



# ELEVATING IN-STORE EXPERIENCES WITH EDGE AI

How the right AI platform helps retailers innovate and drive revenue.

Traditional retail is more competitive than ever. As AI advances, retailers have the opportunity to unlock new efficiencies and incredible shopper experiences. But success isn't guaranteed. It requires enterprise-grade edge systems with rack-simplicity. That's where Supermicro and AMD come in.

**91%** of retail IT leaders are prioritizing AI implementation by 2026.<sup>1</sup>

**2/3** of consumers say AI makes shopping more convenient.<sup>2</sup>

**\$112B** is lost to retail shrinkage; AI-powered loss prevention offers ROI within 3 months.<sup>3</sup>

Supermicro retail AI solutions, powered by 5<sup>th</sup> Gen AMD EPYC™ processors, are designed to accelerate AI with advanced performance, flexibility, and efficiency across the most demanding in-store environments.



AS-1115S-FDWTRT



AS-2115HE-FTN



AS-3015MR-H5TNR

## MODERNIZING IN-STORE EXPERIENCES & OPERATIONS

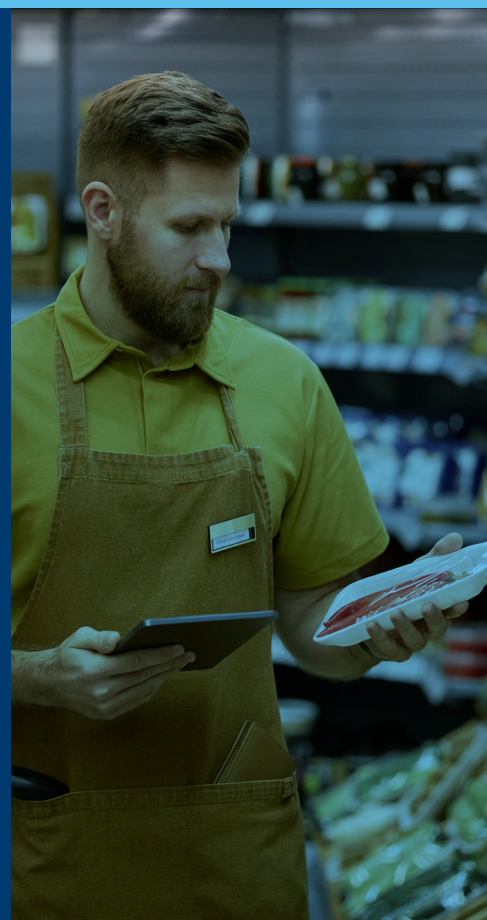
Supermicro servers with 5<sup>th</sup> Gen AMD EPYC™ processors enable the industry's top AI software partners to tackle common retail challenges.

**Hotspot analysis:** AI tracks customer movements to help retailers design smarter layouts so customers enjoy a smoother, more personalized in-store experience

**Retail loss prevention:** AI systems detect suspicious behavior in real time, reducing losses for retailers while creating a safer experience for shoppers

**Frictionless checkouts:** AI-driven carts recognize items and support payments—reducing delays and making checkout hassle-free

**Inventory management:** Computer vision monitors shelves to predict demand and prevent stockouts, keeping customer favorites in stock and maximizing sales



Supernano servers with AMD EPYC™ CPUs are right-sized for edge AI applications, so retailers can transform customer loyalty, boost store efficiency, and drive success.



## PERFORMANCE: PROTECT MARGINS WITH REAL-TIME ANALYSIS

**High core counts, ample processing power & large memory bandwidth** for AI inference

Rapid computer vision model training & deployment with **GPU-accelerated systems**

Complete solutions ship pre-validated, ready for **faster rollout to new locations**

**'Zen 5' architecture** optimizes both in-store technology and back-end infrastructure



## FLEXIBILITY: MEET DEMANDS OF DIVERSE ENVIRONMENTS

**Compact systems with computational power** to support AI in different retail environments

**Open AI ecosystem with AMD ROCm™** open software and a foundation of heterogeneous portability

**Multilayered, built-in security** with AMD Infinity Guard to help prevent threats and keep data safe<sup>4</sup>

**Unified computing platform** with x86 software compatibility for seamless integration



## EFFICIENCY: REDUCE COSTS AND STAY COMPETITIVE

**Industry-leading air- and liquid-cooled systems** improve power efficiency to cut costs and meet sustainability goals

**Virtualization & consolidation** to support multiple workloads on one system, improving ROI

**Chip-level power intelligence** enables AMD EPYC™ CPUs to deliver outstanding power performance

**Purpose-built silicon design** of AMD EPYC™ 5th Gen processors deliver accelerated AI capabilities for speed and efficiency



## READY TO THRIVE WITH AI-POWERED RETAIL?

Explore how Supermicro retail AI solutions, from the compact 1U edge server to the multi-GPU 2U high-performance platform, can transform your retail operations.

LEARN MORE

For more information:



### SOURCES:

<sup>1</sup> <https://www.gartner.com/en/industries/retail-digital-transformation>

<sup>2</sup> <https://www.businesswire.com/news/home/20250225425683/en/New-Everseen-Report-Retailers-and-Consumers-Weigh-in-on-the-Future-of-Retail-AI>

<sup>3</sup> <https://nrf.com/research/national-retail-security-survey-2023>

<sup>4</sup> AMD Infinity Guard features vary by EPYC Processor generations. Infinity Guard security features on AMD EPYC™ processors must be enabled by server OEMs and/or cloud service providers to operate. Learn more about Infinity Guard at <https://www.amd.com/en/technologies/infinity-guard>