PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT8216008

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
SLACK TECHNOLOGIES, LLC	07/07/2023

RECEIVING PARTY DATA

Name:	SALESFORCE, INC.
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Internal Address:	415 MISSION STREET, 3RD FLOOR
City:	SAN FRANCISCO
State/Country:	CALIFORNIA
Postal Code:	94105

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16263781

CORRESPONDENCE DATA

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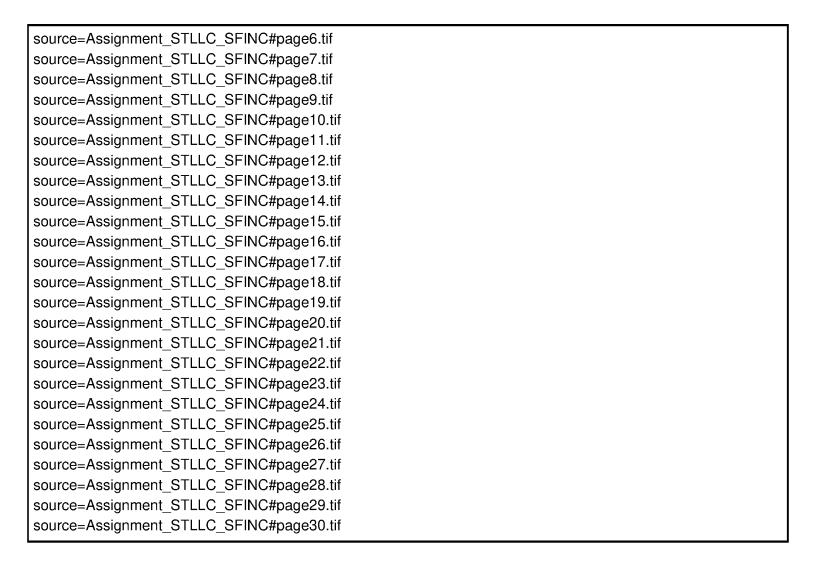
ATTORNEY DOCKET NUMBER:	P336 (93056.0754)
NAME OF SUBMITTER:	NATHAN J. MUTTER
SIGNATURE:	/Nathan J. Mutter/
DATE SIGNED:	10/11/2023

Total Attachments: 30

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> PATENT REEL: 065218 FRAME: 0869

508168827



ASSIGNMENT OF PATENTS AND APPLICATIONS

WHEREAS, Slack Technologies, LLC, a limited liability company of the state of Delaware having a place of business at 500 Howard Street, San Francisco, CA 94105 (hereinafter "ASSIGNOR"), is the owner of the patents and patent applications listed in the attached Schedule A ("the Patent Assets").

WHEREAS, Salesforce, Inc., a corporation of the state of Delaware, having a place of business at Salesforce Tower, 415 Mission Street, 3rd Floor, San Francisco, CA 94105 (hereinafter "ASSIGNEE") desires to purchase the entire right, title, and interest in and to the Patent Assets;

Effective July 7, 2023 (the "Effective Date"), and for valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor hereby sells, assigns, and transfers to Assignee, its successors, legal representatives and assigns, the entire right, title and interest in and to the Patent Assets, including (1) any divisionals, continuations, and continuations-in-part of the Patent Assets and any other applications claiming priority rights from the Patent Assets; (2) any reissues, reexaminations, or extensions of any of the Patent Assets; (3) all claims for damages and all remedies arising out of any violation of the rights assigned herein that may have accrued prior to the date of assignment to Assignee, or may accrue hereafter, including the right to sue for, collect, and retain, damages for past infringements, (4) the right to file international and foreign applications directly in the name of Assignee or otherwise; (5) the right to claim priority rights deriving from the Patent Assets; and (6) the right to apply for and obtain corresponding patent or similar protection throughout the world. Assignor requests the Commissioner of Patents to issue any patent that may be issued on the Patent Assets to Assignee.

The undersigned have duly executed this Patent Assignment as of the Effective Date.

ASSIGNOR:	ASSIGNEE:
Slack Technologies, LLC	Salesforce, Inc.
By: Joseph Osen	By: Joseph Asen
Joseph Olsen Name:	Joseph Olsen Name:
Title: Senior Director of IP	Title: Senior Director of IP

SCHEDULE A ASSIGNMENT OF PATENTS AND APPLICATIONS

Application No.	Filing Date	Status	Patent No.	Issue Date	Country	Title
15/963,636	4/26/18	Issued	10,506,032	12/10/19	US	AUTOMATED LOAD DISTRIBUTION FOR A GROUP-BASED COMMUNICATION PLATFORM
16/010,036	6/15/18	Issued	11,271,878	3/8/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INITIATING AND EXECUTING A GROUP BASED COMMUNICATION BROWSER SESSION AND RENDERING A GROUP BASED COMMUNICATION INTERFACE
17/588,608	1/31/22	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INITIATING AND EXECUTING A GROUP BASED COMMUNICATION BROWSER SESSION AND RENDERING A GROUP BASED COMMUNICATION INTERFACE
15/990,454	5/25/18	Issued	10,547,466	1/28/20	US	MULTIPLEXING MESSAGE DISTRIBUTION WITHIN GROUP-BASED COMMUNICATION SYSTEM
17/588,661	1/31/22	Published			US	MULTIPLEXING MESSAGE DISTRIBUTION WITHIN GROUP-BASED COMMUNICATION SYSTEM

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16/519,576	7/23/19	Issued	11,388,171	7/12/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INSTALLING AND UPDATING THIRD PARTY APPLICATIONS REQUIRING VARIABLE HOST ADDRESS IDENTIFICATION IN A GROUP-BASED COMMUNICATION SYSTEM
17/827,331	5/27/22	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INSTALLING AND UPDATING THIRD PARTY APPLICATIONS REQUIRING VARIABLE HOST ADDRESS IDENTIFICATION IN A GROUP-BASED COMMUNICATION SYSTEM
16/519,603	7/23/19	Issued	11,140,228	10/5/21	US	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR A GROUP-BASED COMMUNICATION SYSTEM INTERACTING WITH REMOTE RESOURCES FOR REMOTE DATA OBJECTS
19749534.4	3/24/21	Published			EP	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR A GROUP-BASED COMMUNICATION SYSTEM INTERACTING WITH REMOTE RESOURCES FOR REMOTE DATA OBJECTS
2021-507912	2/16/21	Issued	7093601	6/22/22	JP	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR A GROUP-BASED COMMUNICATION SYSTEM INTERACTING WITH REMOTE RESOURCES FOR REMOTE DATA OBJECTS

17/493,457	10/4/21	Allowed			US	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR A GROUP-BASED COMMUNICATION SYSTEM INTERACTING WITH REMOTE RESOURCES FOR REMOTE DATA OBJECTS
2022-097007	6/16/22	Published			JP	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR A GROUP-BASED COMMUNICATION SYSTEM INTERACTING WITH REMOTE RESOURCES FOR REMOTE DATA OBJECTS
16/049,175	7/30/18	Issued	10,795,816	10/6/20	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR IMPLEMENTING FILTER CACHE IN A GROUP-BASED COMMUNICATION PLATFORM
16/939,611	7/27/20	Issued	11,360,896	6/14/22	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR IMPLEMENTING FILTER CACHE IN A GROUP-BASED COMMUNICATION PLATFORM
17/752,496	5/24/22	Issued	11,645,205	5/9/23	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR IMPLEMENTING FILTER CACHE IN A GROUP-BASED COMMUNICATION PLATFORM
16/666,837	10/29/19	Issued	11,271,886	3/8/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR GROUP-BASED COMMUNICATION INTERFACE WITH EMAIL CHANNELING

						METHOD, APPARATUS,
PCT/US2019/058442	10/29/19	Published			WO	AND COMPUTER PROGRAM PRODUCT FOR GROUP-BASED COMMUNICATION INTERFACE WITH EMAIL CHANNELING
2021-548523	4/28/21	Issued	7220297	2/1/23	JP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR GROUP-BASED COMMUNICATION INTERFACE WITH EMAIL CHANNELING
19805829.9	5/28/21	Published			EP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR GROUP-BASED COMMUNICATION INTERFACE WITH EMAIL CHANNELING
17/589,230	1/31/22	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR GROUP-BASED COMMUNICATION INTERFACE WITH EMAIL CHANNELING
16/201,870	11/27/18	Issued	11,016,993	5/25/21	US	DYNAMIC AND SELECTIVE OBJECT UPDATE FOR LOCAL STORAGE COPY BASED ON NETWORK CONNECTIVITY CHARACTERISTICS
17/328,639	5/24/21	Published			US	DYNAMIC AND SELECTIVE OBJECT UPDATE FOR LOCAL STORAGE COPY BASED ON NETWORK CONNECTIVITY CHARACTERISTICS
16/670,984	10/31/19	Issued	10,791,191	9/29/20	US	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM

17/020,352	9/14/20	Issued	10,958,750	3/23/21	US	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
2020-558434	10/20/20	Issued	6974632	11/8/21	JP	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
19809251.2	3/4/21	Issued	3831041	12/1/21	EP	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
17/200,051	3/12/21	Issued	11,588,914	2/21/23	US	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
21211175.1	11/29/21	Published			EP	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM

19809251.2	10/31/19	Issued	60 2019 009 784.0	12/1/21	DE	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
19809251.2	10/31/19	Issued	3831041	12/1/21	FR	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
19809251.2	10/31/19	Issued	3831041	12/1/21	GB	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
2021-179998	11/4/21	Published			JP	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM
18/170,327	2/16/23	Pending			US	MAINTAINING MINIMUM INTERFACE FUNCTIONALITY IN AN ABSENCE OF A PUSH- BASED COMMUNICATIONS CONNECTION IN A GROUP-BASED COMMUNICATION SYSTEM

16/875,446	5/15/20	Issued	11,343,253	5/24/22	US	ACCESS CONTROL FOR PRIVATE CHANNELS IN A CHANNEL-BASED DISCUSSION SYSTEM
17/750,087	5/20/22	Published			US	ACCESS CONTROL FOR PRIVATE CHANNELS IN A CHANNEL-BASED DISCUSSION SYSTEM
16/263,799	1/31/19	Issued	11,159,476	10/26/21	US	METHODS AND APPARATUSES FOR MANAGING DATA INTEGRATION BETWEEN AN EXTERNAL EMAIL RESOURCE AND A GROUP- BASED COMMUNICATION SYSTEM
17/509,298	10/25/21	Published			US	METHODS AND APPARATUSES FOR MANAGING DATA INTEGRATION BETWEEN AN EXTERNAL EMAIL RESOURCE AND A GROUP- BASED COMMUNICATION SYSTEM
16/263,804	1/31/19	Issued	10,749,832	8/18/20	US	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL EMAIL RESOURCE ENTITY WITHIN A GROUP-BASED COMMUNICATION SYSTEM
PCT/US2020/015954	1/30/20	Published			WO	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL RESOURCE ENTITY WITHIN A GROUP- BASED COMMUNICATION SYSTEM
16/994,008	8/14/20	Issued	11,153,249	10/19/21	US	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL EMAIL RESOURCE ENTITY WITHIN A GROUP-BASED COMMUNICATION SYSTEM

20708914.5	8/30/21	Published			EP	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL RESOURCE ENTITY WITHIN A GROUP- BASED COMMUNICATION SYSTEM
2021-544284	7/29/21	Issued	7096953	6/28/22	JP	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL RESOURCE ENTITY WITHIN A GROUP- BASED COMMUNICATION SYSTEM
17/503,757	10/18/21	Issued	11,539,653	12/27/22	US	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL EMAIL RESOURCE ENTITY WITHIN A GROUP-BASED COMMUNICATION SYSTEM
2022-101721	6/24/22	Published			JP	METHODS AND APPARATUSES FOR MANAGING LIMITED ENGAGEMENT BY EXTERNAL RESOURCE ENTITY WITHIN A GROUP- BASED COMMUNICATION SYSTEM
16/264,100	1/31/19	lssued	10,805,362	10/13/20	US	SEAMLESS COMMUNICATION RESOURCE TRANSITION BETWEEN COMMUNICATION SYSTEMS
17/020,049	9/14/20	Issued	11,470,126	10/11/22	US	SEAMLESS COMMUNICATION RESOURCE TRANSITION BETWEEN A GROUP- BASED COMMUNICATION SYSTEM AND AN EXTERNAL COMMUNICATION SYSTEM

17/942,595	9/12/22	Allowed			US	SEAMLESS COMMUNICATION RESOURCE TRANSITION BETWEEN A GROUP- BASED COMMUNICATION SYSTEM AND AN EXTERNAL COMMUNICATION SYSTEM
16/263,691	1/31/19	lssued	10,897,370	1/19/21	US	METHODS AND APPARATUSES FOR DETERMINING A USER STATUS AVATAR FOR RENDERING WITHIN A GROUP-BASED COMMUNICATION INTERFACE
17/129,102	12/21/20	lssued	11,310,065	4/19/22	US	METHODS AND APPARATUSES FOR DETERMINING A USER STATUS AVATAR FOR RENDERING WITHIN A GROUP-BASED COMMUNICATION INTERFACE
17/722,864	4/18/22	Allowed			US	METHODS AND APPARATUSES FOR DETERMINING A USER STATUS AVATAR FOR RENDERING WITHIN A GROUP-BASED COMMUNICATION INTERFACE
16/263,969	1/31/19	Issued	11,494,741	11/8/22	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR IMPROVING EVENT CREATION AND MODIFICATION IN A GROUP-BASED COMMUNICATION PLATFORM
17/955,127	9/28/22	Published			US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR IMPROVING EVENT CREATION AND MODIFICATION IN A GROUP-BASED COMMUNICATION PLATFORM

16/263,753	1/31/19	Issued	11,481,735	10/25/22	US	VALIDATING, AGGREGATING, AND MANAGING CALENDAR EVENT DATA FROM EXTERNAL CALENDAR RESOURCES WITHIN A GROUP-BASED COMMUNICATION SYSTEM
16/264,062	1/31/19	Issued	11,501,261	11/15/22	US	AGGREGATING AN EVENT OCCURRENCE FEEDBACK REPORT WITHIN A GROUP- BASED COMMUNICATION SYSTEM
17/952,860	9/26/22	Published			US	AGGREGATING AN EVENT OCCURRENCE FEEDBACK REPORT WITHIN A GROUP- BASED COMMUNICATION SYSTEM
17/950,702	9/22/22	Published			US	RENDERING RELATED CONTENT PRIOR TO AN EVENT IN A GROUP-BASED COMMUNICATION INTERFACE
16/263,889	1/31/19	Issued	11,489,833	11/1/22	US	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
PCT/US2020/015924	1/30/20	Published			wo	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
20708904.6	8/30/21	Issued	3918495	12/28/22	EP	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM

2021-544285	7/29/21	Issued	7202473	12/27/22	JP	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
17/949,806	9/21/22	Published			US	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
22204744.1	10/31/22	Published			EP	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
20708904.6	1/30/20	Issued	602020007220.9	12/28/22	DE	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
20708904.6	1/30/20	Issued	3918495	12/28/22	FR	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
20708904.6	1/30/20	Issued	3918495	12/28/22	GB	METHODS, SYSTEMS, AND APPARATUSES FOR IMPROVED MULTI-FACTOR AUTHENTICATION IN A MULTI-APP COMMUNICATION SYSTEM
16/398,168	4/29/19	Issued	11,386,396	7/12/22	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR PROVIDING A CHANNEL CALENDAR IN A GROUP- BASED COMMUNICATION SYSTEM

17/826,036	5/26/22	Allowed			US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR PROVIDING A CHANNEL CALENDAR IN A GROUP- BASED COMMUNICATION SYSTEM
15/983,674	5/18/18	Issued	10,498,548	12/3/19	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR A SCALABLE GROUP- BASED COMMUNICATION SYSTEM WITH A REDUCED CLIENT MEMORY FOOTPRINT REQUIREMENT
16/589,618	10/1/19	Issued	10,892,906	1/12/21	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR A SCALABLE GROUP- BASED COMMUNICATION SYSTEM WITH A REDUCED CLIENT MEMORY FOOTPRINT REQUIREMENT
16/398,166	4/29/19	Issued	11,237,692	2/1/22	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR PROVIDING A MEMBER CALENDAR IN A GROUP- BASED COMMUNICATION SYSTEM
17/582,318	1/24/22	Issued	11,487,399	11/1/22	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR PROVIDING A MEMBER CALENDAR IN A GROUP- BASED COMMUNICATION SYSTEM
17/952,836	9/26/22	Allowed			US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR PROVIDING A MEMBER CALENDAR IN A GROUP- BASED COMMUNICATION SYSTEM

16/366,866	3/27/19	Issued	10,885,113	1/5/21	US	EXPANDABLE DATA OBJECT MANAGEMENT AND INDEXING ARCHITECTURE FOR INTERSYSTEM DATA EXCHANGE COMPATIBILITY
16/367,048	3/27/19	Issued	11,449,547	9/20/22	US	EXPANDABLE DATA OBJECT MANAGEMENT AND INDEXING ARCHITECTURE FOR INTERSYSTEM DATA EXCHANGE COMPATIBILITY
16/367,038	3/27/19	Issued	10,922,356	2/16/21	US	EXPANDABLE DATA OBJECT MANAGEMENT AND INDEXING ARCHITECTURE FOR INTERSYSTEM DATA EXCHANGE COMPATIBILITY
16/367,027	3/27/19	Issued	11,023,524	6/1/21	US	EXPANDABLE DATA OBJECT MANAGEMENT AND INDEXING ARCHITECTURE FOR INTERSYSTEM DATA EXCHANGE COMPATIBILITY
17/877,825	7/29/22	Published			US	EXPANDABLE DATA OBJECT MANAGEMENT AND INDEXING ARCHITECTURE FOR INTERSYSTEM DATA EXCHANGE COMPATIBILITY
16/397,544	4/29/19	Pending			US	MANAGING DESYNCHRONIZATION EVENT DATA STRUCTURES IN A GROUP-BASED COMMUNICATION SYSTEM
16/914,435	6/28/20	Published			US	LINK PROTOCOL AGENTS FOR INTER-APPLICATION COMMUNICATIONS

16/885,885	5/28/20	Issued	11,500,930	11/15/22	US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR GENERATING TIERED SEARCH INDEX FIELDS IN A GROUP-BASED COMMUNICATION PLATFORM
17/964,274	10/12/22	Published			US	METHOD, APPARATUS AND COMPUTER PROGRAM PRODUCT FOR GENERATING TIERED SEARCH INDEX FIELDS IN A GROUP-BASED COMMUNICATION PLATFORM
16/526,618	7/30/19	Issued	10,862,931	12/8/20	US	SERVICING GROUP-BASED COMMUNICATION WORKSPACE ADD REQUESTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM
17/082,569	10/28/20	Issued	11,050,804	6/29/21	US	SERVICING GROUP-BASED COMMUNICATION WORKSPACE ADD REQUESTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM
17/082,883	10/28/20	Issued	11,252,207	2/15/22	US	SERVICING GROUP-BASED COMMUNICATION WORKSPACE ADD REQUESTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM
17/574,171	1/12/22	Issued	11,558,439	1/17/23	US	SERVICING GROUP-BASED COMMUNICATION WORKSPACE ADD REQUESTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM

16/588,731	9/30/19	Issued	11,500,625	11/15/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR ORGANIZING THE BOOTING OPERATION OF A GROUP-BASED COMMUNICATION BROWSER SESSION
16/588,829	9/30/19	Issued	11,500,625	11/8/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR ORGANIZING THE BOOTING OPERATION OF A GROUP-BASED COMMUNICATION BROWSER SESSION
16/588,831	9/30/19	Issued	11,494,178	11/8/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR ORGANIZING THE BOOTING OPERATION OF A GROUP-BASED COMMUNICATION SESSION
16/588,833	9/30/19	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR ORGANIZING THE BOOTING OPERATION OF A GROUP-BASED COMMUNICATION SESSION
16/779,101	1/31/20	Issued	11,082,486	8/3/21	US	GROUP-BASED COMMUNICATION APPARATUS CONFIGURED TO IMPLEMENT OPERATIONAL SEQUENCE SETS AND RENDER WORKFLOW INTERFACE OBJECTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM

17/391,795	8/2/21	Issued	11,558,453	1/17/23	US	GROUP-BASED COMMUNICATION APPARATUS CONFIGURED TO IMPLEMENT OPERATIONAL SEQUENCE SETS AND RENDER WORKFLOW INTERFACE OBJECTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM
17/409,263	8/23/21	Allowed			US	GROUP-BASED COMMUNICATION APPARATUS CONFIGURED TO IMPLEMENT OPERATIONAL SEQUENCE SETS AND RENDER WORKFLOW INTERFACE OBJECTS WITHIN A GROUP-BASED COMMUNICATION SYSTEM
16/821,514	3/17/20	Issued	11,265,282	3/1/22	US	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
16/825,527	3/20/20	Issued	11,012,445	5/18/21	US	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
17/317,427	5/11/21	Issued	11,271,891	3/8/22	US	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM

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2021-525118	5/10/21	Issued	7101314	7/6/22	JP	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
20808254.5	10/30/20	Published			EP	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
17/588,548	1/31/22	Issued	11,570,134	1/31/23	US	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
2022-107570	7/4/22	Published			JP	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
2.0208E+12	11/16/22	Published			CN	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM

18/160,798	1/27/23	Pending			US	METHODS AND APPARATUSES FOR MANAGING EXTERNAL APPROVAL PROVISIONING AND EXTERNAL MESSAGING COMMUNICATION REQUESTS IN A GROUP- BASED COMMUNICATION SYSTEM
15/861,611	1/3/18	Issued	11,392,877	7/19/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR LOW LATENCY SERVING OF INTERACTIVE ENTERPRISE ANALYTICS WITHIN AN ENTERPRISE GROUP-BASED COMMUNICATION SYSTEM
15/879,274	1/24/18	Issued	11,392,878	7/19/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR LOW LATENCY SERVING OF INTERACTIVE ENTERPRISE ANALYTICS WITHIN AN ENTERPRISE GROUP-BASED COMMUNICATION SYSTEM
15/879,253	1/24/18	Issued	11,386,379	7/12/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR LOW LATENCY SERVING OF INTERACTIVE ENTERPRISE ANALYTICS WITHIN AN ENTERPRISE GROUP-BASED COMMUNICATION SYSTEM
15/782,680	10/12/17	lssued	10,997,557	5/4/21	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR AUTHORIZING AND AUTHENTICATING USER COMMUNICATION WITHIN AN ENTERPRISE GROUP-BASED COMMUNICATION PLATFORM

17/306,260	5/3/21	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR AUTHORIZING AND AUTHENTICATING USER COMMUNICATION WITHIN AN ENTERPRISE GROUP-BASED COMMUNICATION PLATFORM
16/206,652	11/30/18	Issued	10,346,378	7/9/19	US	DATA STORAGE ARCHITECTURE FOR AN ENTERPRISE COMMUNICATION SYSTEM
16/419,709	5/22/19	Issued	11,269,833	3/8/22	US	DATA STORAGE ARCHITECTURE FOR AN ENTERPRISE COMMUNICATION SYSTEM
17/582,552	1/24/22	Published			US	DATA STORAGE ARCHITECTURE FOR AN ENTERPRISE COMMUNICATION SYSTEM
15/651,887	7/17/17	Issued	9,940,394	4/10/18	US	MESSAGING SEARCH AND MANAGEMENT APPARATUSES, METHODS AND SYSTEMS
15/949,030	4/9/18	Issued	10,229,204	3/12/19	US	MESSAGING SEARCH AND MANAGEMENT APPARATUSES, METHODS AND SYSTEMS
15/949,034	4/9/18	Issued	10,229,205	3/12/19	US	MESSAGING SEARCH AND MANAGEMENT APPARATUSES, METHODS AND SYSTEMS
15/949,039	4/9/18	Issued	10,846,349	11/24/20	US	MESSAGING SEARCH AND MANAGEMENT APPARATUSES, METHODS AND SYSTEMS
17/070,651	10/14/20	Issued	11,586,686	2/21/23	US	MESSAGING SEARCH AND MANAGEMENT APPARATUSES, METHODS AND SYSTEMS

15/844,002	12/15/17	Issued	11,005,793	5/11/21	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DETERMINING ACCESS CONTROL PARAMETER DISCREPANCIES IN GROUP-BASED COMMUNICATION CHANNELS WITH A GROUP-BASED COMMUNICATION SYSTEM
17/316,081	5/10/21	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DETERMINING ACCESS CONTROL PARAMETER DISCREPANCIES IN GROUP-BASED COMMUNICATION CHANNELS WITH A GROUP-BASED COMMUNICATION SYSTEM
15/655,652	7/20/17	Issued	10,628,408	4/21/20	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED COMMUNICATION REPOSITORY
18836078.8	7/20/18	Published			EP	DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED REPOSITORY
2020-502108	7/20/18	Issued	6813710	12/21/20	JP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED COMMUNICATION REPOSITORY

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16/814,841	3/10/20	Issued	11,157,483	10/26/21	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED COMMUNICATION REPOSITORY
2020-208898	12/17/20	Issued	7079389	5/25/22	JP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED COMMUNICATION REPOSITORY
17/509,985	10/25/21	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED COMMUNICATION REPOSITORY
2022-034997	3/8/22	Published			JP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR DIGITAL CONTENT AUDITING AND RETENTION IN A GROUP BASED COMMUNICATION REPOSITORY
16/999,631	8/21/20	Issued	11,089,095	8/10/21	US	SELECTIVELY ADDING USERS TO CHANNELS IN A GROUP-BASED COMMUNICATION SYSTEM
17/368,921	7/7/21	Issued	11,303,705	4/12/22	US	SELECTIVELY ADDING USERS TO CHANNELS IN A GROUP-BASED COMMUNICATION SYSTEM
17/693,843	3/14/22	Published			US	SELECTIVELY ADDING USERS TO CHANNELS IN A GROUP-BASED COMMUNICATION SYSTEM

17/026,826	9/21/20	Issued	11,570,170	1/31/23	US	EMBEDDING GROUP- BASED COMMUNICATION SYSTEM CONTENT
17/038,338	9/30/20	Issued	11,343,753	5/24/22	US	ROLE-BASED ACCESS CONTROL SYSTEM
17/733,269	4/29/22	Published			US	ROLE-BASED ACCESS CONTROL SYSTEM
17/064,344	10/6/20	Issued	11,140,203	10/5/21	US	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
PCT/US20/65356	12/16/20	Published			wo	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
17/348,123	6/15/21	Published			US	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
17/408,024	8/20/21	Published			US	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
PCT/US22/31077	5/26/22	Published			WO	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
20842398.8	3/17/23	Pending			EP	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
2023-520126	3/31/23	Pending			JP	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM

	3/24/23	Pending			CA	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
	4/3/23	Pending			CN	AMBIENT, AD HOC, MULTIMEDIA COLLABORATION IN A GROUP-BASED COMMUNICATION SYSTEM
17/118,180	12/10/20	Issued	11,153,377	10/19/21	US	SHARED CHANNEL INVITATION PATHS
17/503,822	10/18/21	Issued	11,496,561	11/8/22	US	SHARED CHANNEL INVITATION PATHS
17/960,519	10/5/22	Published			US	SHARED CHANNEL INVITATION PATHS
17/152,464	1/19/21	Issued	11,245,744	2/8/22	US	ASYNCHRONOUS DISTRIBUTED MODULAR FUNCTION CALLING
PCT/US21/13987	1/19/21	Published			WO	ASYNCHRONOUS DISTRIBUTED MODULAR FUNCTION CALLING
17/582,486	1/24/22	Issued	11,659,021	5/23/23	US	ASYNCHRONOUS DISTRIBUTED MODULAR FUNCTION CALLING
17/171,924	2/9/21	Issued	11,153,293	10/19/21	US	IDENTITY INFORMATION LINKING
17/503,885	10/18/21	Published			US	IDENTITY INFORMATION LINKING
17/180,095	2/19/21	Allowed			US	INLINE DATA LOSS PREVENTION FOR A GROUP-BASED COMMUNICATION SYSTEM
17/162,429	1/29/21	Published			US	CONTEXTUAL DATA LOSS PREVENTION FOR A GROUP-BASED COMMUNICATION SYSTEM
17/186,717	2/26/21	Issued	11,444,903	9/13/22	US	CONTEXTUAL DISCOVERY AND DESIGN OF APPLICATION WORKFLOW

17/899,934	8/31/22	Published			US	CONTEXTUAL DISCOVERY AND DESIGN OF
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17/186,854	2/26/21	Issued	11,455,166	9/27/22	US	HOSTING EVENT-BASED APPLICATIONS
PCT/US21/52005	9/24/21	Published			wo	HOSTING EVENT-BASED APPLICATIONS
17/899,182	8/30/22	Issued	11,599,353	3/7/23	US	HOSTING EVENT-BASED APPLICATIONS
17/217,283	3/30/21	Issued	11,487,397	11/1/22	US	MULTIPLE WINDOWS FOR A GROUP-BASED COMMUNICATION SYSTEM
17/954,287	9/27/22	Published			US	MULTIPLE WINDOWS FOR A GROUP-BASED COMMUNICATION SYSTEM
17/213,707	3/26/21	Issued	11,620,173	4/4/23	US	OPTIMIZING APPLICATION PERFORMANCE WITH MACHINE LEARNING
17/222,202	4/5/21	Issued	11,553,015	1/10/23	US	PROGRESSIVE INSTANTIATION OF WORKSPACES FOR A GROUP-BASED COMMUNICATION SYSTEM
17/213,607	3/26/21	Issued	11,422,668	8/23/22	US	SEAMLESS APPLICATION UPDATES
11/082,202	3/15/05	Issued	8,788,492	7/22/14	US	Search system and methods with integration of user annotations from a trust network
14/292,028	5/30/14	Issued	9,852,187	12/26/17	US	Search system and methods with integration of user annotations from a trust network
15/810,507	11/13/17	Issued	10,726,019	7/28/20	US	Search system and methods with integration of user annotations from a trust network
16/938,050	7/24/20	Issued	11,556,544	1/17/23	US	SEARCH SYSTEM AND METHODS WITH INTEGRATION OF USER ANNOTATIONS FROM A TRUST NETWORK

10-2006-7019075	3/15/05	Issued	1008240910000	4/8/15	KR	METHODS WITH INTEGRATION OF USER ANNOTATIONS FROM A TRUST NETWORK
10-2007-7011915	10/28/05	Issued	1009664050000	6/18/10	KR	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
11/528,753	9/27/06	Issued	9,053,461	6/9/15	US	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
14/733,501	6/8/15	Issued	9,762,530	9/12/17	US	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
15/700,134	9/10/17	Issued	10,701,026	6/30/20	US	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
16/916,024	6/29/20	Issued	11,240,194	2/1/22	US	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
10-2008-7010888	10/3/06	Issued	1020080066770	3/9/11	KR	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
17/581,198	1/21/22	Allowed			US	INSTANT MESSAGING INTEROPERABILITY BETWEEN DISPARATE SERVICE PROVIDERS
15/894,821	2/12/18	Issued	11,095,657	8/17/21	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM

19751609.9	4/2/20	Issued	3695563	12/7/22	EP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
2020-536880	7/1/20	Issued	6840295	2/18/21	JP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
2021-022292	2/16/21	Issued	7160972	10/17/22	JP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
17/380,580	7/20/21	Published			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
6.02019E+11	2/12/19	Issued	602019022895.3	12/7/22	DE	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM

19751609.9	2/12/19	Issued	3695563	12/7/22	FR	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
19751609.9	2/12/19	Issued	3695563	12/7/22	GB	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
22196034.7	9/16/22	Published			EP	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR SELECTIVELY GRANTING PERMISSIONS TO GROUP- BASED OBJECTS IN A GROUP-BASED COMMUNICATION SYSTEM
11/853,768	9/11/07	Issued	7,945,862	5/17/11	US	SOCIAL NETWORK SITE INCLUDING CONTACT- BASED RECOMMENDATION FUNCTIONALITY
13/108,473	5/16/11	Issued	11,120,400	9/14/21	US	SOCIAL NETWORK SITE INCLUDING MODIFICATION CONTROL AND MANAGEMENT
17/229,417	4/13/21	Issued	11,373,144	6/28/22	US	SOCIAL NETWORK SITE INCLUDING MODIFICATION CONTROL AND MANAGEMENT
17/751,242	5/23/22	Published			US	SOCIAL NETWORK SITE INCLUDING MODIFICATION CONTROL AND MANAGEMENT
17/321,136	5/14/21	Issued	11,481,236	10/25/22	US	COLLABORATION HUB FOR A GROUP-BASED COMMUNICATION SYSTEM
PCT/US22/28707	5/11/22	Published			wo	COLLABORATION HUB FOR A GROUP-BASED COMMUNICATION SYSTEM

17/949,729	9/21/22	Published			US	COLLABORATION HUB FOR A GROUP-BASED COMMUNICATION SYSTEM
17/373,650	7/12/21	Published			US	MANAGING APPLICATION FOCUS TRANSITIONS
17/390,438	7/30/21	Published			US	DOCUMENTING MULTIMEDIA COLLABORATION SESSION CONTENT
17/390,326	7/30/21	Published			US	SURFACING RELEVANT TOPICS IN A GROUP- BASED COMMUNICATION SYSTEM
16/201,515	11/27/18	Published			US	MULTI-MODAL USER AUTHORIZATION IN GROUP-BASED COMMUNICATION SYSTEMS
17/465,430	9/2/21	Issued	11,611,519	3/21/23	US	EVENT TRIGGER VISIBILITY WITHIN A GROUP-BASED COMMUNICATION SYSTEM
17/471,657	9/10/21	Published			US	APPLICATIONS PERMISSIONS FRAMEWORK
17/478,353	9/17/21	Published			US	STATE-BASED DETECTION OF ANOMALOUS API CALLS WITHIN A REAL- TIME DATA STREAM
15/977,799	5/11/18	Issued	10,592,225	3/17/20	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INSTALLING THIRD PARTY APPLICATIONS REQUIRING VARIABLE HOST ADDRESS IDENTIFICATION IN A GROUP-BASED COMMUNICATION SYSTEM
16/685,417	11/15/19	Issued	11,360,754	6/14/22	US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INSTALLING THIRD PARTY APPLICATIONS REQUIRING VARIABLE HOST ADDRESS IDENTIFICATION IN A GROUP-BASED COMMUNICATION SYSTEM

17/828,391	5/31/22	Allowed			US	METHOD, APPARATUS, AND COMPUTER PROGRAM PRODUCT FOR INSTALLING THIRD PARTY APPLICATIONS REQUIRING VARIABLE HOST ADDRESS IDENTIFICATION IN A GROUP-BASED COMMUNICATION SYSTEM
17/564,506	12/29/21	Pending			US	WORKFLOWS FOR DOCUMENTS
17/566,947	12/31/21	Pending			US	COLLABORATION SOFTWARE DEVELOPMENT KIT
PCT/US22/52680	12/13/22	Pending			WO	COLLABORATION SOFTWARE DEVELOPMENT KIT
15/958,484	4/20/18	Issued	11,016,982	5/25/21	US	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR OUTPUTTING IMPROVED AUTOSUGGESTIONS IN A GROUP-BASED COMMUNICATION PLATFORM
17/328,543	5/24/21	Issued	11,379,491	7/5/22	US	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR OUTPUTTING IMPROVED AUTOSUGGESTIONS IN A GROUP-BASED COMMUNICATION PLATFORM
17/825,185	5/26/22	Published			US	METHODS, APPARATUSES AND COMPUTER PROGRAM PRODUCTS FOR OUTPUTTING IMPROVED AUTOSUGGESTIONS IN A GROUP-BASED COMMUNICATION PLATFORM