aicas EdgeSuite

Easily create, deploy, and operate edge-to-cloud solutions

Enable and Accelerate Software-Defined Innovation

Autonomous Driving, Smart City, Industry 4.0: the digital future depends on trusted smart data, reliable software, and secure realtime internet connectivity. This is the essence aicas encompasses, with longstanding expertise in embedded and connected software markets: **aicas EdgeSuite brings intelligence to edge devices to unlock the value of data.**

Create, Deploy, and Operate Edge-to-Cloud at Scale

aicas EdgeSuite simplifies creating, deploying, and operating edge-to-cloud solutions. The family of products connects devices to the cloud. It provides developers and data analysts with controlled access to and management of logic and data. Manage the full lifecycle of large fleets of devices or different IoT edge systems with ONE comprehensive system that is open and unifies your fleet of devices into a single environment.

aicas EdgeSuite enables your device-to-cloud success with...

High security and full ownership of all data coming from and going to your edge devices.

Scalability and time savings through accelerated development and rapid over-the-air updates.

Easy coding with prebuilt core components and no-code functionality.

New revenue streams through subscription-based models and smart management of device data.

Reduced costs through simplicity, standardization, unification, and reusability.

Full lifecycle management of device software for quick responses to new demands and business models.

Rapid prototyping to satisfy new customer requirements instantly and to achieve competitive advantage.

aicas EdgeSuite is open to a variety of use cases in all industries, easily adaptable to changes in the future, and makes device management and software updates simple and reliable.

25,000,000

Trusted Partnership: Over 25 Million Connected Devices

aicas' software solutions connect more than 25 million embedded edge devices to the cloud. 17 million application over-the-air updates (OTAs) are rolled out annually. Large industrial companies as well as leading automotive manufacturers and institutions rely on aicas. Cloud hyperscalers such as AWS, Google, and RedHat, 5G mobile edge computing (MEC) providers such as Bell Canada and Vodafone, and technology leaders such as NXP, DMI, microchip, Bosch, and SiFive partner with aicas.

Resolve the Tension Between Continuously Rising Customer Expectations and the Need to Reduce Complexity and Costs

aicas continuously develops a variety of modular concepts and optimizes the use of industry standards to make your digital transformation successful and sustainable.

Computing & Software Abstraction

Simplification by abstraction is aicas' concept to control complex environments transparently. aicas' solutions ensure that applications are independent from hardware, platforms, and operating systems. They allow the unification and reuse of code across devices, hardware platforms, and multiple product lines—even for critical components running realtime operating systems (RTOS) and a broad range of CPUs.

Platformization & Scalability

aicas EdgeSuite unifies platforms and standards: manage on-device software platforms from different producers on a single platform. aicas simplifies centralized architectures as the key to openness, extensibility, and scalability. aicas' modern microservices-based software architecture enables the scaling of software across all device domains and across manufacturers, suppliers, and operators.

Over-the-Air Updates (OTA)

aicas provides over-the-air (OTA) software management, from micro to full updates for your devices. Modular, differential updates enable unlimited deployments on millions of devices—anytime and throughout the lifetime of your device. Modularity offers new ways to accelerate time to market. Scalable OTA updates of all devices in your environment are ensured.

Connect Device to Anything (D2X) Codeless

Easy coding with prebuilt core components and no-code functionality saves resources, while more users can use aicas EdgeSuite more efficiently: manage fleets of devices, provide the right data at the right place at the right time, and ensure full software life-cycle management. All without having to write a single line of code, integrity is increased and bugs in the code are eliminated.

The Core of aicas EdgeSuite

aicas EdgeSuite integrates three control layers.
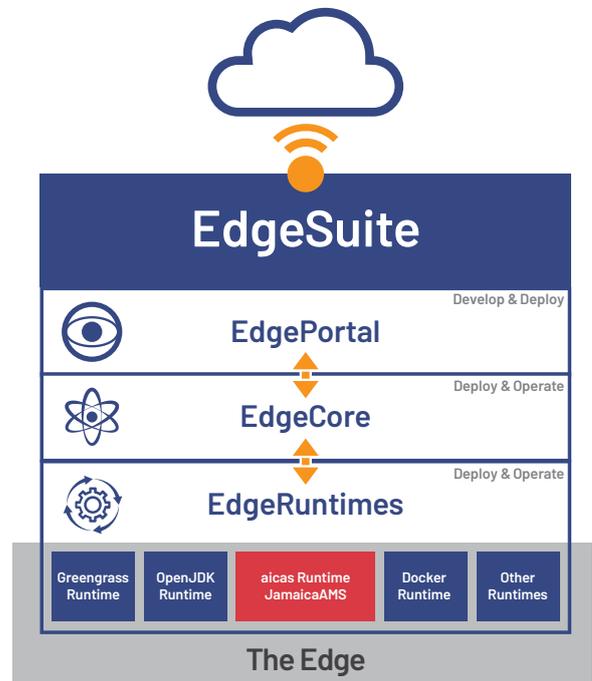
EdgePortal

With the portal to EdgeSuite you can control everything that happens in and around EdgeSuite with an easy-to-use graphical user interface. Manage your runtimes and the logic running on these runtimes or the broader system, all conveniently from your browser. Full CI/CD with built-in-automation reduces your efforts of your on-device development while ensuring easy updateability and upgradeability.

EdgeCore

Standards-based communication between all elements is controlled centrally by EdgeCore. It provides secure messaging, reliable data routing, easy configuration, transparent provisioning, and more.

EdgeRuntimes

Abstract and unify IoT applications from the underlying platforms. This enables you to place and run your logic and code on almost any hardware architecture and operating system, anywhere on the edge and on almost any target system. aicas EdgeSuite supports third-party standards-based runtimes such as AWS IoT Greengrass V2 and includes aicas JamaicaAMS that is based on aicas JamaicaVM, the Java-based deterministic runtime with low-latency, small footprint, and outstanding low processor utilization.

EdgeSuite

EdgePortal	Develop & Deploy
EdgeCore	Deploy & Operate
EdgeRuntimes	Deploy & Operate

| Greengrass Runtime | OpenJDK Runtime | aicas Runtime JamaicaAMS | Docker Runtime | Other Runtimes |

The Edge