



Fraud Management Solutions

Comprehensive detection, prevention, and response for wireless and wireline operators



Proven **CFMS** technology
World-class integration services
Faster “**time to results**”

COMPAQ

Better answers

You're dealing with *a ruthless competitor*

Implement a convergent fraud solution

Compaq can help you implement a single consistent solution worldwide for your wireless, fixed-line, and hybrid networks. CFMS supports all major network technologies including:

- Fixed line
- Fixed cellular
- Analog wireless
- Digital wireless (GSM, PCS, TDMA, CDMA, etc.)



As a communications operator, you know that fraud can have a devastating impact on your business: **reducing profits, undermining customer confidence, and damaging your image in the marketplace.**

Fraud is not just the work of small-time thieves. In many cases, it's an organized criminal enterprise that severely affects your bottom line. Fraud forces you to invest in preventive and remedial measures. It results in you paying other carriers for illicit roaming, inter-exchange, international, and premium service calls. It ties up network capacity that could otherwise generate revenue.

Go on the offensive

Compaq helps you fight back with comprehensive fraud management capabilities for your wireless and wireline networks. Compaq provides everything you need to deploy an advanced fraud solution quickly, reliably, and with minimal risk.

A solution typically includes:

- CFMS (Compaq Fraud Management System), one the world's most widely used fraud management technologies.
- Planning, integration, and implementation services that ensure the success of your solution, from initial concept to full deployment.
- Compaq's industry-leading Alpha servers to handle the heavy demands of fraud processing.

With a Compaq fraud solution in place, you can quickly detect and analyze fraudulent behavior and act forcefully to protect your bottom line.

Our added value: CFMS

Compaq fraud solutions are built around CFMS (Compaq Fraud Management System). A powerful, flexible software environment now in its sixth release, CFMS is one of the industry's most widely used fraud products.

CFMS combines two critical technologies.

- Advanced customer profiling provides a detailed profile that reflects the normal calling behavior of each subscriber including call frequency and duration, calling times, and call destinations.
- A two-step data reduction process sorts through a large volume of calls to detect potentially fraudulent behavior (see below). The system initially screens all calls and changes in the subscriber database. When CFMS detects suspicious activity, it generates alarms.

An expert system further analyzes the alarms and combines multiple pieces of evidence to identify those incidents most likely to be fraudulent. A documented case is then presented to a fraud analyst along with recommendations for further action. CFMS can also automatically initiate response procedures — such as instructing your provisioning system to suspend international calling capabilities or notifying your customer care desk to immediately contact the subscriber — based on rules you define in keeping with your business operations and fraud policies.

Ensure broad, accurate detection

CFMS employs a wide range of detection methods to recognize the many types of fraud — technical, subscription, and insider — perpetrated in wireless and wireline networks. CFMS detection techniques include:

- Collision/call overlap
- Usage thresholds
- Suspension checks
- Call patterns
- Subscriber patterns
- Call destination tracking
- Distance checking
- Unknown or unauthorized subscriber checking.

Respond quickly and flexibly

Because processing is done in near real time, you can respond quickly and flexibly to a specific fraud incident to minimize the loss that results from that occurrence.

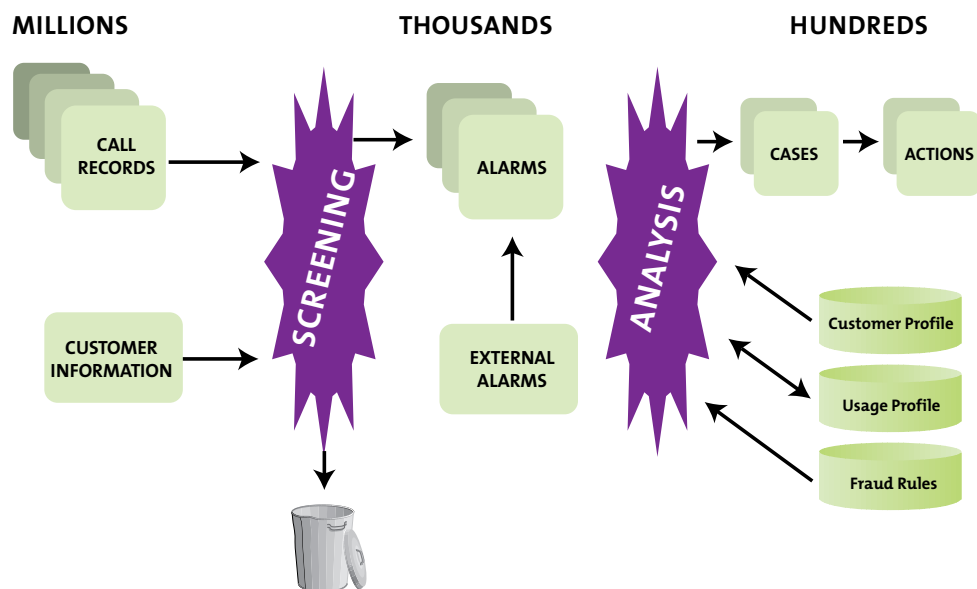
Improve analyst productivity

CFMS-based solutions enhance the productivity of your fraud analysts. For example, by combining accurate detection with data reduction, CFMS reduces the total number of incidents requiring an analyst's attention. CFMS also reduces the number of "false positives" reported, thus freeing your analysts to focus on truly fraudulent events. In addition, by presenting the analyst with well-documented fraud cases, CFMS speeds analysis and resolution. As a result of all these factors, you can support a given subscriber base with fewer analysts than ever before.

Our added value: Service expertise

Technology alone cannot solve a complex business problem like fraud. That's why services — including consulting, integration, implementation, and project management services — are an essential component of a Compaq fraud management solution.

Through consulting services, we help you formulate a fraud strategy and design a comprehensive fraud solution. Integration and implementation services ensure that CFMS is customized for your specific needs and integrated with your business systems and operations. Project management provides you with a single point of accountability for your fraud management project. Taken together, these services ensure that your solution will be up and running smoothly before Compaq hands off operation to your staff.



Two-step data reduction process

Our added value: Complete lifecycle solutions

The Compaq fraud methodology — developed through long experience working in a wide range of customer settings — enables us to quickly gain an understanding of your business so we can precisely tailor CFMS to your unique goals, technology environment, and operations. The solution life cycle will include a combination of the following services.

Fraud Assessment Service

A Fraud Assessment is the first step in developing a comprehensive fraud management strategy. A Compaq consultant assesses your current fraud tools and procedures and evaluates your readiness for fraud management in three critical areas:

- prevention, detection, deterrence

The consultant presents findings and recommendations that address fraud technology as well as fraud-related policies and procedures.

Data Analysis Service

To help you assess the magnitude of your fraud problem, Compaq works offline to analyze a subset of your call data records (CDRs). We then present our findings and recommendations.

Solution Design

Your Compaq team develops a detailed solution design that addresses your current requirements and future growth plans.

Implementation Services

Compaq installs the CFMS software, integrates all the components of your solution, and tailors CFMS for your environment. As required, we also integrate the solution with relevant business systems such as billing, customer care, and data warehouse applications. Depending on your needs, we can implement a full production system or a pilot system that operates on a subset of your customer data.

Integration with leading vendor applications

To maximize the value of your fraud solution, Compaq works with our industry-leading partners to ensure that CFMS is seamlessly integrated with your switching network and business systems. These may include:

- SS7 network applications
- Call collection/mediation systems
- Billing systems
- Customer intelligence and customer care applications
- Administration and provisioning systems.

Project Management

Overseeing all these activities, a Compaq project manager ensures on-time, on-budget delivery of your solution.

Head Start Solution Sets

In addition to the custom services described above, Compaq provides pre-defined, pre-tested Head Start Solution Sets. These solution sets help small and medium-sized carriers implement core fraud management capabilities quickly, reliably, and at a highly competitive cost.

Post-installation Support

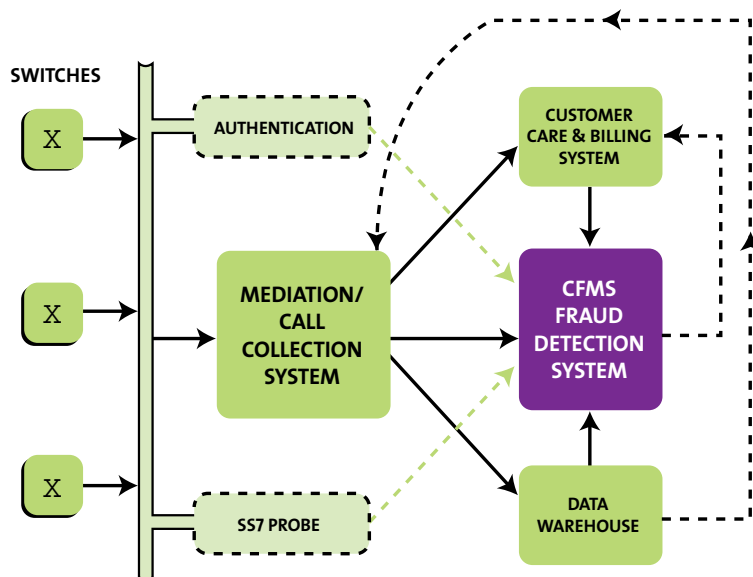
Once your fraud solution is in place, Compaq offers ongoing support to ensure a high level of system availability.

- Business Critical Support provides up to 7x24 support for your hardware and UNIX operating system.
- Telephone support for CFMS gives your staff access to product experts who can answer questions and help resolve software problems.
- New version updates ensure that your fraud environment incorporates the latest CFMS features and capabilities.

Solution Enhancements

As your needs change, Compaq can help you enhance your fraud management solution with options that include:

- Additional processing power and software licenses to support a growing subscriber base.
- Assistance incorporating additional switches, CDR formats, and data feeds into your solution.
- Services to integrate your fraud management systems with your other business systems and external systems.



CFMS integration

Compaq fraud solutions *help you fight back*

Reduce your fraud-related losses and operating costs

A Compaq fraud solution can pay for itself in less than a year. Our powerful CFMS technology and proven fraud methodology help you:

- Ensure fast, accurate detection of a wide range of fraud types.
- Prioritize and address the most damaging incidents first.
- Respond rapidly to minimize your losses.
- Enhance the productivity of your fraud operations.

Accelerate deployment while reducing your risks

Compaq provides the expert advice and assistance you need to ensure rapid, reliable deployment of your solution. We offer:

- A long track record of successfully delivering solutions for communications service providers worldwide.
- A proven implementation approach.
- Experienced implementation teams.
- Project management for a single point of accountability.

Adapt quickly as your business changes and fraud techniques evolve

Your Compaq fraud solution is tailored for your unique business and operating environment. To sustain your protection, you can:

- Easily update system rules and settings.
- Scale up to accommodate rapid growth.
- Tailor CFMS to support service in new geographic areas.
- Enhance your solution with additional capabilities.
- Integrate your fraud solution with other business systems.

In addition, Compaq continually enhances CFMS to combat fast-changing fraud techniques.

Provide broad coverage for many types of fraud

Those who perpetrate fraud are innovative and tireless. As soon as you close off one point of vulnerability, they search for another weakness to exploit.

Compaq solutions enable you to attack the entire spectrum of wireless and wireline fraud, including:

Subscription Fraud – Using falsified information to obtain service with no intention of paying for it.

Cloning – Creating a wireless handset that imitates one of your legitimate subscribers.

Calling Card Fraud – Stealing a calling card (or card number) and reselling it to users who then make international and long-distance calls.

Prepaid Fraud – Interfering with a carrier's ability to accurately deduct a call from the caller's prepaid balance.

Insider Fraud – The selling of confidential access information or the creation of illicit accounts by a person with privileged access to your systems.

Dealer Fraud – Granting service to individuals who are known or suspected to be a high risk for fraudulent behavior.

Clip-on Fraud – Clipping on to a line or pay phone and making expensive calls that are never paid for.

and many others!

Why choose a Compaq fraud solution?

Fraud management expertise

Compaq has more than six years of experience architecting, implementing, and supporting fraud management solutions for communications service providers. We have installations on five continents, supporting more than 30 million subscribers. Our successes include one of the largest networked wireless fraud management installations in the world, which handles more than 100 million calls a day made by 9 million subscribers.

Industry expertise

Compaq has worked with hundreds of wireless, wireline, and cable operators around the globe, helping them successfully implement a wide range of capabilities, including:

- ▶ Solutions for telecommunications management networks (TMN), intelligent networks (IN), call collection/mediation, customer care and billing, and customer call centers.
- ▶ Horizontal technologies such as Internet/intranet, mail and messaging, and data warehousing.
- ▶ Infrastructure and commerce solutions for Internet service providers (ISPs).

Worldwide integration expertise

As one of the world's top systems integrators, Compaq can help you deploy fraud capabilities quickly, predictably, and with minimal risk, wherever you do business.

Take a closer look

We welcome the opportunity to discuss your most pressing fraud challenges and present some of our recent successes. Your Compaq account manager can arrange for you to meet with a specialist from the Communications Industry Solutions practice. So call today. We also welcome you to visit our Web site at www.compaq.com/services/industry/communications

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