Maryland DEPARTMENT OF INFORMATION TECHNOLOGY		Information Technology Policy and StandardsApproved: Michael G. Leahy Michael G. Leahy 				Mar 24, 2021 ary Date
# 21-01			Key Terr	ms, Definiti	ons, and Abbrev	viations
Area(s):	⊡Fa ⊡Vo	rocess cility vice 🗆 Aud laces Other	□Procurement □End-User lit r Policy: ⊠No	: □Security □Software □Other □Yes	□Hardware □Network	□Web □Data

Purpose: Establish a list of key term definitions and abbreviations for use by DoIT and other State units.

Policy Statement:

In order to promote consistency and accuracy in the use of information technology terms, Appendix A provides definitions and abbreviations of terms used by DoIT in its policy, methods, and standards documents. The adoption and use of these terms and definitions by other State units is a recommended best practice.

Applicable Law & Other Policy: Maryland State Finance and Procurement Code Ann. Title 3A

Scope and Responsibilities: All executive branch units of state government, except those identified in Maryland Code, SF&P § 3A-302.

Key Terms: See Appendix A.

Technical Specifications: The terms provided in Appendix A are used frequently or in a significant manner in DoIT policy, methods, and standards documents. This document is promulgated to support a common understanding with respect to their usage. The primary source for definitions is the publicly-available glossary that is maintained by the National Institute of Standards and Technology (NIST) at www.csrc.nist.gov/glossary?index=A. For the definition of terms that are not listed in the NIST Glossary, a DoIT-developed definition is used that is derived from excerpts from leading online dictionaries, encyclopedias, and other government/industry/academic sources. In that the definitional material may be blended from several sources, the definition will be ascribed to DoIT.

Policy Review: By the DoIT IT Policy Review Board annually or as needed.

Contact Information: Chair, IT Policy Review Board, <u>doit-oea@maryland.gov</u> 410-697-9724. The Policy #21-01 steward is the DoIT Chief Enterprise Architect.

Appendix A

DoIT Key Terms, Definitions, and Abbreviations List Version 1.0

Term	Abbreviation	Definition	Source(s)
Abstraction Layer / Abstraction Level		In computing, an abstraction layer or abstraction level is a way of hiding the working details of a subsystem, allowing the separation of concerns to facilitate interoperability and platform independence.	DoIT
Accountable Assets		Accountable assets are those which are subject to the controls detailed in DoIT Policy 20-04. Accountable assets are divided between two categories: Capital Equipment and Sensitive Equipment.	DolT
Accountable Officers	AOs	Directors of DoIT operational units or designated supervisory level employees are AOs and perform the duties described in the DGS Inventory Control Manual under Section III.01, B: Duties of Accountable Officers.	DolT
Agile Methods (project management)	Agile	Agile methods in project management refers to a process by which a team can more rapidly and successfully complete a project by breaking it up into several stages (requirements, minimum viable product, enhancements, testing, delivery) that center on frequent collaboration with stakeholders, continuous improvement, and iteration at every stage. Examples of specific agile methodologies include Scrum, Kanban, and Adaptive Project Framework.	DoIT
Agile Methods (software development)	Agile	In software development, Agile practices involve discovering requirements and developing solutions through the collaborative effort of self-organizing and cross-functional teams and their customer(s)/end user(s). It advocates adaptive planning, evolutionary development, early delivery, continual improvement, and encourages flexible responses to change. It was popularized by the <i>Manifesto for Agile</i> <i>Software Development</i> . The values and principles espoused in this manifesto were derived from and underpin a broad range of software development frameworks, including Scrum, Kanban, and Extreme Programming (XP).	DolT
Antenna		An apparatus designed to emit radio frequency radiation and operate from a fixed location to provide wireless services.	DoIT
Antenna Equipment		Equipment, switches, wiring, cabling, power sources, shelters, or cabinets associated with an antenna and located at the same fixed location as the antenna.	DolT
Application	Арр	A software program hosted by an information system.	NIST
Architecture		A highly structured specification of an acceptable approach within a framework for solving a specific problem. An architecture contains descriptions of all the components of a selected, acceptable solution while allowing certain details of	NIST

		specific components to be variable to satisfy related constraints (e.g., costs, local environment, user acceptability).	
Artifact		A piece of evidence, such as text or a reference to a resource, that is submitted to support a response to a question.	NIST
Artificial Intelligence	AI	The simulation of human intelligence in machines that are programmed to think like humans and mimic abilities such as learning and problem-solving. This is contrasted with "natural intelligence" that is displayed by humans and animals, which involves consciousness and emotionality. The ideal characteristic of artificial intelligence is its ability to rationalize and take actions that have the best chance of achieving a specific goal. A subset of artificial intelligence is machine learning, which refers to the concept that computer programs can automatically learn from and adapt to new data without being assisted by humans. Deep learning techniques enable this automatic learning through the absorption of huge amounts of unstructured data such as text, images, or video.	DolT
Asset		A major application, general support system, high impact program, physical plant, mission critical system, personnel, equipment, or a logically related group of systems. Anything that has value to an organization, including, but not limited to, another organization, person, computing device, information technology (IT) system, IT network, IT circuit, software (both an installed instance and a physical instance), virtual computing platform (common in cloud and virtualized computing), and related hardware (e.g., locks, cabinets, keyboards).	NIST
Backbone		A high-capacity telecommunications trunk line (usually fiber- optic) that connects multiple other network lines to transmit large amounts of data. The backbone provides the long-haul data transmission to regional networks.	DoIT
Backhaul (Radio)		Backhaul refers to the transport network that connects the core telecommunications (cable or copper) network and the RAN (Radio Access Network) which underpins the mobile network. The mobile network is comprised of specific radio receiving areas "cells" of a half- mile (urban) to 20 miles (rural) from the transmitter.	DoIT
Best Practice		A proven method to accomplish a goal (e.g., a process, technology, standard, device, or skill).	NIST
Basic Input/Output System	BIOS	A set of computer instructions in firmware which control input and output functions.	NIST
Bring Your Own Device	BYOD	A mobile device that is personally owned and is properly authorized to connect to State IT systems (voice, data, video)	DoIT
Broadband Technology Opportunities Program	втор	A government grant program administered by the National Telecommunications and Information Administration to help bridge the technological divide; create jobs; and improve	DolT

		education, health care, and public safety in communities across the country by deploying broadband internet infrastructure.	
Business Process		The step-by-step method for delivering a product or service.	DoIT
Cloud Computing	Cloud	A model for enabling ubiquitous, convenient, on-demand network access to a shared pool of configurable computing resources (e.g., networks, servers, storage, applications, and services) that can be rapidly provisioned and released with minimal management effort or service provider interaction.	NIST
Co-location		In telecommunications, the practice of locating multiple antenna/antenna equipment on the same tower/within the same facility.	DoIT
Communication Service (MDFirst)		The transmission of data by electrical means. It includes (but is not limited to) the transmission of intelligence by telephone lines, telegraph lines, messenger-call, police, fire alarm, and traffic control circuits and circuits used to transmit standard television or radio signals.	DoIT
Community Cloud		The cloud infrastructure is provisioned for exclusive use by a specific community of consumers from organizations that have shared concerns (e.g., mission, security requirements, policy, and compliance considerations). It may be owned, managed, and operated by one or more of the organizations in the community, a third party, or some combination of them, and it may exist on or off premises.	NIST
Computer		A device that accepts digital data and manipulates the information based on a program or sequence of instructions for how data is to be processed.	NIST
Converged Host Platform		A pre-tested set of hardware and software products from different vendors that can be integrated and operated as a single data compute and storage platform.	DoIT
Cyber		Refers to both information and communication networks.	NIST
Cybersecurity		Prevention of damage to, protection of, and restoration of computers, electronic communications systems, electronic communications services, wire communication, and electronic communication, including information contained therein, to ensure its availability, integrity, authentication, confidentiality, and nonrepudiation.	NIST
Dark Fiber		A strand of unused or un-activated fiber optic cable.	DoIT
Data		Information in a specific representation, usually as a sequence of symbols that have meaning. A variable-length string of zero or more (eight-bit) bytes. Datum is singular.	NIST
Database	DB	A repository of information or data, which may or may not be a traditional relational database system.	NIST
Data Center		A physical facility that organizations use to house their critical applications and data. A data center's design is based	DoIT

		on a network of computing and storage resources that enable the delivery of shared applications and data.	
Data Lake		A data lake is a stored collection of raw data, the purpose for which is not yet defined. This is contrasted with a data warehouse, which is a repository for structured, filtered data that has been processed for a specific purpose.	DolT
Data Mart		A data mart is a logical structure or access pattern that is used to retrieve client-facing data (automated "push" of data sets). The data mart is a subset of a data warehouse and is usually oriented to a specific business line or team.	DolT
Data Warehouse	DW	A central repository of structure, integrated data from one or more databases, flat files, web content, or other sources.	DoIT
Denial of Service	DoS	The prevention of authorized access to resources or the delaying of time-critical operations. (Time-critical may be milliseconds or it may be hours, depending upon the service provided). Actions that prevent the network element from functioning in accordance with its intended purpose. A piece of equipment or entity may be rendered inoperable or forced to operate in a degraded state; operations that depend on timeliness may be delayed.	NIST
Digital Signature	DSIG	The result of a cryptographic transformation of data that, when properly implemented, provides origin authentication, assurance of data integrity and signatory non-repudiation. The result of applying two cryptographic functions: a hash function and a digital signature function.	NIST
Electronic Communication		Any communication using telephone, cellular telephone, voice-over internet protocol, or video teleconferencing.	DoIT
Enterprise (organization)		An organization with a defined mission/goal and a defined boundary, using information systems to execute that mission, and with responsibility for managing its own risks and performance.	NIST
Enterprise (Information Technology)		Electronic communication means any transfer of signs, signals, writing, images, sounds, data, or intelligence of any nature transmitted in whole or in part by a wire, radio, electromagnetic, photoelectronic, or photo-optical system. Electronic communication does not include: wire or oral communication; communication made through a tone-only paging device; or any communication from a tracking device.	CJP 10-401
Enterprise Architecture (Information Technology)	EA	The description of an enterprise's entire set of information systems: how they are configured, how they are integrated, how they interface to the external environment at the enterprise's boundary, how they are operated to support the enterprise mission, and how they contribute to the enterprise's overall security posture.	NIST
Enterprise Architecture (Holistic)	HEA	The structure, functions, and resources of an entire organization, or set of organizations, in all dimensions.	DoIT

Enterprise Resource Planning System	ERP	A system that integrates enterprise-wide information including human resources, financials, manufacturing, and distribution as well as connects the organization to its customers and suppliers.	NIST
Explicit Consent (Electronic Recording)		Consent that is received through an individual's affirmative action.	DolT
Firewall		An inter-network connection device that restricts data communication traffic between two connected networks. A firewall may be either an application installed on a general- purpose computer or a dedicated platform (appliance), which forwards or rejects/drops packets on a network. Typically, firewalls are used to define zone borders. Firewalls generally have rules restricting which ports are open.	NIST
Firmware		Computer programs and data stored in hardware – typically in read-only memory (ROM) or programmable read-only memory (PROM) – such that the programs and data cannot be dynamically written or modified during execution of the programs.	NIST
Flash Drive		A data storage device that is typically small, removable, re- writable, and utilizes a USB interface connector.	DolT
Flash Memory		Non-volatile memory that is writable.	NIST
Framework		A layered structure indicating what kind of programs can or should be built and how they would interrelate. Some computer system frameworks also include actual programs, specify programming interfaces, or offer programming tools for using the frameworks. A framework may be for a set of functions within a system and how they interrelate; the layers of an operating system; the layers of an application subsystem; how communication should be standardized at some level of a network; and so forth. A framework is generally more comprehensive than a protocol and more prescriptive than a structure.	NIST
Geographic Information System	GIS	A GIS is a computer system that analyzes and displays geographically referenced information. It uses data that is attached to a unique location.	USGS
Governance		Processes and methods that support the oversight and management of unit resources.	DolT
Hardware	HW	The physical components of an information system.	NIST
Help Desk		A centralized user support service and web/phone contact point that provides technical assistance and problem fixes.	DolT
Holistic Enterprise Architecture	HEA	A scalable approach to modeling the structure and functions of an entire enterprise in all strategic, business, and technology dimensions.	DoIT
Hybrid Cloud		The cloud infrastructure is a composition of two or more distinct cloud infrastructures (private, community, or public) that remain unique entities, but are bound together by standardized or proprietary technology that enables data	NIST

		and application portability (e.g., cloud bursting for load balancing between clouds).	
Hyper-converged Host Platform		A pre-tested set of hardware and software products from the same vendor that can be integrated and operated as a single data computing and storage platform.	DoIT
Implied Consent (Electronic Recording)		Consent that is received through an individual's continued participation following notification of the initiation of or prior activation of an electronic recording.	DolT
Indefeasible Right of Use	IRU	A common method by which rights in fiber optic cables are transferred within the telecommunications industry. A contractual right for a defined duration of years in which an entity is authorized to utilize certain fiber optic capacity which is not subject to defeasance, denial or withdrawal except on terms stated in the Agreement.	DoIT
Information Resources		Information and related resources, such as personnel, equipment, funds, and information technology.	NIST
Information System	IS	A discrete set of information resources organized for the collection, processing, maintenance, use, sharing, dissemination, or disposition of information.	NIST
Information Technology	IT	Any equipment or interconnected system or subsystem of equipment that is used in the automatic acquisition, storage, manipulation, management, movement, control, display, switching, interchange, transmission, or reception of data or information by the executive agency. For purposes of the preceding sentence, equipment is used by an executive agency if the equipment is used by the executive agency directly or is used by a contractor under a contract with the executive agency which: (i) requires the use of such equipment; or (ii) requires the use, to a significant extent, of such equipment in the performance of a service or the furnishing of a product. The term information technology includes computers, ancillary equipment, software, firmware and similar procedures, services (including support services), and related resources.	NIST
Information Technology Project Request	ITPR	A request submitted by a covered Unit to DoIT regarding a proposed information technology project.	DolT
Infrastructure		Facilities, systems, and utility devices that create a communications or computing network (voice, data, video, mobile, or satellite) and related hosting capabilities. This includes data centers, server rooms, wiring closets, air conditioning and power devices, cable plants, interconnections to external networks, and related structures, hardware, software, firmware, and equipment controllers.	DoIT
Infrastructure as a Service	laaS	The capability provided to the consumer is to provision processing, storage, networks, and other fundamental computing resources where the consumer is able to deploy and run arbitrary software, which can include operating	

		systems and applications. The consumer does not manage or control the underlying cloud infrastructure but has control over operating systems, storage, and deployed applications; and possibly limited control of select networking components (e.g., host firewalls).	
Intake Process		A DoIT process for receiving internal and external requests for technical assistance from a service team. This includes MD State unit requests.	DoIT
Laptop Computer	Laptop	A small, portable personal computer (PC) with a foldable base and screen form factor, typically having a thin LCD or LED computer screen mounted on the inside of the upper lid of the clamshell and an alphanumeric keyboard on the inside of the lower lid. The clamshell is opened up to use the computer. Laptops are folded shut for transportation, and thus are suitable for mobile use. Its name comes from lap, as it was deemed to be placed on a person's lap when being used. Although originally there was a distinction between laptop and notebook computers (the former being bigger and heavier than the latter), there is often no longer any difference. Today, laptops are commonly used in a variety of settings, such as at work, in education, for playing games, web browsing, for personal multimedia, and general home computer use. Laptops combine all the input/output components and capabilities of a desktop computer, including the display screen, small speakers, a keyboard, data storage device, sometimes an optical disc drive, pointing devices (such as a touchpad or trackpad), with an operating system, a processor and memory into a single unit. Most modern laptops feature integrated webcams and built-in microphones, while many also have touchscreens. Laptops can be powered either from an internal battery or by an external power supply from an AC adapter. Hardware specifications, such as the processor speed and memory capacity, significantly vary between different types, models and price points.	DoIT
Last Mile		The final connection from a voice or data broadband provider's local network to the end user. The local links	DolT
Local Area Network	LAN	which provide service to the retail customer. A group of computers and other devices dispersed over a relatively limited area and connected by a communications link that enables any device to interact with any other on the network.	NIST
Machine Learning		A subset of artificial intelligence (AI) referring to the concept that computer programs can automatically learn from and adapt to new data without being assisted by humans. Deep learning techniques enable this automatic learning through the absorption of huge amounts of unstructured data such as text, images, or video.	DolT
Mainframe Computer	Mainframe	A computer used primarily by large organizations for critical applications, bulk data processing (such as the census and industry and consumer statistics, enterprise resource	NIST

		planning, and large-scale transaction processing). A mainframe computer is larger and has more processing power than some other classes of computers, such as minicomputers, servers, workstations, and personal computers. Most large-scale computer-system architectures were established in the 1960s, but they continue to evolve. Mainframe computers are often used as servers. The terms "mainframe" and "big iron" derived from the large cabinet, called a main frame, that houses the central processing unit and main memory of early computers. Later, the term mainframe was used to distinguish high-end commercial computers from less powerful machines.	
Major Information Technology Development Project	MITDP	Any technology development project meeting the criteria as established in Maryland Code, SF&P Article, § 3A-301.	DolT
Maryland First Network	MDFirst	A State-wide 700MHZ radio network that connects state and local first-responder agencies, and some federal units.	DoIT
Massively Parallel Processing	МРР	The coordinated processing of a program by multiple processors that work on different parts of the program, with each processor using its own operating system and memory. Typically, MPP processors communicate using some messaging interface. In some implementations, up to 200 or more processors can work on the same application. An "interconnect" arrangement of data paths allows messages to be sent between processors. Typically, the setup for MPP is more complicated, requiring thought about how to partition a common database among processors and how to assign work among the processors. An MPP system is also known as a "loosely coupled" or "shared nothing" system.	DoIT
Metadata		Information describing the characteristics of data including, for example, structural metadata describing data structures (e.g., data format, syntax, and semantics) and descriptive metadata describing data contents (e.g., information security labels).	NIST
Middle Mile		The fiber optic link between the backbone fiber optics or core network to the broadband provider's local network plant to the internet services providers' core network, local network plant or telecommunications exchange. It does not typically connect the end-user.	DoIT
Mobile Device		A portable and/or wearable hardware device that enables communication and/or computing capabilities, such as cell phones, tablet computers, smart watches, virtual reality goggles, and headsets.	DoIT
Multifactor Authentication	MFA	An authentication system that requires more than one distinct authentication factor for successful authentication. Multifactor authentication can be performed using a multifactor authenticator or by a combination of authenticators that provide different factors. The three authentication factors are something you know (e.g., password or PIN), something you have (e.g., cryptographic	NIST

		identification device), and something you are (e.g., biometric).	
Natural Language Processing	NLP	A subfield of linguistics, computer science, and artificial intelligence that looks at interactions between computers and human language, which is viewed as a particular type of structured data. NLP informs methods to develop software programs and computer devices that can scan, process, and analyze large amounts of natural language data. This software is, to a limited degree, able to "understand" the contents of documents, including the contextual nuances of the language within them. The NLP technology can then accurately extract information and insights contained in the documents as well as categorize and organize the documents themselves.	DolT
network Maryland		The Maryland State government's high-speed data network for public sector use, operated by DoIT. Requests for services are made to DoIT using NSR or CSR forms.	DoIT
Network Service Request	NSR	A DoIT standard form to request new or changed connections to network Maryland. The form is at https://doit.maryland.gov/support/Documents/nwmd-requestservices/NSR%20Submission%20Instructions.pdf	DoIT
Open Systems Interconnection Model	OSI	Open Systems Interconnection model (OSI model) is a seven- layer conceptual model that characterizes and standardizes the communication functions of a telecommunication or computing system without regard to its underlying internal structure and technology. The layers are: physical, data, network, transport, session, presentation, and application. Layer 8 is the user.	NIST, DoIT
Peripheral Device	Peripheral	An externally connected hardware device that sends/receives data by a cable or Wi-Fi.	DoIT
Plain Ordinary (Old) Telephone Service	POTS	Voice-grade telephone service employing analog signal transmission over copper wire loops. POTS was the standard service offering from telephone companies from 1876 until the mid-1980s when the Integrated Services Digital Network (ISDN) and Basic Rate Interface (BRI) was introduced, followed in the late 1990s by cellular telephone systems, and Voice-over-IP (VoIP). POTS is still the basic form of residential and small business service connection to the telephone network in many parts of the world. The term reflects the technology that has been available since the introduction of the public telephone system in the late 19 th century, in a form mostly unchanged despite the introduction of Touch-Tone dialing, electronic telephone exchanges and fiber-optic communication into the Public Switched Telephone Network (PSTN).	DolT
Platform as a Service	PaaS	The capability provided to the consumer is to deploy onto the cloud infrastructure consumer-created or acquired applications created using programming languages, libraries, services, and tools supported by the provider. The consumer does not manage or control the underlying cloud infrastructure including network, servers, operating systems, or storage, but has control over the deployed applications	NIST

		and possibly configuration settings for the application- hosting environment.	
Private Cloud		The cloud infrastructure is provisioned for exclusive use by a single organization comprising multiple consumers (e.g., business units). It may be owned, managed, and operated by the organization, a third party, or some combination of them, and it may exist on or off premises.	NIST
Program		An ongoing funded activity in a government unit, usually focused on providing mission or support function(s).	DoIT
Program Manager	PM	The person responsible for the ongoing operation of a program office and the successful delivery of products and services to internal and external customers, within the constraints of available resources (e.g., budget, assets. Time, people) and quality standards.	DolT
Project		A time-specific funded activity in a government unit, usually created to develop/implement a new product or service.	DoIT
Project Manager	PM	The person responsible for the start-to-finish definition, execution, and delivery of a product or service within designated targets for cost, schedule, and performance.	DoIT
Policy		Statements, rules or assertions that specify the correct or expected behavior of an entity.	NIST
Property Officer	PO	Reports directly to the DoIT CFO and performs the duties described in the DGS Inventory Control Manual under Section III, .01, A.: Duties of Property Officers. The DoIT Property Officer also maintains a list of DoIT Accountable Officers.	DolT, DGS
Public Cloud		The cloud infrastructure is provisioned for open use by the general public. It may be owned, managed, and operated by a business, academic, or government organization, or some combination of them. It exists on the premises of the cloud provider.	NIST
Quality of Service	QoS	The measurable end-to-end performance properties of a network service, which can be guaranteed in advance by a Service Level Agreement between a user and a service provider, so as to satisfy specific customer application requirements. Note: These properties may include throughput (bandwidth), transit delay (latency), error rates, priority, security, packet loss, packet jitter, etc.	NIST
Quantum Computing		Quantum computing is the use of quantum phenomena such as superposition and entanglement to perform computation. Computers that perform quantum computations are known as quantum computers. Quantum computers are believed to be able to solve certain computational problems, such as integer factorization (which underlies RSA encryption), substantially faster than classical computers.	NIST
Qubit	QB	the basic unit of quantum information—the quantum version of the classic binary bit physically realized with a two-state device. A qubit is a two-state (or two-level) quantum-	NIST

		mechanical system, one of the simplest quantum systems displaying the peculiarity of quantum mechanics. Examples include: the spin of the electron in which the two levels can be taken as spin up and spin down; or the polarization of a single photon in which the two states can be taken to be the vertical polarization and the horizontal polarization. In a classical system, a bit would have to be in one state or the other. However, quantum mechanics allows the qubit to be in a coherent superposition of both states simultaneously, a property which is fundamental to quantum mechanics and quantum computing.	
Radiation Center	RAD Center	The center of radiation and reflects the center height of an antenna on a structure. A company will typically receive a license to occupy an area on the tower five feet below the RAD Center (antenna base height) and five feet above the RAD Center (antenna tip height).	DoIT
Receiving Officer	RO	DoIT or unit employee assigned the responsibility of receiving incoming merchandise as a primary or secondary responsibility, and who is not otherwise designated as an Accountable Officer.	DoIT
Resource Sharing Agreement	RSA	An agreement establishing the terms for the utilization of a State resource by private industry in exchange for the provision to the State of a	DoIT
Recording		communication service or other consideration. The storage of audio, video, or text transcription of an electronic communication in any format.	DolT
Robotic Process Automation	RPA	The use of software programs (called bots or digital workers) to design or improve business processes. With traditional process improvement tools, a human software developer produces a list of actions to automate a task and specifies interface(s) to computer(s) and data repositories using application programming interfaces (APIs) or dedicated scripting language. In contrast, RPA software, not a human developer, creates the process action list by recording the keyboard and navigation actions of a user and then creating an automation algorithm that allows the computer to emulate and modify/improve the steps in the task, as well as to display task steps and outputs to a user. This can lower the barrier to use of automation in products that might not otherwise feature APIs for this purpose. RPA tools have strong technical similarities to graphical user interface testing tools. These tools also automate interactions with the GUI, and often do so by repeating a set of demonstration actions performed by a user. RPA tools differ from such systems in that they allow data to be handled in and between multiple applications, for instance, receiving email containing an invoice, extracting the data, and then typing that into a bookkeeping system.	DoIT
Router		A computer that is a gateway between two networks at OSI Layer 3 and that relays and directs data packets through that	NIST

		inter-network. The most common form of router operates on Internet Protocol packets.	
Rivest, Shamir, Adelman Encryption	RSA Encryption	A public-key algorithm developed by Rivest, Shamir, and Adelman (RSA) that is used for key establishment and the generation and verification of digital signatures. RSA is a public-key signature algorithm specified by PKCS #1. As a reversible public-key algorithm, it may also be used for encryption.	NIST
Rural Area		Any State area, as confirmed by the latest decennial census of the Bureau of the Census, which is not located within: 1. A city, town, or incorporated area that has a population of greater than 20,000 inhabitants; or 2. An urbanized area contiguous and adjacent to a city or town that has a population of greater than 50,000 inhabitants. For purposes of the definition of rural area, an urbanized area means a densely populated territory as defined in the latest decennial census of the U.S. Census Bureau.	DoIT
Scrum		Scrum is a subset of Agile concepts that uses a specific method/framework for developing, delivering, and sustaining complex products. Scrum concepts were initially used in software development, then in other fields including research, marketing, and advanced technologies. The Scrum method is designed to be used by teams of ten or fewer members, who break their work into goals that can be completed within time-boxed iterations, called sprints, usually 1-2 weeks but no more than 1 month. The Scrum Team tracks progress in through short (15-20min) daily meetings, called daily scrums, led by a Scrum Master. At the end of the sprint, the team holds sprint review, to demonstrate the work done, and sprint retrospective to improve continuously.	DoIT
Server		A computer or device on a network that manages network resources. Examples include file servers (to store files), print servers (to manage one or more printers), network servers (to manage network traffic), and database servers (to process database queries).	NIST
Service Catalog		A catalog of services that are provided by the DoIT service delivery teams and made available to State of Maryland units of government. Additional information can be found at: <u>https://doit.maryland.gov/support/Pages/sc_index.aspx</u>	DoIT
Small Cells / Microcells		Wireless facilities involving antennas, no more than three cubic feet in volume, that can be mounted to a light pole, street sign, or some other vertical support structure (electrical-transmission tower or utility pole) no more than 50 feet in height.	DoIT
Software	SW	Computer programs and associated data that may be dynamically written or modified during execution.	NIST
Software as a Service	SaaS	The capability provided to the consumer is to use the provider's applications running on a cloud infrastructure. The applications are accessible from various client devices	NIST

		through either a thin client interface, such as a web browser (e.g., web-based email), or a program interface. The consumer does not manage or control the underlying cloud infrastructure including network, servers, operating systems, storage, or even individual application capabilities, with the possible exception of limited user-specific application configuration settings.	
State Resource		Any asset of the State, including but not limited to, land or improvements, structures, or fixtures on State land (owned or leased) whereby the State has an exclusive right.	DoIT
Storage Area Network (storage network)	SAN	A storage area network (SAN) or storage network is a computer network which provides access to consolidated, block-level data storage. SANs are primarily used to access data storage devices, such as disk arrays and tape libraries from servers so that the devices appear to the operating system as direct-attached storage. A SAN typically is a dedicated network of storage devices not accessible through the local area network. Although a SAN provides only block- level access, file systems built on top of SANs do provide file- level access and are known as shared-disk file systems.	DoIT
Storage Array (disk array)		A storage array, also called a disk array, is a data storage system for block-based storage, file-based storage, or object storage. Rather than store data on a server, storage arrays use multiple drives in a collection capable of storing a huge amount of data, managed by a central management system.	DolT
Supercomputer		A computer with a high level of performance as compared to a general-purpose computer. Supercomputer use is also referred to as High Performance Computing (HPC). The performance of a supercomputer is commonly measured in floating-point operations per second (FLOPS) instead of million instructions per second (MIPS). Supercomputers which can perform over 10 ¹⁷ FLOPS (a hundred quadrillion FLOPS, 100 petaFLOPS or 100 PFLOPS). Since 2017, the world's fastest 500 supercomputers run Linux-based operating systems. Supercomputers play an important role in the field of computational science, and are used for a wide range of computationally intensive tasks in various fields, including quantum mechanics, weather forecasting, climate research, oil and gas exploration, molecular modeling (computing the structures and properties of chemical compounds, biological macromolecules, polymers, and crystals), and physical simulations.	DoIT
Switch		A network device that filters and forwards packets between network segments.	NIST
Task Order Request for Proposals	TORFP	A Maryland State government standard document that is prepared by the Department of General Services (DGS) to solicit qualified industry providers for a comprehensive proposal for delivering an IT product or service.	DoIT
Telecommunication	Telecomm	The transmission of information, images, pictures,	DoIT

		voice or data by radio, video, or other electronic or impulse means.	
Telework		Agency-approved work locations for employees and contractors. The DBM policy for telework can be found at https://dbm.maryland.gov/employees/Documents/telework/Telework%20Policy.pdf	DBM
Towers		Structures, also known as "Macro Sites," exceeding 50 feet in height built for the sole or primary purpose of supporting antennas and their associated facilities.	DoIT
Transmission Control Protocol/Internet Protocol	TCP/IP	A set of rules that govern the connection of computer systems to the internet. The TCP/IP suite has four layers (Application, Transport, Internet, Link) that can be mapped to the seven layers of the OSI networking model. The TCP group of protocols provide reliable, ordered, and error- checked delivery of a stream of octets (bytes) between applications running on hosts communicating via an IP network. The IP group of protocols provide end-to-end data communication by specifying how data should be packetized, addressed, transmitted, routed, and received. The most widely version in use is TCP/IP Version 4. TCP/IP Version 6 usage is growing as it provides more robust addressing, security, and more efficient packet processing.	
Underserved		A State area that does not have two or more facilities-based broadband service providers offering minimum connectivity speeds of 25 Mbps download and 3 Mbps upload.	DoIT
Unserved		A State rural area where broadband service may be available but no facilities-based service providers offer minimum connectivity speeds of 25 Mbps download and 3 Mbps upload.	DolT
Unit (MD State)		An organization that is part of Maryland State government (e.g., Boards, Commissions, Agencies, Departments).	DoIT
Universal Serial Bus	USB	An industry standard that establishes specifications for cables and connectors, as well as protocols for connection, communication, and peripheral devices.	DolT
User Experience	UX or UE	How a user interacts with and experiences a product, system, or service. This includes the user's perceptions of usefulness, ease, and efficiency.	DolT
Virtualization (for servers and computers)		The simulation of the software and/or hardware upon which other software runs. Virtualization is a process for system administrators and users to create multiple simulated computing environments within one piece of hardware. Instead of using multiple pieces of hardware to run more than one operating system, virtualization creates a type of virtual barrier—called a hypervisor—to separate digital functions normally requiring multiple physical units. Essentially, virtualization uses software to act as hardware.	NIST, DoIT
Virtual Machine	VM	A simulated environment created by virtualization, including software that allows a single host to run one or more guest operating systems. A software-defined complex execution	NIST

		stack consisting of virtualized hardware, operating system, and applications.	
Voice-Over-Internet Protocol	VoIP	A term used to describe the transmission of packetized voice using the internet protocol (IP) and consists of both signaling and media protocols.	NIST
Wide Area Network	WAN	A physical or logical network that provides data communications to a larger number of independent users than are usually served by a local area network (LAN) and that is usually spread over a larger geographic area than that of a LAN.	NIST
Wireless Fidelity (network)	WiFi	Wireless network protocols based on the IEEE 802.11 family of standards, which are used for local area networking of devices and internet access.	DoIT
Wiring Closet		A wiring closet is a small room commonly found in institutional buildings, such as schools and offices, where electrical connections are made. While they are used for many purposes, their most common use is for computer networking where it may be called a premises wire distribution room (PWD room). Many types of network connections place limits on the distance between end user equipment, such as personal computers, and network access devices, such as routers. These restrictions might require multiple wiring closets on each floor of a large building. Equipment that may be found in a wiring closet includes: alarm systems, circuit breaker panels, video systems (such as cable TV and closed-circuit television systems), ethernet routers, network switches, firewalls, fiber optic terminations, patch panels, telephone punch down blocks, and wireless access points.	DolT
Workflow		The process to accomplish a business objective or deliver a product or service.	DolT