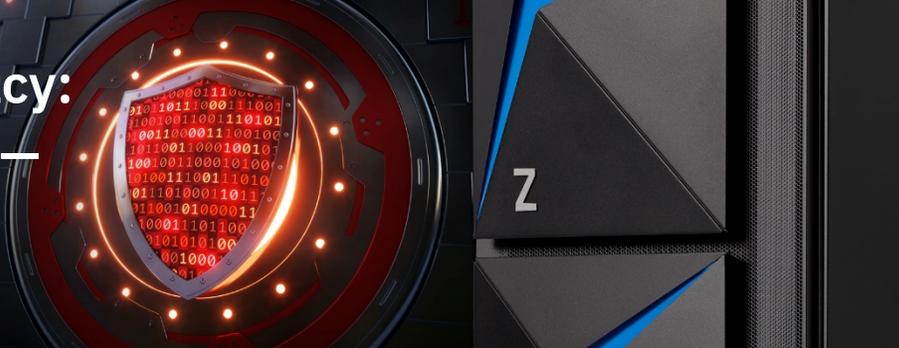


Data security with privacy: Encryption everywhere — the new standard



Security and Privacy with IBM Z

As digital technologies advance and the data explosion continues, the risk of security breaches grows. With IBM Z® and pervasive encryption, the impact of those breaches is kept at bay, prevented through the ultimate data protection — IBM Z.

What is Data Security?

Today, the chance of experiencing a data breach within two years is 29.6 percent, an increase from 27.9 percent in 2018.¹ Five years ago, that chance was 22.6 percent.¹ In other words, organizations now are almost one-third more likely to experience a breach within two years than they were in 2014.¹

Data security is the protection of data which can be accomplished through encryption and transformation. The demand for data protection that is both easy to deploy and proven secure is rising as data breaches occur more frequently and breed greater consequences.

Additionally, as companies move towards tighter data security, the amount of data continues to grow and become more portable while data protection is proving to not be enough in every case.

What is Data Privacy?

Data privacy relates to how data should be used, aggregated, and controlled based on a user's need to know. Organizations have a need to share confidential and important data not only with third parties, but also across internal business units that may not share the same privacy protocols or policies.

Meanwhile, consumer concern is increasing — a new IBM commissioned study conducted by The Harris Poll found that 64 percent of all consumers have opted not to work with a

business out of concerns of whether they could keep their data secure.³ However, that same study found 76 percent of respondents would be more willing to share personal information if there was a way to fully take back and retrieve that data at any time³.

The average total cost of a data breach is \$3.92 million with an average of 25,575 records exposed.¹ But that number can increase even more if other factors are involved. When a third party or cloud migration surround or cause a data breach, the cost of that breach is increased by a minimum of \$300,000 and can total upwards of \$4.22 million.¹

The Value of Pervasive Encryption

Pervasive encryption introduced revolutionary change into the world of data protection and has strengthened enterprise data security since its introduction. With 8.5 times the protection at 93 percent lower cost and 18.4 times the speed compared to x86, pervasive encryption enables clients to encrypt more data than ever before. It has the highest possible level of protection for cryptographic keys without application modifications or impact to service-level agreements (SLAs).² Pervasive encryption ensures that all enterprise data is secure through the encryption of all data while eliminating the need to locate and classify data.²

With IBM z15™, it's not only about protecting enterprise data, but also delivering new value to end consumers by meeting one of the greatest growing demands in the market — privacy. You want to know that your data is safe and secure both inside and outside your datacenter. Your clients want the same assurance that their data is protected, and their privacy is respected. But true data privacy cannot be accomplished without data protection that remains when the data is at-rest, in-flight, and in-use both inside and outside of your datacenter.

¹ Cost of Data Breach Report, Ponemon Institute and IBM Security, 2019

² Competitively Priced Data Security, Alex Feinberg, IBM Systems Media, 2018

³ IBM and Harris Poll Privacy study, commissioned by IBM, 2019

Expanding the IBM Z Security Portfolio with IBM Data Privacy Passports

With IBM Data Privacy Passports, IBM has enhanced its topnotch protection provided by IBM Z to cover the entire enterprise no matter where the data is located and no matter what the data source. This consolidated data privacy platform protects data after it leaves the datacenter to minimize the impact of security breaches, potential noncompliance, and financial liability. But those aren't the only risks that can be detrimental to your business.

When their data is exposed, customers lose trust in those companies and often take their business elsewhere. The Harris Poll found that 53 percent of consumers say how a company protects their privacy is a bigger influence than the quality of the company's products and services. Lost business is the largest cost category contributing to the total cost of a data breach.¹ The average cost of lost business for organizations in the 2019 study was \$1.42 million, which represents 36 percent of the total average cost of \$3.92 million.¹

IBM Data Privacy Passports provides a *data-centric* security solution that enables data to play an active role in its own protection. With these capabilities, clients can more easily meet regulatory compliance, remove the hassle of key management, and strengthen their hybrid multicloud with IBM Z encryption.

IBM Data Privacy Passports eliminates the current standard of point-to-point encryption that leaves many vulnerabilities and control risks for your data. Clients can implement field-level data protection without needing to change their applications and protecting data throughout its lifecycle. This platform enables clients to revoke access to data that has left their datacenter and provide fine-grained privacy control and consent management.

Data breaches are more common and more costly now than ever. To avoid expensive data breaches and irrevocable reputational damage, visit this link for more information:

<https://www.ibm.com/marketplace/data-privacy-passports>.

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¹ Cost of Data Breach Report, Ponemon Institute and IBM Security, 2019

² Competitively Priced Data Security, Alex Feinberg, IBM Systems Media, 2018

³ IBM and Harris Poll Privacy study, commissioned by IBM, 2019