

Appendix

Key Dates and Events

From creation of the Federal Communications Commission (FCC) in 1934, to court decisions affecting the Open Network Architecture (ONA) 60 years later, there have been tremendous changes in the

regulation of interstate communications, and the debates continue, in Congress and in the state regulatory commissions. Below is a chart highlighting the most significant events from during that time period.

Time	Event	Significance
1934	Communications Act	Creates the Federal Communications Commission (FCC) to regulate interstate communications
1956	Consent Decree	Issued by U.S. Department of Justice. AT&T restricts itself to telecommunications service and no involvement in the computer industry.
1971	Computer Inquiry I (CI-I)	FCC divides telecommunications industry into three categories: communications, data processing and hybrid service.
1980	Computer Inquiry II (CI-II)	Results in FCC ruling that differentiates between basic services and enhanced services. AT&T and telephone companies permitted to offer terminal equipment and enhanced services only through separate subsidiaries.
1982	Modification of Final Judgment (MFJ)	Department of Justice and AT&T negotiate agreement ending government antitrust suit. Divestiture ordered. Lines of business established for regional telephone companies.
1984	Divestiture	AT&T divests itself of operating telephone companies and enters markets previously closed to it. Seven regional operating companies formed.
1987	FCC Docket 86-79	FCC approves Bell operating companies' customer premises equipment plans, permitting companies to participate in customer premises equipment (CPE) markets.
	Computer Inquiry III (CI-III)	FCC establishes Open Network Architecture (ONA) rules.
1988	ONA Plan Filing	U S WEST files ONA Compliance Plan with FCC.
1990	CI-III Remand	U.S. Court of Appeals vacates CI-III rules.
1991	Information services restriction lifted, but "stay" imposed.	U.S. District Judge Harold Greene permits regional Bell operating companies (RBOCs) to enter information services but imposes "stay" on the order to delay entry until appeals process is exhausted.
	Information services stay is vacated.	U.S. Court of Appeals vacates stay imposed by Judge Greene, permitting RBOCs to enter information services on an integrated basis.
June 1992	FCC lifts requirements for separate subsidiaries.	U S WEST can offer enhanced and information services on an integrated basis.
1994	ONA structural safeguards.	U.S. Court of Appeals remands FCC order concerning nonstructural safeguards, asks for new cost analysis.
January 1995	FCC grants limited waiver.	FCC grants limited waiver of CI-III rules allowing RBOCs to continue offering enhanced services on an integrated basis. CEI plans must be filed and approved by the FCC.

Expanded Interconnection and Collocation

Expanded interconnection and collocation refer to the physical interconnection arrangements customers use to interconnect to U S WEST via equipment located on U S WEST Communications property. Such interconnection is available to carrier and end user customers for certain services and purposes. It is not currently available to external enhanced service providers but is offered to our interstate DSI and DS3 customers.

Two types of collocation were ordered by the FCC. Physical collocation requires U S WEST to lease unused central office floor space to customers who use the space for their transmission equipment. U S WEST challenged the physical collocation requirements in court. In June, 1994, the U. S. Court of Appeals, D.C. Circuit, ruled that the FCC lacked authority to require telephone

companies to provide physical collocation. As of December 15, 1994, U S WEST no longer offers physical collocation to customers.

The FCC also ordered the telephone companies to provide virtual collocation to customers when there is not enough room in the central office for physical collocation. Under this arrangement, U S WEST designates an interconnection point and maintains the facility, conduit and building structure. The Appeals Court ruling remanded this part of the original order back to the FCC for further consideration. A new collocation order was issued by the FCC in July, 1994, specifying U S WEST and the other Local Exchange Carriers (LECs) covered by these rules to seek input from interconnectors as to the "brand" of transmission equipment desired. Under these new rules, U S WEST is required to tariff this equipment. New tariffs have been filed with the FCC complying with the July, 1994 order.

CEI Plan Requirements

During Remand proceedings, U S WEST is required to file CEI plans for all enhanced services offered on an integrated basis. Below is an outline of the information to be included in a CEI plan.

- A description of the enhanced service offered and the utility and purposes of the CEI arrangements described in the plan.
- Specify in detail whether the offering of an enhanced service utilizes the same interconnections to the underlying basic services as those offered to other providers through CEI. If the interconnections are not identical, the plan must explain how it satisfies the equal access criteria.
- Include sample state and federal tariffs for the basic interconnection charge and the distance sensitive transmission charges that satisfy CEI pricing requirements.
- Discuss conformance to nonstructural safeguards: Allocation of joint and common costs; nondiscrimination reporting; CPNI; network disclosure.

Below is an example of a CEI plan filed with the FCC for voice messaging and the categories of information included:

- Description of enhanced service.
- CEI parameters
 - Interface functionality
 - Unbundling of Basic Service (detail the basic services)
 - Price for Basic Services
 - Technical Characteristics
 - Installation, Maintenance and Repair
 - End User Access
 - CEI Availability
 - Minimization of Transport Costs
 - Recipients of CEI
- Other Nonstructural Safeguards
 - Allocation of Joint and Common Costs
 - Nondiscrimination Reporting
 - CPNI
 - Network Disclosure
- Deregulated or detariffed basic services
- Sample federal and state tariffs

CEI plans will be deemed approved in 90 days unless U S WEST is notified otherwise by the Commission.

Market Trial Notification Requirements

During Remand proceedings, U S WEST also is required to file market trial notification with the FCC for any existing or new market trials. Market trials will be deemed approved in 90 days unless the Commission notifies U S WEST otherwise. All new proposed market trials must be approved prior to the start of the trial.

Below is an outline of the requirements for FCC market trial notification and areas which must be addressed:

- The CEI waiver will only be applicable to limited market trials of up to eight months duration.
- Costs must be allocated in full accordance with the approved Cost Allocation Manual (CAM).
- BOCS that conduct market trials must inform end user trial participants that services and prices available during the trial may not be available after the close of the trial.
- Competing Enhanced Service Providers (ESPs) ~~must receive equal access, at equivalent prices, for~~ all basic network services used in the trial. (Include a description of the basic services.)
- Enhanced Service Providers must be informed of trials 90 days in advance of a trial.
- CPNI and network disclosure rules must be observed.

Glossary of Usage

This glossary of usage contains terms frequently used in connection with the Open Network Architecture (ONA) and describes and explains these terms.

Aggregated CPNI. Customer record information about many customers that has been collected and combined in such a way that the individual customer cannot be identified. This information is available to any enhanced services and CPE provider through the Vendor Services Center. The five types of aggregated CPNI available free of charge are: (1) Number of business and residential lines; (2) Average minutes of use; (3) Average call duration; (4) Touch-Tone penetration, and (5) Average number of messages.

Authorized Agent. The Federal Communications Commission (FCC) requires the Regional Bell Operating Companies (RBOCs) to provide independent customer premises equipment (CPE) vendors with an effective way to market their equipment with U S WEST Centrex Plus and other network services. U S WEST satisfies this requirement through its Authorized Agent Program. Agents receive compensation for the U S WEST products and services they sell. In return, U S WEST bills the customers and receives payment for the sale.

Basic Service Elements (BSE). BSE is one of three categories of ONA services. A BSE is an individual tariffed network feature or function offered by a local exchange provider. BSEs are used by enhanced services providers in conjunction with Basic Serving Arrangements (BSAs) to provide enhanced services. BSEs are purchased by the provider and require a BSA for underlying transport. Examples of BSEs are Automatic Number Identification, Bridging and Three-Way Calling.

Basic Services. These are "pure transmission" services presumed to be regulated in the Computer Inquiry II and III and ONA regulatory structure.

Basic Serving Arrangement (BSA). This is one of three categories of ONA services. BSAs are fundamental tariffed switching and transport services. BSAs are the physical network connections between the enhanced services provider and the central office. Examples of BSAs include Analog Private Lines, PBX trunks, DID service.

Bell Operating Companies (BOCs). The seven regional telephone companies.

Civil Enforcement Consent Order (CECO).

An agreement between U S WEST and the Department of Justice requiring U S WEST to review all existing and proposed business activities to determine U S WEST's compliance with that part of the Modification of Final Judgment

(MFJ) that prohibits U S WEST from engaging in certain lines of business.

Collocation. Allows the placement of competitor's equipment on U S WEST's premises so that the customer may interconnect directly and more cost effectively with U S WEST's local exchange network.

Comparably Efficient Interconnection (CEI).

Product-specific plans for enhanced services offerings. These interim plans, which mirror the FCC's ONA plan in most respects, allowed the RBOCs to offer specified services on an interim basis until the ONA plans were approved by the FCC. CEI plans ensured nondiscriminatory behavior by U S WEST and the availability of specified basic network services to other enhanced service providers. U S WEST's ONA Plan received FCC approval in 1991. CEI also is a term applied to the requirements for developing and offering ONA services. During current remand proceedings, U S WEST and the other RBOCs are required to file CEI plans or amend existing CEI plans for all enhanced services offered on an integrated basis.

Complementary Network Service (CNS).

CNS is one of three categories of ONA services. CNSs are individual tariffed network features or functions needed to work with an enhanced service that the end user or enhanced services provider may obtain from a local exchange company. A CNS feature is provisioned on the end user's line. Although CNSs usually are purchased by the end user, an enhanced services provider may purchase and be billed for CNSs on behalf of the end user. Examples of CNSs: Call Forwarding-Don't Answer Expanded, Call Waiting and Speed Dialing.

Computer Inquiry I (CI-I). An FCC action that examined the convergence of telecommunications and computers. CI-I divided the industry into three categories: Communications, data processing and "hybrid services."

Computer Inquiry II (CI-II). An FCC action that studied the impact of computers on telecommunications. It resulted in the deregulation of equipment attached to the telecommunications network, the differentiation between regulated "basic" services and unregulated "enhanced services." It required that enhanced services and deregulated equipment could only be sold by the BOCs through fully separate subsidiaries. This means the subsidiary cannot own or operate its own transmission facilities, must maintain separate accounting books, must have separate officers, must have separate marketing, installation and maintenance personnel, etc.

Computer Inquiry III (CI-III). An FCC action that eliminated the requirement that the BOCs could offer enhanced services only through fully separate subsidiaries. CI-III allowed the BOCs to offer enhanced services on an

integrated basis, as long as the BOCs comply with the ONA rules and nonstructural safeguards.

Cost Allocation Manual (CAM). An accounting document that describes how U S WEST complies with Part 64 time and cost allocation rules, affiliate transactions and cost allocations between regulated and nonregulated products and services. The CAM also lists U S WEST's nonregulated products and incidental activities. The CAM is maintained on file with the FCC.

Cross-Subsidize. This is a term applied to the use of regulated revenues in order to support the development and sale of enhanced services. CPE or other unregulated products and services by including some costs of deregulated services in the price paid for regulated services.

Customer Account Retrieval System (CARS). U S WEST Communications database of customer record and billing information. Applies to Western Region only.

Customer Order Retrieval and Display (CORD). The U S WEST Communications Western Region order entry database.

Customer Premises Equipment (CPE). Customer telecommunications equipment such as telephone sets, PBXs, modems, answering machines. FCC regulations governing CPE do not cover inside wire, coin-operated pay phones, some multiplexers or voltage protection equipment.

Customer Proprietary Network Information (CPNI). CPNI is customer record information that identifies a customer's basic network services. This includes: Service address, telephone numbers called, number of calls, duration of calls, type/class of service, service order information, repair information, traffic studies, station message detail recording, monthly charges, long-distance billing record, bill summary, access usage charges, current charges, number of access lines and billing records. CPNI is the information a customer can elect to either release or withhold from U S WEST enhanced services and Customer Premises Equipment (CPE) personnel, or request U S WEST to release to outside providers of enhanced services and CPE. CPNI does not include the customer's name, address, phone number and information about U S WEST enhanced services and CPE.

Customer Service Record (CSR). U S WEST Communications' record of customer network services, traffic, call usage and billing data.

Deregulated. Although there are differences, this term sometimes is used as another term for unregulated and nonregulated. The FCC distinguishes between regulated (basic) services and nonregulated (enhanced services or CPE) services.

Enforcement Order (EO). An EO is an agreement with the U.S. Department of Justice that formalized the Modification of Final Judgment Review Process of all U S WEST business practices for compliance with the nondiscrimination provisions of the MFJ.

Enhanced Services. The FCC defines enhanced services as any services offered over common carrier transmission facilities that employ computer processing applications that act on the format, content, code, protocol or similar aspects of the subscriber's transmitted information; that provide the subscriber with additional, different or restructured information; or involve customer interaction with stored information. Examples include videotex, voice storage and retrieval, on-line business information, on-line travel information, electronic mail and protocol conversion in connection with packet switching service. Currently, U S WEST offers voice messaging, FAX store and forward, audio classifieds, protocol conversion, on-line data base access enhanced services and level 2 video dialtone.

Enhanced Services Provider (ESP). A business that provides enhanced services by using the ONA services made available by regulated telecommunications providers. ESP also refers to interexchange carriers and resellers that act as ESPs.

Expanded Interconnection. Physical interconnection arrangements used by customers to interconnect to the local exchange network via equipment located on the local exchange carrier's property. This arrangement is currently available to interstate DS1 and DS3 customers.

Federal Communications Commission (FCC). An agency created by the Communications Act of 1934 to regulate communications services.

Information Services. According to the Modification of Final Judgment (MFJ), Information Services means the offering of capabilities for generating, acquiring, storing, transforming, processing, retrieving, utilizing or making available information that may be conveyed via telecommunications, except that such services do not include use of any such capability for the management, control or operation of a telecommunications system or the management of a telecommunications service.

Integrated Basis. This is the ability to sell enhanced services and customer premises equipment through U S WEST Communications sales channels instead of only through separate subsidiaries. Joint marketing is one aspect of integration.

Integrated Sales. These are sales to customers that include regulated and nonregulated products and services.

Interconnections Database (ICONN). Provides network service availability, forecast and non-proprietary aggregate CPNI for both U S WEST Communications and the public.

Modification of Final Judgment (MFJ). This was an agreement negotiated between AT&T and the U.S. Department of Justice that ended the U.S. government's antitrust case against the Bell system. The agreement divested AT&T of the BOCs and divided them into seven regional holding companies. It further restricted the BOCs from interLATA telecommunications services, information services, manufacturing of telecommunications equipment or Customer Premises Equipment and providing telecommunications products.

Network. For ONA purposes, the network includes transmission, switching and signal-processing capabilities and functions.

Network Disclosure. This concerns informing the enhanced services and CPE industries about changes U S WEST plans to make to basic network interfaces that have the potential of affecting a vendor's use of the network and service to its customers.

Nonstructural Safeguards. The rules and guidelines that must be followed to allow for the integrated sale of regulated and nonregulated products and services. These nonstructural safeguards replaced the requirement for fully separated subsidiaries under the CI-II rules. These include the five principles listed in this booklet.

Nonstructural Separation. This is a means of integrating the sale of regulated and nonregulated products by following guidelines, safeguards and rules instead of by forming fully separated subsidiaries.

ONA Services. These are traditional network features, functions and access arrangements (basic network services) provided by telephone companies that are needed by enhanced services providers to create and deliver their enhanced services across U S WEST's network to their end users. Because these basic network services are critical for providing enhanced services, special rules apply to ensure ONA services are offered on equal terms and conditions.

Open Network Architecture (ONA). This is the business concept and regulatory framework developed by the FCC. ONA enables the BOCs to offer enhanced services under specific rules structured to ensure competitive fairness and equal access to basic network services by all providers of enhanced services.

Operational Support Systems (OSS). An FCC term that identifies the telephone company's internal data-processing systems used to support network operations. These include (1) service order entry and status; (2) trou-

ble reporting and status; (3) diagnostics, monitoring, testing and network reconfiguration, and (4) traffic data collection. These four functions must be made available to competing Enhanced Service Providers on the same terms and conditions as they are used by U S WEST enhanced services and CPE operations. When deployed, the service vehicle "Mediacc" will provide "mediated access" to these systems by competitors and U S WEST. The use of OSS must be tracked.

Regional Bell Operating Companies (RBOCs). See BOCs.

Regulated. This is the term for our basic network services. This does not include enhanced services, information services or CPE.

Request for Proposal (RFP). An RFP is a request for a bid or service proposal format used primarily by large business and government customers. In this case, the RFP would be for telecommunications or enhanced services.

Service Order Logistic and Referral (SOLAR). U S WEST Communications' Eastern region order-entry database.

Service Order Negotiating and Referral (SONAR). U S WEST Communications' order-entry database.

Service Order Processing and Distribution (SOPAD). U S WEST Communications' Central region order-entry database.

System Design Center (SDC). The SDC provides technical support to all U S WEST market units and sales organizations by developing technical solutions to customer problems.

Unbundled. An underlying premise of Open Network Architecture is that basic services will be "unbundled." That means that a customer may purchase a specific feature without purchasing other features that may not be necessary to deliver the feature (or telephone service itself).

Vendor Services Center (VSC). An alternative point of entry for nonaffiliated providers, such as enhanced services providers, shared tenant service providers, CPE providers, alternate transport service providers, voice/data vendors and customers who seek nondiscriminatory access to U S WEST network products and services. The VSC ensures parity treatment for all services provided to nonaffiliated providers and USW-affiliated interests. The VSC also retains data pertaining to CPNI, the U S WEST Cost Allocation Manual and other information required for the implementation of ONA and enhanced services guidelines and safeguards.

ONA/CPE Supplement to U S WEST Code of Conduct Corporate Policy Coverage

At the completion of this session, your group leader will ask you to sign a certificate titled, "U S WEST Code of Conduct Corporate Policy Coverage Acknowledgement." Please read the certificate before signing it. By signing the certificate, you are stating that you have read and understand the information which appears throughout this booklet outlining the specifics of ONA as they apply to U S WEST and its employees. Your certification further signifies that you understand the ramifications of Open Network

Architecture and the five basic principles governing U S WEST's responsibilities which are summarized below. This certification is a requirement of all U S WEST management employees and must be supplied to the employee's supervisor as documentation and proof of attendance at this training session.

Your group leaders will provide the certificate for you to sign and will collect your signed certificate at the conclusion of this session.

RG01-0210
(1-95)

ONA/CPE SUPPLEMENT TO U S WEST CODE OF CONDUCT CORPORATE POLICY COVERAGE ACKNOWLEDGEMENT.

U S WEST is committed to meeting all FCC requirements in association with Open Network Architecture enhanced services and customer premises equipment (CPE). As an employee, I understand I have an obligation to practice good business ethics and to comply with these Corporate policies. By completing and signing form RG01-0206 "U S WEST Code of Business Ethics and Conduct/Corporate Policy Coverage Acknowledgement" or "U S WEST Annual Coverages Acknowledgement of Receipt and Understanding" I affirm that:

- I have read the current ONA/enhanced services/CPE training materials.
- I will comply with the principles of Open Network Architecture and make the same basic services available to all enhanced services providers at the same prices, and on the same terms and conditions.
- I will not discriminate in the installation, maintenance, or quality of network services.
- I understand that any information concerning a customer's network telephone services should be treated in a confidential and proprietary manner.
- I understand that customers have the right to control access and use of their telephone account information by enhanced services or CPE sales or marketing personnel.
- I will not access or use restricted customer specific information if I am involved in selling, marketing or planning enhanced services or CPE, nor disclose this information to unauthorized personnel.
- I understand that U S WEST will provide timely disclosure of network changes that may affect enhanced services or CPE.
- As to my responsibilities concerning Part 64/Part 32 accounting practices, I will accurately report my time and expenses as outlined in the Cost Allocation Manual, when planning, selling, marketing, provisioning, or maintaining enhanced services or CPE.
- I will ensure that any employees reporting directly to me who are involved in the planning, sale, marketing, provisioning, or maintenance of U S WEST products and services understand their obligations, will receive annual training prior to year end and will comply with the guidelines summarized in the training. New employees, who meet the above criteria, will be trained within ten days of their assignment to my department.
- I understand that violations of these standards can result in disciplinary action, including dismissal.

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Compliance Training

ONA-CPE

NOTICE-LIMITED DISTRIBUTION

This document contains Confidential Information. Disclose and distribute solely to authorized employees of U S WEST Communications and its affiliates, having a need to know.

COMPLIANCE TRAINING

"What does this mean to me?"

The manual provides important information and training for U S WEST Compliance for Open Network Architecture (ONA), and Customer Premises Equipment (CPE). It was written to ensure you understand and comply with the Federal Communications Commission's requirements in each of these areas.

This detailed package was written for employees, like yourself, whose jobs will be directly impacted by these activities. This training explains the obligations we must meet as a Company in order to gain the benefits of participating in the enhanced service and CPE markets. It also explains the obligations that we must meet in the performance of our jobs.

THE CONSEQUENCES OF FAILURE TO MEET OUR OBLIGATIONS - AS A COMPANY AND AS EMPLOYEES - ARE SERIOUS. U S WEST COULD BE DENIED THE OPPORTUNITY TO COMPETE IN NEW, PROMISING MARKETS. EMPLOYEES ARE SUBJECT TO DISCIPLINARY ACTION, UP TO AND INCLUDING DISMISSAL, FOR ANY WILLFUL VIOLATION OF COMPLIANCE PROCEDURES.

There is a lot of important information in this packet.

- * Read and discuss the training with other employees.
- * Answer the 'What IF' questions.
- * Cover your non-management employees who are involved in the planning, marketing, sales or provisioning of U S WEST services & products.

Then, fill out and sign the Compliance Form, retain a copy, and then by May 26, 1989, send the original signed form to:

Human Resources - Data Administration
1801 California Street, Room 1230
Denver, Colorado 80202

Directors are responsible for assuring all assigned Managers have returned their completed forms to Human Resources no later than May 26, 1989.

For U S WEST - ONA & CPE mean new opportunities to further serve our customers.

COMPLIANCE TRAINING

ONA & CPE

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(A) OVERVIEW

A major development is taking place in U S WEST.

The Federal Communications Commission (FCC) has approved a substantial part of **U S WEST's Open Network Architecture (ONA) Plan**. With final approval, and adherence to the terms and conditions of the Plan, U S WEST Communications will be permitted to offer its customers the benefits of a wide range of both basic and enhanced services through one company. Examples of possible enhanced services which U S WEST could offer include: transaction services (such as home banking); security services; computer storage services; and electronic mail. In fact, under a Comparably Efficient Interconnection (CEI) plan already approved by the FCC, U S WEST Communications can now offer certain types of enhanced voice mail services.

In addition, the FCC has already approved U S WEST's compliance plan for Customer Premises Equipment (CPE), which permits U S WEST Communication's the ability to offer CPE to its customers.

In the past, regulated common carriers such as U S WEST Communications (i.e., MB,NWB,PNB) have been restricted to offering only **"basic services" - services for the transmission or movement of information over the network**. Offering **CPE** - communications equipment which resides on a customer's premise; or, **enhanced services**- services in which computer processing changes or modifies the data or information passed over the network, could only be done through fully separated, non-regulated subsidiaries, except with special FCC approval. The FCC's Computer Inquiry-III (CI-III/ONA) and Docket 86-79 (CPE) proceedings, removed these restrictions and opened the door for U S WEST to provide these services on an integrated basis, e.g., through Market Units. To do so, however, U S WEST must comply with a number of 'non-structural safeguards' which were established by the FCC.

The purpose of this training manual is to provide you with some guidelines on how to comply with the non-structural safeguards when U S WEST Communications plans or offers non-regulated products and services . The training material focuses on the two most important non-regulated products and services subject to non-structural safeguards, enhanced services and CPE. However, it must be remembered that offering of other non-regulated products and services may also raise significant regulatory issues. The offering of non-regulated premises wiring, for example, may raise important state issues and must be accounted for under the Commission's Part 64 (Part X) accounting rules.

It is important to note that this training does not address Modified Final Judgment (MFJ) and Civil Enforcement Consent Order (CECO) issues. In addition to complying with the contents of this training manual, each U S WEST employee must adhere to all MFJ and CECO requirements.

I. OPEN NETWORK ARCHITECTURE

A. ONA Service Requirements

ONA services are unbundled basic network capabilities required by U S WEST and external, non-U S WEST enhanced services providers (ESPs) to enable delivery of their services across U S WEST's network. ONA services must be available to all customers - including U S WEST Market Units - on equal terms and conditions.

In Computer Inquiry-III, the FCC required U S WEST to offer ONA services based on either of two conditions:

1. If U S WEST uses the network capability as part of its enhanced service offering. In other words, any central office network feature, function or facility used by U S WEST in the provisioning of its enhanced service offering must be available to all customers, as an ONA service; or,
2. If the ESP requires the network capability to provide its enhanced service offering to the public and the request meets the service evaluation criteria as specified by the FCC Order.

Network capabilities that satisfy these conditions and are currently technically available in U S WEST must be offered to all interested customers under equal terms and conditions, within one year of the U S WEST ONA plan approval. In addition, when U S WEST uses the ONA service/network capability as part of, or in the provisioning of an enhanced service offering, U S WEST must pay the same price for use of the service as would any U S WEST customer. Examples of equal terms and conditions include: price, installation intervals, maintenance intervals, availability, functionality, etc.

Examples of network capabilities desired by ESPs include unbundled Centrex features, custom calling features, and network access arrangements. ONA services are categorized into one of three classifications:

Basic Service Elements (BSE)	Central office features for ESPs.
Basic Serving Arrangements (BSA)	Network access to interconnect an ESP's system to U S WEST's network.
Complementary Network Services (CNS)	Central Office features for ESP's end-user customers.

Enhanced Service Providers (ESP) include companies that offer telephone answering, alarm, cable, and/or information services (such as '976' providers, voice message providers), etc.

A primary purpose of ONA is to prevent local exchange carriers, such as U S WEST, from leveraging their market power to obtain an unfair advantage in the offering of enhanced services. The non-structural safeguards described in this document were established in Computer Inquiry III to ensure against such anti-competitive behavior.

NOTE: U S WEST and non-U S WEST enhanced service providers will continue to request new network capabilities which may ultimately be offered as ONA services. Important information regarding new ONA service requests, specific rules, and regulations for ONA services are covered in Section G of this Compliance Training Manual.

B. Comparably Efficient Interconnect Requirements

U S WEST's ONA plan has not yet been fully approved. In the meantime, pending FCC approval, U S WEST Communications may offer enhanced services through FCC approval of a Comparably Efficient Interconnect (CEI) plan. Such a plan must document that the basic services used to provide the specified enhanced service(s) are equally available to competitors within the market area involved, as well as demonstrate compliance with the non-structural safeguards described below. A CEI Plan must be filed and approved for **each** U S WEST enhanced service offering prior to ONA Plan approval. Currently, U S WEST has one approved CEI plan, which is for voice messaging. Upon final ONA Plan approval, previously filed CEI services will have to satisfy ONA requirements.

C. Planning for Enhanced Services

Even without an approved CEI plan, U S WEST may conduct planning and trial activities before the actual offering of an enhanced service. It is important, however, that proper accounting procedures and appropriate non-structural safeguard rules are complied with. Such activities fall into three general categories:

- Research, planning and development activities, including market research.
- Technical trials designed to determine whether enhanced services equipment works properly.
- Market trials designed to determine the optimal characteristics of a contemplated offering.

NOTE: Important information regarding the rules and regulations for enhanced services trials are covered in Section I of this training manual.

II. CUSTOMER PREMISES EQUIPMENT (CPE)

Customer Premises Equipment includes telecommunications equipment which resides on a customer's premises such as: telephone sets, private branch exchanges (PBXs), facsimile equipment, etc. Under Docket 86-79, the FCC established essentially the same non-structural safeguard rules for Customer Premises Equipment that apply to enhanced services. In addition, as a prerequisite to marketing CPE within U S WEST Communications, U S WEST must maintain a 'sales agency' plan, whereby a reasonable number of unaffiliated CPE vendors are afforded the opportunity to market specified network services as U S WEST Communications 'Sales Agents.'

NOTE: Further details of U S WEST's Authorized Agency Plan are covered in Section J.

III. Non Structural Separation Safeguard Requirements

In its Computer Inquiry-III and CPE Dockets, the FCC designated four non-structural safeguards that US WEST Communications must follow to offer enhanced services or CPE without forming separate subsidiaries.

U S WEST's Open Network Architecture and CPE plans commit that a 'level playing field' or equality exists between U S WEST and providers of enhanced services and CPE.

The non-structural safeguards are almost identical for enhanced services (ONA) and CPE. Unless otherwise specified, this compliance training manual will not differentiate between them. The four Open Network Architecture and Customer Premises Equipment safeguards are:

- * **Customer Proprietary Network Information (CPNI)**
- * **Nondiscriminatory Provisioning**
- * **Network Disclosure**
- * **Cost Accounting Allocations (Part X)**

Detailed information on each of these safeguards follows in separate sections. Each section explains what U S WEST must do to comply with the FCC requirements. Each section also contains important information for you, as an employee of US WEST. **Your compliance obligations are explained in the "What do I have to do?" portion of each section.** Because it is vitally important that you understand your Compliance responsibilities, a **"HELP LIST"** is provided in section L of this manual. It provides reference contacts to help answer any questions you may have regarding your Compliance obligations. Each section also includes an opportunity for you to apply some of the principles in a real life **"What If?"** example.

Although you may have received other training on Part X and Customer Proprietary Network Information, completion of this Compliance Training is required. Adherence to the non-structural safeguards and U S WEST compliance procedures is necessary to ensure success of these efforts. Failure to comply with the requirements and procedures could result in serious consequences for U S WEST.

On an individual employee basis, complying with the procedures is a serious matter and any employee who willfully violates the procedures is subject to disciplinary action, up to and including dismissal.

Because of the continued need for compliance with these procedures, employees will be advised of their responsibilities as they relate to the Customer Proprietary Network Information, new ONA service requests, and Nondiscriminatory Network Provisioning in our Company's Code of Business Conduct annual coverage. Supervisors must ensure that new employees understand their Open Network Architecture and Customer Premises Equipment responsibilities.

The U S WEST Open Network Architecture Plan is evolutionary. It will continue to evolve, to change, even after its approval by the FCC. The needs of the emerging Enhanced Service Providers for high quality basic network services may require the development of new network technology. New capabilities to meet customers desires for greater variety and control over their telecommunications services will need to be found. All appropriate employees will be trained on these new services as they are introduced.

(B) CUSTOMER PROPRIETARY NETWORK INFORMATION **(CPNI)**

This safeguard places a responsibility on ALL U S WEST employees. Customer information has been obtained through years of service to our customers. To ensure that internal U S WEST Enhanced Service and CPE Providers do not compete unfairly with external Enhanced Service and CPE Providers, **your commitment to adhere to the rules is required.**

CPNI is divided into two categories:

- * Customer Specific CPNI
- * Aggregated CPNI

The FCC requires a different set of rules for each category. The first category is:

CUSTOMER SPECIFIC CPNI

Customer Specific CPNI is found throughout U S WEST Communications. It can be found in paper records or computers. Customer Specific CPNI ***is individual customer record information regarding basic network services.*** Examples include:

- * Customer Service Records (CSR's)
- * Service order information
- * Any description or itemization of a customer's specific basic network service (like features, number or types of lines and circuits)
- * Toll or local usage
- * Repair Records
- * Traffic studies

Customer Specific CPNI **does not** include customer name, address, telephone number, credit information, or information pertaining to U S WEST provided enhanced services.

CUSTOMER CPNI RIGHTS

All customers can choose to release their specific CPNI to external Enhanced Service or CPE Providers, and/or they may restrict their specific CPNI from U S WEST personnel who are involved in the sale or marketing of enhanced services or CPE. (If you are unsure if you are considered involved in the sale or marketing of enhanced services or CPE, check with your Supervisor.)

U S WEST is obligated to notify all multiline business customers of their CPNI rights annually. Although notification is sent to business customers, all customers, including residence, have the same CPNI rights.

All customers must provide written authorization if they wish to:

Release CPNI to all external Enhanced Service and/or CPE Providers.

Release CPNI to a particular Enhanced Service and/or CPE Provider.

Restrict CPNI from U S WEST Enhanced Service/CPE Provider sales and marketing personnel.

Rescind any previous restriction.

Release of Customer Proprietary Network Information

Release of individual customer records (Customer Specific CPNI) to external Enhanced Service and CPE Providers will be handled through the Vendor Service Center (VSC), formerly known as the COG.

Rescind Restriction

A customer's request regarding treatment of its specific CPNI remains in effect until the customer, via written correspondence, elects to change their request or specifies a time limit. This activity will also be handled through the Vendor Service Center (VSC).

Restriction of Customer Proprietary Network Information

SPECIAL SENSITIVITY MUST BE EXERCISED IN SHARING INFORMATION ON "RESTRICTED" CUSTOMER RECORDS.

Restricted CPNI information will not be available to anyone planning, marketing, or selling enhanced services or customer premises equipment.

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Just like proprietary information such as non-published numbers, 'restricted' Customer Proprietary Network Information is not printed or given out to anyone who is not authorized - even if you're in the same company.

%%%

CPNI INFORMATION SYSTEMS ACCESS

For certain customer record systems (e.g., BOSS, CARS, SOPAD, SOLAR, SONAR, CORD), mechanized security will be implemented by April, 1989. This security will ensure that only authorized personnel (i.e., those who are not involved in the planning, sale, or marketing of Enhanced Services or CPE) will have access to 'restricted' customer records through these systems.

All sales and marketing personnel who have access to paper records, personal computers, and systems other than BOSS, CARS, SOLAR, SONAR, SOPAD, and CORD, which contain customer specific CPNI, **cannot** utilize 'restricted' CPNI from these sources in the sale, marketing or planning of any enhanced service or CPE. Access to any system whose CPNI information has not been mechanically secured will be through specific Departmental procedures which will assure that all data obtained does not contain customer restricted accounts, ESP competitors' customer information, or non-published/unlisted telephone numbers.

Competitor's Customer Information

Some employees may have access to customer records (Customer Specific CPNI) that contain information regarding competitive enhanced services that are sold to U S WEST customers.

It is U S WEST's policy that employees are prohibited from using such CPNI to identify existing customers of Enhanced Service Providers for the purpose of marketing or selling U S WEST's enhanced services to specific customers.

As an example, employees must not utilize CPNI to obtain a list of all customers of a specific Enhanced Service Provider for the purpose of selling a competitive enhanced service, such as voice mail.

Non-Published/Unlisted Number

Also, internal U S WEST Enhanced Service Providers may not generate or use lists of customers containing non-published, non-listed telephone numbers for purposes of initiating sales contacts.

REMEMBER

If a customer has not restricted its account, the Enhanced Service or CPE planning, sales and marketing person will be able to continue to access and utilize the Customer Specific information.

If a customer has restricted the CPNI from Enhanced Service or CPE sales personnel, the U S WEST enhanced services and CPE sales and marketing person must not attempt to obtain such information from the customer record.

Only those **not** involved in the planning, sale or marketing of enhanced services or CPE are permitted access to 'restricted' customer account records. If a customer has a 'restricted' account and requests a change or questions its account, then an authorized person, **not** involved in the planning, sale or marketing of enhanced services or CPE, may access the 'restricted' records to help the customer.

FOR THOSE WHO ARE INVOLVED IN THE PLANNING, SALE OR MARKETING OF ENHANCED SERVICES or CPE, IT IS YOUR RESPONSIBILITY TO VERIFY IF THE CUSTOMER HAS 'RESTRICTED' ITS RECORDS BEFORE YOU UTILIZE ANY SERVICE RECORDS.

"What do I have to do?"	
<p>IF YOU ARE: Involved in the planning, sale or marketing of Enhanced Services or CPE, which may include: Service Representatives; Account Executives; System Design Centers; Marketing Administrators; Product Managers/ Developers.</p>	<ul style="list-style-type: none"> * I will not access restricted customer account records. * I will not request copies of CSRs, bills, repair records or traffic study information on restricted accounts. * I will refer restricted customers to designated personnel not involved in the sale or marketing of Enhanced Services or CPE. * I can obtain information directly from a customer who has restricted its records, but I cannot access its records without written authorization from that customer. * I may obtain Customer Specific CPNI data from external, non U S WEST sources. * I may access all non-restricted customer records. * I cannot use an Enhanced Service competitors' customer CPNI in any form of direct sales. * I cannot use unlisted or non-published telephone numbers to initiate enhanced service sales. * I can access any system which has mechanized security.(BOSS, CARS, SONAR, SOLAR, SOPAD, CORD) * I must follow specific Departmental procedures to access any information from a system which has not been mechanically secured, i.e., systems other than BOSS, CARS, SONAR, SOLAR, SOPAD, CORD.
<p>IF YOU ARE: Not involved in the planning, sale or marketing of Enhanced Services or CPE.</p>	<ul style="list-style-type: none"> * I will not provide restricted information to anyone who is not authorized to know, specifically, employees of U S WEST who are involved in the sale or marketing of Enhanced Services or CPE. * I may access all Customer Proprietary Network Information, subject to normal business guidelines. * I will refer any questionable request(s) to my Supervisor.

"What if?"

Therese is member of an Enhanced Service and CPE Product Team. She needs some customer service record information. In the past, Therese would just ask for the information from a friend who has access to customer records.

What should Therese do to obtain the information? What should her friend do???

Your "What If?" reply should be similar to ...

First, Therese should identify that she is involved with a U S WEST Communications Enhanced Service product team. Then, Therese can continue with her request as usual. Her friend should give Therese only unrestricted customer information.



Refer questions to your Supervisor.

For additional **CUSTOMER SPECIFIC CPNI** information, see your Departmental Representative on the HELP LIST.

(C) CUSTOMER PROPRIETARY NETWORK INFORMATION

AGGREGATED CPNI

AGGREGATED CPNI, the second category, *is a summary of customer specific information* formatted so that the identity of specific customers is unknown.

Any Aggregated CPNI used in the planning, designing, provisioning, or marketing of U S WEST Enhanced Services or CPE must be made available on equal terms and conditions ,i.e., same price, access, availability, etc. with all U S WEST and external Enhanced Service and Customer Premises Equipment Providers.

Initially, U S WEST will provide the following Aggregated CPNI by end office:

- Number of Lines by Business/Residence
- Five year forecast of line growth
- Average minutes of use (originating switched access)
- Average call duration (originating switched access)
- Average number of messages (originating switched access)
- Touchtone penetration

Aggregated CPNI is also initially offered at no charge to all external and U S WEST Enhanced Service and CPE Providers.

All U S WEST and non-U S WEST Customer Premises Equipment, and Enhanced Service Providers can obtain available Aggregated CPNI only from the Interconnections (ICONN) database directly, or through U S WEST's regional Vendor Service Center, formerly known as the COG, (1-800-544-7126).

Methods to access the ICONN database are explained in the Aggregated CPNI catalog which all Enhanced Service and CPE Providers may obtain from the regional Vendor Service Center. The catalog lists:

- * available Aggregated CPNI
- * instructions for accessing the ICONN database

Requests for Aggregated CPNI not identified in the catalog or ICONN database should be directed, in writing, to the Aggregated CPNI Coordinator listed on the HELP LIST.

No new types of Aggregated CPNI can be made available to employees involved in Enhanced Services or CPE sales, marketing, or planning without approval from the Aggregated CPNI Coordinator.

The catalog and the ICONN database will be updated to list new Aggregated data as it becomes available. It is the responsibility of the catalog holder to request updates.

"What do I have to do?"	
All Employees	<ul style="list-style-type: none"> * I will refer all catalog requests to one regional Vendor Service Center (1-800-544-7126). * If I am using Aggregated CPNI for any purpose other than planning, designing, provisioning, or marketing of Enhanced Services or CPE, and I do not fall into the category listed below, I may obtain information in the usual manner.
<p>ALSO IF YOU ARE: Involved in the planning, designing, marketing, or provisioning of enhanced services or CPE.</p> <p><small>This may include Product Managers/ Developers; Technical Operations Planners; and Sales Personnel.</small></p>	<ul style="list-style-type: none"> * I may not utilize Aggregated CPNI for the planning, designing, provisioning, or marketing of Enhanced Services or CPE unless it has been approved by the Aggregated CPNI Coordinator. * I may use Aggregated CPNI that is listed in the ICONN database only. * I will send all new aggregated CPNI requests in writing to the Aggregated CPNI Coordinator listed on the HELP LIST.