

# Voltage Enterprise Data Security for Financial Services

**PROTECTING YOUR FINANCIAL DATA  
ANYWHERE IT MOVES, WHEREVER IT RESIDES, AND HOWEVER IT IS USED**

Your customers, partners, and employees are more sophisticated than ever about the privacy of their personal sensitive data. They are also more demanding. They have come to expect anywhere/anytime service, and, naturally, that means your organization has to provide an increased level of protection and security to guard against ongoing data breaches and compliance violations. Financial services companies must now deal with petabytes of data, the rise in electronic payments, the growth in social media and other online technologies, to say nothing of the newfangled mobile devices accessing information from everywhere and anywhere. Financial services are fast becoming data-centric organizations in their own right, revolving assets around the needs of customers, no longer just the profitability of products and business lines. In today's interconnected global world, this presents huge challenges. The industry faces complex data privacy and residency compliance, all aimed at the usage and movement of sensitive information that may cross intrastate or international boundaries. Financial services companies often have to navigate an intricate web of government and industry regulations to protect the privacy and sovereignty of customers' sensitive information. Making matters worse, the threats are continually evolving. Just as technology uncovers new data security defenses, the attack vectors have correspondingly increased.

If you are like most companies in the financial services sector today, you are looking to reduce operational costs and increase efficiencies through the use of cloud-based services, and to develop strategies that address the challenges and opportunities of Big Data analytics. While your environment may consist of a mix of new and legacy systems and applications across networks of branch offices, call centers and web portals, you must secure the storage, transit, and use of corporate and personal data across these distributed networks and business applications. This includes online banking and electronic communications of sensitive information and documents. And many of the traditional point security solutions that are deployed add complexity and management costs, and leave gaps between systems and applications that are highly vulnerable to attack. The bottom line? Financial services are an attractive target for hackers because of the nature of the sensitive financial and customer data, and the ability to monetize it.

At Voltage Security®, we understand these concerns, and have a proven data protection strategy that will protect your financial data — wherever it goes. We've built our company around enabling the trusted movement and use of data across your extended enterprise. Our data protection framework ensures that all of your data remains private anywhere it moves, wherever it resides, and however it is used across data centers, public and private clouds, and mobile devices.

## **A Comprehensive Strategy to Protect Sensitive Customer and Corporate Data While Reducing Risk and Management Cost**

As in other industries, sensitive data is rampant in financial services, and prone to threats and data breaches. Traditionally, these organizations have had stringent security controls in place to guard against threats that could damage revenue, and even halt the business. However, always on the forefront of new technology, your organization may now be enabling innovative solutions and customer initiatives for mobile and cloud that could increase the risk of exposure of your most sensitive data. Without effective security, you simply can't maintain customer trust, or comply with regulations such as the Payment Card Industry Data Security Standard (PCI DSS) and SEC guidelines or

even begin to address the growing threat environment. Recognizing these issues, we set out to solve them. Today, Voltage is the only company to provide a data-centric framework that protects all data types, including structured and unstructured data, allowing your organization to gain the benefits of single-provider data security without having to compromise best-in-class protection. We address the complex and varied data protection needs of financial services organizations from tokenization to email and file encryption to cloud data security and end-to-end encryption.

**According to a Forrester Research report:**

*“As cybercriminals have become more skillful and sophisticated, they have eroded the effectiveness of our traditional perimeter-based security controls. The constantly mutating threat landscape requires new defensive measures, one of which is the pervasive use of data encryption technologies. In the future, you will encrypt data — both in motion and at rest — by default. This data-centric approach to security is a much more effective way to keep up with determined cybercriminals. By encrypting, and thereby devaluing, your sensitive data, you can make cybercriminals bypass your networks and look for less robustly protected targets. Encryption will become a strategic cornerstone for security and risk (S&R) executives responsible for their organization’s data security and privacy efforts.” — John Kindervag, Killing Data, March 2012.*

**Only Voltage Security delivers these key benefits for your financial security data protection plan:**

- Provides a single, comprehensive protection framework for financial data. This single framework protects all kinds of sensitive data across multiple IT platforms, systems, and applications — from legacy and the cloud to the Big Data framework.
- Ensures global regulatory compliance, and delivers the maximum return on information. Voltage financial solutions provide comprehensive compliance, rather than a system-by-system approach that can be costly and complex to manage, as well as expose security gaps. We help you meet and maintain compliance with industry and international data security, residency and privacy regulations by delivering the greatest extent of protection for all data formats, including structured, semi-structured and unstructured. We help your company address data privacy and residency compliance requirements for data transiting or accessed across different platforms, systems, and devices, and allow aggregation of data across borders.
- Offers portability and usability across any environment. Voltage’s data protection framework is the only approach that makes your data available to be accessed and used by the people, platforms and applications that need it most, preserving the value of the data for analytics, while, at the same time, making the data unusable to hackers.

## Three Mission-Critical Ways Voltage Enterprise Data Security for Financial Services Protects Your Financial Data *and* Business

Voltage provides comprehensive protection of your sensitive customer and employee data while reducing risk and management cost. Our solution offers an efficient, scalable and proven data protection framework that protects all data types across complex IT environments. This significantly reduces the threat of breach, minimizes overall risk, and reduces the complexity and cost of achieving and maintaining compliance. With Voltage Enterprise Data Security for Financial Services, you can protect your world’s data, anywhere it moves, wherever it resides, and however it is used. Our solution enables payments, web, and tokenization — delivering end-to-end data protection, offering the lowest cost of operation and highest scalability, and providing dedicated secure email clients for major platforms.

**Voltage can help you in three mission-critical areas:**

### 1. Deliver End-to-End Data Protection

Mitigating the risk of cardholder data breach at all points in the payment stream is critical, particularly in light of today’s highly publicized software attacks and stronger regulatory environment. You must reliably protect credit card data at rest and in transit within your environment. In fact, both structured and unstructured data must be protected immediately at the point of origination and only decrypted by the authorized user or downstream application. With Voltage Enterprise Security for Financial Services, our products take care of this for you.

As an example, Voltage SecureData Payments™ provides complete end-to-end data protection for payment transactions from point of capture to authorization, settlement, and beyond. As it is stored and transmitted, the sensitive customer and financial data remains encrypted, reducing risk of theft or breach across network security gaps.

To protect payment information at the browser all the way through the transaction system in the payment processor, our solution is enabled via Voltage SecureData Web™. In fact, encryption of data, requiring minimal lines of code, can be enabled for any standard browser accessed via mobile, desktop, tablet or laptop from the moment of capture. This capability can reduce the exposure of your sensitive data as it moves through different systems and applications.

For more on Voltage SecureData Payments™, visit [voltage.com/products/securedata-payments/](https://voltage.com/products/securedata-payments/)

## 2. Offer Lowest Cost of Operation and Highest Scalability

Our solution's stateless architecture removes the high costs of key storage, key rotation, and re-writing downstream applications to accommodate changes in data structures and data management processes. This results in the highest scalability and availability of data security to meet your business demands. Our solution enables tokenization through Voltage SecureData Tokenization. With it, you can use the same simple APIs and web services to incorporate tokenization, encryption, and masking into your applications as dictated by business and compliance requirements.

With Voltage's stateless tokenization architecture, there is no need for a distributed token vault or traditional database. This eliminates the complexity of managing, replicating, storing and recovering tokens and keys throughout their lifecycle. Regardless of the size of your financial institution's IT network, large or small, this capability can result in significant savings in operations and management costs.

For more on Voltage SecureData Tokenization, visit [voltage.com /technology/secure-stateless-tokenization/](https://voltage.com/technology/secure-stateless-tokenization/)

## 3. Provide Dedicated Secure Email Clients or Major Platforms

Despite email encryption functions built in to clients and servers, the complexities of key management and usability have prevented widespread market adoption. That changes with Voltage SecureMail™. Our solution is built on ground-breaking encryption innovations that overcome these technical and business challenges — enabling secure email to be both easy to use and highly scalable, while meeting the most advanced use cases.

Voltage SecureMail offers an easy to use, global-scale email encryption solution for inside and outside your enterprise. It simplifies compliance to privacy regulations and mitigates the risk of email security breaches by providing end-to-end security for email attachments at the enterprise gateway, and to and from leading mobile smartphones and tablets. It provides your employees and customers with a secure way of completing transactions across different platforms, including personal banking and payment services as well as sending customer financial information to internal and external recipients. Dedicated email clients are designed to work seamlessly with existing email interfaces such as Microsoft Outlook, standard web email clients, and Blackberry, Android and iOS devices to ensure a familiar user experience without disruption to productivity. This means your users can read, reply to, and send encrypted emails with sensitive data to their clients using either their desktop or mobile devices in a seamless experience.

For more on Voltage SecureMail, visit [voltage.com/products/securemail/](https://voltage.com/products/securemail/)

## Voltage Technology Innovations

Powered by ground-breaking encryption innovations, including Voltage Format-Preserving Encryption™ (FPE), Voltage Identity-Based Encryption™ (IBE), and Voltage Page-Integrated Encryption™ (PIE) our innovations open up new ways to securely communicate, new ways to protect sensitive corporate, customer, and partner data to prevent security breaches and theft, and enable industry-leading ways of encrypting information. Our powerful data protection solutions allow any company to seamlessly secure all types of sensitive corporate and customer information, wherever it resides, while efficiently meeting regulatory compliance and privacy requirements.

## Voltage Financial Solutions - Use Case Examples

**Secure Email and Document Collaboration:** Executive, legal, and investment teams exchange sensitive email and documents internally and externally using smartphone devices in fast-moving business transactions. Granular policy control leveraging the corporate directory ensures that only the right team members or external parties are authorized to access

**Enables Secure, Streamlined Customer Processes:** Banking customer representatives securely deliver encrypted mortgage documents to customers with mobile devices as well as desktop systems. Customer service representatives are able to accelerate the mortgage initiation process while protecting sensitive data.

**Addresses Compliance, Maximizes Return on Information, Lowers Total Cost of Ownership:** Credit Unions protect the sensitive data of their members, including account numbers, credit card numbers, and social security numbers, in email communications – and proactively addresses data compliance requirements. They also reduce time and administrative costs by eliminating courier services for large confidential documents.

**Enables Secure Online Banking:** Banks offer online banking services using a web portal to accept the customer log-in credentials. Data is protected at entry and before entering the SSL tunnel for transmission to the bank's back-end system.

**Meets Data Privacy and Security Compliance Requirements Across Borders:** Financial services institutions gather the customer data from a call center in one country for aggregation and running a customer analytics initiative using their data scientists located in another country. The value of the data is preserved for analytics, but sensitive data is protected in compliance with data security, privacy, and residency regulations.

**Reduces PCI Audit Cost and Scope:** A global financial services company has a major credit card processing business. Like other credit card companies, it is imperative that they comply fully with the PCI DSS guidelines and procedures. They have increased the security and performance of their systems, and dramatically reduced their compliance scope by removing storage of cardholder data from many systems and applications, translating into very large compliance cost savings.

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### About Voltage Security

Voltage Security®, Inc. is the leading data protection provider, delivering secure, scalable, and proven data-centric encryption and key management solutions, enabling our customers to effectively combat new and emerging security threats. Leveraging breakthrough encryption technologies, our powerful data protection solutions allow any company to seamlessly secure all types of sensitive corporate and customer information, wherever it resides, while efficiently meeting regulatory compliance and privacy requirements.

For more information, please visit [www.voltage.com](http://www.voltage.com).