

# GLOSSARY

3GPP	Third Generation Partnership Project. Unites seven telecommunications standards development organizations, known as “Organizational Partners” and provides their members with a stable environment to produce the reports and specifications that define 3GPP technologies.
ACN	Automatic Crash Notification (aka Automatic Collision Notification). A system which enables an automated notification when a vehicle is involved in a severe crash. Such a system, for instance, may initiate a transmission when an airbag is deployed, or when an installed accelerometer detects an impact exceeding a given magnitude.
AED	Automated External Defibrillator. A device that analyzes the heart rhythm in victims of sudden cardiac arrest and delivers an electrical shock to restore normal rhythm.
ALI	Automatic Location Identification. The automatic display at the PSAP of the address/location of the device that called 9-1-1.
ANI	Automatic Number Identification. The automatic display at the PSAP of the telephone number associated with the line that called 9-1-1.
ANS	American National Standard. A standard that has been sponsored by an ANSI-accredited SDO and met ANSI’s Essential Requirements.
ANSI	American National Standards Institute. A private, not-for-profit organization that oversees the creation, promulgation, and use of thousands of norms and guidelines that directly impact businesses in nearly every sector. ANSI facilitates the development of American National Standards by accrediting the procedures of SDOs. These groups work cooperatively to develop voluntary national consensus standards.
APCO	Association of Public-Safety Communications Officials International. APCO is the world’s oldest and largest organization of public safety communications professionals. It serves the needs of public safety communications practitioners worldwide - and the welfare of the general public as a whole - by providing complete expertise, professional development, technical assistance, advocacy, and outreach.
API	Application Programming Interface. A set of routines, protocols, and tools for building software applications.
ASAP	Automated Secure Alarm Protocol. A national program for processing information from alarm monitoring stations to PSAPs. The protocol was founded through the joint partnership of APCO, the Monitoring Association, and the National Law Enforcement Telecommunications System.
ATIS	Alliance for Telecommunications Industry Solutions. A forum where information and communications technology companies convene to find solutions to their most pressing shared challenges. ATIS is accredited by ANSI and is the North American Organizational Partner for 3GPP.

AV	Audio Visual. Used as a generic term for the audio and video components and capabilities in any system.
AVL	Automatic Vehicle Location. A system for automatically determining and transmitting the geographic location of a vehicle.
BCF	Border Control Function. Provides security filtering of all types of transactions with an ESInet. There may be several BCFs to support all ingress and egress points of an ESInet.
CAD	Computer Aided Dispatch. A computer-based system that assists PSTs with activities such as call input, dispatching, call status maintenance, event notes, field unit status and tracking, and call resolution and disposition.
CAMA	Centralized Automated Message Accounting. A type of analog transmission protocol that transmits a telephone number via multi-frequency encoding.
CIO	Chief Information Officer. An executive-level position focused on overseeing the people, processes, and technologies within an IT department in order to support the department goals.
CISM	Critical Incident Stress Management. An adaptive, short-term psychological aid process that can include pre-incident preparedness, acute crisis management, and post-crisis follow-up.
CISO	Chief Information Security Officer. The senior-level executive within an organization responsible for establishing and maintaining the enterprise vision, strategy, and program to ensure information assets and technologies are adequately protected.
CPE	Customer Premise Equipment. Enables the delivery of a voice-generated request for assistance from a 9-1-1 caller to a PST.
CPR	Cardiopulmonary Resuscitation. An emergency procedure that combines chest compressions with artificial ventilation in an effort to manually preserve intact brain function until further measures are taken to restore spontaneous blood circulation and breathing in a person who is in cardiac arrest.
CTO	Chief Technology Officer. An executive-level position focused on technological issues within an organization.
DDoS	Distributed Denial of Service. A cyber-attack whereby multiple systems are used to flood a targeted server with traffic in an attempt to overwhelm its resources (bandwidth, memory, processing power, etc.), making it unavailable to respond to legitimate users.
DHS	Department of Homeland Security. A federal agency designed to protect the United States against threats. Its wide-ranging duties include aviation security, border control, emergency response, and cybersecurity.
DHS NCCIC	DHS National Cybersecurity Communications Integration Center. A 24x7 cyber situational awareness, incident response, and management center that is a national nexus of cyber and communications integration for the federal government, intelligence community, and law enforcement.
E9-1-1	Enhanced 9-1-1. A system that enables the delivery of a caller's phone number and location information to the PSAP receiving the call.

EC3	Emergency Communications Cybersecurity Center. In the proposed NG9-1-1 cybersecurity architecture, the EC3 would provide IDPS to PSAPs and any other emergency communications services that would benefit from utilizing centralized, core cybersecurity services.
ECC	Emergency Communications Center. A facility with capabilities that include intelligence collection and monitoring, 9-1-1 multimedia traffic processing, full scale dispatch, and incident command capabilities.
ECRF	Emergency Call Routing Function. A component of an NG9-1-1 system that accurately routes 9-1-1 calls to the appropriate PSAP based on the caller's location.
EIDD	Emergency Incident Data Document. Provides a standardized, vendor-neutral NIEM conformant (XML-based) specification for exchanging emergency incident information to agencies and regions that implement NG9-1-1 and IP-based emergency communications systems. Emergency incident information exchanges supported by the EIDD include exchanges between disparate manufacturers' systems located within one or more public safety agencies and with other incident stakeholders.
EMD	Emergency Medical Dispatch. A systematic program of handling medical calls. Trained PSTs, using locally approved guide cards, quickly and properly determine the nature and priority of the call, dispatch the appropriate response, then give the caller instructions to help treat the patient until the responding EMS unit arrives.
EMS	Emergency Medical Services. A type of emergency service dedicated to providing out-of-hospital acute medical care, transport to definitive care, and other medical transport to patients with illnesses and injuries which prevent the patient from transporting themselves.
ENUM	Proposed Standard RFC 2916 from the IETF for a domain name system-based method for mapping telephone numbers to URLs. This protocol will assist in the convergence of the PSTN and the IP network; it is the mapping of a telephone number from the PSTN to Internet services — telephone number in, URL out. ENUM was developed as a solution to the question of how to find services on the Internet using only a telephone number, and how telephones, which have an input mechanism limited to twelve keys on a keypad, can be used to access Internet services.
EOC	Emergency Operations Center. A central command and control facility responsible for carrying out the principles of emergency preparedness and emergency management, or disaster management functions at a strategic level during an emergency, and ensuring the continuity of operation of a company, political subdivision, or other organization.
ESInet	Emergency Services IP Network. An IP-based network used for emergency communications.
ESN	Emergency Service Number. A designation that identifies the appropriate PSAP to receive the call as well as the responding emergency service agencies based on the caller's geographic location.
ESRP	Emergency Service Routing Proxy. A functional element that selects the next hop routing within the ESInet based on location and policy.
FCC	Federal Communications Commission. Regulates interstate and international communications by radio, television, wire, satellite, and cable in all 50 states, the District of Columbia, and U.S. territories. An independent U.S. government agency overseen by Congress, the Commission is the federal agency responsible for implementing and enforcing America's communications laws and regulations.

FEMA	Federal Emergency Management Agency. A federal agency with the mission of supporting citizens and first responders to prepare for, protect against, respond to, recover from, and mitigate all hazards.
FOIA	Freedom of Information Act. A state or federal law that grants the public access to information possessed by government agencies. Typically, upon written request, agencies are required to release information unless it falls under an exemption.
FirstNet	First Responder Network Authority. The Middle Class Tax Relief and Job Creation Act of 2012 created FirstNet as an independent authority within the National Telecommunications and Information Administration to provide emergency responders with the first nationwide, high-speed, broadband network dedicated to public safety.
GIS	Geographic Information System. A system designed to capture, store, manipulate, analyze, manage, and display all kinds of spatial or geographical data.
GPS	Global Positioning System. A satellite-based global navigation system that transmits signals that are used for three-dimensional (latitude, longitude, and elevation) global navigation (position determination) and for the dissemination of precise time. GPS-derived position determination is based on the arrival times, at an appropriate receiver, of precisely-timed signals from satellites.
HAZMAT	Hazardous Material. A material (such as flammable or poisonous material) that would be a danger to life or to the environment if released without precautions.
HIPAA	Health Insurance Portability and Accountability Act. A federal law that, among other things, requires the protection and confidential handling of protected health information.
HSS	Home Subscriber Server. This server manages authentication to support IMS network entities.
ICAM	Identity, Credential, and Access Management. Represents the intersection of digital identities, credentials, and access control into one comprehensive approach.
ICS	Incident Command System. A standardized on-scene incident management concept designed specifically to allow responders to adopt an integrated organizational structure equal to the complexity and demands of any single incident or multiple incidents without being hindered by jurisdictional boundaries.
I-CSCF	Intermediate-Call Session Control Function. Used for exchanging messages between IMS and external IP networks.
IDPS	Intrusion Detection and Prevention System. A network security/threat prevention technology that examines network traffic flows to detect and prevent vulnerability exploits.
IEEE	Institute of Electrical and Electronics Engineers. A non-profit, global association of professionals working toward the development, implementation, and maintenance of technology-centered products and services.
IETF	Internet Engineering Task Force. One of the task forces (with more than 40 working groups) of the Internet Architecture Board, responsible for solving short-term engineering needs of the Internet.
IJIS	Integrated Justice Information System. A computer network, system, or architecture that allows entities to electronically access and share information between systems and across jurisdictional lines.

IMS	IP Multimedia Subsystem. An architectural framework for delivering IP multimedia services.
IoT	Internet of Things. Refers to the ever-growing network of physical objects that feature an IP address for Internet connectivity, and the communication that occurs between these objects and other Internet-enabled devices and systems.
IP	Internet Protocol. A standard protocol designed for use in interconnected systems of packet-switched computer communication networks.
IPAWS	Integrated Public Alert and Warning System. Established by Presidential Executive Order 13407, IPAWS is an integrated alerts system that allows the President to send a message to the American people quickly and simultaneously through multiple communications pathways. IPAWS is also available to federal, state, local, territorial, and tribal government officials as a way to alert the public via the Emergency Alert System, Wireless Emergency Alerts, NOAA Weather Radio and other National Weather Service dissemination channels, the Internet, existing unique warning systems, and emerging distribution technologies.
IT	Information Technology. The study or use of computers for storing, retrieving, and sending information.
ITU	International Telecommunication Union. A specialized agency of the United Nations that is responsible for issues that concern information and communication technologies.
LATA	Local Access Transport Areas. A term in the U.S. for a geographic area covered by one or more local telephone companies, which are legally referred to as local exchange carriers.
LMR	Land Mobile Radio. A wireless communications system intended for use by terrestrial users in vehicles (mobiles) or on foot (portables).
LNG	Legacy Network Gateways. An NG9-1-1 functional element that provides an interface between a non-IP originating network and a next generation core services enabled network.
LSRG	Legacy Selective Router Gateway. Provides an interface between a 9-1-1 selective router and an ESInet, enabling calls to be routed and/or transferred between legacy and next generation networks.
LTE	Long Term Evolution. An international standard for high-speed wireless communication for mobile phones and data terminals developed by 3GPP.
LZ	Landing Zone. An area where aircraft can land.
M2M	Machine-to-Machine. A broad label that can be used to describe any technology that enables networked devices to exchange information and perform actions without the manual assistance of humans.
MAYDAY	An emergency procedure term used as a distress signal in voice radio communications.
MDT/C	Mobile Data Terminal/Computer. A computerized device used in emergency vehicles, such as police cars, to communicate with a PSAP. They are also used to display mapping and information relevant to the tasks and actions performed by the vehicle such as CAD drawings, diagrams, and safety information.
MOU	Memorandum of Understanding. A formal agreement between two or more parties. Companies, organizations, and governmental entities can use MOUs to establish official partnerships.

MPC	Mobile Positioning Center. A functional entity that provides an interface between the wireless originating network and the emergency services network. The MPC retrieves, forwards, stores, and controls position data within the location services network.
MSAG	Master Street Address Guide. A database of street names and house number ranges within their associated communities defining Emergency Service Zones and their associated ESNs to enable proper routing of 9-1-1 calls.
MS-ISAC	Multi-State Information Sharing and Analysis Center. A focal point for cyber threat protection, response, and recovery for the nation's state, local, tribal and territorial governments.
NCC	National Coordinating Center for Communications. A component of DHS that continuously monitors national and international incidents and events that may impact emergency communications. Incidents include not only acts of terrorism, but also natural events such as tornadoes, floods, hurricanes, and earthquakes.
NCISP	National Criminal Intelligence Sharing Plan. An intelligence-sharing initiative that links the computer databases of local, state, regional, and tribal law enforcement agencies with those of the federal government.
NENA	National Emergency Number Association. An organization whose mission is to work with 9-1-1 professionals nationwide, public policy leaders, emergency services and telecommunications industry partners, like-minded public safety associations, and other stakeholder groups to develop and carry out critical programs and initiatives, to facilitate the creation of an IP-based Next Generation 9-1-1 system, and to establish industry leading standards, training, and certifications.
NG9-1-1	Next Generation 9-1-1. A secure, nationwide, interoperable, standards-based, all-IP emergency communications infrastructure enabling end-to-end transmission of all types of data, including voice and multimedia communications from the public to an Emergency Communications Center.
NGCS	Next Generation Core Services. The base set of services needed to process a 9-1-1 call on an ESInet.
NIEM	National Information Exchange Model. An XML-based information exchange framework for sharing data between communities of interest.
NIMS	National Incident Management System. A systematic, proactive approach to guide departments and agencies at all levels of government and the private sector to work together seamlessly and manage incidents involving all threats and hazards - regardless of cause, size, location, or complexity - in order to reduce loss of life, property, and harm to the environment.
NIST	National Institute of Standards and Technology. NIST's mission is to promote U.S. innovation and industrial competitiveness by advancing measurement science, standards, and technology in ways that enhance economic security and improve our quality of life. NIST is a non-regulatory federal agency within the U.S. Department of Commerce.
NPSBN	Nationwide Public Safety Broadband Network. A nationwide wireless data network dedicated to public safety.
OSP	Originating Service Provider. A communications provider that allows its users or subscribers to originate 9-1-1 voice or non-voice messages from the public to the 9-1-1 authority.

OTT	Over the Top. OTT generally refers to applications that operate on IP-based mobile data networks and that consumers can typically install on data-capable mobile devices.
PCRF	Policy and Charging Rules Function. This element is responsible for managing resources for end users based upon end user role and application requirements.
P-CSCF	Proxy-Call Session Control Function. The first contact point for user equipment within the IMS core network.
PII	Personally Identifiable Information. Any information about an individual maintained by an agency, including (1) any information that can be used to distinguish or trace an individual's identity, such as name, social security number, date and place of birth, mother's maiden name, or biometric records; and (2) any other information that is linked or linkable to an individual, such as medical, educational, financial, and employment information.
PIO	Public Information Officer. The communications coordinator or spokesperson of certain governmental organizations (i.e. city, county, school district, state government, and police/fire departments).
PSAP	Public Safety Answering Point. A facility equipped and staffed to receive emergency and non-emergency public safety calls for service via telephone and other communication devices. Emergency calls for service are answered, assessed, classified, and prioritized.
PSCR	Public Safety Communications Research. Located within NIST, PSCR provides research, development, testing, and evaluation to foster nationwide communications interoperability.
PST	Public Safety Telecommunicator. An individual employed by a public safety agency as the first of the first responders whose primary responsibility is to receive, process, transmit, and/or dispatch emergency and non-emergency calls for service for law enforcement, fire, emergency medical, and other public safety services via telephone, radio, and other communication devices.
PSTN	Public Switched Telephone Network. The network of equipment, lines, and controls assembled to establish communication paths between calling and called parties in North America.
QA/QI	Quality Assurance/Quality Improvement. Actions taken to ensure that standards and procedures are adhered to and that delivered products or services meet performance requirements.
QoS	Quality of Service. A measurement of latency, packet loss, and jitter in data transmission.
RFP	Request for Proposal. A document that solicits proposals, often made through a bidding process, by an agency or company interested in procurement of a commodity, service, or valuable asset, to potential suppliers to submit business proposals.
RMS	Records Management System. A system that provides for the storage, retrieval, retention, manipulation, archiving, and viewing of information, records, documents, or files.
RTCC	Real Time Crime Center. A centralized technology center that leverages a variety of data to prevent and respond to crime. This can include live video feeds, social media, 9-1-1 call information, incident mapping, historical data, license plate readers, arrest information, and other sources of information.
SBC	Session Border Control. A functional element regularly deployed in VoIP networks to exert control over the signaling and usually also the media streams involved in setting up, conducting, and tearing down telephone calls or other interactive media communications.

S-CSCF	Serving-Call Session Control Function. The element in the IMS core network that handles the session states.
SDO	Standards Development Organization. An entity whose primary activities are developing, coordinating, promulgating, revising, amending, reissuing, interpreting, or otherwise maintaining standards that address the interests of a wide base of users.
SGW	Signaling Gateway. A network component responsible for transferring signaling messages between nodes that communicate using different protocols and transports.
SIP	Session Initiation Protocol. A communications protocol for signaling, for the purpose of controlling multimedia communication sessions. The most common applications of SIP are in Internet telephony for voice and video calls, private IP telephone systems, as well as instant messaging over IP networks.
SMS	Short Message Service. A service that allows the user to send and receive short (maximum 160-character) messages independently of voice calls.
SOP	Standard Operating Procedure. Written procedure prescribed for repetitive use as a practice, in accordance with agreed upon specifications aimed at obtaining a desired outcome.
SS7	Signaling System Number 7. A set of protocols used to provide basic routing information, call set-up, and other call termination functions.
SSH	Secure Shell. A cryptographic network protocol for operating network services securely over an unsecured network.
SSP	System Service Provider. Provides systems and support necessary to enable 9-1-1 calling for one or more PSAPs in a specific geographic area. It is typically, but not always, an Incumbent Local Exchange Carrier.
TAS	Telephony Application Server. Manages advanced call features. These features include services such as conference bridging, voice mail, call forwarding, and other telephony features.
TCP	Transmission Control Protocol. A communications protocol used to connect to an external database, perform a query of the database, and retrieve information.
TDoS	Telephony Denial of Service. A flood of unwanted, malicious voice calls designed to disable the telephone system of a target entity.
TFOPA	Task Force on Optimal PSAP Architecture. An FCC task force that provided findings and recommendations regarding actions that PSAPs can take to optimize their security, operations, and funding as they migrate to NG9-1-1, including approaches for PSAP cybersecurity, NG9-1-1 architecture implementation, and NG9-1-1 resource allocations.
TICP	Tactical Interoperable Communication Plan. A tool used for incidents and planned events that is intended to document the interoperable communications resources available within the county.
TTY/TDD	Teletypewriter / Telecommunications Device for the Deaf. A machine that uses typed input and output, usually with a visual text display, to enable individuals with hearing or speech impairments to communicate over a telecommunications network.
UAV	Unmanned Aerial Vehicle. An aircraft piloted by remote control or onboard computers.

UN HAZMAT	United Nations Hazardous Material Number. Commonly used for materials in commerce and can be found on shipping papers.
VoIP	Voice over Internet Protocol. Technology that permits delivery of voice calls and other real-time multimedia sessions over IP networks. Communication services that originate or terminate via IP networks rather than the circuit-switched PSTN.
VPC	VoIP Positioning Center. The element that provides routing information to support the routing of VoIP emergency calls, and cooperates in delivering location information to the PSAP over the existing ALI database infrastructure.
VEDS	Vehicular Emergency Data Set. A uniform data set for the transmission and collection of advanced automatic collision notification data.
VPN	Virtual Private Network. A method employing encryption to provide secure access to a remote computer over the Internet.
XML	eXtensible Markup Language. A trimmed specification or version of the Standard Generalized Markup Language that allows web developers to create customized tags for additional functionality.