PKWARE

NEXT GENERATION **ENCRYPTION** AND **KEY MANAGEMENT**

SMARTCRYPT

SECURE Z SYSTEMS DATA AND REDUCE RESOURCE DEMANDS WITH SMARTCRYPT

Mainframe computing systems were once considered to be relatively safe from cyber attacks, but threats to these critically important business assets are becoming more prevalent and more serious every day.

Protecting customer information and intellectual property housed in mainframes is more important than ever—but many mainframe encryption solutions only protect a subset of data types or apply to limited use cases, and often create performance issues.

Smart encryption for z Systems

Smartcrypt is different. Providing data-level encryption for IBM z Systems mainframes, Smartcrypt is the most flexible, high-performance z Systems encryption solution available today.

Smartcrypt protects both structured and unstructured data, gives customers the option to embed encryption directly into their applications, and can secure mainframe databases with field-level, length-preserving encryption.

PKWARE's innovative Smartkey technology automatically generates, synchronizes, and exchanges encryption keys according to your organization's security policies, making the process automatic for end users. Keys can be stored in purpose-built hardware security modules on z Systems hardware, and are also interoperable with third-party dedicated key management appliances.

Smartcrypt can encrypt and decrypt data on all major enterprise computing platforms, including z/OS, Linux on z Systems, x86, IBM i, AIX, Solaris, HP-UX, and Windows.

SOLUTION SUMMARY

- Persistent data-level encryption for structured and unstructured mainframe data

- Compatible with all z System operating systems including z/OS and Linux on z Systems

- Files are compressed prior to encryption, reducing data volumes

- Protected data can be accessed by authorized users on any enterprise computing platform

BENEFITS

- Meet service level agreements for data security and data transmission

- Eliminate the negative consequences of a data breach, whether the breach occurs on the mainframe or elsewhere

- Meet industry and governmental compliance mandates for data protection

- Lower IT infrastructure costs across every platform with a single solution for encrypting and compressing data

PKWARE
NEXT GENERATION **ENCRYPTION** AND **KEY MANAGEMENT**

SMARTCRYPT

z Systems Challenges	Smartcrypt Solutions
Concentrations of sensitive data Mainframes handle massive volumes of transactional data and other critically important information, the theft of which could permanently damage a company's reputation and ability to compete.	Smartcrypt applies strong encrytion to structured and unstructured data, ensuring that no one but authorized users can access the data, even in the event of a security breach.
Data exchange outside the mainframe Organizations often need to transfer sensitive information from their mainframe systems to file servers, desktops, or external business partners, creating multiple opportunities for data to be stolen or mishandled.	Only Smartcrypt provides persistent-data level encryption that travels with data wherever it is used, shared, or stored. Smartcrpyt's cross-platform operability allows authorized users to access protected data on any enterprise operating system.
Increased data management costs Enterprise data volumes are expanding at exponential rates, straining IT resources and driving high costs for data storage and data transmission.	Smartcrypt uses PKWARE's industry-best compression technology, reducing file sizes by up to 95% before encryption. Costs for storing and transmitting encrypted data are dramatically reduced.
Resource-intensive encryption Many non-native mainframe encryption solutions consume excessive amounts of mainframe computing resources.	Smartcrypt exploits the z/OS Integrated Cryptographic Services Facility, allowing for faster and more efficient encryption and decryption processing.
Key management complexities Large organizations face significant challenges in creating, synchronizing, and exchanging encryption keys, especially when exchanging data with external partners.	PKWARE's Smartkey technology automates key management activities such as key generation, synchronization, and exchange. Smartcrypt also includes an automated interface for retrieving public keys from LDAP-compliant directories, greatly increasing the ease of use of public keys for encryption in z Systems processing.

PKWARE ®

www.pkware.com

CORPORATE HEADQUARTERS

201 E. Pittsburgh Ave.
Suite 400
Milwaukee, WI 53204

+ 1 866 583 1795

EMEA HEADQUARTERS

79 College Road
Suite 221
Harrow HA1 1BD

+ 44 (0) 203 367 2249