

SAP Solution Brief
SAP Data Custodian

Gain Greater Visibility and **Control of Your Data** in the Public Cloud

THE BEST RUN





Use the public cloud with trust, security, and transparency

Public cloud platforms deliver significant business benefits, but only a small portion of the commercial world's data is stored there. That's because many business owners are unwilling to accept the risk of handing control of their data over to a third party or losing visibility of where it is stored. So how do you get the **benefits of the cloud** while keeping control of your data?

Many enterprises want to move to the cloud for lower startup costs and greater flexibility, agility, and scalability. But these enterprises and their customers worry about strict data protection, privacy, and sovereignty-related regulations such as the General Data Protection Regulation (GDPR) and the Federal Data Protection Act (FDPA).

These regulations often restrict the geographies in which you can store, process, and access sensitive data and carry significant fines for noncompliance. As a result, many opt for a physically isolated or private cloud and miss out on the benefits of the public cloud.

To comply with changing regulations, organizations want the same control of their business data in the public cloud as they do on premise, while being able to:

- Control data privacy and access
- Impose restrictions on cross-border data flow
- Comply with data protection regulations
- Prevent unauthorized data access by cloud infrastructure providers
- Obtain notifications and prevent data breaches

Use the public cloud with trust, security, and transparency



Comply with new data protection regulations

Governments and authorities around the world are strengthening data protection regulations in response to data breaches and privacy concerns. The most significant change is the European Union's GDPR, which went into effect on May 25, 2018. It raises major concerns for organizations that are considering or are already using the public cloud.

Some of the regulations you should be aware of are shown in the table below.

Data Regulations	
United States	U.S. Patriot Act, Stored Communications Act, and California Consumer Privacy Act
European Union	EU Data Protection Directive, replaced in 2018 by the General Data Protection Regulation (privacy laws in 28 countries)
China	Cyber Security Law
Japan	2014 Basic Act on Cybersecurity and Personal Information Communications Act (amended PIPA)
Australia	Privacy Act 1988 and Australian state and territory legislation
Singapore	Personal Data Protection Act
Canada	Personal Information Protection Act (PIPA), Personal Information Protection and Electronic Documents Act, and Freedom of Information and Protection of Privacy Act
Russia	Federal Law No. 152-FZ on Personal Data

Comply with new data protection regulations

The answers to your questions

Data transparency: The where, the who, and the how

Data control: Your data, your rules



The **answers** to your questions

The questions you need to ask when using the public cloud include:

- How do I comply with these new regulations?
- How do I quickly respond to changes in data protection laws?
- How do I meet multiple regional regulations simultaneously as a multinational enterprise?

The SAP® Data Custodian solution can help you answer all of these questions. It can also help you gain similar transparency and control of your data in the public cloud as to what you have in your

on-premise system or in a private cloud. This includes access control for your cloud deployment of SAP S/4HANA®.

You can also rapidly identify data risks and breaches in the public cloud, as well as configure multiple policies to help you comply with different data protection regulations from different territories.

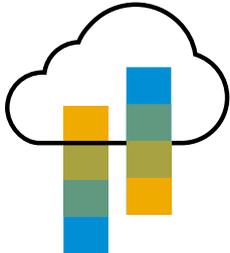
But SAP Data Custodian does a lot more than this – it allows you to exceed existing data protection regulations and provides the agility to adapt your policies at any time.

Comply with new data protection regulations

The answers to your questions

Data transparency: The where, the who, and the how

Data control: Your data, your rules



SAP Data Custodian gives you the **flexibility and scalability** of the public cloud with the transparency and control of the private cloud.



Data transparency: The where, the who, and the how

Transparency in the SAP Data Custodian solution answers the following questions:

- Where is my data stored?
- Who is accessing my data and from which location?
- How has my data been moved and processed?

You can configure your own data storage, placement, access, processing, and movement policies. Your logs from public cloud services are continuously monitored to detect policy violations, unexpected behaviors, and anomalies.

Risks and violations are noted with near-real-time reports on where your data is stored, where it has been accessed and processed, and if it has been moved. It provides transparency on:

- **Storage location** – Showing where your data is physically stored
- **Movement** – Alerting you of data movement violations with details on why, where, when, and who moved it
- **Processing location** – Giving visibility of data processing locations and reporting on compliance with geolocation policies
- **Access** – Reporting on who accessed your data as well as the time, location, and region of that access
- **Alerts and notifications** – Enabling you to configure alerts for data protection policy infringements

Comply with new data protection regulations

The answers to your questions

Data transparency: The where, the who, and the how

Data control: Your data, your rules



Data control: **Your data, your rules**

In addition to data transparency, SAP Data Custodian also gives you control of your data by enforcing your data protection policies, as shown in the [figure](#) on the next page.

The solution provides:

- **Access control and data masking for SAP S/4HANA** – Create contextual access-control policies to block access to specific applications and mask sensitive data

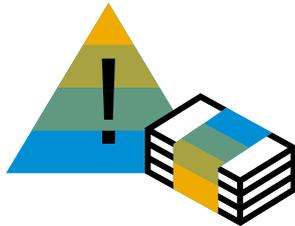
- **Key management service (KMS)** – Control your own encryption keys to provide an additional layer of data protection
- **Data placement and data-at-rest control** – Control where employees can configure resources and move data in the public cloud
- **Application control** – Control access to the SAP Cloud portfolio, including access from embargoed countries

Comply with new data protection regulations

The answers to your questions

Data transparency: The where, the who, and the how

Data control: Your data, your rules

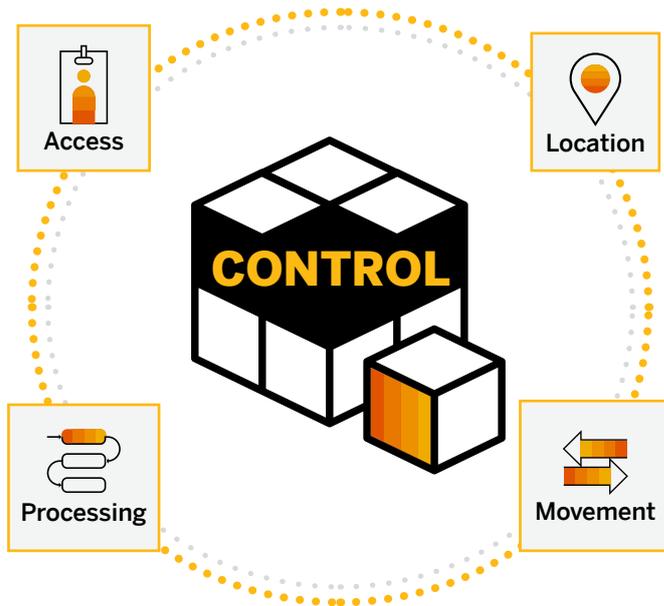


Organizations in breach of GDPR can be fined **up to 4% of annual global turnover** or €20 million, whichever is greater

Source: "[GDPR Key Changes](#)," EU GDPR Portal



Figure: Controlling Every Aspect of Your Data in the Public Cloud



Comply with new data protection regulations

The answers to your questions

Data transparency: The where, the who, and the how

Data control: Your data, your rules



Multi-cloud data protection use cases

SAP Data Custodian supports organizations that wish to benefit from moving to the public cloud but have concerns about data protection and handing control of their business data over to third-party organizations. The solution supports users of Microsoft Azure, Google Cloud Platform, Amazon Web Services, and AliCloud infrastructure-as-a-service platforms. It also supports the following use cases:

- **Data classification** – Understand what data you are storing in the public cloud and where it is located
- **Data localization** – Prevent the creation of public cloud resources and thus the movement of business data outside defined regional boundaries
- **GDPR compliance support** – Ensure cloud data can be moved or processed only within the EU or in countries defined as having an adequate level of data protection
- **Export control** – Prevent exfiltration of cloud data to embargoed countries
- **SAP application transparency and control** – Rapidly identify data protection risks on your SAP cloud deployments, including on SAP S/4HANA
- **Data breach prevention** – Use an independent KMS to prevent insider and external data breaches
- **Unauthorized access by cloud providers** – Control access to your cloud resources by the cloud provider

Multi-cloud data protection use cases



Summary

The SAP® Data Custodian solution is designed to give public cloud users the transparency and control over their public cloud resources and applications previously only available in private cloud or on-premise configurations. When combined with the SAP Cloud portfolio, SAP Data Custodian can help mitigate cloud data protection concerns and help you move to the cloud with confidence.

Objectives

- Leverage the significant business benefits of using public cloud platforms while minimizing the perceived risks
- Address the new, more-stringent global data protection regulations and increased penalties for data breaches
- Maintain visibility, keep control, and help meet data protection regulations in the public cloud

Solution

- Public cloud data transparency and anomaly detection, alerts, and notifications

- Data placement, movement, and access controls
- Inventory management
- Contextual cloud and cloud application access controls, including for SAP S/4HANA®
- Independent key management service (KMS)

Benefits

- Protect multi-cloud data
- Support and respond to global data protection compliance and data localization policies
- Prevent unauthorized access to public cloud infrastructure and SAP applications
- Identify irregular cloud behavior
- Prevent data breaches

Learn more

For more information, call your SAP representative today or visit us [online](#).

Some of the functionality described in this document is forward looking and subject to change. For the most up-to-date feature information, please contact your SAP account manager.



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