EDB Postgres® AI: Sovereign Data and AI Factory

The fast track to production-ready Postgres and AI

The challenge: Achieving performance, agility, and scale in on-prem environments

Data sovereignty is a top concern for organizations today, especially as they work to meet demands for new AI applications. Integrating the right mix of hardware, databases, and AI tools to deploy mission-critical database and AI workloads on premises is costly, complex, and time-consuming, and maintaining continuous high performance and availability requires regular manual monitoring and management. These challenges delay new projects and hinder your ability to quickly leverage your data for critical applications and AI-driven business growth.

The solution: Production-ready, AI-ready system, delivered to your data center

EDB Postgres AI Sovereign Data and AI Factory is an all-in-one system that delivers highly available, production-ready Postgres directly to your private data center. Leverage your data in your environment to accelerate open, data-driven growth and an AI future, while end-to-end support eliminates the complexity of data and AI infrastructure management. With an expertly configured system and 24/7 support, you can plug in and deploy your sovereign platform in just a few clicks.

- **Mission-critical performance:** Best-in-class software and hardware are curated and integrated for your specific workload needs, unlocking up to six-times better performance.

- **High availability in just a few clicks:** Production-ready Postgres with 99.999% availability is delivered to your private data center. Plug it in and deploy a highly available cluster in minutes.

- **Turnkey simplicity:** Leverage an all-in-one system with 24/7 support and lifecycle management for turnkey modernization. With cloud-native automation on premises, you achieve 90% better value than with cloud databases.

- **Rapid, sovereign AI development:** Securely build, test, and launch sovereign AI applications. Go from idea to production five times faster—in weeks instead of months or years.

Sovereign Data and AI Factory: The fast track to production-ready Postgres and AI

Bring sovereign database and AI workloads into production five times faster, with up to six times better performance. Sovereign Data and AI Factory integrates EDB Postgres AI with best-in-class Supermicro servers, Red Hat OpenShift, and optional NVIDIA AI Enterprise and GPUs to help you meet your AI ambitions. The all-in-one, preconfigured system is delivered and set up for you, eliminating complex installation, tuning, and configuration and enabling immediate data and AI sovereignty. Instead of spending months and scarce resources to kickstart AI development, you get direct access to an AI-ready data platform, 24/7 support, and expert-led proofs of concept, taking you from delivery to idea to production in just 90 days.

- **All-in-one system:** EDB Postgres AI, Supermicro servers, Red Hat OpenShift, and optional NVIDIA AI Enterprise and GPUs are integrated, installed, and supported for turnkey production and modernization.

- **Expert configuration and end-to-end support:** Your entire stack is curated and configured to your specific workload needs for optimal performance and availability. Scale your growing data and AI demands by adding additional compute nodes as you need them.

- **99.999% high availability:** Deploy resilient database clusters using just a few clicks in an easy-to-use interface. Eliminate downtime and achieve five-nines high availability, simply and securely.

- **Cloud-native automation:** Automate your data infrastructure with your entire hardware and software stack managed for you. With automated provisioning, failovers, zero-downtime upgrades, and more, you simplify management of hundreds of databases and boost productivity by 30%.

- **Sovereign model serving:** Run customized AI models on a secure vector database without exposing data to the cloud. Maximize ROI with intelligent scaling that optimizes resources automatically.

EDB Postgres AI Sovereign Data and AI Factory

EDB Postgres AI

Hybrid Management

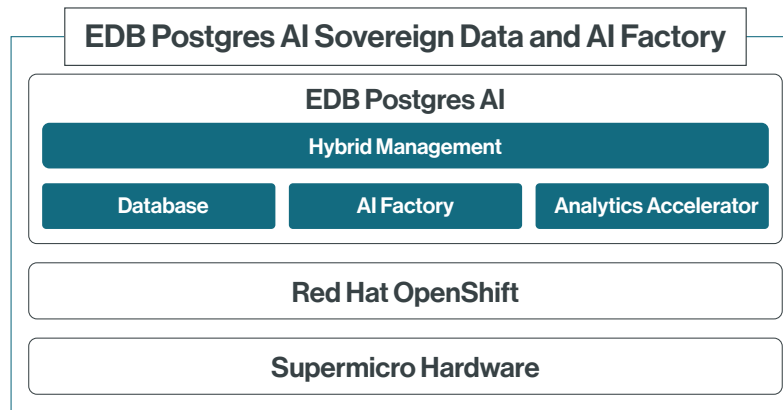| Database | AI Factory | Analytics Accelerator |

Red Hat OpenShift

Supermicro Hardware

Figure 1. Sovereign Data and AI Factory integrates EDB Postgres AI and its advanced hybrid management, database, AI, and analytics capabilities with best-in-class Supermicro servers, Red Hat OpenShift, and optional NVIDIA AI Enterprise and GPUs.

Key benefits

- **Turnkey data and AI sovereignty:** Leverage a single solution to fast-track your path to data and AI sovereignty and unlock agility, all in your own data center. Expert management helps you scale your data infrastructure for new demands and maximize consistency and control of your data in a hybrid world.

- **Maximize ROI:** Achieve 90% better value (price-performance) than cloud databases and six times faster transactional throughput than other Postgres solutions, even with database expertise or in-house tuning.

- **Get AI into production faster:** Bridge the gap between your proprietary data and your AI ambitions. With AI-ready data and local model serving, you can go from AI concept to production five times faster—in weeks instead of months.

- **Deploy always-on applications:** Continuous, uninterrupted operations across your sovereign environment accelerate customer-centric growth through data-driven applications such as chatbots and customer 360 solutions, unlocking the full potential of your customer data.

Key use cases

- **Sovereign AI:** Maintaining compliant, well-governed data while driving AI innovation is essential. Sovereign Data and AI Factory provides a full, unified platform to minimize data movement, enable continuous AI innovation, and ensure complete control over corporate data. Learn More »

- **Hybrid DBaaS:** The Sovereign Data and AI Factory enables the cloud DBaaS experience in your own data center. Combine the automation, scale, and simplicity of the cloud with on-premises control. With integrated support for diverse data requirements and a user-friendly interface, you accelerate development simply and securely. Learn More »

- **Legacy application modernization:** EDB Postgres AI enables modern data infrastructure for next-gen application development within a customer-controlled environment. Modernizing to EDB's hardened PostgreSQL reduces costs and improves performance, availability, and security while enabling developers to leverage diverse data models. Learn More »

- **Local model serving:** Regional AI governance requirements and global access to GPUs can block AI initiatives. The Sovereign Data and AI Factory comes preconfigured with NVIDIA GPUs, ensures all models and data are entirely contained in the system, and enables custom models for local languages and practices, delivering true data and AI sovereignty for your region.

Learn more

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EDB POSTGRES AI