

Glossary

A

Analytical CRM: Customer relationship management applications dealing with the analysis of customer data to provide information for improving business performance.

Android: Android is a Linux-based operating system designed primarily for touch screen mobile devices such as smart phones and tablet computers.

Application Program Interface (API): The specific method prescribed by a computer operating system or by an application program by which a programmer writing an application program can make requests of the operating system or another application

Application Service Provider (ASP): Company providing software that can be rented by other companies over the Web or a private network.

Application Software Package: A set of prewritten, precoded application software programs that are commercially available for sale or lease.

Artificial Intelligence (AI): The effort to develop computer-based systems that can behave like humans, with the ability to learn languages, accomplish physical tasks, use a perceptual apparatus, and emulate human expertise and decision making.

Asynchronous Transfer Mode (ATM): A networking technology that parcels information into 8-byte cells, allowing data to be transmitted between computers from different vendors at any speed.

B

Bandwidth: The capacity of a communications channel as measured by the difference between the highest and lowest frequencies that can be transmitted by that channel.

Best Business Practices: It must have a collection of the best business processes applicable worldwide. And IT package imposes its own logic on a company's strategy, culture and organization.

Beyond The Company: It should not be confined to the organizational boundaries, rather support the on-line connectivity to the other business entities of the organization.

Blocking: a process preventing the transfer of a specified amount of funds or a specified quantity of a security.

Bluetooth: Bluetooth is a wireless technology standard for exchanging data over short distances up to 50 meters (164 feet) from fixed and mobile devices, creating Personal Area

Networks (PANs) with high levels of security. It is a feature which is used every day through a number of compatible devices.

BPM lifecycle: It is a generic process optimization methodology defined explicitly for business processes. It provides a high level approach from a phased perspective without prescribing specific techniques such as those found in Six Sigma or Lean.

Business Process Automation (BPA): Removing the human element from existing business processes by automating the repetitive or standardized process components.

Business Process Management (BPM): The methodology used by enterprises to improve end-to-end business processes.

Business Process Management: Business Process Management (BPM) is the methodology used by enterprises to improve end-to-end business processes in five stages namely: design, modeling, execution, monitoring and optimization.

Business Process Re-engineering (BPR): It can be defined as the search for, and implementation of, radical change in business processes to achieve breakthrough improvements in products and services.

Business Processes: The unique ways in which organizations coordinate and organize work activities, information, and knowledge to produce a product or service.

Business-To-Business (B2B) electronic commerce: Electronic sales of goods and services among businesses.

Business-To-Consumer (B2C) electronic commerce: Electronic retailing of products and services directly to individual consumers.

C

Cache Memory: It is a memory that lies in the path between the processor and the RAM, which a computer microprocessor can access more quickly than it can access regular RAM.

Card (payment card): A device that can be used by its holder to pay for goods and services or to withdraw money.

Cellular Phone System: A radio communications technology that divides a metropolitan area into a honeycomb of cells to greatly increase the number of frequencies and thus the users that can take advantage of mobile phone service.

Central Processing Unit (CPU): The brain of the computer, is the actual hardware that interprets and executes the program instructions and coordinates how all the other hardware devices work together.

Client/Server Networks: A computing environment where end user workstations (clients) are connected to micro or mini LAN (servers) or possibly to a mainframe (super server).

Cloud Computing: A type of computing, comparable to grid computing that relies on sharing computing resources rather than having local servers or personal devices to handle applications, involves delivering hosted services over the Internet.

Coaxial Cable: A sturdy copper or aluminium wire wrapped with spacers to insulate and protect it. Groups of coaxial cables may be bundled together in a bigger cable for ease of installation.

Communications Satellites: Earth satellites placed in stationary orbits above the equator that serve as relay stations for communications signals transmitted from earth stations.

Computer Network: A collection of computers and other hardware interconnected by communication channels that allow sharing of resources and information.

Customer Relationship Management Systems: Information systems that track all the ways in which a company interacts with its customers and analyze these interactions to optimize revenue, profitability, customer satisfaction, and customer retention.

Customization: The modification of a software package to meet an organization's unique requirements without destroying the package software's integrity.

D

Data Base Management Systems (DBMS): Software that aid in organizing, controlling and using the data needed by the application programme.

Data Logging: Recording of all data generated by a device, or the data passing through a particular point in a networked computer System.

Database Model: A type of data model that determines the logical structure of a database and fundamentally determines in which manner data can be stored, organized, and manipulated.

Decision-Support Systems (DSS): Information systems at the organization's management level that combine data and sophisticated analytical models or data analysis tools to support semi structured and unstructured decision making.

Downsizing: Moving to smaller computing platforms, such as from mainframe systems to networks of personal computers and servers.

E

Electronic Business (E-business): The use of the Internet and digital technology to execute all the business processes in the enterprise. Includes e-commerce as well as processes for the internal management of the firm and for coordination with suppliers and other business partners.

Electronic Commerce Server Software: Software that provides functions essential for running e-commerce Web sites, such as setting up electronic catalogs and storefronts, and mechanisms for processing customer purchases.

Electronic Commerce: The process of buying and selling goods and services electronically involving transactions using the Internet, networks, and other digital technologies.

Electronic Data Interchange (EDI): The direct computer-to-computer exchange between two organizations of standard business transaction documents.

Electronic Mail (e-mail): The computer-to-computer exchange of messages.

Enterprise Application Integration (EAI) software: Software that works with specific software platforms to tie together multiple applications to support enterprise integration.

Enterprise Networking: An arrangement of the organization's hardware, software, network, and data resources to put more computing power on the desktop and create a company-wide network linking many smaller networks.

Enterprise Portal: Web interface providing a single entry point for accessing organizational information and services, including information from various enterprise applications and in-house legacy systems so that information appears to be coming from a single source.

Enterprise Software: Set of integrated modules for applications such as sales and distribution, financial accounting, investment management, materials management, production planning, plant maintenance, and human resources that allow data to be used by multiple functions and business processes.

Enterprise Systems: Integrated enterprise-wide information systems that coordinate key internal processes of the firm.

ERP: It is business management software that allows an organization to use a system of integrated applications to manage the business.

Extranets: A network that links selected resources of the intranet of a company with its customers, suppliers, and other business partners, using the Internet or private networks to link the organizations' intranets.

F

Fiber optics: The technology that uses cables consisting of very thin filaments of glass fibers that can conduct the light generated by laser at frequencies that approach the speed of light.

Flexibility: An IT system should be flexible to respond to the changing needs of an enterprise. The client server technology enables IT to run across various database back ends through Open Database Connectivity (ODBC).

I

Information technology (IT): Any computer-based tool that people use to work with information and support the information and information-processing needs of an enterprise.

Instruction Set Architecture (ISA): It is the abstract model of a computing system that is seen by a machine language programmer, including the instruction set, memory address modes, processor registers, and address and data formats.

Internet Technologies: The Internet and its technologies are being used to build interconnected enterprises and global networks, like intranets and extranets that form information superhighways to support enterprise collaboration, electronic commerce, and internal business applications.

Internetwork Processors: Internetwork processors such as bridges, routers, hubs, or gateways to other LANs or wide area networks interconnect many LANs.

Intranets: Open, secure Internet-like networks within organizations.

K

Knowledge Management: The set of processes developed in an organization to create, gather, store, maintain, and disseminate the firm's knowledge.

Knowledge Management Systems: Systems that support the creation, capture, storage, and dissemination of firm expertise and knowledge.

L

Legacy Systems: The older, traditional mainframe-based business information systems of an organization.

Local Area Network (LAN): A communications network that typically connects computers, terminals, and other computerized devices within a limited physical area such as an office, building, manufacturing plant, or other work site.

M

Management Information Systems (MIS): The study of information systems focusing on their use in business and management.

Metadata: Metadata (meta-content) are defined as the data providing information about one or more aspects of the data.

Micro architecture: It is a term used to describe the resources and methods used to achieve architecture specification.

MIS (Management Information Systems): It is a general term for the computer systems in an enterprise that provide information about its business operations. It's also used to refer to the people who manage these systems.

Mobile Computing: It is a technology that allows transmission of data, voice and video via a computer or any other wireless enabled device without having to be connected to a fixed physical link.

Modem (MODulation - DEModulation): A device that converts the digital signals from input/output devices into appropriate frequencies at a transmission terminal and converts them back into digital signals at a receiving terminal.

Multiplexer: An electronic device that allows a single communications channel to carry simultaneous data transmissions from many terminals.

N

Network Architectures – OSI: The International Standards Organization (ISO) has developed a seven-layer Open Systems Interconnection (OSI) to serve as a standard model for network architectures in order to promote an open, simple, flexible, and efficient telecommunications environment.

Network Architectures - TCP/IP: The Internet's protocol suite is called Transmission Control Protocol/Internet Protocol (TCP/IP). TCP/IP consists of five levels of protocols that can be related to the seven layers of the OSI architecture. TCP/IP is used by the Internet and all intranets and extranets.

Network Computing: A network-centric view of computing in which "the network is the computer," that is, the view that computer networks are the central computing resource of any computing environment.

Network Operating System: A network operating system is a program that is used to control telecommunications and the use of and sharing of network resources.

Network Server: LANs use a powerful microcomputer with a large disk capacity as a file server or network server. The server handles resource sharing and telecommunications.

O

OLAP: Online Analytical Processing: is a multi-dimensional analytical tool typically used in data mining, that gathers and process vast amounts of information into useful packets.

Open Systems: Model of network protocols enabling any computer connected to a network to communicate with any other computer on the same network or a different network, regardless of the manufacturer.

Operating System (OS): A set of computer programs that manages computer hardware resources and acts as an interface with computer applications programs.

Operating System Software: An operating system (OS) Software is a set of computer programs that manages computer hardware resources and acts as an interface with computer applications programs. The operating system is a vital component of the system software in a computer system.

P

Peer-to-Peer Networks (P2P): Computing environments where end user computers connect, communicate, and collaborate directly with each other via the Internet or other telecommunications network links.

Protocol: A set of rules and procedures for the control of communications in a communication network.

R

Radical Redesign: This means getting down to the fundamental – where necessary throwing away the old, out of date rules – and recognizing that quality and innovation are more important to profit than cost.

Random Access Memory (RAM): It is the Short term Memory in a computer where the operating system, application programs, and data in current use are kept so that they can be quickly reached by the computer's CPU.

Read Only Memory (ROM): It is computer memory containing data that normally can only be read, not written to, usually used by manufacturers.

Re-engineering: It is the fundamental rethinking and radical redesign of business processes to achieve dramatic improvements in critical, contemporary measures of performance, such as cost, quality, service and speed.

Register: It is one of a small set of data holding places (memory) that are part of a central Processing unit (CPU).

Routing: Refers to the process of deciding on how to communicate the data from source to destination, in a network.

S

Scalability: scalability is the ability of a system, network, or process to handle a growing amount of work in a capable manner or its ability to be enlarged to accommodate that growth.

Server (Client-Server Architecture): It is a computer program running to serve the requests of other programs, the "clients".

Server (Hardware): It is a device on a network dedicated to run one or more services (as a host), to serve the needs of the users of other computers on a network.

Smartphone: It is a mobile phone built on a mobile operating system, with more advanced computing capability connectivity than a feature phone.

Software as a Service (SaaS): A software delivery method that provides access to software and its functions remotely as a Web-based service.

System flowchart: A tool for documenting a physical system in which each component is represented by a symbol that visually suggests its function.

System Software: A computer software that is designed to operate the computer hardware and to give and maintain a platform for running application software.

Systems Development Life Cycle (SDLC): It is a conceptual model used in project management that describes the stages involved in an information system development project, from an initial feasibility study through maintenance of the completed application.

T

Tablet: It is a one piece general-purpose computer contained in a single panel. Its distinguishing characteristic is the use of a touch screen as the input device.

Telecommunications Channels: Telecommunications channels are the part of a telecommunications network that connects the message source with the message receiver. It includes the physical equipment used to connect one location to another for the purpose of transmitting and receiving information.

Telecommunications Media: Telecommunications media are the physical media used by telecommunications channels. They include, twisted- pair wire, coaxial cables, fiber optic cables, terrestrial microwave, communications satellite, cellular, and infrared systems.

Telecommunications Network Components: Telecommunications components include terminals, telecommunications processors, telecommunications channels and media, computers, and telecommunications control software.

Telecommunications Processors: Multiplexers, concentrators, communications controllers, and cluster controllers that allow a communications channel to carry simultaneous data transmissions from many terminals. They may also perform error monitoring, diagnostics and correction, modulation-demodulation, data compression, data coding and decoding, message switching, port contention, and buffer storage.

Telecommunications Software: Telecommunications software, including network operating systems, telecommunications monitors, web browsers, and middleware, control and support the communications activity in a telecommunications network.

Touchpad: A touchpad is a pointing device featuring a tactile sensor, a specialized surface that can translate the motion and position of a user's fingers to a relative position on screen.

Transaction Processing Systems (TPS): Computerized systems that perform and record the daily routine transactions necessary to conduct the business; they serve the organization's operational level.

V

Virtual Memory: It is an allocation of hard disk space to help RAM. Virtual memory combines computer's RAM with temporary space on the hard disk.

Virtual Organization: Organization using networks to link people, assets and ideas to create and distribute products and services without being limited to traditional organizational boundaries or physical location.

Virtual Private Network: A secure network that uses the Internet as its main backbone network to connect the intranets of a company's different locations or to establish extranet links between a company and its customers, suppliers, or other business partners.

Virtualization: Virtualization is the creation of a virtual (rather than actual) version of something, such as an operating system, a server, a storage device or network resources.

W

Wide Area Network (WAN): A data communications network covering, a large geographic area.

Wi-Fi: It is the name of a popular wireless networking technology that uses radio waves to provide wireless high-speed Internet and network connections. Wi-Fi networks have limited range.