



ETSI Rules of Procedure, 3 September 2020

IPR INFORMATION STATEMENT AND LICENSING DECLARATION

IPR HOLDER / ORGANISATION ("Declarant")

Legal Name: ZTE Corporation

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IPR INFORMATION STATEMENT

In accordance with Clause 4.1 of the ETSI IPR Policy the Declarant and/or its AFFILIATES hereby informs ETSI that it is the Declarant's and/or its AFFILIATES' present belief that the IPR(s) disclosed in the attached *IPR Information Statement Annex* may be or may become ESSENTIAL in relation to at least the ETSI Work Item(s), STANDARD(S) and/or TECHNICAL SPECIFICATION(S) identified in the attached *IPR Information Statement Annex*.

The Declarant and/or its AFFILIATES (*check one box only*):

- are the proprietor of the IPR(s) disclosed in the attached *IPR Information Statement Annex*.
- are not the proprietor of the IPR(s) disclosed in the attached *IPR Information Statement Annex*.

IPR LICENSING DECLARATION

In accordance with Clause 6.1 of the ETSI IPR Policy the Declarant and/or its AFFILIATES hereby irrevocably declares the following (*check one box only, and subordinate box, where applicable*):

To the extent that the IPR(s) disclosed in the attached *IPR Information Statement Annex* are or become, and remain ESSENTIAL in respect of the ETSI Work Item, STANDARD and/or TECHNICAL SPECIFICATION identified in the attached *IPR Information Statement Annex*, the Declarant and/or its AFFILIATES are (1) prepared to grant irrevocable licences under this/these IPR(s) on terms and conditions which are in accordance with Clause 6.1 of the ETSI IPR Policy; and (2) will comply with Clause 6.1 bis of the ETSI IPR Policy.

This irrevocable undertaking is made subject to the condition that those who seek licences agree to reciprocate (*check box if applicable*):

The Declarant and/or its AFFILIATES are not prepared to make the above IPR Licensing Declaration (reasons may be explained in writing in the attached *IPR Licensing Declaration Annex*).

The construction, validity and performance of this IPR information statement and licensing declaration shall be governed by the laws of France. Terms in ALL CAPS on this form have the meaning provided in Clause 15 of the ETSI IPR Policy.

SIGNATURE

By signing this IPR Information Statement and Licensing Declaration form, you represent that you have the authority to bind the Declarant and/or its AFFILIATES to the representations and commitments provided in this form.

Name of authorized person: Dr. Mang Zhu
 Title of authorized person: Chief IP Strategy Officer
 Place, Date: Shenzhen, 12/04/2021

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IPR Information Statement Annex

STANDARD, TECHNICAL SPECIFICATION or ETSI Work Item					Proprietor	Application No.	Publication No.	Patent/Application Title	Country of registration	FURTHER INFORMATION		
Disclosure Number	Project or Standard name	Work Item or Standard No.	Illustrative Specific part of the standard (e.g. Section)	Version (V.X.X.X)						Other members of this PATENT FAMILY, if any *		
					Application No.	Publication No.	Country of registration					
1	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201013496276	US8767861 B2	MULTIPLE INPUT MULTIPLE OUTPUT AND BEAM-FORMING DATA TRANSMISSION METHOD AND DEVICE	UNITED STATES	CN20108025139	CN102474315 B	CHINA
										EP20100844364	EP2466761 B1	European Patent Office
										JP20120528214	JP5391335 B2	JAPAN
										WO2010CN70377	WO2011091586 A1	Patent Cooperation Treaty
2	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201013522456	US8885750 B2	Method and System for Transmitting Data Using Collaborative Multiple Input Multiple Output Beamforming	UNITED STATES	EP20100844367	EP2515451 B1	European Patent Office
										JP20120550289	JP5554844 B2	JAPAN
										WO2010CN70380	WO2011091589 A1	Patent Cooperation Treaty
3	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423			ZTE Corporation	US201013634571	US8855664 B2	Method for Acquiring Information of Home Node B, Method for Balancing Load, and Apparatuses Therefor	UNITED STATES	CN20108063525	CN102754481 A	CHINA
										EP20100856586	EP2536213 B1	European Patent Office
										WO2010CN76582	WO2012027899 A1	Patent Cooperation Treaty
4	5G, LTE Advanced Pro/5G	TS 36.213 TS 36.321 TS 36.331			ZTE Corporation	US201013579944	US8837284 B2	Method for scheduling guaranteed bit rate service based on quality of service	UNITED STATES	CA20102790671	CA2790671 C	CANADA
										CN20108062938	CN102742212 B	CHINA
										HK20120112152	HK1171581 A1	HONG KONG
										JP20130509422	JP5395982 B2	JAPAN
										KR20127022956	KR101390815 B1	KOREA (REPUBLIC OF)
										MX20120010882	MX2012010882 A	MEXICO
										RU20120146263	RU2528747 C1	RUSSIAN FEDERATION
WO2010CN73023	WO2011143824 A1	Patent Cooperation Treaty										
5	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423			ZTE Corporation	US20100520792	US9510253 B2	Method and system for determining reason for too late handover to Home eNB	UNITED STATES	CN20108050379	CN102598778 B	CHINA
										EP20100850471	EP2512179 A1	European Patent Office
										WO2010CN72218	WO2011134138 A1	Patent Cooperation Treaty
6	5G, LTE Advanced Pro/5G	TS 24.301 TS 36.304 TS 36.331			ZTE Corporation	US201013809974	US9019881 B2	METHOD AND SYSTEM FOR WAKING UP NODE B CELL	UNITED STATES	EP20100856577	EP2562166 B1	European Patent Office
										WO2010CN76542	WO2012027890 A1	Patent Cooperation Treaty

7	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.413 TS 36.423		ZTE Corporation	US200813142300	US8374612 B2	METHOD FOR OBTAINING THE TRANSMISSION ADDRESS OF THE TARGET BASE STATION AND METHOD FOR ESTABLISHING THE X2 INTERFACE CONNECTION	UNITED STATES			
8	5G, LTE Advanced Pro/5G	TS 36.321 TS 36.331 TS 36.321 TS 38.331		ZTE Corporation	US201013637855	US8953459 B2	Method and System for Reporting Buffer Size Index	UNITED STATES	CN20108059634	CN102742345 B	CHINA
									EP20100853435	EP2568274 B1	European Patent Office
									JP20130515659	JP5575984 B2	JAPAN
									RU20120147564	RU2539231 C2	RUSSIAN FEDERATION
									WO2010CN74276	WO2011160282 A1	Patent Cooperation Treaty
9	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.212 TS 38.213 TS 38.331		ZTE Corporation	US20050718701	US8185797 B2	Basic Matrix, Coder/Encoder and Generation Method of the Low Density Parity Check Codes	UNITED STATES	CN20041009746	CN100550855 C	CHINA
									WO2005CN00571	WO2006047919 A1	Patent Cooperation Treaty
10	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.212 TS 38.213 TS 38.331		ZTE CORP	US20050795826	US8607125 B2	Basic Matrix Based on Irregular Ldpc, Codec and Generation Method Thereof	UNITED STATES	CN20051007156	CN100486150 C	CHINA
									EP20050749661	EP1850484 A4	European Patent Office
									WO2005CN00671	WO2006076834 A1	Patent Cooperation Treaty
11	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.212 TS 38.213 TS 38.331		JIANG JING	US200913143681	US8559373 B2	SPACE DIVERSITY METHOD	UNITED STATES	CN20091076109	CN101771454 B	CHINA
									EP20090837302	EP2383904 B1	European Patent Office
									WO2009CN72544	WO2010078744 A1	Patent Cooperation Treaty
12	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.212 TS 38.213 TS 38.331		ZTE Corporation	US201013259493	US9136993 B2	Base Station, Terminal, System And Method For Transmitting Sounding Reference Signal By Using Multiple Antennas	UNITED STATES	CN200910150817	CN101594633 B	CHINA
									WO2010CN73625	WO2010145470 A1	Patent Cooperation Treaty
13	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.212 TS 38.213 TS 38.331		ZTE Corporation	US201013390463	US8593989 B2	METHOD AND DEVICE FOR DETERMINING CQI VALUE IN COORDINATED MULTI-POINT TRANSMISSION/RECEPTION	UNITED STATES	BR20121103226	BR112012003226 A2	BRAZIL
									CN200910166155	CN101997587 B	CHINA
									EP20100807913	EP2468760 B1	European Patent Office
									KR20127005441	KR20120058532 A	KOREA (REPUBLIC OF)
									WO2010CN73721	WO2011017968 A1	Patent Cooperation Treaty
14	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201013635981	US9060304 B2	RADIO FRAME AND SOUNDING REFERENCE SIGNAL SENDING METHOD IN MOBILE COMMUNICATION SYSTEM	UNITED STATES			

15	5G, LTE Advanced Pro/5G	TS 36.443 TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201013391478	US9036530 B2	METHOD AND DEVICE FOR CARRYING MBMS NOTIFICATION INFORMATION	UNITED STATES	CN20091088278	CN101959131 B	CHINA
									EP20100799395	EP2456239 B1	European Patent Office
									IN2012DELNP128 5	IN1265DEN2012 A	INDIA
									WO2010CN73238	WO2011006397 A1	Patent Cooperation Treaty
16	5G, LTE Advanced Pro/5G	TS 36.440 TS 36.441 TS 36.321 TS 36.331		ZTE Corporation	US20101325882	US8774078 B2	METHOD AND USER EQUIPMENT FOR RECEIVING MULTICAST CONTROL CHANNEL NOTIFICATION MESSAGE	UNITED STATES	CN200910211970	CN102098621 B	CHINA
									EP20100835442	EP2465412 B1	European Patent Office
									WO2010CN78897	WO2011069407 A1	Patent Cooperation Treaty
17	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US200913119480	US8498226 B2	Method for Determining Random Access Channel Number and Sending Sounding Reference Signal	UNITED STATES	CN200810168483	CN101378595 B	CHINA
									EP20090817180	EP2337384 B1	European Patent Office
									JP20110528160	JP5185444 B2	JAPAN
									WO2009CN00882	WO2010037246 A1	Patent Cooperation Treaty
18	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US200913125573	US9060332 B2	METHOD AND DEVICE FOR SELECTING THE RESOURCE PROCESSING MANNER	UNITED STATES	CN200810173410	CN101730128 B	CHINA
									EP20090821512	EP2352257 B1	European Patent Office
									WO2009CN70367	WO2010045791 A1	Patent Cooperation Treaty
19	5G, LTE Advanced Pro/5G	TS 36.443 TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US20080918592	US8446851 B2	METHOD AND DEVICE FOR TRANSMITTING A MULTIMEDIA BROADCAST MULTICAST SERVICE	UNITED STATES	CN20081008192	CN101516063 B	CHINA
									EP20080872573	EP2247003 A4	European Patent Office
									WO2008CN73567	WO2009103213 A1	Patent Cooperation Treaty
20	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201013497297	US8718001 B2	SYSTEM AND METHOD FOR ALLOCATING SOUNDING REFERENCE SIGNAL RESOURCE	UNITED STATES	CN200910204775	CN101695191 B	CHINA
									EP20100819835	EP2469947 B1	European Patent Office
									WO2010CN74865	WO2011038606 A1	Patent Cooperation Treaty
21	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423		ZTE Corporation	US201013286109	US8817752 B2	METHOD AND APPARATUS FOR DETERMINING MATCHING OF INTER-CELL RESELECTION PARAMETERS AND HANDOVER PARAMETERS	UNITED STATES	CN200910137448	CN101873620 B	CHINA
									EP20100766643	EP2434797 B1	European Patent Office
									JP20120506323	JP5454822 B2	JAPAN
									WO2010CN72031	WO2010121553 A1	Patent Cooperation Treaty
22	5G, LTE Advanced Pro/5G	TS 36.443 TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201113503775	US8675591 B2	Method for Mobile Reception of Multimedia Broadcast Multicast Service by User Equipment, and User Equipment	UNITED STATES	CN201010114503	CN102158809 B	CHINA
									EP20110741894	EP2496015 B1	European Patent Office
									WO2011CN70855	WO2011098023 A1	Patent Cooperation Treaty

23	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423		ZTE Corporation	US201214380429	US9882803 B2	Method and system for implementing local IP service	UNITED STATES	CN20121040993	CN103297947 B	CHINA
									EP20120869312	EP2819443 A4	European Patent Office
									WO2012CN86775	WO2013123802 A1	Patent Cooperation Treaty
24	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201113814586	US9066336 B2	Method and System for Determining Physical Uplink Control Channel Resources	UNITED STATES	CN201010257101	CN101917766 B	CHINA
									EP20110816004	EP2605599 B1	European Patent Office
									WO2011CN70407	WO2012019445 A1	Patent Cooperation Treaty
25	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201314408278	US9425928 B2	DATA TRANSMISSION METHOD AND DEVICE	UNITED STATES	CN201210203377	CN103516493 B	CHINA
									EP20130806943	EP2863550 B1	European Patent Office
									WO2013CN77478	WO2013189288 A1	Patent Cooperation Treaty
26	LTE Advanced Pro/5G	TS 29.212		ZTE Corporation	US201314385699	US9485106 B2	TDF SESSION PROCESS METHOD AND PCRF	UNITED STATES	CN201210178002	CN103313431 B	CHINA
									EP20130780758	EP2822350 A4	European Patent Office
									WO2013CN74221	WO2013135213 A1	Patent Cooperation Treaty
27	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201114357537	US9713132 B2	Method and system for processing downlink control information	UNITED STATES			
28	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201113820257	US9084258 B2	Dynamic sub-frame configuration method and apparatus in time division duplex system	UNITED STATES	CN201010270199	CN102387543 B	CHINA
									EP20110821051	EP2603027 A4	European Patent Office
									WO2011CN76531	WO2012028025 A1	Patent Cooperation Treaty
29	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201314377240	US9661617 B2	Determination Method and Device for Resources in Physical Uplink Control Channel	UNITED STATES	CN201210218686	CN103516474 B	CHINA
									EP20130810064	EP2802181 A4	European Patent Office
									WO2013CN00764	WO2014000421 A1	Patent Cooperation Treaty
30	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.413 TS 38.300 TS 38.413		ZTE Corporation	US201213985373	US9301202 B2	Method and system for controlling access to shared network	UNITED STATES	CN20111037367	CN102838864 B	CHINA
									EP20120746833	EP2867665 B1	European Patent Office
									JP20130553771	JP5718484 B2	JAPAN
									US201615045121	US9706475 B2	UNITED STATES
								WO2012CN70433	WO2012108951 A1	Patent Cooperation Treaty	

31	5G, LTE Advanced Pro/5G	TS 36.443 TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201113696783	US9332527 B2	Method and apparatus for processing multimedia broadcast multicast service (MBMS) counting message	UNITED STATES	CA20112798894	CA2798894 C	CANADA
									CN201010187330	CN102264033 B	CHINA
									HK20120104381	HK1164022 A1	HONG KONG
									MX20120013198	MX2012013198 A	MEXICO
									WO2011CN73279	WO2011147242 A1	Patent Cooperation Treaty
32	5G, LTE Advanced Pro/5G	TS 36.443 TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201214126158	US9173194 B2	Method and system for transmitting MBMS control information in multicarrier aggregation system	UNITED STATES	CN201110165672	CN102843648 B	CHINA
									JP20140516177	JP5891302 B2	JAPAN
									KR20137034748	KR20140031338 A	KOREA (REPUBLIC OF)
									WO2012CN77111	WO2012175008 A1	Patent Cooperation Treaty
33	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201314388399	US9461780 B2	METHOD AND APPARATUS FOR TRANSMITTING HYBRID AUTOMATIC REPEAT REQUEST ACKNOWLEDGE INFORMATION	UNITED STATES	CN201210101929	CN103368709 B	CHINA
									EP20130776139	EP2838301 B1	European Patent Office
									JP20150503730	JP5891336 B2	JAPAN
									WO2013CN00408	WO2013152621 A1	Patent Cooperation Treaty
34	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423		ZTE Corporation	US201113697600	US9007911 B2	Method and system for implementing direct interface between access network nodes	UNITED STATES	CN201010207473	CN102281567 B	CHINA
									EP20110795038	EP2560454 B1	European Patent Office
									WO2011CN71958	WO2011157072 A1	Patent Cooperation Treaty
35	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201314397658	US9538477 B2	Uplink Power Control Method, Terminal and Base Station	UNITED STATES	CN201210460538	CN103582099 B	CHINA
									EP20130804019	EP2833662 B1	European Patent Office
									ES20130804019T	ES2635070 T3	SPAIN
									WO2013CN79862	WO2013185672 A1	Patent Cooperation Treaty
36	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201214377699	US9467992 B2	Method and system for allocating dynamic frame structure of TDD system, and Evolved NodeB	UNITED STATES	CN20121030111	CN103249153 B	CHINA
									EP20120868247	EP2806701 B1	European Patent Office
									WO2012CN77760	WO2013117071 A1	Patent Cooperation Treaty
37	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423		ZTE Corporation	US201314373091	US9560625 B2	METHOD AND APPARATUS FOR CONFIGURING MOBILE RELAY NODE TRACKING AREA AND LOCATION UPDATE	UNITED STATES	CN20121016306	CN103220853 B	CHINA
									EP20130738445	EP2793512 A4	European Patent Office
									JP20140552489	JP5872711 B2	JAPAN
									WO2013CN70653	WO2013107375 A1	Patent Cooperation Treaty
38	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201114236164	US9313757 B2	Base Station, Terminal, System And Method For Data Transmitting In Time-Division Duplex System	UNITED STATES	CN201110218399	CN102355731 B	CHINA
									EP20110865828	EP2728954 B1	European Patent Office
									WO2011CN84373	WO2012155514 A1	Patent Cooperation Treaty



39	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314414510	US9537625 B2	METHOD FOR CALIBRATING DATA SENT BY COORDINATED APs AND BASE STATION	UNITED STATES	CN201210286552	CN103595514 B	CHINA
										EP20130798028	EP2860902 A4	European Patent Office
										WO2013CN78121	WO2013178120 A1	Patent Cooperation Treaty
40	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314420346	US9686776 B2	Method and Device for Processing Information	UNITED STATES	CN201210284733	CN103561891 B	CHINA
										EP20130797191	EP2882242 A4	European Patent Office
										WO2013CN80558	WO2013178187 A3	Patent Cooperation Treaty
41	5G, LTE Advanced Pro/5G	TS 24.301 TS 36.300 TS 36.304 TS 36.331			ZTE Corporation	US201314396813	US9615327 B2	TERMINAL POWER- SAVING METHOD AND TERMINAL POWER- SAVING DEVICE, AND NETWORK-SIDE POWER- SAVING DEVICE	UNITED STATES	CN201210126666	CN103379593 B	CHINA
										EP20130813924	EP2830367 B1	European Patent Office
										ES20130813924T	ES2890316 T3	SPAIN
										WO2013CN74059	WO2014005452 A1	Patent Cooperation Treaty
42	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314404990	US9793970 B2	Method and device for configuring channel state information feedback, method and device for measurement and feedback	UNITED STATES	CN201210271360	CN103580819 B	CHINA
										WO2013CN79254	WO2014019445 A1	Patent Cooperation Treaty
43	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314431505	US9379827 B2	METHOD, SYSTEM, AND APPARATUS FOR NOTIFYING AND DETERMINING ANTENNA PORT POSITION RELATIONSHIP	UNITED STATES	CN201210363660	CN103684676 B	CHINA
										EP20130842014	EP2890024 B1	European Patent Office
										WO2013CN82508	WO2014048209 A1	Patent Cooperation Treaty
44	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314414296	US9515791 B2	MULTI-ACCESS POINT CALIBRATION METHOD AND DEVICE	UNITED STATES	CN201210286628	CN103596196 B	CHINA
										EP20130796301	EP2861006 B1	European Patent Office
										WO2013CN78322	WO2013178122 A1	Patent Cooperation Treaty
45	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423			ZTE Corporation	US201314427834	US9554301 B2	MULTI-NETWORK JOINT TRANSMISSION-BASED OFFLOAD METHOD AND SYSTEM, AND ACCESS NETWORK ELEMENT	UNITED STATES	CN201210344281	CN103686859 B	CHINA
										EP20130836484	EP2897441 B1	European Patent Office
										IN2015DELNP240 3	IN2403DEN2015 A	INDIA
										JP20150531457	JP5970814 B2	JAPAN
										WO2013CN83694	WO2014040574 A1	Patent Cooperation Treaty
46	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314437278	US9401752 B2	Method and device for performing codebook processing on channel information	UNITED STATES	CN201210404158	CN103780289 B	CHINA
										EP20130787275	EP2911314 B1	European Patent Office
										HU2013E787275	HUE035268 T2	HUNGARY
										IN2015DELNP403 2	IN4032DEN2015 A	INDIA
										WO2013CN78751	WO2013167018 A1	Patent Cooperation Treaty

47	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.331 TS 36.211 TS 36.331		ZTE Corporation	US201314649290	US9638804 B2	Method for transmitting pseudolite system messages, pseudolite positioning system and associated device	UNITED STATES	CN201210535369	CN103874029 B	CHINA
									EP20130862827	EP2933652 A4	European Patent Office
									JP20150545646	JP6333636 B2	JAPAN
									WO2013CN83564	WO2014090001 A1	Patent Cooperation Treaty
48	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201314436136	US9705641 B2	Method and Device for Sending Answer Information	UNITED STATES	CN201210395054	CN103780361 B	CHINA
									EP20130846956	EP2911332 A4	European Patent Office
									WO2013CN85182	WO2014059910 A1	Patent Cooperation Treaty
49	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423		ZTE Corporation	US201314439072	US9820220 B2	TRANSFER METHOD AND DONOR ENODEB FOR SUBFRAME CONFIGURATION INFORMATION OF SERVING CELL	UNITED STATES	CN201210429652	CN103796235 B	CHINA
									EP20130851870	EP2903315 B1	European Patent Office
									ES20130851870T	ES2673000 T3	SPAIN
									JP20150540024	JP6072272 B2	JAPAN
									WO2013CN81525	WO2014067317 A1	Patent Cooperation Treaty
50	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.413 TS 36.423		ZTE Corporation	US201314758905	US9894695 B2	Network Access System and Method	UNITED STATES	CN20131027028	CN103945559 B	CHINA
									EP20130793790	EP2947950 A4	European Patent Office
									JP20150552977	JP6239006 B2	JAPAN
									WO2013CN79992	WO2013174335 A3	Patent Cooperation Treaty
51	5G, LTE Advanced Pro/5G	TS 36.331 TS 36.413 TS 36.423 TS 37.320		ZTE Corporation	US201314647917	US9674738 B2	Method and Device for Maintaining Neighbor Information of Mobile Relay	UNITED STATES	CN201210498973	CN103856991 A	CHINA
									EP20130858568	EP2928222 B1	European Patent Office
									JP20150544325	JP6134002 B2	JAPAN
									WO2013CN81671	WO2014082473 A1	Patent Cooperation Treaty
52	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201314760874	US10172154 B2	Method and Device for Sending Control Information and Method and Device for Receiving Control Information	UNITED STATES	CN20131012980	CN103929779 B	CHINA
									EP20130871186	EP2945454 B1	European Patent Office
									WO2013CN87427	WO2014107994 A1	Patent Cooperation Treaty
53	5G	TS 36.323 TS 36.331 TS 36.423 TS 36.413 TS 36.473		ZTE Corporation	US201314762807	US9853987 B2	Method, apparatus and system for realizing security detection in heterogeneous network	UNITED STATES	CN20131029731	CN103974238 B	CHINA
									EP20130872848	EP2950572 B1	European Patent Office
									JP20150554020	JP6174715 B2	JAPAN
									WO2013CN86516	WO2014114121 A1	Patent Cooperation Treaty
54	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331		ZTE Corporation	US201314776817	US9912390 B2	Method for guaranteeing channel phase continuity of pre-coded RB groups, base station and computer-readable storage medium	UNITED STATES	CN201310123230	CN104104625 B	CHINA
									EP20130881811	EP2963964 B1	European Patent Office
									WO2013CN90476	WO2014166285 A1	Patent Cooperation Treaty

55	5G, LTE Advanced Pro/5G	TS 36.300 TS 36.331 TS 36.423			ZTE Corporation	US201414782074	US9668244 B2	Radio Resource Management Method, Macro Base Station, And Low-Power Node	UNITED STATES	CN201310130961	CN104113981 B	CHINA
										EP20140784982	EP2986898 B1	European Patent Office
										JP20160505684	JP6201034 B2	JAPAN
										WO2014CN70883	WO2014169718 A1	Patent Cooperation Treaty
56	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201414784763	US10070271 B2	Method and system for configuring, sending and receiving physical multicast channel	UNITED STATES	CN201310134132	CN104113914 B	CHINA
										EP20140784914	EP2988562 A4	European Patent Office
										WO2014CN75526	WO2014169824 A1	Patent Cooperation Treaty
57	5G, LTE Advanced Pro/5G	TS 36.133 TS 36.213 TS 36.300 TS 36.331			ZTE Corporation	US201414889936	US10582448 B2	Method for Selecting Available Access Network and User Equipment	UNITED STATES	CN201310169199	CN104144473 B	CHINA
										EP20140794016	EP2996403 A4	European Patent Office
										JP20160512201	JP2016518084 A	JAPAN
										WO2014CN73955	WO2014180190 A1	Patent Cooperation Treaty
58	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201314785065	US10021718 B2	Method and Device for Sending or Acquiring Grant Signaling	UNITED STATES	CN201310135921	CN104113925 B	CHINA
										EP20130882249	EP2988564 B1	European Patent Office
										WO2013CN91099	WO2014169694 A1	Patent Cooperation Treaty
59	LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.214 TS 36.331			ZTE Corporation	US201314761032	US10015780 B2	CONTROL CHANNEL TRANSMISSION, TRANSMISSION PROCESSING METHOD AND APPARATUS, NETWORK SIDE DEVICE AND TERMINAL	UNITED STATES	CN20131014370	CN103929266 B	CHINA
										EP20130872109	EP2947938 B1	European Patent Office
										JP20150552979	JP6312706 B2	JAPAN
										WO2013CN83246	WO2014110907 A1	Patent Cooperation Treaty
60	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201414903598	US9832793 B2	Method for Accessing Channel under Spatial Multiplexing and Station	UNITED STATES	CN201310292588	CN104284441 B	CHINA
										EP20140788354	EP3007510 B1	European Patent Office
										WO2014CN76104	WO2014173307 A1	Patent Cooperation Treaty
61	5G	TS 36.211 TS 36.331 TS 36.212 TS 36.213 TS 36.214			ZTE Corporation	US201313844988	US9197343 B2	Transmitting methods of a signal on a random access channel in a wireless communication system	UNITED STATES	CN20081003737	CN101217808 B	CHINA
										EP20090703484	EP2204913 B1	European Patent Office
										JP20100530264	JP5274567 B2	JAPAN
										KR20107009647	KR20100058677 A	KOREA (REPUBLIC OF)
										US20090808309	US8416718 B2	UNITED STATES
										WO2009CN70185	WO2009092329 A1	Patent Cooperation Treaty

62	5G, LTE Advanced Pro/5G	TS 38.300 TS 38.331 TS 36.413 TS 38.423			ZTE Corporation	US201415025647	US9955417 B2	Method for realizing awakening of small cell, access network element device and computer storage medium	UNITED STATES	CN201310461387	CN104519557 B	CHINA
										EP20140791977	EP3051886 B1	European Patent Office
										WO2014CN75535	WO2014176978 A1	Patent Cooperation Treaty
63	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE Corporation	US201414910429	US9980254 B2	Control Channel Transmission Method, Transmission Processing Method, Communication Node and Terminal	UNITED STATES	CN201310344327	CN104349458 B	CHINA
										EP20140787460	EP3021626 B1	European Patent Office
										WO2014CN00513	WO2014173185 A1	Patent Cooperation Treaty
64	LTE Advanced Pro/5G	TS 36.300 TS 36.304 TS 36.331 TS 36.413 TS 36.423			ZTE Corporation	US201414910985	US10117151 B2	METHOD AND DEVICE FOR PROCESSING INFORMATION INTERACTION, OFFLOADIN G PROCESSING METHOD AND DEVICE, BASE STATION, RNC AND UE	UNITED STATES	CN201310344672	CN104349380 B	CHINA
										EP20140834846	EP3032853 B1	European Patent Office
										JP20180532209	JP6288290 B2	JAPAN
										WO2014CN78454	WO2015018213 A1	Patent Cooperation Treaty
65	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.423			ZTE Corporation	US201414910584	US10271363 B2	Device Discovery Method and User Equipment, and Network-Side Device	UNITED STATES	CN201310343919	CN104349421 B	CHINA
										EP20140834713	EP3032887 B1	European Patent Office
										WO2014CN80637	WO2015018239 A1	Patent Cooperation Treaty
66	5G, LTE Advanced Pro/5G	TS 38.211 TS 36.212 TS 36.213 TS 38.331			ZTE Corporation	US201415025180	US10440734 B2	Scheduling configuration method and device, and storage medium	UNITED STATES	CN201310443156	CN104469960 B	CHINA
										WO2014CN77321	WO2015043198 A1	Patent Cooperation Treaty
67	5G, LTE Advanced Pro/5G	TS 38.211 TS 36.212 TS 38.213 TS 36.331			ZTE Corporation	US201415029378	US9907026 B2	Method and Device for Signaling Interaction Between Nodes, Uplink Power Control, and Uplink Transmission	UNITED STATES	CN201310486106	CN104581911 B	CHINA
										WO2014CN77716	WO2014187279 A1	Patent Cooperation Treaty
68	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE Corporation	US201415311428	US10701646 B2	Wireless Synchronization Method, Wireless Synchronization System and Computer Storage Medium	UNITED STATES	CN201410211419	CN105101393 B	CHINA
										EP20140892836	EP3148265 A4	European Patent Office
										WO2014CN83075	WO2015176387 A1	Patent Cooperation Treaty
69	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE CORP	US201515519311	US10129063 B2	METHOD AND DEVICE FOR DETECTING SIGNAL OF LTE UPLINK SYSTEM IN INTERFERENCE CONDITION	UNITED STATES	CN201410555400	CN105577598 A	CHINA
										EP20150802701	EP3208983 A4	European Patent Office
										WO2015CN79103	WO2015184949 A1	Patent Cooperation Treaty

70	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201515521096	US10651887 B2	Multuser Communication Methods and Devices for Code Division Multiple Access (CDMA)	UNITED STATES	CN201410564307	CN105591994 B	CHINA
									EP20150853508	EP3211846 A4	European Patent Office
									JP20170522059	JP6598857 B2	JAPAN
									KR20177013428	KR20170072919 A	KOREA (REPUBLIC OF)
									WO2015CN83479	WO2016062120 A1	Patent Cooperation Treaty
71	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201615541279	US10505810 B2	DATA TRANSMISSION METHOD AND DEVICE	UNITED STATES	CN201410856604	CN105812109 B	CHINA
									EP20160732879	EP3242525 A4	European Patent Office
									US201916671575	US10917303 B2	UNITED STATES
									WO2016CN71633	WO2016107613 A1	Patent Cooperation Treaty
72	5G	TS 38.211 TS 38.321 TS 38.331 TS 38.212 TS 38.213		ZTE Corporation	US201515541023	US10412604 B2	Method and Device for Data Transmission in Wireless Communication Network	UNITED STATES	CN201410843623	CN105813201 B	CHINA
									EP20150874879	EP3226634 B1	European Patent Office
									WO2015CN87688	WO2016107193 A1	Patent Cooperation Treaty
73	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 37.106 TS 37.213		ZTE Corporation	US201515545158	US10292170 B2	METHOD AND DEVICE FOR ADAPTIVE DISCOVERY OF LICENSED-SHARED-ACCESS SYSTEM INTERFERENCE	UNITED STATES	CN20151030442	CN105873070 B	CHINA
									EP20150878603	EP3236616 B1	European Patent Office
									WO2015CN93801	WO2016115935 A1	Patent Cooperation Treaty
74	5G	TS 38.211 TS 38.321 TS 38.331 TS 38.213 TS 38.214		ZTE Corporation	US201615735752	US10764878 B2	METHOD AND DEVICE FOR TRANSMITTING SIGNAL	UNITED STATES	CN201510355058	CN106330418 B	CHINA
									CN202011118173	CN112242897 A	CHINA
									EP20160813518	EP3316509 A4	European Patent Office
									WO2016CN75346	WO2016206402 A1	Patent Cooperation Treaty
75	5G	TS 33.501		ZTE Corporation	US201615744733	US10136325 B2	METHOD FOR IMPLEMENTING ACCESS STRATUM SECURITY, USER EQUIPMENT, AND SMALL RADIO ACCESS NETWORK NODE	UNITED STATES	CN201510429851	CN108375989 B	CHINA
									WO2016CN76741	WO2016177143 A1	Patent Cooperation Treaty
76	5G	TS 38.211 TS 38.321 TS 38.331 TS 38.212 TS 38.214		ZTE Corporation	US201615744925	US10404504 B2	MODULATION METHOD, DEMODULATION METHOD, AND APPARATUS FOR MULTI-USER INFORMATION TRANSMISSION	UNITED STATES	CN201510459038	CN106411801 A	CHINA
									EP20160829709	EP3316538 A4	European Patent Office
									JP20180504865	JP6814198 B2	JAPAN
									KR20187003264	KR20180025936 A	KOREA (REPUBLIC OF)
									WO2016CN86449	WO2017016342 A1	Patent Cooperation Treaty

77	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201615749439	US10440684 B2	WIRELESS COMMUNICATION METHOD AND DEVICE	UNITED STATES	CN201510466640	CN106413097 B	CHINA
									EP20160832216	EP3331299 A4	European Patent Office
									WO2016CN90847	WO2017020728 A1	Patent Cooperation Treaty
78	LTE Advanced Pro/5G	TS 36.300 TS 36.463		ZTE Corporation	US201615748807	US10716030 B2	METHOD AND DEVICE FOR 3GPP-WLAN AGGREGATION	UNITED STATES	CN201510465927	CN106412949 B	CHINA
									EP20160789145	EP3331273 A4	European Patent Office
									JP20180505015	JP6668452 B2	JAPAN
								WO2016CN76859	WO2016177151 A1	Patent Cooperation Treaty	
79	LTE Advanced Pro/5G	TS 36.441 TS 36.443 TS 36.213 TS 36.300 TS 36.331		ZTE Corporation	US201615752395	US10524191 B2	SC-MCCH SENDING METHOD AND DEVICE, AND SC-PTM RECEIVING METHOD AND DEVICE	UNITED STATES	CN201510502055	CN106470398 A	CHINA
									EP20160836445	EP3324658 B1	European Patent Office
									WO2016CN83167	WO2017028581 A1	Patent Cooperation Treaty
80	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201615752477	US10841058 B2	METHOD AND DEVICE FOR NOTIFYING AND DETERMINING DMRS PORTS OR MAPPING RELATIONSHIP	UNITED STATES	CN201510626635	CN106470088 A	CHINA
									US202017081795	US2021044406 A1	UNITED STATES
									WO2016CN92891	WO2017028673 A1	Patent Cooperation Treaty
81	LTE, LTE-A	TS 36.300 TS 36.331 TS 23.303 TS 24.334		ZTE CORP	US201615752219	US10484866 B2	Device-to-device identification conflict solution method and device-to-device user equipment	UNITED STATES	CN201510502023		CHINA
									EP20160836474	EP3337194 A1	European Patent Office
									WO2016CN85302	WO2017028610 A1	Patent Cooperation Treaty
82	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201615761793	US10638518 B2	RANDOM ACCESS METHOD, APPARATUS, AND SYSTEM	UNITED STATES	CN201510605274		CHINA
									WO2016CN79065	WO2017049894 A1	Patent Cooperation Treaty
83	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201815934993	US10686571 B2	SIGNALING CONFIGURATION METHOD AND DEVICE	UNITED STATES	CN201510624710	CN106559169 B	CHINA
									WO2016CN93968	WO2017050034 A1	Patent Cooperation Treaty
84	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201615770480	US10574414 B2	PILOT SIGNAL TRANSMISSION METHOD AND APPARATUS, AND TRANSMITTING TERMINAL	UNITED STATES	CN201510698036	CN106612163 B	CHINA
									EP20160856782	EP3382970 A4	European Patent Office
									WO2016CN98887	WO2017067349 A1	Patent Cooperation Treaty

85	5G	TS 23.501 TS 38.211 TS 38.331 TS 38.213 TS 38.214			ZTE CORP	US201816194231	US10784795 B2	CONNECTION PROCESSING METHOD AND DEVICE	UNITED STATES	CN201610356646	CN107398455 B	CHINA
										EP20170798717	EP3461214 A4	European Patent Office
										WO2017CN84579	WO2017198154 A1	Patent Cooperation Treaty
86	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE Corporation	US201616069584	US10492198 B2	UPLINK ACCESS METHOD, DEVICE, AND TERMINAL, AND BASE STATION	UNITED STATES	CN20161018535		CHINA
										WO2016CN94389	WO2017121109 A1	Patent Cooperation Treaty
87	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			QUALCOMM INC	US201414584993	US10560710 B2	METHOD FOR CODING RECOVERY POINT SUPPLEMENTAL ENHANCEMENT INFORMATION (SEI) MESSAGES AND REGION REFRESH INFORMATION SEI MESSAGES IN MULTI-LAYER CODING	UNITED STATES	CA20142930165	CA2930165 A1	CANADA
										CN20148071247	CN105850138 B	CHINA
										EP20140824336	EP3090556 A1	European Patent Office
										JP20160544374	JP2017507539 A	JAPAN
										KR20167019860	KR20160104642 A	KOREA (REPUBLIC OF)
WO2014US72715	WO2015103240 A1	Patent Cooperation Treaty										
88	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE Corporation	US201716068853	US10736149 B2	A METHOD AND APPARATUS FOR RANDOM ACCESS	UNITED STATES	CN201610266416	CN106973441 B	CHINA
										CN202010124877	CN111107662 A	CHINA
										EP20170738193	EP3404991 B1	European Patent Office
										EP20200186397	EP3755110 A1	European Patent Office
										JP20180536228	JP2019508932 A	JAPAN
										KR20187023225	KR20180102630 A	KOREA (REPUBLIC OF)
US202016937133	US2020367291 A1	UNITED STATES										
WO2017CN71105	WO2017121380 A1	Patent Cooperation Treaty										
89	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE Corporation	US201716069452	US10637618 B2	DATA TRANSMISSION METHOD AND DEVICE	UNITED STATES	CN20161017538	CN106961317 B	CHINA
										WO2017CN73039	WO2017121409 A1	Patent Cooperation Treaty
90	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE Corporation	US201716069350	US10491445 B2	DATA MODULATION FOR USE IN MULTI-CARRIER SYSTEM, DEMODULATION METHOD, FRAME GENERATION METHOD, AND NODE	UNITED STATES	CN20161016772	CN106961406 B	CHINA
										CN20201117263	CN112202699 A	CHINA
										WO2017CN73168	WO2017121412 A1	Patent Cooperation Treaty
91	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE Corporation	US201716069033	US10523488 B2	DATA MODULATION AND DEMODULATION METHOD AND DATA TRANSMISSION METHOD AND NODE FOR MULTI-CARRIER SYSTEM	UNITED STATES	CN20161015419	CN106961405 B	CHINA
										WO2017CN73047	WO2017121410 A1	Patent Cooperation Treaty

92	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201716073764	US10581661 B2	DATA PROCESSING METHOD AND DEVICE	UNITED STATES	CN20161066883	CN107026809 B	CHINA
									CN202011165352	CN112422469 A	CHINA
									US202016752486	US10931501 B2	UNITED STATES
									WO2017CN71425	WO2017129001 A1	Patent Cooperation Treaty
93	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201716075320	US10735055 B2	METHOD AND DEVICE FOR REDUCING COMPLEXITY OF CHANNEL QUANTIZATION	UNITED STATES	CN20161082766		CHINA
									WO2017CN72255	WO2017133549 A1	Patent Cooperation Treaty
94	5G	TS 23.401 TS 23.501		ZTE Corporation	US201616074051	US10715982 B2	A METHOD, APPARATUS, AND SYSTEM FOR DATA TRANSMISSION	UNITED STATES	CN20161081306	CN107040398 B	CHINA
									CN202010344055	CN111629361 A	CHINA
									EP20160889104	EP3413510 A4	European Patent Office
									WO2016CN10601 3	WO2017133297 A1	Patent Cooperation Treaty
95	5G	TS 38.211 TS 38.321 TS 38.331 TS 38.212 TS 38.213		ZTE CORP	US201616168820	US10652064 B2	TECHNIQUES FOR COMMUNICATING SYNCHRONIZATION SIGNAL TIMING INFORMATION	UNITED STATES	CN20178090454	CN110603953 B	CHINA
									CN202011410250	CN112566238 A	CHINA
									EP20170908237	EP3520490 A1	European Patent Office
									JP20190560102	JP2020519134 A	JAPAN
									KR20197036049	KR20200004378 A	KOREA (REPUBLIC OF)
									US202016872354	US2020274748 A1	UNITED STATES
96	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201616127220	US10863554 B2	SIGNAL SENDING METHOD AND APPARATUS, AND RESOURCE NOTIFICATION METHOD AND APPARATUS	UNITED STATES	CN201610161725	CN107205281 B	CHINA
									EP20170765784	EP3445122 A4	European Patent Office
									WO2017CN76164	WO2017157242 A1	Patent Cooperation Treaty
97	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201616067546	US10721740 B2	METHOD, APPARATUS, AND COMPUTER STORAGE MEDIUM FOR THE TRANSMISSION OF MESSAGES DURING RANDOM ACCESS	UNITED STATES	CN20161016612	CN106981746 B	CHINA
									EP20160884764	EP3404989 B1	European Patent Office
									ES20160884764T	ES2801652 T3	SPAIN
									JP20180536141	JP6545911 B2	JAPAN
									KR20187022997	KR20180102624 A	KOREA (REPUBLIC OF)
									WO2016CN10892 2	WO2017121212 A1	Patent Cooperation Treaty

98	5G	TS 38.211 TS 38.321 TS 38.331 TS 38.212 TS 38.213		ZTE Corporation	US201816200359	US10594528 B2	METHOD AND APPARATUS FOR SEQUENCE GENERATION	UNITED STATES	CN20178093660	CN111052813 A	CHINA
									EP20170908767	EP3459299 A4	European Patent Office
									JP20190549002	JP2020530212 A	JAPAN
									KR20197030166	KR20200016831 A	KOREA (REPUBLIC OF)
									US202016783038 WO2017CN88494	US2020177427 A1 WO2018227490 A1	UNITED STATES Patent Cooperation Treaty
99	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.201		ZTE CORP	US201816171314	US10523237 B2	METHOD AND APPARATUS FOR DATA PROCESSING WITH STRUCTURED LDPC CODES	UNITED STATES	CN201610879343	CN107370489 B	CHINA
									CN202010593842	CN111565052 A	CHINA
									EP20160901513	EP3457574 A4	European Patent Office
									US201916730982 WO2016CN10474 4	US2020136648 A1 WO2017193558 A1	UNITED STATES Patent Cooperation Treaty
100	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201816207077	US10812239 B2	METHOD AND APPARATUS FOR INFORMATION REPORTING, AND METHOD AND APPARATUS FOR INFORMATION TRANSMISSION	UNITED STATES	CN201710687945	CN108111278 B	CHINA
									EP20180843995	EP3512150 A4	European Patent Office
									JP20200507083	JP2020530241 A	JAPAN
									KR20207007091	KR20200038986 A	KOREA (REPUBLIC OF)
									US202017074519 WO2018CN98524	US2021038815 A1 WO2019029343 A1	UNITED STATES Patent Cooperation Treaty
101	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE Corporation	US201716336301	US10742272 B2	CHANNEL INFORMATION FEEDBACK METHOD AND APPARATUS, TERMINAL AND BASE STATION	UNITED STATES	CN201610879367	CN107888265 B	CHINA
									EP20170854541	EP3522388 A4	European Patent Office
									EP20200203319	EP3793099 A1	European Patent Office
									WO2017CN93558	WO2018059087 A1	Patent Cooperation Treaty
102	5G	TS 38.211 TS 38.321 TS 38.331 TS 38.213 TS 38.214		ZTE Corporation	US201916506777	US10849120 B2	METHODS, APPARATUS AND SYSTEMS FOR DETERMINING A SIZE OF A FEEDBACK SIGNAL IN A WIRELESS COMMUNICATION	UNITED STATES	BR20201109812	BR112020009812 A2	BRAZIL
									CA20173082234	CA3082234 A1	CANADA
									CN20178098833	CN111357368 A	CHINA
									EP20170931829	EP3563620 A4	European Patent Office
									JP20200527062	JP2021503257 A	JAPAN
									KR20207017268 WO2017CN11173 2	KR20200088412 A WO2019095317 A1	KOREA (REPUBLIC OF) Patent Cooperation Treaty

103	5G	TS 38.211 TS 38.213 TS 38.211 TS 38.331 TS 38.213		ZTE Corporation	US201916525250	US10693611 B2	METHOD AND APPARATUS FOR TRANSMITTING A REFERENCE SIGNAL	UNITED STATES	AU20180382109	AU2018382109 A1	AUSTRALIA
									BR20201111631	BR112020011631 A2	BRAZIL
									CA20183085390	CA3085390 A1	CANADA
									CN201711311872	CN109905217 B	CHINA
									EP20180888629	EP3565352 A4	European Patent Office
									JP20200549858	JP2021508219 A	JAPAN
									KR20207019783	KR20200093049 A	KOREA (REPUBLIC OF)
									US202016899454	US2020304264 A1	UNITED STATES
WO2018CN12040 1	WO2019114710 A1	Patent Cooperation Treaty									
104	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214		ZTE CORP	US201916539971	US10849185 B2	METHOD AND DEVICE FOR MESSAGE DELIVERY AND FOR DISCONTINUOUS TRANSMISSION	UNITED STATES	CN20161083942	CN107046728 B	CHINA
									EP20170746885	EP3393193 B1	European Patent Office
									JP20180540866	JP6685412 B2	JAPAN
									JP20200081943	JP2020114012 A	JAPAN
									KR20187025089	KR102214371 B1	KOREA (REPUBLIC OF)
									US201815924081	US10440774 B2	UNITED STATES
WO2017CN72399	WO2017133565 A1	Patent Cooperation Treaty									
105	5G	TS 38.211 TS 38.213 TS 38.211 TS 38.331 TS 38.213		ZTE CORP	US201918680476	US10931357 B2	METHOD AND APPARATUS FOR RECEIVING CQI INFORMATION AND METHOD AND APPARATUS FOR TRANSMITTING CQI INFORMATION	UNITED STATES	CN201510627208	CN106559171 B	CHINA
									CN202010582361	CN111769860 A	CHINA
									EP20160848154	EP3355502 A4	European Patent Office
									JP20180515486	JP6830100 B2	JAPAN
									KR20187011764	KR20180074691 A	KOREA (REPUBLIC OF)
									US201815934991	US10516464 B2	UNITED STATES
WO2016CN99875	WO2017050273 A1	Patent Cooperation Treaty									
106	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.331 TS 38.211 TS 38.331 TS 38.213		ZTE USA INC	US201414889925	US10080217 B2	SYSTEM AND METHOD FOR USING SYNCHRONIZATION SIGNAL FOR DEMODULATION REFERENCE	UNITED STATES	CN20148025545	CN105191247 A	CHINA
									EP20140794391	EP2995055 B1	European Patent Office
									HK20160106386	HK1218473 A1	HONG KONG
									JP20160513048	JP6130054 B2	JAPAN
									WO2014US37183	WO2014182837 A1	Patent Cooperation Treaty
107	5G, LTE Advanced Pro/5G	TS 38.300 TS 38.413 TS 38.300 TS 38.413		ZTE USA INC	US201314439627	US9351216 B2	SUPPORTING A BASE STATION TO ENTER AND LEAVE SLEEP MODE IN A WIRELESS COMMUNICATION SYSTEM	UNITED STATES	CN20138068820	CN104885520 B	CHINA
									EP20130850895	EP2912890 B1	European Patent Office
									HK20160102441	HK1214461 A1	HONG KONG
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108	5G, LTE Advanced Pro/5G	TS 38.213 TS 38.321 TS 38.321 TS 38.213			ZTE USA INC	US201314383497	US9635652 B2	OPTIMIZED TRANSMISSION OF MACHINE TYPE COMMUNICATION DATA FROM A MOBILE DEVICE TO A WIRELESS NETWORK	UNITED STATES	CN20138015844	CN104205670 B	CHINA
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109	5G, LTE Advanced Pro/5G	TS 38.213 TS 38.423 TS 38.331 TS 38.213 TS 38.423			ZTE USA INC	US201314379254	US9736788 B2	INTERFERENCE MANAGEMENT IN THE HETEROGENEOUS NETWORK	UNITED STATES	CN20138014398	CN104170278 B	CHINA
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110	5G, LTE Advanced Pro/5G	TS 38.211 TS 38.213 TS 38.211 TS 38.213			ZTE USA INC	US201213582243	US8937891 B2	DYNAMIC ADJUSTMENT OF DOWNLINK/ULINK ALLOCATION RATIO IN TDD WIRELESS SYSTEMS	UNITED STATES	CA20092714421	CA2714421 C	CANADA
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111	5G	TS 38.211 TS 38.331 TS 38.212 TS 38.213 TS 38.214			ZTE CORP	EP20180201545	EP3454592 B1	METHOD AND DEVICE FOR DETECTING DOWNLINK CONTROL INFORMATION	European Patent Office	BR20121116267	BR112012016267 B1	BRAZIL
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113	5G, LTE Advanced Pro/5G	TS 36.211 TS 36.212 TS 36.213 TS 36.331			ZTE CORP	EP20190157893	EP3544365 B1	METHOD, DEVICE, AND COMPUTER STORAGE MEDIUM FOR RADIO CONNECTION	European Patent Office	CN201310486110	CN104581854 B	CHINA
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