4/2012	Controller and method of controlling a power system	Dolby Intellectual Property Licensing, LLC	Active
254993-US-1	US	12/28/2011	US13/338325	US8916285	12/23/2014	Modular high temperature battery electrical configurations	Dolby Intellectual Property Licensing, LLC	Active
256271-US-1	US	11/7/2011	US13/290928	US9303557	4/5/2016	Automatic surveillance video matting using a shape prior	Dolby Intellectual Property Licensing, LLC	Active
256271-US-2	US	2/29/2016	US15/056669	US10147021	12/4/2018	Automatic surveillance video matting using a shape prior	Dolby Intellectual Property Licensing, LLC	Active
256289-US-1	US	2/23/2012	US13/403030	US8750566	6/10/2014	Apparatus and method for spatially relating views of sky images acquired at spaced apart locations	Dolby Intellectual Property Licensing, LLC	Active
256606-BR-10	BR	5/24/2013	BR102013012941A	BR102013012941	4/30/2019	Strong welder allocation and electrochemical cell composition	Dolby Intellectual Property Licensing, LLC	Active
256606-BR-11	BR	5/24/2013	BR102013012938A	BR102013012938	4/30/2019	Composition of bonding alloy and electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
256606-DE-21	DE	5/24/2013	EP13169250A	EP2666582	7/3/2019	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-DE-24	DE	5/24/2013	EP13169240A	EP2666581	9/9/2020	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-EP-13	EP	5/24/2013	EP13169250A	EP2666582	7/3/2019	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-EP-5	EP	5/24/2013	EP13169240A	EP2666581	9/9/2020	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-GB-23	GB	5/24/2013	EP13169250A	EP2666582	7/3/2019	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-GB-26	GB	5/24/2013	EP13169240A	EP2666581	9/9/2020	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active

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256606-IN-14	IN	5/7/2013	IN1351DE2013A	IN448141	9/1/2023	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-IN-6	IN	5/7/2013	IN1350DE2013A	IN398874	6/17/2022	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-IT-22	IT	5/24/2013	EP13169250A	EP2666582	7/3/2019	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-IT-25	IT	5/24/2013	EP13169240A	EP2666581	9/9/2020	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-JP-15	JP	5/22/2013	JP2013107544A	JP6266232	1/24/2018	Brazing composition and related equipment	Dolby Intellectual Property Licensing, LLC	Active
256606-JP-7	JP	5/22/2013	JP2013107545A	JP6266233	1/24/2018	Brazing composition and related equipment	Dolby Intellectual Property Licensing, LLC	Active
256606-KR-8	KR	5/22/2013	KR20130057600A	KR102162549	10/8/2020	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256606-US-2	US	6/29/2012	US13/538203	US10105795	10/23/2018	Braze compositions, and related devices	Dolby Intellectual Property Licensing, LLC	Active
256975-CN-1	CN	12/3/2012	CN201210509493A	CN103847530	4/12/2017	Electric drive system and energy managing method thereof	Dolby Intellectual Property Licensing, LLC	Active
256975-EP-4	EP	12/2/2013	EP13195375A	EP2738036	6/4/2014	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-JP-3	JP	11/29/2013	JP2013246847A	JP6334147	5/30/2018	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-JP-7	JP	5/7/2018	JP2018089123A	JP6672372	3/25/2020	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-JP-8	JP	5/7/2018	JP2018089124A	JP6672373	3/25/2020	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-US-11	US	5/4/2020	US16/866028	US11374508	6/28/2022	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-US-2	US	12/2/2013	US14/094086	US9800182	10/24/2017	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-US-5	US	3/8/2017	US15/453218	US10374529	8/6/2019	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-US-6	US	9/1/2017	US15/693976	US10291158	5/14/2019	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
256975-US-9	US	6/6/2019	US16/433348	US10673358	6/2/2020	Electric drive system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
257013-BR-6	BR	3/10/2014	BR102014005475A	BR102014005475	4/20/2021	Engine drive system	Dolby Intellectual Property Licensing, LLC	Active
257013-CN-1	CN	3/14/2013	CN201310082173A	CN104052373	4/12/2017	Motor fault protection system and method	Dolby Intellectual Property Licensing, LLC	Active
257013-DE-8	DE	3/11/2014	EP14158838A	EP2779416	7/13/2022	System for fault protection of a motor	Dolby Intellectual Property Licensing, LLC	Active
257013-EP-4	EP	3/11/2014	EP14158838A	EP2779416	7/13/2022	System for fault protection of a motor	Dolby Intellectual Property Licensing, LLC	Active
257013-IN-5	IN	3/10/2014	IN1201CH2014A	IN431908	5/19/2023	System and method for fault protection of a motor	Dolby Intellectual Property Licensing, LLC	Active
257013-JP-3	JP	3/11/2014	JP2014047009A	JP6285223	2/28/2018	System and method for motor fault protection	Dolby Intellectual Property Licensing, LLC	Active

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257013-US-2	US	3/12/2014	US14/205489	US9438144	9/6/2016	System and method for fault protection of a motor	Dolby Intellectual Property Licensing, LLC	Active
257013-US-7	US	8/3/2016	US15/227439	US9742345	8/22/2017	System and method for fault protection of a motor	Dolby Intellectual Property Licensing, LLC	Active
257035-US-1	US	3/8/2012	US13/414800	US9120390	9/1/2015	Apparatus for transferring energy using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
257085-JP-3	JP	5/17/2013	JP2013104607A	JP6196805	9/13/2017	Energy storage device and energy storage method	Dolby Intellectual Property Licensing, LLC	Active
257085-US-2	US	12/3/2012	US13/692087	US9005793	4/14/2015	Energy storage article and method	Dolby Intellectual Property Licensing, LLC	Active
257472-US-2	US	11/15/2012	US13/677613	US8949163	2/3/2015	Adoption simulation with evidential reasoning using agent models in a hierarchical structure	Dolby Intellectual Property Licensing, LLC	Active
257527-CN-2	CN	5/17/2013	CN201310182840A	CN103427680	3/27/2018	Transformer tapping translation circuit and preparation method thereof	Dolby Intellectual Property Licensing, LLC	Active
257527-JP-3	JP	5/14/2013	JP2013101771A	JP6259202	1/10/2018	Transformer tap switching circuit and method for making the same	Dolby Intellectual Property Licensing, LLC	Active
257527-US-1	US	5/18/2012	US13/475186	US9025352	5/5/2015	Transformer tap-changing circuit and method of making same	Dolby Intellectual Property Licensing, LLC	Active
257939-US-1	US	7/24/2012	US13/556525	US9933488	4/3/2018	Open circuit voltage checking for a battery system	Dolby Intellectual Property Licensing, LLC	Active
257940-US-1	US	7/25/2012	US13/557676	US9148025	9/29/2015	System and method for a rechargeable battery	Dolby Intellectual Property Licensing, LLC	Active
259209-US-1	US	4/26/2012	US13/456399	US8842881	9/23/2014	Real-time video tracking system	Dolby Intellectual Property Licensing, LLC	Active
259209-US-2	US	9/22/2014	US14/493044	US9626581	4/18/2017	Real-time video tracking system	Dolby Intellectual Property Licensing, LLC	Active
259236-CA-10	CA	9/12/2013	CA2884670A	CA2884670	7/14/2020	System and method for generating an activity summary of a person	Dolby Intellectual Property Licensing, LLC	Active
259236-JP-9	JP	9/12/2013	JP2015532045A	JP6307083	4/4/2018	System and method for generating a human behavior summary	Dolby Intellectual Property Licensing, LLC	Active
259236-KR-8	KR	9/12/2013	KR20157009311A	KR102189205	12/10/2020	System and method for generating an activity summary of a person	Dolby Intellectual Property Licensing, LLC	Active
259236-US-2	US	5/7/2013	US13/888941	US10271017	4/23/2019	System and method for generating an activity summary of a person	Dolby Intellectual Property Licensing, LLC	Active
259276-CN-2	CN	5/21/2013	CN201310189269A	CN103419669	4/12/2017	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-CN-5	CN	5/21/2013	CN201611216567A	CN106926718	3/20/2020	Method and apparatus for charging a plurality of energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-JP-3	JP	5/17/2013	JP2013104614A	JP6557445	8/7/2019	Method and apparatus for charging a plurality of energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-US-1	US	5/21/2012	US13/476165	US981727	3/17/2015	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-US-10	US	2/3/2022	US17/592062	US11697352	7/11/2023	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-US-4	US	3/13/2015	US14/656782	US9821668	11/21/2017	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-US-6	US	9/22/2017	US15/712904	US10081257	9/25/2018	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active

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259276-US-7	US	9/25/2017	US15/713905	US10081258	9/25/2018	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-US-8	US	8/17/2018	US16/104445	US10766372	9/8/2020	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259276-US-9	US	12/20/2019	US16/723171	US11318852	5/3/2022	Method and apparatus for charging multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
259278-BR-6	BR	5/10/2013	BR102013011666A	BR102013011666	12/29/2020	Contacting unit, method for operating an isolating contactor and system for isolating a first voltage device from a second voltage device	Dolby Intellectual Property Licensing, LLC	Active
259278-CN-4	CN	5/21/2013	CN201310189949A	CN103419615	7/7/2017	Contacting partition method and equipment	Dolby Intellectual Property Licensing, LLC	Active
259278-DE-7	DE	5/16/2013	EP13168098A	EP2667396	1/6/2016	Contacting isolation method and apparatus	Dolby Intellectual Property Licensing, LLC	Active
259278-FR-8	FR	5/16/2013	EP13168098A	EP2667396	1/6/2016	Contacting isolation method and apparatus	Dolby Intellectual Property Licensing, LLC	Active
259278-GB-9	GB	5/16/2013	EP13168098A	EP2667396	1/6/2016	Contacting isolation method and apparatus	Dolby Intellectual Property Licensing, LLC	Active
259278-IN-5	IN	4/23/2013	IN1188DE2013A	IN328615	1/3/2020	Contacting isolation method and apparatus	Dolby Intellectual Property Licensing, LLC	Active
259278-JP-2	JP	5/16/2013	JP2013103607A	JP6362832	7/25/2018	Contacting insulation method and apparatus	Dolby Intellectual Property Licensing, LLC	Active
259278-US-1	US	5/21/2012	US13/476188	US9142372	9/22/2015	Contacting isolation method and apparatus	Dolby Intellectual Property Licensing, LLC	Active
259306-US-1	US	11/30/2012	US13/689819	US9040019	5/26/2015	Methods of detecting myelin basic protein	Dolby Intellectual Property Licensing, LLC	Active
259392-US-1	US	4/13/2012	US13/446714	US8732456	5/20/2014	Enterprise environment disk encryption	Dolby Intellectual Property Licensing, LLC	Active
259422-BR-6	BR	6/6/2013	BR102013014032A	BR102013014032	4/26/2022	Electric drive device	Dolby Intellectual Property Licensing, LLC	Active
259422-CN-4	CN	6/7/2013	CN201310224017A	CN103490460	7/11/2017	For transmitting the system of the energy from the energy and manufacturing its method	Dolby Intellectual Property Licensing, LLC	Active
259422-EP-3	EP	6/6/2013	EP13170766A	EP2672600	12/11/2013	System for transferring energy from an energy source and method of making same	Dolby Intellectual Property Licensing, LLC	Active
259422-JP-2	JP	6/4/2013	JP2013117431A	JP6659203	3/4/2020	System for transferring energy from an energy source and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
259422-US-1	US	6/7/2012	US13/490505	US9013168	4/21/2015	System for transferring energy from a n energy source and method of making same	Dolby Intellectual Property Licensing, LLC	Active
260380-CN-1	CN	9/28/2012	CN201210370943A	CN103707748	3/1/2017	Power transmission system and drive system	Dolby Intellectual Property Licensing, LLC	Active
260416-CN-5	CN	10/11/2013	CN201380067381A	CN105143818	7/3/2018	Digital feeler gauge and its application method	Dolby Intellectual Property Licensing, LLC	Active
260416-DE-10	DE	10/11/2013	EP13783176A	EP2909578	12/18/2019	Digital feeler gauge	Dolby Intellectual Property Licensing, LLC	Active
260416-EP-7	EP	10/11/2013	EP13783176A	EP2909578	12/18/2019	Digital feeler gauge	Dolby Intellectual Property Licensing, LLC	Active
260416-FR-9	FR	10/11/2013	EP13783176A	EP2909578	12/18/2019	Digital feeler gauge	Dolby Intellectual Property Licensing, LLC	Active
260416-GB-11	GB	10/11/2013	EP13783176A	EP2909578	12/18/2019	Digital feeler gauge	Dolby Intellectual Property Licensing, LLC	Active

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260416-IN-6	IN	4/22/2015	IN2287CHN2015A	IN403125	8/12/2022	Digital feeler gauge and method of using same	Dolby Intellectual Property Licensing, LLC	Active
260416-JP-4	JP	10/11/2013	JP2015537745A	JP6329555	5/23/2018	Digital gap gauge and how to use it	Dolby Intellectual Property Licensing, LLC	Active
260416-KR-8	KR	10/11/2013	KR20157013053A	KR101912000	10/25/2018	Digital feeler gauge and method of using same	Dolby Intellectual Property Licensing, LLC	Active
260416-US-2	US	12/31/2012	US13/731929	US8919004	12/30/2014	Digital feeler gauge and method of using same	Dolby Intellectual Property Licensing, LLC	Active
260496-US-1	US	7/31/2012	US13/563111	US8962191	2/24/2015	Electrochemical cells having a electrode current collector extending into a positive electrode composition, and related methods	Dolby Intellectual Property Licensing, LLC	Active
260661-CN-2	CN	8/29/2013	CN201310383553A	CN103683524	10/17/2017	The contactless system of power transmission	Dolby Intellectual Property Licensing, LLC	Active
260661-DE-3	DE	8/29/2013	DE102013109382A	DE102013109382	3/13/2014	Non-contact energy transmission system	Dolby Intellectual Property Licensing, LLC	Active
260661-IN-1	IN	8/29/2012	IN3574CH2012A	IN346978	9/25/2020	Contactless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
260661-US-4	US	8/28/2013	US14/012245	US9697951	7/4/2017	Contactless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
260661-US-5	US	6/2/2017	US15/612324	US10490345	11/26/2019	Contactless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
260807-US-1	US	8/30/2012	US13/599469	US8988047	3/24/2015	Method of charging an electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
261519-CN-3	CN	11/13/2013	CN201310571078A	CN103928661	5/8/2018	Composition, energy storage device and relevant method	Dolby Intellectual Property Licensing, LLC	Active
261519-JP-4	JP	11/11/2013	JP2013232640A	JP6470901	2/13/2019	Composition, energy storage device and related processes	Dolby Intellectual Property Licensing, LLC	Active
261519-US-1	US	11/13/2012	US13/675061	US9257698	2/9/2016	Composition, energy storage device, and related process	Dolby Intellectual Property Licensing, LLC	Active
261528-BR-3	BR	9/23/2013	BR102013024325A	BR102013024325	4/26/2022	Power conversion system	Dolby Intellectual Property Licensing, LLC	Active
261528-CN-1	CN	9/24/2012	CN201210359161A	CN103684002	12/21/2016	Energy conversion system	Dolby Intellectual Property Licensing, LLC	Active
261528-IN-4	IN	9/16/2013	IN4150CH2013A	IN404705	9/2/2022	Power conversion system	Dolby Intellectual Property Licensing, LLC	Active
261528-JP-5	JP	9/17/2013	JP2013191274A	JP6496475	4/3/2019	Power conversion system	Dolby Intellectual Property Licensing, LLC	Active
261528-US-2	US	9/19/2013	US14/031778	US9537423	1/3/2017	Power conversion system	Dolby Intellectual Property Licensing, LLC	Active
261543-US-1	US	11/30/2012	US13/690644	US9368840	6/14/2016	Method for maintaining the performance level of an electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
261715-US-1	US	12/13/2012	US13/713745	US8977331	3/10/2015	Systems and methods for nerve imaging	Dolby Intellectual Property Licensing, LLC	Active
261939-US-1	US	12/28/2012	US13/729134	US9105896	8/11/2015	Metal rings for active brazing in sodium-based thermal batteries	Dolby Intellectual Property Licensing, LLC	Active
261949-US-1	US	12/26/2012	US13/726846	US9012060	4/21/2015	System and method for battery insulation	Dolby Intellectual Property Licensing, LLC	Active
262057-BR-2	BR	9/9/2013	BR102013023000A	BR102013023000	6/8/2021	Electric power supply apparatus	Dolby Intellectual Property Licensing, LLC	Active

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262057-EP-3	EP	9/24/2013	EP13185678A	EP2711233	3/26/2014	Power supply management apparatus and method thereof	Dolby Intellectual Property Licensing, LLC	Active
262057-IN-4	IN	8/27/2013	IN3793CH2013A	IN404774	9/2/2022	Power supply management apparatus and method thereof	Dolby Intellectual Property Licensing, LLC	Active
262057-JP-5	JP	9/20/2013	JP2013194766A	JP6881883	6/2/2021	A vehicle provided with an electric power supply control apparatus and an electric power supply control apparatus	Dolby Intellectual Property Licensing, LLC	Active
262057-US-6	US	9/17/2013	US14/028565	US10363823	7/30/2019	Power supply management apparatus and method thereof	Dolby Intellectual Property Licensing, LLC	Active
262057-US-7	US	6/12/2019	US16/439199	US11225150	1/18/2022	Power supply management apparatus and method thereof	Dolby Intellectual Property Licensing, LLC	Active
262115-AU-6	AU	8/1/2014	AU2014208262A	AU2014208262	9/12/2019	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262115-BR-4	BR	7/31/2014	BR102014018911A	BR102014018911	10/27/2020	Image capture device and method for acquiring images of an object by means of an image capture device	Dolby Intellectual Property Licensing, LLC	Active
262115-CA-5	CA	7/24/2014	CA2857714A	CA2857714	1/19/2021	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262115-CN-3	CN	8/8/2014	CN201410388243A	CN104570382	11/5/2019	The device and method of optical image super-resolution are shifted using integral	Dolby Intellectual Property Licensing, LLC	Active
262115-DE-8	DE	8/1/2014	EP14179557A	EP2860574	9/30/2020	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262115-EP-2	EP	8/1/2014	EP14179557A	EP2860574	9/30/2020	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262115-FR-7	FR	8/1/2014	EP14179557A	EP2860574	9/30/2020	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262115-GB-9	GB	8/1/2014	EP14179557A	EP2860574	9/30/2020	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262115-US-1	US	10/9/2013	US14/049368	US9025067	5/5/2015	Apparatus and method for image super-resolution using integral shifting optics	Dolby Intellectual Property Licensing, LLC	Active
262665-US-1	US	6/22/2012	US13/530577	US9471515	10/18/2016	Systems, methods, and apparatus for medical device interface connectivity	Dolby Intellectual Property Licensing, LLC	Active
263576-CN-1	CN	3/29/2013	CN201310109147A	CN104079194	3/1/2017	Electric energy conversion system and method	Dolby Intellectual Property Licensing, LLC	Active
263939-US-3	US	10/29/2013	US14/066166	US9303549	4/5/2016	Engine cooling system and method for an engine	Dolby Intellectual Property Licensing, LLC	Active
264142-CN-1	CN	5/7/2013	CN201310164748A	CN104143832	8/24/2016	For collapse of voltage condition detection and the system and method for control	Dolby Intellectual Property Licensing, LLC	Active
264203-CN-1	CN	3/15/2013	CN201310084413A	CN104044484	3/27/2018	Drive system and driving method	Dolby Intellectual Property Licensing, LLC	Active
264203-DE-7	DE	3/14/2014	EP14160034A	EP2779413	7/7/2021	Drive system and method for driving a vehicle	Dolby Intellectual Property Licensing, LLC	Active
264203-EP-4	EP	3/14/2014	EP14160034A	EP2779413	7/7/2021	Drive system and method for driving a vehicle	Dolby Intellectual Property Licensing, LLC	Active
264203-JP-3	JP	3/14/2014	JP2014051022A	JP6548318	7/24/2019	Drive system and method for driving a vehicle	Dolby Intellectual Property Licensing, LLC	Active
264291-AU-4	AU	9/12/2013	AU2013315478A	AU2013315478	11/15/2018	System and method for generating semantic annotations	Dolby Intellectual Property Licensing, LLC	Active

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264291-CA-6	CA	9/12/2013	CA2884714A	CA2884714	5/22/2018	System and method for generating semantic annotations	Dolby Intellectual Property Licensing, LLC	Active
264291-CN-7	CN	9/12/2013	CN201380059257A	CN104781831	4/30/2019	System and method for generative semantics mark	Dolby Intellectual Property Licensing, LLC	Active
264291-JP-9	JP	9/12/2013	JP2015532040A	JP6307082	4/4/2018	System and method for generating semantic annotations	Dolby Intellectual Property Licensing, LLC	Active
264291-KR-10	KR	9/12/2013	KR20157008947A	KR101890467	8/21/2018	System and method for generating semantic annotations	Dolby Intellectual Property Licensing, LLC	Active
264291-US-2	US	6/15/2013	US13/918905	US9251421	2/2/2016	System and method for generating semantic annotations	Dolby Intellectual Property Licensing, LLC	Active
264323A-US-1	US	11/2/2013	US14/070511	US9360528	6/7/2016	Method and system for voltage sense input	Dolby Intellectual Property Licensing, LLC	Active
264323-US-2	US	11/2/2013	US14/070505	US10060984	8/28/2018	Battery management systems and methods	Dolby Intellectual Property Licensing, LLC	Active
264353-US-1	US	12/7/2012	US13/708107	US8889241	11/18/2014	Stacked film reflective layers for multi-layer optical data storage	Dolby Intellectual Property Licensing, LLC	Active
264353-US-4	US	11/17/2014	US14/543438	US9099104	8/4/2015	Stacked film reflective layers for multi-layer optical data storage	Dolby Intellectual Property Licensing, LLC	Active
264428-BR-6	BR	3/14/2014	BR102014006100A	BR102014006100	7/5/2016	Appliance and vehicle	Dolby Intellectual Property Licensing, LLC	Active
264428-CN-1	CN	3/15/2013	CN201310084090A	CN104044475	7/11/2017	Improved drive system and the device using the drive system	Dolby Intellectual Property Licensing, LLC	Active
264428-DE-7	DE	3/14/2014	EP1416000A	EP2777974	2/27/2019	Electric vehicle with improved electric drive system	Dolby Intellectual Property Licensing, LLC	Active
264428-EP-4	EP	3/14/2014	EP1416000A	EP2777974	2/27/2019	Electric vehicle with improved electric drive system	Dolby Intellectual Property Licensing, LLC	Active
264428-IN-5	IN	3/12/2014	IN1284CH2014A	IN378944	10/15/2021	Electric vehicle with improved electric drive system	Dolby Intellectual Property Licensing, LLC	Active
264428-JP-3	JP	3/12/2014	JP2014048291A	JP6352655	7/4/2018	Electric vehicle with improved electric drive system	Dolby Intellectual Property Licensing, LLC	Active
264428-US-2	US	3/10/2014	US14/202506	US9780702	10/3/2017	Electric vehicle with improved electric drive system	Dolby Intellectual Property Licensing, LLC	Active
264800-US-1	US	6/6/2013	US13/912050	US9078862	7/14/2015	Platelet activation using long electric field pulses	Dolby Intellectual Property Licensing, LLC	Active
264801-US-1	US	6/6/2013	US13/911987	US9238808	1/19/2016	Modular adjustable pulse generator	Dolby Intellectual Property Licensing, LLC	Active
264901-US-1	US	12/26/2012	US13/727019	US9465080	10/11/2016	System and method for prognosis of batteries	Dolby Intellectual Property Licensing, LLC	Active
265319-CN-4	CN	11/20/2014	CN201410670323A	CN104659895	11/15/2019	For using the equipment and its manufacturing method of vehicle power electronic device quick charge	Dolby Intellectual Property Licensing, LLC	Active
265319-DE-6	DE	11/19/2014	EP1419390A	EP2875984	8/2/2023	Apparatus for rapid charging using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
265319-EP-3	EP	11/19/2014	EP1419390A	EP2875984	8/2/2023	Apparatus for rapid charging using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
265319-IN-5	IN	7/23/2014	IN5693CHN2014A	IN304209	12/14/2018	A method and a system for monitoring and control of	Dolby Intellectual Property Licensing, LLC	Active
265319-JP-2	JP	11/17/2014	JP2014232280A	JP6467198	2/6/2019	Device for rapid charging using in-vehicle power electronics and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active

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265319-US-1	US	11/20/2013	US14/085313	US9238415	1/19/2016	Apparatus for rapid charging using onboard power electronics and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
265379-US-1	US	7/31/2013	US13/955413	US9692045	6/27/2017	Porous absorbent for sodium metal halide cells	Dolby Intellectual Property Licensing, LLC	Active
265379-US-2	US	7/31/2013	US13/955476	US10033069	7/24/2018	Porous absorbent for sodium metal halide cells	Dolby Intellectual Property Licensing, LLC	Active
265452-US-1	US	6/26/2013	US13/927543	US8912512	12/16/2014	System and method for optical biopsy tissue characterization	Joint ownership - Dolby Intellectual Property Licensing, LLC and Memorial Sloan Kettering Cancer Center	Active
265784-BR-4	BR	8/4/2014	BR102014019219A	BR102014019219	8/10/2021	Internal permanent magnet machine and method for arranging together an internal permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
265784-CN-3	CN	8/5/2014	CN201410616305A	CN104393730	1/18/2019	Spoke permanent magnetic motor and its manufacturing method with reduced torque ripple	Dolby Intellectual Property Licensing, LLC	Active
265784-DE-9	DE	7/31/2014	EP14179274A	EP2840692	12/23/2020	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265784-EP-2	EP	7/31/2014	EP14179274A	EP2840692	12/23/2020	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265784-FR-8	FR	7/31/2014	EP14179274A	EP2840692	12/23/2020	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265784-GB-11	GB	7/31/2014	EP14179274A	EP2840692	12/23/2020	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265784-KR-6	KR	8/4/2014	KR20140099747A	KR101911978	10/25/2018	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265784-NL-10	NL	7/31/2014	EP14179274A	EP2840692	12/23/2020	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265784-US-1	US	8/5/2013	US13/958693	US9287742	3/15/2016	Spoke permanent magnet machine with reduced torque ripple and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
265951-CN-5	CN	10/26/2015	CN201580065801A	CN107004541	12/17/2019	Multi-channel relay assembly with in-line mems switches	Dolby Intellectual Property Licensing, LLC	Active
265951-EP-6	EP	10/26/2015	EP15791159A	EP3227899	10/11/2017	Multichannel relay assembly with in line mems switches	Dolby Intellectual Property Licensing, LLC	Active
265951-KR-10	KR	10/26/2015	KR20237015032A	KR20230065386	5/11/2023	Multichannel relay assembly with in line mems switches	Dolby Intellectual Property Licensing, LLC	Active
265951-SG-9	SG	10/26/2015	SG11201704153RA	SG11201704153R	6/29/2017	Multichannel relay assembly with in line mems switches	Dolby Intellectual Property Licensing, LLC	Active
265951-TW-3	TW	11/19/2015	TW104138310A	TW1695398	6/1/2020	Multichannel relay assembly with in line mems switches	Dolby Intellectual Property Licensing, LLC	Active
265951-US-1	US	12/3/2014	US14/558990	US9362608	6/7/2016	Multichannel relay assembly with in line mems switches	Dolby Intellectual Property Licensing, LLC	Active
266269-BR-2	BR	10/17/2014	BR102014025977A	BR102014025977	8/3/2021	Electric machine and vehicle	Dolby Intellectual Property Licensing, LLC	Active
266269-KR-6	KR	10/17/2014	KR20140140921A	KR101996687	7/4/2019	Torque ripple reduction in electric machines	Dolby Intellectual Property Licensing, LLC	Active
266269-US-1	US	10/18/2013	US14/057591	US9742228	8/22/2017	Torque ripple reduction in electric machines	Dolby Intellectual Property Licensing, LLC	Active
266271-CN-2	CN	11/5/2014	CN201410615389A	CN104618320	7/9/2019	System and method for implementation of file transfer	Dolby Intellectual Property Licensing, LLC	Active

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266271-DE-5	DE	11/3/2014	EP14191515A	EP2869529	8/31/2016	Systems and methods for secure file transfers	Dolby Intellectual Property Licensing, LLC	Active
266271-FR-6	FR	11/3/2014	EP14191515A	EP2869529	8/31/2016	Systems and methods for secure file transfers	Dolby Intellectual Property Licensing, LLC	Active
266271-GB-7	GB	11/3/2014	EP14191515A	EP2869529	8/31/2016	Systems and methods for secure file transfers	Dolby Intellectual Property Licensing, LLC	Active
266271-JP-4	JP	10/29/2014	JP2014219873A	JP6496522	4/3/2019	System and method for secure file transfer	Dolby Intellectual Property Licensing, LLC	Active
266271-US-1	US	11/5/2013	US14/072425	US9306915	4/5/2016	Systems and methods for secure file transfers	Dolby Intellectual Property Licensing, LLC	Active
266953-CN-1	CN	8/1/2013	CN201310331899A	CN104348199	3/1/2017	Battery management system and method	Dolby Intellectual Property Licensing, LLC	Active
266953-JP-3	JP	7/25/2014	JP2014151392A	JP6356518	7/11/2018	Battery management system and method	Dolby Intellectual Property Licensing, LLC	Active
266953-US-2	US	7/2/2014	US14/321935	US9455580	9/27/2016	Battery management system and method	Dolby Intellectual Property Licensing, LLC	Active
266980-US-1	US	12/28/2012	US13/729343	US9028997	5/12/2015	Ceramic collars for active brazing in sodium-based thermal batteries	Dolby Intellectual Property Licensing, LLC	Active
267009-US-1	US	9/27/2013	US14/039497	US9999352	6/19/2018	System and method for determining a hydration level of a tissue region	Dolby Intellectual Property Licensing, LLC	Active
267101-CN-4	CN	11/5/2014	CN201410858234A	CN104618341	12/27/2019	System and method for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267101-DE-6	DE	11/5/2014	EP14191891A	EP2869530	5/4/2022	Systems and methods for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267101-EP-2	EP	11/5/2014	EP14191891A	EP2869530	5/4/2022	Systems and methods for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267101-FR-5	FR	11/5/2014	EP14191891A	EP2869530	5/4/2022	Systems and methods for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267101-GB-7	GB	11/5/2014	EP14191891A	EP2869530	5/4/2022	Systems and methods for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267101-JP-3	JP	10/29/2014	JP2014219874A	JP6416585	10/31/2018	System and method for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267101-US-1	US	11/5/2013	US14/072414	US9191368	11/17/2015	Systems and methods for secure remote access	Dolby Intellectual Property Licensing, LLC	Active
267351-CA-2	CA	7/10/2014	CA2856487A	CA2856487	11/16/2021	Systems and methods for data loss prevention	Dolby Intellectual Property Licensing, LLC	Active
267351-JP-4	JP	7/11/2014	JP2014143007A	JP6587790	10/9/2019	System and method for data loss prevention	Dolby Intellectual Property Licensing, LLC	Active
267351-US-1	US	7/15/2013	US13/942318	US10346616	7/9/2019	Systems and methods for data loss prevention	Dolby Intellectual Property Licensing, LLC	Active
267632-US-1	US	4/25/2014	US14/262144	US9748767	8/29/2017	System and method for hybrid energy conversion	Dolby Intellectual Property Licensing, LLC	Active
267632-US-2	US	8/10/2017	US15/673520	US10431978	10/1/2019	System and method for hybrid energy conversion	Dolby Intellectual Property Licensing, LLC	Active
267788-CN-1	CN	10/11/2013	CN201310472988A	CN104553838	3/1/2017	Propulsion system	Dolby Intellectual Property Licensing, LLC	Active
267788-JP-3	JP	10/10/2014	JP2014208468A	JP6749742	9/2/2020	Propulsion system and vehicle driving method	Dolby Intellectual Property Licensing, LLC	Active

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267788-US-2	US	10/10/2014	US14/511362	US9895983	2/20/2018	Propulsion system and method for driving a vehicle	Dolby Intellectual Property Licensing, LLC	Active
267819-CN-4	CN	7/24/2014	CN201410354403A	CN104348269	4/2/2019	System and method for the field spider in equating motor	Dolby Intellectual Property Licensing, LLC	Active
267819-DE-6	DE	7/17/2014	EP14177512A	EP2840678	7/7/2021	System and method for smoothing a salient rotor in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
267819-EP-3	EP	7/17/2014	EP14177512A	EP2840678	7/7/2021	System and method for smoothing a salient rotor in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
267819-JP-2	JP	7/18/2014	JP2014147258A	JP6475431	2/27/2019	System and method for smoothing a protruding rotor of an electric machine	Dolby Intellectual Property Licensing, LLC	Active
267819-US-1	US	7/24/2013	US13/949406	US9520751	12/13/2016	System and method for smoothing a salient rotor in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
267847-CA-3	CA	7/18/2014	CA2857244A	CA2857244	8/15/2017	Isolated battery management systems and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
267847-CN-4	CN	7/24/2014	CN201410354637A	CN104348221	6/13/2017	Isolation battery management system and its method	Dolby Intellectual Property Licensing, LLC	Active
267847-DE-6	DE	7/21/2014	EP14177828A	EP2830182	9/6/2017	Isolated battery management systems and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
267847-FR-8	FR	7/21/2014	EP14177828A	EP2830182	9/6/2017	Isolated battery management systems and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
267847-GB-9	GB	7/21/2014	EP14177828A	EP2830182	9/6/2017	Isolated battery management systems and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
267847-IT-7	IT	7/21/2014	EP14177828A	EP2830182	9/6/2017	Isolated battery management systems and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
267847-JP-5	JP	7/22/2014	JP2014148432A	JP5890868	3/22/2016	Insulated battery management system and method	Dolby Intellectual Property Licensing, LLC	Active
267847-US-1	US	7/24/2013	US13/949567	US9318893	4/19/2016	Isolated battery management systems and methods thereof	Dolby Intellectual Property Licensing, LLC	Active
267895-CN-1	CN	1/27/2014	CN201410038726A	CN104811064	7/3/2020	Energy conversion system, photovoltaic energy conversion system and method	Dolby Intellectual Property Licensing, LLC	Active
268047-JP-3	JP	8/13/2014	JP2014164626A	JP6636238	1/29/2020	Plasmon interface and its manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
268047-TW-4	TW	8/7/2014	TW103127087A	TWI657278	4/21/2019	Plasmonic interface and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
268047-US-1	US	8/20/2013	US13/970852	US9465160	10/11/2016	Plasmonic interface and method of manufacturing thereof	Dolby Intellectual Property Licensing, LLC	Active
268102-DE-6	DE	7/23/2014	EP14178108A	EP2830186	12/6/2017	Battery heater systems and methods	Dolby Intellectual Property Licensing, LLC	Active
268102-FR-7	FR	7/23/2014	EP14178108A	EP2830186	12/6/2017	Battery heater systems and methods	Dolby Intellectual Property Licensing, LLC	Active
268102-GB-8	GB	7/23/2014	EP14178108A	EP2830186	12/6/2017	Battery heater systems and methods	Dolby Intellectual Property Licensing, LLC	Active
268102-IT-9	IT	7/23/2014	EP14178108A	EP2830186	12/6/2017	Battery heater systems and methods	Dolby Intellectual Property Licensing, LLC	Active
268102-KR-5	KR	7/25/2014	KR20140094717A	KR102219244	2/23/2021	Battery heater systems and methods	Dolby Intellectual Property Licensing, LLC	Active
268134-US-1	US	2/14/2013	US13/767066	US9028998	5/12/2015	Battery cell design and method of cooling battery cells	Dolby Intellectual Property Licensing, LLC	Active

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268409-US-1	US	10/16/2013	US14/055024	US9685904	6/20/2017	Photovoltaic system with improved dc connections and method of making same	Dolby Intellectual Property Licensing, LLC	Active
268409-US-2	US	10/16/2013	US14/055042	US9893678	2/13/2018	Photovoltaic system with improved ac connections and method of making same	Dolby Intellectual Property Licensing, LLC	Active
268409-US-3	US	5/24/2017	US15/604066	US10812015	10/20/2020	Micro-inverter assembly for use in a photovoltaic system and method of making same	Dolby Intellectual Property Licensing, LLC	Active
269204-CN-1	CN	10/25/2013	CN201310512240A	CN104554074	9/15/2017	Vehicle control system	Dolby Intellectual Property Licensing, LLC	Active
269204-JP-3	JP	10/21/2014	JP2014214125A	JP6496518	4/3/2019	Vehicle control system	Dolby Intellectual Property Licensing, LLC	Active
269204-US-2	US	10/15/2014	US14/514957	US9517696	12/13/2016	Vehicle control system	Dolby Intellectual Property Licensing, LLC	Active
269205-CN-1	CN	9/18/2013	CN201310429818A	CN104442412	1/19/2018	Device, mobile transporting equipment, electric tractor, electric forklift and associated method	Dolby Intellectual Property Licensing, LLC	Active
269205-DE-6	DE	9/17/2014	EP14185231A	EP2853459	6/17/2020	Apparatus, vehicle, and method for operating vehicle	Dolby Intellectual Property Licensing, LLC	Active
269205-EP-5	EP	9/17/2014	EP14185231A	EP2853459	6/17/2020	Apparatus, vehicle, and method for operating vehicle	Dolby Intellectual Property Licensing, LLC	Active
269205-IN-4	IN	9/17/2014	IN4524CH2014A	IN437465	7/7/2023	Apparatus, vehicle and method for operating vehicle	Dolby Intellectual Property Licensing, LLC	Active
269545-DE-9	DE	9/4/2014	EP14772495A	EP3055976	2/6/2019	Methods and systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269545-EP-4	EP	9/4/2014	EP14772495A	EP3055976	2/6/2019	Methods and systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269545-FR-8	FR	9/4/2014	EP14772495A	EP3055976	2/6/2019	Methods and systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269545-GB-10	GB	9/4/2014	EP14772495A	EP3055976	2/6/2019	Methods and systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269545-KR-6	KR	9/4/2014	KR20167011606A	KR101984363	5/30/2019	Methods and systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269545-TW-3	TW	9/25/2014	TW103133301A	TW664588	7/1/2019	Systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269545-US-1	US	10/8/2013	US14/048930	US9870690	1/16/2018	Methods and systems for a universal wireless platform for asset monitoring	Dolby Intellectual Property Licensing, LLC	Active
269575-AU-21	AU	7/22/2020	AU2020207831A	AU2020207831	1/13/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-AU-4	AU	1/9/2015	AU2015206756A	AU2015206756	5/14/2020	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-BR-5	BR	1/9/2015	1120160149530	N/A	9/12/2023		Dolby Intellectual Property Licensing, LLC	Active
269575-CA-6	CA	1/9/2015	CA2936230A	CA2936230	6/14/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-CN-7	CN	1/9/2015	CN201580004722A	CN105899949	9/3/2019	Use the platelet activation and growth factor release of electric pulse	Dolby Intellectual Property Licensing, LLC	Active
269575-DE-18	DE	1/9/2015	EP15701451A	EP3094970	3/6/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-DE-23	DE	1/9/2015	EP18210654A	EP3502690	9/7/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active

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269575-EP-16	EP	1/9/2015	EP18210654A	EP3502690	9/7/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-EP-8	EP	1/9/2015	EP15701451A	EP3094970	3/6/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-ES-25	ES	1/9/2015	EP18210654A	EP3502690	9/7/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-FR-17	FR	1/9/2015	EP15701451A	EP3094970	3/6/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-FR-22	FR	1/9/2015	EP18210654A	EP3502690	9/7/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-GB-19	GB	1/9/2015	EP15701451A	EP3094970	3/6/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-GB-26	GB	1/9/2015	EP18210654A	EP3502690	9/7/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-IN-9	IN	7/19/2016	IN201047024005A	IN412195	11/25/2022	Platelet activation and growth factor release using	Dolby Intellectual Property Licensing, LLC	Active
269575-IT-24	IT	1/9/2015	EP18210654A	EP3502690	9/7/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-JP-10	JP	1/9/2015	JP2016545972A	JP6625542	12/25/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-KR-11	KR	1/9/2015	KR20167021523A	KR102277931	7/15/2021	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-MX-12	MX	1/9/2015	MX2016009316A	MX2016009316	10/13/2016	Platelet activation and growth factor release using electric pulses.	Dolby Intellectual Property Licensing, LLC	Active
269575-RU-13	RU	1/9/2015	RU2016126427A	RU2712234	1/27/2020	Thrombocyte activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-TW-3	TW	1/7/2015	TW104100402A	TW1673054	10/1/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-US-1	US	1/17/2014	US14/157819	US9452199	9/27/2016	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-US-14	US	8/30/2016	US15/252032	US10369200	8/6/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-US-15	US	8/30/2016	US15/251990	US10383915	8/20/2019	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-US-20	US	7/17/2019	US16/514662	US11464829	10/11/2022	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269575-US-27	US	9/28/2022	US17/936162	US12042526	7/23/2024	Platelet activation and growth factor release using electric pulses	Dolby Intellectual Property Licensing, LLC	Active
269603-AU-12	AU	11/20/2014	AU2014377586A	AU2014377586	5/28/2020	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603A-US-1	US	4/17/2018	US15/955377	US10421956	9/24/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603A-US-2	US	8/12/2019	US16/538616	US11525768	12/13/2022	Electric pulse generation system using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-BR-7	BR	11/20/2014	BR112016015394A	BR112016015394	1/12/2021	Electric pulse generation system	Dolby Intellectual Property Licensing, LLC	Active
269603-CA-6	CA	11/20/2014	CA2936197A	CA2936197	4/25/2023	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active

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269603-CN-19	CN	11/20/2014	CN202110196663A	CN113088444	7/9/2021	Electric pulse generating system using capacitance coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-DE-16	DE	11/20/2014	EP14815988A	EP3094969	9/11/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-EP-4	EP	11/20/2014	EP14815988A	EP3094969	9/11/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-FR-15	FR	11/20/2014	EP14815988A	EP3094969	9/11/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-GB-17	GB	11/20/2014	EP14815988A	EP3094969	9/11/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-IN-11	IN	7/15/2016	IN201647024253A	IN424532	3/10/2023	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-JP-9	JP	11/20/2014	JP2016544865A	JP6573617	9/11/2019	Electric pulse generation system using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-KR-13	KR	11/20/2014	KR20167021404A	KR102213731	2/8/2021	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-KR-18	KR	11/20/2014	KR20217002961A	KR102255951	5/25/2021	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-MX-8	MX	11/20/2014	MX2016009314A	MX2016009314	10/13/2016	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-RU-5	RU	11/20/2014	RU2016127559A	RU2709822	12/23/2019	Electrical pulses generation system using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-TW-3	TW	12/26/2014	TW103145805A	TW1673033	10/1/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-US-1	US	1/17/2014	US14/158106	US9708597	7/18/2017	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269603-US-14	US	7/17/2017	US15/651900	US10329551	6/25/2019	Electric pulse generation systems using capacitive coupling	Dolby Intellectual Property Licensing, LLC	Active
269676-BR-6	BR	10/8/2014	BR102014025123A	BR102014025123	7/13/2021	Ferrite permanent magnet electric machine, method for heating a permanent magnet magnet electric machine and permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
269676-CN-3	CN	10/24/2014	CN201410573904A	CN104578651	9/21/2018	For the system and method for low-temperature heat ferrite magnet motor	Dolby Intellectual Property Licensing, LLC	Active
269676-DE-9	DE	10/24/2014	EP14190298A	EP2866334	10/24/2018	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active
269676-EP-2	EP	10/24/2014	EP14190298A	EP2866334	10/24/2018	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active
269676-FR-8	FR	10/24/2014	EP14190298A	EP2866334	10/24/2018	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active
269676-GB-10	GB	10/24/2014	EP14190298A	EP2866334	10/24/2018	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active
269676-JP-5	JP	10/21/2014	JP2014214126A	JP6541145	7/10/2019	System and method for heating a low temperature ferrite magnet motor	Dolby Intellectual Property Licensing, LLC	Active
269676-KR-4	KR	10/24/2014	KR20140145400A	KR102302513	9/17/2021	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active
269676-US-1	US	10/25/2013	US14/063547	US9698660	7/4/2017	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active
269676-US-7	US	5/5/2017	US15/588044	US9966897	5/8/2018	System and method for heating ferrite magnet motors for low temperatures	Dolby Intellectual Property Licensing, LLC	Active

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269695-CN-5	CN	10/8/2014	CN201410525151A	CN104517178	12/20/2022	Method and system for dynamic workflow priority determination and task allocation	Dolby Intellectual Property Licensing, LLC	Active
269695-DE-7	DE	10/1/2014	EP14187291A	EP2860987	9/30/2020	Methods and systems for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269695-EP-2	EP	10/1/2014	EP14187291A	EP2860987	9/30/2020	Methods and systems for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269695-FR-6	FR	10/1/2014	EP14187291A	EP2860987	9/30/2020	Methods and systems for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269695-GB-8	GB	10/1/2014	EP14187291A	EP2860987	9/30/2020	Methods and systems for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269695-JP-3	JP	10/3/2014	JP2014204374A	JP6467181	2/6/2019	Method and system for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269695-KR-4	KR	10/7/2014	KR20140134902A	KR102238059	4/8/2021	Methods and systems for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269695-US-1	US	10/8/2013	US14/048934	US10437203	10/8/2019	Methods and systems for dynamic workflow prioritization and tasking	Dolby Intellectual Property Licensing, LLC	Active
269823-CN-3	CN	8/28/2015	CN201510765021A	CN105391372	8/18/2020	Magnet management in an electric machine	Dolby Intellectual Property Licensing, LLC	Active
269823-DE-6	DE	8/27/2015	EP15182787A	EP2991220	10/12/2022	Magnet management in electric machines	Dolby Intellectual Property Licensing, LLC	Active
269823-EP-2	EP	8/27/2015	EP15182787A	EP2991220	10/12/2022	Magnet management in electric machines	Dolby Intellectual Property Licensing, LLC	Active
269823-JP-4	JP	8/26/2015	JP2015166313A	JP7130351	9/5/2022	Magnet management in electric machines	Dolby Intellectual Property Licensing, LLC	Active
269823-KR-5	KR	8/28/2015	KR20150121854A	KR101983428	5/28/2019	Magnet management in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
269823-US-1	US	8/29/2014	US14/473216	US9602043	3/21/2017	Magnet management in electric machines	Dolby Intellectual Property Licensing, LLC	Active
269935-US-1	US	6/26/2013	US13/927683	US9216010	12/22/2015	System and method for aligning a biopsy collecting device	Joint ownership - Dolby Intellectual Property Licensing, LLC and Memorial Sloan Kettering Cancer Center	Active
270277-US-1	US	7/26/2013	US13/952317	US9362537	6/7/2016	Electrochemical cells, and related energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
270450-US-1	US	9/22/2014	US14/492170	US9385627	7/5/2016	Universal power conversion devices for alternating current electric apparatus	Dolby Intellectual Property Licensing, LLC	Active
271055-IT-6	IT	4/30/2015	1.02015E+14	N/A	9/25/2017		Dolby Intellectual Property Licensing, LLC	Active
271055-JP-2	JP	5/14/2015	JP2015098658A	JP6722426	7/15/2020	Thermal clamp device for electronic system	Dolby Intellectual Property Licensing, LLC	Active
271055-TW-5	TW	5/11/2015	TW104114895A	TWI663894	6/21/2019	Electronic device and method for removing heat from an electronic device	Dolby Intellectual Property Licensing, LLC	Active
271055-US-1	US	5/23/2014	US14/285720	US9668334	5/30/2017	Thermal clamp apparatus for electronic systems	Dolby Intellectual Property Licensing, LLC	Active
271087-US-1	US	7/1/2014	US14/321072	US9806380	10/31/2017	High temperature electrochemical cell structures, and methods for making	Dolby Intellectual Property Licensing, LLC	Active
271261-DE-8	DE	5/22/2015	EP15168809A	EP2947062	2/17/2021	Method for joining ceramic to metal	Dolby Intellectual Property Licensing, LLC	Active
271261-EP-5	EP	5/22/2015	EP15168809A	EP2947062	2/17/2021	Method for joining ceramic to metal	Dolby Intellectual Property Licensing, LLC	Active

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271261-FR-7	FR	5/22/2015	EP15168809A	EP2947062	2/17/2021	Method for joining ceramic to metal	Dolby Intellectual Property Licensing, LLC	Active
271261-GB-10	GB	5/22/2015	EP15168809A	EP2947062	2/17/2021	Method for joining ceramic to metal	Dolby Intellectual Property Licensing, LLC	Active
271261-IN-1	IN	5/23/2014	IN2303CH2014A	IN322482	10/11/2019	Method for joining ceramic to metal, and sealing	Dolby Intellectual Property Licensing, LLC	Active
271261-IT-9	IT	5/22/2015	EP15168809A	EP2947062	2/17/2021	Method for joining ceramic to metal	Dolby Intellectual Property Licensing, LLC	Active
271261-JP-4	JP	5/19/2015	JP2015101614A	JP6480806	3/13/2019	Method for bonding ceramic and metal and sealing structure thereof	Dolby Intellectual Property Licensing, LLC	Active
271261-KR-6	KR	5/22/2015	KR20150072036A	KR102398188	5/17/2022	Method for joining ceramic to metal, and sealing structure thereof	Dolby Intellectual Property Licensing, LLC	Active
271261-US-2	US	5/22/2015	US14/719742	US10103410	10/16/2018	Method for joining ceramic to metal, and sealing structure thereof	Dolby Intellectual Property Licensing, LLC	Active
271359-CN-1	CN	12/8/2014	CN201410747549A	CN105730257	5/22/2018	Propulsion system, energy management system and method	Dolby Intellectual Property Licensing, LLC	Active
271359-JP-2	JP	12/2/2015	JP2015235294A	JP6769706	10/14/2020	Propulsion system and energy management system and their methods	Dolby Intellectual Property Licensing, LLC	Active
271359-US-3	US	12/8/2015	US14/962332	US9643513	5/9/2017	Propelling system and energy management system and methods	Dolby Intellectual Property Licensing, LLC	Active
271380-US-1	US	10/7/2014	US14/507908	US9837654	12/5/2017	Power connector for a battery management system	Dolby Intellectual Property Licensing, LLC	Active
271404-US-1	US	7/7/2014	US14/324755	US9269028	2/23/2016	System and method for determining string similarity	Dolby Intellectual Property Licensing, LLC	Active
271471-CN-1	CN	10/27/2014	CN201410582236A	CN105634229	1/8/2019	Magneto	Dolby Intellectual Property Licensing, LLC	Active
271474-CN-3	CN	7/21/2016	CN201680051061A	CN107925138	5/11/2021	Energy storage device with reduced temperature variability between batteries	Dolby Intellectual Property Licensing, LLC	Active
271474-DE-7	DE	7/21/2016	EP16745353A	EP3345243	1/27/2021	Energy storage device with reduced temperature variability between cells	Dolby Intellectual Property Licensing, LLC	Active
271474-EP-4	EP	7/21/2016	EP16745353A	EP3345243	1/27/2021	Energy storage device with reduced temperature variability between cells	Dolby Intellectual Property Licensing, LLC	Active
271474-FR-6	FR	7/21/2016	EP16745353A	EP3345243	1/27/2021	Energy storage device with reduced temperature variability between cells	Dolby Intellectual Property Licensing, LLC	Active
271474-GB-8	GB	7/21/2016	EP16745353A	EP3345243	1/27/2021	Energy storage device with reduced temperature variability between cells	Dolby Intellectual Property Licensing, LLC	Active
271474-IN-5	IN	3/16/2018	IN201847009747A	IN406407	9/16/2022	Energy storage device with reduced temperature variability between cells	Dolby Intellectual Property Licensing, LLC	Active
271474-US-1	US	9/2/2015	US14/843164	US9806387	10/31/2017	Energy storage device with reduced temperature variability between cells	Dolby Intellectual Property Licensing, LLC	Active
271785-US-1	US	12/16/2014	US14/572216	US9548518	1/17/2017	Methods for joining ceramic and metallic structures	Dolby Intellectual Property Licensing, LLC	Active
272354-US-2	US	12/19/2013	US14/133967	US9255779	2/9/2016	Wireless taper gauge and method of using same	Dolby Intellectual Property Licensing, LLC	Active
272442-CN-2	CN	7/22/2015	CN201510432791A	CN105322739	8/27/2019	The system and method for preventing stator permanent magnet from demagnetizing during vacuum pressure impregnation	Dolby Intellectual Property Licensing, LLC	Active
272442-DE-7	DE	7/20/2015	EP15177470A	EP2978111	11/18/2020	System and method for preventing stator permanent magnet demagnetization during vacuum pressure impregnation	Dolby Intellectual Property Licensing, LLC	Active

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272442-EP-3	EP	7/20/2015	EP15177470A	EP2978111	11/18/2020	System and method for preventing stator permanent magnet demagnetization during vacuum pressure impregnation	Dolby Intellectual Property Licensing, LLC	Active
272442-FR-6	FR	7/20/2015	EP15177470A	EP2978111	11/18/2020	System and method for preventing stator permanent magnet demagnetization during vacuum pressure impregnation	Dolby Intellectual Property Licensing, LLC	Active
272442-JP-4	JP	7/14/2015	JP2015140116A	JP6635697	1/29/2020	Systems and methods for preventing stator demagnetization during vacuum impregnation	Dolby Intellectual Property Licensing, LLC	Active
272442-KR-5	KR	7/22/2015	KR20150103826A	KR102411266	6/21/2022	System and method for preventing stator permanent magnet demagnetization during vacuum pressure impregnation	Dolby Intellectual Property Licensing, LLC	Active
272442-US-1	US	7/22/2014	US14/337469	US9673667	6/6/2017	System and method for preventing stator permanent magnet demagnetization during vacuum pressure impregnation	Dolby Intellectual Property Licensing, LLC	Active
272805-US-2	US	6/9/2014	US14/299116	US9246429	1/26/2016	Control method for reducing torque ripple in switched reluctance motors	Dolby Intellectual Property Licensing, LLC	Active
273156-US-1	US	12/1/2015	US14/956067	US10859563	12/8/2020	Erythrocyte aggregation and leukocyte isolation	Dolby Intellectual Property Licensing, LLC	Active
273156-US-5	US	12/7/2020	US17/113527	US11821891	11/21/2023	Erythrocyte aggregation and leukocyte isolation	Dolby Intellectual Property Licensing, LLC	Active
273252-CN-10	CN	1/30/2015	CN201911098959A	CN111055693	4/11/2023	Vehicle propulsion system with multi-channel dc bus and method for manufacturing the system	Dolby Intellectual Property Licensing, LLC	Active
273252-CN-4	CN	1/30/2015	CN201510050190A	CN104816641	11/26/2019	Vehicle propulsion system with multichannel dc bus and the method for manufacturing the system	Dolby Intellectual Property Licensing, LLC	Active
273252-IN-5	IN	1/2/2015	IN36CH2015A	IN36CH2015	7/1/2016	Vehicle propulsion system with multi-channel dc bus and	Dolby Intellectual Property Licensing, LLC	Active
273252-JP-3	JP	1/21/2015	JP2015009031A	JP6567830	8/28/2019	Vehicle propulsion system having a multi-channel dc bus and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
273252-JP-9	JP	4/1/2019	JP2019069591A	JP6774519	10/28/2020	Vehicle propulsion system with multi-channel dc bus and method of manufacturing the system	Dolby Intellectual Property Licensing, LLC	Active
273252-KR-7	KR	1/20/2015	KR20150009219A	KR101933538	12/28/2018	Vehicle propulsion system with multi-channel dc bus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
273252-US-1	US	1/30/2014	US14/168224	US9834098	12/5/2017	Vehicle propulsion system with multi-channel dc bus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
273252-US-13	US	8/29/2019	US16/555487	US10549648	2/4/2020	Vehicle propulsion system with multi-channel dc bus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
273252-US-14	US	12/23/2019	US16/725151	US10933754	3/2/2021	Vehicle propulsion system with multi-channel dc bus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
273252-US-15	US	2/1/2021	US17/163646	US11351874	6/7/2022	Vehicle propulsion system with multi-channel dc bus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
273252-US-8	US	10/31/2017	US15/799045	US10442296	10/15/2019	Vehicle propulsion system with multi-channel dc bus and method of manufacturing same	Dolby Intellectual Property Licensing, LLC	Active
273345-CN-2	CN	8/19/2015	CN201510764915A	CN105437992	2/5/2021	Vehicle propulsion system with energy storage system and optimization method for controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
273345-CN-8	CN	8/19/2015	CN202010411753A	CN111746495	3/28/2023	Vehicle propulsion system with energy storage system and optimization method for controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active

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273345-DE-9	DE	8/17/2015	EP15181274A	EP2987674	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
273345-EP-3	EP	8/17/2015	EP15181274A	EP2987674	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
273345-JP-4	JP	8/17/2015	JP2015160261A	JP6659270	3/4/2020	Vehicle propulsion system with energy storage system and optimized method of controlling its operation	Dolby Intellectual Property Licensing, LLC	Active
273345-JP-7	JP	10/2/2019	JP2019182546A	JP6972076	11/24/2021	Vehicle propulsion system having energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
273345-KR-5	KR	8/19/2015	KR20150116698A	KR102385058	4/12/2022	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
273345-US-1	US	8/19/2014	US14/462765	US9878632	1/30/2018	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
273632-US-1	US	7/31/2014	US14/447968	US9913406	3/6/2018	System and method for controlling ambient temperature at a power-consuming site	Dolby Intellectual Property Licensing, LLC	Active
274422-US-1	US	8/1/2014	US14/449916	US9436866	9/6/2016	High sensitivity flat panel microbiology detection and enumeration system	Dolby Intellectual Property Licensing, LLC	Active
274610-BR-7	BR	1/12/2016	BR102016000601A	BR102016000601	6/14/2022	Vehicle system and method for power transfer in a vehicle system	Dolby Intellectual Property Licensing, LLC	Active
274610-CA-9	CA	1/7/2016	CA2916815A	CA2916815	5/26/2020	Bi-directional dc-dc power converter for a vehicle system	Dolby Intellectual Property Licensing, LLC	Active
274610-CN-3	CN	1/13/2016	CN201610019786A	CN105790588	2/7/2020	Bidirectional dc-dc power converter for vehicle systems	Dolby Intellectual Property Licensing, LLC	Active
274610-IN-4	IN	1/13/2016	IN201644001185A	IN409927	10/28/2022	Bi-directional dc-dc power converter for a vehicle system	Dolby Intellectual Property Licensing, LLC	Active
274610-JP-2	JP	1/8/2016	JP2016002139A	JP6713774	6/24/2020	Bidirectional dc/dc power converter for vehicle system	Dolby Intellectual Property Licensing, LLC	Active
274610-KR-5	KR	1/13/2016	KR2016000444A	KR101938331	4/11/2019	Bi-directional dc-dc power converter for a vehicle system	Dolby Intellectual Property Licensing, LLC	Active
274610-MX-8	MX	1/12/2016	MX2016000431A	MX352791	12/7/2017	Bi-directional dc-dc power converter for a vehicle system.	Dolby Intellectual Property Licensing, LLC	Active
274610-US-1	US	1/13/2015	US14/595706	US9809119	11/7/2017	Bi-directional dc-dc power converter for a vehicle system	Dolby Intellectual Property Licensing, LLC	Active
274626-US-1	US	11/21/2014	US14/550408	US9748564	8/29/2017	Electrode compositions and related energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
274698-CA-5	CA	2/23/2015	CA2942042A	CA2942042	7/12/2022	System architecture for wireless metrological devices	Dolby Intellectual Property Licensing, LLC	Active
274698-CN-6	CN	2/23/2015	CN201580014431A	CN106462532	11/29/2019	The system architecture of wireless measuring equipment	Dolby Intellectual Property Licensing, LLC	Active
274698-JP-8	JP	2/23/2015	JP2016556321A	JP6599349	10/30/2019	System architecture for wireless weighing devices	Dolby Intellectual Property Licensing, LLC	Active
274698-MX-9	MX	2/23/2015	MX2016012012A	MX2016012012	12/7/2016	System architecture for wireless metrological devices.	Dolby Intellectual Property Licensing, LLC	Active

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274698-TW-4	TW	3/17/2015	TW104108520A	TWI663855	6/21/2019	System architecture for wireless metrological devices	Dolby Intellectual Property Licensing, LLC	Active
274698-US-2	US	12/16/2014	US14/571973	US10193979	1/29/2019	System architecture for wireless metrological devices	Dolby Intellectual Property Licensing, LLC	Active
274886-CN-1	CN	10/27/2014	CN201410581804A	CN105590713	3/8/2019	Permanent magnet and its manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
274984-CA-3	CA	6/23/2015	CA2952661A	CA2952661	1/17/2023	Integrated micro-electromechanical switches and a related method thereof	Dolby Intellectual Property Licensing, LLC	Active
274984-CN-4	CN	6/23/2015	CN201580034300A	CN106415772	8/13/2019	Integrated micro-electro-mechanical switch and its correlation technique	Dolby Intellectual Property Licensing, LLC	Active
274984-DE-8	DE	6/23/2015	EP15810992A	EP3161847	5/31/2023	Integrated micro-electromechanical switches and a related method thereof	Dolby Intellectual Property Licensing, LLC	Active
274984-EP-5	EP	6/23/2015	EP15810992A	EP3161847	5/31/2023	Integrated micro-electromechanical switches and a related method thereof	Dolby Intellectual Property Licensing, LLC	Active
274984-JP-6	JP	6/23/2015	JP2016574280A	JP6781048	11/4/2020	Integrated microelectromechanical switches and related methods	Dolby Intellectual Property Licensing, LLC	Active
274984-SG-7	SG	6/23/2015	SG11201610176YA	SG11201610176Y	1/27/2017	Integrated micro-electromechanical switches and a related method thereof	Dolby Intellectual Property Licensing, LLC	Active
274984-US-1	US	6/25/2014	US14/314344	US9117610	8/25/2015	Integrated micro-electromechanical switches and a related method thereof	Dolby Intellectual Property Licensing, LLC	Active
275094-CN-1	CN	1/14/2015	CN201510019281A	CN105835708	4/23/2019	Vehicle drive system and energy management control method	Dolby Intellectual Property Licensing, LLC	Active
275094-JP-2	JP	1/13/2016	JP2016004001A	JP6920010	8/18/2021	A vehicle drive system and an energy control method	Dolby Intellectual Property Licensing, LLC	Active
275094-KR-5	KR	1/14/2016	KR20160004985A	KR102460194	10/27/2022	Vehicle driving system and energy control methods	Dolby Intellectual Property Licensing, LLC	Active
275094-US-3	US	1/14/2016	US14/995936	US10227019	3/12/2019	Vehicle driving system and energy control methods	Dolby Intellectual Property Licensing, LLC	Active
275150-US-1	US	8/26/2014	US14/469002	US9520798	12/13/2016	Multi-level dc-dc converter with galvanic isolation and adaptive conversion ratio	Dolby Intellectual Property Licensing, LLC	Active
275187-BR-7	BR	9/30/2015	BR102015025127A	BR102015025127	6/14/2016	Wireless charging system and system	Dolby Intellectual Property Licensing, LLC	Active
275187-CA-3	CA	10/1/2015	CA2907232A	CA2907232	4/4/2023	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-CN-4	CN	10/9/2015	CN201510647562A	CN105515217	11/6/2020	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-EP-8	EP	10/7/2015	EP15188811A	EP3007304	4/13/2016	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-IN-1	IN	10/10/2014	IN5098CH2014A	IN412397	12/2/2022	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-JP-5	JP	10/5/2015	JP2015197285A	JP6956461	11/2/2021	The system and method for contactless energy transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-KR-10	KR	3/24/2023	KR20230038621A	KR20230044168	4/3/2023	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-KR-6	KR	9/30/2015	KR20150137990A	KR102449510	9/29/2022	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275187-KR-9	KR	9/26/2022	KR20220121750A	KR102515488	3/29/2023	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active

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275187-US-2	US	10/8/2015	US14/878554	US10978880	4/13/2021	System and method for contactless power transfer	Dolby Intellectual Property Licensing, LLC	Active
275327-DE-6	DE	7/13/2016	EP16829011A	EP3344574	4/12/2023	Refractory seed metal for electroplated mems structures	Dolby Intellectual Property Licensing, LLC	Active
275327-EP-5	EP	7/13/2016	EP16829011A	EP3344574	4/12/2023	Refractory seed metal for electroplated mems structures	Dolby Intellectual Property Licensing, LLC	Active
275327-JP-4	JP	7/13/2016	JP2018511120A	JP6820913	1/27/2021	High melting point seed metal with electroplated mems structure	Dolby Intellectual Property Licensing, LLC	Active
275327-TW-3	TW	8/22/2016	TW105126789A	TW1701212	8/11/2020	Refractory seed metal for electroplated mems structures	Dolby Intellectual Property Licensing, LLC	Active
275327-US-1	US	9/3/2015	US14/844132	US9845235	12/19/2017	Refractory seed metal for electroplated mems structures	Dolby Intellectual Property Licensing, LLC	Active
275483-CN-5	CN	8/19/2015	CN201510511035A	CN105365599	10/23/2020	Vehicle propulsion system with energy storage system and optimization method for controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-DE-7	DE	8/17/2015	EP15181296A	EP2987673	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-EP-3	EP	8/17/2015	EP15181296A	EP2987673	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-ES-9	ES	8/17/2015	EP15181296A	EP2987673	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-FR-6	FR	8/17/2015	EP15181296A	EP2987673	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-GB-10	GB	8/17/2015	EP15181296A	EP2987673	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-IT-8	IT	8/17/2015	EP15181296A	EP2987673	3/8/2023	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-JP-2	JP	8/13/2015	JP2015159747A	JP6700006	5/27/2020	Vehicle propulsion system with energy storage system and optimized method of controlling its operation	Dolby Intellectual Property Licensing, LLC	Active
275483-KR-4	KR	8/19/2015	KR20150116684A	KR101940366	4/11/2019	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275483-US-1	US	8/19/2014	US14/462792	US9399407	7/26/2016	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275546-CN-1	CN	9/24/2014	CN201410493810A	CN105509639	1/1/2019	For the measuring system and measurement method of measure geometry feature	Dolby Intellectual Property Licensing, LLC	Active
275546-DE-7	DE	9/23/2015	EP15186566A	EP3001139	2/6/2019	System and method of measuring geometric characteristics of an object	Dolby Intellectual Property Licensing, LLC	Active
275546-EP-2	EP	9/23/2015	EP15186566A	EP3001139	2/6/2019	System and method of measuring geometric characteristics of an object	Dolby Intellectual Property Licensing, LLC	Active

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275546-FR-6	FR	9/23/2015	EP15186566A	EP3001139	2/6/2019	System and method of measuring geometric characteristics of an object	Dolby Intellectual Property Licensing, LLC	Active
275546-GB-8	GB	9/23/2015	EP15186566A	EP3001139	2/6/2019	System and method of measuring geometric characteristics of an object	Dolby Intellectual Property Licensing, LLC	Active
275546-JP-3	JP	9/17/2015	JP2015183536A	JP6570938	9/4/2019	System and method for measuring geometric features of an object	Dolby Intellectual Property Licensing, LLC	Active
275546-KR-4	KR	9/24/2015	KR20150135539A	KR102004576	7/26/2019	System and method of measuring geometric characteristics of object	Dolby Intellectual Property Licensing, LLC	Active
275546-US-5	US	9/24/2015	US14/863481	US9970753	5/15/2018	System and method of measuring geometric characteristics of object	Dolby Intellectual Property Licensing, LLC	Active
275550-US-1	US	10/30/2014	US14/528013	US9627897	4/18/2017	String current limited battery charging control	Dolby Intellectual Property Licensing, LLC	Active
275550-US-2	US	4/17/2017	US15/488813	US10218188	2/26/2019	String current limited battery charging control	Dolby Intellectual Property Licensing, LLC	Active
275603-US-1	US	9/8/2014	US14/479937	US9783185	10/10/2017	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275603-US-2	US	9/8/2014	US14/480002	US9889752	2/13/2018	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275603-US-3	US	7/13/2016	US15/208777	US10081350	9/25/2018	Vehicle propulsion system having an energy storage system and optimized method of controlling operation thereof	Dolby Intellectual Property Licensing, LLC	Active
275796-US-1	US	10/9/2014	US14/510306	US10391878	8/27/2019	System and method for calibrating battery state of charge	Dolby Intellectual Property Licensing, LLC	Active
276670-US-1	US	1/27/2015	US14/606068	US9897658	2/20/2018	System and method for detecting battery end of discharge	Dolby Intellectual Property Licensing, LLC	Active
276753A-US-1	US	1/30/2015	US14/609549	US10126723	11/13/2018	Performing passive maintenance on an energy storage farm	Dolby Intellectual Property Licensing, LLC	Active
276753-US-1	US	1/30/2015	US14/609528	US9979195	5/22/2018	Power distribution in energy storage farms	Dolby Intellectual Property Licensing, LLC	Active
277187-CN-6	CN	4/5/2016	CN201680084281A	CN109072166	12/21/2018	Activated blood platelet composition with adjustable growth factor levels	Dolby Intellectual Property Licensing, LLC	Active
277187-JP-5	JP	4/5/2016	JP2018550519A	JP6840770	3/10/2021	Activated platelet composition capable of regulating growth factor levels	Dolby Intellectual Property Licensing, LLC	Active
277187-JP-8	JP	2/17/2021	JP2021023806A	JP7248721	3/29/2023	Activated platelet composition with tunable growth factor level	Dolby Intellectual Property Licensing, LLC	Active
277187-KR-7	KR	4/5/2016	KR20187032082A	KR102516995	3/31/2023	Activated platelet composition with tunable growth factor levels	Dolby Intellectual Property Licensing, LLC	Active
277187-US-1	US	3/31/2015	US14/674971	US9752120	9/5/2017	Activated platelet composition with tunable growth factor level	Dolby Intellectual Property Licensing, LLC	Active
277187-US-3	US	9/1/2017	US15/694635	US10927345	2/23/2021	Activated platelet composition with tunable growth factor level	Dolby Intellectual Property Licensing, LLC	Active
277201-JP-3	JP	12/5/2016	JP2016235520A	JP6829594	2/10/2021	Systems and methods for hair segmentation	Dolby Intellectual Property Licensing, LLC	Active
277201-US-1	US	12/16/2015	US14/970580	US9830710	11/28/2017	Systems and methods for hair segmentation	Dolby Intellectual Property Licensing, LLC	Active
277298-CA-4	CA	2/2/2016	CA2977788A	CA2977788	8/29/2023	Electromechanical system substrate attachment for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active

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277298-CN-7	CN	2/2/2016	CN201680013454A	CN107430962	10/18/2019	For reducing the mechatronic systems substrate attachment of thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-DE-11	DE	2/2/2016	EP16710509A	EP3266033	8/24/2022	Electromechanical system substrate attachment for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-EP-5	EP	2/2/2016	EP16710509A	EP3266033	8/24/2022	Electromechanical system substrate attachment for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-JP-6	JP	2/2/2016	JP2017544877A	JP6854769	4/7/2021	Electromechanical system board attachment for reducing thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-KR-9	KR	2/2/2016	KR20177026875A	KR102591895	10/19/2023	Attachment to electromechanical system substrate for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-SG-8	SG	2/2/2016	SG11201706665UA	SG11201706665U	9/28/2017	Electromechanical system substrate attachment for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-TW-3	TW	2/16/2016	TW105104499A	TWI664136	7/1/2019	Electromechanical system substrate attachment for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277298-US-1	US	3/2/2015	US14/634981	US9663347	5/30/2017	Electromechanical system substrate attachment for reduced thermal deformation	Dolby Intellectual Property Licensing, LLC	Active
277870-CN-4	CN	12/11/2015	CN201511036231A	CN105783693	1/21/2020	Method and device for measuring the thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277870-DE-7	DE	12/4/2015	EP15197958A	EP3032216	11/1/2017	Method and apparatus for measuring thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277870-GB-8	GB	12/4/2015	EP15197958A	EP3032216	11/1/2017	Method and apparatus for measuring thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277870-JP-3	JP	12/9/2015	JP2015239807A	JP6664945	3/13/2020	Method and apparatus for measuring the thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277870-KR-5	KR	12/11/2015	KR20150177162A	KR101878542	7/13/2018	Method and apparatus for measuring thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277870-TW-6	TW	12/1/2015	TW104140142A	TWI636233	9/21/2018	Method and apparatus for measuring thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277870-US-1	US	12/12/2014	US14/568912	US9441937	9/13/2016	Method and apparatus for measuring thickness of an object	Dolby Intellectual Property Licensing, LLC	Active
277888A-US-1	US	3/13/2015	US14/657204	US9913628	3/13/2018	System and method for attaching a biopsy collecting device to a spectroscopy system	Joint ownership - Dolby Intellectual Property Licensing, LLC and Memorial Sloan Kettering Cancer Center	Active
277888-US-1	US	3/13/2015	US14/657085	US10531862	1/14/2020	System and method for attaching a biopsy collecting device to a spectroscopy system	Joint ownership - Dolby Intellectual Property Licensing, LLC and Memorial Sloan Kettering Cancer Center	Active
278163-US-1	US	5/22/2015	US14/720005	US9899695	2/20/2018	Zinc-based electrolyte compositions, and related electrochemical processes and articles	Dolby Intellectual Property Licensing, LLC	Active
278667-US-1	US	8/20/2015	US14/831357	US9567232	2/14/2017	Method for preparing sodium chloro-aluminate	Dolby Intellectual Property Licensing, LLC	Active
278828-US-1	US	5/20/2015	US14/717286	US10069457	9/4/2018	System for mounting a microinverter to a photovoltaic panel and method of making same	Dolby Intellectual Property Licensing, LLC	Active
278831-US-1	US	5/20/2015	US14/717195	US10164566	12/25/2018	Universal microinverter mounting bracket for a photovoltaic panel and associated method	Dolby Intellectual Property Licensing, LLC	Active
278851-US-1	US	5/27/2015	US14/722251	US9705422	7/11/2017	System and method for soft switching power inversion	Dolby Intellectual Property Licensing, LLC	Active
278961-JP-3	JP	7/8/2016	JP2016135586A	JP6859034	4/14/2021	Circuits and methods for synchronous rectification in resonant transducers	Dolby Intellectual Property Licensing, LLC	Active

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278961-US-1	US	7/23/2015	US14/806793	US9887634	2/6/2018	Circuits and methods for synchronous rectification in resonant converters	Dolby Intellectual Property Licensing, LLC	Active
279301A-DE-6	DE	7/21/2016	EP16754013A	EP3341323	11/17/2021	Radio frequency micro-electromechanical systems having inverted microstrip transmission lines and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
279301A-EP-5	EP	7/21/2016	EP16754013A	EP3341323	11/17/2021	Radio frequency micro-electromechanical systems having inverted microstrip transmission lines and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
279301A-JP-4	JP	7/21/2016	JP2018511119A	JP6868006	5/12/2021	The radio frequency micro-electro-mechanical system which has the reversed microstrip transmission line, and its manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
279301A-TW-3	TW	8/8/2016	TW105125205A	TW1641015	11/11/2018	Radio frequency micro-electromechanical systems having inverted microstrip transmission lines and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
279301A-US-1	US	8/28/2015	US14/839464	US9954263	4/24/2018	Radio frequency micro-electromechanical systems having inverted microstrip transmission lines and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
279321-US-1	US	5/21/2015	US14/718146	US9786956	10/10/2017	Current collector design to reduce granule bed disruption	Dolby Intellectual Property Licensing, LLC	Active
279321-US-2	US	10/5/2017	US15/725310	US10411305	9/10/2019	Current collector design to reduce granule bed disruption	Dolby Intellectual Property Licensing, LLC	Active
279412-CN-3	CN	7/27/2016	CN201680052540A	CN108140764	5/11/2021	Energy storage device with improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-DE-7	DE	7/27/2016	EP16747982A	EP3347933	5/20/2020	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-EP-5	EP	7/27/2016	EP16747982A	EP3347933	5/20/2020	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-FR-6	FR	7/27/2016	EP16747982A	EP3347933	5/20/2020	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-GB-9	GB	7/27/2016	EP16747982A	EP3347933	5/20/2020	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-IN-4	IN	3/27/2018	IN201847011310A	IN378849	10/15/2021	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-IT-8	IT	7/27/2016	EP16747982A	EP3347933	5/20/2020	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279412-US-1	US	9/9/2015	US14/848682	US10177354	1/8/2019	Energy storage device having improved thermal performance	Dolby Intellectual Property Licensing, LLC	Active
279748-CN-3	CN	10/3/2016	CN201680058574A	CN108140816	2/8/2022	Anode composition for over-discharge protection	Dolby Intellectual Property Licensing, LLC	Active
279748-IN-4	IN	4/26/2018	IN201847015772A	IN367351	5/28/2021	Positive electrode composition for overdischarge protection	Dolby Intellectual Property Licensing, LLC	Active
279758-CN-3	CN	9/9/2016	CN201680075610A	CN108369880	5/19/2020	Auxiliary circuit for a relay circuit of a micro-electromechanical system	Dolby Intellectual Property Licensing, LLC	Active
279758-JP-4	JP	9/9/2016	JP2018520446A	JP6821676	1/27/2021	Auxiliary circuit of micro electromechanical system relay circuit	Dolby Intellectual Property Licensing, LLC	Active
279758-US-1	US	10/22/2015	US14/919769	US10083811	9/25/2018	Auxiliary circuit for micro-electromechanical system relay circuit	Dolby Intellectual Property Licensing, LLC	Active
279759-CN-3	CN	10/18/2016	CN201680075721A	CN108475594	12/14/2021	Relay circuit of micro-electromechanical system	Dolby Intellectual Property Licensing, LLC	Active

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279759-JP-4	JP	10/18/2016	JP2018520445A	JP6917367	8/11/2021	Micro electric machine system relay circuit	Dolby Intellectual Property Licensing, LLC	Active
279759-US-1	US	10/22/2015	US14/919797	US10068733	9/4/2018	Micro-electromechanical system relay circuit	Dolby Intellectual Property Licensing, LLC	Active
279765-CN-4	CN	10/18/2016	CN201680075710A	CN108369873	10/23/2020	Isolated control circuit and driver for micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
279765-DE-6	DE	10/18/2016	EP16788894A	EP3365907	8/10/2022	Isolated control circuit and driver for micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
279765-EP-3	EP	10/18/2016	EP16788894A	EP3365907	8/10/2022	Isolated control circuit and driver for micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
279765-JP-5	JP	10/18/2016	JP2018520447A	JP6924751	8/25/2021	The control circuit and driver with which it insulated for the micro-electro-mechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
279765-US-1	US	10/22/2015	US14/919833	US9997317	6/12/2018	Isolated control circuit and driver for micro-electromechanical system switch	Dolby Intellectual Property Licensing, LLC	Active
279791-US-1	US	12/16/2015	US14/971413	US9639725	5/2/2017	Tracking associate for factory and warehousing optimization	Dolby Intellectual Property Licensing, LLC	Active
280212-CN-3	CN	7/21/2016	CN201680050332A	CN107925046	6/1/2021	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280212-DE-7	DE	7/21/2016	EP16745027A	EP3345233	2/17/2021	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280212-EP-4	EP	7/21/2016	EP16745027A	EP3345233	2/17/2021	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280212-FR-6	FR	7/21/2016	EP16745027A	EP3345233	2/17/2021	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280212-GB-8	GB	7/21/2016	EP16745027A	EP3345233	2/17/2021	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280212-IN-5	IN	2/21/2018	IN201847006601A	IN380685	1/14/2022	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280212-US-1	US	8/31/2015	US14/840702	US9692245	6/27/2017	Battery management system and power connector	Dolby Intellectual Property Licensing, LLC	Active
280268-US-1	US	8/11/2015	US14/823852	US10001415	6/19/2018	Multifunctional sensor	Dolby Intellectual Property Licensing, LLC	Active
280467-BR-6	BR	3/30/2016	BR102016007005A	BR102016007005	8/16/2022	Multi-source power storage system and method for power control and management	Dolby Intellectual Property Licensing, LLC	Active
280467-CA-9	CA	3/17/2016	CA2924167A	CA2924167	1/9/2024	Multi-source energy storage system and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280467-DE-10	DE	3/30/2016	EP16162905A	EP3075595	10/25/2023	A multi-source energy storage system and method for energy management and control	Dolby Intellectual Property Licensing, LLC	Active
280467-EP-4	EP	3/30/2016	EP16162905A	EP3075595	10/25/2023	A multi-source energy storage system and method for energy management and control	Dolby Intellectual Property Licensing, LLC	Active
280467-IN-3	IN	3/15/2016	IN201644008946A	IN446624	8/25/2023	Multi-source energy storage system and energy management	Dolby Intellectual Property Licensing, LLC	Active
280467-JP-5	JP	3/22/2016	JP2016056436A	JP6742771	8/19/2020	Multi-source energy storage system and method for energy management control	Dolby Intellectual Property Licensing, LLC	Active
280467-KR-7	KR	3/29/2016	KR20160037805A	KR102493179	1/27/2023	Multi-source energy storage system and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280467-MX-8	MX	3/30/2016	MX2016004109A	MX361187	11/29/2018	Multi-source energy storage system and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active

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280467-US-2	US	3/31/2016	US15/086744	US10056755	8/21/2018	Multi-source energy storage system and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280508-BR-6	BR	3/30/2016	BR102016006966A	BR102016006966	9/13/2022	Energy storage system and method	Dolby Intellectual Property Licensing, LLC	Active
280508-CA-9	CA	3/29/2016	CA2925245A	CA2925245	9/22/2020	Energy storage system with range extender and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280508-CN-1	CN	3/31/2015	CN201510148686A	CN106143170	11/17/2020	Energy storage system with range extender and energy management control method	Dolby Intellectual Property Licensing, LLC	Active
280508-DE-10	DE	3/30/2016	EP16162903A	EP3078536	12/7/2022	Energy storage system with range extender and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280508-EP-4	EP	3/30/2016	EP16162903A	EP3078536	12/7/2022	Energy storage system with range extender and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280508-IN-3	IN	3/24/2016	IN201644010339A	IN425068	3/17/2023	Energy storage system with range extender and energy	Dolby Intellectual Property Licensing, LLC	Active
280508-JP-5	JP	3/24/2016	JP2016059360A	JP6956470	11/2/2021	The energy storage system and energy-management control method which have a range extender	Dolby Intellectual Property Licensing, LLC	Active
280508-KR-7	KR	3/25/2016	KR20160036074A	KR101940373	1/18/2019	Energy storage system with range extender and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280508-MX-8	MX	3/30/2016	MX2016004108A	MX354695	3/15/2018	Energy storage system with range extender and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280508-US-2	US	3/31/2016	US15/087400	US9899843	2/20/2018	Energy storage system with range extender and energy management and control method	Dolby Intellectual Property Licensing, LLC	Active
280514-BR-6	BR	3/30/2016	BR102016007002A	BR102016007002	8/16/2022	Power supply system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280514-CA-9	CA	3/17/2016	CA2923952A	CA2923952	8/29/2023	Power supply system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280514-IN-3	IN	3/15/2016	IN201644008947A	IN445279	8/18/2023	Power supply system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280514-JP-5	JP	3/24/2016	JP2016059361A	JP6775978	10/28/2020	Power generation system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280514-KR-7	KR	3/28/2016	KR20160036624A	KR102614468	12/14/2023	Power supply system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280514-MX-8	MX	3/30/2016	MX2016004110A	MX366720	7/22/2019	Power supply system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280514-US-2	US	3/31/2016	US15/086218	US10483872	11/19/2019	Power supply system and energy storage system	Dolby Intellectual Property Licensing, LLC	Active
280635-CN-1	CN	8/19/2015	CN201510511572A	CN106469807	11/26/2019	Cathode components, energy accumulating device and method	Dolby Intellectual Property Licensing, LLC	Active
280638-CN-3	CN	8/26/2016	CN201610730574A	CN106476635	5/4/2021	Hybrid system having a plurality of energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
280638-IN-5	IN	8/25/2016	IN201644028932A	IN450992	9/15/2023	Hybrid system with multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
280638-JP-4	JP	8/19/2016	JP2016160925A	JP7038469	3/18/2022	The hybrid system which has several energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
280638-KR-6	KR	8/25/2016	KR20160108203A	KR102530203	5/8/2023	Hybrid system with multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
280638-US-1	US	8/28/2015	US14/838485	US10272788	4/30/2019	Hybrid system with multiple energy storage devices	Dolby Intellectual Property Licensing, LLC	Active

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280661-US-1	US	8/27/2015	US14/837082	US10270275	4/23/2019	Systems and methods for controlling energy storage systems having multiple battery types	Dolby Intellectual Property Licensing, LLC	Active
280946-CN-4	CN	9/8/2016	CN201680058952A	CN108140910	7/13/2021	Heat flux assembly for energy storage device	Dolby Intellectual Property Licensing, LLC	Active
280946-DE-5	DE	9/8/2016	EP16775022A	EP3347941	12/23/2020	Heat flux assembly for an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
280946-EP-3	EP	9/8/2016	EP16775022A	EP3347941	12/23/2020	Heat flux assembly for an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
280946-GB-6	GB	9/8/2016	EP16775022A	EP3347941	12/23/2020	Heat flux assembly for an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
280946-US-1	US	9/9/2015	US14/848670	US10333184	6/25/2019	Heat flux assembly for an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
281041-CN-3	CN	3/30/2017	CN201710202904A	CN107262956	1/11/2022	Co-melting brazing composition and related method and device	Dolby Intellectual Property Licensing, LLC	Active
281041-DE-5	DE	3/23/2017	EP17162643A	EP3225352	8/19/2020	Eutectic brazing compositions, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281041-EP-4	EP	3/23/2017	EP17162643A	EP3225352	8/19/2020	Eutectic brazing compositions, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281041-GB-6	GB	3/23/2017	EP17162643A	EP3225352	8/19/2020	Eutectic brazing compositions, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281041-IN-1	IN	3/30/2016	IN201641010951A	IN475913	12/8/2023	Eutectic brazing compositions, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281056-CN-3	CN	3/30/2017	CN201710202944A	CN107262961	9/24/2021	Brazing composition for malleable brazing structure and related method and device	Dolby Intellectual Property Licensing, LLC	Active
281056-DE-6	DE	3/23/2017	EP17162634A	EP3225351	5/6/2020	Brazing compositions for ductile braze structures, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281056-EP-4	EP	3/23/2017	EP17162634A	EP3225351	5/6/2020	Brazing compositions for ductile braze structures, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281056-FR-5	FR	3/23/2017	EP17162634A	EP3225351	5/6/2020	Brazing compositions for ductile braze structures, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281056-GB-7	GB	3/23/2017	EP17162634A	EP3225351	5/6/2020	Brazing compositions for ductile braze structures, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281056-IN-1	IN	3/30/2016	IN201641010952A	IN514780	3/1/2024	Brazing compositions for ductile braze structures, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281056-US-2	US	3/30/2017	US15/474273	US10549372	2/4/2020	Brazing compositions for ductile braze structures, and related processes and devices	Dolby Intellectual Property Licensing, LLC	Active
281127-CN-5	CN	7/20/2016	CN201680048688A	CN107923953	1/5/2021	System and method for sampling current measurements in an energy storage device	Dolby Intellectual Property Licensing, LLC	Active
281127-DE-7	DE	7/20/2016	EP16747937A	EP3338101	5/4/2022	Systems and methods to sample current measurements in energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
281127-EP-3	EP	7/20/2016	EP16747937A	EP3338101	5/4/2022	Systems and methods to sample current measurements in energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
281127-FR-6	FR	7/20/2016	EP16747937A	EP3338101	5/4/2022	Systems and methods to sample current measurements in energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
281127-GB-9	GB	7/20/2016	EP16747937A	EP3338101	5/4/2022	Systems and methods to sample current measurements in energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
281127-IN-4	IN	2/21/2018	IN201847006600A	IN476984	12/8/2023	Systems and methods to sample current measurements in	Dolby Intellectual Property Licensing, LLC	Active

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281127-IT-8	IT	7/20/2016	EP16747937A	EP3338101	5/4/2022	Systems and methods to sample current measurements in energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
281127-US-1	US	8/19/2015	US14-829798	US10156626	12/18/2018	Systems and methods to sample current measurements in energy storage devices	Dolby Intellectual Property Licensing, LLC	Active
281133-AU-11	AU	12/29/2016	AU201638034 2A	AU2016380 342	4/13/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-BR-5	BR	12/29/2016	BR112018013 444A	BR11201801 3444	2/12/2019	Methods for generating an activated product and for controlling clot mechanical strength in a platelet gel	Dolby Intellectual Property Licensing, LLC	Active
281133-CN-20	CN	12/29/2016	CN202211454 001A	CN11587379 3	3/31/2023	Calcium control activation of platelets through electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-CN-9	CN	12/29/2016	CN201680082 886A	CN10869776 3	12/9/2022	Calcium control activation of platelets through electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-DE-16	DE	12/29/2016	EP16829375A	EP3397268	7/8/2020	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-DE-22	DE	12/29/2016	EP20184433A	EP3738604	9/13/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-EP-13	EP	12/29/2016	EP20184433A	EP3738604	9/13/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-EP-3	EP	12/29/2016	EP16829375A	EP3397268	7/8/2020	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-FR-15	FR	12/29/2016	EP16829375A	EP3397268	7/8/2020	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-FR-21	FR	12/29/2016	EP20184433A	EP3738604	9/13/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-GB-18	GB	12/29/2016	EP16829375A	EP3397268	7/8/2020	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-GB-24	GB	12/29/2016	EP20184433A	EP3738604	9/13/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-IN-10	IN	6/26/2018	IN2018470237 87A	IN466802	11/10/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-IT-17	IT	12/29/2016	EP16829375A	EP3397268	7/8/2020	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-IT-23	IT	12/29/2016	EP20184433A	EP3738604	9/13/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-JP-8	JP	12/29/2016	JP2018533697 A	JP7050680	4/8/2022	The calcium control activation of the blood platelets by electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-MX-6	MX	12/29/2016	MX201800814 6A	MX2018008 146	12/6/2018	Activation of platelets controlled by calcium through electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-RU-7	RU	12/29/2016	RU201812195 2A	RU2742937	2/11/2021	Calcium-regulated thrombocyte activation by electric stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-US-1	US	12/30/2015	US14-984988	US10633645	4/28/2020	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-US-14	US	4/16/2020	US16-850727	US11591590	2/28/2023	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281750-AU-2	AU	8/17/2016	AU201621659 9A	AU2016216 599	8/6/2020	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-CA-3	CA	8/18/2016	CA2939710A	CA2939710	10/10/2023	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active

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281750-CN-4	CN	8/31/2016	CN201610773374A	CN106482755	3/9/2021	Multi-axis magnetoresistive sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-DE-10	DE	8/17/2016	EP16184430A	EP3139189	10/14/2020	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-EP-5	EP	8/17/2016	EP16184430A	EP3139189	10/14/2020	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-FR-9	FR	8/17/2016	EP16184430A	EP3139189	10/14/2020	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-GB-11	GB	8/17/2016	EP16184430A	EP3139189	10/14/2020	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-IN-6	IN	8/26/2016	IN201644029028A	IN475114	12/1/2023	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-JP-7	JP	8/23/2016	JP2016162312A	JP7445372	3/7/2024	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-KR-8	KR	8/25/2016	KR20160108218A	KR102556711	7/17/2023	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
281750-US-1	US	9/1/2015	US14/842578	US9995600	6/12/2018	Multi-axis magneto-resistance sensor package	Dolby Intellectual Property Licensing, LLC	Active
282268-US-1	US	11/30/2015	US14/954108	US9879996	1/30/2018	System and method of electrostatic carouseling for gyrocompassing	Dolby Intellectual Property Licensing, LLC	Active
282674-US-2	US	12/10/2015	US14/964829	US10192050	1/29/2019	Methods, systems, apparatus, and storage media for use in detecting anomalous behavior and/or in preventing data loss	Dolby Intellectual Property Licensing, LLC	Active
283013-US-1	US	12/29/2015	US14/982735	US10511163	12/17/2019	Low capacitance surge suppression device	Dolby Intellectual Property Licensing, LLC	Active
283249-DE-12	DE	4/24/2017	EP20167095A	EP3723242	12/29/2021	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-DE-8	DE	4/24/2017	EP17167677A	EP3240144	4/15/2020	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-EP-10	EP	4/24/2017	EP20167095A	EP3723242	12/29/2021	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-EP-4	EP	4/24/2017	EP17167677A	EP3240144	4/15/2020	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-FR-11	FR	4/24/2017	EP20167095A	EP3723242	12/29/2021	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-GB-13	GB	4/24/2017	EP20167095A	EP3723242	12/29/2021	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-GB-9	GB	4/24/2017	EP17167677A	EP3240144	4/15/2020	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-IN-7	IN	4/22/2017	IN201744014355A	IN462831	11/3/2023	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-JP-14	JP	1/28/2022	JP2022011367A	JP7337973	9/4/2023	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-JP-3	JP	4/20/2017	JP2017083282A	JP7330661	8/22/2023	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-KR-6	KR	4/25/2017	KR20170052909A	KR102393551	5/4/2022	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active
283249-US-2	US	12/2/2016	US15/367261	US10439456	10/8/2019	Sleeve rotor synchronous reluctance electric machine	Dolby Intellectual Property Licensing, LLC	Active

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283282-CH-11	CH	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-CN-3	CN	11/10/2016	CN201680078960A	CN108575100	4/12/2022	Voltage grouping of energy storage unit	Dolby Intellectual Property Licensing, LLC	Active
283282-DE-8	DE	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-EP-4	EP	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-FR-7	FR	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-GB-12	GB	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-IN-5	IN	5/10/2018	IN201847017577A	IN477803	12/8/2023	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-IT-9	IT	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-SE-10	SE	11/10/2016	EP16798910A	EP3375064	12/29/2021	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-US-1	US	11/13/2015	US14/940445	US9837843	12/5/2017	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283282-ZA-6	ZA	5/18/2018	ZA201803330A	ZA201803330	2/27/2019	Voltage grouping of energy storage units	Dolby Intellectual Property Licensing, LLC	Active
283283-US-1	US	11/13/2015	US14/940473	US10020544	7/10/2018	Adjustable tap location for energy storage cells	Dolby Intellectual Property Licensing, LLC	Active
283492-CN-1	CN	12/18/2015	CN201510960140A	CN106899046	3/27/2020	Energy conversion system	Dolby Intellectual Property Licensing, LLC	Active
283495-JP-3	JP	3/30/2017	JP2017066602A	JP6866206	4/28/2021	A charging device, a system, and a method	Dolby Intellectual Property Licensing, LLC	Active
283495-US-2	US	3/30/2017	US15/473754	US10498146	12/3/2019	Charging device, system and method	Dolby Intellectual Property Licensing, LLC	Active
283501-BR-7	BR	2/16/2017	BR102017003133A	BR102017003133	4/18/2023	Stop-stop system for a vehicle and method of manufacturing a start-stop system	Dolby Intellectual Property Licensing, LLC	Active
283501-CN-4	CN	2/17/2017	CN201710088562A	CN107089233	2/15/2022	Starting/stopping system for vehicle and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
283501-DE-9	DE	2/14/2017	EP17156019A	EP3211212	5/15/2019	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283501-EP-6	EP	2/14/2017	EP17156019A	EP3211212	5/15/2019	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283501-FR-8	FR	2/14/2017	EP17156019A	EP3211212	5/15/2019	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283501-GB-10	GB	2/14/2017	EP17156019A	EP3211212	5/15/2019	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283501-IN-5	IN	2/8/2017	IN201744004629A	IN201744004629	8/18/2017	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283501-JP-2	JP	2/7/2017	JP2017020009A	JP7019296	2/15/2022	Start-up/stop system for vehicles, and the method of producing it	Dolby Intellectual Property Licensing, LLC	Active
283501-KR-3	KR	2/10/2017	KR20170018482A	KR102324581	11/12/2021	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active

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283501-US-1	US	2/17/2016	US15/045754	US10550816	2/4/2020	Start/stop system for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-CN-2	CN	4/25/2017	CN201710280077A	CN107364350	11/21/2017	Integration charger and its manufacture method for vehicle	Dolby Intellectual Property Licensing, LLC	Active
283516-DE-9	DE	4/24/2017	EP17167717A	EP3238979	12/6/2023	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-EP-3	EP	4/24/2017	EP17167717A	EP3238979	12/6/2023	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-FR-8	FR	4/24/2017	EP17167717A	EP3238979	12/6/2023	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-GB-12	GB	4/24/2017	EP17167717A	EP3238979	12/6/2023	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-IN-4	IN	4/17/2017	IN201744013461A	IN391206	3/11/2022	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-IT-10	IT	4/24/2017	EP17167717A	EP3238979	12/6/2023	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-JP-5	JP	4/11/2017	JP2017077895A	JP6924061	8/25/2021	Traction system	Dolby Intellectual Property Licensing, LLC	Active
283516-KR-6	KR	4/18/2017	KR20170049653A	KR102370937	3/7/2022	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-NL-11	NL	4/24/2017	EP17167717A	EP3238979	12/6/2023	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283516-US-1	US	4/25/2016	US15/137679	US10507716	12/17/2019	Integrated charger for vehicles and method of making same	Dolby Intellectual Property Licensing, LLC	Active
283550-US-1	US	11/13/2015	US14/941376	US9774440	9/26/2017	Systems and methods for real-time operation of software radio frequency canceller	Dolby Intellectual Property Licensing, LLC	Active
283956-CN-3	CN	4/26/2017	CN201780026262A	CN109247052	10/23/2020	Power converter topology for energystorage systems	Dolby Intellectual Property Licensing, LLC	Active
283956-IN-5	IN	10/15/2018	IN201847039137A	IN201847039137	11/2/2018	Power converter topology for use in an energy storage system	Dolby Intellectual Property Licensing, LLC	Active
283956-US-1	US	4/26/2016	US15/138335	US9859808	1/2/2018	Power converter topology for use in an energy storage system	Dolby Intellectual Property Licensing, LLC	Active
284013-CN-1	CN	3/25/2016	CN201610176811A	CN107231087	7/2/2021	A range extender and a circuit protection method	Dolby Intellectual Property Licensing, LLC	Active
284013-JP-3	JP	3/24/2017	JP2017058490A	JP6971602	11/24/2021	Range extender and circuit protection method	Dolby Intellectual Property Licensing, LLC	Active
284013-US-2	US	3/24/2017	US15/468147	US10511162	12/17/2019	Range extender and circuit protection method	Dolby Intellectual Property Licensing, LLC	Active
284015-CN-1	CN	11/20/2015	CN201510809124A	CN106740155	7/16/2019	Distance increasing unit, energy management system and energy management method	Dolby Intellectual Property Licensing, LLC	Active
284050-AU-8	AU	3/14/2017	AU2017201729A	AU2017201729	12/20/2018	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-BR-3	BR	3/13/2017	BR102017004939A	BR102017004939	10/3/2017	agente farmacológico de administração transdérmica, método de imageamento de proteínas básicas e kit para fornecer um agente farmacológico	Dolby Intellectual Property Licensing, LLC	Active
284050-CA-2	CA	3/2/2017	CA2959662A	CA2959662	2/18/2020	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-CN-16	CN	3/14/2017	CN202110159761A	CN113018460	8/8/2023	Topical administration of neuromarker dyes for image guided surgery	Dolby Intellectual Property Licensing, LLC	Active

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284050-CN-5	CN	3/14/2017	CN201710149856A	CN107188868	6/18/2021	Partial administration of neuromarker dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-DE-13	DE	3/6/2017	EP17159417A	EP3225258	2/27/2019	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-EP-10	EP	3/6/2017	EP17159417A	EP3225258	2/27/2019	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-FR-12	FR	3/6/2017	EP17159417A	EP3225258	2/27/2019	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-GB-14	GB	3/6/2017	EP17159417A	EP3225258	2/27/2019	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-JP-7	JP	3/1/2017	JP2017037857A	JP7099803	7/12/2022	The local application of the nerve label pigment for an image induction surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-KR-9	KR	3/14/2017	KR20170031920A	KR101953011	2/27/2019	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-MX-4	MX	3/13/2017	MX2017003295A	MX2017003295	8/15/2018	Topical application of nerve labeling dyes for image-guided surgery.	Dolby Intellectual Property Licensing, LLC	Active
284050-RU-11	RU	3/13/2017	RU2017108177A	RU2699571	9/6/2019	Locally administered pharmaceutical agent, method for imaging by administration thereof and kit comprising thereof	Dolby Intellectual Property Licensing, LLC	Active
284050-US-1	US	3/14/2016	US15/069198	US10744212	8/18/2020	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-US-15	US	8/14/2020	US16/994127	US11730830	8/22/2023	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284050-US-17	US	7/11/2023	US18/350268	US20230364269	11/16/2023	Topical application of nerve labeling dyes for image-guided surgery	Dolby Intellectual Property Licensing, LLC	Active
284148-BR-6	BR	10/4/2016	BR102016023076A	BR102016023076	11/1/2022	Lamination of stator, assembly and electric machine	Dolby Intellectual Property Licensing, LLC	Active
284148-CN-3	CN	9/30/2016	CN201610866282A	CN106849403	7/14/2020	Motor stator lamination with two-phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-DE-9	DE	10/4/2016	EP16192202A	EP3154154	2/27/2019	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-EP-5	EP	10/4/2016	EP16192202A	EP3154154	2/27/2019	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-FR-8	FR	10/4/2016	EP16192202A	EP3154154	2/27/2019	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-GB-10	GB	10/4/2016	EP16192202A	EP3154154	2/27/2019	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-IN-7	IN	10/3/2016	IN2016044053756A	IN438199	7/14/2023	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-JP-2	JP	9/27/2016	JP2016187673A	JP7102092	7/19/2022	Generator stator lamination provided with the two-phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-KR-4	KR	10/4/2016	KR20160127593A	KR102579577	9/15/2023	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284148-US-1	US	10/5/2015	US14/874583	US10396615	8/27/2019	Electric machine stator lamination with dual phase magnetic material	Dolby Intellectual Property Licensing, LLC	Active
284633-US-1	US	10/23/2015	US14/921449	US11152648	10/19/2021	Electrode compositions and articles, and related processes	Dolby Intellectual Property Licensing, LLC	Active
284800-US-1	US	2/1/2016	US15/011755	US9722493	8/1/2017	Power converter for ground-referenced system and floating system	Dolby Intellectual Property Licensing, LLC	Active

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285532-CN-2	CN	12/12/2017	CN201711317198A	CN108232339	12/9/2022	Processing method for electrochemical cell	Dolby Intellectual Property Licensing, LLC	Active
285532-DE-6	DE	12/1/2017	EP17204988A	EP3333964	3/3/2021	Treatment processes for electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
285532-EP-3	EP	12/1/2017	EP17204988A	EP3333964	3/3/2021	Treatment processes for electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
285532-FR-5	FR	12/1/2017	EP17204988A	EP3333964	3/3/2021	Treatment processes for electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
285532-GB-7	GB	12/1/2017	EP17204988A	EP3333964	3/3/2021	Treatment processes for electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
285532-IN-1	IN	12/12/2016	IN201641042297A	IN379732	10/29/2021	Treatment processes for electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
285532-US-4	US	12/12/2017	US15/838419	US11211642	12/28/2021	Treatment processes for electrochemical cells	Dolby Intellectual Property Licensing, LLC	Active
285698-CN-1	CN	5/4/2016	CN201610290259A	CN107346765	11/26/2019	Bridge arm circuit package assembling and full-bridge circuit package assembling	Dolby Intellectual Property Licensing, LLC	Active
285698-IN-3	IN	5/3/2017	IN201744015669A	IN201744015669	11/10/2017	Bridge leg circuit assembly and full-bridge circuit assembly	Dolby Intellectual Property Licensing, LLC	Active
285698-JP-4	JP	4/21/2017	JP2017084102A	JP7012453	1/28/2022	A bridge leg circuit assembly and a full bridge circuit assembly	Dolby Intellectual Property Licensing, LLC	Active
285698-KR-5	KR	4/25/2017	KR20170052925A	KR102339135	12/16/2021	Bridge leg circuit assembly and full-bridge circuit assembly	Dolby Intellectual Property Licensing, LLC	Active
285698-US-6	US	5/4/2017	US15/586646	US10230365	3/12/2019	Bridge leg circuit assembly and full-bridge circuit assembly	Dolby Intellectual Property Licensing, LLC	Active
285699-DE-7	DE	8/4/2017	EP17184847A	EP3282533	10/18/2023	Solid state circuit breaker and motor driving system	Dolby Intellectual Property Licensing, LLC	Active
285699-EP-6	EP	8/4/2017	EP17184847A	EP3282533	10/18/2023	Solid state circuit breaker and motor driving system	Dolby Intellectual Property Licensing, LLC	Active
285699-IN-5	IN	8/11/2017	IN201744028604A	IN409294	10/21/2022	Solid state circuit breaker and motor driving system	Dolby Intellectual Property Licensing, LLC	Active
285699-JP-3	JP	8/7/2017	JP2017152105A	JP6976100	12/8/2021	A solid-state circuit circuit breaker and a motor drive system	Dolby Intellectual Property Licensing, LLC	Active
285699-KR-4	KR	8/11/2017	KR20170102582A	KR102338061	12/13/2021	Solid state circuit breaker and motor driving system	Dolby Intellectual Property Licensing, LLC	Active
285699-US-2	US	8/4/2017	US15/669384	US10591547	3/17/2020	Solid state circuit breaker and motor driving system	Dolby Intellectual Property Licensing, LLC	Active
285938-CN-3	CN	6/5/2017	CN201710416430A	CN107465345	2/26/2021	System and method for dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active
285938-DE-7	DE	6/2/2017	EP17174155A	EP3255772	12/14/2022	System and method for a dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active
285938-EP-4	EP	6/2/2017	EP17174155A	EP3255772	12/14/2022	System and method for a dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active
285938-IN-6	IN	6/5/2017	IN201744019730A	IN455192	10/6/2023	System and method for a dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active
285938-JP-2	JP	6/2/2017	JP2017110364A	JP7005178	1/21/2022	The system and method of a dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active
285938-KR-5	KR	6/1/2017	KR20170068500A	KR102368860	3/2/2022	System and method for a dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active

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285938-US-1	US	6/6/2016	US15/174042	US9960687	5/1/2018	System and method for a dc/dc converter	Dolby Intellectual Property Licensing, LLC	Active
285974-US-1	US	12/16/2015	US14/970670	US9634585	4/25/2017	Control method for reducing torque ripple in an electrical machine	Dolby Intellectual Property Licensing, LLC	Active
285990-CN-10	CN	2/3/2017	CN202211186116A	CN115588968	1/10/2023	System and method for protecting a wireless power transmission system	Dolby Intellectual Property Licensing, LLC	Active
285990-DE-7	DE	1/30/2017	EP17153732A	EP3203605	1/8/2020	System and method for protecting a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
285990-EP-6	EP	1/30/2017	EP17153732A	EP3203605	1/8/2020	System and method for protecting a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
285990-IN-1	IN	2/3/2016	IN2016041005928A	IN377243	9/24/2021	System and method for protecting a wireless power	Dolby Intellectual Property Licensing, LLC	Active
285990-JP-11	JP	5/31/2023	JP2023089949A	JP202311003A	8/8/2023		Dolby Intellectual Property Licensing, LLC	Active
285990-JP-5	JP	1/30/2017	JP2017013768A	JP7005147	1/21/2022	The system and method for protecting a wireless electric power transmission system	Dolby Intellectual Property Licensing, LLC	Active
285990-JP-9	JP	1/5/2022	JP2022000705A	JP7289939	6/12/2023	System and method for protecting wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
285990-SG-3	SG	1/25/2017	SG10201700633QA	SG10201700633Q	9/28/2017	System and method for protecting a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
285990-US-2	US	1/27/2017	US15/417246	US10700550	6/30/2020	System and method for protecting a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
285990-US-8	US	5/21/2020	US16/880712	US11955805	4/9/2024	System and method for protecting a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
287419-US-2	US	7/22/2016	US15/217493	US10132743	11/20/2018	Fixed optics photo-thermal spectroscopy reader and method of use	Dolby Intellectual Property Licensing, LLC	Active
287473-US-1	US	4/15/2016	US15/130401	US10033910	7/24/2018	Synchronous sampling methods for infrared cameras	Dolby Intellectual Property Licensing, LLC	Active
309222-US-2	US	4/27/2011	US13/095387	US8749104	6/10/2014	Rotating electric machine, especially synchronous permanent magnet machine	Dolby Intellectual Property Licensing, LLC	Active
313124-CN-4	CN	6/27/2017	CN201780040548A	CN109643891	2/14/2020	System and method for fault interruption using mems switches	Dolby Intellectual Property Licensing, LLC	Active
313124-DE-7	DE	6/27/2017	EP17737963A	EP3479449	7/29/2020	System and method for fault interruption with mems switches	Dolby Intellectual Property Licensing, LLC	Active
313124-EP-6	EP	6/27/2017	EP17737963A	EP3479449	7/29/2020	System and method for fault interruption with mems switches	Dolby Intellectual Property Licensing, LLC	Active
313124-GB-8	GB	6/27/2017	EP17737963A	EP3479449	7/29/2020	System and method for fault interruption with mems switches	Dolby Intellectual Property Licensing, LLC	Active
313124-JP-5	JP	6/27/2017	JP2018567266A	JP7018904	2/14/2022	The system and method for the failure interruption using a mems switch	Dolby Intellectual Property Licensing, LLC	Active
313124-TW-3	TW	6/26/2017	TW106121294A	TW1742099	10/11/2021	System and method for fault interruption with mems switches	Dolby Intellectual Property Licensing, LLC	Active
313124-US-1	US	6/29/2016	US15/197221	US10211622	2/19/2019	System and method for fault interruption with mems switches	Dolby Intellectual Property Licensing, LLC	Active
313847-US-1	US	1/9/2017	US15/401333	US10983119	4/20/2021	Device for rapid diagnostic tests to detect antigens with improved sensitivity	Joint ownership - Dolby Intellectual Property Licensing, LLC and Tokitae LLC	Active
314005-CN-1	CN	4/20/2017	CN201710260910A	CN108736791	3/29/2022	Vehicle and control method and system thereof	Dolby Intellectual Property Licensing, LLC	Active

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314005-DE-6	DE	4/17/2018	EP18787396A	EP3612847	8/2/2023	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314005-EP-3	EP	4/17/2018	EP18787396A	EP3612847	8/2/2023	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314005-ES-8	ES	4/17/2018	EP18787396A	EP3612847	8/2/2023	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314005-FR-5	FR	4/17/2018	EP18787396A	EP3612847	8/2/2023	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314005-GB-9	GB	4/17/2018	EP18787396A	EP3612847	8/2/2023	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314005-IT-7	IT	4/17/2018	EP18787396A	EP3612847	8/2/2023	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314005-US-4	US	4/17/2018	US16/605842	US11201567	12/14/2021	Vehicle and control method thereof and system	Dolby Intellectual Property Licensing, LLC	Active
314147-CN-4	CN	10/30/2017	CN201711039368A	CN108023412	7/28/2023	System and method for actively controlling output voltage of wireless power transmission system	Dolby Intellectual Property Licensing, LLC	Active
314147-CN-6	CN	10/30/2017	CN202310833729A	CN116961252	10/27/2023	System and method for actively controlling output voltage of wireless power transmission system	Dolby Intellectual Property Licensing, LLC	Active
314147-IN-1	IN	10/28/2016	IN201641037044A	IN368648	6/11/2021	System and method for actively controlling output voltage	Dolby Intellectual Property Licensing, LLC	Active
314147-SG-3	SG	10/9/2017	SG10201708314TA	SG10201708314T	5/30/2018	System and method for actively controlling output voltage of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
314147-US-2	US	10/26/2017	US15/794524	US10411516	9/10/2019	System and method for actively controlling output voltage of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
314147-US-5	US	7/31/2019	US16/528306	US11075545	7/27/2021	System and method for actively controlling output voltage of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
314571-US-1	US	8/23/2017	US15/684695	US10679338	6/9/2020	Three-dimensional modeling of an object	Dolby Intellectual Property Licensing, LLC	Active
314571-US-3	US	4/29/2020	US16/862107	US11145051	10/12/2021	Three-dimensional modeling of an object	Dolby Intellectual Property Licensing, LLC	Active
314858-CN-3	CN	11/20/2017	CN201780076924A	CN110072728	7/7/2020	System and method for leakage current and fault location detection for electric vehicle dc power supply circuits	Dolby Intellectual Property Licensing, LLC	Active
314858-DE-5	DE	11/20/2017	EP17880066A	EP3554885	6/28/2023	System and method for leakage current and fault location detection in electric vehicle dc power circuits	Dolby Intellectual Property Licensing, LLC	Active
314858-EP-4	EP	11/20/2017	EP17880066A	EP3554885	6/28/2023	System and method for leakage current and fault location detection in electric vehicle dc power circuits	Dolby Intellectual Property Licensing, LLC	Active
314858-US-1	US	12/14/2016	US15/379126	US10168372	1/1/2019	System and method for leakage current and fault location detection in electric vehicle dc power circuits	Dolby Intellectual Property Licensing, LLC	Active
314859-CN-3	CN	10/20/2017	CN201780076925A	CN110100184	8/6/2021	Dc leakage current detector and operation method thereof for leakage current detector in dc power supply circuit	Dolby Intellectual Property Licensing, LLC	Active
314859-EP-4	EP	10/20/2017	EP17794516A	EP3555640	7/3/2024	Dc leakage current detector and method of operation thereof for leakage current detector in dc power circuits	Dolby Intellectual Property Licensing, LLC	Active

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314859-US-1	US	12/14/2016	US15/379160	US10203363	2/12/2019	Dc leakage current detector and method of operation thereof for leakage current detection in dc power circuits	Dolby Intellectual Property Licensing, LLC	Active
315022-US-1	US	12/15/2016	US15/381090	US10393492	8/27/2019	Digital wireless feeler gauge	Dolby Intellectual Property Licensing, LLC	Active
315117-IN-1	IN	12/15/2016	IN201641042702A	IN451354	9/15/2023	Charging pads and methods for charging receiver devices	Dolby Intellectual Property Licensing, LLC	Active
315117-US-3	US	10/28/2017	US16/469525	US11081900	8/3/2021	Charging pads and methods for charging receiver devices having different frequency standards	Dolby Intellectual Property Licensing, LLC	Active
315233-US-2	US	10/27/2017	US15/796379	US10740651	8/11/2020	Methods of systems of generating virtual multi-dimensional models using image analysis	Dolby Intellectual Property Licensing, LLC	Active
315343A-US-1	US	1/16/2017	US15/406907	US10390766	8/27/2019	System and method for predicting an excitation pattern of a deep brain stimulation	Dolby Intellectual Property Licensing, LLC	Active
315343-US-1	US	1/16/2017	US15/406895	US10624588	4/21/2020	System and method for predicting an excitation pattern of a deep brain stimulation	Dolby Intellectual Property Licensing, LLC	Active
315659-IN-1	IN	12/15/2016	IN201641042699A	IN461484	10/27/2023	A charging pad and a method for charging one or more receiver devices	Dolby Intellectual Property Licensing, LLC	Active
315659-US-3	US	10/27/2017	US16/469538	US11223240	1/11/2022	Charging pad and a method for charging one or more receiver devices	Dolby Intellectual Property Licensing, LLC	Active
315659-US-4	US	12/3/2021	US17/541891	US11798737	10/24/2023	Charging pad and a method for charging one or more receiver devices	Dolby Intellectual Property Licensing, LLC	Active
315659-US-5	US	10/23/2023	US18/492358	US20240047133	2/8/2024	Charging pad and a method for charging one or more receiver devices	Dolby Intellectual Property Licensing, LLC	Active
315851-CN-1	CN	1/25/2017	CN201710061052A	CN108347167	7/13/2021	System and method for soft switching dc-dc converter	Dolby Intellectual Property Licensing, LLC	Active
315851-IN-4	IN	1/23/2018	IN201844002681A	IN201844002681	7/27/2018	Systems and methods for a soft switching dc-dc converter	Dolby Intellectual Property Licensing, LLC	Active
315851-JP-3	JP	1/12/2018	JP2018003029A	JP7045859	4/1/2022	The system and method for a soft switching dc-dc converter	Dolby Intellectual Property Licensing, LLC	Active
315851-KR-5	KR	1/23/2018	KR20180008307A	KR102400368	5/23/2022	Systems and methods for a soft switching dc-dc converter	Dolby Intellectual Property Licensing, LLC	Active
315851-US-2	US	12/7/2017	US15/834304	US11784600	10/10/2023	Systems and methods for a soft switching dc-dc converter	Dolby Intellectual Property Licensing, LLC	Active
315892-US-1	US	12/20/2017	US15/848301	US10837962	11/17/2020	Method and associated device for rapid detection of target biomolecules with enhanced sensitivity	Dolby Intellectual Property Licensing, LLC	Active
315892-US-2	US	11/5/2020	US17/090383	US11714084	8/1/2023	Method and associated device for rapid detection of target biomolecules with enhanced sensitivity	Dolby Intellectual Property Licensing, LLC	Active
316115-CN-3	CN	1/3/2018	CN201810004638A	CN108336987	3/9/2021	System and method for gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
316115-DE-8	DE	12/14/2017	EP17207351A	EP3343768	2/24/2021	Systems and methods for a gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
316115-EP-2	EP	12/14/2017	EP17207351A	EP3343768	2/24/2021	Systems and methods for a gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
316115-IN-6	IN	12/28/2017	IN201744047051A	IN201744047051	7/6/2018	Systems and methods for a gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
316115-JP-5	JP	12/21/2017	JP2017244570A	JP7250421	4/3/2023	System for gate drive circuit and method	Dolby Intellectual Property Licensing, LLC	Active
316115-KR-7	KR	1/2/2018	KR20180000333A	KR102398189	5/17/2022	Systems and methods for a gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active

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316115-US-1	US	1/3/2017	US15/397443	US10374591	8/6/2019	Systems and methods for a gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
316364-US-1	US	2/1/2017	US15/421915	US10594030	3/17/2020	True time delay module and beam former having plural delay lines selectively connected by plural switching elements including one or more intermediate switching element	Dolby Intellectual Property Licensing, LLC	Active
316496-US-1	US	12/6/2016	US15/370736	US10216983	2/26/2019	Techniques for assessing group level cognitive states	Dolby Intellectual Property Licensing, LLC	Active
316767-CN-3	CN	2/6/2018	CN201880015264A	CN110382286	7/3/2020	Drive system for reducing dc link current ripple and method of operating the same	Dolby Intellectual Property Licensing, LLC	Active
316767-EP-4	EP	2/6/2018	EP18761836A	EP3589514	1/8/2020	Drive system and method of operation thereof for reducing dc link current ripple	Dolby Intellectual Property Licensing, LLC	Active
316767-JP-5	JP	2/6/2018	JP2019547271A	JP7051886	4/11/2022	The drive system and its action method for reducing dc link electric current ripple	Dolby Intellectual Property Licensing, LLC	Active
316767-KR-6	KR	2/6/2018	KR20197028942A	KR102485836	1/5/2023	Drive system and method of operation of drive system to reduce dc link current ripple	Dolby Intellectual Property Licensing, LLC	Active
316767-US-1	US	3/3/2017	US15/449609	US10425032	9/24/2019	Drive system and method of operation thereof for reducing dc link current ripple	Dolby Intellectual Property Licensing, LLC	Active
316767-US-7	US	8/9/2019	US16/536431	US11342876	5/24/2022	Drive system and method of operation thereof for reducing dc link current ripple	Dolby Intellectual Property Licensing, LLC	Active
316772-CN-3	CN	3/16/2018	CN201880031728A	CN110663158	8/2/2022	Double magnetic phase material ring for alternating current motor	Dolby Intellectual Property Licensing, LLC	Active
316772-EP-4	EP	3/16/2018	EP18803259A	EP3625874	3/25/2020	Dual magnetic phase material rings for ac electric machines	Dolby Intellectual Property Licensing, LLC	Active
316772-US-1	US	5/18/2017	US15/598408	US10749385	8/18/2020	Dual magnetic phase material rings for ac electric machines	Dolby Intellectual Property Licensing, LLC	Active
317047-CN-6	CN	10/17/2017	CN201710969353A	CN107959446	11/30/2021	System and method for motor sensorless control using magnetic alignment features	Dolby Intellectual Property Licensing, LLC	Active
317047-DE-8	DE	10/12/2017	EP17196147A	EP3309954	1/17/2024	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317047-EP-5	EP	10/12/2017	EP17196147A	EP3309954	1/17/2024	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317047-IN-4	IN	10/10/2017	IN20174405388A	IN469106	11/17/2023	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317047-JP-2	JP	10/3/2017	JP2017193158A	JP7271079	5/11/2023	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317047-KR-3	KR	10/16/2017	KR20170134136A	KR101993524	6/26/2019	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317047-US-1	US	10/17/2016	US15/295830	US9948224	4/17/2018	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317047-US-7	US	10/16/2017	US15/784696	US10224851	3/5/2019	System and method for sensorless control of electric machines using magnetic alignment signatures	Dolby Intellectual Property Licensing, LLC	Active
317124-US-1	US	12/6/2016	US15/370746	US10445565	10/15/2019	Crowd analytics via one shot learning	Dolby Intellectual Property Licensing, LLC	Active
317318-US-1	US	9/13/2017	US15/703835	US10423820	9/24/2019	Systems and methods for automatic generation of training sets for machine interpretation of images	Dolby Intellectual Property Licensing, LLC	Active
317707-CN-4	CN	8/9/2018	CN201880058996A	CN111065710	4/14/2023	Green light emitting phosphor and device thereof	Dolby Intellectual Property Licensing, LLC	Active

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317707-EP-5	EP	8/9/2018	EP18857541A	EP3684885	7/29/2020	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
317707-JP-6	JP	8/9/2018	JP2020515977A	JP7257391B2	4/13/2023		Dolby Intellectual Property Licensing, LLC	Active
317707-KR-7	KR	8/9/2018	KR20207011204A	KR102671144	5/30/2024	Green phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
317707-TW-10	TW	9/6/2018	TW110123430A	TWI755340	2/11/2022	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
317707-TW-2	TW	9/6/2018	TW107131340A	TWI732133	7/1/2021	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
317707-US-1	US	9/20/2017	US15/710780	US10720554	7/21/2020	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
317707-US-9	US	5/22/2020	US16/882133	US11094856	8/17/2021	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
318182-CN-3	CN	8/22/2018	CN201880054159A	CN110999055	12/1/2020	System and method for fast current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-DE-8	DE	8/22/2018	EP18762742A	EP3673573	5/19/2021	System and method for rapid current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-EP-4	EP	8/22/2018	EP18762742A	EP3673573	5/19/2021	System and method for rapid current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-FR-7	FR	8/22/2018	EP18762742A	EP3673573	5/19/2021	System and method for rapid current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-GB-9	GB	8/22/2018	EP18762742A	EP3673573	5/19/2021	System and method for rapid current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-JP-5	JP	8/22/2018	JP2020510092A	JP7209447	1/20/2023	Systems and methods for fast current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-KR-6	KR	8/22/2018	KR20207007968A	KR102581266	9/21/2023	Systems and methods for fast current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318182-US-1	US	8/22/2017	US15/682940	US10491096	11/26/2019	System and method for rapid current sensing and transistor timing control	Dolby Intellectual Property Licensing, LLC	Active
318542-CN-2	CN	8/31/2017	CN201780094322A	CN111032319	3/15/2022	Encoding volume data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-DE-9	DE	8/31/2017	EP17923384A	EP3676065	4/12/2023	Encoding volumetric data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-EP-3	EP	8/31/2017	EP17923384A	EP3676065	4/12/2023	Encoding volumetric data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-FR-8	FR	8/31/2017	EP17923384A	EP3676065	4/12/2023	Encoding volumetric data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-GB-10	GB	8/31/2017	EP17923384A	EP3676065	4/12/2023	Encoding volumetric data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-JP-4	JP	8/31/2017	JP2020511468A	JP7032518	3/8/2022	The encoding of the volume data for supporting reliable transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-KR-5	KR	8/31/2017	KR20207009008A	KR102386096	4/12/2022	Encoding of volumetric data to support trusted transactional delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-US-6	US	8/31/2017	US16/641155	US11077617	8/3/2021	Encoding volumetric data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active
318542-US-7	US	6/30/2021	US17/364012	US11623407	4/11/2023	Encoding volumetric data to support trusted transaction delivery	Dolby Intellectual Property Licensing, LLC	Active

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318543-CN-2	CN	8/31/2017	CN201780094076A	CN111033405	8/22/2023	Intellectual property exchange ecological system for increasing material production	Dolby Intellectual Property Licensing, LLC	Active
318543-EP-3	EP	8/31/2017	EP17923191A	EP3676676	7/8/2020	Intellectual property exchange ecosystem for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318543-JP-4	JP	8/31/2017	JP2020511469A	JP7077399	5/30/2022	The intellectual-property replacement ecosystem for lamination-modeling	Dolby Intellectual Property Licensing, LLC	Active
318543-KR-5	KR	8/31/2017	KR20207009014A	KR102573977	9/1/2023	Ecosystem of intellectual property exchange for further production	Dolby Intellectual Property Licensing, LLC	Active
318543-KR-8	KR	8/31/2017	KR20237029458A	KR20230128593	9/5/2023	Intellectual property exchange ecosystem for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318543-US-6	US	8/31/2017	US16/641161	US11468528	10/11/2022	Intellectual property exchange ecosystem for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318543-US-7	US	10/3/2022	US17/937615	US11948215	4/2/2024	Intellectual property exchange ecosystem for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318580-CN-2	CN	8/31/2017	CN201780094410A	CN111448069	2/25/2022	Distribution of customized engineering model for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318580-EP-3	EP	8/31/2017	EP17923537A	EP3676719	7/8/2020	Distribution of customized engineering models for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318580-JP-4	JP	8/31/2017	JP2020511446A	JP7105871	7/25/2022	Distribution of the engineering model with which it customized for lamination-modeling	Dolby Intellectual Property Licensing, LLC	Active
318580-KR-5	KR	8/31/2017	KR20207009100A	KR102417932	7/5/2022	Dispersion of customized engineering models for further fabrication	Dolby Intellectual Property Licensing, LLC	Active
318580-US-6	US	8/31/2017	US16/641167	US11453170	9/27/2022	Distribution of customized engineering models for additive manufacturing	Dolby Intellectual Property Licensing, LLC	Active
318587-CN-2	CN	8/31/2017	CN201780094368A	CN111095315	5/7/2024	Collaborative transaction information processing for block chain enabled supply chain	Dolby Intellectual Property Licensing, LLC	Active
318587-EP-3	EP	8/31/2017	EP17923052A	EP3676768	7/8/2020	Blockchain enabled collaborative transaction information processing for a supply chain	Dolby Intellectual Property Licensing, LLC	Active
318587-JP-4	JP	8/31/2017	JP2020511997A	JP72573862	4/13/2023		Dolby Intellectual Property Licensing, LLC	Active
318587-KR-7	KR	8/31/2017	KR20237015666A	KR20230069258	5/18/2023	Blockchain enabled collaborative transaction information processing for a supply chain	Dolby Intellectual Property Licensing, LLC	Active
318587-US-6	US	8/31/2017	US16/641188	US11783346	10/10/2023	Blockchain enabled collaborative transaction information processing for a supply chain	Dolby Intellectual Property Licensing, LLC	Active
318638-US-1	US	12/20/2017	US15/848302	US10830760	11/10/2020	Device for rapid detection of tuberculosis-lipoarabinomannan (tb-lam) with enhanced sensitivity	Joint ownership - Dolby Intellectual Property Licensing, LLC and Tokitae LLC	Active
318638-US-2	US	11/6/2020	US17/091501	US11726078	8/15/2023	Device for rapid detection of tuberculosis-lipoarabinomannan (tb-lam) with enhanced sensitivity	Joint ownership - Dolby Intellectual Property Licensing, LLC and Tokitae LLC	Active
318738A-US-1	US	10/20/2017	US15/789000	US11305663	4/19/2022	Energy efficient hands-free electric vehicle charger for autonomous vehicles in uncontrolled environments	Dolby Intellectual Property Licensing, LLC	Active
318738-US-2	US	10/20/2017	US15/788971	US10675982	6/9/2020	System and method for inductive charging with improved efficiency	Dolby Intellectual Property Licensing, LLC	Active
318763-US-2	US	1/2/2019	US16/238237	US10862402	12/8/2020	System and method for power converter including inverter, resonant circuit, and voltage multiplier	Dolby Intellectual Property Licensing, LLC	Active
319133-US-1	US	8/21/2018	US16/106688	US10820404	10/27/2020	Neutron generator with a rotating target in a vacuum chamber	Dolby Intellectual Property Licensing, LLC	Active

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319318-CN-3	CN	4/19/2018	CN201880034568A	CN110663157	2/13/2024	Power transmission device and related method	Dolby Intellectual Property Licensing, LLC	Active
319318-IN-1	IN	5/26/2017	IN201741018544A	IN201741018544	11/30/2018	A power transfer device and an associated method thereof	Dolby Intellectual Property Licensing, LLC	Active
319318-US-4	US	4/19/2018	US16/616395	US10998822	5/4/2021	Power transfer device with a plurality of converters	Dolby Intellectual Property Licensing, LLC	Active
319319-CN-3	CN	5/21/2018	CN201880035230A	CN110679060	5/24/2024	Transmission assembly for universal wireless charging device and method thereof	Dolby Intellectual Property Licensing, LLC	Active
319319-IN-1	IN	5/30/2017	IN201741019042A	IN407617	9/30/2022	Transmitting assembly for a universal wireless charging	Dolby Intellectual Property Licensing, LLC	Active
319319-US-4	US	5/21/2018	US16/616409	US11689056	6/27/2023	Transmitting assembly for a universal wireless charging device and a method thereof	Dolby Intellectual Property Licensing, LLC	Active
319319-US-5	US	6/16/2023	US18/336335	US20230327491	10/12/2023	Transmitting assembly for a universal wireless charging device and a method thereof	Dolby Intellectual Property Licensing, LLC	Active
319335-CN-4	CN	6/11/2018	CN201880044663A	CN110831706	2/21/2020	Article for high temperature operations and related methods	Dolby Intellectual Property Licensing, LLC	Active
319335-EP-5	EP	6/11/2018	EP18828354A	EP3648902	5/13/2020	Articles for high temperature service and related method	Dolby Intellectual Property Licensing, LLC	Active
319335-JP-6	JP	6/11/2018	JP2020500180A	JP7158120	10/21/2022	High temperature articles and related methods	Dolby Intellectual Property Licensing, LLC	Active
319335-KR-7	KR	6/11/2018	KR20207003486A	KR102485843	1/5/2023	Methods related to articles for high temperature service	Dolby Intellectual Property Licensing, LLC	Active
319335-US-2	US	2/7/2018	US15/891241	US11155721	10/26/2021	Articles for high temperature service and related method	Dolby Intellectual Property Licensing, LLC	Active
319335-US-8	US	9/21/2021	US17/480889	US11851581	12/26/2023	Articles for high temperature service and related method	Dolby Intellectual Property Licensing, LLC	Active
319620-CN-3	CN	8/21/2018	CN201880066411A	CN111201668	3/26/2021	True delay beamformer module and method of manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
319620-DE-7	DE	8/21/2018	EP18867077A	EP3695460	10/4/2023	True time delay beam former module and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
319620-EP-4	EP	8/21/2018	EP18867077A	EP3695460	10/4/2023	True time delay beam former module and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
319620-JP-5	JP	8/21/2018	JP2020520471A	JP7217746	2/3/2023	Real-time delay beamformer module and its fabrication method	Dolby Intellectual Property Licensing, LLC	Active
319620-KR-6	KR	8/21/2018	KR20207013539A	KR20200057090	5/25/2020	Real-time delay beam former module and manufacturing method	Dolby Intellectual Property Licensing, LLC	Abandoned
319620-US-1	US	10/13/2017	US15/782991	US10784576	9/22/2020	True time delay beam former module and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
319621-CN-3	CN	7/5/2018	CN201880065985A	CN111201724	5/7/2021	True delay beam former and operation method	Dolby Intellectual Property Licensing, LLC	Active
319621-DE-8	DE	7/5/2018	EP18868697A	EP3695528	8/30/2023	True time delay beam former and method of operation	Dolby Intellectual Property Licensing, LLC	Active
319621-EP-4	EP	7/5/2018	EP18868697A	EP3695528	8/30/2023	True time delay beam former and method of operation	Dolby Intellectual Property Licensing, LLC	Active
319621-FR-7	FR	7/5/2018	EP18868697A	EP3695528	8/30/2023	True time delay beam former and method of operation	Dolby Intellectual Property Licensing, LLC	Active
319621-GB-9	GB	7/5/2018	EP18868697A	EP3695528	8/30/2023	True time delay beam former and method of operation	Dolby Intellectual Property Licensing, LLC	Active

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319621-JP-5	JP	7/5/2018	JP2020520641A	JP7212684	1/25/2023	Real time delay beam former and how it works	Dolby Intellectual Property Licensing, LLC	Active
319621-KR-6	KR	7/5/2018	KR20207013598A	KR102514959	3/27/2023	Real-time delayed beamformer and its operating method	Dolby Intellectual Property Licensing, LLC	Active
319621-US-1	US	10/13/2017	US15/782969	US10211902	2/19/2019	True time delay beam former and method of operation	Dolby Intellectual Property Licensing, LLC	Active
319639-CN-3	CN	8/27/2018	CN201880066919A	CN111226347	5/7/2021	High impedance rf mems transmission device and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
319639-EP-4	EP	8/27/2018	EP18869267A	EP3698429	8/26/2020	High impedance rf mems transmission devices and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
319639-JP-5	JP	8/27/2018	JP2020521589A	JP7217748	2/3/2023	High impedance rf mems transmission element and its manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
319639-KR-6	KR	8/27/2018	KR20207013786A	KR102562909	8/2/2023	High-impedance rgb transmission devices and method for manufacturing the same	Dolby Intellectual Property Licensing, LLC	Active
319639-US-1	US	10/18/2017	US15/786696	US10326200	6/18/2019	High impedance rf mems transmission devices and method of making the same	Dolby Intellectual Property Licensing, LLC	Active
319927-CN-3	CN	9/14/2018	CN201880068518A	CN111247736	11/21/2023	System and method for preventing demagnetization of permanent magnet in motor	Dolby Intellectual Property Licensing, LLC	Active
319927-EP-4	EP	9/14/2018	EP18870760A	EP3701628	9/2/2020	System and method for preventing permanent magnet demagnetization in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
319927-JP-5	JP	9/14/2018	JP2020542529A	JP7235756	3/8/2023	Systems and methods to prevent demagnetization of permanent magnets in electromechanical machines	Dolby Intellectual Property Licensing, LLC	Active
319927-KR-7	KR	9/14/2018	KR20247002150A	KR20240012617	1/29/2024	System and method for preventing permanent magnet demagnetization in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
319927-US-1	US	10/23/2017	US15/790251	US10230321	3/12/2019	System and method for preventing permanent magnet demagnetization in electrical machines	Dolby Intellectual Property Licensing, LLC	Active
320002-CN-3	CN	11/13/2018	CN201880073502A	CN111344690	3/28/2023	Layered data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-DE-10	DE	11/13/2018	EP18880028A	EP3710950	5/31/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-EP-4	EP	11/13/2018	EP18880028A	EP3710950	5/31/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-FR-9	FR	11/13/2018	EP18880028A	EP3710950	5/31/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-GB-11	GB	11/13/2018	EP18880028A	EP3710950	5/31/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-JP-5	JP	11/13/2018	JP2020526118A	JP7312746	7/21/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-KR-6	KR	11/13/2018	KR20207016814A	KR102566881	8/11/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-US-1	US	11/14/2017	US15/812003	US10938950	3/2/2021	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-US-12	US	5/8/2023	US18/144493	US20230275978	8/31/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-US-7	US	2/4/2021	US17/167854	US11323544	5/3/2022	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active
320002-US-8	US	4/22/2022	US17/727342	US11683397	6/20/2023	Hierarchical data exchange management system	Dolby Intellectual Property Licensing, LLC	Active

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320128-DE-8	DE	4/23/2018	EP18791526A	EP3615779	3/23/2022	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-EP-3	EP	4/23/2018	EP18791526A	EP3615779	3/23/2022	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-FR-7	FR	4/23/2018	EP18791526A	EP3615779	3/23/2022	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-GB-9	GB	4/23/2018	EP18791526A	EP3615779	3/23/2022	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-US-11	US	1/5/2022	US17/568901	US11846230	12/19/2023	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-US-4	US	4/23/2018	US16/607189	US11168609	11/9/2021	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-US-5	US	10/28/2021	US17/512852	US11840957	12/12/2023	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320128-US-6	US	10/28/2021	US17/512942	US11815004	11/14/2023	Adaptive linear linked piston electric power generator	Dolby Intellectual Property Licensing, LLC	Active
320529-US-1	US	3/20/2020	US16/824917	US11373069	6/28/2022	Analogy engine for grounding and situational awareness	Dolby Intellectual Property Licensing, LLC	Active
320880-US-1	US	3/6/2018	US15/913434	US10488174	11/26/2019	Systems and methods for wearable voltage detection devices	Dolby Intellectual Property Licensing, LLC	Active
321104-US-1	US	8/27/2018	US16/113644	US10430517	10/1/2019	Apparatus, system and method for providing an agent that intelligently solves information technology issues	Dolby Intellectual Property Licensing, LLC	Active
322985-CN-3	CN	2/25/2019	CN201980016599A	CN111801927	5/14/2024	Industrial data validation using secure distributed ledgers	Dolby Intellectual Property Licensing, LLC	Active
322985-EP-4	EP	2/25/2019	EP19767806A	EP3766228	1/20/2021	Industrial data verification using secure, distributed ledger	Dolby Intellectual Property Licensing, LLC	Active
322985-IN-5	IN	9/18/2020	IN20201704049A	IN202017040449	1/1/2021	Industrial data verification using secure, distributed ledger	Dolby Intellectual Property Licensing, LLC	Active
322985-JP-6	JP	2/25/2019	JP2020547087A	JP7235764	3/8/2023	Industrial data validation using secure distributed ledger	Dolby Intellectual Property Licensing, LLC	Active
322985-US-1	US	3/16/2018	US15/923279	US11582042	2/14/2023	Industrial data verification using secure, distributed ledger	Dolby Intellectual Property Licensing, LLC	Active
323537-EP-3	EP	2/20/2019	EP19709270A	EP3759487	1/6/2021	System and method for electric pulse based activation of biological samples	Dolby Intellectual Property Licensing, LLC	Active
323537-JP-4	JP	2/20/2019	JP2020543970A	JP7382945	11/17/2023	Systems and methods for electrical pulse-based activation of biological samples	Dolby Intellectual Property Licensing, LLC	Active
323537-US-1	US	2/26/2018	US15/905463	US10968423	4/6/2021	System and method for electric pulse based activation of biological samples	Dolby Intellectual Property Licensing, LLC	Active
323953-US-1	US	2/20/2018	US15/899594	US10543361	1/28/2020	System and method for localization of deep brain stimulation electrode via magnetic resonance imaging	Dolby Intellectual Property Licensing, LLC	Active
324448-US-1	US	6/18/2018	US16/010809	US10970669	4/6/2021	Blockchain enabled transaction processing for an industrial asset supply chain	Dolby Intellectual Property Licensing, LLC	Active
324448-US-2	US	3/9/2021	US17/196764	US11829942	11/28/2023	Blockchain enabled transaction processing for an industrial asset supply chain	Dolby Intellectual Property Licensing, LLC	Active
324595-EP-3	EP	1/15/2020	EP20704169A	EP3914339	12/1/2021	System for predicting optimal deep brain stimulation parameters	Dolby Intellectual Property Licensing, LLC	Active
324595-US-1	US	1/22/2019	US16/253406	US10905882	2/2/2021	Systems and methods for predicting optimal deep brain stimulation parameters	Dolby Intellectual Property Licensing, LLC	Active

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324680-EP-3	EP	9/25/2019	EP19865020A	EP3857693	8/4/2021	System and method for a magnetically coupled inductor boost and multiphase buck converter with split duty cycle	Dolby Intellectual Property Licensing, LLC	Active
324680-US-1	US	9/28/2018	US16/145406	US10574144	2/25/2020	System and method for a magnetically coupled inductor boost and multiphase buck converter with split duty cycle	Dolby Intellectual Property Licensing, LLC	Active
324828-US-2	US	11/27/2019	US16/698622	US11177759	11/16/2021	System and method for self-sensing of electric machines and reduction of noise and vibration associated therewith	Dolby Intellectual Property Licensing, LLC	Active
324845-CN-4	CN	3/22/2019	CN201980024991A	CN111937272	11/13/2020	Receiver unit for wireless power transmission system	Dolby Intellectual Property Licensing, LLC	Active
324845-IN-1	IN	4/19/2018	IN201841014948A	IN412011	11/25/2022	A receiver unit of a wireless power transfer system and	Dolby Intellectual Property Licensing, LLC	Active
324845-TW-2	TW	4/15/2019	TW108113031A	TW1812700	8/21/2023	Receiver unit, method and integrated electronic component of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
324845-TW-8	TW	4/15/2019	TW112128545A	TW202410599	3/1/2024		Dolby Intellectual Property Licensing, LLC	Active
324845-US-5	US	3/22/2019	US17/048429	US11316381	4/26/2022	Receiver unit of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
324845-US-6	US	4/21/2022	US17/726291	US11670449	6/6/2023	Receiver unit of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
324845-US-7	US	5/22/2023	US18/321434	US11955274	4/9/2024	Receiver unit of a wireless power transfer system	Dolby Intellectual Property Licensing, LLC	Active
325284-US-1	US	5/18/2018	US15/983668	US10673273	6/2/2020	Distributed ledger based control of large-scale, power grid energy resources	Dolby Intellectual Property Licensing, LLC	Active
325450-US-1	US	1/2/2019	US16/238348	US10924106	2/16/2021	Miller transition control gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
325450-US-2	US	1/13/2021	US17/148340	US11381236	7/5/2022	Miller transition control gate drive circuit	Dolby Intellectual Property Licensing, LLC	Active
326309-US-1	US	1/22/2019	US16/253390	US11395920	7/26/2022	Brain connectivity atlas for personalized functional neurosurgery targeting and brain stimulation programming	Joint ownership - Dolby Intellectual Property Licensing, LLC and University Health Network	Active
327645-IN-1	IN	9/7/2018	IN201843033690A	IN425957	3/24/2023	Integrated electronic component of a receiver unit of a	Dolby Intellectual Property Licensing, LLC	Active
502201-CN-3	CN	4/20/2020	CN202080025845A	CN113646409	3/29/2024	Method for enhancing the stability and dispersibility of phosphors and the resulting phosphors	Dolby Intellectual Property Licensing, LLC	Active
502201-CN-9	CN	4/20/2020	CN202310994966A	CN117025197	11/10/2023	Method for enhancing the stability and dispersibility of phosphors and the resulting phosphors	Dolby Intellectual Property Licensing, LLC	Active
502201-EP-4	EP	4/20/2020	EP20809356A	EP3973034	3/30/2022	Method to enhance phosphor robustness and dispersability and resulting phosphors	Dolby Intellectual Property Licensing, LLC	Active
502201-JP-5	JP	4/20/2020	JP2021560923A	JP2022533904	7/27/2022	Method to enhance phosphor robustness and dispersability and resulting phosphors	Dolby Intellectual Property Licensing, LLC	Active
502201-KR-6	KR	4/20/2020	KR20217041809A	KR20210158413	12/30/2021	Methods and resulting phosphors for improving the stiffness and dispersibility of phosphors	Dolby Intellectual Property Licensing, LLC	Active
502201-US-1	US	5/22/2019	US16/419206	US11261375	3/1/2022	Method to enhance phosphor robustness and dispersability and resulting phosphors	Dolby Intellectual Property Licensing, LLC	Active
502201-US-8	US	1/18/2022	US17/578335	US11746288	9/5/2023	Method to enhance phosphor robustness and dispersability and resulting phosphors	Dolby Intellectual Property Licensing, LLC	Active

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502452-US-1	US	7/30/2019	US16/525807	US11693763	7/4/2023	Resilient estimation for grid situational awareness	Dolby Intellectual Property Licensing, LLC	Active
502615-US-1	US	1/22/2019	US16/253430	US11273310	3/15/2022	Systems and methods for predicting optimal deep brain stimulation parameters	Joint ownership - Dolby Intellectual Property Licensing, LLC and Albany Medical College	Active
508774-CN-5	CN	12/9/2020	CN202080084415A	CN114787700	7/22/2022	Display with extended color gamut coverage and low blue light emission	Dolby Intellectual Property Licensing, LLC	Active
508774-EP-6	EP	12/9/2020	EP20899397A	EP4073579	10/19/2022	Displays with expanded gamut coverage and low blue light emission	Dolby Intellectual Property Licensing, LLC	Active
508774-JP-7	JP	12/9/2020	JP202533317A	JP2023505179	2/8/2023	æçâ¼üä•ä,Êäÿë%•äÿÿä,«ãfãf-ãfã,âšã³ã¼Zëë%•ç™•ã...%ã,æce%ã™ã,ãfã,£ã,¹ãf-ãf-ã,□	Dolby Intellectual Property Licensing, LLC	Active
508774-KR-8	KR	12/9/2020	KR20227023388A	KR20220110563	8/8/2022	Display with extended color gamut coverage and low green light emission	Dolby Intellectual Property Licensing, LLC	Active
508774-TW-3	TW	12/9/2020	TW109143525A	TW202129383	8/1/2021	Displays with expanded gamut coverage and low blue light emission	Dolby Intellectual Property Licensing, LLC	Active
508774-US-4	US	12/9/2020	US17/783626	US20230007906	1/12/2023	Displays with expanded gamut coverage and low blue light emission	Dolby Intellectual Property Licensing, LLC	Active
508774-VN-9	VN		1-2022-04297	N/A			Dolby Intellectual Property Licensing, LLC	Active
509591-CN-7	CN	1/19/2021	CN202180042068A	CN115698199	2/3/2023	Ink composition and film with narrow-band emission phosphor material	Dolby Intellectual Property Licensing, LLC	Active
509591-EP-10	EP	1/19/2021	EP21788285A	EP4136177	2/22/2023	Ink compositions and films with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-JP-11	JP	1/19/2021	JP2022562355A	JP2023521844A	5/25/2023		Dolby Intellectual Property Licensing, LLC	Active
509591-KR-12	KR	1/19/2021	KR20227039632A	KR20220165280	12/14/2022	Ink compositions and films containing narrowband light emitting phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-TW-6	TW	4/8/2021	TW110112714A	TW202204535	2/1/2022	Ink compositions and films with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-US-14	US	1/5/2023	US18/150675	US20230279254	9/7/2023	Films with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-US-4	US	1/19/2021	US17/152736	US11312876	4/26/2022	Ink compositions with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-US-5	US	1/19/2021	US17/152751	US11254864	2/22/2022	Films with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-US-8	US	12/16/2021	US17/552648	US11578225	2/14/2023	Films with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509591-US-9	US	3/22/2022	US17/701592	US11781028	10/10/2023	Ink compositions with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
509730-CN-6	CN	4/13/2021	CN202180042076A	CN115667457	1/31/2023	Green light emitting phosphor and device thereof	Dolby Intellectual Property Licensing, LLC	Active
509730-EP-7	EP	4/13/2021	EP21788570A	EP4136187	2/22/2023	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
509730-JP-8	JP	4/13/2021	JP2022562412A	JP2023522185A	5/29/2023		Dolby Intellectual Property Licensing, LLC	Active
509730-KR-9	KR	4/13/2021	KR20227039624A	KR20220164603	12/13/2022	Green light emitting phosphor and device thereof	Dolby Intellectual Property Licensing, LLC	Active
509730-TW-5	TW	4/14/2021	TW110113479A	TW202146627	12/16/2021	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active

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509730-US-11	US	4/13/2021	US17/919180	US20230159824	5/25/2023	Green-emitting phosphors and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
509730-VN-10	VN		1-2022-07315	N/A			Dolby Intellectual Property Licensing, LLC	Active
509746-CN-4	CN	7/16/2021	CN202180063952A	CN116746018	9/12/2023	Power controller in a wireless power receiving device	Dolby Intellectual Property Licensing, LLC	Active
509746-EP-5	EP	7/16/2021	EP21755865A	EP4183015	5/24/2023	Power controller in a wireless power reception apparatus	Dolby Intellectual Property Licensing, LLC	Active
509746-IN-1	IN	7/20/2020	IN202011030957A	IN202011030957	1/21/2022	Power controller in a wireless power reception apparatus	Dolby Intellectual Property Licensing, LLC	Active
509746-JP-6	JP	7/16/2021	JP2023504162A	JP2023534830A	8/14/2023		Dolby Intellectual Property Licensing, LLC	Active
509746-KR-7	KR	7/16/2021	KR20237005678A	KR20230038572	3/20/2023	Power controller in wireless power receiver	Dolby Intellectual Property Licensing, LLC	Active
509746-US-3	US	7/16/2021	US18/006208	US20230283117	9/7/2023	Power controller in a wireless power reception apparatus	Dolby Intellectual Property Licensing, LLC	Active
602226-CN-4	CN	12/8/2021	CN202180092352A	CN116830421	9/29/2023	Pulse width communication in a wireless power system	Dolby Intellectual Property Licensing, LLC	Active
602226-EP-5	EP	12/8/2021	EP21835913A	EP4260433	10/18/2023	Pulse width communication in a wireless power system	Dolby Intellectual Property Licensing, LLC	Active
602226-IN-1	IN	12/8/2020	IN202011053481A	IN202011053481	6/10/2022	Pulse width communication in a wireless power system	Dolby Intellectual Property Licensing, LLC	Active
602226-JP-6	JP	12/8/2021	JP2023534590A	JP2023553065A	12/20/2023		Dolby Intellectual Property Licensing, LLC	Active
602226-KR-7	KR	12/8/2021	KR20237022697A	KR20230118135	8/10/2023	Pulse width communication in wireless power systems	Dolby Intellectual Property Licensing, LLC	Active
602226-US-3	US	12/8/2021	US18/256539	US20240030754	1/25/2024	Pulse width communication in a wireless power system	Dolby Intellectual Property Licensing, LLC	Active
602226-VN-8	VN		1-2023-04458	N/A			Dolby Intellectual Property Licensing, LLC	Active
602751-CN-4	CN	8/31/2021	CN202180072958A	CN116348571	6/27/2023	Device compatible with night vision device	Dolby Intellectual Property Licensing, LLC	Active
602751-EP-5	EP	8/31/2021	EP21865000A	EP4208521	7/12/2023	Devices compatible with night vision equipment	Dolby Intellectual Property Licensing, LLC	Active
602751-JP-6	JP	8/31/2021	JP2023513904A	JP2023539329A	9/13/2023		Dolby Intellectual Property Licensing, LLC	Active
602751-KR-7	KR	8/31/2021	KR20237009153A	KR20230059803	5/3/2023	Element compatible with night vision equipment	Dolby Intellectual Property Licensing, LLC	Active
602751-TW-3	TW	9/1/2021	TW110132488A	TW202227591	7/16/2022	Devices compatible with night vision equipment	Dolby Intellectual Property Licensing, LLC	Active
602751-US-9	US	3/1/2023	US18/116260	US20230246013	8/3/2023	Devices compatible with night vision equipment	Dolby Intellectual Property Licensing, LLC	Active
602751-VN-8	VN		1-2023-02042	N/A			Dolby Intellectual Property Licensing, LLC	Active
605665-CN-7	CN	4/13/2022	CN202280033927A	CN117296162	12/26/2023	Uranium-based phosphor and composition for display and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
605665-EP-8	EP	4/13/2022	EP22788838A	EP4324034	2/21/2024	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active

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605665-KR-10	KR	4/13/2022	KR202370383 20A	KR20230170 708	12/19/2023	Uranium-based phosphors and compositions for display and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
605665-TW-3	TW	4/13/2022	TW111114071 A	TW2022493 02	12/16/2022	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
605665-TW-5	TW	10/11/2022	TW111138506 A	TW2023283 99	7/16/2023	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
605665-US-6	US	10/14/2022	US17-966638	US20230287 265	9/14/2023	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
607692A-TW-2	TW	4/7/2023	TW112113158 A	TW2024030 16	1/16/2024		Dolby Intellectual Property Licensing, LLC	Active
607692A-WO-1	WO	4/6/2023	US202306547 2W	WO2023215 670	11/9/2023	Phosphor compositions and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
607692B-TW-2	TW	5/4/2023	TW112116636 A	TW2024070 80	2/16/2024		Dolby Intellectual Property Licensing, LLC	Active
607692B-WO-1	WO	5/4/2023	US202302096 6W	WO2023215 457	11/9/2023	Red-emitting phosphors having small particle size, processes for preparing and devices thereof	Dolby Intellectual Property Licensing, LLC	Active
607693-TW-5	TW	5/4/2023	TW112116639 A	TW2024070 59	2/16/2024		Dolby Intellectual Property Licensing, LLC	Active
607693-WO-2	WO	5/4/2023	US202302092 7W	WO2023215 433	11/9/2023	Systems and methods for depositing phosphor containing ink	Dolby Intellectual Property Licensing, LLC	Active
RD27644-US-2	US	10/26/2000	US09/697562	US7287087	10/23/2007	Communications network for dynamic reprioritization	Dolby Intellectual Property Licensing, LLC	Active
RD28356-DE-4	DE	2/26/2007	EP07751816A	EPI999230	6/13/2012	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
RD28356-GB-5	GB	2/26/2007	EP07751816A	EPI999230	6/13/2012	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
RD28356-US-1	US	2/2/2005	US11/049598	US7358542	4/15/2008	Red emitting phosphor materials for use in led and led applications	Dolby Intellectual Property Licensing, LLC	Active
604111-WO-3	WO	3/24/2023	US202301626 5W	WO2023183 590	9/28/2023	Safety and security of cyber-physical systems connected through iot network	Dolby Intellectual Property Licensing, LLC	Active
508927-US-1	US	9/20/2021	US17/479370	US12067124	8/20/2024	Systems and methods for node selection and ranking in cyber-physical systems	Dolby Intellectual Property Licensing, LLC	Active
606915-WO-2	WO	5/22/2023	US202306728 3W	WO2023230 434	11/30/2023	Distributed anomaly detection and localization for cyber-physical systems	Dolby Intellectual Property Licensing, LLC	Active
607309-WO-2	WO	9/11/2023	US202307388 0W	WO2024055 044	3/14/2024	System and method for distributed quantum entanglement	Dolby Intellectual Property Licensing, LLC	Active
602905-US-1	US	8/19/2021	US17/406205	US20230071 394	3/9/2023	Systems and methods for cyber-fault detection	Dolby Intellectual Property Licensing, LLC	Active
602905-EP-4	EP	8/19/2022	EP22859418A	EP4388423	6/26/2024	Systems and methods for cyber-fault detection	Dolby Intellectual Property Licensing, LLC	Active
602922-US-1	US	8/19/2021	US17/406246	US20230075 736	3/9/2023	Systems and methods for self-adapting neutralization against cyber-faults	Dolby Intellectual Property Licensing, LLC	Active
602922-EP-4	EP	8/19/2022	EP22859420A	EP4388435	6/26/2024	Systems and methods for self-adapting neutralization against cyber-faults	Dolby Intellectual Property Licensing, LLC	Active
145823-US-1	US	11/15/2004	US10/990193	US7327113	2/5/2008	Electric starter generator system employing bidirectional buck-boost power converters, and methods therefor	Dolby Intellectual Property Licensing, LLC	Active

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162711-JP-5	JP	6/25/2007	JP2007165724 A	JP5202882	6/5/2013	Micro-electromechanical system based arcless switching with circuitry to absorb electrical energy during fault conditions	Dolby Intellectual Property Licensing, LLC	Active
162711-KR-6	KR	6/26/2007	KR200700633 22A	KR10144538 6	9/26/2014	Micro-electromechanical system based arc-less switching with circuitry for absorbing electrical energy during a fault condition	Dolby Intellectual Property Licensing, LLC	Active
162711-MX-7	MX	11/27/2007	MX200701489 7A	MX2007014 897	2/19/2009	Micro-electromechanical system based arc-less switching with circuitry for absorbing electrical energy during a fault condition.	Dolby Intellectual Property Licensing, LLC	Active
162711-US-8	US	12/14/2010	US12/967526	US8050000	11/1/2011	Micro-electromechanical system based arc-less switching with circuitry for absorbing electrical energy during a fault condition	Dolby Intellectual Property Licensing, LLC	Active
162711-FR-10	FR	6/19/2007	EP07110553A	EP1928005	9/25/2013	Micro-electromechanical system based arc-less switching with circuitry for absorbing electrical energy during a fault condition	Dolby Intellectual Property Licensing, LLC	Active
216634-CN-3	CN	2/13/2008	CN200880010 725A	CN10164674 7	9/18/2013	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
216634-KR-4	KR	2/13/2008	KR200970190 91A	KR10162348 2	5/23/2016	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
216634-CN-5	CN	2/13/2008	CN201310351 655A	CN10340092 6	12/8/2017	Red line emitting phosphors for led applications	Dolby Intellectual Property Licensing, LLC	Active
216634-JP-8	JP	10/31/2014	JP2014222926 A	JP20150843 27	4/30/2015	Red color line discharge/release fluorescent substance for using it for a light emitting diode use	Dolby Intellectual Property Licensing, LLC	Active
216634-JP-9	JP	5/11/2016	JP2016095402 A	JP20161817 05	10/13/2016	Red color line discharge/release fluorescent substance for using it for a light emitting diode use	Dolby Intellectual Property Licensing, LLC	Active
216634-KR-10	KR	2/13/2008	KR201570095 04A	KR10173174 1	4/28/2017	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
216634-JP-12	JP	5/8/2017	JP2017092503 A	JP6625582	12/25/2019	Red color line discharge/release fluorescent substance for using it for a light emitting diode use	Dolby Intellectual Property Licensing, LLC	Active
236159-US-3	US	3/23/2010	US12/729297	US8647767	2/11/2014	Sodium-metal-halide energy storage device with sodium level control mechanism	Dolby Intellectual Property Licensing, LLC	Active
239040-US-16	US	1/24/2024	US18/421275	US20240157 821	5/16/2024	Apparatus and method for rapid charging using shared power electronics	Dolby Intellectual Property Licensing, LLC	Active
241497-CN-2	CN	12/16/2010	CN201010615 732A	CN10210394 5	1/1/2014	Switch structure and associated circuit	Dolby Intellectual Property Licensing, LLC	Active
241497-JP-4	JP	12/8/2010	JP2010273081 A	JP20111295 16	6/30/2011	Switch structure and associated circuit	Dolby Intellectual Property Licensing, LLC	Active
241497-KR-5	KR	12/16/2010	KR201001294 40A	KR10173712 0	5/17/2017	Switch structure and associated circuit	Dolby Intellectual Property Licensing, LLC	Active
241497-DE-6	DE	12/10/2010	EP10194449A	EP2337043	3/30/2016	Switch structure and associated circuit	Dolby Intellectual Property Licensing, LLC	Active
246663-US-1	US	6/27/2011	US13/169220	US9964625	5/8/2018	Electrical substation fault monitoring and diagnostics	Dolby Intellectual Property Licensing, LLC	Active
246941-US-2	US	12/30/2010	US12/981846	US8789969	7/29/2014	Compact led light engine with reflector cups and highly directional lamps using same	Dolby Intellectual Property Licensing, LLC	Active
265951-CA-4	CA	10/26/2015	CA2968353A	CA2968353	6/27/2023	Multichannel relay assembly with in line mems switches	Dolby Intellectual Property Licensing, LLC	Active
277187-CA-4	CA	4/5/2016	CA3018505A	CA3018505	10/12/2017	Activated platelet composition with tunable growth factor level	Dolby Intellectual Property Licensing, LLC	Active

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281133-CA-4	CA	12/29/2016	CA3009523A	CA3009523	7/6/2017	Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
281133-KR-12	KR	12/29/2016	KR20187022044A	KR20180098402	9/3/2018	Activation of calcium control of platelets by electrical stimulation	Dolby Intellectual Property Licensing, LLC	Active
307094-US-7	US	11/16/2010	US12/947244	US9077002	7/7/2015	Fuel cell system and operating method	Dolby Intellectual Property Licensing, LLC	Active
314859-GB-6	GB	10/20/2017	EP17794516A	EP3555640	7/3/2024	Dc leakage current detector and method of operation thereof for leakage current detector in dc power circuits	Dolby Intellectual Property Licensing, LLC	Active
315132-US-3	US	10/7/2008	US12/247157	US8006136	8/23/2011	Automatic grammar based fault detection and isolation	Dolby Intellectual Property Licensing, LLC	Active
315166-US-2	US	2/27/2009	US12/395235	US8132053	3/6/2012	System and method for grammar based test planning	Dolby Intellectual Property Licensing, LLC	Active
315166-US-4	US	3/2/2012	US13/411379	US8489926	7/16/2013	System and method for grammar based test planning	Dolby Intellectual Property Licensing, LLC	Active
315166-US-5	US	7/12/2013	US13/941378	US8738967	5/27/2014	System and method for grammar based test planning	Dolby Intellectual Property Licensing, LLC	Active
315166-US-6	US	4/10/2014	US14/249805	US9122671	9/1/2015	System and method for grammar based test planning	Dolby Intellectual Property Licensing, LLC	Active
315170-US-3	US	2/27/2009	US12/395363	US8433542	4/30/2013	Testing framework for control devices	Dolby Intellectual Property Licensing, LLC	Active
315170-US-4	US	9/14/2012	US13/620532	US8949063	2/3/2015	Testing framework for control devices	Dolby Intellectual Property Licensing, LLC	Active
315170-US-5	US	1/30/2015	US14/610920	US9400725	7/26/2016	Testing framework for control devices	Dolby Intellectual Property Licensing, LLC	Active
317707-VN-8	VN		1-2020-02139	N/A			Dolby Intellectual Property Licensing, LLC	Active
318587-CN-8	CN	8/31/2017	CN202410515485A	CN118428831	8/2/2024		Dolby Intellectual Property Licensing, LLC	Active
322985-CN-7	CN	2/25/2019	CN202410625931A	CN118509176	8/16/2024	一种用于控制设备的测试框架	Dolby Intellectual Property Licensing, LLC	Active
502201-VN-7	VN		1-2021-07462	N/A			Dolby Intellectual Property Licensing, LLC	Active
509591-VN-13	VN		1-2022-07394	N/A			Dolby Intellectual Property Licensing, LLC	Active
509591-CN-15	CN	1/19/2021	CN202311774912A	CN117986927	5/7/2024	Ink composition and film with narrow-band emissive phosphor material	Dolby Intellectual Property Licensing, LLC	Active
509591-TW-16	TW		113103075	N/A			Dolby Intellectual Property Licensing, LLC	Active
509591-EP-17	EP	1/19/2021	EP24160690A	EP4410911	8/7/2024	Ink compositions and films with narrow band emission phosphor materials	Dolby Intellectual Property Licensing, LLC	Active
602928-US-1	US		63/643,693	N/A			Dolby Intellectual Property Licensing, LLC	Active
605665-JP-9	JP	4/13/2022	JP2023562814A	JP2024517092	4/19/2024	一种用于控制设备的测试框架	Dolby Intellectual Property Licensing, LLC	Active
605665-VN-11	VN		1-2023-07887	N/A			Dolby Intellectual Property Licensing, LLC	Active
605665-CN-12	CN	10/10/2022	CN202280067631A	CN118076710	5/24/2024	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active

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605665-EP-13	EP	10/10/2022	EP22879550A	EP4413090	8/14/2024	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
605665-KR-15	KR	10/10/2022	KR20247010819A	KR20240087778	6/19/2024	Uranium-based phosphors and compositions for displays and lighting applications	Dolby Intellectual Property Licensing, LLC	Active
605665-VN-16	VN		1-2024-03133	N/A			Dolby Intellectual Property Licensing, LLC	Active
605665-BR-18	BR		BR112024006755-6	N/A			Dolby Intellectual Property Licensing, LLC	Active
605665-MY-20	MY		PI 2024001746	N/A			Dolby Intellectual Property Licensing, LLC	Active
605665-MX-21	MX		MX/a/2024/004161	N/A			Dolby Intellectual Property Licensing, LLC	Active
607693-US-3	US		63/453,396	N/A			Dolby Intellectual Property Licensing, LLC	Active
607693-US-4	US		63/498,414	N/A			Dolby Intellectual Property Licensing, LLC	Active
607693-US-7	US	11/6/2023	US18/502765	US20240117208	4/11/2024	Systems and methods for depositing phosphor containing ink	Dolby Intellectual Property Licensing, LLC	Active
608197-US-2	US		63/642,183	N/A			Dolby Intellectual Property Licensing, LLC	Active
610280-US-1	US		63/561,973	N/A			Dolby Intellectual Property Licensing, LLC	Active
610288-US-1	US		63/561,999	N/A			Dolby Intellectual Property Licensing, LLC	Active
610319-US-1	US		63/555,346	N/A			Dolby Intellectual Property Licensing, LLC	Active
610601-US-1	US		63/644,203	N/A			Dolby Intellectual Property Licensing, LLC	Active
610770-KR-2	KR	5/29/2015	KR20150076499A	KR102441273	9/8/2022	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-KR-3	KR	9/2/2022	KR20220111153A	KR102596919	11/2/2023	Light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610770-KR-4	KR	10/27/2023	KR20230145352A	KR20230154778	11/9/2023	Light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610770-US-5	US	8/18/2015	US14/828937	US9741907	8/22/2017	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-US-6	US	7/10/2017	US15/645632	US10249801	4/2/2019	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-US-7	US	4/1/2019	US16/371774	US10424697	9/24/2019	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-CN-9	CN	8/18/2015	CN201510509309A	CN105374922	9/21/2018	Light emission diode package member and its manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
610770-CN-10	CN	8/18/2015	CN201810952946A	CN109181685	1/11/2019	Light emission diode package member and its manufacturing method	Dolby Intellectual Property Licensing, LLC	Active
610770-EP-11	EP	8/10/2015	EP15180388A	EP2988340	10/11/2017	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-FR-13	FR	8/10/2015	EP15180388A	EP2988340	10/11/2017	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-DE-14	DE	8/10/2015	EP15180388A	EP2988340	10/11/2017	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active
610770-GB-15	GB	8/10/2015	EP15180388A	EP2988340	10/11/2017	Light emitting diode package and manufacturing method thereof	Dolby Intellectual Property Licensing, LLC	Active

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610772-KR-1	KR	1/28/2011	KR20110008736A	KR101761834	7/27/2017	Wafer level led package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Active
610772-US-2	US	1/26/2012	US13/359287	US8592232	11/26/2013	Wafer level led package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Active
610772-US-3	US	11/7/2013	US14/074098	US8916898	12/23/2014	Wafer level led package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Active
610772-TW-4	TW	1/30/2012	TW101102898A	TW1528595	4/1/2016	Wafer level led package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Active
610772-CN-6	CN	1/13/2012	CN201280006927A	CN103339749	3/30/2016	Wafer led packaging part and manufacture this method	Dolby Intellectual Property Licensing, LLC	Active
610772-FR-11	FR	1/13/2012	EP14150304A	EP2720283	5/16/2018	Wafer-level light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610772-DE-12	DE	1/13/2012	EP14150304A	EP2720283	5/16/2018	Wafer-level light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610772-IT-13	IT	1/13/2012	EP14150304A	EP2720283	5/16/2018	Wafer-level light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610772-NL-14	NL	1/13/2012	EP14150304A	EP2720283	5/16/2018	Wafer-level light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610772-GB-15	GB	1/13/2012	EP14150304A	EP2720283	5/16/2018	Wafer-level light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610772-DE-16	DE	1/13/2012	EP12739572A	EP2669963	8/22/2018	Method of fabricating a light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
610773-KR-1	KR	1/7/2010	KR20100001089A	KR101618799	5/9/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-KR-2	KR	1/7/2010	KR20100001090A	KR101618800	5/9/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-KR-3	KR	1/7/2010	KR20100001204A	KR101615277	4/25/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-KR-4	KR	1/7/2010	KR20100001205A	KR101615283	4/25/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-KR-5	KR	1/7/2010	KR20100001408A	KR101623952	5/24/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-KR-6	KR	1/8/2010	KR20100001813A	KR101623951	5/24/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-US-11	US	9/14/2012	US13/617810	US8436369	5/7/2013	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-US-12	US	4/15/2013	US13/862713	US8742449	6/3/2014	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-US-13	US	3/28/2014	US14/229672	US9012952	4/21/2015	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-US-14	US	3/31/2014	US14/231043	US9018669	4/28/2015	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-US-15	US	3/11/2015	US14/645227	US9419180	8/16/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-US-16	US	7/1/2016	US15/200633	US9793440	10/17/2017	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-CN-17	CN	1/7/2011	CN201110006046A	CN102122694	7/3/2013	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active

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610773-EP-18	EP	1/4/2011	EP11150117A	EP2343744	3/11/2020	Light emitting diode with patterned electrodes	Dolby Intellectual Property Licensing, LLC	Active
610773-TW-19	TW	1/4/2011	TW100100166A	TWI412165	10/11/2013	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-JP-21	JP	1/5/2011	JP2011000833A	JP2011142324	7/21/2011	Light emitting diode having a plurality of electrode pads	Dolby Intellectual Property Licensing, LLC	Active
610773-JP-22	JP	5/28/2015	JP2015109013A	JP2015173289	10/1/2015	The light emitting diode which has several electrode pad	Dolby Intellectual Property Licensing, LLC	Active
610773-JP-23	JP	11/16/2016	JP2016223502A	JP6574750	9/11/2019	Light emitting diode	Dolby Intellectual Property Licensing, LLC	Active
610773-FR-24	FR	1/4/2011	EP11150117A	EP2343744	3/11/2020	Light emitting diode with patterned electrodes	Dolby Intellectual Property Licensing, LLC	Active
610773-DE-25	DE	1/4/2011	EP11150117A	EP2343744	3/11/2020	Light emitting diode with patterned electrodes	Dolby Intellectual Property Licensing, LLC	Active
610773-GB-26	GB	1/4/2011	EP11150117A	EP2343744	3/11/2020	Light emitting diode with patterned electrodes	Dolby Intellectual Property Licensing, LLC	Active
RD28356-FR-3	FR	2/26/2007	EP07751816A	EP1999230	6/13/2012	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
RD28356-NL-6	NL	2/26/2007	EP07751816A	EP1999230	6/13/2012	Red line emitting phosphors for use in led applications	Dolby Intellectual Property Licensing, LLC	Active
RD28356-JP-8	JP	2/26/2007	JP2008557338A	JP5715327	5/7/2015	Red line emitting phosphors for use in light emitting diode applications	Dolby Intellectual Property Licensing, LLC	Active
281133-RU-19	RU	12/29/2016	2021102581			CALCIUM CONTROLLED ACTIVATION OF PLATELETS VIA ELECTRICAL STIMULATION	Dolby Intellectual Property Licensing, LLC	Active
281133-RU-25	RU	12/29/2016	2024115920			CALCIUM CONTROLLED ACTIVATION OF PLATELETS VIA ELECTRICAL STIMULATION	Dolby Intellectual Property Licensing, LLC	Active
285990-US-12	US	4/4/2024	18/627,213	US-2024-0333034-A1	10/3/2024	SYSTEM AND METHOD FOR PROTECTING A WIRELESS POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Active
285990-JP-13	JP	1/30/2017	2024-133554			SYSTEM AND METHOD FOR PROTECTING A WIRELESS POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Active
314859-UP-5	UP	9/2/2024	17794516.9	3555640		DC LEAKAGE CURRENT DETECTOR AND METHOD OF OPERATION THEREOF FOR LEAKAGE CURRENT DETECTION IN DC POWER CIRCUITS	Dolby Intellectual Property Licensing, LLC	Active
318543-US-9	US	3/15/2024	18/606,235			INTELLECTUAL PROPERTY EXCHANGE ECOSYSTEM FOR ADDITIVE MANUFACTURING	Dolby Intellectual Property Licensing, LLC	Active
319318-CN-5	CN	4/19/2018	2.0241E+11	CN117977825A	5/3/2024	A POWER TRANSFER DEVICE AND AN ASSOCIATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Active
319319-CN-6	CN		2.02411E+12	CN118413013A	7/30/2024	Dual Band Concentric Coil topology for Universal Charging Pad	Dolby Intellectual Property Licensing, LLC	Active
319620-KR-8	KR	8/21/2018	10-2024-7026143			TRUE TIME DELAY BEAM FORMER MODULE AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Active

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319639-FR-7	FR	8/27/2018	18869267.7	3698429		HIGH IMPEDANCE RF MEMS TRANSMISSION DEVICES AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Active
319639-DE-8	DE	8/27/2018	18869267.7	3698429		HIGH IMPEDANCE RF MEMS TRANSMISSION DEVICES AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Active
319639-GB-9	GB	8/27/2018	18869267.7	3698429		HIGH IMPEDANCE RF MEMS TRANSMISSION DEVICES AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Active
320002-US-13	US		May be filed			HIERARCHICAL DATA EXCHANGE MANAGEMENT SYSTEM	Dolby Intellectual Property Licensing, LLC	Active
324845-US-9	US	4/5/2024	18/627,854	US-2024-0339263-A1	10/10/2024	A RECEIVER UNIT OF A WIRELESS POWER TRANSFER SYSTEM AND AN ASSOCIATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Active
324845-TW-10	TW	4/15/2019	113132609			A RECEIVER UNIT OF A WIRELESS POWER TRANSFER SYSTEM AND AN ASSOCIATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Active
502452-US-2	US	5/22/2023	18/321,545	US-2023-0385186	11/30/2023	Resilient Estimation for Grid Situational Awareness	Dolby Intellectual Property Licensing, LLC	Active
508774-CN-10	CN	12/9/2020	2.02411E+11	CN118981134A	11/19/2024	LIGHT EMITTING DEVICES AND DISPLAYS WITH EXPANDED GAMUT COVERAGE AND LOW BLUE LIGHT EMISSION AND METHODS FOR PRODUCING	Dolby Intellectual Property Licensing, LLC	Active
508774-US-11	US	11/7/2024	18/939878			LIGHT EMITTING DEVICES AND DISPLAYS WITH EXPANDED GAMUT COVERAGE AND LOW BLUE LIGHT EMISSION AND METHODS FOR PRODUCING	Dolby Intellectual Property Licensing, LLC	Active
508774-JP-12	JP		May be filed			LIGHT EMITTING DEVICES AND DISPLAYS WITH EXPANDED GAMUT COVERAGE AND LOW BLUE LIGHT EMISSION AND METHODS FOR PRODUCING	Dolby Intellectual Property Licensing, LLC	Active
508927-CN-3	CN	9/20/2022	Maybe filed			Systems and Methods for Node Selection and Ranking in Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
508927-EP-4	EP	3/19/2024	22871025.7			Systems and Methods for Node Selection and Ranking in Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
508927-US-5	US	9/20/2022	Maybe filed			Systems and Methods for Node Selection and Ranking in Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
508927-US-6	US	7/3/2024	18/762,999			Systems and Methods for Node Selection and Ranking in Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
509591-US-18	US	11/7/2024	18/939,975			INK FORMULATIONS WITH NARROW BAND EMITTING PHOSPHOR MATERIALS	Dolby Intellectual Property Licensing, LLC	Active
509730-US-12	US		May be filed			GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active
509730-CN-13	CN	4/13/2021	2.02411E+11			GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active
602751-US-10	US	11/7/2024	18/939,772			DEVICES COMPATIBLE WITH NIGHT VISION EQUIPMENT	Dolby Intellectual Property Licensing, LLC	Active
602905-CN-3	CN	8/19/2022	Maybe filed			Systems and Methods for Cyber-Fault Detection	Dolby Intellectual Property Licensing, LLC	Active

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602922-CN-3	CN	8/19/2022	Maybe filed			Systems and Methods for Self-Adapting Neutralization Against Cyber-Faults	Dolby Intellectual Property Licensing, LLC	Active
604111-US-4	US	3/24/2023	18/850,484			SAFETY AND SECURITY OF CYBER-PHYSICAL SYSTEMS CONNECTED THROUGH IOT NETWORK	Dolby Intellectual Property Licensing, LLC	Active
605665-WO-4	WO	10/10/2022	PCT/US2022/077858	WO/2023/060281	4/13/2023	URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Active
605665-JP-14	JP	10/10/2022	2024-521064			URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Active
605665-US-17	US	10/10/2022	18/698,659			URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Active
605665-IN-19	IN	10/10/2022	2.02417E+11			URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Active
605665-TH-22	TH	10/10/2022	2401002134			URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Active
605665-US-23	US		Maybe filed			URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Active
606915-CN-3	CN	5/22/2023	Maybe filed			Distributed Anomaly Detection and Localization for Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
606915-EP-4	EP	5/22/2023	Maybe filed			Distributed Anomaly Detection and Localization for Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
606915-US-5	US	5/22/2023	Maybe filed			Distributed Anomaly Detection and Localization for Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Active
607693-WO-6	WO	11/6/2023	PCT/US2023/036871	WO/2024/196409	9/26/2024	PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-TW-8	TW	11/6/2023	112142720	202438643	10/1/2024	PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-BR-9	BR	5/4/2023	BR 11 2024 023003-1			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-CN-10	CN	5/4/2023	Maybe filed			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-EP-11	EP	5/4/2023	23800008.7			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-IN-12	IN	5/4/2023	2.02417E+11			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-JP-13	JP	5/4/2023	2024-564628			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-KR-14	KR	5/4/2023	10-2024-7039504			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-MY-15	MY	5/4/2023	PI 2024006294			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-MX-16	MX	5/4/2023	MX/a/2024/013586			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active

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607693-TH-17	TH	5/4/2023	2401007141			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-US-18	US	5/4/2023	18/862,598			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-VN-19	VN	5/4/2023	1-2024-08939			SYSTEMS AND METHODS FOR DEPOSITING PHOSPHOR CONTAINING INK	Dolby Intellectual Property Licensing, LLC	Active
607693-BR-20	BR	11/6/2023	Maybe filed			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-CN-21	CN	11/6/2023	Maybe filed			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-EP-22	EP	11/6/2023	23928965.5			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-IN-23	IN	11/6/2023	2.02417E+11			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-JP-24	JP	11/6/2023	Maybe filed			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-KR-25	KR	11/6/2023	10-2024-7039108			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-MY-26	MY	11/6/2023	PI 2024006810			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-MX-27	MX	11/6/2023	MX/a/2024/014088			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-TH-28	TH	11/6/2023	2401007745			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
607693-VN-29	VN	11/6/2023	Maybe filed			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Active
608197-US-3	US	5/3/2024	18/654,432			Method for optically active structures	Dolby Intellectual Property Licensing, LLC	Active
610319-US-3	US	5/3/2024	18/654,635			Remote Phosphor films in reflective geometry	Dolby Intellectual Property Licensing, LLC	Active
610770-JP-12	JP	8/18/2015	2015-161386	2016-042579	3/31/2016	Light emitting diode package	Dolby Intellectual Property Licensing, LLC	Active
607692A-BR-3	BR	4/6/2023	BR112024022907-6			Phosphors, Ink Formulations and Films PHOSPHORS, INK FORMULATIONS AND FILMS	Dolby Intellectual Property Licensing, LLC	Active
607692A-CN-4	CN	4/6/2023	Maybe filed			Phosphors, Ink Formulations and Films PHOSPHORS, INK FORMULATIONS AND FILMS	Dolby Intellectual Property Licensing, LLC	Active
607692A-EP-5	EP	4/6/2023	Maybe filed			Phosphors, Ink Formulations and Films PHOSPHORS, INK FORMULATIONS AND FILMS	Dolby Intellectual Property Licensing, LLC	Active
607692A-IN-6	IN	4/6/2023	Maybe filed			Phosphors, Ink Formulations and Films PHOSPHORS, INK FORMULATIONS AND FILMS	Dolby Intellectual Property Licensing, LLC	Active
607692A-US-7	US	4/6/2023	18/862,301			Phosphors, Ink Formulations and Films PHOSPHORS, INK FORMULATIONS AND FILMS	Dolby Intellectual Property Licensing, LLC	Active
607692B-BR-3	BR	5/4/2023	Maybe filed			RED-EMITTING PHOSPHORS HAVING SMALL PARTICLE SIZE, PROCESSES FOR PREPARING AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active
607692B-CN-4	CN	5/4/2023	Maybe filed			RED-EMITTING PHOSPHORS HAVING SMALL PARTICLE SIZE, PROCESSES FOR PREPARING AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
607692B-EP-5	EP	5/4/2023	Maybe filed			RED-EMITTING PHOSPHORS HAVING SMALL PARTICLE SIZE, PROCESSES FOR PREPARING AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active
607692B-IN-6	IN	5/4/2023	Maybe filed			RED-EMITTING PHOSPHORS HAVING SMALL PARTICLE SIZE, PROCESSES FOR PREPARING AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active
607692B-US-7	US	5/4/2023	18/862,583			RED-EMITTING PHOSPHORS HAVING SMALL PARTICLE SIZE, PROCESSES FOR PREPARING AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Active
610799-US-1	US	8/12/2024	63/681,926			Phosphor-based inks as a luminescent materials for sensing applications	Dolby Intellectual Property Licensing, LLC	Active
610841-US-1	US	8/12/2024	63/681,912			Small size red-emitting phosphors via jet milling	Dolby Intellectual Property Licensing, LLC	Active
610842-US-2	US	8/12/2024	63/682,012			Injection and compression molding of Mn4+ doped fluoride phosphors	Dolby Intellectual Property Licensing, LLC	Active
610876-US-1	US	8/12/2024	63/681,936			Combined inorganic and organic coatings of red-emitting potassium hexafluorosilicate phosphors	Dolby Intellectual Property Licensing, LLC	Active
610878-US-1	US	8/12/2024	63/681,942			Phosphor ceramics and glasses	Dolby Intellectual Property Licensing, LLC	Active
610879-US-1	US	8/12/2024	63/681,977			Injection and compression molding of DU green and red phosphors	Dolby Intellectual Property Licensing, LLC	Active
610890-US-1	US	8/12/2024	63/681,974			Scattering agents size and location to optimize blue to red conversion in a blue to red color converted optical part	Dolby Intellectual Property Licensing, LLC	Active
610896-US-1	US	8/12/2024	63/681,999			Phosphor Powder Coating	Dolby Intellectual Property Licensing, LLC	Active
610897-US-1	US	8/12/2024	63/681,990			Phosphor infused ink in retail signage	Dolby Intellectual Property Licensing, LLC	Active
133987-W-2	Patent Cooperation Treaty	11/18/2004	US04/38666			HYBRID BATTERY CONFIGURATION WITH BI-DIRECTIONAL CONVERTER GRID INTERFACE AND AUXILIARY POWER UNIT	Dolby Intellectual Property Licensing, LLC	Expired
133987-EP-7	European Patent	11/18/2004	4811389.8	EP1697158	10/17/2007	METHOD AND APPARATUS FOR PRODUCING TRACTIVE EFFORT	Dolby Intellectual Property Licensing, LLC	Expired
134730-US-1	United States of America	3/30/2004	10/813945	US6974333	12/13/2005	HIGH-DENSITY CONNECTION BETWEEN MULTIPLE CIRCUIT BOARDS	Dolby Intellectual Property Licensing, LLC	Expired
145823-CN-4	China	11/15/2005	10137343.3	CN1815870		ELECTRIC STARTER GENERATOR EMPLOYING BUCK-BOOST POWER CONVERTERS	Dolby Intellectual Property Licensing, LLC	Expired
145823-CN-7	China	4/6/2012	2.0121E+11	CN201210112687.9	1/20/2016	BIDIRECTIONAL BUCK-BOOST POWER CONVERTER	Dolby Intellectual Property Licensing, LLC	Expired
146125-W-2	Patent Cooperation Treaty	8/25/2005	US05/30390	W06/026421		CROSSLINKABLE AND CROSSLINKED POLYMERS	Dolby Intellectual Property Licensing, LLC	Expired
146125-EP-3	European Patent	8/25/2005	5792879.8	EPI784444	8/13/2014	CROSSLINKABLE AND CROSSLINKED POLYMERS	Dolby Intellectual Property Licensing, LLC	Expired
152861-DE-3	Germany (Federal Republic of)	9/7/2005	1.02005E+11	DE102005042622.0		PHOTOVOLTAIC MODULES FOR SOLAR CONCENTRATOR	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
152861-JP-5	Japan	9/8/2005	2005-260353			PHOTOVOLTAI C MODULES FOR SOLAR CONCENTRATOR	Dolby Intellectual Property Licensing, LLC	Expired
155850-CN-2	China	6/6/2006	10099642.7	CN200610099642.7	9/9/2009	PHOTOVOLTAI C CONCENTRATOR FOR SOLAR ENERGY SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
155850-EP-3	European Patent	5/25/2006	6252718.9	EP1732141		PHOTOVOLTAI C CONCENTRATOR FOR SOLAR ENERGY SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
155850-JP-4	Japan	6/6/2006	2006-157088			PHOTOVOLTAI C CONCENTRATOR FOR SOLAR ENERGY SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
162191-CN-2	China	6/29/2007	200710126317.X	CN101335141		MICRO-ELECTROMECHANICAL SYSTEM BASED SOFT SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
162191-EP-3	European Patent	6/19/2007	7110554.8	EP2017870	5/15/2013	MICRO-ELECTROMECHANICAL SYSTEM BASED SOFT SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
162191-KR-5	Korea, Republic of (KR)	6/29/2007	2007-0065794			MICRO-ELECTROMECHANICAL SYSTEM BASED SOFT SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
162191-DE-6	Germany (Federal Republic of)	6/19/2007	7110554.8	DE2017870	5/15/2013	MICRO-ELECTROMECHANICAL SYSTEM BASED SOFT SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
162191-GB-8	United Kingdom	6/19/2007	7110554.8	GB2017870	5/15/2013	MICRO-ELECTROMECHANICAL SYSTEM BASED SOFT SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
162191-IT-9	Italy	6/19/2007	7110554.8	IT2017870	5/15/2013	MICRO-ELECTROMECHANICAL SYSTEMS MEMS CIRCUIT BREAKER SYSTEM LEVEL CONCEPTS	Dolby Intellectual Property Licensing, LLC	Expired
162667-WO-2	Patent Cooperation Treaty	12/20/2006	US06/49096	WO/2007/081545		HYBRID VEHICLE AND METHOD OF ASSEMBLING SAME	Dolby Intellectual Property Licensing, LLC	Expired
162667-EP-4	European Patent	12/20/2006	6848066.4	EP1976719		HYBRID VEHICLE AND METHOD OF ASSEMBLING SAME	Dolby Intellectual Property Licensing, LLC	Expired
162667-JP-6	Japan	12/20/2006	2008-549500	JP07/081545		HYBRID VEHICLE AND METHOD OF ASSEMBLING SAME	Dolby Intellectual Property Licensing, LLC	Expired
162667-JP-7	Japan	12/20/2006	2013-096100	JP2013177131		PARALLEL HYBRID CONFIGURATION FOR HEAVY DUTY TRUCKS AND BUSES WITH COMBINED BATTERY AND ULTRACAPACITOR ENERGY STORAGE SYSTEM AND INTERFACE	Dolby Intellectual Property Licensing, LLC	Expired
162711-US-1	United States of America	12/20/2005	11/314336	US20070139829A1		MICRO-ELECTROMECHANICAL SYSTEM BASED ARC-LESS SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
162711-CN-3	China	7/2/2007	2.0071E+11	CN200710127330.7	10/10/2012	Micro-Electromechanical System Based Arc-Less Switching With Circuitry For Absorbing Electrical Energy During A Fault Condition	Dolby Intellectual Property Licensing, LLC	Expired
162711-EP-4	European Patent	6/19/2007	7110553	EP1928005	9/25/2013	Micro-Electromechanical System Based Arc-Less Switching With Circuitry For Absorbing Electrical Energy During A Fault Condition	Dolby Intellectual Property Licensing, LLC	Expired
162711-DE-9	Germany (Federal Republic of)	6/19/2007	7110553	DE1928005	9/25/2013	Micro-Electromechanical System Based Arc-Less Switching With Circuitry For Absorbing Electrical Energy During A Fault Condition	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
162711-GB-11	United Kingdom	6/19/2007	7110553	GB1928005	9/25/2013	Micro-Electromechanical System Based Arc-Less Switching With Circuitry For Absorbing Electrical Energy During A Fault Condition	Dolby Intellectual Property Licensing, LLC	Expired
162711-IT-12	Italy	6/19/2007	7110553	IT1928005	9/25/2013	Micro-Electromechanical System Based Arc-Less Switching With Circuitry For Absorbing Electrical Energy During A Fault Condition	Dolby Intellectual Property Licensing, LLC	Expired
164314-US-2	United States of America	10/19/2005	11/254094	US2007/0231826		ASSEMBLY FOR MAGNETICALLY DIRECTED SELF-ASSEMBLY (As amended)	Dolby Intellectual Property Licensing, LLC	Expired
164415-FR-1	France	4/11/2005	503549	FR0503549	5/2/2008	Multiple Motion Compensated Noise Reduction Algorithm	Dolby Intellectual Property Licensing, LLC	Expired
164415-DE-2	Germany (Federal Republic of)	4/10/2006	1.02006E+11	DE102006017097A1		Multiple Motion Compensated Noise Reduction Algorithm	Dolby Intellectual Property Licensing, LLC	Expired
164415-JP-3	Japan	4/11/2006	2006-108845	JP5072253	8/31/2012	Multiple Motion Compensated Noise Reduction Algorithm	Dolby Intellectual Property Licensing, LLC	Expired
164415-FR-5	France	4/11/2006	603195	FR0603195	1/4/2008	Multiple Motion Compensated Noise Reduction Algorithm	Dolby Intellectual Property Licensing, LLC	Expired
164467-US-1	United States of America	11/18/2005	11/283459	US2007/0152238		HETEROSTRUCTURE FIELD EFFECT TRANSISTOR AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
176303-US-1	United States of America	1/9/2006	11/327954	US7489048	2/10/2009	ENERGY STORAGE SYSTEM FOR ELECTRIC OR HYBRID VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
176303-WO-2	Patent Cooperation Treaty	12/15/2006	US06/48133	WO2007/081495		ENERGY STORAGE SYSTEM FOR ELECTRIC OR HYBRID VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
176303-EP-4	European Patent	12/15/2006	6847706.6	EP1977495	11/24/2010	ENERGY STORAGE SYSTEM FOR ELECTRIC OR HYBRID VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
176303-JP-13	Japan	4/15/2014	2014-083265	JP2014-150718		ULTRACAPACITOR INTERFACE FOR DECOUPLING BATTERY FROM MOTOR TRACTION DRIVE	Dolby Intellectual Property Licensing, LLC	Expired
176918-US-1	United States of America	3/16/2005	60/662149			SINGLE-BIT MICRO-HOLOGRAMS AND A THRESHOLD MATERIAL	Dolby Intellectual Property Licensing, LLC	Expired
176918-WO-3	Patent Cooperation Treaty	3/15/2006	US06/09249			DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-US-6	United States of America	9/19/2006	60/845579			SINGLE-BIT MICRO-HOLOGRAMS AND A THRESHOLD MATERIAL	Dolby Intellectual Property Licensing, LLC	Expired
176918-TW-7	Taiwan	3/16/2006	95109026	TWNI327724	7/21/2010	SINGLE-BIT MICRO-HOLOGRAMS AND A THRESHOLD MATERIAL	Dolby Intellectual Property Licensing, LLC	Expired
176918-TW-8	Taiwan	9/19/2007	96134916	TWI438561	5/21/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-IN-9	India	3/15/2006	3523/KOLNP/2007	IN273227	7/14/2016	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-JP-10	Japan	3/15/2006	2008-501988	JP4847516	10/21/2011	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired

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176918-CA-11	Canada	3/15/2006	2783963	CA2783963	10/7/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-TH-12	Thailand	3/15/2006	601001199	TH39489	4/1/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-MY-13	Malaysia	3/15/2006	PI20061158	MY142083A	8/30/2010	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-EP-14	European Patent	3/15/2006	6738323.2	EP1869510	5/15/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-IL-15	Israel	3/15/2006	185973	IL185973	5/28/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-NO-16	Norway	3/16/2006	20075284	NO338315	8/8/2016	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-RU-17	Russian Federation		2007138218	RU2459284	8/20/2012	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-SG-18	Singapore	3/15/2006	200708432-0	SG135654	3/31/2010	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-TH-19	Thailand	11/22/2007	701004721	TH97812		DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-WO-20	Patent Cooperation Treaty		PCT/US2007/020263			DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-CN-21	China	3/15/2006	2.0068E+11	CN200680017070.1	4/25/2012	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-BR-22	Brazil	3/15/2006	PI0608713-2			SINGLE-BIT MICRO-HOLOGRAMS AND A THRESHOLD MATERIAL	Dolby Intellectual Property Licensing, LLC	Expired
176918-KR-23	Korea, Republic of (KR)	3/15/2006	2007-7023588	KR10-1274645	6/7/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-CA-24	Canada	9/19/2007	2663380	CA2663380	11/3/2015	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-EP-25	European Patent	3/11/2009	7838470.8	EP2064599	5/8/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-JP-26	Japan	9/19/2007	2009-528346	JP5227322	3/22/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-RU-27	Russian Federation	9/19/2007	2009114712	RU2437134	12/20/2011	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-MX-28	Mexico	3/15/2006	MX/a/2007/011497			SINGLE-BIT MICRO-HOLOGRAMS AND A THRESHOLD MATERIAL	Dolby Intellectual Property Licensing, LLC	Expired
176918-EP-29	European Patent	9/11/2012	12183883.3	EP2535777	1/8/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-EP-30	European Patent	9/11/2012	12183884.1	EP2535778	4/2/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-DE-31	Germany (Federal Republic of)	3/11/2009	7838470.8	DE2064599	5/8/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-GB-32	United Kingdom	3/11/2009	7838470.8	GB2064599	5/8/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-NL-33	Netherlands	3/11/2009	7838470.8	NL2064599	5/8/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired

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176918-DE-34	Germany (Federal Republic of)	3/15/2006	6738323.2	DE1869510	5/15/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-GB-35	United Kingdom	3/15/2006	6738323.2	GB1869510	5/15/2013	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-DE-36	Germany (Federal Republic of)	9/11/2012	12183883.3	DE2535777	1/8/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-FR-37	France	9/11/2012	12183883.3	FR2535777	1/8/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-GB-38	United Kingdom	9/11/2012	12183883.3	GB2535777	1/8/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-GB-39	United Kingdom	9/11/2012	12183884.1	GB2535778	4/2/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
176918-FR-40	France	9/11/2012	12183884.1	FR2535778	4/2/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
183176-US-1	United States of America	12/19/2006	11/640994	US8483240	7/9/2013	PIGGYBACK NETWORKS	Dolby Intellectual Property Licensing, LLC	Expired
183176-WO-2	Patent Cooperation Treaty	12/19/2007	PCT US07/025825	WO2008082514		PIGGYBACK NETWORKS	Dolby Intellectual Property Licensing, LLC	Expired
183176-CA-3	Canada	12/19/2007	2672394	CA2672394	2/2/2016	PIGGYBACK NETWORKS	Dolby Intellectual Property Licensing, LLC	Expired
183176-JP-5	Japan	12/19/2007	2009-542874	JP5394253	10/25/2013	PIGGYBACK NETWORKS	Dolby Intellectual Property Licensing, LLC	Expired
183176-KR-6	Korea, Republic of (KR)	12/19/2007	1.0201E+12	KR10-1441431	9/11/2014	PIGGYBACK NETWORKS US CASE IS OWNED BY LOCKHEED	Dolby Intellectual Property Licensing, LLC	Expired
183752-EP-2	European Patent	11/7/2006	6123605.5	EP1785938		METHOD AND SYSTEM FOR GENERATING POLYGONAL BOUNDARY DEFINITIONS FOR IMAGE OBJECTS	Dolby Intellectual Property Licensing, LLC	Expired
183752-JP-3	Japan	11/7/2006	2006-301296	JP4977448	4/20/2012	METHOD AND SYSTEM FOR GENERATING POLYGONAL BOUNDARY DEFINITIONS FOR IMAGE OBJECTS	Dolby Intellectual Property Licensing, LLC	Expired
187674-US-1	United States of America	5/25/2007	60/940313			Method and Apparatus for Assembling Photovoltaic Modules	Dolby Intellectual Property Licensing, LLC	Expired
187674-EP-5	European Patent	5/21/2008	8156634.1	EP1995791	7/22/2015	METHOD AND APPARATUS FOR ASSEMBLING PHOTOVOLTAIC MODULES	Dolby Intellectual Property Licensing, LLC	Expired
189292-WO-2	Patent Cooperation Treaty	1/5/2007	US07/00399	WO2007/081875		VEHICLE PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
189292-IN-5	India	1/5/2007	5471/DELNP/2008	IN300171	8/23/2018	VEHICLE PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
195378-US-1	United States of America	6/21/2006	11/425603	US2007/0297964		COMPOSITIONS COMPRISING MAGNESIUM BOROHYDRIDE AND MAGNESIUM HYDRIDOBOROHYDRIDE AND METHOD FOR MANUFACTURING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired

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197732-US-1	United States of America	1/18/2006	60/759991			ELECTRIC DRIVE ENERGY MANAGEMENT SYSTEM CONTROL WITH MULTIPLE ENERGY STORAGE UNITS	Dolby Intellectual Property Licensing, LLC	Expired
197732-AU-3	Australia	1/18/2007	2007200207			VEHICLE PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
197732-EP-6	European Patent	1/18/2007	7100757.9	EP1810861	8/11/2010	VEHICLE PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
197732-KR-9	Korea, Republic of (KR)	1/18/2007	2007-0005792			VEHICLE PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
197732-MX-10	Mexico	1/18/2007	MX/A/2007/000823			VEHICLE PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
198520-US-2	United States of America	10/6/2006	11/539340			COMPOSITION AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
205374-EP-3	European Patent	11/26/2007	7121542	EP1928006	1/20/2010	MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCHING MODULE SERIALY STACKABLE WITH OTHER SUCH MODULES TO MEET A VOLTAGE RATING	Dolby Intellectual Property Licensing, LLC	Expired
205374-IT-10	Italy	11/26/2007	7121542	IT1928006	1/20/2010	MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCHING MODULE SERIALY STACKABLE WITH OTHER SUCH MODULES TO MEET A VOLTAGE RATING	Dolby Intellectual Property Licensing, LLC	Expired
205979-US-1	United States of America	5/16/2007	11/749316	US20080288132A1		METHOD OF OPERATING VEHICLE AND ASSOCIATED SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
205979-CN-3	China	8/7/2008	2.0081E+11	CN101643037		METHOD OF OPERATING VEHICLE AND ASSOCIATED SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
205979-EP-4	European Patent	8/5/2008	8161865.4	EP2151362	10/10/2012	METHOD OF OPERATING VEHICLE AND ASSOCIATED SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
205979-JP-5	Japan	8/5/2008	2008-201398			METHOD OF OPERATING VEHICLE AND ASSOCIATED SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
205979-KR-6	Korea, Republic of (KR)	8/18/2008	1.02008E+12	KR102010021753A		METHOD OF OPERATING VEHICLE AND ASSOCIATED SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
205979-EP-7	European Patent	7/3/2012	12174839.6	EP2583874		METHOD OF OPERATING VEHICLE AND ASSOCIATED SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
207792-CA-8	Canada	9/18/2008	2639584			System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Expired
207792-CN-9	China	10/6/2008	2.0081E+11	CN101404220A		SYSTEM WITH CIRCUITRY FOR SUPPRESSING ARC FORMATION IN MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
207792-EP-10	European Patent	9/16/2008	8164432	EP2045823	8/16/2017	System with circuitry for suppressing arc formation in micro-electromechanical system based switch	Dolby Intellectual Property Licensing, LLC	Expired
208273-CN-2	China	12/23/2009	2.0091E+11	CN200910261931.6	9/3/2014	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
208273-EP-3	European Patent	12/8/2009	9178261.5	EP2202734		DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired

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208273-JP-4	Japan	12/22/2009	2009-289979	JP5749885	5/22/2015	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
208273-KR-5	Korea, Republic of (KR)	12/23/2009	1.02009E+12	KR10-1593232	2/2/2016	DATA STORAGE DEVICES AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
215038-CN-2	China	12/6/2007	2.0071E+11	CN200710196923.9	6/20/2012	ELECTROMECHANICAL SWITCHING CIRCUITRY IN PARALLEL WITH SOLID STATE SWITCHING CIRCUITRY	Dolby Intellectual Property Licensing, LLC	Expired
215038-EP-3	European Patent	11/26/2007	7121476.1	EP1930922	8/9/2017	Electromechanical Switching Circuitry In Parallel With Solid State Switching Circuitry Selectively Switchable To Carry A Load Current Appropriate To Such Circuitry	Dolby Intellectual Property Licensing, LLC	Expired
215575-CN-2	China	1/11/2008	2.0081E+11	CN200810002899.5	12/26/2012	GATING VOLTAGE CONTROL SYSTEM AND METHOD FOR ELECTROSTATICALLY ACTUATING A MICRO-ELECTROMECHANICAL DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
215575-MX-6	Mexico	1/10/2008	2008-000525	MX276522	6/10/2010	GATING VOLTAGE CONTROL SYSTEM AND METHOD FOR ELECTROSTATICALLY ACTUATING A MICRO-ELECTROMECHANICAL DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
216634-WO-2	Patent Cooperation Treaty	2/13/2008	PCT/US2008/001862	WO2008100517		RED LINE EMITTING PHOSPHORS FOR USE IN LED APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
216634-EP-6	European Patent	2/13/2008	8725487.6			NEW RED LINE EMITTING PHOSPHORS FOR USE IN LED APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
216634-KR-11	Korea, Republic of (KR)	2/13/2008	1.02018E+12	KR10-2017-0048603		NEW RED LINE EMITTING PHOSPHORS FOR USE IN LED APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
219867-US-1	United States of America	9/9/2008	61/095380			COMPOSITION, ENERGY STORAGE DEVICE, AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219867-US-3	United States of America	12/9/2008	12/330735			METHOD OF MAKING AND USING COMPOSITION AND ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
219867-US-4	United States of America	12/9/2008	12/330752			ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-WO-5	Patent Cooperation Treaty	8/27/2009	US09/55136	WO2010/030510		ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-AU-6	Australia	8/27/2009	2009251226			ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-BR-7	Brazil	8/27/2009	PI0905373-5			ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-EP-9	European Patent	8/27/2009	9791978.1	EP2335308		ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-IN-10	India	8/27/2009	1355 DELNP/2011	IN1355 DELNP2011		ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-JP-11	Japan	8/27/2009	2011-526114	JP2012502430		ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired

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219867-RU-12	Russian Federation	8/27/2009	2011108407			ENERGY STORAGE DEVICE AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
219867-CN-14	China	8/27/2009	2.0131E+11	CN10321950A		COMPOSITION ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-US-1	United States of America	12/19/2006	60/870843			ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-US-2	United States of America	6/15/2007	11/763787			COPPER-BASED ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-WO-4	Patent Cooperation Treaty	11/20/2007	US07/85243	WO2008079563		COPPER-BASED ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-US-5	United States of America	5/28/2009	12/473353			ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-US-6	United States of America	5/28/2009	12/473361			ENERGY STORAGE DEVICE AND SYSTEM (AS AMENDED JULY 30, 2012)	Dolby Intellectual Property Licensing, LLC	Expired
219868-AU-7	Australia	11/20/2007	2007338533	AU2007338533	8/16/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-CH-8	Switzerland	11/20/2007	00925/09	CH698359	5/31/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-CN-9	China	11/20/2007	2.0078E+11	CN101563797A		COPPER-BASED ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-JP-10	Japan	11/20/2007	2009-543005	JP2010514142		ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-CH-11	Switzerland		2072/10	CH704630	9/28/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219868-CN-12	China	11/20/2007	2.0111E+11			ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
219869-WO-2	Patent Cooperation Treaty	5/7/2008	US08/62843			ENERGY STORAGE DEVICE AND CELL CONFIGURATION THEREFOR	Dolby Intellectual Property Licensing, LLC	Expired
220217-WO-2	Patent Cooperation Treaty	3/17/2008	US08/57192	WO2008/137215		SYSTEM AND METHOD FOR COOLING A BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
220217-CN-3	China	3/17/2008	2.0088E+11	CN200880014904.2	11/13/2013	SYSTEM AND METHOD FOR COOLING A BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
220217-EP-4	European Patent	3/17/2008	8743951.9	EP2155513		SYSTEM AND METHOD FOR COOLING A BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
220217-JP-5	Japan	3/17/2008	2010-507492	JP5271351	5/17/2013	SYSTEM AND METHOD FOR COOLING A BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
220219-WO-2	Patent Cooperation Treaty	3/17/2008	US08/57188			SYSTEM AND METHOD FOR COOLING A BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
220219-EP-4	European Patent	3/17/2008	8732331.7	EP2147475	11/29/2017	SYSTEM FOR COOLING A BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
220778-CA-2	Canada	12/11/2008	2647126			MEMS SWITCH WITH IMPROVED STANDOFF VOLTAGE CONTROL	Dolby Intellectual Property Licensing, LLC	Expired

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220778-EP-4	European Patent	12/12/2008	8171425.5	EP2073238	11/1/2017	MEMS SWITCH WITH IMPROVED STANDOFF VOLTAGE CONTROL	Dolby Intellectual Property Licensing, LLC	Expired
220787-CA-2	Canada	12/4/2008	2645834			MEMS MICROSWITCH HAVING A CONDUCTIVE MECHANICAL STOP	Dolby Intellectual Property Licensing, LLC	Expired
220787-EP-4	European Patent	12/11/2008	8171380.2	EP2073236	3/2/2011	MEMS MICROSWITCH HAVING A CONDUCTIVE MECHANICAL STOP	Dolby Intellectual Property Licensing, LLC	Expired
220787-DE-8	Germany (Federal Republic of)	12/11/2008	6.02008E+11	DE2073236	3/2/2011	MEMS MICROSWITCH HAVING A CONDUCTIVE MECHANICAL STOP	Dolby Intellectual Property Licensing, LLC	Expired
220787-GB-9	United Kingdom	12/11/2008	8171380.2	GB2073236	3/2/2011	MEMS MICROSWITCH HAVING A CONDUCTIVE MECHANICAL STOP	Dolby Intellectual Property Licensing, LLC	Expired
220822-CA-2	Canada	10/16/2008	2641190			SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220822-CN-3	China	10/31/2008	2.0081E+11	CN200810173971.0	11/27/2013	SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220822-EP-4	European Patent	10/24/2008	8167469.9	EP2056325	9/7/2011	SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220822-FR-7	France	10/24/2008	8167469.9	FR2056325	9/7/2011	SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220822-DE-8	Germany (Federal Republic of)	10/24/2008	8167469.9	DE2008009502.9	9/7/2011	SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220822-GB-9	United Kingdom	10/24/2008	8167469.9	GB2056325	9/7/2011	SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220822-IT-10	Italy	10/24/2008	8167469.9	IT2056325	9/7/2011	SYSTEM AND METHOD FOR AVOIDING CONTACT STICTION IN MICROELECTROMECHANICAL SYSTEM BASED SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
220832-CA-2	Canada	10/9/2008	2640827			SEALED WAFER PACKAGING OF MICROELECTROMECHANICAL SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired
220832-JP-5	Japan	10/10/2008	2008-263310			SEALED WAFER PACKAGING OF MICROELECTROMECHANICAL SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired
220832-KR-6	Korea, Republic of (KR)	10/15/2008	2008-0100976			SEALED WAFER PACKAGING OF MICROELECTROMECHANICAL SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired
220832-MX-7	Mexico	10/14/2008	MX/a/2008/013274			SEALED WAFER PACKAGING OF MICROELECTROMECHANICAL SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired

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220887-W-2	Patent Cooperation Treaty	6/20/2007	US07/71644			A MEMS Microswitch Bypass and Protection System for Variable Frequency HVAC Drives	Dolby Intellectual Property Licensing, LLC	Expired
220887-EP-4	European Patent	6/20/2007	7798805.3	EP2171363	8/12/2015	MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCHING IN HEATING-VENTILATION-AIR-CONDITIONING SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired
221845-W-2	Patent Cooperation Treaty	6/20/2007	US07/71624			Areless MEMS Microswitch DC Interrupter	Dolby Intellectual Property Licensing, LLC	Expired
221845-EP-4	European Patent	6/15/2007	7798799.8	EP2162897	2/27/2013	MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
221845-KR-6	Korea, Republic of (KR)	12/15/2009	2009-7026190	KRW008/15 5574		MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
222841-US-1	United States of America	6/22/2007	60/945715			PROCESS FOR PREPARATION OF METAL OXIDES	Dolby Intellectual Property Licensing, LLC	Expired
222841-IN-6	India	10/31/2008	2472/DEL/2008			METAL OXIDE COATINGS	Dolby Intellectual Property Licensing, LLC	Expired
224610-W-2	Patent Cooperation Treaty	6/20/2007	PCT/US07/014363	W02008156 449		RESETTABLE MEMS MICRO-SWITCH ARRAY BASED ON CURRENT LIMITING APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
224610-EP-4	European Patent	6/20/2007	7796290	EP2162891	8/12/2015	RESETTABLE MEMS MICRO-SWITCH ARRAY BASED ON CURRENT LIMITING APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
224610-JP-5	Japan	6/20/2007	2010-513168	JP5002708	5/25/2012	RESETTABLE MEMS MICRO-SWITCH ARRAY BASED ON CURRENT LIMITING APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
224631-W-2	Patent Cooperation Treaty	6/20/2007	US07/14379	WO2008/153 530		REMOTE-OPERABLE MICRO-ELECTROMECHANICAL SYSTEM BASED OVER-CURRENT PROTECTION APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
224631-EP-4	European Patent	6/20/2007	7835836.3	EP2162964	3/21/2018	REMOTE-OPERABLE MICRO-ELECTROMECHANICAL SYSTEM BASED OVER-CURRENT PROTECTION APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
224631-KR-6	Korea, Republic of (KR)	6/20/2007	1.0201E+12	KR10201002 1481A		REMOTE-OPERABLE MICRO-ELECTROMECHANICAL SYSTEM BASED OVER-CURRENT PROTECTION APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
225009-W-4	Patent Cooperation Treaty	4/10/2008	US08/59839			PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
225009-W-5	Patent Cooperation Treaty	4/10/2008	US08/59840	W02008/137 247		METHOD OF OPERATING PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
225009-W-6	Patent Cooperation Treaty	4/10/2008	US08/59843	WO2008/137 248		ELECTRIC DRIVE VEHICLE RETROFIT SYSTEM AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225009-AU-12	Australia	4/10/2008	2008247962			METHOD OF OPERATING PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired

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225009-JP-15	Japan	4/10/2008	2010-507499	JP2010527222		METHOD OF OPERATING PROPULSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
225009-EP-19	European Patent	4/10/2008	8745450	EP2146864		ELECTRIC DRIVE VEHICLE RETROFIT SYSTEM AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225009-JP-20	Japan	4/10/2008	2010-507500	JPWO08/1372248		ELECTRIC DRIVE VEHICLE RETROFIT SYSTEM AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225009-EP-32	European Patent	4/10/2008	19199165.2	EP3640066		ELECTRIC DRIVE VEHICLE RETROFIT SYSTEM AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-CN-2	China	9/30/2009	2.0091E+11	CN101714668A		ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-EP-3	European Patent	10/2/2009	9172049	EP2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-JP-4	Japan	10/6/2009	2009-232063	JP2010092856		ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-FI-5	Finland	10/2/2009	9172049	FI2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-FR-6	France	10/2/2009	9172049	FR2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-DE-7	Germany (Federal Republic of)	10/2/2009	9172049	DE2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-GB-8	United Kingdom	10/2/2009	9172049	GB2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-IT-9	Italy	10/2/2009	9172049	IT2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-ES-10	Spain	10/2/2009	9172049	ES2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-SE-11	Sweden	10/2/2009	9172049	SE2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225349-CH-12	Switzerland	10/2/2009	9172049	CH2178150	6/20/2012	ENERGY STORAGE DEVICE AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225533-WO-2	Patent Cooperation Treaty	7/14/2009	US09/50438	WO2010021792		SEAL RING AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225533-AU-3	Australia	7/14/2009	2009283103			SEAL RING AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
225533-EP-5	European Patent	7/14/2009	9790350.4	EP2327118	4/22/2015	SEAL RING AND ASSOCIATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
226798-EP-3	European Patent	11/7/2008	8168549.7	EP2065770	1/9/2013	PROGRAMMABLE LOGIC CONTROLLER HAVING	Dolby Intellectual Property Licensing, LLC	Expired
226798-DE-7	Germany (Federal)	11/7/2008	8168549.7	DE602008021499.0	1/9/2013	PROGRAMMABLE LOGIC CONTROLLER HAVING	Dolby Intellectual Property Licensing, LLC	Expired
226798-GB-9	United Kingdom	11/7/2008	8168549.7	GB2065770	1/9/2013	PROGRAMMABLE LOGIC CONTROLLER HAVING	Dolby Intellectual Property Licensing, LLC	Expired
226798-IT-10	Italy	11/7/2008	8168549.7	IT2065770	1/9/2013	PROGRAMMABLE LOGIC CONTROLLER HAVING	Dolby Intellectual Property Licensing, LLC	Expired

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226893-DE-1	Germany (Federal Republic of)	10/11/2007	2007049036	DE2007049035	1/13/2011	THERMAL CONDUCTION WITH THE AID OF A WEDGE TO COMPENSATE TOLERANCES	Dolby Intellectual Property Licensing, LLC	Expired
226893-W-2	Patent Cooperation Treaty	10/10/2008	PCT/EP2008/063683	W-2009/050130		THERMAL CONDUCTION WITH THE AID OF A WEDGE TO COMPENSATE TOLERANCES	Dolby Intellectual Property Licensing, LLC	Expired
227091-W-2	Patent Cooperation Treaty	4/21/2009	PCT/US09/041184	W-2009/142860		COMPOSITE ARTICLE AND RELATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227091-EP-4	European Patent	4/21/2009	9736780.9	EP2307332		COMPOSITE ARTICLE AND RELATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227568-US-1	United States of America	7/16/2007	60/949960			RED LINE EMITTING COMPLEX FLUORIDE PHOSPHORS ACTIVATED WITH Mn4+	Dolby Intellectual Property Licensing, LLC	Expired
227731-W-2	Patent Cooperation Treaty	11/14/2008	US08/83584	W-2009/08267		ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-AU-3	Australia	11/14/2008	2008340403			ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-EP-5	European Patent		8863617	EP2227837	9/5/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-JP-6	Japan	11/14/2008	2010-539564	JP2011508379		ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-ZA-7	South Africa	11/14/2008	2009/07832	ZA2009/07832	2/23/2011	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-CH-8	Switzerland		8863617	CH2227837	9/5/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-DE-9	Germany (Federal Republic of)		8863617	DE2008018626.1	9/5/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-GB-10	United Kingdom		8863617	GB2227837	9/5/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-IT-11	Italy		8863617	IT2227837	9/5/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227731-FR-12	France		8863617	FR2227837	9/5/2012	ENERGY STORAGE DEVICE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
227889-EP-3	European Patent	10/24/2008	8167480.6	EP2056315	7/23/2014	MICRO-ELECTROMECHANICAL SYSTEM BASED SWITCHING	Dolby Intellectual Property Licensing, LLC	Expired
228276-EP-2	European Patent	7/30/2009	9166837.6	EP2154730		SOLAR CELL INCLUDING COOLING CHANNELS AND METHOD FOR FABRICATION	Dolby Intellectual Property Licensing, LLC	Expired
228276-JP-3	Japan	7/29/2009	2009-175958	JP2010045348		SOLAR CELL INCLUDING COOLING CHANNELS AND METHOD FOR FABRICATION	Dolby Intellectual Property Licensing, LLC	Expired
228365-W-2	Patent Cooperation Treaty	12/16/2009	US09/068341	W-2010/78000		DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired

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228365-US-3	United States of America	12/13/2010	12/966144	US0080823		DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228365-CA-4	Canada	12/16/2009	2747440			DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228365-CN-5	China	12/16/2009	2.0098E+11	CN20098015821.6	11/12/2014	DISK STRUCTURE FOR BIT TYPE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228365-EP-6	European Patent	12/16/2009	9799452.9	EP2384511		DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228365-IN-7	India	6/13/2011	4477/DELNP/2011	IN4477DELNP2011		DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228365-JP-8	Japan	12/16/2009	2011-543581	JP2012514285		DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228365-KR-9	Korea, Republic of (KR)	12/16/2009	1.02012E+12	KR10-1646297	8/1/2016	DISC STRUCTURE FOR BIT-WISE HOLOGRAPHIC STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
228583-EP-5	European Patent	9/4/2009	9169531.2	EP2164089	4/12/2017	MICRO-ELECTROMECHANICAL SWITCH PROTECTION IN SERIES PARALLEL TOPOLOGY	Dolby Intellectual Property Licensing, LLC	Expired
229967-CA-2	Canada	12/10/2009	2688117			MICRO-ELECTROMECHANICAL SYSTEM SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
229968-EP-4	European Patent	12/11/2008	8171381	EP2073237	10/19/2016	MEMS MICROSWITCH HAVING A DUAL ACTUATOR AND SHARED GATE	Dolby Intellectual Property Licensing, LLC	Expired
230521-GB-1	United Kingdom	1/25/2007	701370.9	GB2445972	12/29/2010	CATHODE FOR AN ELECTROCHEMICAL CELL	Dolby Intellectual Property Licensing, LLC	Expired
230521-WO-2	Patent Cooperation Treaty	1/23/2008	GB08/000239	WO 2008/090344		CATHODE FOR AN ELECTROCHEMICAL CELL	Dolby Intellectual Property Licensing, LLC	Expired
230537-US-1	United States of America	8/28/2009	12/549877	US20110052968A1		BATTERY PACK ASSEMBLY AND RELATED PROCESSES	Dolby Intellectual Property Licensing, LLC	Expired
230537-WO-2	Patent Cooperation Treaty	7/13/2010	US10/41766	WO 2011/025594		BATTERY PACK ASSEMBLY AND RELATED PROCESSES	Dolby Intellectual Property Licensing, LLC	Expired
230537-EP-4	European Patent	7/13/2010	10732610	EP2471124		BATTERY PACK ASSEMBLY AND RELATED PROCESSES	Dolby Intellectual Property Licensing, LLC	Expired
232258-EP-4	European Patent	4/25/2012	12165462.8	EP2518745		Switching Array Having Circuitry to Adjust a Temporal Distribution of a Gating Signal Applied to the Array	Dolby Intellectual Property Licensing, LLC	Expired
232258-JP-5	Japan	4/25/2012	2012-099356	JP2012238586		Switching Array Having Circuitry to Adjust a Temporal Distribution of a Gating Signal Applied to the Array	Dolby Intellectual Property Licensing, LLC	Expired
232260-WO-2	Patent Cooperation Treaty	3/2/2010	US10/25851	WO 2010/126648		CATHODE COMPOSITION AND ELECTROCHEMICAL CELL COMPRISING SAME	Dolby Intellectual Property Licensing, LLC	Expired
232652-WO-2	Patent Cooperation Treaty	7/2/2009	US09/49537	WO 2010/011484		METHOD AND SYSTEM FOR CONTROL OF A VEHICLE ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired

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232652-JP-6	Japan	1/24/2011	2011-520074			METHOD AND SYSTEM FOR CONTROL OF A VEHICLE ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
232737-JP-4	Japan	12/1/2009	2009-273096	JP2010136614		AUXILIARY DRIVE APPARATUS AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
232802-EP-3	European Patent	1/18/2010	10150930.5	EP2213502		MODULAR AUXILIARY POWER UNIT ASSEMBLY FOR AN ELECTRIC VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
232802-JP-4	Japan	1/20/2010	2010-009602	JP2010173630		MODULAR AUXILIARY POWER UNIT ASSEMBLY FOR AN ELECTRIC VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
233619-EP-2	European Patent	3/23/2010	10157266.7	EP2236370	5/16/2018	APPARATUS AND METHOD FOR ADVANCED ANTI-SKID BRAKE AND TRACTION CONTROLS	Dolby Intellectual Property Licensing, LLC	Expired
233635-US-2	United States of America	1/27/2010	12/694820	US2010/0310456		IMAGING OF MYELIN BASIC PROTEIN	Dolby Intellectual Property Licensing, LLC	Expired
233635-WO-3	Patent Cooperation Treaty	6/3/2010	US10/37237	WO 2010/141704		IMAGING OF MYELIN BASIC PROTEIN	Dolby Intellectual Property Licensing, LLC	Expired
233635-EP-8	European Patent	6/3/2010	10728034.9	EP2437792	10/21/2015	AGENTS AND METHODS FOR THE IMAGING OF MYELIN BASIC PROTEIN	Dolby Intellectual Property Licensing, LLC	Expired
234422-EP-3	European Patent	8/2/2010	10171544.9	EP2315227		SWITCH STRUCTURES	Dolby Intellectual Property Licensing, LLC	Expired
234422-JP-4	Japan	8/9/2010	2010-178239	JP2011040385		SWITCH STRUCTURES	Dolby Intellectual Property Licensing, LLC	Expired
234422-EP-6	European Patent		19164314.7			SWITCH STRUCTURES	Dolby Intellectual Property Licensing, LLC	Expired
234577-JP-3	Japan	2/16/2010	2010-030787	JP2010188994		ELECTRICALLY DRIVEN POWER TAKE-OFF SYSTEM AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
234828-US-2	United States of America	6/2/2020	16/889,902			SYSTEM AND METHOD FOR VEHICLE TEMPERATURE CONTROL	Dolby Intellectual Property Licensing, LLC	Expired
235141-US-1	United States of America	3/17/2009	12/405861	US20100240491A1		SYSTEM FOR VEHICLE PROPULSION HAVING AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
235141-EP-4	European Patent	3/15/2010	10156536.4	EP2230145		SYSTEM FOR VEHICLE PROPULSION HAVING AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
235141-IN-5	India	3/3/2010	462 DEL/2010			SYSTEM FOR VEHICLE PROPULSION HAVING AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
235141-JP-7	Japan	3/1/2016	2016-038524			SYSTEM FOR VEHICLE PROPULSION HAVING AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
235150-EP-5	European Patent	10/14/2009	9173009.3	EP2179882		APPARATUS FOR ENERGY TRANSFER USING CONVERTER AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
235152-KR-7	Korea, Republic of (KR)	8/24/2016	1.02016E+12			Method and Apparatus for Energy Transfer using DC-DC Power Electronics and Machine Inductance	Dolby Intellectual Property Licensing, LLC	Expired
235655-EP-2	European Patent	9/22/2010	10178461.9	EP2306580	5/20/2015	COMPOSITION AND ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired

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235714-W●-2	Patent Cooperation Treaty		US10/48750	W●2011/056297		CATHODE COMPOSITIONS COMPRISING ZN AND CHALCOGENIDE AND ENERGY STORAGE CELL COMPRISING SAME	Dolby Intellectual Property Licensing, LLC	Expired
235783-AU-2	Australia	7/22/2010	2010203140			PROTECTIVE COATING COMPOSITIONS AND DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
235783-EP-4	European Patent	7/20/2010	10170065.6	EP2302006	11/28/2012	PROTECTIVE COATING COMPOSITIONS AND DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
236159-US-2	United States of America	2/25/2010	12/712457	US0206984		PRESEALED ANODE TUBE	Dolby Intellectual Property Licensing, LLC	Expired
236639-CN-2	China	8/31/2010	2.0101E+11	CN102005222B	7/23/2014	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-EP-3	European Patent	8/19/2010	10173473.9	EP2290408	8/15/2012	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-JP-4	Japan	8/20/2010	2010-184512	JP5738554	5/1/2015	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-KR-5	Korea, Republic of (KR)	8/30/2010	1.0201E+12	KR102011023822A		COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-TW-6	Taiwan	8/30/2010	99129150	TW1500025	9/11/2015	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-DE-8	Germany (Federal Republic of)	8/19/2010	10173473.9	DE2290408	8/15/2012	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-GB-9	United Kingdom	8/19/2010	10173473.9	GB2290408	8/15/2012	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236639-NL-10	Netherlands	8/19/2010	10173473.9	NL2290408	8/15/2012	COMPOSITIONS, OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE OPTICAL DATA STORAGE MEDIA	Dolby Intellectual Property Licensing, LLC	Expired
236909-EP-3	European Patent	7/6/2010	10168517	EP2273520		TRANSFORMER ON-LOAD TAP CHANGER USING MEMS TECHNOLOGY	Dolby Intellectual Property Licensing, LLC	Expired
237446-US-1	United States of America	9/16/2009	61/242819			METHOD AND SYSTEM FOR CONTACTLESS FINGERPRINT DETECTION AND VERIFICATION	Dolby Intellectual Property Licensing, LLC	Expired
237714-EP-4	European Patent	3/28/2011	11160074.8	EP2434614	6/19/2013	CONTROL DISTRIBUTION TRANSFORMER AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
237735-W●-2	Patent Cooperation Treaty	6/18/2010	US10/39122	WO2011/025574		ELECTROCHEMICAL CELL	Dolby Intellectual Property Licensing, LLC	Expired
237851-EP-3	European Patent	3/28/2011	11160077.1	EP2371646	11/29/2017	APPARATUS FOR HYBRID DRIVE TORQUE CONTROL	Dolby Intellectual Property Licensing, LLC	Expired

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237934-US-1	United States of America	8/18/2009	12/542760	US20100139733A1		FUSED WIRING HARNESS FOR A PHOTOVOLTAIC SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
237934-AU-2	Australia	8/18/2010	2010212421			FUSED WIRING HARNESS FOR A PHOTOVOLTAIC SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
237934-CN-3	China	8/18/2010	2.0101E+11	CN101997241A		FUSED WIRING HARNESS FOR A PHOTOVOLTAIC SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
237934-EP-4	European Patent	8/3/2010	10171761.9	EP2287915	1/9/2013	FUSED WIRING HARNESS FOR A PHOTOVOLTAIC SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
238312-EP-5	European Patent	5/6/2011	11165079.2	EP2392553	8/24/2016	DIELECTRIC MATERIALS FOR POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
238312-SG-8	Singapore	5/12/2011	201103421-2	SG176379		DIELECTRIC MATERIALS FOR POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
238312-EP-11	European Patent	5/6/2011	11165080	EP2386531	11/9/2016	DIELECTRIC MATERIALS FOR POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
238346-EP-3	European Patent	8/2/2010	10171542.3	EP2288000		APPARATUS AND METHOD FOR BEARING	Dolby Intellectual Property Licensing, LLC	Expired
238407-EP-2	European Patent	8/19/2010	10173474.7	EP2290650	11/28/2012	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-TW-3	Taiwan	8/19/2010	99127813	TW524337	3/1/2016	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-CN-4	China	8/31/2010	201010277335.X	CN201010277335.X	5/13/2015	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-JP-5	Japan	8/24/2010	2010-186776	JP5496823	3/14/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-KR-6	Korea, Republic of (KR)	8/30/2010	1.0201E+12	KR10-1716500	3/8/2017	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-DE-8	Germany (Federal Republic of)	8/19/2010	10173474.7	DE602010003810.6	11/28/2012	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-FR-9	France	8/19/2010	10173474.7	FR2290650	11/28/2012	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238407-GB-10	United Kingdom	8/19/2010	10173474.7	GB2290650	11/28/2012	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
238413-EP-3	European Patent	1/28/2011	11152533.3	EP2355096		HANDOFFS BETWEEN DIFFERENT VOICE ENCODER SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired
238414-EP-3	European Patent	3/8/2011	11157344	EP2365712		HANDOFF METRIC FOR MULTIPLE TRANSMISSION TECHNOLOGIES	Dolby Intellectual Property Licensing, LLC	Expired
238727-WO-2	Patent Cooperation Treaty	11/10/2010	PCT/US10/56099	WO2011/081717		ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
238789-EP-3	European Patent	11/19/2010	10191932.2	EP2328160	2/28/2018	SWITCH STRUCTURES	Dolby Intellectual Property Licensing, LLC	Expired
238794-EP-3	European Patent	9/17/2010	10177345.5	EP2315221	11/14/2012	SWITCH STRUCTURE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
238794-JP-4	Japan	9/9/2010	2010-201497	JP2011091029		SWITCH STRUCTURE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired

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238794-GB-8	United Kingdom	9/17/2010	10177345.5	GB2315221	11/14/2012	SWITCH STRUCTURE AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
239040-EP-3	European Patent	12/14/2010	10194998	EP2337183	7/23/2014	APPARATUS AND METHOD FOR RAPID CHARGING USING SHARED POWER ELECTRONICS	Dolby Intellectual Property Licensing, LLC	Expired
239040-IN-5	India	12/14/2010	3822/CHE/2010	IN2010CH03822		APPARATUS AND METHOD FOR RAPID CHARGING USING SHARED POWER ELECTRONICS	Dolby Intellectual Property Licensing, LLC	Expired
239040-US-14	United States of America	7/26/2022	17/873,357			APPARATUS AND METHOD FOR RAPID CHARGING USING SHARED POWER ELECTRONICS	Dolby Intellectual Property Licensing, LLC	Expired
239053-EP-3	European Patent	4/4/2011	11160945.9	EP2375620	6/8/2016	DIVISION FREE DUPLEXING NETWORKS	Dolby Intellectual Property Licensing, LLC	Expired
239322-EP-3	European Patent	8/20/2010	10173623.9	EP2290810	6/25/2014	SYSTEM AND METHOD FOR NON-SINUSOIDAL CURRENT WAVEFORM EXCITATION OF ELECTRICAL MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
239382-EP-3	European Patent	6/22/2011	11170924.2	EP2403129	8/13/2014	SYSTEM AND METHOD FOR NON-SINUSOIDAL CURRENT WAVEFORM EXCITATION OF ELECTRICAL GENERATORS	Dolby Intellectual Property Licensing, LLC	Expired
239382-JP-5	Japan	6/22/2011	2011-137895	JP2012016267		SYSTEM AND METHOD FOR NON-SINUSOIDAL CURRENT WAVEFORM EXCITATION OF ELECTRICAL GENERATORS	Dolby Intellectual Property Licensing, LLC	Expired
239449-IN-5	India	8/13/2010	1911/DEL/2010	IN1911DEL2010		APPARATUS FOR TRANSFERRING ENERGY USING ONBOARD POWER ELECTRONICS AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
239451-EP-3	European Patent	7/14/2011	11173959.5	EP2410639	6/11/2014	HIGH POWER-DENSITY, HIGH EFFICIENCY, NON-PERMANENT MAGNET ELECTRIC MACHINE	Dolby Intellectual Property Licensing, LLC	Expired
241038-JP-4	Japan	12/26/2011	2011-282553	JP2012142934		POWER SWITCHING SYSTEM INCLUDING A MICROELECTROMECHANICAL SYSTEM (MEMS) ARRAY	Dolby Intellectual Property Licensing, LLC	Expired
241400-CN-2	China	4/20/2011	2.0111E+11	CN102298952	3/16/2016	ENERGY AND SPACE EFFICIENT DETECTION FOR DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
241400-EP-3	European Patent	4/13/2011	11162301.3	EP2381447		ENERGY AND SPACE EFFICIENT DETECTION FOR DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
241400-JP-4	Japan	4/14/2011	2011-089658	JP2011227985		ENERGY AND SPACE EFFICIENT DETECTION FOR DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
241400-KR-5	Korea, Republic of (KR)	4/20/2011	1.02011E+12	KR102011117616A		ENERGY AND SPACE EFFICIENT DETECTION FOR DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
241400-TW-6	Taiwan	4/21/2011	100113939	TWI533296	5/11/2016	ENERGY AND SPACE EFFICIENT DETECTION FOR DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
241407-EP-3	European Patent	4/11/2011	11161812	EP2378731	3/30/2016	GENERALIZED DIVISION FREE DUPLEXING TECHNIQUES FOR DECREASING RENDEVOUS TIME	Dolby Intellectual Property Licensing, LLC	Expired

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241411-US-1	United States of America	3/22/2010	12/713361	US20110231155A1		DYNAMICALLY CONFIGURABLE SENSOR CHASSIS	Dolby Intellectual Property Licensing, LLC	Expired
241411-EP-3	European Patent	3/11/2011	11157805	EP2369748		DYNAMICALLY CONFIGURABLE SENSOR CHASSIS	Dolby Intellectual Property Licensing, LLC	Expired
241411-KR-4	Korea, Republic of (KR)	3/21/2011	1.02011E+12	KR102011106239A		DYNAMICALLY CONFIGURABLE SENSOR CHASSIS	Dolby Intellectual Property Licensing, LLC	Expired
241497-EP-3	European Patent	12/10/2010	10194449.4	EP2337043	3/30/2016	SWITCH STRUCTURE AND ASSOCIATED CIRCUIT	Dolby Intellectual Property Licensing, LLC	Expired
241826-EP-3	European Patent	2/24/2011	11155784.9	EP2362525		ROTOR STRUCTURE FOR INTERIOR PERMANENT MAGNET ELECTROMOTIVE MACHINE	Dolby Intellectual Property Licensing, LLC	Expired
241843-EP-3	European Patent	6/14/2011	11169822.1	EP2398028	8/12/2015	MEMS SWITCHING ARRAY HAVING A SUBSTRATE	Dolby Intellectual Property Licensing, LLC	Expired
242485-WO-2	Patent Cooperation Treaty	3/16/2012	PCT/US2012/029326	WO201212129061		SYSTEM AND METHOD FOR CONTACTLESS POWER TRANSFER IN IMPLANTABLE DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
242903-EP-3	European Patent	10/31/2011	11187315.4	EP2450927	1/4/2017	MEMS-BASED SWITCHING SYSTEMS	Dolby Intellectual Property Licensing, LLC	Expired
243942-BR-2	Brazil	10/31/2011	PI1104288-5	BR1104288		LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-EP-4	European Patent	11/15/2011	11189255	EP2456066	3/7/2018	LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-JP-6	Japan	11/16/2011	2011-250219	JP2012115134		LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-DE-7	Germany (Federal Republic of)	11/15/2011	11189255	DE602011046224.5	3/7/2018	LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-FR-8	France	11/15/2011	11189255	FR2456066	3/7/2018	LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-GB-9	United Kingdom	11/15/2011	11189255	GB2456066	3/7/2018	LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-IT-10	Italy	11/15/2011	5.02018E+14	IT2456066	3/7/2018	LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243942-ES-11	Spain	11/15/2011	11189255	ES2456066	3/7/2018	LOW-INDUCTANCE, HIGH-EFFICIENCY INDUCTION MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243944-JP-6	Japan	11/14/2011	2011-248140	JP2012115133		HIGH POWER-DENSITY, HIGH BACK EMF PERMANENT MAGNET MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired

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243944-US-8	United States of America	5/19/2017	15/600086	US20170257050		HIGH POWER-DENSITY, HIGH BACK EMF PERMANENT MAGNET MACHINE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243956-US-1	United States of America	11/19/2010	12/949862	US20120126728A1		INTEGRATED ELECTRIC MACHINE AND SILICON CARBIDE POWER CONVERTER ASSEMBLY AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243956-BR-2	Brazil	11/10/2011	PI 1105062-4	BRPI1105062		INTEGRATED ELECTRIC MACHINE AND SILICON CARBIDE POWER CONVERTER ASSEMBLY AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243956-EP-4	European Patent	11/15/2011	11189253.5	EP2456054		INTEGRATED ELECTRIC MACHINE AND SILICON CARBIDE POWER CONVERTER ASSEMBLY AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243956-IN-5	India	11/18/2011	3298/DEL/2011	IN3298/DEL/2011		INTEGRATED ELECTRIC MACHINE AND SILICON CARBIDE POWER CONVERTER ASSEMBLY AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243956-JP-6	Japan	11/16/2011	2011-250220	JP2012115135		INTEGRATED ELECTRIC MACHINE AND SILICON CARBIDE POWER CONVERTER ASSEMBLY AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
243963-SE-5	Sweden	5/20/2011	1150471-9			High Speed Self-Cascaded Electric Machines	Dolby Intellectual Property Licensing, LLC	Expired
244088-WO-2	Patent Cooperation Treaty	6/29/2011	US11/42322	WO12/21222		RECHARGEABLE ELECTROCHEMICAL CELL AND METHOD OF MANUFACTURING A RECHARGEABLE ELECTROCHEMICAL CELL	Dolby Intellectual Property Licensing, LLC	Expired
244092-EP-3	European Patent	7/26/2012	12178134.8	EP2551866	4/2/2014	ELECTRICAL DISTRIBUTION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
244092-DE-5	Germany (Federal Republic of)	7/26/2012	12178134.8	DE2551866	4/2/2014	ELECTRICAL DISTRIBUTION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
244295-BR-2	Brazil	4/15/2011	PI1101994-8	BRPI1101994		AUTOMATIC ERROR CONTROL SCHEME SELECTION FOR FIXED-LENGTH MESSAGES BASED UPON MESSAGE PAYLOAD SIZE	Dolby Intellectual Property Licensing, LLC	Expired
244295-CA-3	Canada	3/31/2011	2735762			AUTOMATIC ERROR CONTROL SCHEME SELECTION FOR FIXED-LENGTH MESSAGES BASED UPON MESSAGE PAYLOAD SIZE	Dolby Intellectual Property Licensing, LLC	Expired
245295-CA-2	Canada	12/1/2011	2760215			OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-CN-3	China	12/14/2011	2.011 IE+11	CN102592613	8/31/2016	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-EP-4	European Patent	12/6/2011	11192101.1	EP2466582	2/26/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-JP-5	Japan	11/24/2011	2011-255656	JP5903252	3/18/2016	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired

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245295-KR-6	Korea, Republic of (KR)	12/13/2011	1.02011E+12	KR102012066596A		OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-TW-7	Taiwan	12/6/2011	100144926	TWI536377	6/1/2016	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-DE-8	Germany (Federal Republic of)	12/6/2011	1 1192101.1	DE2466582	2/26/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-GB-9	United Kingdom	12/6/2011	1 1192101.1	GB2466582	2/26/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-NL-10	Netherlands	12/6/2011	1 1192101.1	NL2466582	2/26/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-FR-11	France	12/6/2011	1 1192101.1	FR2466582	2/26/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
245295-N-12	Norway	12/6/2011	1 1192101.1	N-2466582	2/26/2014	OPTICAL DATA STORAGE MEDIA AND METHODS FOR USING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
246897-W-2	Patent Cooperation Treaty	9/10/2012	PCT/US12/054405	W-2013048704		ELECTROCHEMICAL CELLS	Dolby Intellectual Property Licensing, LLC	Expired
246939-BR-2	Brazil	12/22/2011	PI1105336-4	BRPI110533		ELECTRIC MOTOR STRUCTURE TO ELECTRO-MAGNETIC INTERFERENCE	Dolby Intellectual Property Licensing, LLC	Expired
246939-CN-4	China	12/23/2011	2.011 IE+11	CN102545446A		ELECTRIC MOTOR STRUCTURE TO MINIMIZE ELECTRO-MAGNETIC INTERFERENCE	Dolby Intellectual Property Licensing, LLC	Expired
246939-EP-5	European Patent	12/15/2011	11193656.3	EP2469687		ELECTRIC MOTOR STRUCTURE TO MINIMIZE ELECTRO-MAGNETIC INTERFERENCE	Dolby Intellectual Property Licensing, LLC	Expired
246939-IN-6	India	12/16/2011	3680/DEL/2011	IN3680/DEL/2011		ELECTRIC MOTOR STRUCTURE TO MINIMIZE ELECTRO-MAGNETIC INTERFERENCE	Dolby Intellectual Property Licensing, LLC	Expired
246939-JP-7	Japan	12/20/2011	2011-277762	JP2012135199		ELECTRIC MOTOR STRUCTURE TO MINIMIZE ELECTRO-MAGNETIC INTERFERENCE	Dolby Intellectual Property Licensing, LLC	Expired
246939-CN-8	China	3/22/2018	2.0181E+11	CN108574359		ELECTRIC MOTOR STRUCTURE TO MINIMIZE ELECTRO-MAGNETIC INTERFERENCE	Dolby Intellectual Property Licensing, LLC	Expired
246995-US-2	United States of America	12/7/2012	13/708436	US20130149590A1		AN ALKALI METAL-METAL HALIDE BATTERY	Dolby Intellectual Property Licensing, LLC	Expired
247243-W-2	Patent Cooperation Treaty	11/29/2011	US11/62275	W-2012/087495		COMPOSITION, ENERGY STORAGE DEVICE, AND RELATED PROCESSES	Dolby Intellectual Property Licensing, LLC	Expired
247255-IN-4	India	4/13/2012	1135/DEL/2012	IN1135DEL/2012		SYSTEM, METHOD, AND APPARATUS FOR RESOLVING ERRORS IN A SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
247550-US-1	United States of America	9/30/2011	13/250680	US20130084486A1		ELECTROCHEMICAL CELLS INCLUDING A CONDUCTIVE MATRIX	Dolby Intellectual Property Licensing, LLC	Expired

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247550-W-2	Patent Cooperation Treaty	9/10/2012	PCT/US12/054422			ELECTROCHEMICAL CELLS INCLUDING A CONDUCTIVE MATRIX	Dolby Intellectual Property Licensing, LLC	Expired
248221-SG-4	Singapore	3/22/2012	201202096-2	SG184683		APPARATUS AND METHOD FOR CONTACTLESS HIGH RESOLUTION HANDPRINT CAPTURE	Dolby Intellectual Property Licensing, LLC	Expired
248986-US-1	United States of America	11/30/2011	13/307262	US20130134018A1		A MICRO-ELECTROMECHANICAL SWITCH AND A RELATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
248986-W-2	Patent Cooperation Treaty	10/25/2012	PCT/US2012/061820	W-2013081746		A MICRO-ELECTROMECHANICAL SWITCH AND A RELATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
248986-JP-5	Japan	10/25/2012	2014-544738	JP2015501069		A MICRO-ELECTROMECHANICAL SWITCH AND A RELATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
249074-EP-4	European Patent	1/16/2013	13151418.4	EP2617688	5/2/2018	SEALING GLASS COMPOSITION AND ARTICLE	Dolby Intellectual Property Licensing, LLC	Expired
249090-EP-2	European Patent	9/26/2013	13186251.8	EP2713379	12/20/2017	A SWITCHING APPARATUS INCLUDING GATING CIRCUITRY FOR ACTUATING MICRO-ELECTROMECHANICAL SYSTEM MEMS SWITCHES	Dolby Intellectual Property Licensing, LLC	Expired
249187-US-1	United States of America	5/27/2011	13/117542			BATTERY CELL DESIGN AND METHOD OF COOLING BATTERY CELLS	Dolby Intellectual Property Licensing, LLC	Expired
249391-W-2	Patent Cooperation Treaty	3/20/2013	PCT/US2013/033062	W-2013142553		SYSTEM AND METHOD FOR ISLANDING DETECTION AND PROTECTION	Dolby Intellectual Property Licensing, LLC	Expired
250286-CN-2	China	4/27/2012	2.0121E+11	CN103377382A		OPTIMUM GRADIENT PURSUIT FOR IMAGE ALIGNMENT	Dolby Intellectual Property Licensing, LLC	Expired
250286-DE-3	Germany (Federal Republic of)	4/27/2012	1.02012E+11	DE102012103738		OPTIMAL GRADIENT PURSUIT FOR IMAGE ALIGNMENT	Dolby Intellectual Property Licensing, LLC	Expired
250286-GB-4	United Kingdom	4/17/2012	1206744.3	GB2501270		OPTIMAL GRADIENT PURSUIT FOR IMAGE ALIGNMENT	Dolby Intellectual Property Licensing, LLC	Expired
250286-JP-5	Japan	4/24/2012	2012-098291	JP5953097	6/17/2016	OPTIMAL GRADIENT PURSUIT FOR IMAGE ALIGNMENT	Dolby Intellectual Property Licensing, LLC	Expired
250286-KR-6	Korea, Republic of (KR)	4/27/2012	1.02012E+12	KR102013121360A		OPTIMAL GRADIENT PURSUIT FOR IMAGE ALIGNMENT	Dolby Intellectual Property Licensing, LLC	Expired
250455-US-1	United States of America	12/30/2011	13/341052	US20130171487A1		RECHARGEABLE BATTERY AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
250455-CN-2	China	12/31/2012	2.01221E+11	CN201220744711.6	11/20/2013	RECHARGEABLE BATTERY AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
250455-EP-6	European Patent	12/18/2012	12197725	EP2610943	2/15/2017	RECHARGEABLE BATTERY AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
250744-CN-2	China	12/28/2012	2.01221E+11	CN201220737334.3	12/4/2013	RECHARGEABLE BATTERY SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired

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250841-BR-2	Brazil	8/10/2012	BR10201202046-5	BR102012020046		SYSTEM AND METHOD FOR DEPTH FROM DEFOCUS IMAGING	Dolby Intellectual Property Licensing, LLC	Expired
251009-US-1	United States of America	11/30/2011	13/308386	US20130138499A1		USAGE MEASUREMENT TECHNIQUES AND SYSTEMS FOR INTERACTIVE ADVERTISING	Dolby Intellectual Property Licensing, LLC	Expired
251009-CN-4	China	11/30/2012	2.01211E+11	CN103137046A		USAGE MEASUREMENT TECHNIQUES AND SYSTEMS FOR INTERACTIVE ADVERTISING	Dolby Intellectual Property Licensing, LLC	Expired
251344-US-1	United States of America	8/30/2011	13/221896	US20130054377A1		PERSON TRACKING AND INTERACTIVE ADVERTISING	Dolby Intellectual Property Licensing, LLC	Expired
251344-DE-3	Germany (Federal Republic of)	6/29/2012	1.02012E+11	DE102012105754		PERSON TRACKING AND INTERACTIVE ADVERTISING	Dolby Intellectual Property Licensing, LLC	Expired
251344-US-7	United States of America	6/10/2019	16/436,583	US-2019-0311661-A1		PERSON TRACKING AND INTERACTIVE ADVERTISING	Dolby Intellectual Property Licensing, LLC	Expired
251485-WO-2	Patent Cooperation Treaty	9/11/2012	PCT/US12/054541	WO2013039848		THERMAL MANAGEMENT DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
252223-WO-2	Patent Cooperation Treaty	12/5/2012	US12/67864	WO2013/101411		METHOD AND SYSTEM FOR CONTROLLING ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
252382-IN-5	India	8/1/2012	2380/DEL/2012	IN2380DEL2012		APPARATUS AND METHOD FOR CHARGING AN ELECTRIC VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
252665-EP-2	European Patent	11/7/2012	12191698.5	EP2592747	3/7/2018	METHOD AND SYSTEM FOR CONTROLLING MOTOR	Dolby Intellectual Property Licensing, LLC	Expired
252995-US-1	United States of America	5/30/2012	13/483841			ACTIVE BRAZE TECHNIQUES ON BETA-ALUMINA	Dolby Intellectual Property Licensing, LLC	Expired
253755-WO-2	Patent Cooperation Treaty	2/15/2013	PCT/US2013/026496	WO2013123433		NEGATIVE SEQUENCE CURRENT COMPENSATION CONTROLLER AND METHOD FOR POWER CONVERSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
254472-WO-2	Patent Cooperation Treaty	1/10/2013	US13/20989	WO2013115950		ELECTRODE COMPOSITIONS, ENERGY STORAGE DEVICES AND RELATED METHODS	Dolby Intellectual Property Licensing, LLC	Expired
254472-EP-3	European Patent	1/10/2013	13701179.7	EP2810323	5/30/2018	ELECTRODE COMPOSITIONS, ENERGY STORAGE DEVICES AND RELATED METHODS	Dolby Intellectual Property Licensing, LLC	Expired
254566-WO-2	Patent Cooperation Treaty	4/24/2013	PCT/US2013/037927	WO2013163266		SYSTEM AND METHOD FOR OPEN-CIRCUIT FAULT DETECTION	Dolby Intellectual Property Licensing, LLC	Expired
254869-US-1	United States of America	10/25/2011	61/551047			Integrated Power System Control Method and Related Apparatus with Energy Storage Element	Dolby Intellectual Property Licensing, LLC	Expired
254869-EP-5	European Patent	10/22/2012	12189424	EP2587607	7/12/2017	Integrated Power System Control Method and Related Apparatus with Energy Storage Element	Dolby Intellectual Property Licensing, LLC	Expired

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254869-IN-7	India	10/1/2012	3080/DEL/2012	IN3080DEL2012		Integrated Power System Control Method and Related Apparatus with Energy Storage Element	Dolby Intellectual Property Licensing, LLC	Expired
254993-W-2	Patent Cooperation Treaty	12/7/2012	PCT US2012/068550	WO2013101435		MODULAR HIGH TEMPERATURE BATTERY ELECTRICAL CONFIGURATIONS	Dolby Intellectual Property Licensing, LLC	Expired
256606-US-1	United States of America	5/25/2012	61/651817			COMPOSITIONS FOR BRAZING, AND RELATED METHODS AND DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
256606-US-3	United States of America	8/31/2012	13/600333	US20130316226A1		BRAZE COMPOSITIONS, AND RELATED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
256606-CN-4	China	5/24/2013	2.0131E+11	CN103418932		BRAZE COMPOSITIONS, AND RELATED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
256606-CN-12	China	5/24/2013	2.0131E+11	CN103418931		BRAZE COMPOSITIONS, AND RELATED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
256606-KR-16	Korea, Republic of (KR)	5/22/2013	1.02013E+12	KR102013132293A		BRAZE COMPOSITIONS, AND RELATED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
256606-US-17	United States of America	9/6/2018	16/124,120	US20190001445		BRAZE COMPOSITIONS, AND RELATED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
257085-US-1	United States of America	5/23/2012	61/650890			ENERGY STORAGE CELL AND METHOD OF ASSEMBLY	Dolby Intellectual Property Licensing, LLC	Expired
257472-US-1	United States of America	11/16/2011	61/560580			METHOD FOR REMODELING OF ELECTRIC VEHICLE ADOPTION	Dolby Intellectual Property Licensing, LLC	Expired
257472-W-3	Patent Cooperation Treaty	11/16/2012	PCT/US12/065414	WO2013/074864		METHOD AND SYSTEM FOR ELECTRIC VEHICLE ADOPTION SIMULATION WITH REASONING	Dolby Intellectual Property Licensing, LLC	Expired
257939-W-2	Patent Cooperation Treaty	6/28/2013	PCT US2013/048500	WO2014018220		OPEN CIRCUIT VOLTAGE CHECKING FOR A BATTERY SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
259236-US-1	United States of America	9/13/2012	61/700490			ACTION BASED VIDEO SUMMARIZATION FOR CONVENIENCE STORES	Dolby Intellectual Property Licensing, LLC	Expired
259236-W-3	Patent Cooperation Treaty	9/12/2013	PCT US2013/059478	WO2014043359		SYSTEM AND METHOD FOR GENERATING AN ACTIVITY SUMMARY OF A PERSON	Dolby Intellectual Property Licensing, LLC	Expired
259236-AU-4	Australia	9/12/2013	2013315497			SYSTEM AND METHOD FOR GENERATING AN ACTIVITY SUMMARY OF A PERSON	Dolby Intellectual Property Licensing, LLC	Expired
259236-BR-5	Brazil	9/12/2013	112015005543-5			SYSTEM AND METHOD FOR GENERATING AN ACTIVITY SUMMARY OF A PERSON	Dolby Intellectual Property Licensing, LLC	Expired
259236-CN-6	China	9/12/2013	2.0138E+11	CN104823438		SYSTEM AND METHOD FOR GENERATING AN ACTIVITY SUMMARY OF A PERSON	Dolby Intellectual Property Licensing, LLC	Expired
259236-EP-7	European Patent	9/12/2013	13770576	EP2896199		SYSTEM AND METHOD FOR GENERATING AN ACTIVITY SUMMARY OF A PERSON	Dolby Intellectual Property Licensing, LLC	Expired
259236-AU-11	Australia	9/12/2013	2017206244			SYSTEM AND METHOD FOR GENERATING AN ACTIVITY SUMMARY OF A PERSON	Dolby Intellectual Property Licensing, LLC	Expired

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259236-AU-12	Australia	9/12/2013	2019213309			ACTION BASED VIDEO SUMMARIZATION FOR CONVENIENCE STORES	Dolby Intellectual Property Licensing, LLC	Expired
259278-EP-3	European Patent	5/16/2013	13168098.5	EP2667396	1/6/2016	CONTACTOR ISOLATION METHOD AND APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
259422-IN-5	India	5/15/2013	1446/DEL/2013	IN1446DEL 2013		SYSTEM FOR TRANSFERRING ENERGY FROM AN ENERGY SOURCE AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired
260416-US-1	United States of America	10/19/2012	61/715906			Wireless Feeler Gauge	Dolby Intellectual Property Licensing, LLC	Expired
260416-WO-3	Patent Cooperation Treaty	10/11/2013	PCT/US2013/064446	WO2014062484		DIGITAL FEELER GAUGE AND METHOD OF USING SAME	Dolby Intellectual Property Licensing, LLC	Expired
261519-EP-2	European Patent	11/12/2013	13192515.8	EP2731190		COMPOSITION, ENERGY STORAGE DEVICE, AND RELATED PROCESS	Dolby Intellectual Property Licensing, LLC	Expired
261528-EP-6	European Patent	9/23/2013	13185598.3	EP2712073		POWER CONVERSION SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
262057-CN-1	China	9/24/2012	2.0121E+11	CN103660967A		MOBILE TRANSPORTATION EQUIPMENT WITH IMPROVED ENERGY SUPPLYING MECHANISM AND MOBILE TRANSPORTATION METHOD	Dolby Intellectual Property Licensing, LLC	Expired
263939-US-1	United States of America	11/2/2012	61/721743			ENGINE COOLING SYSTEM AND METHOD FOR AN ENGINE	Dolby Intellectual Property Licensing, LLC	Expired
263939-CN-2	China	11/1/2013	2.01321E+11	CN20132068392.2	7/9/2014	ENGINE COOLING SYSTEM FOR AN ENGINE	Dolby Intellectual Property Licensing, LLC	Expired
264203-US-2	United States of America	3/10/2014	14/202674	US20140277884A1		DRIVE SYSTEM AND METHOD FOR DRIVING A VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
264203-IN-5	India	3/12/2014	1286/CHE/2014			DRIVE SYSTEM AND METHOD FOR DRIVING A VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
264203-BR-6	Brazil	3/7/2014	102014005311-5	BR102014005311		DRIVE SYSTEM AND METHOD FOR DRIVING A VEHICLE	Dolby Intellectual Property Licensing, LLC	Expired
264291-US-1	United States of America	9/13/2012	61/700542			SITUATIONAL AWARENESS FOR GAS STATIONS AND SIMILAR COMMERCIAL SITES OF INTEREST	Dolby Intellectual Property Licensing, LLC	Expired
264291-WO-3	Patent Cooperation Treaty	9/12/2013	PCT/US2013/059453	WO2014043340		SYSTEM AND METHOD FOR GENERATING SEMANTIC ANNOTATIONS	Dolby Intellectual Property Licensing, LLC	Expired
264291-BR-5	Brazil	9/12/2013	112015005541-9			SYSTEM AND METHOD FOR GENERATING SEMANTIC ANNOTATIONS	Dolby Intellectual Property Licensing, LLC	Expired
264291-EP-8	European Patent	9/12/2013	13770747.7	EP2895987		SYSTEM AND METHOD FOR GENERATING SEMANTIC ANNOTATIONS	Dolby Intellectual Property Licensing, LLC	Expired
264323-US-1	United States of America	11/2/2012	61/721712			BATTERY MANAGEMENT SYSTEMS AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
264353-TW-2	Taiwan	11/29/2013	102143918	TW201432676		STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired

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264353-W-3	Patent Cooperation Treaty	11/22/2013	PCT/US13/71362	W-201408834		STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
264353-JP-5	Japan	11/22/2013	2015-546501			STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
264353-EP-6	European Patent	11/22/2013	13805656.9	EP2929534		STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
264353-KR-7	Korea, Republic of (KR)	11/22/2013	10-2015-7018081			STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
264353-CN-8	China	11/22/2013	2.0138E+11	CN104903960		STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
264353-CA-9	Canada	11/22/2013	2893842			STACKED FILM REFLECTIVE LAYERS FOR MULTI-LAYER OPTICAL DATA STORAGE	Dolby Intellectual Property Licensing, LLC	Expired
265784-JP-5	Japan	8/4/2014	2014-158297	JP2015-033329		SPOKE PERMANENT MAGNET MACHINE WITH REDUCED TORQUE RIPPLE AND METHOD OF MANUFACTURING THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
265784-CN-7	China	8/5/2014	2.01812E+11	CN110224567X		SPOKE PERMANENT MAGNET MACHINE WITH REDUCED TORQUE RIPPLE AND METHOD OF MANUFACTURING THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
265951-W-2	Patent Cooperation Treaty	10/26/2015	PCT/US15/057308	W-2016089504		MULTICHANNEL RELAY ASSEMBLY WITHIN LINE MEMS SWITCHES	Dolby Intellectual Property Licensing, LLC	Expired
265951-JP-7	Japan	10/26/2015	2017-528881			MULTICHANNEL RELAY ASSEMBLY WITHIN LINE MEMS SWITCHES	Dolby Intellectual Property Licensing, LLC	Expired
265951-KR-8	Korea, Republic of (KR)	10/26/2015	10-2017-7018313	KR10-2017-0090485		MULTICHANNEL RELAY ASSEMBLY WITHIN LINE MEMS SWITCHES	Dolby Intellectual Property Licensing, LLC	Expired
266269-CN-3	China	10/17/2014	2.01411E+11	CN104578472		TORQUE RIPPLE REDUCTION IN ELECTRIC MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
266269-EP-4	European Patent	10/17/2014	14189355.2	EP2863518		TORQUE RIPPLE REDUCTION IN ELECTRIC MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
266269-JP-5	Japan	10/16/2014	2014-211282	JP2015-080403		TORQUE RIPPLE REDUCTION IN ELECTRIC MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
266271-EP-3	European Patent	11/3/2014	14191515.7	EP2869529	8/31/2016	SYSTEMS AND METHODS FOR SECURE FILE TRANSFERS	Dolby Intellectual Property Licensing, LLC	Expired
267009-W-2	Patent Cooperation Treaty	9/29/2014	PCT/US2014/058038	W-2015048639		SYSTEM AND METHOD FOR DETERMINING A HYDRATION LEVEL OF A TISSUE REGION	Dolby Intellectual Property Licensing, LLC	Expired
267351-EP-3	European Patent	7/10/2014	14176572.7	EP2849112		SYSTEMS AND METHODS FOR DATA LOSS PREVENTION	Dolby Intellectual Property Licensing, LLC	Expired
267351-IN-5	India	7/14/2014	3477/CHE/2014			SYSTEMS AND METHODS FOR DATA LOSS PREVENTION	Dolby Intellectual Property Licensing, LLC	Expired
267819-US-5	United States of America	11/1/2016	15/340131	US20170054335A1		SYSTEM AND METHOD FOR SMOOTHING A SALIENT ROTOR IN ELECTRICAL MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
267847-EP-2	European Patent	7/21/2014	14177828.2	EP2830182	9/6/2017	ISOLATED BATTERY MANAGEMENT SYSTEMS AND METHODS THEREOF	Dolby Intellectual Property Licensing, LLC	Expired

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268047-EP-2	European Patent	8/5/2014	14179835.5	EP2840422		PLASMONIC INTERFACE AND METHOD OF MANUFACTURING THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
268047-KR-5	Korea, Republic of (KR)	8/19/2014	1.02014E+12			PLASMONIC INTERFACE AND METHOD OF MANUFACTURING THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
268047-CA-6	Canada	8/14/2014	2859421			PLASMONIC INTERFACE AND METHOD OF MANUFACTURING THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
268102-US-1	United States of America	7/26/2013	13/951979	US20150030901A1		BATTERY HEATER SYSTEMS AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
268102-CN-2	China	7/25/2014	2.0141E+11	CN104347912		BATTERY HEATER SYSTEMS AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
268102-EP-3	European Patent	7/23/2014	14178108.8	EP2830186	12/6/2017	BATTERY HEATER SYSTEMS AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
268102-JP-4	Japan	7/23/2014	2014-149347			BATTERY HEATER SYSTEMS AND METHODS	Dolby Intellectual Property Licensing, LLC	Expired
269205-JP-2	Japan	9/16/2014	2014-187259			IMPROVED APPARATUS AND METHOD FOR ELECTRIC BRAKING	Dolby Intellectual Property Licensing, LLC	Expired
269205-US-3	United States of America	9/16/2014	14/487731	US20150081152A1		IMPROVED APPARATUS AND METHOD FOR ELECTRIC BRAKING	Dolby Intellectual Property Licensing, LLC	Expired
269545-W-2	Patent Cooperation Treaty	9/4/2014	PCT/US2014/053982	WO2015053885		METHODS AND SYSTEMS FOR A UNIVERSAL WIRELESS PLATFORM FOR ASSET MONITORING	Dolby Intellectual Property Licensing, LLC	Expired
269545-JP-5	Japan	9/4/2014	2016-519847			METHODS AND SYSTEMS FOR A UNIVERSAL WIRELESS PLATFORM FOR ASSET MONITORING	Dolby Intellectual Property Licensing, LLC	Expired
269545-CN-7	China	9/4/2014	2.0148E+11	CN105794180		METHODS AND SYSTEMS FOR A UNIVERSAL WIRELESS PLATFORM FOR ASSET MONITORING	Dolby Intellectual Property Licensing, LLC	Expired
269575-W-2	Patent Cooperation Treaty	1/9/2015	PCT/US2015/010817	WO2015/108778		PLATELET ACTIVATION AND GROWTH FACTOR RELEASE USING ELECTRIC PULSES	Dolby Intellectual Property Licensing, LLC	Expired
269603-W-2	Patent Cooperation Treaty	11/20/2014	PCT/US2014/066484	WO2015/108619		ELECTRIC PULSE GENERATION SYSTEMS USING CAPACITIVE COUPLING	Dolby Intellectual Property Licensing, LLC	Expired
269603-CN-10	China	11/20/2014	2.0148E+11	CN105899654		ELECTRIC PULSE GENERATION SYSTEMS USING CAPACITIVE COUPLING	Dolby Intellectual Property Licensing, LLC	Expired
271055-KR-3	Korea, Republic of (KR)	5/19/2015	1.02015E+12			THERMAL CLAMP APPARATUS FOR ELECTRONICS SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
271055-CN-4	China	5/22/2015	2.0151E+11	CN105101747		THERMAL CLAMP APPARATUS FOR ELECTRONICS SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
271261-CN-3	China	5/22/2015	2.0151E+11	CN105130486		METHOD FOR JOINING CERAMIC TO METAL, AND SEALING STRUCTURE THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
271471-US-2	United States of America	10/27/2015	14/924288	US20160118848A1		PERMANENT MAGNET MACHINE	Dolby Intellectual Property Licensing, LLC	Expired

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271474-W-2	Patent Cooperation Treaty	7/21/2016	PCT/US2016/043319	W-2017039863		ENERGY STORAGE DEVICE WITH REDUCED TEMPERATURE VARIABILITY BETWEEN CELLS	Dolby Intellectual Property Licensing, LLC	Expired
272354-US-1	United States of America	10/9/2013	61/889025			WIRELESS TAPER GAUGE AND METHOD OF USING SAME	Dolby Intellectual Property Licensing, LLC	Expired
272805-US-1	United States of America	2/20/2014	61/942199			CONTROL METHOD FOR REDUCING TORQUE RIPPLE IN SWITCHED RELUCTANCE MOTORS	Dolby Intellectual Property Licensing, LLC	Expired
273156-CN-2	China	12/1/2016	2.01611E+11	CN106893694		ERYTHROCYTE AGGREGATION AND LEUKOCYTE ISOLATION	Dolby Intellectual Property Licensing, LLC	Expired
273156-EP-3	European Patent	11/28/2016	16200924.5	EP3176579		ERYTHROCYTE AGGREGATION AND LEUKOCYTE ISOLATION	Dolby Intellectual Property Licensing, LLC	Expired
273156-JP-4	Japan	11/29/2016	2016-230727			ERYTHROCYTE AGGREGATION AND LEUKOCYTE ISOLATION	Dolby Intellectual Property Licensing, LLC	Expired
273252-EP-2	European Patent	1/28/2015	15152810.6	EP2913217		VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
273252-BR-6	Brazil	1/13/2015	1020150007620	BR102015000762		VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
273252-EP-11	European Patent	1/28/2015	19181302.1	EP3613625		VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
273252-JP-12	Japan	1/21/2015	2019-116125	JP2019-163060		VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME	Dolby Intellectual Property Licensing, LLC	Expired
273345-US-6	United States of America	12/20/2017	15/848823	US20180134170A1		VEHICLE PROPULSION SYSTEM HAVING AN ENERGY STORAGE SYSTEM AND OPTIMIZED METHOD OF CONTROLLING OPERATION THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
274610-EP-6	European Patent	1/11/2016	16150804.9	EP3046242		BI-DIRECTIONAL DC-DC POWER CONVERTER FOR A VEHICLE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
274698-US-1	United States of America	3/17/2014	61/954182			SYSTEM ARCHITECTURE FOR WIRELESS METROLOGICAL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
274698-W-3	Patent Cooperation Treaty	2/23/2015	PCT/US2015/017009	W-2015142477		SYSTEM ARCHITECTURE FOR WIRELESS METROLOGICAL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
274698-EP-7	European Patent	2/23/2015	15709003.6	EP3120254		SYSTEM ARCHITECTURE FOR WIRELESS METROLOGICAL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
274984-W-2	Patent Cooperation Treaty	6/23/2015	PCT/US2015/037155	W-2015/200307		INTEGRATED MICRO-ELECTROMECHANICAL SWITCHES AND A RELATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
275094-IN-4	India	1/14/2016	2.01644E+11			VEHICLE DRIVING SYSTEM AND ENERGY CONTROL METHODS	Dolby Intellectual Property Licensing, LLC	Expired
275094-EP-6	European Patent	1/13/2016	16151031.8	EP3045344		VEHICLE DRIVING SYSTEM AND ENERGY CONTROL METHODS	Dolby Intellectual Property Licensing, LLC	Expired

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275150-US-2	United States of America	11/16/2016	15/352759	US20170070154A1		MULTI-LEVEL DC-DC CONVERTER WITH GALVANIC ISOLATION AND ADAPTIVE CONVERSION RATIO	Dolby Intellectual Property Licensing, LLC	Expired
275327-WO-2	Patent Cooperation Treaty	7/13/2016	PCT/US16/041954	WO2017058335		REFRACTORY SEED METAL FOR ELECTROPLATED MEMS STRUCTURES	Dolby Intellectual Property Licensing, LLC	Expired
277187-WO-2	Patent Cooperation Treaty	4/5/2016	PCT/US16/25990	WO2017176253		ACTIVATED PLATELET COMPOSITION WITH TUNABLE GROWTH FACTOR LEVEL	Dolby Intellectual Property Licensing, LLC	Expired
277201-EP-2	European Patent	12/12/2016	16203484.7	EP3182332		SYSTEMS AND METHODS FOR HAIR SEGMENTATION	Dolby Intellectual Property Licensing, LLC	Expired
277298-WO-2	Patent Cooperation Treaty	2/2/2016	PCT/US16/16075	WO2016140752		ELECTROMECHANICAL SYSTEM SUBSTRATE ATTACHMENT FOR REDUCED THERMAL DEFORMATION	Dolby Intellectual Property Licensing, LLC	Expired
277298-KR-10	Korea, Republic of (KR)	2/2/2016	10-2022-7029006			ELECTROMECHANICAL SYSTEM SUBSTRATE ATTACHMENT FOR REDUCED THERMAL DEFORMATION	Dolby Intellectual Property Licensing, LLC	Expired
277870-EP-2	European Patent	12/4/2015	15197958	EP3032216	11/1/2017	METHOD AND APPARATUS FOR MEASURING THICKNESS OF AN OBJECT	Dolby Intellectual Property Licensing, LLC	Expired
278163-WO-2	Patent Cooperation Treaty	2/19/2016	PCT/US16/18583	WO2016190929		ZINC-BASED ELECTROLYTE COMPOSITIONS, AND RELATED ELECTROCHEMICAL PROCESSES AND ARTICLES	Dolby Intellectual Property Licensing, LLC	Expired
278961-CN-2	China	7/22/2016	201611E+11	CN106374749		CIRCUITS AND METHODS FOR SYNCHRONOUS RECTIFICATION IN RESONANT CONVERTERS	Dolby Intellectual Property Licensing, LLC	Expired
279301A-WO-2	Patent Cooperation Treaty	7/21/2016	PCT/US16/43282	WO2017039861		RADIO FREQUENCY MICRO-ELECTROMECHANICAL SYSTEMS HAVING INVERTED MICROSTRIP TRANSMISSION LINES AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
279412-WO-2	Patent Cooperation Treaty	7/27/2016	PCT/US16/44241	WO2017044195		ENERGY STORAGE DEVICE HAVING IMPROVED THERMAL PERFORMANCE	Dolby Intellectual Property Licensing, LLC	Expired
279748-US-1	United States of America	10/7/2015	14/876892	US20170104244A1		POSITIVE ELECTRODE COMPOSITION FOR OVERDISCHARGE PROTECTION	Dolby Intellectual Property Licensing, LLC	Expired
279748-WO-2	Patent Cooperation Treaty	10/3/2016	PCT/US16/55106	WO2017062297		POSITIVE ELECTRODE COMPOSITION FOR OVERDISCHARGE PROTECTION	Dolby Intellectual Property Licensing, LLC	Expired
279748-EP-5	European Patent	10/3/2016	16781963	EP3360183		POSITIVE ELECTRODE COMPOSITION FOR OVERDISCHARGE PROTECTION	Dolby Intellectual Property Licensing, LLC	Expired
279758-WO-2	Patent Cooperation Treaty	9/9/2016	PCT/US2016/50883	WO2017069861		AUXILIARY CIRCUIT FOR MICRO-ELECTROMECHANICAL SYSTEM RELAY CIRCUIT	Dolby Intellectual Property Licensing, LLC	Expired
279759-WO-2	Patent Cooperation Treaty	10/18/2016	PCT/US16/057483	WO2017070086		MICRO-ELECTROMECHANICAL SYSTEM RELAY CIRCUIT	Dolby Intellectual Property Licensing, LLC	Expired

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279765-W-2	Patent Cooperation Treaty	10/18/2016	PCT/US16/57509	W-2017070103		ISOLATED CONTROL CIRCUIT AND DRIVER FOR MICRO-ELECTROMECHANICAL SYSTEM SWITCH	Dolby Intellectual Property Licensing, LLC	Expired
280212-W-2	Patent Cooperation Treaty	7/21/2016	PCT/US16/43279	W-2017/039860		BATTERY MANAGEMENT SYSTEM AND POWER CONNECTOR	Dolby Intellectual Property Licensing, LLC	Expired
280467-CN-1	China	3/31/2015	201510148732.X	CN106143171A		MULTI-SOURCE ENERGY STORAGE SYSTEM AND ENERGY MANAGEMENT AND CONTROL METHOD	Dolby Intellectual Property Licensing, LLC	Expired
280514-CN-1	China	3/31/2015	2.0151E+11	CN106160206A		POWER SUPPLY SYSTEM AND ENERGY STORAGE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
280514-EP-4	European Patent	3/30/2016	16162904.3	EP3078538		POWER GENERATING SYSTEM AND ENERGY STORAGE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
280638-EP-2	European Patent	8/26/2016	16185846.9	EP3135527		HYBRID SYSTEM WITH MULTIPLE ENERGY STORAGE DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
280946-W-2	Patent Cooperation Treaty	9/8/2016	PCT/US16/050706	WO2017044581		HEAT FLUX ASSEMBLY FOR AN ENERGY STORAGE DEVICE	Dolby Intellectual Property Licensing, LLC	Expired
281041-US-2	United States of America	3/30/2017	15/474405	US20170282310A1		EUTECTIC BRAZING COMPOSITIONS, AND RELATED PROCESSES AND DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
281127-W-2	Patent Cooperation Treaty	7/20/2016	PCT/US16/043035	W-2017030724		SYSTEMS AND METHODS TO SAMPLE CURRENT MEASUREMENTS IN ENERGY STORAGE DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
281133-W-2	Patent Cooperation Treaty	12/29/2016	PCT/US2016/069197	W-2017117385		Calcium controlled activation of platelets via electrical stimulation	Dolby Intellectual Property Licensing, LLC	Expired
282674-US-1	United States of America	10/30/2015	62/248784			METHODS, SYSTEMS, APPARATUS, AND STORAGE MEDIA FOR USE IN DETECTING ANOMALOUS BEHAVIOR AND/OR IN PREVENTING DATA LOSS	Dolby Intellectual Property Licensing, LLC	Expired
283249-US-1	United States of America	4/25/2016	62/327043			SLEEVE ROTOR SYNCHRONOUS RELUCTANCE MOTOR	Dolby Intellectual Property Licensing, LLC	Expired
283249-CN-5	China	4/25/2017	2.0171E+11	CN107370261		SLEEVE ROTOR SYNCHRONOUS RELUCTANCE ELECTRIC MACHINE	Dolby Intellectual Property Licensing, LLC	Expired
283282-W-2	Patent Cooperation Treaty	11/10/2016	PCT/US16/061220	W-2017083452		VOLTAGE GROUPING OF ENERGY STORAGE UNITS	Dolby Intellectual Property Licensing, LLC	Expired
283283-W-2	Patent Cooperation Treaty	11/2/2016	PCT/US16/060013	W-2017083144		ADJUSTABLE TAP LOCATION FOR ENERGY STORAGE CELLS	Dolby Intellectual Property Licensing, LLC	Expired
283495-CN-1	China	3/30/2016	201610192001.X	CN107294145A		CHARGING DEVICE, SYSTEM AND METHOD	Dolby Intellectual Property Licensing, LLC	Expired
283516-US-7	United States of America	11/6/2019	16/675,703	US202000070643		INTEGRATED CHARGER FOR VEHICLES AND METHOD OF MAKING SAME	Dolby Intellectual Property Licensing, LLC	Expired

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283956-W-2	Patent Cooperation Treaty	4/26/2017	PCT/US2017/029528	WO/2017/189658		POWER CONVERTER TOPOLOGY FOR USE IN AN ENERGY STORAGE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
283956-EP-4	European Patent	4/26/2017	17721943.3	EP3449558		POWER CONVERTER TOPOLOGY FOR USE IN AN ENERGY STORAGE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
283956-JP-6	Japan	4/26/2017	2018-555755			POWER CONVERTER TOPOLOGY FOR USE IN AN ENERGY STORAGE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
283956-KR-7	Korea, Republic of (KR)	4/26/2017	1.02019E+12			POWER CONVERTER TOPOLOGY FOR USE IN AN ENERGY STORAGE SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
284050-IN-6	India	3/10/2017	2.01744E+11			TOPICAL APPLICATION OF NERVE LABELING DYES FOR IMAGE-GUIDED SURGERY	Dolby Intellectual Property Licensing, LLC	Expired
285698-EP-2	European Patent	5/2/2017	17168930	EP3242323		BRIDGE LEG CIRCUIT ASSEMBLY AND FULL-BRIDGE CIRCUIT ASSEMBLY	Dolby Intellectual Property Licensing, LLC	Expired
285699-CN-1	China	8/12/2016	201610666183.X	CN107732875A		SOLID STATE CIRCUIT BREAKER AND MOTOR DRIVING SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
285990-CN-4	China	2/3/2017	2.0171E+11	CN107040045		SYSTEM AND METHOD FOR PROTECTING A WIRELESS POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
287419-US-1	United States of America	1/25/2016	62/286482			Integrated, Low Cost Photo-Thermal Spectroscopy Reader and Method of Use	Dolby Intellectual Property Licensing, LLC	Expired
287419-TW-3	Taiwan	7/24/2017	106124769	TW201808228		FIXED OPTICS PHOTO-THERMAL SPECTROSCOPY READER AND METHOD OF USE	Dolby Intellectual Property Licensing, LLC	Expired
287419-W-4	Patent Cooperation Treaty	7/21/2017	PCT/US2017/043217	WO/2018/017921		FIXED OPTICS PHOTO-THERMAL SPECTROSCOPY READER AND METHOD OF USE	Dolby Intellectual Property Licensing, LLC	Expired
309222-US-1	United States of America	4/30/2010	61/330091			ROTATING ELECTRIC MACHINE, ESPECIALLY SYNCHRONOUS PERMANENT MAGNET MACHINE	Dolby Intellectual Property Licensing, LLC	Expired
309222-W-3	Patent Cooperation Treaty	4/29/2011	PCT/EP2011/056813	WO/2011/1135062		ROTATING ELECTRIC MACHINE, ESPECIALLY SYNCHRONOUS PERMANENT MAGNET MACHINE	Dolby Intellectual Property Licensing, LLC	Expired
313124-W-2	Patent Cooperation Treaty	6/27/2017	PCT/US17/039537	WO/2018/005520		SYSTEM AND METHOD FOR FAULT INTERRUPTION WITH MEMS SWITCHES	Dolby Intellectual Property Licensing, LLC	Expired
314005-W-2	Patent Cooperation Treaty	4/17/2018	PCT/US18/27849	WO/2018/195003		VEHICLE AND CONTROL METHOD THEREOF AND SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
314571-W-2	Patent Cooperation Treaty	7/9/2018	PCT/US18/41222	WO/2019/040190		Architecture for creating 3D model of an object using information from sparse point cloud as initialization parameter for space carving based method	Dolby Intellectual Property Licensing, LLC	Expired
314858-W-2	Patent Cooperation Treaty	11/20/2017	PCT/US17/62613	WO/2018/11507		SYSTEM AND METHOD FOR LEAKAGE CURRENT AND FAULT LOCATION DETECTION IN ELECTRIC VEHICLE DC POWER CIRCUITS	Dolby Intellectual Property Licensing, LLC	Expired

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314859-W-2	Patent Cooperation Treaty	10/20/2017	PCT/US17/57513	WO2018111400		DC LEAKAGE CURRENT DETECTOR AND METHOD OF OPERATION THEREOF FOR LEAKAGE CURRENT DETECTION IN DC POWER CIRCUITS	Dolby Intellectual Property Licensing, LLC	Expired
315022-EP-2	European Patent	12/15/2017	17207600.2	EP3336483		DIGITAL WIRELESS FEELER GAUGE	Dolby Intellectual Property Licensing, LLC	Expired
315022-CN-3	China	12/15/2017	2.01711E+11	CN108225199		DIGITAL WIRELESS FEELER GAUGE	Dolby Intellectual Property Licensing, LLC	Expired
315117-W-2	Patent Cooperation Treaty	10/28/2017	PCT/US17/58907	WO2018111421		CHARGING PADS AND METHODS FOR CHARGING RECEIVER DEVICES HAVING DIFFERENT FREQUENCY STANDARDS	Dolby Intellectual Property Licensing, LLC	Expired
315233-US-1	United States of America	10/27/2016	62/413684			METHODS OF SYSTEMS OF GENERATING VIRTUAL MULTI-DIMENSIONAL MODELS USING IMAGE ANALYSIS	Dolby Intellectual Property Licensing, LLC	Expired
315233-W-3	Patent Cooperation Treaty	10/27/2017	PCT/US2017/58825	WO2018081607		Methods for using synthetic data in deep-learning-based image analysis	Dolby Intellectual Property Licensing, LLC	Expired
315343A-W-2	Patent Cooperation Treaty	1/12/2018	PCT/US2018/013499			SYSTEM AND METHOD FOR PREDICTING AN EXCITATION PATTERN OF A DEEP BRAIN STIMULATION	Dolby Intellectual Property Licensing, LLC	Expired
315343-W-2	Patent Cooperation Treaty	1/12/2018	PCT/US2018/013498			SYSTEM AND METHOD FOR PREDICTING AN EXCITATION PATTERN OF A DEEP BRAIN STIMULATION	Dolby Intellectual Property Licensing, LLC	Expired
315659-W-2	Patent Cooperation Treaty	10/27/2017	PCT/US2017/058641	WO2018111416		A CHARGING PAD AND A METHOD FOR CHARGING ONE OR MORE RECEIVER DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
316496-EP-2	European Patent	12/1/2017	17204871.2	EP3333764		TECHNIQUES FOR ASSESSING GROUP LEVEL COGNITIVE STATES	Dolby Intellectual Property Licensing, LLC	Expired
316496-JP-3	Japan	11/22/2017	2017-224121			TECHNIQUES FOR ASSESSING GROUP LEVEL COGNITIVE STATES	Dolby Intellectual Property Licensing, LLC	Expired
316496-CN-4	China	12/6/2017	2.01711E+11	CN108154236		TECHNIQUES FOR ASSESSING GROUP LEVEL COGNITIVE STATES	Dolby Intellectual Property Licensing, LLC	Expired
316496-CA-5	Canada	11/22/2017	2986406			TECHNIQUES FOR ASSESSING GROUP LEVEL COGNITIVE STATES	Dolby Intellectual Property Licensing, LLC	Expired
316767-W-2	Patent Cooperation Treaty	2/6/2018	PCT/US18/16964	WO2018/160324		DRIVE SYSTEM AND METHOD OF OPERATION THEREOF FOR REDUCING DC LINK CURRENT RIPPLE	Dolby Intellectual Property Licensing, LLC	Expired
316772-W-2	Patent Cooperation Treaty	3/16/2018	PCT/US2018/022999	WO2018212828		DUAL MAGNETIC PHASE MATERIAL RINGS FOR AC ELECTRIC MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
317124-EP-2	European Patent	10/2/2017	17194461.4	EP3333762		CROWD ANALYTICS VIA ONE SHOT LEARNING	Dolby Intellectual Property Licensing, LLC	Expired
317124-JP-3	Japan	9/25/2017	2017-183113			CROWD ANALYTICS VIA ONE SHOT LEARNING	Dolby Intellectual Property Licensing, LLC	Expired
317124-CN-4	China	10/9/2017	2.01711E+11	CN108154075		CROWD ANALYTICS VIA ONE SHOT LEARNING	Dolby Intellectual Property Licensing, LLC	Expired
317124-CA-5	Canada	9/28/2017	2980609			CROWD ANALYTICS VIA ONE SHOT LEARNING	Dolby Intellectual Property Licensing, LLC	Expired

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317707-W-3	Patent Cooperation Treaty	8/9/2018	PCT/US2018/045888	W-2019/060055		GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
317707-TW-11	Taiwan	9/6/2018	111103044	TW202235580		GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
318182-W-2	Patent Cooperation Treaty	8/22/2018	PCT/US2018/047432	W-2019/040565		SYSTEM AND METHOD FOR RAPID CURRENT SENSING AND TRANSISTOR TIMING CONTROL	Dolby Intellectual Property Licensing, LLC	Expired
318542-W-1	Patent Cooperation Treaty	8/31/2017	PCT/US2017/049682	W-2019/045737		ENCODING VOLUMETRIC DATA TO SUPPORT TRUSTED TRANSACTION DELIVERY	Dolby Intellectual Property Licensing, LLC	Expired
318543-W-1	Patent Cooperation Treaty	8/31/2017	PCT/US17/049685	W-2019/045738		INTELLECTUAL PROPERTY EXCHANGE ECOSYSTEM FOR ADDITIVE MANUFACTURING	Dolby Intellectual Property Licensing, LLC	Expired
318580-W-1	Patent Cooperation Treaty	8/31/2017	PCT/US2017/049677	W-2019/045735		DISTRIBUTION OF CUSTOMIZED ENGINEERING MODELS FOR ADDITIVE MANUFACTURING	Dolby Intellectual Property Licensing, LLC	Expired
318587-W-1	Patent Cooperation Treaty	8/31/2017	PCT/US17/049695	W-2019/045739		BLOCKCHAIN ENABLED COLLABORATIVE TRANSACTION INFORMATION PROCESSING FOR A SUPPLY CHAIN	Dolby Intellectual Property Licensing, LLC	Expired
318587-KR-5	Korea, Republic of (KR)	8/31/2017	10-2020-7008969			BLOCKCHAIN ENABLED COLLABORATIVE TRANSACTION INFORMATION PROCESSING FOR A SUPPLY CHAIN	Dolby Intellectual Property Licensing, LLC	Expired
318738-US-1	United States of America	3/27/2017	62/477151			Inductive Electric Vehicle Charger	Dolby Intellectual Property Licensing, LLC	Expired
318738-W-3	Patent Cooperation Treaty	3/22/2018	PCT/US18/23782	W-2018/183083		SYSTEM AND METHOD FOR INDUCTIVE CHARGING WITH IMPROVED EFFICIENCY	Dolby Intellectual Property Licensing, LLC	Expired
318763-CN-1	China	1/2/2018	2.0181E+11	CN109995240A		POWER CONVERTER AND POWER CONVERTING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
319318-W-2	Patent Cooperation Treaty	4/19/2018	PCT/US2018/028229	W-2018/217336		A POWER TRANSFER DEVICE AND AN ASSOCIATED METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
319319-W-2	Patent Cooperation Treaty	5/21/2018	PCT/US18/33652	W-2018/222429		TRANSMITTING ASSEMBLY FOR A UNIVERSAL WIRELESS CHARGING DEVICE AND A METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
319335-US-1	United States of America	7/6/2017	62/529,165			ARTICLES FOR HIGH TEMPERATURE SERVICE AND RELATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
319335-W-3	Patent Cooperation Treaty	6/11/2018	PCT/US18/36899	W-2019/009984		ARTICLES FOR HIGH TEMPERATURE SERVICE AND RELATED METHOD	Dolby Intellectual Property Licensing, LLC	Expired
319620-W-2	Patent Cooperation Treaty	8/21/2018	PCT/US18/47167	W-2019/074580		TRUE TIME DELAY BEAM FORMER MODULE AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
319621-W-2	Patent Cooperation Treaty	7/5/2018	PCT/US2018/040914	W-2019/078933		TRUE TIME DELAY BEAM FORMER AND METHOD OF OPERATION	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
319639-W-2	Patent Cooperation Treaty	8/27/2018	PCT/US18/48090	W-2019/078952		HIGH IMPEDANCE RF MEMS TRANSMISSION DEVICES AND METHOD OF MAKING THE SAME	Dolby Intellectual Property Licensing, LLC	Expired
319927-W-2	Patent Cooperation Treaty	9/14/2018	PCT/US2018/050984	W-2019/083636		SYSTEM AND METHOD FOR PREVENTING PERMANENT MAGNET DEMAGNETIZATION IN ELECTRICAL MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
319927-KR-6	Korea, Republic of (KR)	9/14/2018	10-2020-7014544			SYSTEM AND METHOD FOR PREVENTING PERMANENT MAGNET DEMAGNETIZATION IN ELECTRICAL MACHINES	Dolby Intellectual Property Licensing, LLC	Expired
320002-W-2	Patent Cooperation Treaty	11/13/2018	PCT/US18/60589	W-2019/099335		HIERARCHICAL DATA EXCHANGE MANAGEMENT SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
320128-US-1	United States of America	4/24/2017	62/488990			ADAPTIVE LINEAR LINKED PISTON ELECTRIC POWER GENERATOR	Dolby Intellectual Property Licensing, LLC	Expired
320128-W-2	Patent Cooperation Treaty	4/23/2018	PCT/US2018/028828	W-2018200367		ADAPTIVE LINEAR LINKED PISTON ELECTRIC POWER GENERATOR	Dolby Intellectual Property Licensing, LLC	Expired
320128-EP-10	European Patent	4/23/2018	22163067.6	EP4063628		ADAPTIVE LINEAR LINKED PISTON ELECTRIC POWER GENERATOR	Dolby Intellectual Property Licensing, LLC	Expired
320529-W-2	Patent Cooperation Treaty	3/18/2021	PCT/US2021/23009	W-2021/188822		Analogy Engines for Grounding and Situational Awareness	Dolby Intellectual Property Licensing, LLC	Expired
320880-W-2	Patent Cooperation Treaty	3/4/2019	PCT/US2019/020517	W-2019/173197		SYSTEMS AND METHODS FOR WEARABLE VOLTAGE DETECTION DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
322985-W-2	Patent Cooperation Treaty	2/25/2019	PCT/US19/19398	W-2019/177764		INDUSTRIAL DATA VERIFICATION USING SECURE, DISTRIBUTED LEDGER	Dolby Intellectual Property Licensing, LLC	Expired
323537-W-2	Patent Cooperation Treaty	2/20/2019	PCT/US2019/018747	W-2019/164928		SYSTEM AND METHOD FOR ELECTRIC PULSE BASED ACTIVATION OF BIOLOGICAL SAMPLES	Dolby Intellectual Property Licensing, LLC	Expired
323953-W-2	Patent Cooperation Treaty	2/19/2019	PCT/US2019/018455			SYSTEM AND METHOD FOR LOCALIZATION OF DEEP BRAIN STIMULATION ELECTRODE VIA MAGNETIC RESONANCE IMAGING	Dolby Intellectual Property Licensing, LLC	Expired
324595-W-2	Patent Cooperation Treaty	1/15/2020	PCT/US2020/013585	W-2020/154137		SYSTEMS AND METHODS FOR PREDICTING OPTIMAL DEEP BRAIN STIMULATION PARAMETERS	Dolby Intellectual Property Licensing, LLC	Expired
324680-W-2	Patent Cooperation Treaty	9/25/2019	PCT/US2019/052938	W-2020/068969		SYSTEM AND METHOD FOR A MAGNETICALLY COUPLED INDUCTOR BOOST AND MULTIPHASE BUCK CONVERTER WITH SPLIT DUTY CYCLE	Dolby Intellectual Property Licensing, LLC	Expired
324828-US-1	United States of America	11/28/2018	62/772,130			SYSTEM AND METHOD FOR SENSORLESS CONTROL OF ELECTRIC MACHINES AND REDUCTION OF NOISE AND VIBRATION ASSOCIATED THEREWITH	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
324845-W-3	Patent Cooperation Treaty	3/22/2019	PCT/US2019/023548	W-2019/203990		RECEIVER UNIT OF A WIRELESS POWER TRANSFER SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
326309-W-2	Patent Cooperation Treaty	1/14/2020	PCT/US2020/013486	W-2020/154133		BRAIN CONNECTIVITY ATLAS FOR PERSONALIZED FUNCTIONAL NEUROSURGERY TARGETING AND BRAIN STIMULATION PROGRAMMING	Joint ownership - Dolby Intellectual Property Licensing, LLC and University Health Network	Expired
502201-W-2	Patent Cooperation Treaty	4/20/2020	PCT/US2020/028946	W-2020/236374		METHOD TO ENHANCE PHOSPHOR ROBUSTNESS AND DISPERSABILITY AND RESULTING PHOSPHORS	Dolby Intellectual Property Licensing, LLC	Expired
502615-W-2	Patent Cooperation Treaty	1/15/2020	PCT/US2020/013589	W-2020/154138		Automatic optimization of Deep Brain Stimulation parameters using functional MRI	Joint ownership - Dolby Intellectual Property Licensing, LLC and Albany Medical College	Expired
508774-US-1	United States of America	12/9/2019	62/945,830			LIGHT EMITTING DEVICES AND DISPLAYS WITH EXPANDED GAMUT COVERAGE AND LOW BLUE LIGHT EMISSION AND METHODS FOR PRODUCING	Dolby Intellectual Property Licensing, LLC	Expired
508774-W-2	Patent Cooperation Treaty	12/9/2020	PCT/US2020/063925	W-2021/119073		LIGHT EMITTING DEVICES AND DISPLAYS WITH EXPANDED GAMUT COVERAGE AND LOW BLUE LIGHT EMISSION AND METHODS FOR PRODUCING	Dolby Intellectual Property Licensing, LLC	Expired
509591-US-1	United States of America	5/20/2020	63/027,672			INK FORMULATIONS WITH NARROW BAND EMITTING PHOSPHOR MATERIALS	Dolby Intellectual Property Licensing, LLC	Expired
509591-US-2	United States of America	7/31/2020	63/059,709			INK FORMULATIONS WITH NARROW BAND EMITTING PHOSPHOR MATERIALS	Dolby Intellectual Property Licensing, LLC	Expired
509591-W-3	Patent Cooperation Treaty	1/19/2021	PCT/US2021/013963	W-2021/211181		INK FORMULATIONS WITH NARROW BAND EMITTING PHOSPHOR MATERIALS	Dolby Intellectual Property Licensing, LLC	Expired
509730-US-1	United States of America	4/14/2020	63/009,800			GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
509730-US-3	United States of America	9/1/2020	63/073,391			GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
509730-W-4	Patent Cooperation Treaty	4/13/2021	PCT/US2021/027105	W-2021/211600		GREEN-EMITTING PHOSPHORS AND DEVICES THEREOF	Dolby Intellectual Property Licensing, LLC	Expired
509746-W-2	Patent Cooperation Treaty	7/16/2021	PCT/US2021/042085	W-2022/020213		POWER CONTROLLER IN A WIRELESS POWER RECEPTION APPARATUS	Dolby Intellectual Property Licensing, LLC	Expired
602226-W-2	Patent Cooperation Treaty	12/8/2021	PCT/US2021/062377	W-2022/125644		PULSE WIDTH COMMUNICATION IN A WIRELESS POWER SYSTEM	Dolby Intellectual Property Licensing, LLC	Expired
602751-US-1	United States of America	9/1/2020	63/073,386			DEVICES COMPATIBLE WITH NIGHT VISION EQUIPMENT	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
602751-W-2	Patent Cooperation Treaty	8/31/2021	PCT/US2021/048535	W-2022/051302		DEVICES COMPATIBLE WITH NIGHT VISION EQUIPMENT	Dolby Intellectual Property Licensing, LLC	Expired
605665-US-1	United States of America	10/8/2021	63/254,021			URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
605665-W-2	Patent Cooperation Treaty	4/13/2022	PCT/US2022/024577	W-2022/221385		URANIUM-BASED PHOSPHORS AND COMPOSITIONS FOR DISPLAYS AND LIGHTING APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
607693-US-1	United States of America	5/5/2022	63/338,868			PRINTING, FILMS AND SUBSTRATES	Dolby Intellectual Property Licensing, LLC	Expired
RD27644-US-1	United States of America	11/1/1999	60/162901			ACTIVE VIRTUAL NETWORK MANAGEMENT PREDICTION	Dolby Intellectual Property Licensing, LLC	Expired
RD28356-EP-2	European Patent	2/26/2007	7751816.5	EP1999230	6/13/2012	RED EMITTING PHOSPHOR MATERIALS FOR USE IN LED AND LCD APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
RD28356-W-7	Patent Cooperation Treaty	2/26/2007	PCT/US2007/005083			RED LINE EMITTING PHOSPHORS FOR USE IN LED APPLICATIONS	Dolby Intellectual Property Licensing, LLC	Expired
604111-US-1	United States of America	3/31/2022	63/325,736			SAFETY AND SECURITY OF CYBER-PHYSICAL SYSTEMS CONNECTED	Dolby Intellectual Property Licensing, LLC	Expired
604111-US-2	United States of America	3/24/2022	63/323,241			SAFETY AND SECURITY OF CYBER-PHYSICAL SYSTEMS CONNECTED THROUGH IOT NETWORK	Dolby Intellectual Property Licensing, LLC	Expired
508927-W-2	Patent Cooperation Treaty	9/20/2022	PCT/US2022/076711	W-2023/044499		Systems and Methods for Node Selection and Ranking in Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Expired
606915-US-1	United States of America	5/23/2022	63/344,711			Distributed Anomaly Detection and Localization for Cyber-Physical Systems	Dolby Intellectual Property Licensing, LLC	Expired
607309-US-1	United States of America	9/9/2022	63/375,205			System and Method for Power Grid Sensing	Dolby Intellectual Property Licensing, LLC	Expired
607309-US-3	United States of America	6/2/2023	63/506,031			System and Method for Power Grid Sensing	Dolby Intellectual Property Licensing, LLC	Expired
607309-US-4	United States of America	6/15/2023	63/508,357			System and Method for Power Grid Sensing	Dolby Intellectual Property Licensing, LLC	Expired
602905-W-2	Patent Cooperation Treaty	8/19/2022	PCT/US2022/075196	W-2023/023637		Systems and Methods for Cyber-Fault Detection	Dolby Intellectual Property Licensing, LLC	Expired
602922-W-2	Patent Cooperation Treaty	8/19/2022	PCT/US2022/75198	W-2023023639		Systems and Methods for Self-Adapting Neutralization Against Cyber-Faults	Dolby Intellectual Property Licensing, LLC	Expired
246663-AU-2	Australia	6/25/2012	2012203684			ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
246663-BR-3	Brazil	6/26/2012	BR1020120157942			ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired
246663-CA-4	Canada	6/21/2012	2780604			ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired
246663-DE-5	Germany (Federal Republic of)	6/21/2012	1.02012E+11	DE10201210541		ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired
246663-GB-6	United Kingdom	6/21/2012	1210969	GB2492456		ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired
246663-JP-7	Japan	6/25/2012	2012-141562	JP2013013075		ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired
246663-NZ-8	New Zealand	6/25/2012	600876	NZ600876	5/1/2014	ELECTRICAL SUBSTATION FAULT MONITORING AND DIAGNOSTICS	Dolby Intellectual Property Licensing, LLC	Expired
246941-US-1	United States of America	8/17/2010	61/374431			COMPACT LED LIGHT ENGINE WITH REFLECTOR CUPS AND HIGHLY DIRECTIONAL LAMPS USING SAME	Dolby Intellectual Property Licensing, LLC	Expired
246941-WO-3	Patent Cooperation Treaty	6/7/2011	US11/39392	WO12/24011		COMPACT LED LIGHT ENGINE WITH REFLECTOR CUPS AND HIGHLY DIRECTIONAL LAMPS USING SAME	Dolby Intellectual Property Licensing, LLC	Expired
307094-GB-1	United Kingdom	11/19/2009	920237.5	GB2475495	10/12/2011	FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
307094-FR-2	France	11/15/2010	10014618.2	FR2325934	7/10/2013	FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
307094-DE-3	Germany (Federal Republic of)	11/15/2010	10014618.2	DE602010008331.4	7/10/2013	FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
307094-IT-4	Italy	11/15/2010	10014618.2	IT2013902195315	7/10/2013	FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
307094-CH-5	Switzerland	11/15/2010	10014618.2	CH2325934	7/10/2013	FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
307094-EP-6	European Patent	11/15/2010	10014618.2	EP2325934	7/10/2013	FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
307094-US-8	United States of America	5/29/2015	14/725467	US20150263365		FUEL CELL SYSTEM AND OPERATING METHOD	Dolby Intellectual Property Licensing, LLC	Expired
315132-US-1	United States of America	10/8/2007	60/978364			SYSTEM AND METHODS FOR AUTOMATED GRAMMAR BASED FAULT DISCOVERY AND ISOLATION	Dolby Intellectual Property Licensing, LLC	Expired
315132-US-2	United States of America	7/1/2008	61/077458			AUTOMATIC GRAMMAR BASED FAULT DETECTION AND ISOLATION	Dolby Intellectual Property Licensing, LLC	Expired
315132-WO-4	Patent Cooperation Treaty	10/8/2008	PCT/CA2008/001785	WO2009046525		AUTOMATIC GRAMMAR BASED FAULT DETECTION AND ISOLATION	Dolby Intellectual Property Licensing, LLC	Expired
315166-US-1	United States of America	2/27/2008	61/032043			SYSTEM AND METHODS FOR AUTOMATED GRAMMAR BASED TEST PLANNING	Dolby Intellectual Property Licensing, LLC	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
315166-W-3	Patent Cooperation Treaty	2/27/2009	PCT/CA2009/000232	W-2009105883		SYSTEM AND METHOD FOR GRAMMAR BASED TEST PLANNING	Dolby Intellectual Property Licensing, LLC	Expired
315170-US-1	United States of America	2/27/2008	61/032046			TEST BENCH FOR CONTROL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315170-US-2	United States of America	7/1/2008	61/077459			TEST BENCH FOR CONTROL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315170-W-6	Patent Cooperation Treaty	2/27/2009	PCT/CA2009/000239	W-2009105889		TESTING FRAMEWORK FOR CONTROL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315170-EP-7	European Patent	2/27/2009	9715372	EP2260385		TESTING FRAMEWORK FOR CONTROL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315170-IN-8	India	2/27/2009	5424/CHENP/2010	IN50/2010		TESTING FRAMEWORK FOR CONTROL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315170-US-9	United States of America	7/22/2016	15/217,832	US10592369	3/17/2020	TEST BENCH FOR CONTROL DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
610770-KR-1	Korea, Republic of (KR)	8/18/2014	10-2014-0106769	KR10-2016-0021491		Light emitting diode package	Dolby Intellectual Property Licensing, LLC	Expired
610772-W-5	Patent Cooperation Treaty	1/13/2012	PCT/KR2012/000314	W-2012/102501		Wafer level LED package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Expired
610772-EP-7	European Patent	1/13/2012	12739572.1	EP2669963	8/22/2018	Wafer level LED package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Expired
610772-JP-8	Japan	1/13/2012	2013-551891			Wafer level LED package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Expired
610772-EP-9	European Patent	1/13/2012	14150304.5	EP2720283	5/16/2018	Wafer level LED package and method of fabricating the same	Dolby Intellectual Property Licensing, LLC	Expired
610773-KR-7	Korea, Republic of (KR)	1/14/2010	10-2010-0003396	KR10-1623950	5/24/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Expired
610773-KR-8	Korea, Republic of (KR)	1/15/2010	10-2010-0003964	KR10-1625127	5/27/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Expired
610773-KR-9	Korea, Republic of (KR)	1/15/2010	10-2010-0003396	KR10-1625130	5/27/2016	Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Expired
610773-W-20	Patent Cooperation Treaty	12/16/2010	PCT/KR2010/009008	W-2011/083923		Light emitting diode having electrode pads	Dolby Intellectual Property Licensing, LLC	Expired
149581-US-1	United States of America	4/26/2004	10/831862	US7224000	5/29/2007	LIGHT EMITTING DIODE COMPONENT	Joint ownership - Dolby Intellectual Property Licensing, LLC with Current	Expired
149581-US-2	United States of America	12/20/2005	11/312268	US7800121	9/21/2010	LIGHT EMITTING DIODE COMPONENT	Joint ownership - Dolby Intellectual Property Licensing, LLC with Current	Expired

Patent / Application Reference	Publication Country	File date	Application Number	Patent/ Publication Number	Publication Date	Title	Current Assignee	Status
202972-US-1	United States of America	2/28/2006	11/364611	US7497973	3/3/2009	RED LINE EMITTING PHOSPHOR MATERIALS FOR USE IN LED APPLICATIONS	Joint ownership - Dolby Intellectual Property Licensing, LLC with Current	Expired
315172-US-1	United States of America	8/4/2011	13/198663	US9026394	5/5/2015	TESTING AND MITIGATION FRAMEWORK FOR NETWORKED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315172-US-2	United States of America	3/16/2012	13/423004	US9280434 B2	3/8/2016	TESTING AND MITIGATION FRAMEWORK FOR NETWORKED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315172-US-3	United States of America	3/7/2016	15/063174	US20160188433A1		TESTING AND MITIGATION FRAMEWORK FOR NETWORKED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315172-WO-4	Patent Cooperation Treaty	8/3/2012	PCT/CA2012/000740	WO2013016814		TESTING AND MITIGATION FRAMEWORK FOR NETWORKED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315172-EP-5	European Patent	8/3/2012	12819724.1	EP2740036	3/15/2017	TESTING AND MITIGATION FRAMEWORK FOR NETWORKED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
315172-IN-6	India	8/3/2012	1329/CHENP/2014			TESTING AND MITIGATION FRAMEWORK FOR NETWORKED DEVICES	Dolby Intellectual Property Licensing, LLC	Expired
607692-US-1	United States of America	5/4/2022	63/338,428			Phosphors, Ink Formulations and Films PHOSPHORS, INK FORMULATIONS AND FILMS	Dolby Intellectual Property Licensing, LLC	Expired
GE24357DE01	DE	EP1830783	9/24/2003	EP2711233	11/6/2024	POWER SUPPLY MANAGEMENT APPARATUS AND METHOD THEREOF	Dolby Intellectual Property Licensing, LLC	Active
GE24817TW02	TW					DISPLAYS WITH EXPANDED GAMUT COVERAGE AND LOW BLUE LIGHT EMISSION	Dolby Intellectual Property Licensing, LLC	NOT Yet Filed
GE24883TW01	TW					Remote Phosphor films in reflective geometry	Dolby Intellectual Property Licensing, LLC	NOT Yet Filed
GE24883W001	PCT					Remote Phosphor films in reflective geometry	Dolby Intellectual Property Licensing, LLC	NOT Yet Filed



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ISSUE NOTIFICATION

The projected patent number and issue date are specified above.

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b) (application filed on or after May 29, 2000)

The Patent Term Adjustment is 0 day(s). Any patent to issue from the above-identified application will include an indication of the adjustment on the front page.

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (<http://pair.uspto.gov>).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Application Assistance Unit (AAU) of the Office of Data Management (ODM) at (571)-272-4200.

APPLICANT(s) (Please see PAIR WEB site <http://pair.uspto.gov> for additional applicants):

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Zhihao Li, Rexford, NY;

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**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**
(Not for submission under 37 CFR 1.99)

Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

Change(s) applied
to document,
/M.G./
12/9/2019

10	20100222953	A1	2010-09-02	Tang	
11	20110101915	A1	2011-05-05	Mitsutani	
12	20120103749	A1	2012 2015-05-03	Kimura et al.	
13	20130030630	A1	2013-01-31	Luke et al.	
14	20130038127	A1	2013-02-14	King	
15	20130138279	A1	2013-05-30	Shi	
16	20140077737	A1	2014-03-20	Zhang et al.	
17	20060250902	A	2006-11-29	Bender	
18	20070007939	A1	2007-01-11	Miller	
19	20130311023	A1	2013-11-21	Nozaki	
If you wish to add additional U.S. Published Application citation information please click the Add button. Add					
FOREIGN PATENT DOCUMENTS Remove					

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), by mail or fax, or via EFS-Web.

By mail, send to: **Mail Stop ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450

By fax, send to: **(571)-273-2885**

INSTRUCTIONS: This form should be used for transmitting the **ISSUE FEE** and **PUBLICATION FEE** (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

131278 7590 10/03/2019
Meagher Emanuel Laks Goldberg & Liao, LLP
One Palmer Square
Suite 325
Princeton, NJ 08542

Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission

I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being transmitted to the USPTO via EFS-Web or by facsimile to (571) 273-2885, on the date below.

EFS WEB _____ _____ _____	(Typed or printed name) _____ (Signature) _____ (Date) _____
------------------------------------	---

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
16/555,487	08/29/2019	Robert Dean King	273252-US-13	4785

TITLE OF INVENTION: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	UNDISCOUNTED	\$1000	\$0.00	\$0.00	\$1000	01/03/2020

EXAMINER	ART UNIT	CLASS-SUBCLASS
GLASS, ERICK DAVID	2837	318-139000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).

- ☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
- ☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-09 or more recent) attached. **Use of a Customer Number is required.**

2. For printing on the patent front page, list

- (1) The names of up to 3 registered patent attorneys or agents OR, alternatively,
- (2) The name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.

1 Meagher Emanuel Laks
 2 Goldberg & Liao, LLP
 3 _____

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document must have been previously recorded, or filed for recordation, as set forth in 37 CFR 3.11 and 37 CFR 3.81(a). Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE

(B) RESIDENCE: (CITY and STATE OR COUNTRY)

GENERAL ELECTRIC COMPANY

SCHENECTADY, NEW YORK

Please check the appropriate assignee category or categories (will not be printed on the patent): ☐ Individual ☒ Corporation or other private group entity ☐ Government

4a. Fees submitted: ☒ Issue Fee ☐ Publication Fee (if required) ☐ Advance Order - # of Copies _____

4b. Method of Payment: (Please first reapply any previously paid fee shown above)

☒ Electronic Payment via EFS-Web ☐ Enclosed check ☐ Non-electronic payment by credit card (Attach form PTO-2038)

☒ The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment to Deposit Account No. 505522

5. Change in Entity Status (from status indicated above)

- ☐ Applicant certifying micro entity status. See 37 CFR 1.29
- ☐ Applicant asserting small entity status. See 37 CFR 1.27
- ☐ Applicant changing to regular undiscounted fee status.

NOTE: Absent a valid certification of Micro Entity Status (see forms PTO/SB/15A and 15B), issue fee payment in the micro entity amount will not be accepted at the risk of application abandonment.

NOTE: If the application was previously under micro entity status, checking this box will be taken to be a notification of loss of entitlement to micro entity status.

NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: This form must be signed in accordance with 37 CFR 1.31 and 1.33. See 37 CFR 1.4 for signature requirements and certifications.

Authorized Signature /Craig M. Drachtman/

Date 2019-12-23

Typed or printed name CRAIG M. DRACHTMAN

Registration No. 73016

Electronic Patent Application Fee Transmittal

Application Number:	16555487			
Filing Date:	29-Aug-2019			
Title of Invention:	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME			
First Named Inventor/Applicant Name:	Robert Dean King			
Filer:	Craig Michael Drachtman/Silvia Mannes			
Attorney Docket Number:	273252-US-13			
Filed as Large Entity				
Filing Fees for Utility under 35 USC 111(a)				
Description	Fee Code	Quantity	Amount	Sub-Total in USD(\$)
Basic Filing:				
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				
Post-Allowance-and-Post-Issuance:				
UTILITY APPL ISSUE FEE	1501	1	1000	1000

Description	Fee Code	Quantity	Amount	Sub-Total in USD(\$)
Extension-of-Time:				
Miscellaneous:				
Total in USD (\$)				1000

Electronic Acknowledgement Receipt	
EFS ID:	38132079
Application Number:	16555487
International Application Number:	
Confirmation Number:	4785
Title of Invention:	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME
First Named Inventor/Applicant Name:	Robert Dean King
Customer Number:	131278
Filer:	Craig Michael Drachtman/Silvia Mannes
Filer Authorized By:	Craig Michael Drachtman
Attorney Docket Number:	273252-US-13
Receipt Date:	24-DEC-2019
Filing Date:	29-AUG-2019
Time Stamp:	10:20:03
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	CARD
Payment was successfully received in RAM	\$1000
RAM confirmation Number	E2019BNA20385681
Deposit Account	505522
Authorized User	Silvia Mannes
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: 37 CFR 1.21 (Miscellaneous fees and charges)	

File Listing:					
Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Issue Fee Payment (PTO-85B)	273252-US-13-IssueFee-24DEC19.pdf	1603322	no	1
			9ea7cfc81c09a57dc9614da71ac9017a340a5295		
Warnings:					
Information:					
2	Fee Worksheet (SB06)	fee-info.pdf	30770	no	2
			0aa3471f7d37b36f0b79e4444e1574c4892184e6		
Warnings:					
Information:					
Total Files Size (in bytes):			1634092		
This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503. <u>New Applications Under 35 U.S.C. 111</u> If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application. <u>National Stage of an International Application under 35 U.S.C. 371</u> If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course. <u>New International Application Filed with the USPTO as a Receiving Office</u> If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.					



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UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
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P.O. Box 1450
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www.uspto.gov

APPLICATION NUMBER	FILING OR 371(C) DATE	FIRST NAMED APPLICANT	ATTY. DOCKET NO./TITLE
16/555,487	08/29/2019	Robert Dean King	273252-US-13

CONFIRMATION NO. 4785

PUBLICATION NOTICE



0000000113455369

131278
Meagher Emanuel Laks Goldberg & Liao, LLP
One Palmer Square
Suite 325
Princeton, NJ 08542

Title:VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME

Publication No.US-2019-0381897-A1

Publication Date:12/19/2019

NOTICE OF PUBLICATION OF APPLICATION

The above-identified application will be electronically published as a patent application publication pursuant to 37 CFR 1.211, et seq. The patent application publication number and publication date are set forth above.

The publication may be accessed through the USPTO's publicly available Searchable Databases via the Internet at www.uspto.gov. The direct link to access the publication is currently <http://www.uspto.gov/patft/>.

The publication process established by the Office does not provide for mailing a copy of the publication to applicant. A copy of the publication may be obtained from the Office upon payment of the appropriate fee set forth in 37 CFR 1.19(a)(1). Orders for copies of patent application publications are handled by the USPTO's Public Records Division. The Public Records Division can be reached by telephone at (571) 272-3150 or (800) 972-6382, by facsimile at (571) 273-3250, by mail addressed to the United States Patent and Trademark Office, Public Records Division, Alexandria, VA 22313-1450 or via the Internet.

In addition, information on the status of the application, including the mailing date of Office actions and the dates of receipt of correspondence filed in the Office, may also be accessed via the Internet through the Patent Electronic Business Center at www.uspto.gov using the public side of the Patent Application Information and Retrieval (PAIR) system. The direct link to access this status information is currently <https://portal.uspto.gov/pair/PublicPair>. Prior to publication, such status information is confidential and may only be obtained by applicant using the private side of PAIR.

Further assistance in electronically accessing the publication, or about PAIR, is available by calling the Patent Electronic Business Center at 1-866-217-9197.

Office of Data Management, Application Assistance Unit (571) 272-4000, or (571) 272-4200, or 1-888-786-0101



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United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
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Alexandria, Virginia 22313-1450
www.uspto.gov

NOTICE OF ALLOWANCE AND FEE(S) DUE

131278 7590 10/03/2019
Meagher Emanuel Laks Goldberg & Liao, LLP
One Palmer Square
Suite 325
Princeton, NJ 08542

EXAMINER

GLASS, ERICK DAVID

ART UNIT

PAPER NUMBER

2837

DATE MAILED: 10/03/2019

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
16/555,487	08/29/2019	Robert Dean King	273252-US-13	4785

TITLE OF INVENTION: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME

APPLN. TYPE	ENTITY STATUS	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	UNDISCOUNTED	\$1000	\$0.00	\$0.00	\$1000	01/03/2020

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the ENTITY STATUS shown above. If the ENTITY STATUS is shown as SMALL or MICRO, verify whether entitlement to that entity status still applies.

If the ENTITY STATUS is the same as shown above, pay the TOTAL FEE(S) DUE shown above.

If the ENTITY STATUS is changed from that shown above, on PART B - FEE(S) TRANSMITTAL, complete section number 5 titled "Change in Entity Status (from status indicated above)".

For purposes of this notice, small entity fees are 1/2 the amount of undiscounted fees, and micro entity fees are 1/2 the amount of small entity fees.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Maintenance fees are due in utility patents issuing on applications filed on or after Dec. 12, 1980. It is patentee's responsibility to ensure timely payment of maintenance fees when due. More information is available at www.uspto.gov/PatentMaintenanceFees.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), by mail or fax, or via EFS-Web.

By mail, send to: Mail Stop ISSUE FEE
 Commissioner for Patents
 P.O. Box 1450
 Alexandria, Virginia 22313-1450

By fax, send to: (571)-273-2885

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CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

131278 7590 10/03/2019
 Meagher Emanuel Laks Goldberg & Liao, LLP
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 Suite 325
 Princeton, NJ 08542

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(Typed or printed name)
(Signature)
(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
16/555,487	08/29/2019	Robert Dean King	273252-US-13	4785

TITLE OF INVENTION: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME

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nonprovisional	UNDISCOUNTED	\$1000	\$0.00	\$0.00	\$1000	01/03/2020

EXAMINER	ART UNIT	CLASS-SUBCLASS
GLASS, ERICK DAVID	2837	318-139000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).

☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.

☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-09 or more recent) attached. Use of a Customer Number is required.

2. For printing on the patent front page, list

(1) The names of up to 3 registered patent attorneys or agents OR, alternatively,

1 _____

(2) The name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed.

2 _____

3 _____

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document must have been previously recorded, or filed for recordation, as set forth in 37 CFR 3.11 and 37 CFR 3.81(a). Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE

(B) RESIDENCE: (CITY and STATE OR COUNTRY)

Please check the appropriate assignee category or categories (will not be printed on the patent): ☐ Individual ☐ Corporation or other private group entity ☐ Government

4a. Fees submitted: ☐ Issue Fee ☐ Publication Fee (if required) ☐ Advance Order - # of Copies _____

4b. Method of Payment: (Please first reapply any previously paid fee shown above)

☐ Electronic Payment via EFS-Web ☐ Enclosed check ☐ Non-electronic payment by credit card (Attach form PTO-2038)

☐ The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment to Deposit Account No. _____

5. Change in Entity Status (from status indicated above)

☐ Applicant certifying micro entity status. See 37 CFR 1.29

☐ Applicant asserting small entity status. See 37 CFR 1.27

☐ Applicant changing to regular undiscounted fee status.

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NOTE: Checking this box will be taken to be a notification of loss of entitlement to small or micro entity status, as applicable.

NOTE: This form must be signed in accordance with 37 CFR 1.31 and 1.33. See 37 CFR 1.4 for signature requirements and certifications.

Authorized Signature _____

Date _____

Typed or printed name _____

Registration No. _____



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P. O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
16/555,487	08/29/2019	Robert Dean King	273252-US-13	4785
131278	7590	10/03/2019	EXAMINER	
Meagher Emanuel Laks Goldberg & Liao, LLP One Palmer Square Suite 325 Princeton, NJ 08542			GLASS, ERICK DAVID	
			ART UNIT	PAPER NUMBER
			2837	

DATE MAILED: 10/03/2019

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b) (Applications filed on or after May 29, 2000)

The Office has discontinued providing a Patent Term Adjustment (PTA) calculation with the Notice of Allowance.

Section 1(h)(2) of the AIA Technical Corrections Act amended 35 U.S.C. 154(b)(3)(B)(i) to eliminate the requirement that the Office provide a patent term adjustment determination with the notice of allowance. See Revisions to Patent Term Adjustment, 78 Fed. Reg. 19416, 19417 (Apr. 1, 2013). Therefore, the Office is no longer providing an initial patent term adjustment determination with the notice of allowance. The Office will continue to provide a patent term adjustment determination with the Issue Notification Letter that is mailed to applicant approximately three weeks prior to the issue date of the patent, and will include the patent term adjustment on the patent. Any request for reconsideration of the patent term adjustment determination (or reinstatement of patent term adjustment) should follow the process outlined in 37 CFR 1.705.

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

OMB Clearance and PRA Burden Statement for PTOL-85 Part B

The Paperwork Reduction Act (PRA) of 1995 requires Federal agencies to obtain Office of Management and Budget approval before requesting most types of information from the public. When OMB approves an agency request to collect information from the public, OMB (i) provides a valid OMB Control Number and expiration date for the agency to display on the instrument that will be used to collect the information and (ii) requires the agency to inform the public about the OMB Control Number's legal significance in accordance with 5 CFR 1320.5(b).

The information collected by PTOL-85 Part B is required by 37 CFR 1.311. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 30 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, Virginia 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450. Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b) (2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether disclosure of these records is required by the Freedom of Information Act.
2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.
3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.
4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).
5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.
6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).
7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspection or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

Notice of Allowability**Application No.**

16/555,487

Applicant(s)

King et al.

Examiner

ERICK D GLASS

Art Unit

2837

AIA (FITF) Status

Yes

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☐ This communication is responsive to _____.
☐ A declaration(s)/affidavit(s) under **37 CFR 1.130(b)** was/were filed on _____.
2. ☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on _____; the restriction requirement and election have been incorporated into this action.
3. ☒ The allowed claim(s) is/are 1-20. As a result of the allowed claim(s), you may be eligible to benefit from the **Patent Prosecution Highway** program at a participating intellectual property office for the corresponding application. For more information, please see http://www.uspto.gov/patents/init_events/pph/index.jsp or send an inquiry to PPHfeedback@uspto.gov.
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

Certified copies:

- a) ☐ All b) ☐ Some *c) ☐ None of the:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).**
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- | | |
|---|--|
| 1. ☐ Notice of References Cited (PTO-892) | 5. ☐ Examiner's Amendment/Comment |
| 2. ☒ Information Disclosure Statements (PTO/SB/08),
Paper No./Mail Date <u>8/29/19</u> . | 6. ☒ Examiner's Statement of Reasons for Allowance |
| 3. ☐ Examiner's Comment Regarding Requirement for Deposit
of Biological Material _____. | 7. ☐ Other _____. |
| 4. ☐ Interview Summary (PTO-413),
Paper No./Mail Date. _____. | |

/ERICK D GLASS/

Primary Examiner, Art Unit 2837

Notice of Pre-AIA or AIA Status

1. The present application, filed on or after March 16, 2013, is being examined under the first inventor to file provisions of the AIA.

Allowable Subject Matter

2. The following is an examiner's statement of reasons for allowance:

With respect to claim 1, the Prior Art does not teach an energystorage system;

a first traction motor coupled to the energystorage system; a second traction motor coupled to the energystorage system;

a transmission device coupled to the first traction motor, the transmission device comprising an arrangement of planetary gears;

a gear assembly coupled between the second traction motor and the transmission device such that the output of the second traction motor bypasses the transmission device; an internal combustion engine coupled to the transmission device via a path that does not include the first traction motor and second traction motor; and

a control system configured to selectively: operate the first traction motor and second traction motor to drive the vehicle through the transmission device and gear assembly, respectively;

operate the first traction motor as a generator to generate electrical power while operating the second traction motor to drive the vehicle through the gear assembly; and operate the second traction motor as a generator to generate electrical power.

With respect to claim 9, the Prior Art does not teach a first traction drive system coupled to the energy storage system, the first traction drive system comprising a first inverter coupled to a first AC motor;

a second traction drive system coupled to the energy storage system, the second traction drive system comprising a second inverter coupled to a second AC motor;

a transmission device coupled to the first traction drive system, the transmission device comprising an arrangement of planetary gears;

a gear assembly coupled between the second traction drive system and the transmission device such that the output of the second traction motor bypasses the transmission device; an internal combustion engine coupled to the transmission device via a path that does not include the first AC motor and second AC motor; and

a control system configured to selectively: operate the first traction drive system and second traction drive system to drive the vehicle through the transmission device and gear assembly, respectively;

operate the first traction drive system to generate electric power while operating the second traction drive system to drive the vehicle through the gear assembly; and operate the second traction drive system to generate electric power.

With respect to claim 16, the Prior Art does not teach an energy storage system;

a first electric motor coupled to the energy storage system; a second electric motor coupled to the energy storage system;

a transmission device coupled to the first electric motor, the transmission device comprising an arrangement of planetary gears;

a gear assembly coupled between the second electric motor and the transmission device such that the output of the second electric motor bypasses the transmission device; an internal combustion engine coupled to the transmission device; and

a control system configured to selectively: operate the first electric motor and second electric motor to drive the vehicle through the transmission device and gear assembly, respectively;

operate the first electric motor as a generator to generate electrical power while operating the second electric motor to drive the vehicle through the gear assembly; and operate the second electric motor as a generator to generate electrical power.

Claims 1-20 are allowable.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to ERICK DAVID GLASS whose telephone number is (571)272-8395. The examiner can normally be reached on Mon-Fri_8-5pm.

Examiner interviews are available via telephone, in-person, and video conferencing using a USPTO supplied web-based collaboration tool. To schedule an interview, applicant is encouraged to use the USPTO Automated Interview Request (AIR) at <http://www.uspto.gov/interviewpractice>.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eduardo Colon-Santana can be reached on 571-272-2060. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer

Application/Control Number: 16/555,487
Art Unit: 2837

Page 5

Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/ERICK D GLASS/
Primary Examiner, Art Unit 2837

Issue Classification 	Application/Control No. 16/555,487	Applicant(s)/Patent Under Reexamination King et al.
	Examiner ERICK D GLASS	Art Unit 2837

CPC						
Symbol					Type	Version
B60L	/	50	/	10	F	2019-02-01
B60L	/	15	/	2045	I	2013-01-01
B60L	/	7	/	14	I	2013-01-01
B60L	/	15	/	007	I	2013-01-01
Y02T	/	10	/	70	A	2013-01-01
Y02T	/	10	/	645	A	2013-01-01
Y02T	/	10	/	7283	A	2013-01-01
Y02T	/	10	/	7061	A	2013-01-01
Y02T	/	10	/	7066	A	2013-01-01
Y02T	/	10	/	7225	A	2013-01-01
Y02T	/	10	/	7233	A	2013-01-01
Y02T	/	10	/	7022	A	2013-01-01
Y02T	/	10	/	7241	A	2013-01-01
Y02T	/	10	/	7005	A	2013-01-01
Y02T	/	10	/	7077	A	2013-01-01
B60L	/	2210	/	40	A	2013-01-01
B60L	/	2210	/	14	A	2013-01-01
B60L	/	2210	/	12	A	2013-01-01
Y10T	/	29	/	49117	A	2015-01-15

CPC Combination Sets					
Symbol	Type	Set	Ranking	Version	
/					

NONE		Total Claims Allowed:	
(Assistant Examiner)	(Date)	20	
/ERICK D GLASS/ Primary Examiner, Art Unit 2837	24 September 2019	O.G. Print Claim(s)	O.G. Print Figure
(Primary Examiner)	(Date)	1	1

Issue Classification 	Application/Control No. 16/555,487	Applicant(s)/Patent Under Reexamination King et al.	
	Examiner ERICK D GLASS	Art Unit 2837	

INTERNATIONAL CLASSIFICATION			
CLAIMED			
H02P	/	1	00
H02P	/	3	00
H02P	/	5	00
NON-CLAIMED			
	/		

US ORIGINAL CLASSIFICATION	
CLASS	SUBCLASS
318	139

CROSS REFERENCES(S)						
CLASS	SUBCLASS (ONE SUBCLASS PER BLOCK)					

NONE		Total Claims Allowed:	
(Assistant Examiner)	(Date)	20	
/ERICK D GLASS/ Primary Examiner, Art Unit 2837	24 September 2019	O.G. Print Claim(s)	O.G. Print Figure
(Primary Examiner)	(Date)	1	1

Issue Classification 	Application/Control No. 16/555,487	Applicant(s)/Patent Under Reexamination King et al.
	Examiner ERICK D GLASS	Art Unit 2837

☒ Claims renumbered in the same order as presented by applicant ☐ CPA ☐ T.D. ☐ R.1.47															
CLAIMS															
Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original	Final	Original

NONE		Total Claims Allowed:	
(Assistant Examiner)	(Date)	20	
/ERICK D GLASS/	24 September 2019	O.G. Print Claim(s)	O.G. Print Figure
Primary Examiner, Art Unit 2837	(Date)	1	1
(Primary Examiner)			

Search Notes 	Application/Control No. 16/555,487	Applicant(s)/Patent Under Reexamination King et al.
	Examiner ERICK D GLASS	Art Unit 2837

CPC - Searched*		
Symbol	Date	Examiner
B60L50/10, B60L7/14	09/24/2019	EG

CPC Combination Sets - Searched*		
Symbol	Date	Examiner

US Classification - Searched*			
Class	Subclass	Date	Examiner
318	139	09/24/2019	EG

* See search history printout included with this form or the SEARCH NOTES box below to determine the scope of the search.

Search Notes		
Search Notes	Date	Examiner
searched inventor, ids, and please see attached search sheet	09/24/2019	EG

Interference Search			
US Class/CPC Symbol	US Subclass/CPC Group	Date	Examiner
B60L	50/10	09/24/2019	EG

/ERICK D GLASS/ Primary Examiner, Art Unit 2837	
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BIB DATA SHEET

CONFIRMATION NO. 4785

SERIAL NUMBER	FILING or 371(c) DATE	CLASS	GROUP ART UNIT	ATTORNEY DOCKET NO.		
16/555,487	08/29/2019	318	2837	273252-US-13		
APPLICANTS General Electric Company, Schenectady, NY; INVENTORS Robert Dean King, Schenectady, NY; Zhihao Li, Rexford, NY; ** CONTINUING DATA ***** This application is a CON of 15/799,045 10/31/2017 which is a CON of 14/168,224 01/30/2014 PAT 9834098 ** FOREIGN APPLICATIONS ***** ** IF REQUIRED, FOREIGN FILING LICENSE GRANTED ** 09/10/2019						
Foreign Priority claimed ☐ Yes ☒ No 35 USC 119(a-d) conditions met ☐ Yes ☒ No Verified and /ERICK DAVID Acknowledged GLASS/ Examiner's Signature		☐ Met after Allowance EG Initials	STATE OR COUNTRY NY	SHEETS DRAWINGS 7	TOTAL CLAIMS 20	INDEPENDENT CLAIMS 3
ADDRESS Meagher Emanuel Laks Goldberg & Liao, LLP One Palmer Square Suite 325 Princeton, NJ 08542 UNITED STATES						
TITLE VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME						
FILING FEE RECEIVED 1720	FEES: Authority has been given in Paper No. _____ to charge/credit DEPOSIT ACCOUNT No. _____ for following:			☐ All Fees ☐ 1.16 Fees (Filing) ☐ 1.17 Fees (Processing Ext. of time) ☐ 1.18 Fees (Issue) ☐ Other _____ ☐ Credit		

EAST Search History

EAST Search History (Prior Art)

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
S1	49472	((("GENERAL") near3 ("ELECTRIC") near3 ("COMPANY"))).AS,AANM.	USPAT	OR	OFF	2019/09/24 09:27
S2	251	((("King") near3 ("Robert") near3 ("Dean"))).INV.	US-PGPUB; USPAT; USOCR	OR	OFF	2019/09/24 09:43
S3	14	((("Li") near3 ("Zhihao"))).INV.	US-PGPUB; USPAT; USOCR	OR	OFF	2019/09/24 09:44
S4	2346	318/139.ccls.	US-PGPUB; USPAT	OR	ON	2019/09/24 11:35
S5	653	B60L50/10.cpc.	US-PGPUB; USPAT	OR	ON	2019/09/24 11:44
S6	2234	B60L7/14.cpc.	US-PGPUB; USPAT	OR	ON	2019/09/24 11:44
S7	473975	EV HEV ((hybrid electric\$4) near4 (car vehicle automobile))	US-PGPUB; USPAT	OR	ON	2019/09/24 12:59
S8	183302	(S5 second dual twin) near3 motor	US-PGPUB; USPAT	OR	ON	2019/09/24 12:59
S9	50430	bypass\$4 near3 (circuit switch)	US-PGPUB; USPAT	OR	ON	2019/09/24 13:00
S10	3147	S9 same transmission	US-PGPUB; USPAT	OR	ON	2019/09/24 13:00
S11	452	S7 and S8 and S9	US-PGPUB; USPAT	OR	ON	2019/09/24 13:01
S12	13	S7 and S8 and S9 and S10	US-PGPUB; USPAT	OR	ON	2019/09/24 13:01
S13	35	(US-20100222953-\$ or US-20170349164-\$ or US-20170334434-\$ or US-20170328330-\$ or US-20170320482-\$ or US-20170284539-\$ or US-20180065491-\$ or US-20170355373-\$ or US-20170282900-\$ or US-20170253113-\$ or US-20170225675-\$ or US-20140132378-\$ or US-20170072946-\$ or US-20170072939-\$ or US-20160039405-\$ or US-20140171260-\$ or US-20130190957-\$ or US-20070038340-\$ or US-20160152129-\$ or US-	US-PGPUB; USPAT; USOCR	OR	OFF	2019/09/24 13:41

		20100065349-\$ or US-20140288743-\$ or US-20140288742-\$ or US-20130311023-\$ or US-20130253749-\$ or US-20130173108-\$ or US-20110093151-\$).did. or (US-20070007939-\$ or US-20060250902-\$ or US-20140077737-\$).did. or (US-7932633-\$ or US-8453770-\$ or US-5804935-\$ or US-9969253-\$ or US-8535200-\$ or US-7246672-\$).did.				
S14	51512	(driv\$4 traction motor) and tranmission (bypass\$4 near3 (circuit switch))	US-PGPUB; USPAT	OR	ON	2019/09/24 14:21
S18	2113274	(driv\$4 traction motor) and transmission (bypass\$4 near3 (circuit switch))	US-PGPUB; USPAT	OR	ON	2019/09/24 14:23
S19	33	S13 and S18	US-PGPUB; USPAT	OR	ON	2019/09/24 14:23
S20	27	("20030150352" "20040069548" "20050082992" "20060169548" "20060250902" "20070007939" "20070158118" "20080011528" "20100136379" "20100194318" "20100219794" "20100222953" "20110101915" "20120103749" "20130030630" "20130038127" "20130138279" "20130311023" "20140077737" "7063637" "7207915" "7246672" "7932633" "8026638" "8387730" "8535200" "9561719").PN.	US-PGPUB; USPAT	OR	ON	2019/09/24 14:25

EAST Search History (I nterference)

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
L1	726	318/139.ccls.	US-PGPUB	OR	ON	2019/09/24 17:26
L2	332	B60L50/10.cpc.	US-PGPUB	OR	ON	2019/09/24 17:58
L3	250141	EV HEV ((hybrid electric\$4) near4 (car vehicle automobile))	US-PGPUB	OR	ON	2019/09/24 17:58
L4	79582	(2 second dual twin) near3 motor	US-PGPUB	OR	ON	2019/09/24 17:59
L5	21040	bypass\$4 near3 (circuit switch)	US-PGPUB	OR	ON	2019/09/24 18:01
L6	1286	5 same transmission	US-PGPUB	OR	ON	2019/09/24 18:01
L7	5	3 and 4 and 5 and 6	US-PGPUB	OR	ON	2019/09/24 18:01

9/ 24/ 2019 6:02:30 PM

C:\Users\eglass\Documents\EAST\Workspaces\16555487.wsp

Receipt date: 08/29/2019

16/555,487 - GAU: 2837

Doc code: IDS

Doc description: Information Disclosure Statement (IDS) Filed

PTO/SB/08a (02-18)

Approved for use through 11/30/2020. OMB 0651-0031

U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)	Application Number	
	Filing Date	
	First Named Inventor	Robert Dean King
	Art Unit	
	Examiner Name	
	Attorney Docket Number	273252-US- 13

U.S.PATENTS						Remove
Examiner Initial*	Cite No	Patent Number	Kind Code ¹	Issue Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	7063637	B2	2006-06-20	Yanauchi et al.	
	2	7207915	B2	2007-04-24	Oshidari et al.	
	3	7246672	B2	2007-07-24	Shirai et al.	
	4	7932633	B2	2011-04-26	King et al.	
	5	8026638	B2	2011-09-27	King et al.	
	6	8387730	B2	2013-03-05	Bouchon	
	7	8535200	B2	2013-09-17	Vyas et al.	
	8	9561719	B2	2017-02-07	Lo et al.	
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(Not for submission under 37 CFR 1.99)

Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

U.S.PATENT APPLICATION PUBLICATIONS						Remove
Examiner Initial*	Cite No	Publication Number	Kind Code ¹	Publication Date	Name of Patentee or Applicant of cited Document	Pages,Columns,Lines where Relevant Passages or Relevant Figures Appear
	1	20030150352	A1	2003-08-14	Kumar	
	2	20040069548	A1	2004-04-15	Kira et al.	
	3	20050082992	A2	2005-04-21	Aizawa et al.	
	4	20060169548	A1	2006-08-03	Corbett et al.	
	5	20070158118	A1	2007-07-12	King	
	6	20080011528	A1	2008-01-17	Verbrugge	
	7	20100136379	A1	2010-06-03	King	
	8	20100194318	A1	2010-08-05	Aso	
	9	20100219794	A1	2010-09-02	Sugimoto et al	

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STATEMENT BY APPLICANT**
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Application Number		
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First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

	10	20100222953	A1	2010-09-02	Tang	
	11	20110101915	A1	2011-05-05	Mitsutani	
	12	20120103749	A1	2015-05-03	Kimura et al.	
	13	20130030630	A1	2013-01-31	Luke et al.	
	14	20130038127	A1	2013-02-14	King	
	15	20130138279	A1	2013-05-30	Shi	
	16	20140077737	A1	2014-03-20	Zhang et al.	
	17	20060250902	A	2006-11-29	Bender	
	18	20070007939	A1	2007-01-11	Miller	
	19	20130311023	A1	2013-11-21	Nozaki	
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Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

Examiner Initial*	Cite No	Foreign Document Number ³	Country Code ²ⁱ	Kind Code ⁴	Publication Date	Name of Patentee or Applicant of cited Document	Pages, Columns, Lines where Relevant Passages or Relevant Figures Appear	T ⁵
	1	H5-176411	JP	A	1991-12-20	Toyota Motor Corp	With English Abstract	
	2	1306262	EP	A2	2003-05-02	Toyota Jidosha Kabushiki Kasisha		
	3	2003-244801A	JP	A	2003-08-29	Toyota Motor Corp	With English Abstract	
	4	2004-260904	JP	A	2004-09-04	Toyota Motor Corp	With English Abstract	
	5	2005-143274	JP	A	2005-06-02	Nissan Motor	With English Abstract	
	6	2006-042510	JP	B	2006-02-09	Nissan Motor	With English Abstract	
	7	2006-230071	JP	A	2006-08-31	Toyota Motor Corp	With English Abstract	
	8	2007-174867	JP	A	2007-07-05	Toyota Motor Corp	With English Abstract	
	9	1810861	EP	A1	2007-07-25	General Electric Company		
	10	102006013502	DE	A1	2007-09-27	Siemens AG	See English Family member WO2007107458A2	

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STATEMENT BY APPLICANT**
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Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

11	200107458	WO	A2	2007-09-27	Siemens AG	See English Family member DE102006013502A1	
12	2007274785	JP	A	2007-10-19	Shigekari Takeshi	With English Abstract	
13	2008005625	JP	A	2008-01-10	Ang Wanleng	With English Abstract	
14	2008312380	JP	A	2008-12-25	Toyota Motor Corp	With English Abstract	
15	2008-312382	JP	A	2008-12-25	Toyota Motor Corp	With English Abstract	
16	2009148139	JP	A	2009-07-02	Toyota Motor Corp	With English Abstract	
17	2009183108	JP	A	2009-08-13	Toyota Motor Corp	With English Abstract	
18	2009-522167	JP	A	2009-12-20	General Electric Company	With English Abstract	
19	2159898	EP	A1	2010-03-03	Toyota Jidosha Kabushiki Kasisha		
20	101729020	CN	A	2010-06-09	General Electric Company	With English Abstract	
21	2340957	EP	A1	2011-07-06	Mitsubishi Electric Corporation		

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**
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Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

22	2502773	EP	A2	2012-09-26	General Electric Company	
23	2013/008328	WO	A	2013-01-07	Toyota Jidosha Kabushiki Kasisha	With English Abstract
24	2013024675	WO	A1	2013-02-21	Hitachi Automotive Systems. LTD.	
25	2587618	EP	A2	2013-05-01	Sanyo Electric Co. Ltd	
26	2013-0063893	KR	A	2013-06-07	Hyundai Motor Co Ltd	With English Abstract
27	2639099	EP	A	2013-09-18	Toyota Jidosha Kabushiki Kasisha	
28	2013188106	JP	A	2013-09-19	Toyota Motor Corp	With English Abstract

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Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T ⁵
	1	A copy of European Search Report and Opinion issued in connection with corresponding EP Application No.: 15152810.6 on October 22, 2015	
	2	Copt of Office Action for corresponding KR Application No.: 10-2015-0116684 dated 27 February 2018.	

**INFORMATION DISCLOSURE
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Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

3	Copy of Office Action issued in connection with corresponding CN Application No.: 2015100501902 on March 27, 2018
4	Copy of Summons for corresponding EP Application No.: 15152810.6 dated June 4, 2018.
5	Copy of Notice of Allowance issued in connection with corresponding KR Application No.: 1020150009219 dated September 21, 2018
6	Copy of Search Report for corresponding JP Application No.: 2015-009031 dated December 18, 2018.
7	Copy of Notification of Reasons for Refusal for corresponding JP Application No.: 2015-009031 dated Decemer 28, 2018.

If you wish to add additional non-patent literature document citation information please click the Add button

EXAMINER SIGNATURE

Examiner Signature	/ERICK D GLASS/	Date Considered	09/24/2019
--------------------	-----------------	-----------------	------------

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹ See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. ² Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). ³ For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁴ Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. ⁵ Applicant is to place a check mark here if English language translation is attached.

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**
(Not for submission under 37 CFR 1.99)

Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

See attached certification statement.

The fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ A certification statement is not submitted herewith.

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature	/Craig M. Drachtman/	Date (YYYY-MM-DD)	2019-08-29
Name/Print	Craig M. Drachtman	Registration Number	73016

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. **DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these records.
2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.
3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.
4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).
5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.
6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).
7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

ALL REFERENCES CONSIDERED EXCEPT WHERE LINED THROUGH. /E.G./



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NUMBER	FILING or 371(c) DATE	GRP ART UNIT	FIL FEE REC'D	ATTY. DOCKET NO	TOT CLAIMS	IND CLAIMS
16/555,487	08/29/2019	2837	1720	273252-US-13	20	3

CONFIRMATION NO. 4785

FILING RECEIPT



000000011008679

131278

Meagher Emanuel Laks Goldberg & Liao, LLP
One Palmer Square
Suite 325
Princeton, NJ 08542

Date Mailed: 09/11/2019

Receipt is acknowledged of this non-provisional utility patent application. The application will be taken up for examination in due course. Applicant will be notified as to the results of the examination. Any correspondence concerning the application must include the following identification information: the U.S. APPLICATION NUMBER, FILING DATE, NAME OF FIRST INVENTOR, and TITLE OF INVENTION. Fees transmitted by check or draft are subject to collection.

Please verify the accuracy of the data presented on this receipt. If an error is noted on this Filing Receipt, please submit a written request for a corrected Filing Receipt, including a properly marked-up ADS showing the changes with strike-through for deletions and underlining for additions. If you received a "Notice to File Missing Parts" or other Notice requiring a response for this application, please submit any request for correction to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections provided that the request is grantable.

Inventor(s)

Robert Dean King, Schenectady, NY;
Zhihao Li, Rexford, NY;

Applicant(s)

General Electric Company, Schenectady, NY;

Assignment For Published Patent Application

General Electric Company, Schenectady, NY

Power of Attorney: The patent practitioners associated with Customer Number 131278

Domestic Priority data as claimed by applicant

This application is a CON of 15/799,045 10/31/2017
which is a CON of 14/168,224 01/30/2014 PAT 9834098

Foreign Applications for which priority is claimed (You may be eligible to benefit from the **Patent Prosecution Highway** program at the USPTO. Please see <http://www.uspto.gov> for more information.) - None.

Foreign application information must be provided in an Application Data Sheet in order to constitute a claim to foreign priority. See 37 CFR 1.55 and 1.76.

Permission to Access Application via Priority Document Exchange: No

Permission to Access Search Results: No

Applicant may provide or rescind an authorization for access using Form PTO/SB/39 or Form PTO/SB/69 as appropriate.

If Required, Foreign Filing License Granted: 09/10/2019

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is **US 16/555,487**

Projected Publication Date: 12/19/2019

Non-Publication Request: No

Early Publication Request: No

Title

VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF
MANUFACTURING SAME

Preliminary Class

318

Statement under 37 CFR 1.55 or 1.78 for AIA (First Inventor to File) Transition Applications: No

PROTECTING YOUR INVENTION OUTSIDE THE UNITED STATES

Since the rights granted by a U.S. patent extend only throughout the territory of the United States and have no effect in a foreign country, an inventor who wishes patent protection in another country must apply for a patent in a specific country or in regional patent offices. Applicants may wish to consider the filing of an international application under the Patent Cooperation Treaty (PCT). An international (PCT) application generally has the same effect as a regular national patent application in each PCT-member country. The PCT process **simplifies** the filing of patent applications on the same invention in member countries, but **does not result** in a grant of "an international patent" and does not eliminate the need of applicants to file additional documents and fees in countries where patent protection is desired.

Almost every country has its own patent law, and a person desiring a patent in a particular country must make an application for patent in that country in accordance with its particular laws. Since the laws of many countries differ in various respects from the patent law of the United States, applicants are advised to seek guidance from specific foreign countries to ensure that patent rights are not lost prematurely.

Applicants also are advised that in the case of inventions made in the United States, the Director of the USPTO must issue a license before applicants can apply for a patent in a foreign country. The filing of a U.S. patent application serves as a request for a foreign filing license. The application's filing receipt contains further information and guidance as to the status of applicant's license for foreign filing.

Applicants may wish to consult the USPTO booklet, "General Information Concerning Patents" (specifically, the section entitled "Treaties and Foreign Patents") for more information on timeframes and deadlines for filing foreign patent applications. The guide is available either by contacting the USPTO Contact Center at 800-786-9199, or it can be viewed on the USPTO website at <http://www.uspto.gov/web/offices/pac/doc/general/index.html>.

For information on preventing theft of your intellectual property (patents, trademarks and copyrights), you may wish to consult the U.S. Government website, <http://www.stopfakes.gov>. Part of a Department of Commerce initiative, this website includes self-help "toolkits" giving innovators guidance on how to protect intellectual property in specific

page 2 of 4

countries such as China, Korea and Mexico. For questions regarding patent enforcement issues, applicants may call the U.S. Government hotline at 1-866-999-HALT (1-866-999-4258).

LICENSE FOR FOREIGN FILING UNDER
Title 35, United States Code, Section 184
Title 37, Code of Federal Regulations, 5.11 & 5.15

GRANTED

The applicant has been granted a license under 35 U.S.C. 184, if the phrase "IF REQUIRED, FOREIGN FILING LICENSE GRANTED" followed by a date appears on this form. Such licenses are issued in all applications where the conditions for issuance of a license have been met, regardless of whether or not a license may be required as set forth in 37 CFR 5.15. The scope and limitations of this license are set forth in 37 CFR 5.15(a) unless an earlier license has been issued under 37 CFR 5.15(b). The license is subject to revocation upon written notification. The date indicated is the effective date of the license, unless an earlier license of similar scope has been granted under 37 CFR 5.13 or 5.14.

This license is to be retained by the licensee and may be used at any time on or after the effective date thereof unless it is revoked. This license is automatically transferred to any related applications(s) filed under 37 CFR 1.53(d). This license is not retroactive.

The grant of a license does not in any way lessen the responsibility of a licensee for the security of the subject matter as imposed by any Government contract or the provisions of existing laws relating to espionage and the national security or the export of technical data. Licensees should apprise themselves of current regulations especially with respect to certain countries, of other agencies, particularly the Office of Defense Trade Controls, Department of State (with respect to Arms, Munitions and Implements of War (22 CFR 121-128)); the Bureau of Industry and Security, Department of Commerce (15 CFR parts 730-774); the Office of Foreign Assets Control, Department of Treasury (31 CFR Parts 500+) and the Department of Energy.

NOT GRANTED

No license under 35 U.S.C. 184 has been granted at this time, if the phrase "IF REQUIRED, FOREIGN FILING LICENSE GRANTED" DOES NOT appear on this form. Applicant may still petition for a license under 37 CFR 5.12, if a license is desired before the expiration of 6 months from the filing date of the application. If 6 months has lapsed from the filing date of this application and the licensee has not received any indication of a secrecy order under 35 U.S.C. 181, the licensee may foreign file the application pursuant to 37 CFR 5.15(b).

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The United States represents the largest, most dynamic marketplace in the world and is an unparalleled location for business investment, innovation, and commercialization of new technologies. The U.S. offers tremendous resources and advantages for those who invest and manufacture goods here. Through SelectUSA, our nation works to promote and facilitate business investment. SelectUSA provides information assistance to the international investor community; serves as an ombudsman for existing and potential investors; advocates on behalf of U.S. cities, states, and regions competing for global investment; and counsels U.S. economic development organizations on investment attraction best practices. To learn more about why the United States is the best country in the world to develop

technology, manufacture products, deliver services, and grow your business, visit <http://www.SelectUSA.gov> or call +1-202-482-6800.

PATENT APPLICATION FEE DETERMINATION RECORD Substitute for Form PTO-875						Application or Docket Number 16/555,487			
APPLICATION AS FILED - PART I									
(Column 1)		(Column 2)		SMALL ENTITY		OR OTHER THAN SMALL ENTITY			
FOR	NUMBER FILED	NUMBER EXTRA	RATE(\$)	FEE(\$)		RATE(\$)	FEE(\$)		
BASIC FEE (37 CFR 1.16(a), (b), or (c))	N/A	N/A	N/A			N/A	300		
SEARCH FEE (37 CFR 1.16(k), (l), or (m))	N/A	N/A	N/A			N/A	660		
EXAMINATION FEE (37 CFR 1.16(o), (p), or (q))	N/A	N/A	N/A			N/A	760		
TOTAL CLAIMS (37 CFR 1.16(i))	20	minus 20 = *			OR	x 100 =	0.00		
INDEPENDENT CLAIMS (37 CFR 1.16(h))	3	minus 3 = *				x 460 =	0.00		
APPLICATION SIZE FEE (37 CFR 1.16(s))	If the specification and drawings exceed 100 sheets of paper, the application size fee due is \$310 (\$155 for small entity) for each additional 50 sheets or fraction thereof. See 35 U.S.C. 41(a)(1)(G) and 37 CFR 1.16(s).						0.00		
MULTIPLE DEPENDENT CLAIM PRESENT (37 CFR 1.16(j))							0.00		
* If the difference in column 1 is less than zero, enter "0" in column 2.			TOTAL			TOTAL	1720		
APPLICATION AS AMENDED - PART II									
(Column 1)		(Column 2)		(Column 3)		SMALL ENTITY		OR OTHER THAN SMALL ENTITY	
AMENDMENT A	CLAIMS REMAINING AFTER AMENDMENT	HIGHEST NUMBER PREVIOUSLY PAID FOR	PRESENT EXTRA	RATE(\$)	ADDITIONAL FEE(\$)	RATE(\$)	ADDITIONAL FEE(\$)		
	Total (37 CFR 1.16(i))	*	Minus **	=	x =	OR	x =		
	Independent (37 CFR 1.16(h))	*	Minus ***	=	x =	OR	x =		
	Application Size Fee (37 CFR 1.16(s))					OR			
	FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))					OR			
			TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE			
AMENDMENT B	CLAIMS REMAINING AFTER AMENDMENT	HIGHEST NUMBER PREVIOUSLY PAID FOR	PRESENT EXTRA	RATE(\$)	ADDITIONAL FEE(\$)	RATE(\$)	ADDITIONAL FEE(\$)		
	Total (37 CFR 1.16(i))	*	Minus **	=	x =	OR	x =		
	Independent (37 CFR 1.16(h))	*	Minus ***	=	x =	OR	x =		
	Application Size Fee (37 CFR 1.16(s))					OR			
	FIRST PRESENTATION OF MULTIPLE DEPENDENT CLAIM (37 CFR 1.16(j))					OR			
			TOTAL ADD'L FEE		OR	TOTAL ADD'L FEE			
* If the entry in column 1 is less than the entry in column 2, write "0" in column 3. ** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 20, enter "20". *** If the "Highest Number Previously Paid For" IN THIS SPACE is less than 3, enter "3". The "Highest Number Previously Paid For" (Total or Independent) is the highest found in the appropriate box in column 1.									

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1
 Stylesheet Version v1.2

EPAS ID: PAT5712423

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT
CONVEYING PARTY DATA	
Name	Execution Date
ROBERT DEAN KING	01/28/2014
ZHIHAO LI	01/28/2014
RECEIVING PARTY DATA	
Name:	GENERAL ELECTRIC COMPANY
Street Address:	1 RIVER ROAD
City:	SCHENECTADY
State/Country:	NEW YORK
Postal Code:	12345
PROPERTY NUMBERS Total: 1	
Property Type	Number
Application Number:	16555487
CORRESPONDENCE DATA	
Fax Number:	(609)454-3957
<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>	
Phone:	6094543500
Email:	smannes@meagheremanuel.com
Correspondent Name:	MEAGHER EMANUEL LAKS GOLDBERG & LIAO, LLP
Address Line 1:	ONE PALMER SQUARE
Address Line 2:	SUITE 325
Address Line 4:	PRINCETON, NEW JERSEY 08542
ATTORNEY DOCKET NUMBER:	273252-US-13
NAME OF SUBMITTER:	SILVIA MANNES
SIGNATURE:	/Silvia Mannes/
DATE SIGNED:	09/11/2019
This document serves as an Oath/Declaration (37 CFR 1.63).	
Total Attachments: 4	
source=273252-US-13-Assignment#page1.tif	
source=273252-US-13-Assignment#page2.tif	
source=273252-US-13-Assignment#page3.tif	

source=273252-US-13-Assignment#page4.tif

**COMBINED DECLARATION AND GLOBAL ASSIGNMENT
FOR UTILITY PATENT APPLICATION**

As the below named inventor(s), I/we hereby declare that:

This declaration and assignment is directed to:

**TITLE: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND
METHOD OF MANUFACTURING SAME**

☐ the specification of which is attached hereto OR

☒ was filed on January 30, 2014 as Application Serial No. 14/168,224 or

PCT International Application Number _____ and was amended on { _____ } (if applicable).

(We hereby authorize and request the Company or its delegated attorneys or agents to insert above the application number and filing date of the application when known.)

The above-identified application was made or authorized to be made by us.

We believe that we are original joint inventors of a claimed invention in the application.

We hereby acknowledge that any willful false statement made in this declaration is punishable under 18 USC § 1001 by fine or imprisonment of not more than five (5) years, or both.

We have reviewed and understand the contents of the above-identified application, including the claims, as amended by any amendment referred to above.

We acknowledge the duty to disclose information which is material to the patentability of this application as defined in 37 CFR § 1.56, including, for continuation-in-part applications, material information which became available between the filing date of the prior application and the filing date of the continuation-in-part application.

Combined Declaration & Assignment

GETL v1.0 9/18/12

Page 1 of 4

In accordance with our obligation(s) under an Employee Innovation and Proprietary Information Agreement or (as applicable) arising out of other agreements (such as, but not limited to, the Services Agreement between General Electric Company, a New York Corporation, and our employers), and/or for other good and valuable consideration of which we acknowledge receipt, I/we,

Robert Dean King of Schenectady, NY, US
 Zhihao Li of Rexford, NY, US

hereby sell and assign to **GENERAL ELECTRIC COMPANY, a New York Corporation**, (hereinafter referred to as Company) having an address at 1 River Road, Schenectady, New York 12345, USA, its successors and assigns our entire right(s), title(s), and interest(s) in and to the invention and improvements made or conceived by us and described in the application(s) listed above and in the following table:

Country of Filing	Type of Filing	Application Number	Filing Date	Title

(We hereby authorize and request the Company or its delegated attorneys or agents to insert above the application number and filing date of the application(s) when known.)

and any and all applications for patent and patents therefrom in any and all countries, including all divisions, continuations, continuations-in-part, reexaminations, renewals, and reissues thereof, and all rights of priority resulting from the filing of the application(s), and authorize and request any official whose duty it is to issue patents, to issue any patent on the inventions and improvements resulting therefrom to the Company, or its successors or assigns, and agree that on request and without further consideration, we will communicate to the Company or its representatives or nominees any facts known to us respecting the inventions and improvements and testify in any legal proceeding, make all rightful oaths, sign all lawful papers and execute all instruments or documents required or requested for the making and prosecution of any applications of any type for patent, utility model, or other similar rights in all countries including, but not limited to, any provisional, non-provisional, continuation, continuation-in-part, divisional, renewal or substitute thereof, for any derivation proceedings relating thereto, and, as to any patents that issue from such applications, for any supplemental examination, derivation proceeding, opposition, post grant review, reissue, re-examination, inter partes review, or extension thereof, and generally do everything possible to aid the Company, its successors, assigns, and nominees to obtain and enforce proper patent protection for the invention and its improvements in all countries.

Remuneration claims of the inventor(s)/assignor(s) potentially arising from German Law on Employee Inventions, or any other respective country law, remain unaffected by this assignment.

Please direct all telephone calls to:

Jean K. Testa, (518) 387-5115

INVENTOR I

Signature: Robert Dean King
Name: Robert Dean King

Date: JAN 28, 2014

Witnessed by: Timothy G. Burton
Signature

Date: Jan 28, 2014

Timothy G. Burton
Printed Name of Witness

Witnessed by: Xu She
Signature

Date: Jan. 28, 2014

Xu She
Printed Name of Witness

SECTION BELOW IS FOR USE ONLY IF SIGNING IN PRESENCE OF A NOTARY

Date: _____

Name: Robert Dean King

STATE OF _____

ss.

COUNTY OF _____

This _____ day of _____, _____ before me personally came the above-named Robert Dean King, to me personally known as the individual who executed the foregoing assignment, who acknowledged to me that he/she executed the same of his/her own free will for the purposes therein set forth.

Seal

(Notary Public)

INVENTOR 2

Signature: [Signature]

Name: Zhihao Li

Date: Jan 28, 2014

Witnessed by: Timothy G. Richter
Signature

Date: Jan 28, 2014

Timothy G. Richter
Printed Name of Witness

Witnessed by: Xu She
Signature

Date: Jan 28, 2014

Xu She
Printed Name of Witness

SECTION BELOW IS FOR USE ONLY IF SIGNING IN PRESENCE OF A NOTARY

Date: _____

Name: Zhihao Li

STATE OF _____

ss.

COUNTY OF _____

This _____ day of _____, _____ before me personally came the above-named Zhihao Li, to me personally known as the individual who executed the foregoing assignment, who acknowledged to me that he/she executed the same of his/her own free will for the purposes therein set forth.

Seal

(Notary Public)

**REVOCATION & APPOINTMENT OF
POWER OF ATTORNEY**

**CHANGE OF
CORRESPONDENCE ADDRESS**

STATEMENT UNDER 37 CFR 3.73(b)

SERIAL NO: 14/168224
FILING DATE: 1/30/2014
CONFIRMATION NO. 8841
DOCKET NO. 273252-1

POWER OF ATTORNEY:

I hereby **REVOKE** all previous powers in the above-identified application
and

APPOINT Practitioners associated with **Customer Number 131278**

as my/our attorney(s) or agent(s) to prosecute the application identified above, and to transact all business in the
United States Patent and Trademark office connected therewith.

CHANGE OF CORRESPONDENCE ADDRESS:

Please change the correspondence address to:

☒ Address associated with **CUSTOMER NUMBER 131278**

STATEMENT UNDER 37 CFR 3.73(b)

I am the:

- ☐ Applicant/Inventor
- ☒ Assignee of the entire right, title, and interest.
Statement under 37 CFR 3.73(b) (below)

General Electric Company, a Corporation, certifies that it is the assignee of the patent application identified
above by virtue of an assignment from the inventor(s). The assignment was recorded in the Patent and Trademark
office:

REEL/FRAME: 032091 / 0238
recorded on 1/30/2014

The undersigned, whose title is supplied below, is authorized to act on behalf of the assignee.

SIGNATURE OF: Assignee of the Entire Right, Title and Interest			
Name/ Reg. No.	JEAN K. TESTA 39,396	Title SR. PATENT COUNSEL	
Signature	/JEAN K. TESTA/		
Date	4/6/2015	Telephone	518-387-5115

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)	Application Number	
	Filing Date	
	First Named Inventor	Robert Dean King
	Art Unit	
	Examiner Name	
	Attorney Docket Number	273252-US- 13

U.S.PATENTS							Remove
Examiner Initial*	Cite No	Patent Number	Kind Code ¹	Issue Date	Name of Patentee or Applicant of cited Document	Pages, Columns, Lines where Relevant Passages or Relevant Figures Appear	
	1	7063637	B2	2006-06-20	Yanauchi et al.		
	2	7207915	B2	2007-04-24	Oshidari et al.		
	3	7246672	B2	2007-07-24	Shirai et al.		
	4	7932633	B2	2011-04-26	King et al.		
	5	8026638	B2	2011-09-27	King et al.		
	6	8387730	B2	2013-03-05	Bouchon		
	7	8535200	B2	2013-09-17	Vyas et al.		
	8	9561719	B2	2017-02-07	Lo et al.		
If you wish to add additional U.S. Patent citation information please click the Add button.							Add

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)	Application Number		
	Filing Date		
	First Named Inventor	Robert Dean King	
	Art Unit		
	Examiner Name		
	Attorney Docket Number	273252-US- 13	

U.S.PATENT APPLICATION PUBLICATIONS						Remove
Examiner Initial*	Cite No	Publication Number	Kind Code ¹	Publication Date	Name of Patentee or Applicant of cited Document	Pages, Columns, Lines where Relevant Passages or Relevant Figures Appear
	1	20030150352	A1	2003-08-14	Kumar	
	2	20040069548	A1	2004-04-15	Kira et al.	
	3	20050082992	A2	2005-04-21	Aizawa et al.	
	4	20060169548	A1	2006-08-03	Corbett et al.	
	5	20070158118	A1	2007-07-12	King	
	6	20080011528	A1	2008-01-17	Verbrugge	
	7	20100136379	A1	2010-06-03	King	
	8	20100194318	A1	2010-08-05	Aso	
	9	20100219794	A1	2010-09-02	Sugimoto et al	

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**
(Not for submission under 37 CFR 1.99)

Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

10	20100222953	A1	2010-09-02	Yang	
11	20110101915	A1	2011-05-05	Mitsutani	
12	20120103749	A1	2015-05-03	Kimura et al.	
13	20130030630	A1	2013-01-31	Luke et al.	
14	20130038127	A1	2013-02-14	King	
15	20130138279	A1	2013-05-30	Shi	
16	20140077737	A1	2014-03-20	Zhang et al.	
17	20060250902	A	2006-11-29	Bender	
18	20070007939	A1	2007-01-11	Miller	
19	20130311023	A1	2013-11-21	Nozaki	

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INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)	Application Number		
	Filing Date		
	First Named Inventor	Robert Dean King	
	Art Unit		
	Examiner Name		
	Attorney Docket Number	273252-US- 13	

Examiner Initial*	Cite No	Foreign Document Number ³	Country Code ² i	Kind Code ⁴	Publication Date	Name of Patentee or Applicant of cited Document	Pages, Columns, Lines where Relevant Passages or Relevant Figures Appear	T ⁵
	1	H5-176411	JP	A	1991-12-20	Toyota Motor Corp	With English Abstract	
	2	1306262	EP	A2	2003-05-02	Toyota Jidosha Kabushiki Kasisha		
	3	2003-244801A	JP	A	2003-08-29	Toyota Motor Corp	With English Abstract	
	4	2004-260904	JP	A	2004-09-04	Toyota Motor Corp	With English Abstract	
	5	2005-143274	JP	A	2005-06-02	Nissan Motor	With English Abstract	
	6	2006-042510	JP	B	2006-02-09	Nissan Motor	With English Abstract	
	7	2006-230071	JP	A	2006-08-31	Toyota Motor Corp	With English Abstract	
	8	2007-174867	JP	A	2007-07-05	Toyota Motor Corp	With English Abstract	
	9	1810861	EP	A1	2007-07-25	General Electric Company		
	10	102006013502	DE	A1	2007-09-27	Siemens AG	See English Family member WO2007107458A2	

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)	Application Number		
	Filing Date		
	First Named Inventor	Robert Dean King	
	Art Unit		
	Examiner Name		
	Attorney Docket Number	273252-US- 13	

11	200107458	WO	A2	2007-09-27	Siemens AG	See English Family member DE102006013502A1	
12	2007274785	JP	A	2007-10-19	Shigekari Takeshi	With English Abstract	
13	2008005625	JP	A	2008-01-10	Ang Wanleng	With English Abstract	
14	2008312380	JP	A	2008-12-25	Toyota Motor Corp	With English Abstract	
15	2008-312382	JP	A	2008-12-25	Toyota Motor Corp	With English Abstract	
16	2009148139	JP	A	2009-07-02	Toyota Motor Corp	With English Abstract	
17	2009183108	JP	A	2009-08-13	Toyota Motor Corp	With English Abstract	
18	2009-522167	JP	A	2009-12-20	General Electric Company	With English Abstract	
19	2159898	EP	A1	2010-03-03	Toyota Jidosha Kabushiki Kasisha		
20	101729020	CN	A	2010-06-09	General Electric Company	With English Abstract	
21	2340957	EP	A1	2011-07-06	Mitsubishi Electric Corporation		

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Not for submission under 37 CFR 1.99)	Application Number		
	Filing Date		
	First Named Inventor	Robert Dean King	
	Art Unit		
	Examiner Name		
	Attorney Docket Number	273252-US- 13	

22	2502773	EP	A2	2012-09-26	General Electric Company		
23	2013/008328	WO	A	2013-01-07	Toyota Jidosha Kabushiki Kasisha	With English Abstract	
24	2013024675	WO	A1	2013-02-21	Hitachi Automotive Systems. LTD.		
25	2587618	EP	A2	2013-05-01	Sanyo Electric Co. Ltd		
26	2013-0063893	KR	A	2013-06-07	Hyundai Motor Co Ltd	With English Abstract	
27	2639099	EP	A	2013-09-18	Toyota Jidosha Kabushiki Kasisha		
28	2013188106	JP	A	2013-09-19	Toyota Motor Corp	With English Abstract	

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NON-PATENT LITERATURE DOCUMENTS [Remove](#)

Examiner Initials*	Cite No	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc), date, pages(s), volume-issue number(s), publisher, city and/or country where published.	T ⁵
	1	A copy of European Search Report and Opinion issued in connection with corresponding EP Application No.: 15152810.6 on October 22, 2015	
	2	Copt of Office Action for corresponding KR Application No.: 10-2015-0116684 dated 27 February 2018.	

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**
(Not for submission under 37 CFR 1.99)

Application Number		
Filing Date		
First Named Inventor	Robert Dean King	
Art Unit		
Examiner Name		
Attorney Docket Number	273252-US- 13	

3	Copy of Office Action issued in connection with corresponding CN Application No.: 2015100501902 on March 27, 2018.
4	Copy of Summons for corresponding EP Application No.: 15152810.6 dated June 4, 2018.
5	Copy of Notice of Allowance issued in connection with corresponding KR Application No.: 1020150009219 dated September 21, 2018
6	Copy of Search Report for corresponding JP Application No.: 2015-009031 dated December 18, 2018.
7	Copy of Notification of Reasons for Refusal for corresponding JP Application No.: 2015-009031 dated Decemer 28, 2018.

If you wish to add additional non-patent literature document citation information please click the Add button

EXAMINER SIGNATURE

Examiner Signature		Date Considered	
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*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through a citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹ See Kind Codes of USPTO Patent Documents at www.USPTO.GOV or MPEP 901.04. ² Enter office that issued the document, by the two-letter code (WIPO Standard ST.3). ³ For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁴ Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. ⁵ Applicant is to place a check mark here if English language translation is attached.

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**
(Not for submission under 37 CFR 1.99)

Application Number	
Filing Date	
First Named Inventor	Robert Dean King
Art Unit	
Examiner Name	
Attorney Docket Number	273252-US- 13

CERTIFICATION STATEMENT

Please see 37 CFR 1.97 and 1.98 to make the appropriate selection(s):

That each item of information contained in the information disclosure statement was first cited in any communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(1).

OR

☐ That no item of information contained in the information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the person signing the certification after making reasonable inquiry, no item of information contained in the information disclosure statement was known to any individual designated in 37 CFR 1.56(c) more than three months prior to the filing of the information disclosure statement. See 37 CFR 1.97(e)(2).

See attached certification statement.

The fee set forth in 37 CFR 1.17 (p) has been submitted herewith.

☒ A certification statement is not submitted herewith.

SIGNATURE

A signature of the applicant or representative is required in accordance with CFR 1.33, 10.18. Please see CFR 1.4(d) for the form of the signature.

Signature	/Craig M. Drachtman/	Date (YYYY-MM-DD)	2019-08-29
Name/Print	Craig M. Drachtman	Registration Number	73016

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 1 hour to complete, including gathering, preparing and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

Privacy Act Statement

The Privacy Act of 1974 (P.L. 93-579) requires that you be given certain information in connection with your submission of the attached form related to a patent application or patent. Accordingly, pursuant to the requirements of the Act, please be advised that: (1) the general authority for the collection of this information is 35 U.S.C. 2(b)(2); (2) furnishing of the information solicited is voluntary; and (3) the principal purpose for which the information is used by the U.S. Patent and Trademark Office is to process and/or examine your submission related to a patent application or patent. If you do not furnish the requested information, the U.S. Patent and Trademark Office may not be able to process and/or examine your submission, which may result in termination of proceedings or abandonment of the application or expiration of the patent.

The information provided by you in this form will be subject to the following routine uses:

1. The information on this form will be treated confidentially to the extent allowed under the Freedom of Information Act (5 U.S.C. 552) and the Privacy Act (5 U.S.C. 552a). Records from this system of records may be disclosed to the Department of Justice to determine whether the Freedom of Information Act requires disclosure of these records.
2. A record from this system of records may be disclosed, as a routine use, in the course of presenting evidence to a court, magistrate, or administrative tribunal, including disclosures to opposing counsel in the course of settlement negotiations.
3. A record in this system of records may be disclosed, as a routine use, to a Member of Congress submitting a request involving an individual, to whom the record pertains, when the individual has requested assistance from the Member with respect to the subject matter of the record.
4. A record in this system of records may be disclosed, as a routine use, to a contractor of the Agency having need for the information in order to perform a contract. Recipients of information shall be required to comply with the requirements of the Privacy Act of 1974, as amended, pursuant to 5 U.S.C. 552a(m).
5. A record related to an International Application filed under the Patent Cooperation Treaty in this system of records may be disclosed, as a routine use, to the International Bureau of the World Intellectual Property Organization, pursuant to the Patent Cooperation Treaty.
6. A record in this system of records may be disclosed, as a routine use, to another federal agency for purposes of National Security review (35 U.S.C. 181) and for review pursuant to the Atomic Energy Act (42 U.S.C. 218(c)).
7. A record from this system of records may be disclosed, as a routine use, to the Administrator, General Services, or his/her designee, during an inspection of records conducted by GSA as part of that agency's responsibility to recommend improvements in records management practices and programs, under authority of 44 U.S.C. 2904 and 2906. Such disclosure shall be made in accordance with the GSA regulations governing inspection of records for this purpose, and any other relevant (i.e., GSA or Commerce) directive. Such disclosure shall not be used to make determinations about individuals.
8. A record from this system of records may be disclosed, as a routine use, to the public after either publication of the application pursuant to 35 U.S.C. 122(b) or issuance of a patent pursuant to 35 U.S.C. 151. Further, a record may be disclosed, subject to the limitations of 37 CFR 1.14, as a routine use, to the public if the record was filed in an application which became abandoned or in which the proceedings were terminated and which application is referenced by either a published application, an application open to public inspections or an issued patent.
9. A record from this system of records may be disclosed, as a routine use, to a Federal, State, or local law enforcement agency, if the USPTO becomes aware of a violation or potential violation of law or regulation.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In the **PATENT APPLICATION** of:

Robert Dean King et al

Application No.: Not yet assigned

Confirmation No.: Not yet assigned

Filed: Herewith

For: VEHICLE PROPULSION SYSTEM
WITH MULTI-CHANNEL DC BUS AND
METHOD OF MANUFACTURING SAME

Group: Not yet assigned

Examiner: Not yet assigned

Our File: 273252-US-13

Date: August 29, 2019

INFORMATION DISCLOSURE STATEMENT

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Sir:

Pursuant to MPEP 609.02, Applicant respectfully requests the Examiner to consider all the references submitted, cited, or otherwise considered during the prosecution of all the ancestor applications listed on the Application Data Sheet of the present application. A complete PTO/SB/08 form is attached. The Applicant does not plan to submit references unless explicitly requested by the Examiner.

Respectfully submitted,
GENERAL ELECTRIC COMPANY

By: /Craig M. Drachtman/
Craig M. Drachtman
Registration No. 73,016

Meagher Emanuel
Laks Goldberg & Liao, LLP
One Palmer Square, Suite 325
Princeton, NJ 08542
609-454-3500

Electronic Patent Application Fee Transmittal

Application Number:				
Filing Date:				
Title of Invention:	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME			
First Named Inventor/Applicant Name:	Robert Dean King			
Filer:	Craig Michael Drachtman/Colleen Maroney			
Attorney Docket Number:	273252-US-13			
Filed as Large Entity				
Filing Fees for Utility under 35 USC 111(a)				
Description	Fee Code	Quantity	Amount	Sub-Total in USD(\$)
Basic Filing:				
UTILITY APPLICATION FILING	1011	1	300	300
UTILITY SEARCH FEE	1111	1	660	660
UTILITY EXAMINATION FEE	1311	1	760	760
Pages:				
Claims:				
Miscellaneous-Filing:				
Petition:				
Patent-Appeals-and-Interference:				

Description	Fee Code	Quantity	Amount	Sub-Total in USD(\$)
Post-Allowance-and-Post-Issuance:				
Extension-of-Time:				
Miscellaneous:				
Total in USD (\$)				1720

Electronic Acknowledgement Receipt	
EFS ID:	37021172
Application Number:	16555487
International Application Number:	
Confirmation Number:	4785
Title of Invention:	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME
First Named Inventor/Applicant Name:	Robert Dean King
Customer Number:	131278
Filer:	Craig Michael Drachtman/Colleen Maroney
Filer Authorized By:	Craig Michael Drachtman
Attorney Docket Number:	273252-US-13
Receipt Date:	29-AUG-2019
Filing Date:	
Time Stamp:	15:50:22
Application Type:	Utility under 35 USC 111(a)

Payment information:

Submitted with Payment	yes
Payment Type	CARD
Payment was successfully received in RAM	\$1720
RAM confirmation Number	E20198SF50515303
Deposit Account	505522
Authorized User	Colleen Maroney
The Director of the USPTO is hereby authorized to charge indicated fees and credit any overpayment as follows: 37 CFR 1.21 (Miscellaneous fees and charges)	

File Listing:					
Document Number	Document Description	File Name	File Size(Bytes)/ Message Digest	Multi Part /.zip	Pages (if appl.)
1	Application Data Sheet	273252US13_ADS.pdf	1256225	no	8
			b44552ecf68694fc992451d91f6a250ce9ec772b		
Warnings:					
Information:					
2		273252US13_CONApplication.pdf	23152552	yes	28
			473cc316a9119f0ce058ec250e5ff2251724edf		
	Multipart Description/PDF files in .zip description				
	Document Description		Start	End	
	Specification		1	22	
	Claims		23	27	
	Abstract		28	28	
Warnings:					
Information:					
3	Drawings-only black and white line drawings	273252US_13_Draw.pdf	564060	no	7
			7745ce8df3ee3ecbd88d11334773d33dd03fa5b9		
Warnings:					
Information:					
4	Oath or Declaration filed	273252US_13_Declaration.pdf	3254430	no	4
			0962f69811ed3a812e722f6a3c7891fed492e2fa		
Warnings:					
Information:					
5	Power of Attorney	273252US13_POA.pdf	1229682	no	1
			6d4256c3b022e10327d97c6899065b2ad35cfd1a		

Warnings:					
Information:					
6	Information Disclosure Statement (IDS) Form (SB08)	273525US13_IDS.pdf	1036701	no	9
			0d48d991964821adb5355c1b0256fb977cd0b42c		
Warnings:					
Information:					
7	Transmittal Letter	273252US13_IDSStatementConsiderPrior.pdf	58809	no	1
			4c790d3c2d40a7bd9d4aeaadf657d520026bb366		
Warnings:					
Information:					
8	Fee Worksheet (SB06)	fee-info.pdf	35060	no	2
			4b7f90212e5bffa434dca63b85ba86ead205a696		
Warnings:					
Information:					
Total Files Size (in bytes):			30587519		
This Acknowledgement Receipt evidences receipt on the noted date by the USPTO of the indicated documents, characterized by the applicant, and including page counts, where applicable. It serves as evidence of receipt similar to a Post Card, as described in MPEP 503. <u>New Applications Under 35 U.S.C. 111</u> If a new application is being filed and the application includes the necessary components for a filing date (see 37 CFR 1.53(b)-(d) and MPEP 506), a Filing Receipt (37 CFR 1.54) will be issued in due course and the date shown on this Acknowledgement Receipt will establish the filing date of the application. <u>National Stage of an International Application under 35 U.S.C. 371</u> If a timely submission to enter the national stage of an international application is compliant with the conditions of 35 U.S.C. 371 and other applicable requirements a Form PCT/DO/EO/903 indicating acceptance of the application as a national stage submission under 35 U.S.C. 371 will be issued in addition to the Filing Receipt, in due course. <u>New International Application Filed with the USPTO as a Receiving Office</u> If a new international application is being filed and the international application includes the necessary components for an international filing date (see PCT Article 11 and MPEP 1810), a Notification of the International Application Number and of the International Filing Date (Form PCT/RO/105) will be issued in due course, subject to prescriptions concerning national security, and the date shown on this Acknowledgement Receipt will establish the international filing date of the application.					

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		
The application data sheet is part of the provisional or nonprovisional application for which it is being submitted. The following form contains the bibliographic data arranged in a format specified by the United States Patent and Trademark Office as outlined in 37 CFR 1.76. This document may be completed electronically and submitted to the Office in electronic format using the Electronic Filing System (EFS) or the document may be printed and included in a paper filed application.			

Secrecy Order 37 CFR 5.2:

☐	Portions or all of the application associated with this Application Data Sheet may fall under a Secrecy Order pursuant to 37 CFR 5.2 (Paper filers only. Applications that fall under Secrecy Order may not be filed electronically.)
--------------------------	---

Inventor Information:

Inventor	1				Remove
Legal Name					
Prefix	Given Name	Middle Name	Family Name	Suffix	
	Robert	Dean	King		
Residence Information (Select One) ☒ US Residency ☐ Non US Residency ☐ Active US Military Service					
City	Schenectady	State/Province	NY	Country of Residence	US
Mailing Address of Inventor:					
Address 1	1 Research Circle				
Address 2					
City	Niskayuna	State/Province	NY		
Postal Code	12309	Country	US		
Inventor	2				Remove
Legal Name					
Prefix	Given Name	Middle Name	Family Name	Suffix	
	Zhihao				
Residence Information (Select One) ☒ US Residency ☐ Non US Residency ☐ Active US Military Service					
City	Rexford	State/Province	NY	Country of Residence	US
Mailing Address of Inventor:					
Address 1	1 Research Circle				
Address 2					
City	Niskayuna	State/Province	NY		
Postal Code	12309	Country	US		
All Inventors Must Be Listed - Additional Inventor Information blocks may be generated within this form by selecting the Add button.					
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Correspondence Information:

Enter either Customer Number or complete the Correspondence Information section below. For further information see 37 CFR 1.33(a).
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Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		

☐ An Address is being provided for the correspondence information of this application.

Customer Number	131278		
Email Address		Add Email	Remove Email

Application Information:

Title of the Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		
Attorney Docket Number	273252-US-13	Small Entity Status Claimed	☐
Application Type	Nonprovisional		
Subject Matter	Utility		
Total Number of Drawing Sheets (if any)	7	Suggested Figure for Publication (if any)	

Filing By Reference:

Only complete this section when filing an application by reference under 35 U.S.C. 111(c) and 37 CFR 1.57(a). Do not complete this section if application papers including a specification and any drawings are being filed. Any domestic benefit or foreign priority information must be provided in the appropriate section(s) below (i.e., "Domestic Benefit/National Stage Information" and "Foreign Priority Information").

For the purposes of a filing date under 37 CFR 1.53(b), the description and any drawings of the present application are replaced by this reference to the previously filed application, subject to conditions and requirements of 37 CFR 1.57(a).

Application number of the previously filed application	Filing date (YYYY-MM-DD)	Intellectual Property Authority or Country

Publication Information:
☐ Request Early Publication (Fee required at time of Request 37 CFR 1.219)

☐ **Request Not to Publish.** I hereby request that the attached application not be published under 35 U.S.C. 122(b) and certify that the invention disclosed in the attached application **has not and will not** be the subject of an application filed in another country, or under a multilateral international agreement, that requires publication at eighteen months after filing.

Representative Information:

Representative information should be provided for all practitioners having a power of attorney in the application. Providing this information in the Application Data Sheet does not constitute a power of attorney in the application (see 37 CFR 1.32). Either enter Customer Number or complete the Representative Name section below. If both sections are completed the customer Number will be used for the Representative Information during processing.			
Please Select One:	☒ Customer Number	☐ US Patent Practitioner	☐ Limited Recognition (37 CFR 11.9)
Customer Number	131278		

Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		

Domestic Benefit/National Stage Information:

This section allows for the applicant to either claim benefit under 35 U.S.C. 119(e), 120, 121, 365(c), or 386(c) or indicate National Stage entry from a PCT application. Providing benefit claim information in the Application Data Sheet constitutes the specific reference required by 35 U.S.C. 119(e) or 120, and 37 CFR 1.78.

When referring to the current application, please leave the "Application Number" field blank.

Prior Application Status		Remove	
Application Number	Continuity Type	Prior Application Number	Filing or 371(c) Date (YYYY-MM-DD)
	Continuation of	15799045	2017-10-31
Prior Application Status		Remove	
Application Number	Continuity Type	Prior Application Number	Filing or 371(c) Date (YYYY-MM-DD)
15799045	Continuation of	14168224	2014-01-30
Additional Domestic Benefit/National Stage Data may be generated within this form by selecting the Add button.			

Foreign Priority Information:

This section allows for the applicant to claim priority to a foreign application. Providing this information in the application data sheet constitutes the claim for priority as required by 35 U.S.C. 119(b) and 37 CFR 1.55. When priority is claimed to a foreign application that is eligible for retrieval under the priority document exchange program (PDX)ⁱ the information will be used by the Office to automatically attempt retrieval pursuant to 37 CFR 1.55(i)(1) and (2). Under the PDX program, applicant bears the ultimate responsibility for ensuring that a copy of the foreign application is received by the Office from the participating foreign intellectual property office, or a certified copy of the foreign priority application is filed, within the time period specified in 37 CFR 1.55(g)(1).

Application Number	Country ⁱ	Filing Date (YYYY-MM-DD)	Access Code ⁱ (if applicable)	Remove
Additional Foreign Priority Data may be generated within this form by selecting the Add button.				

Statement under 37 CFR 1.55 or 1.78 for AIA (First Inventor to File) Transition Applications

☐ This application (1) claims priority to or the benefit of an application filed before March 16, 2013 and (2) also contains, or contained at any time, a claim to a claimed invention that has an effective filing date on or after March 16, 2013. NOTE: By providing this statement under 37 CFR 1.55 or 1.78, this application, with a filing date on or after March 16, 2013, will be examined under the first inventor to file provisions of the AIA.

Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		

Authorization or Opt-Out of Authorization to Permit Access:

When this Application Data Sheet is properly signed and filed with the application, applicant has provided written authority to permit a participating foreign intellectual property (IP) office access to the instant application-as-filed (see paragraph A in subsection 1 below) and the European Patent Office (EPO) access to any search results from the instant application (see paragraph B in subsection 1 below).

Should applicant choose not to provide an authorization identified in subsection 1 below, applicant **must opt-out** of the authorization by checking the corresponding box A or B or both in subsection 2 below.

NOTE: This section of the Application Data Sheet is **ONLY** reviewed and processed with the **INITIAL** filing of an application. After the initial filing of an application, an Application Data Sheet cannot be used to provide or rescind authorization for access by a foreign IP office(s). Instead, Form PTO/SB/39 or PTO/SB/69 must be used as appropriate.

1. Authorization to Permit Access by a Foreign Intellectual Property Office(s)

A. Priority Document Exchange (PDX) - Unless box A in subsection 2 (opt-out of authorization) is checked, the undersigned hereby **grants the USPTO authority** to provide the European Patent Office (EPO), the Japan Patent Office (JPO), the Korean Intellectual Property Office (KIPO), the State Intellectual Property Office of the People's Republic of China (SIPO), the World Intellectual Property Organization (WIPO), and any other foreign intellectual property office participating with the USPTO in a bilateral or multilateral priority document exchange agreement in which a foreign application claiming priority to the instant patent application is filed, access to: (1) the instant patent application-as-filed and its related bibliographic data, (2) any foreign or domestic application to which priority or benefit is claimed by the instant application and its related bibliographic data, and (3) the date of filing of this Authorization. See 37 CFR 1.14(h)(1).

B. Search Results from U.S. Application to EPO - Unless box B in subsection 2 (opt-out of authorization) is checked, the undersigned hereby **grants the USPTO authority** to provide the EPO access to the bibliographic data and search results from the instant patent application when a European patent application claiming priority to the instant patent application is filed. See 37 CFR 1.14(h)(2).

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Application Data Sheet 37 CFR 1.76		Attorney Docket Number	273252-US-13
		Application Number	
Title of Invention	VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND METHOD OF MANUFACTURING SAME		

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**VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND
METHOD OF MANUFACTURING SAME**

BACKGROUND OF THE INVENTION

[0001] Embodiments of the invention relate generally to electric drive systems including hybrid and electric vehicles and, more particularly, to transferring energy between one or more energy storage devices and multiple electromechanical devices of the vehicle using a multi-channel DC bus.

[0002] Purely electric vehicles use stored electrical energy to power an electric motor, which propels the vehicle and may also operate auxiliary drives. Purely electric vehicles may use one or more sources of stored electrical energy. For example, a first source of stored electrical energy may be used to provide longer-lasting energy while a second source of stored electrical energy may be used to provide higher-power energy for, for example, acceleration.

[0003] Hybrid electric vehicles may combine an internal combustion engine and an electric motor powered by an energy storage device, such as a traction battery, to propel the vehicle. Such a combination may increase overall fuel efficiency by enabling the combustion engine and the electric motor to each operate in respective ranges of increased efficiency. Electric motors, for example, may be efficient at accelerating from a standing start, while combustion engines may be efficient during sustained periods of constant engine operation, such as in highway driving. Having an electric motor to boost initial acceleration allows combustion engines in hybrid vehicles to be smaller and more fuel efficient.

[0004] While propulsion system configurations for purely electric vehicles and hybrid electric vehicles have been developed to include multiple sources of electrical energy to increase energy or power density and multiple power sources to achieve desired propulsive output, incorporating these energy storage and power sources into a propulsion system increases the overall size, weight, and cost of the system. Further, the limitations imposed by configuring a propulsion system to operate with multiple power sources in combination with one or more energy storage sources reduces the

operating efficiency and fuel economy of the individual components of the propulsion system in addition to reducing the overall system efficiency.

[0005] Therefore, it would be desirable to provide an electric and/or hybrid electric propulsion system that incorporates multiple electromechanical devices and one or more energy storage systems in a manner that improves overall system efficiency and permits the individual components of the propulsion system to be operated independently to improve the individual operating efficiencies thereof.

BRIEF DESCRIPTION OF THE INVENTION

[0006] According to one aspect of the invention, an apparatus includes a multi-channel DC bus assembly comprising a first channel and a second channel, a first electromechanical device coupled to a positive DC link of the first channel, and a second electromechanical device coupled to a positive DC link of the second channel. A first DC-to-AC voltage inverter is coupled to the positive DC link of the first channel and a second DC-to-AC voltage inverter is coupled to the positive DC link of the second channel. The apparatus further includes a bi-directional voltage modification assembly coupled to the positive DC link of the second channel and a first energy storage system electrically coupled to the first electromechanical device.

[0007] In accordance with another aspect of the invention, a method of fabricating a propulsion system includes coupling a first DC-to-AC voltage inverter to a first voltage bus, coupling a first electromechanical device to the first DC-to-AC voltage inverter, and coupling a second DC-to-AC voltage inverter to a second voltage bus. The method also includes coupling a second electromechanical device to the second DC-to-AC voltage inverter, coupling a bi-directional DC-DC voltage converter to the second voltage bus, coupling a first energy storage system to the bi-directional DC-DC voltage converter, and programming a controller to control switching of the bi-directional DC-DC voltage converter to boost a voltage of the first energy storage system to a boosted voltage different from a voltage of the first voltage bus.

[0008] In accordance with yet another aspect of the invention, a vehicle propulsion system includes a DC bus assembly having a first DC bus and a second DC bus. The vehicle propulsion system also includes a first bi-directional DC-to-DC voltage converter coupled to the first DC bus, a high specific-power energy storage device coupled to a low voltage side of the first bi-directional DC-to-DC voltage converter, a first electromechanical device coupled to the first DC bus through a first DC-to-AC voltage converter, and a second electromechanical device coupled to the second DC bus through a second DC-to-AC voltage converter. A controller is programmed to control the first bi-directional DC-to-DC voltage converter to boost a voltage of the first

electromechanical device to a boosted voltage and supply the boosted voltage to the first DC bus, the boosted voltage different than a voltage of the second DC bus.

[0009] In accordance with yet another aspect of the invention, a vehicle propulsion system includes a first electromechanical device coupled to a positive DC link of a first DC bus, an auxiliary load coupled to an output of the first electromechanical device and a first DC-to-AC voltage inverter coupled to the positive DC link of the first DC bus. A second electromechanical device is coupled to a positive DC link of a second DC bus and a transmission is coupled to an output of the second electromechanical device. The vehicle propulsion system also includes a second DC-to-AC voltage inverter coupled to the positive DC link of the second DC bus, an energy storage system electrically coupled to the positive DC link of the second DC bus, and a bi-directional voltage modification assembly coupled to the positive DC link of the second DC bus and configured to boost a voltage of the first energy storage system to a voltage different from a voltage of the first DC bus.

[0010] Various other features and advantages will be made apparent from the following detailed description and the drawings.

BRIEF DESCRIPTION OF THE DRAWINGS

[0011] The drawings illustrate embodiments presently contemplated for carrying out the invention.

[0012] In the drawings:

[0013] FIG. 1 is a schematic diagram of a propulsion system according to an embodiment of the invention.

[0014] FIG. 2 is a schematic diagram of a propulsion system that includes an auxiliary load according to an embodiment of the invention.

[0015] FIG. 3 is a schematic diagram of a propulsion system that includes an auxiliary load according to another embodiment of the invention.

[0016] FIG. 4 is a schematic diagram of a propulsion system according to another embodiment of the invention.

[0017] FIG. 5 is a schematic diagram of a propulsion system according to yet another embodiment of the invention.

[0018] FIG. 6 is a schematic diagram of a propulsion system according to yet another embodiment of the invention.

[0019] FIG. 7 is a schematic diagram of a propulsion system according to yet another embodiment of the invention.

DETAILED DESCRIPTION

[0020] FIG. 1 is a schematic diagram of a propulsion system 10 according to an embodiment of the invention. As described in detail below, propulsion system 10 may be configured in a pure electric (EV) propulsion system arrangement that splits power output between two or more electromechanical devices or as a hybrid (HEV) propulsion system that includes an internal combustion engine in addition to multiple electromechanical devices. In either an EV or HEV embodiment, the electromechanical devices are provided on independent channels of a multi-channel DC bus, permitting flexibility in the sizing and operation of the multiple electromechanical devices and increasing the operating efficiency of the electromechanical devices and overall propulsion system.

[0021] According to various embodiments, propulsion system 10 is configured to be incorporated into various types of vehicles including, but not limited to, automobiles, busses, trucks, tractors, mining equipment, marine craft, and off-road vehicles, including material transport vehicles or personal carrier vehicles, capable of operation both on the surface and underground such as in mining operations, or other type of electrical apparatus such as, for example, a crane, elevator, or lift, as non-limiting examples.

[0022] Propulsion system 10 includes an energy storage system 12 and a multi-channel DC bus arrangement having at least two or more independent DC bus channels. In the embodiment illustrated in FIG. 1, the multi-channel DC bus arrangement includes two channels: an A channel 14 comprising an A channel DC bus 16 having an A channel positive DC link 18 and a B channel 20 comprising a B channel DC bus 22 having a B channel positive DC link 24. Energy storage system 12 includes a positive terminal 26 and a negative terminal 28. In one embodiment, energy storage system 12 is a high-voltage or high-power energy storage device and may be a battery, a flywheel system, fuel cell, an ultracapacitor, or a combination of ultracapacitors, fuel cells, and/or batteries, as examples. A positive terminal 26 of energy storage system 12 is coupled to a first bi-directional DC-DC voltage converter assembly 30. In one embodiment, positive terminal 26 of energy storage system 12 is also coupled to an optional second

bi-directional DC-DC voltage converter assembly 32 (shown in phantom). As shown, first bi-directional DC-DC voltage converter 30 is coupled to the B channel positive DC link 24 whereas second bi-directional DC-DC voltage converter assembly 32 is coupled to the A channel positive DC link 18. According to one embodiment, energy storage system 12 is sized such that second bi-directional DC-DC voltage converter assembly 32 may be omitted from A channel 14 resulting in a propulsion system 10 that includes fewer parts and less weight than a system that includes a respective DC-DC voltage converter on each channel of the multi-channel DC bus assembly.

[0023] Both first bi-directional DC-DC voltage converter 30 and second bi-directional DC-DC voltage converter assembly 32, when used, are configured to convert one DC voltage to another DC voltage either by bucking or boosting the DC voltage. Each bi-directional DC-to-DC voltage converter 30, 32 includes an inductor 34 coupled to a pair of switches 36, 38 and coupled to a pair of diodes 40, 42. Each switch 36, 38 is coupled to a respective diode 40, 42, and each switch/diode pair forms a respective half phase module 44, 46. Switches 36, 38 are shown, for illustrative purposes, as insulated gate bipolar transistors (IGBTs). However, embodiments of the invention are not limited to IGBTs. Any appropriate electronic switch can be used, such as, for example, metal oxide semiconductor field effect transistors (MOSFETs), silicon carbide (SiC) MOSFETs, Gallium nitride (GaN) devices, bipolar junction transistors (BJTs), and metal oxide semiconductor controlled thyristors (MCTs).

[0024] The A channel 14 and B channel 20 also include respective DC-to-AC voltage inverters 48, 50, each of which includes six half phase modules 52, 54, 56, 58, 60, and 62 that are paired to form three phases 64, 66, 68. Each phase 64, 66, 68 is coupled between a pair of conductors of its respective DC bus 22, 16. Specifically, each phase 64, 66, 68 of DC-to-AC voltage inverter 48 is coupled between A channel positive DC link 18 and an A channel negative DC link 70 of A channel DC bus 16 and each phase 64, 66, 68 of DC-to-AC voltage inverter 50 is coupled between B channel positive DC link 24 and a B channel negative DC link 72 of B channel DC bus 22.

[0025] An electromechanical device 74 is coupled to DC-to-AC voltage inverter 48 on A channel 14. Electromechanical device 74 includes a plurality of windings 76, 78, 80 coupled to respective phases 64-68 of DC-to-AC voltage inverter 48. Propulsion system 10 also includes an electromechanical device 82 coupled to DC-to-AC voltage inverter 50 on the B channel 20. As shown, electromechanical device 82 includes a plurality of windings 84, 86, 88 coupled to respective phases 64-68 of DC-to-AC voltage inverter 50. In one embodiment, electromechanical device 82 is a traction motor and electromechanical device 74 is either an alternator or a traction motor. Although the propulsion system 10 illustrated in FIG. 1 includes three-phase inverters 48, 50 and three-phase electromechanical devices 74, 84, it is contemplated that propulsion system 10 may utilize any number of phases in alternative embodiments.

[0026] According to one embodiment, electromechanical device 82 and associated DC-to-AC voltage inverter 50 are sized to provide and accept high power levels and operate at higher speeds than electromechanical device 74 and associated DC-to-AC voltage inverter 48. To minimize system losses, especially during high speed, high power operation, the DC link voltage of B channel 20 may be decoupled from the voltage of energy storage system 12 and may be controlled to be at a higher voltage than the DC link voltage of A channel 14. As one non-limiting example, electromechanical device 74 may be designed for a DC link voltage of approximately 400 V, with DC-to-AC voltage inverter 48 having switching devices rated for approximately 650 V, while electromechanical device 82 is designed to operate at a boosted DC link voltage of approximately 630 V, with DC-to-AC voltage inverter 50 having switching devices rated for 900 V or 1200 V or possibly higher voltage of 1800 V. In addition, because the DC link voltage of the B channel is decoupled from the DC link voltage of the A channel, the operation of DC-to-AC voltage inverter 48 and excitation of electromechanical device 74 may further be optimized to achieve desired operating characteristics.

[0027] Propulsion system 10 also includes a transmission 90 coupled to the outputs of electromechanical device 74 and electromechanical device 82. Transmission 90 is constructed as a gear assembly, belt assembly, or combination thereof according to

various embodiments. According to one embodiment, transmission 90 is configured as an electrically variable transmission (EVT) that couples the outputs of electromechanical devices 74, 82 through an arrangement of planetary gears and clutches (not shown). In operation, electromechanical devices 74, 82 may be operated over a wide range of bi-directional speed, torque, and power commands to minimize power loss and maintain a high degree of overall system efficiency while operating in either a charge depleting (CD) or charge sustaining (CS) mode of operation.

[0028] The output of transmission 90 is coupled to one or more driving wheels or axles 92 of a vehicle (not shown) through a gear assembly 94, which may include a differential. Depending on how the clutches of transmission 90 are configured, electromechanical device 82 may be coupled to gear assembly 94 through transmission 90 or may be directly coupled to gear assembly 94 such that the output of electromechanical device 82 bypasses transmission 90.

[0029] Propulsion system 10 also includes a controller 96 operably coupled to half phase modules 44, 46 of bi-directional DC-DC voltage converters 30, 32 by control lines 98. Through appropriate control of switches 36, 38 of voltage converters 30, 32, controller 96 is configured to boost a voltage of energy storage system 12 to a higher voltage and to supply the higher voltage to A channel DC bus 16. Likewise, controller 96 is configured to control switching of bi-directional DC-DC voltage converter 32 to boost the voltage of energy storage system 12 to a higher voltage and to supply the higher voltage to B channel DC bus 22. In some modes of operation, DC bus 22 may operate at a higher voltage than DC bus 16. In other modes, DC bus 16 and DC bus 22 may be operated at the same voltage. Controller 96 is also configured to control switches 36, 38 of respective voltage converters 30, 32 to buck a voltage of A channel DC bus 16 and B channel DC bus 22 and to supply the bucked voltages to energy storage system 12.

[0030] Controller 96 is also coupled to half phase modules 52-62 of inverters 48, 50 by control lines 100. Controller 96, through appropriate control of half phase modules 52-62 in a motoring mode, is configured to control inverters 48, 50 to convert the DC

voltage or current on respective DC buses 16, 22 to an AC voltage or current for supply to windings 74-80, 84-88 of respective electromechanical devices 74, 82. In a regenerative mode, controller 96 is configured to control half phase modules 52-62 to invert an AC voltage or current received by respective inverters 48, 50 from its corresponding electromechanical device 74, 82 into a DC voltage or current to supply to A channel DC bus 16 or B channel DC bus 22.

[0031] In operation, controller 96 receives feedback from a number of sensors provided within propulsion system 10 via control lines 102. For example, voltage sensors 104, 106 may be provided on the A channel DC bus 16 and the B channel DC bus 22, respectively, to allow controller 96 to monitor the bus voltage of the A and B channels 14, 20. As one skilled in the art will recognize, additional voltage and/or current sensors may be provided throughout propulsion system 10 to permit controller 96 to monitor other operating conditions, such as, for example, the charging voltage of energy storage system 12. In addition, one skilled in the art will recognize that controller 96 may receive feedback from and/or transmit control commands to other components within propulsion system 10, such as, for example, internal combustion engine 108.

[0032] According to one embodiment propulsion system 10 is configured as a pure electric vehicle (EV) propulsion system. Alternatively, propulsion system 10 is configured in a hybrid electric vehicle (HEV) propulsion system and also includes an internal combustion engine 108 (shown in phantom) coupled to transmission 90. According to various embodiments, internal combustion engine 108 may be an internal combustion gasoline engine, an internal combustion diesel engine, an internal combustion engine fueled by natural gas, an external combustion engine, or a gas turbine engine, as examples.

[0033] Referring now to FIG. 2, a dual-channel propulsion system 110 is illustrated according to an alternative embodiment that includes a vehicle accessory load or auxiliary load 112. Elements and components common to propulsion system 10 and propulsion system 110 are referred to herein with similar part numbering. Similar to

propulsion system 10, propulsion system 110 includes an electromechanical device 82 coupled to the B channel 20 through DC-to-AC voltage inverter 50. Propulsion system 110 also includes a bi-directional DC-DC voltage converter 30 configured to selectively boost a voltage of energy storage system 12 to a bus voltage of B channel DC bus 22 during a motoring mode and buck a voltage B channel DC bus 22 to a voltage of energy storage system 12 during a regenerative or recharging mode.

[0034] In addition to B channel 20, the dual-channel DC bus assembly of propulsion system 110 includes a second channel or C channel 114 that is connected to an auxiliary load 112 through a DC-to-AC voltage inverter 116, which like DC-to-AC voltage inverter 50, includes six half phase modules 118, 120, 122, 124, 126, 128 paired to form respective phases 130, 132, 134. As illustrated in FIG. 2, C channel 114 includes a C channel DC bus 136 having a C channel positive DC link 138 coupled to the positive terminal 26 of energy storage system 12 through an optional DC-DC converter 142 (shown in phantom) and a C channel negative DC bus 140 coupled to the negative terminal 28 of energy storage system 12.

[0035] In one embodiment, energy storage system 12 is sized such that positive terminal 26 of energy storage system 12 may be directly coupled to C channel DC bus 136. Alternatively, an optional bi-directional DC-DC voltage converter 142 (shown in phantom), similar to bi-directional DC-DC voltage converter 30 (FIG. 1), is coupled to the C channel DC bus 136.

[0036] The auxiliary load 112 of propulsion system 110 is coupled to an electromechanical device 144 having a plurality of windings 146, 148, 150, which are coupled to respective phases 130, 132, 134 of DC-to-AC voltage inverter 116. Auxiliary load may be a pump, heater, cooling fan, electrically powered air conditioning unit a pneumatic or other fluid compressor unit, as non-limiting examples. In a direct-drive embodiment, electromechanical device 144 is directly coupled to auxiliary load 112. In alternative embodiments including a gear or belt-driven device such as, for example, a high speed motor running a pump, electromechanical device 144 may be

coupled to auxiliary load 112 via an optional gear or belt assembly component 152 (shown in phantom).

[0037] Optionally, propulsion system 110 may include one or more electrical auxiliary loads 154 (shown in phantom) coupled to the C channel positive and negative DC links 138, 140. According to an exemplary embodiment, electrical auxiliary load(s) 154 may include high-power electrical loads such as, for example, resistive heating elements.

[0038] Propulsion system 10 (FIG. 1) and propulsion system 110 (FIG. 2) are described above as including two channels, an A channel 14 and B channel 20 both coupled to a transmission 90 in the case of propulsion system 10 and an A channel 14 coupled to a transmission 90 and a C channel 114 coupled to an auxiliary load 112 in the case of propulsion system 110. Alternative embodiments may include more than two DC bus channels, with two or more channels coupled to the vehicle transmission and one or more DC bus channels coupled to auxiliary loads. As one example, the propulsion system 156 of FIG. 3 includes A channel 14 and B channel 20 coupled to transmission 90 via respective electromechanical devices 74, 82 and C channel 114 coupled to auxiliary load 112 via electromechanical device 144. In the embodiment shown, the positive DC links 18, 24, 138 of each channel are coupled to the positive terminal 26 of energy storage system 12. As described with respect to FIGS. 1 and 2, bi-directional DC-DC voltage converter assembly 32 of A channel 14 and/or bi-directional DC-DC voltage converter 142 of C channel DC bus 136 are optional components and may be omitted based on the sizing of energy storage system 12.

[0039] FIG. 4 is a schematic diagram of a propulsion system 158 according to another embodiment of the invention. Elements and components common to propulsion systems 10 and 158 will be discussed relative to the same reference numbers as appropriate. In addition to the components common with propulsion system 10, propulsion system 158 differs from propulsion system 10 in that it includes a first energy storage system 160 and a second energy storage system 162 instead of the single energy storage system 12 of FIG. 1.

[0040] As shown in FIG. 4, first and second energy storage systems 160, 162 are connected by a common negative DC link 164 coupled to the respective negative terminals 166, 168 of the energy storage systems 160, 162. The positive terminal 170 of first energy storage system 160 is coupled to the A channel positive DC link 18 through DC-DC converter 32 and the positive terminal 172 of second energy storage system 162 is coupled to the B channel positive DC link 24 through DC-DC converter 30.

[0041] According to one embodiment, first energy storage system 160 is a high specific-power energy storage device and second energy storage system 162 is a high specific-energy storage device. First energy storage system 160 may be, for example, an ultracapacitor having multiple capacitor cells coupled to one another, where the capacitor cells may each have a capacitance that is greater than approximately 500 Farads. Alternatively, first energy storage system 160 may be a high power battery having a specific-power of approximately 350 W/kg or greater or a combination of one or more ultracapacitors and batteries. In embodiments where first energy storage system 160 is an ultracapacitor, first bi-directional DC-DC voltage converter 32 is included on the A channel 14. Alternatively, where first energy storage system 160 is a battery, optional first bi-directional DC-DC voltage converter 32 (shown in phantom) may optionally be omitted based on the sizing of first energy storage system 160.

[0042] Second energy storage system 162 has a relatively low specific power as compared with first energy storage system 160. As used herein, low specific power describes an energy storage device demonstrated to achieve a specific power on the order of approximately 200 W/kg or lower. According to various embodiments, second energy storage system 162 may be, for example, a high specific energy battery or high energy density battery. The term energy battery used herein describes a high specific energy battery or high energy density battery demonstrated to achieve an energy density on the order of 100 W-hr/kg or greater (e.g., a Li-ion, sodium-metal halide, sodium nickel chloride, sodium-sulfur, Li-Air, or zinc-air battery).

[0043] In one embodiment, second energy storage system 162 has a relatively high resistivity and impedance as compared with first energy storage system 160. In another

embodiment, the relatively low specific power of second energy storage system 162 may be due to an imbalance of the individual battery cells comprising the energy storage system. In one embodiment, second energy storage system 162 is a low-cost lithium ion battery. Alternatively, second energy storage system 162 may be a sodium metal halide battery, a sodium sulfur battery, a nickel metal halide battery, a Zinc-air battery, a lead acid battery, and the like.

[0044] In embodiments where first energy storage system 160 is configured as a power battery, propulsion system 158 may be incorporated into a transit bus, as an example. In yet another embodiment, first and second energy storage systems 160, 162 are both configured as high specific-energy storage devices.

[0045] By configuring propulsion system 158 with a separate energy storage system for each channel of the multi-channel DC bus assembly (e.g., first energy storage system 160 for the A channel 14 and second energy storage system 162 for the B channel 20), the energy storage systems 160, 162 may be individually sized for its respective channel to minimize the size, weight, and cost of the overall propulsion system 158 and account for the differing roles that the electromechanical devices 74, 82 may play in the propulsion system 158. For example, electromechanical device 74 may be operated to provide high power during acceleration periods whereas electromechanical device 82 may be operated to provide a longer-lasting power to the vehicle to increase a traveling distance thereof. Accordingly, because the peak power of the A channel 14 may be two or more times greater than the peak power of B channel 20, the first and second energy storage systems 160, 162 may be individually sized accordingly.

[0046] Control over the DC link voltage for each respective channel is provided by the respective bi-directional DC-DC voltage converter 30, 32. In addition, propulsion system 158 may be controlled to further optimize efficiency and cost while meeting peak power demands during operation and managing usable energy from first and second energy storage systems 160, 162 for various vehicle drive cycles. The inclusion of separate first and second energy storage systems 160, 162 may also lead to additional

savings in the power electronics and passive components included the first and/or second bi-directional DC-DC voltage converters 30, 32 as well as the power electronic modules and passive components in one or both of the energy storage systems 160, 162. In addition, the inclusion of a separate energy storage system for each channel may result in improved operating efficiency by permitting the one or more of the energy storage systems 160, 162 to be operated at a lower voltage than a system that includes a single energy storage system sized to meet the peak power demands of multiple channels, such as energy storage system 12 of FIG. 1 that is sized to meet the peak power demand of both the A and B channels 14, 20.

[0047] Optionally, propulsion system 158 includes a switching element or coupling device 174 (shown in phantom) positioned between the positive DC links 18, 24 of A channel 14 and B channel 20. According to various embodiments, coupling device 174 may be constructed as an electromechanical switching device, a solid-state type switching device, a diode, a combination of a resistor and a contactor or solid-state switch, as non-limiting examples. Controller 96 is connected to coupling device 174 via control lines 176 and operates coupling device 174 in an open state or a closed state so that the A and B channels 14, 20 may be operated at different DC link voltages during certain modes of operation and selectively coupled together to operate at the same DC link voltage during other operating modes. For example, during a motoring mode of operation, coupling device 174 may be configured in an open state to permit the A channel 14 to operate at a lower DC link voltage than the B channel 20 so that electromechanical device 82 can run efficiently at a higher operating voltage than electromechanical device 74. In addition, during a regenerative braking event or during an engine recharging event of one of the energy storage systems 162, 160, controller 96 may be configured to close coupling device 174 such that AC voltage or current generated by electromechanical device 74, inverted into a DC voltage or current by DC-to-AC voltage inverter 48 and supplied to second bi-directional DC-DC voltage converter assembly 30 to recharge second energy storage system 162.

[0048] Referring now to FIG. 5, a propulsion system 178 is illustrated according to another embodiment of the invention. Elements and components of propulsion system

178 common to propulsion systems 10, 158 will be discussed relative to the same reference numbers as appropriate.

[0049] Similar to propulsion system 158 of FIG. 4, propulsion system 178 includes a first energy storage system 180 and a second energy storage system 182, which may be individually sized based on the peak power demand of its respective channel 14, 20 thereby permitting a reduction in the size, overall weight, and cost of the propulsion system. In addition, first energy storage system 180 may be selected to have a higher specific power (and lower internal impedance) than second energy storage system 182, which may be sized for a higher nominal voltage than first energy storage system 180. Accordingly, in one embodiment, first energy storage system 180 is configured as a high specific-power energy storage device similar to first energy storage system 160 (FIG. 4) and second energy storage system 182 is configured as a high specific-energy storage device similar to second energy storage system 162 (FIG. 4).

[0050] Unlike the configuration of propulsion system 158 of FIG. 4, however, first energy storage system 180 and second energy storage system 182 of propulsion system 178 are arranged in a series configuration, as shown in FIG. 5, with the positive terminal 184 of first energy storage system 180 coupled to the negative terminal 186 of second energy storage system 182. As shown, the positive terminal 188 of second energy storage system 182 is connected to first bi-directional DC-DC voltage converter 30 and the negative terminal 190 of first energy storage system 180 is connected to A channel negative DC link 70 and also connected to B channel negative DC link 72. By connecting first and second energy storage systems 180, 182 in series, the power sharing between energy storage systems 180, 182 is a function of the relative voltages of the two energy storage systems. In other words, the power out of each energy storage system 180, 182 is a function of the voltage of the respective energy storage system 180, 182 as a result of the series configuration. Because the series connection of energy storage systems 180, 182 allows the relative voltages of the two systems to be summed, energy storage systems 180, 182 may be sized to have lower voltages than a propulsion system with a single energy storage system with a comparable overall voltage output, such as that shown in FIG. 1.

[0051] In operation, the state of charge (SOC) of both first energy storage system 180 and second energy storage system 182 is maintained within prescribed thresholds and within a prescribed operating range via the switching commands that the controller 96 transmits to the first and second bi-directional DC-DC voltage converter 30, 32. Independent control over the DC link voltages of the A channel 14 and B channel 20 are provided by bi-directional DC-DC voltage converter 30, 32 and associated loads from DC-to-AC voltage inverters 48, 50 and electromechanical devices 74, 82.

[0052] Optionally, propulsion system 178 may also include optional coupling device 174 (shown in phantom) positioned between the positive DC links 18, 24 of A channel 14 and B channel 20. Coupling device 174 may be operated by controller 96 in a similar manner in propulsion system 178 as described above with respect to propulsion system 158, so that the DC link voltages of the A and B channels 14, 20 are the same during certain modes of operation and differ during other operating modes.

[0053] FIG. 6 illustrates a propulsion system 192 according to yet another embodiment of the invention. As propulsion system 192 includes many of the same components and elements of propulsion system 178 of FIG. 5, elements and components common to systems 178 and 192 will be discussed relative to the same reference numbers as appropriate.

[0054] In addition to the components common with propulsion system 178, propulsion system 192 includes a coupling device 194 that replaces the bi-directional DC-DC voltage converter 32 of propulsion system 178 on the A channel 14 and that is controlled by controller 96 via control lines 196. Similar to coupling device 174, coupling device 194 may be constructed as an electromechanical switching device, a solid-state type switching device, a diode, a combination of a resistor and a contactor or solid-state switch, as non-limiting examples. Because coupling device 194 is a lower cost component than a bi-directional DC-DC voltage converter, propulsion system 192 may be manufactured at a lower cost than propulsion system 178 of FIG. 5. Further, because coupling device 194 operates at a higher efficiency than a bi-directional DC-

DC voltage converter, replacing the A channel bi-directional DC-DC voltage converter 32 of FIG. 1 with coupling device 194 increases the overall efficiency of propulsion system 192.

[0055] Similar to propulsion system 178 of FIG. 5, propulsion system 192 includes first and second energy storage systems 180, 182 arranged in series such that positive terminal 184 of first energy storage system 180 is coupled to negative terminal 186 of second energy storage system 182. First energy storage system 180 is sized based on the desired acceleration of the propulsion system 192 whereas second energy storage system 182 is sized based on the desired distance of travel while operating using the electric drive. In the embodiment illustrated in FIG. 6, first energy storage system 180 is configured as a power battery, rather than an ultracapacitor, in order to maintain a DC link voltage for DC-to-AC voltage inverter 48 within a threshold value of a predetermined nominal voltage when coupling device 194 is closed. In addition, the nominal voltage of first energy storage system 180 is selected such that the normal operating voltage range of first energy storage system 180 is within a threshold value of the optimized DC link voltage for the A channel 14 that is determined based on the design parameters of electromechanical device 74.

[0056] Referring to FIG. 7, a dual-channel propulsion system 198 is shown according to yet another embodiment. Elements common to propulsion systems 10, 198 are referred to with similar numbering. Similar to propulsion system 10 of FIG. 1, propulsion system 198 includes a single energy storage system 200 coupled to both the A channel 14 and the B channel 20. Similar to energy storage system 12 (FIG. 1), energy storage system 200 may be a high-voltage or high-power energy storage device and may be a battery, a flywheel system, fuel cell, an ultracapacitor, or a combination of ultracapacitors, fuel cells, and/or batteries, according to various embodiments. As shown, the positive terminal 202 of energy storage system 200 is coupled to B channel positive DC link 24 through first bi-directional DC-DC voltage converter 30. The A channel positive DC link 18 is coupled to the positive terminal 202 of through second bi-directional DC-DC voltage converter assembly 32.

[0057] An optional bypass contactor 204 (shown in phantom) is included on the A channel 14 between energy storage system 200 and DC-to-AC voltage inverter 48. According to various embodiments, bypass contactor 204 may be constructed as an electromechanical switching device, a solid-state type switching device, a diode, a combination of a resistor and a contactor or solid-state switch, as non-limiting examples.

[0058] In one embodiment, energy storage system 200 is sized such that positive terminal 202 of energy storage system 200 may be directly coupled to A channel positive DC link 18 through an optional bypass contactor. Alternatively, an optional bi-directional DC-DC voltage converter assembly 32 (shown in phantom) is coupled to the A channel DC bus 16. In this embodiment, at least one of optional DC-DC converter 32 or optional bypass contactor 204 is utilized.

[0059] Controller 96 is connected to bypass contactor 204 via control lines 206. In certain operating modes controller 96 operates bypass contactor 204 in an open state, thereby creating a power flow path between energy storage system 200 and DC-to-AC voltage inverter 48 that travels through optional bi-directional DC-DC voltage converter assembly 32, which is controlled by controller 96 to boost the voltage of energy storage system 200 to the voltage of the A channel DC bus 16. In other operating modes, controller 96 operates the optional bypass contactor 204 in a closed state to create a power flow path between energy storage system 200 and DC-to-AC voltage inverter 48 that bypasses optional bi-directional DC-DC voltage converter assembly 32. When bypass coupling device 204 is operated in a closed state to bypass bi-directional DC-DC voltage converter assembly 32, propulsion system 198 experiences an improvement in efficiency over simply turning off chopping because the losses in bi-directional DC-DC voltage converter assembly 32 are eliminated.

[0060] As described above, embodiments of the invention utilize a multi-channel DC bus assembly configured to permit the individual DC bus channels to operate either at a common voltage or at different voltages while being connected to one or multiple common energy storage systems. In some embodiments, the outputs of

electromechanical devices coupled to respective channels of the DC bus assembly are coupled together through a common transmission assembly, such as an electrically variable transmission. Together, the electromechanical devices, DC-AC inverters, and bi-directional DC-DC converters associated with each channel of the multi-channel DC bus assembly along with the energy storage system(s) operate over a wide range of bi-directional speed, torque, and power that may be controlled to minimize power loss and maintain a high degree of overall system efficiency when the energy storage system(s) are operating in charge depleting and charge sustaining modes. Optionally, a heat engine may be coupled to the transmission assembly to maintain charge on the energy storage system(s) and an output of one or more of the DC bus channels may be coupled to an auxiliary load. Beneficially, the propulsion systems disclosed herein enable the energy storage system(s) to be designed to minimize size, weight, and cost while providing improved efficiency through independent control of the DC link voltage on each of the DC bus channels of the multi-channel DC bus assembly.

[0061] A technical contribution for the disclosed apparatus is that it provides for a controller implemented technique for boosting a voltage of an energy storage system to a boosted voltage and supplying the boosted voltage to a voltage bus.

[0062] According to one embodiment of the invention, an apparatus includes a multi-channel DC bus assembly comprising a first channel and a second channel, a first electromechanical device coupled to a positive DC link of the first channel, and a second electromechanical device coupled to a positive DC link of the second channel. A first DC-to-AC voltage inverter is coupled to the positive DC link of the first channel and a second DC-to-AC voltage inverter is coupled to the positive DC link of the second channel. The apparatus further includes a bi-directional voltage modification assembly coupled to the positive DC link of the second channel and a first energy storage system electrically coupled to the first electromechanical device.

[0063] In accordance with another embodiment of the invention, a method of fabricating a propulsion system includes coupling a first DC-to-AC voltage inverter to a first voltage bus, coupling a first electromechanical device to the first DC-to-AC voltage

inverter, and coupling a second DC-to-AC voltage inverter to a second voltage bus. The method also includes coupling a second electromechanical device to the second DC-to-AC voltage inverter, coupling a bi-directional DC-DC voltage converter to the second voltage bus, coupling a first energy storage system to the bi-directional DC-DC voltage converter, and programming a controller to control switching of the bi-directional DC-DC voltage converter to boost a voltage of the first energy storage system to a boosted voltage different from a voltage of the first voltage bus.

[0064] In accordance with yet another embodiment of the invention, a vehicle propulsion system includes a DC bus assembly having a first DC bus and a second DC bus. The vehicle propulsion system also includes a first bi-directional DC-to-DC voltage converter coupled to the first DC bus, a high specific-power energy storage device coupled to a low voltage side of the first bi-directional DC-to-DC voltage converter, a first electromechanical device coupled to the first DC bus through a first DC-to-AC voltage converter, and a second electromechanical device coupled to the second DC bus through a second DC-to-AC voltage converter. A controller is programmed to control the first bi-directional DC-to-DC voltage converter to boost a voltage of the first electromechanical device to a boosted voltage and supply the boosted voltage to the first DC bus, the boosted voltage different than a voltage of the second DC bus.

[0065] In accordance with yet another embodiment of the invention, a vehicle propulsion system includes a first electromechanical device coupled to a positive DC link of a first DC bus, an auxiliary load coupled to an output of the first electromechanical device and a first DC-to-AC voltage inverter coupled to the positive DC link of the first DC bus. A second electromechanical device is coupled to a positive DC link of a second DC bus and a transmission is coupled to an output of the second electromechanical device. The vehicle propulsion system also includes a second DC-to-AC voltage inverter coupled to the positive DC link of the second DC bus, an energy storage system electrically coupled to the positive DC link of the second DC bus, and a bi-directional voltage modification assembly coupled to the positive DC link of the

second DC bus and configured to boost a voltage of the first energy storage system to a voltage different from a voltage of the first DC bus.

[0066] While the invention has been described in detail in connection with only a limited number of embodiments, it should be readily understood that the invention is not limited to such disclosed embodiments. Rather, the invention can be modified to incorporate any number of variations, alterations, substitutions or equivalent arrangements not heretofore described, but which are commensurate with the spirit and scope of the invention. Additionally, while various embodiments of the invention have been described, it is to be understood that aspects of the invention may include only some of the described embodiments. Accordingly, the invention is not to be seen as limited by the foregoing description, but is only limited by the scope of the appended claims.

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. A system for a hybrid electric vehicle, comprising:
 - an energy storage system;
 - a first traction motor coupled to the energy storage system;
 - a second traction motor coupled to the energy storage system;
 - a transmission device coupled to the first traction motor, the transmission device comprising an arrangement of planetary gears;
 - a gear assembly coupled between the second traction motor and the transmission device such that the output of the second traction motor bypasses the transmission device;
 - an internal combustion engine coupled to the transmission device via a path that does not include the first traction motor and second traction motor;
 - and
 - a control system configured to selectively:
 - operate the first traction motor and second traction motor to drive the vehicle through the transmission device and gear assembly, respectively;
 - operate the first traction motor as a generator to generate electrical power while operating the second traction motor to drive the vehicle through the gear assembly; and
 - operate the second traction motor as a generator to generate electrical power.
2. The system of claim 1, further comprising a DC/DC converter coupled to the

energy storage device.

3. The system of claim 2, further comprising a second energy storage system coupled to the DC/DC converter.
4. The system of claim 1, wherein the energy storage system comprises a battery.
5. The system of claim 1, further comprising a wheel/axle assembly coupled to the gear assembly.
6. The system of claim 1, further comprising:
 - a first inverter coupled between the energy storage device and first traction motor; and
 - a second inverter coupled between the energy storage device and second traction motor.
7. The system of claim 1, wherein the electrical power generated by the first traction motor is provided to the second traction motor.
8. The system of claim 1, wherein the electrical power generated by the second traction motor is provided to the energy storage system.
9. A vehicle propulsion system, comprising:
 - an energy storage system;
 - a first traction drive system coupled to the energy storage system, the first traction drive system comprising a first inverter coupled to a first AC motor;

a second traction drive system coupled to the energy storage system, the second traction drive system comprising a second inverter coupled to a second AC motor;

a transmission device coupled to the first traction drive system, the transmission device comprising an arrangement of planetary gears;

a gear assembly coupled between the second traction drive system and the transmission device such that the output of the second traction motor bypasses the transmission device;

an internal combustion engine coupled to the transmission device via a path that does not include the first AC motor and second AC motor; and

a control system configured to selectively:

operate the first traction drive system and second traction drive system to drive the vehicle through the transmission device and gear assembly, respectively;

operate the first traction drive system to generate electric power while operating the second traction drive system to drive the vehicle through the gear assembly; and

operate the second traction drive system to generate electric power.

10. The system of claim 9, further comprising a DC/DC converter coupled to the energy storage device.

11. The system of claim 10, further comprising a second energy storage system coupled to the DC/DC converter.

12. The system of claim 9, wherein the energy storage system comprises a

battery.

13. The system of claim 9, further comprising a wheel/axle assembly coupled to the gear assembly.

14. The system of claim 9, wherein the electrical power generated by the first traction drive system is provided to the second traction drive system.

15. The system of claim 9, wherein the electrical power generated by the second traction drive system is provided to the energy storage system.

16. A hybrid electric vehicle propulsion system, comprising:

- an energy storage system;

- a first electric motor coupled to the energy storage system;

- a second electric motor coupled to the energy storage system;

- a transmission device coupled to the first electric motor, the transmission device comprising an arrangement of planetary gears;

- a gear assembly coupled between the second electric motor and the transmission device such that the output of the second electric motor bypasses the transmission device;

- an internal combustion engine coupled to the transmission device; and

- a control system configured to selectively:

- operate the first electric motor and second electric motor to drive the vehicle through the transmission device and gear assembly, respectively;

- operate the first electric motor as a generator to generate electrical power while operating the second electric motor to drive the

vehicle through the gear assembly; and
operate the second electric motor as a generator to generate
electrical power.

17. The system of claim 16, further comprising a DC/DC converter coupled to the
energy storage device.

18. The system of claim 16, further comprising a wheel/axle assembly coupled to
the gear assembly.

19. The system of claim 16, wherein the electrical power generated by the first
electric motor is provided to the second electric motor.

20. The system of claim 16, wherein the electrical power generated by the second
electric motor is provided to the energy storage system.

**VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS
AND METHOD OF MANUFACTURING SAME**

ABSTRACT

An apparatus includes a multi-channel DC bus assembly comprising a first channel and a second channel, a first electromechanical device coupled to a positive DC link of the first channel, and a second electromechanical device coupled to a positive DC link of the second channel. A first DC-to-AC voltage inverter is coupled to the positive DC link of the first channel and a second DC-to-AC voltage inverter is coupled to the positive DC link of the second channel. The apparatus further includes a bi-directional voltage modification assembly coupled to the positive DC link of the second channel and a first energy storage system electrically coupled to the first electromechanical device.

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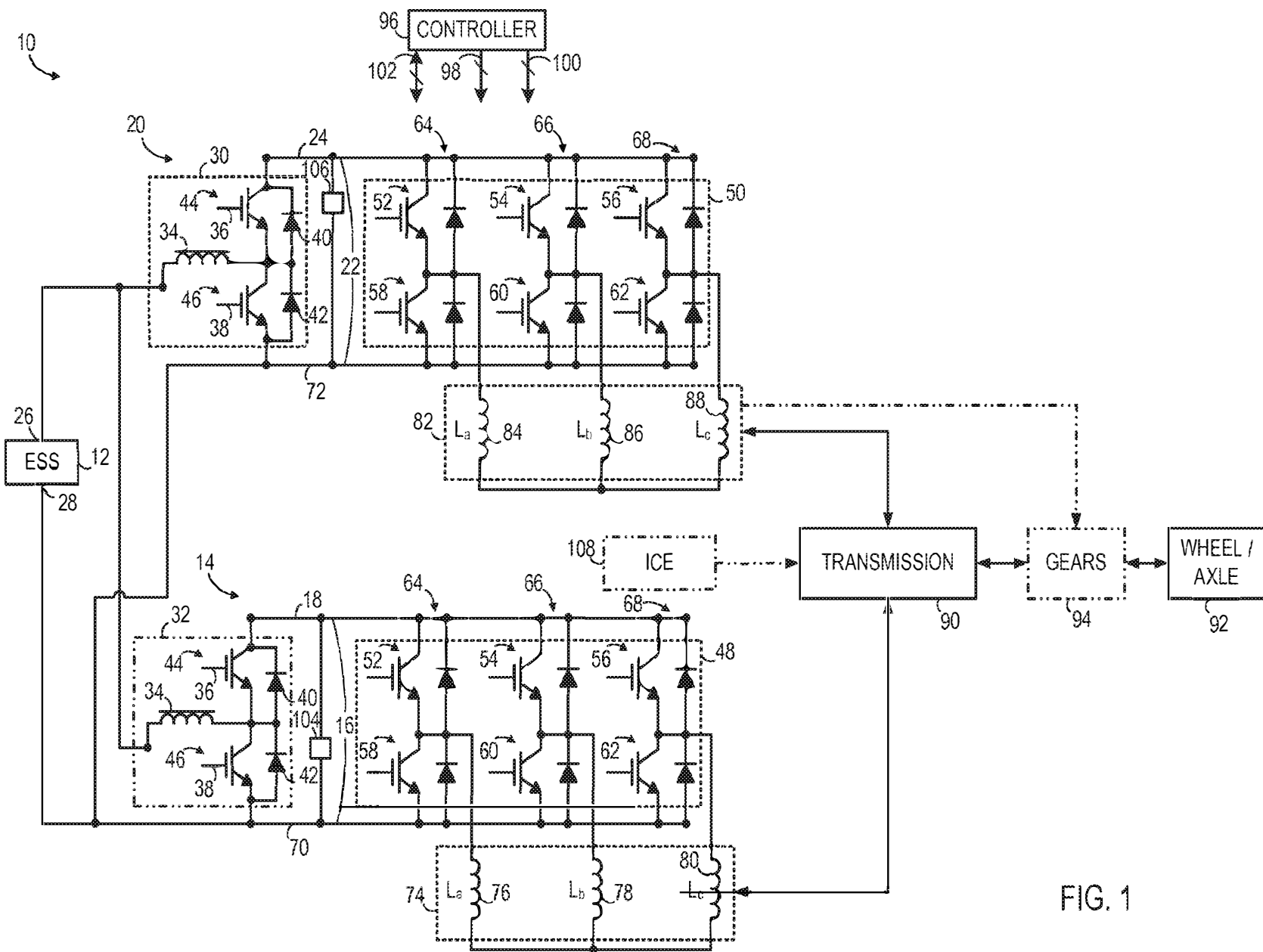
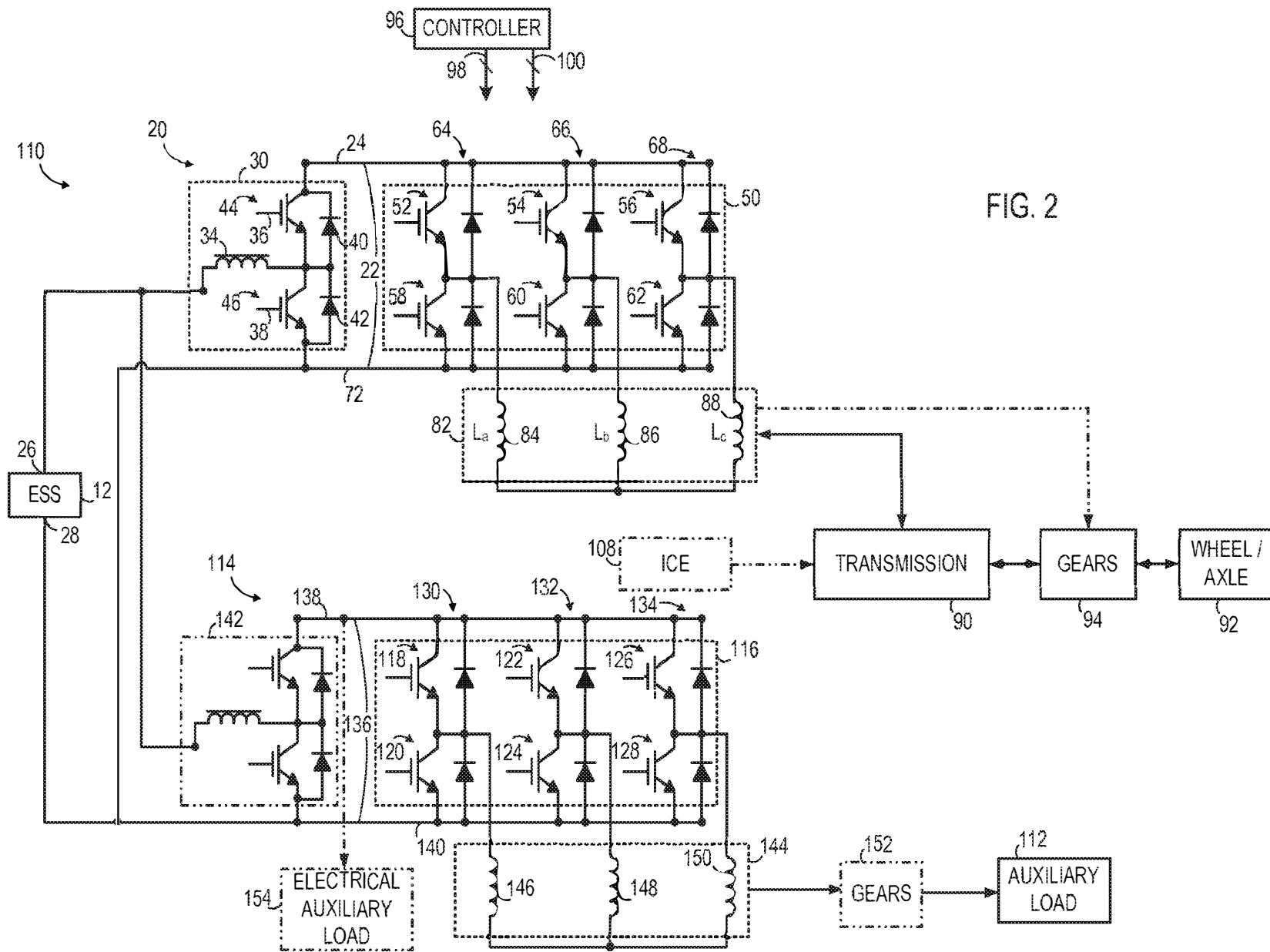


FIG. 1

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FIG. 2

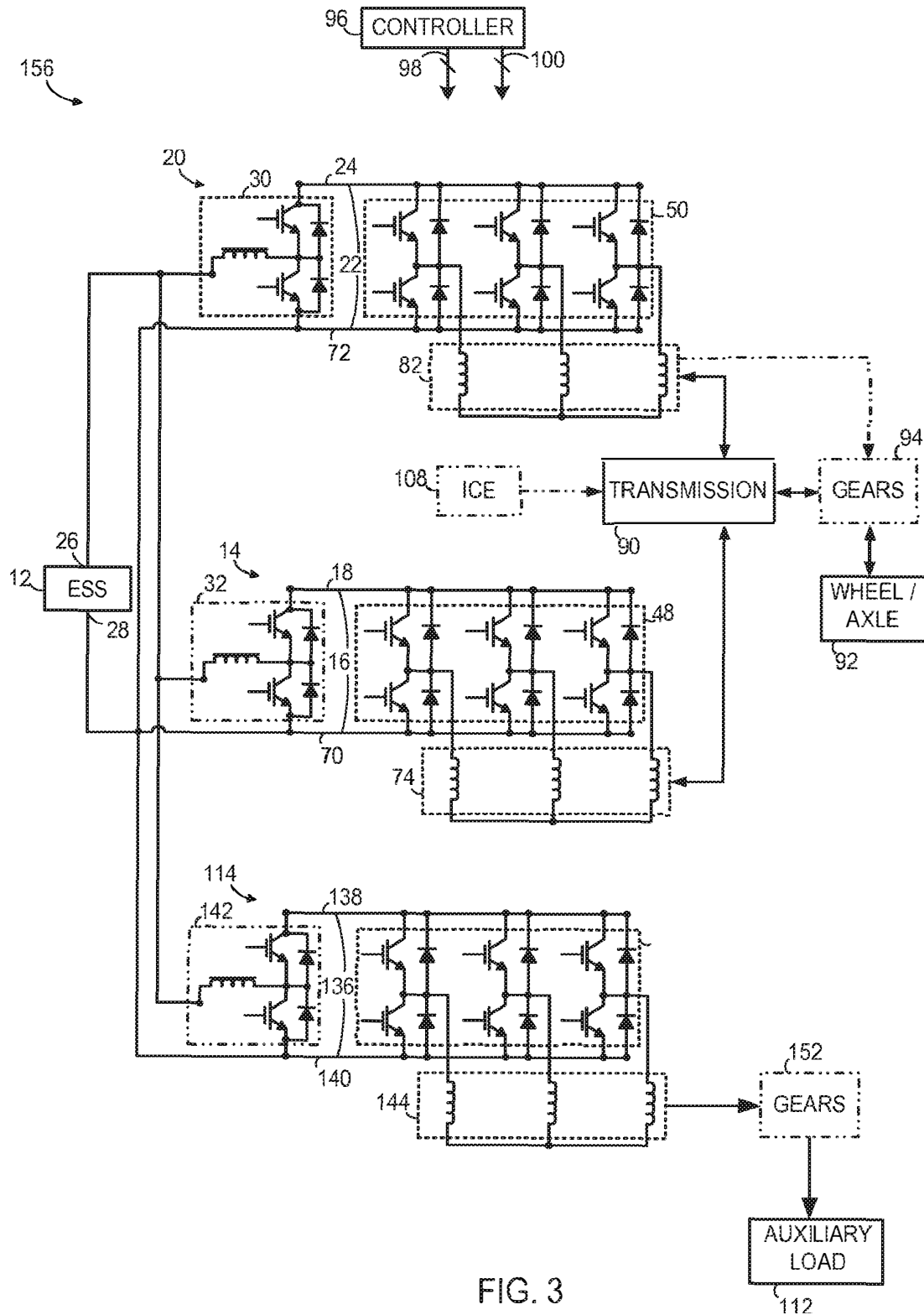


TITLE: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS
AND METHOD OF MANUFACTURING SAME

INVENTOR(S): Robert Dean King et al.

DOCKET NO.: 273252-1 (GEL8083.212)

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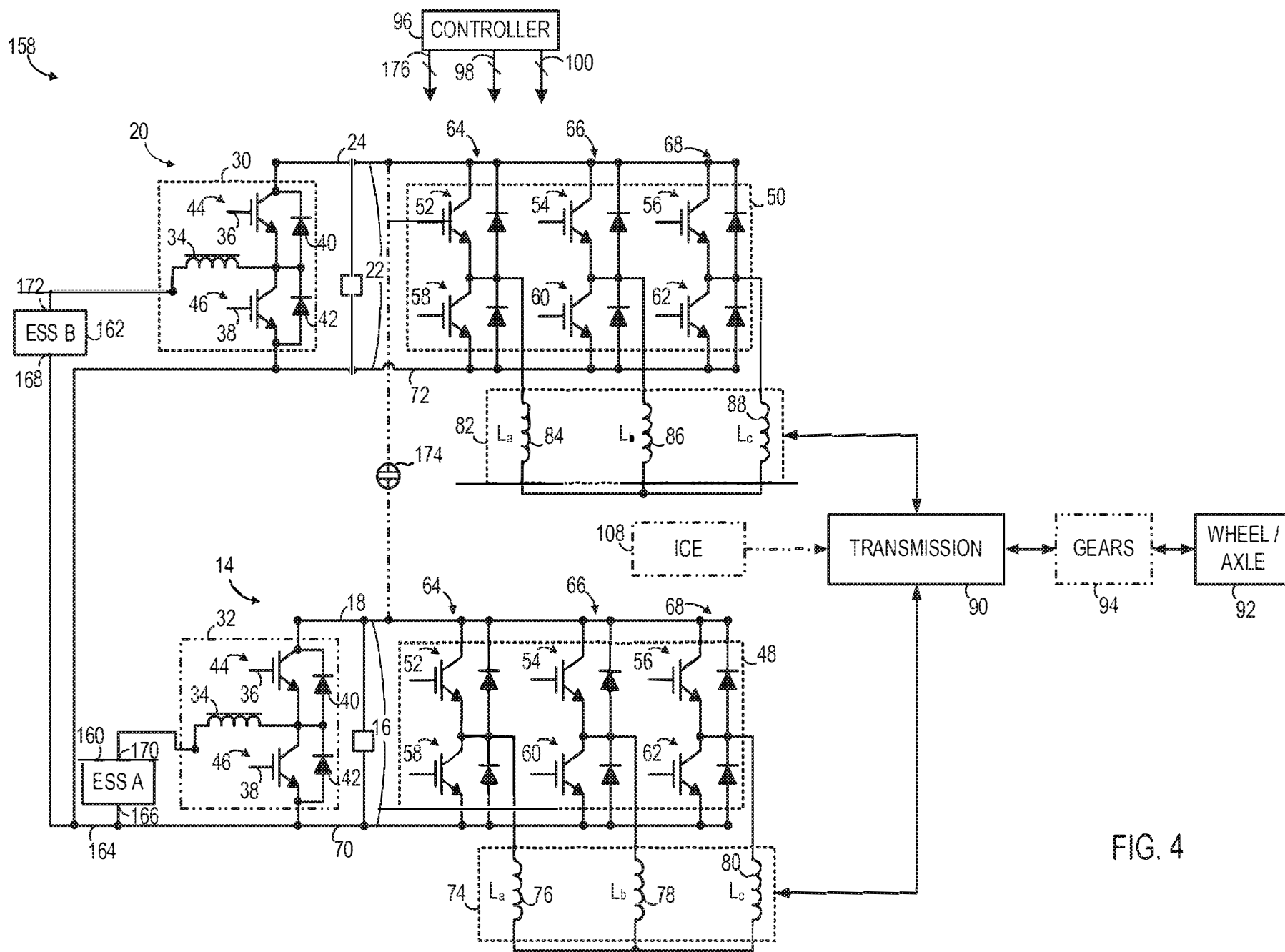


FIG. 4

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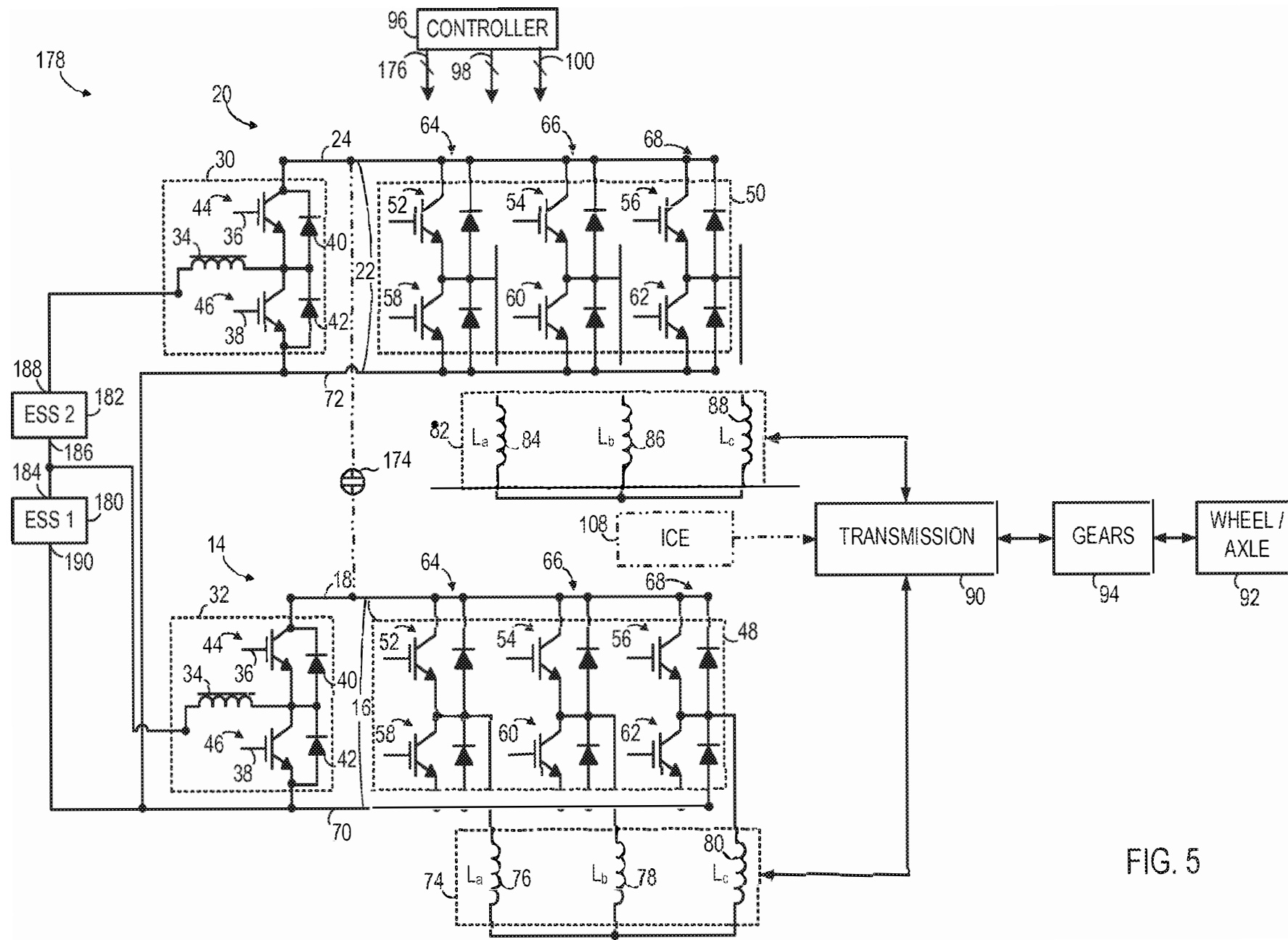


FIG. 5

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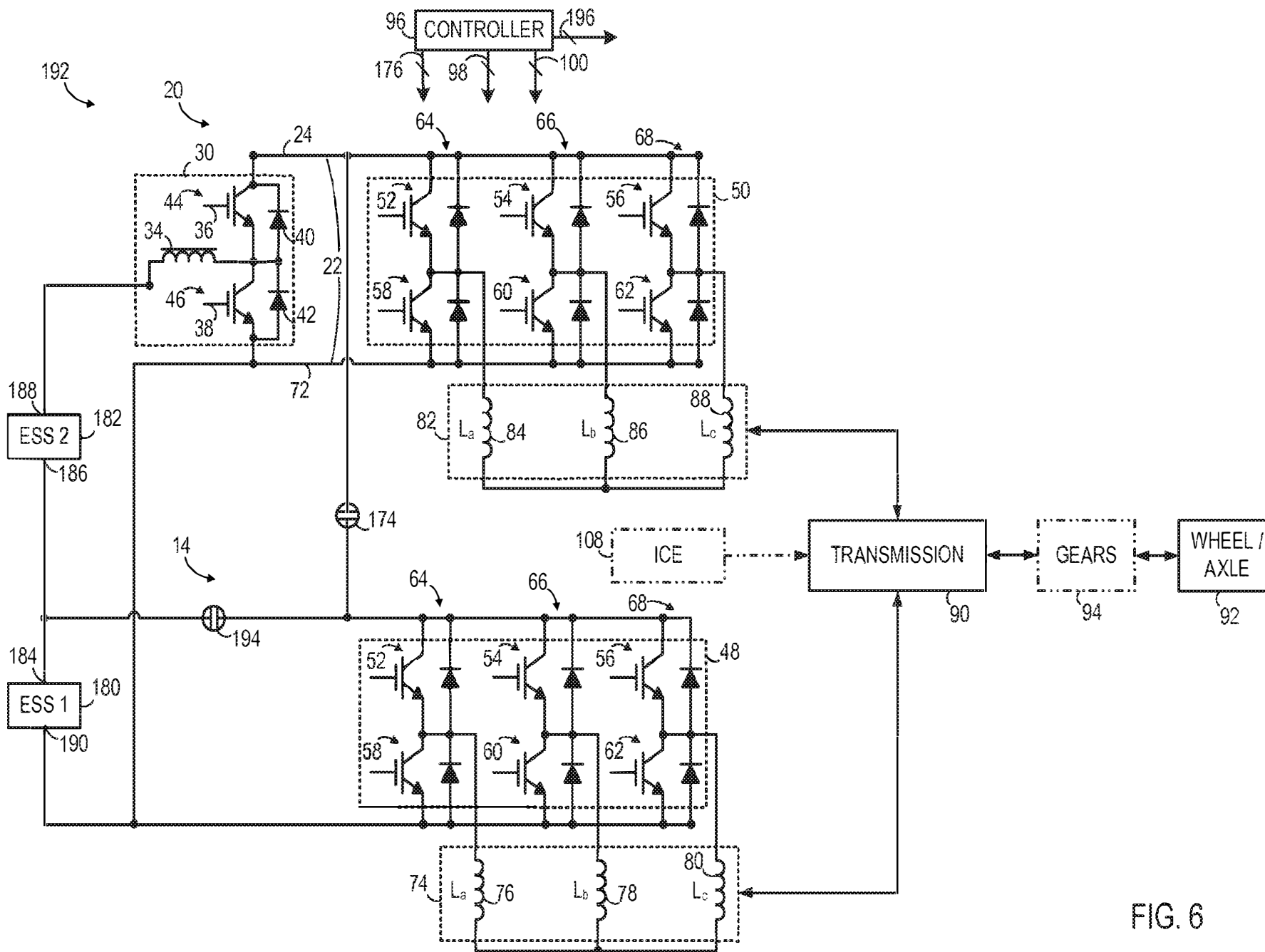


FIG. 6

**COMBINED DECLARATION AND GLOBAL ASSIGNMENT
FOR UTILITY PATENT APPLICATION**

As the below named inventor(s), I/we hereby declare that:

This declaration and assignment is directed to:

**TITLE: VEHICLE PROPULSION SYSTEM WITH MULTI-CHANNEL DC BUS AND
METHOD OF MANUFACTURING SAME**

☐ the specification of which is attached hereto OR

☒ was filed on January 30, 2014 as Application Serial No. 14/168,224 or

PCT International Application Number _____ and was amended on { _____ } (if applicable).

(We hereby authorize and request the Company or its delegated attorneys or agents to insert above the application number and filing date of the application when known.)

The above-identified application was made or authorized to be made by us.

We believe that we are original joint inventors of a claimed invention in the application.

We hereby acknowledge that any willful false statement made in this declaration is punishable under 18 USC § 1001 by fine or imprisonment of not more than five (5) years, or both.

We have reviewed and understand the contents of the above-identified application, including the claims, as amended by any amendment referred to above.

We acknowledge the duty to disclose information which is material to the patentability of this application as defined in 37 CFR § 1.56, including, for continuation-in-part applications, material information which became available between the filing date of the prior application and the filing date of the continuation-in-part application.

Combined Declaration & Assignment

GETL v1.0 9/18/12

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In accordance with our obligation(s) under an Employee Innovation and Proprietary Information Agreement or (as applicable) arising out of other agreements (such as, but not limited to, the Services Agreement between General Electric Company, a New York Corporation, and our employers), and/or for other good and valuable consideration of which we acknowledge receipt, I/we,

Robert Dean King of Schenectady, NY, US
 Zhihao Li of Rexford, NY, US

hereby sell and assign to **GENERAL ELECTRIC COMPANY, a New York Corporation**, (hereinafter referred to as Company) having an address at 1 River Road, Schenectady, New York 12345, USA, its successors and assigns our entire right(s), title(s), and interest(s) in and to the invention and improvements made or conceived by us and described in the application(s) listed above and in the following table:

Country of Filing	Type of Filing	Application Number	Filing Date	Title

(We hereby authorize and request the Company or its delegated attorneys or agents to insert above the application number and filing date of the application(s) when known.)

and any and all applications for patent and patents therefrom in any and all countries, including all divisions, continuations, continuations-in-part, reexaminations, renewals, and reissues thereof, and all rights of priority resulting from the filing of the application(s), and authorize and request any official whose duty it is to issue patents, to issue any patent on the inventions and improvements resulting therefrom to the Company, or its successors or assigns, and agree that on request and without further consideration, we will communicate to the Company or its representatives or nominees any facts known to us respecting the inventions and improvements and testify in any legal proceeding, make all rightful oaths, sign all lawful papers and execute all instruments or documents required or requested for the making and prosecution of any applications of any type for patent, utility model, or other similar rights in all countries including, but not limited to, any provisional, non-provisional, continuation, continuation-in-part, divisional, renewal or substitute thereof, for any derivation proceedings relating thereto, and, as to any patents that issue from such applications, for any supplemental examination, derivation proceeding, opposition, post grant review, reissue, re-examination, inter partes review, or extension thereof, and generally do everything possible to aid the Company, its successors, assigns, and nominees to obtain and enforce proper patent protection for the invention and its improvements in all countries.

Remuneration claims of the inventor(s)/assignor(s) potentially arising from German Law on Employee Inventions, or any other respective country law, remain unaffected by this assignment.

Please direct all telephone calls to:

Jean K. Testa, (518) 387-5115

INVENTOR I

Signature: Robert Dean King
Name: Robert Dean King

Date: JAN 28, 2014

Witnessed by: Timothy G. Burton
Signature

Date: Jan 28, 2014

Timothy G. Burton
Printed Name of Witness

Witnessed by: Xu She
Signature

Date: Jan. 28, 2014

Xu She
Printed Name of Witness

SECTION BELOW IS FOR USE ONLY IF SIGNING IN PRESENCE OF A NOTARY

Date: _____

Name: Robert Dean King

STATE OF _____

ss.

COUNTY OF _____

This _____ day of _____, _____ before me personally came the above-named Robert Dean King, to me personally known as the individual who executed the foregoing assignment, who acknowledged to me that he/she executed the same of his/her own free will for the purposes therein set forth.

Seal

(Notary Public)

INVENTOR 2

Signature: [Signature]

Name: Zhihao Li

Date: Jan 28, 2014

Witnessed by: Timothy G. Richter

Signature

Date: Jan 28, 2014

Timothy G. Richter

Printed Name of Witness

Witnessed by: Xu She

Signature

Date: Jan 28, 2014

Xu She

Printed Name of Witness

SECTION BELOW IS FOR USE ONLY IF SIGNING IN PRESENCE OF A NOTARY

Date: _____

Name: Zhihao Li

STATE OF _____

ss.

COUNTY OF _____

This _____ day of _____, _____ before me personally came the above-named Zhihao Li, to me personally known as the individual who executed the foregoing assignment, who acknowledged to me that he/she executed the same of his/her own free will for the purposes therein set forth.

Seal

(Notary Public)