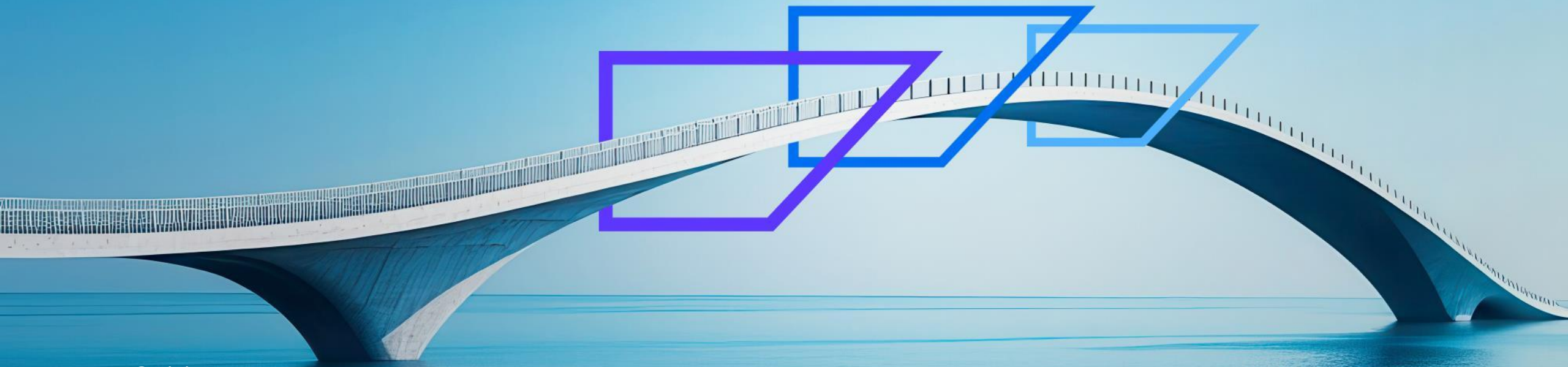
Orchestrating the Agentic Enterprise



Jesper Schleimann

AI Officer EMEA

“The next wave of adoption will be won not by the flashiest models, but by the systems that *learn* and *remember* and/or by systems that are *custom built for a specific process*.” **MIT Aug’25**

AI VALUE = INSIGHTS + CONTEXT + ACTION

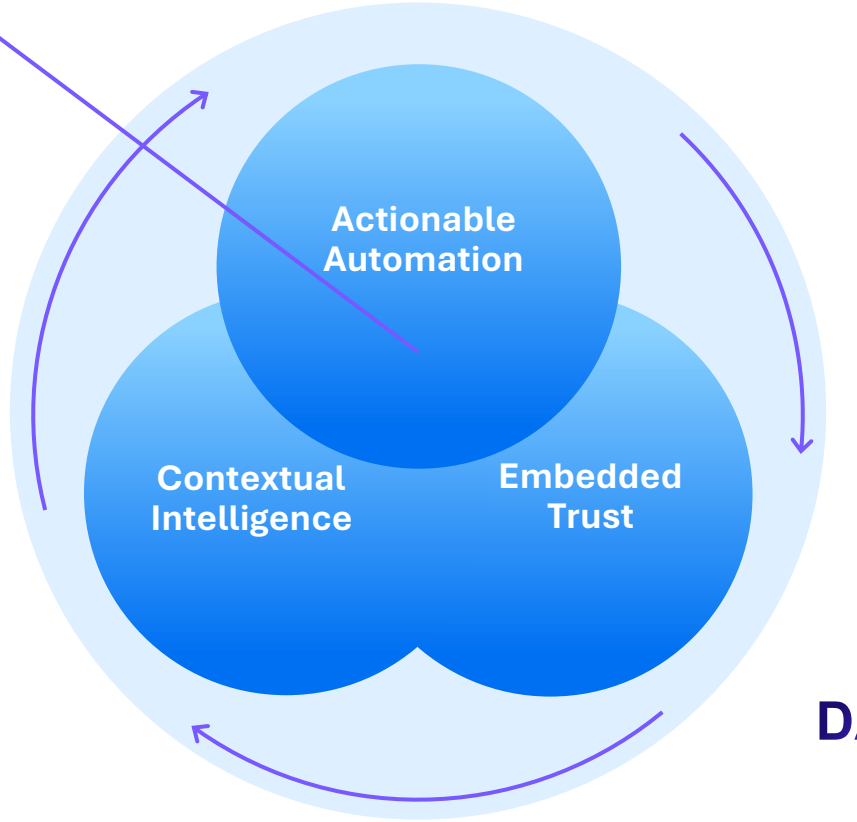
The SAP AI Flywheel

The secure, scalable operating system for Business AI

Trust, compliance, & security
Authorizations & Identity
Orchestration & governance

PROCESS

Process DNA
77% of global business data
ERP & LoB Solutions



AI

Integrated end-2-end backbone
290+ AI use-cases -> 400+ EOY
1.800 Joule Skills -> 40 Agents EOY

DATA

Valuable business data
SAP Knowledge Graph
SAP Business Data Cloud

400

Use cases

by end of 2025

More skills for Joule

300+
new skills

Over 1,800
capabilities in total

Everywhere, everything

40+ New Joule Agents

- Dispute Resolution Agent — Finance
- Expense Report — Spend
- Shop Floor Supervisor Agent — Supply Chain
- Performance — HR

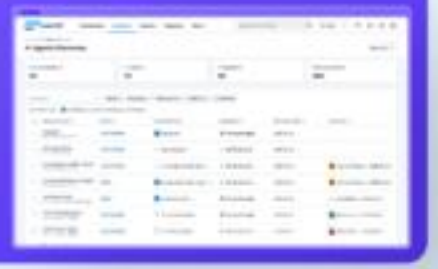
Joule Agents

Reason + Act

AI Agent Hub

SAP LeanIX

- Joule Agents
- Custom agents
- 3rd party agents



AI Foundation

Operating system
for SAP Business AI

Prompt Optimizer

making prompt
engineering
a thing of the past

Introducing

Benchmark engineering

Joule Agents

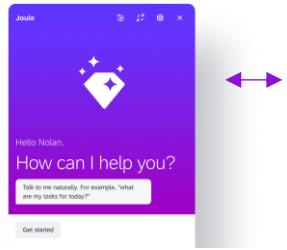
extending into
the physical world

NEURA | SAP | NVIDIA

Today: Empowering Your organization

The best AI is invisible

Copilot



1800+

Skills supported by Joule

290+

Generative AI use cases available today, 400+ by end ‘25

Service

Document Scanning
Invoices
...

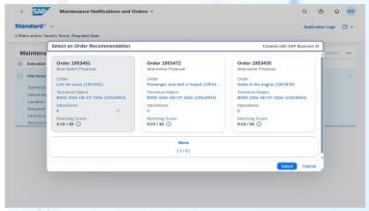
Procurement

Sourcing Event
Market Strength
....

...

Supply Chain

AI-Assisted Planning
...
...



Finance

AI Assisted closing
...

HR

AI powered Self service
CV Matching
...

Analytics

AI Assisted Analytics
...

To Dos

Procurement Purchase Requisition
Kevin Hudemann — 1 week ago

Replacement Laptop

2,450.00 EUR

Approve | Deny

Expense Report Approval
Stephan Aßmus — 1 week ago

Travel to Munich

843.37 EUR

Approve | Send Back

Time Off Requests
Carmen Rannefeld — 1 week ago

Vacation
Jul 26 – 28, 2023

3 days

Approve | Decline

Time Off Requests
Carmen Rannefeld — 1 week ago

Vacation
Aug 4, 2023

1 day

Approve | Decline

View More | SAP Task Center

Insights

Incoming Sales Orders
By Month | EUR

289.1 K

Target	Deviation
266.1K	8.6%

4 Months

Open Purchase Orders 4 of 35

4500000045	2 months ago
In Approval	2.5K EUR
4500000033	2 months ago

SAP AI

Sourcing event creation with AI

Overview | Liquidity & Cash | Accounts Receivables | Accounts Payable | Inventory

Working Capital Dashboard - Accounts Receivables

Days Sales Outstanding (DSO)
71 +19
Last 12 Months to Key Date (Δ Last Year %)

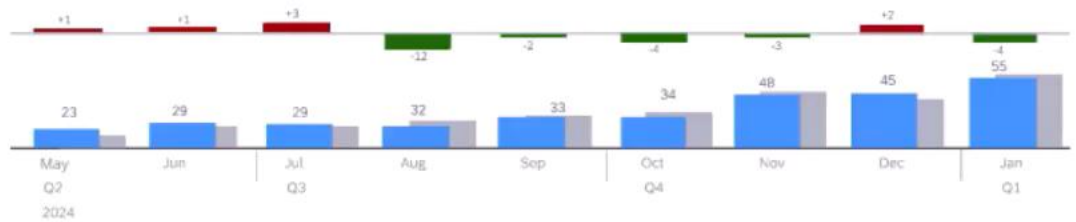
Total Receivables
517.6
On Key Date

Overdue Receivables
306.1
On Key Date

Future Receivables
211.5
On Key Date

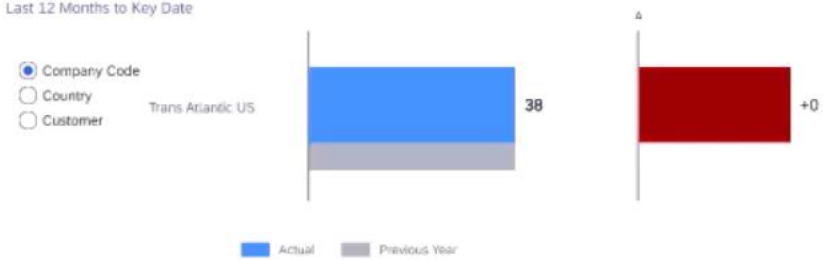
Assets in **Million EUR (Group Currency)**

DSO per Time for Actual and Previous Year



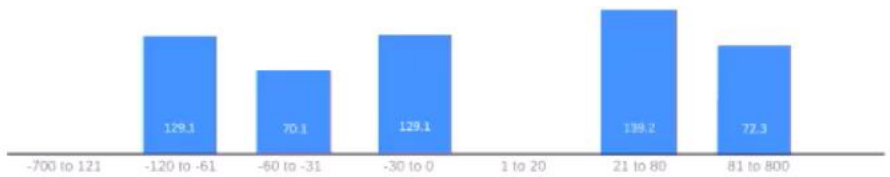
DSO per Company Code for Actual and Previous Year

Last 12 Months to Key Date



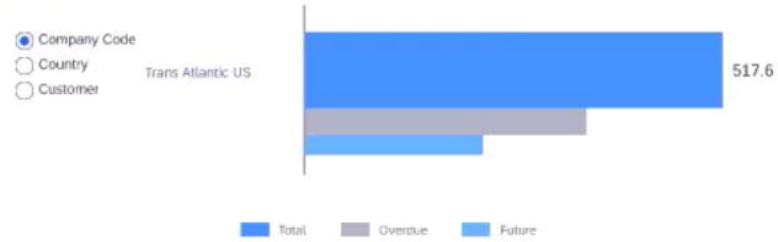
Total Receivables per Due Period

On Key Date



Total Receivables Per Company Name

On Key Date



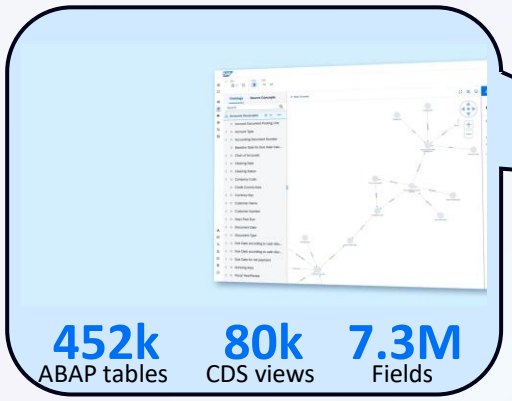
Total Receivables by Fiscal Period

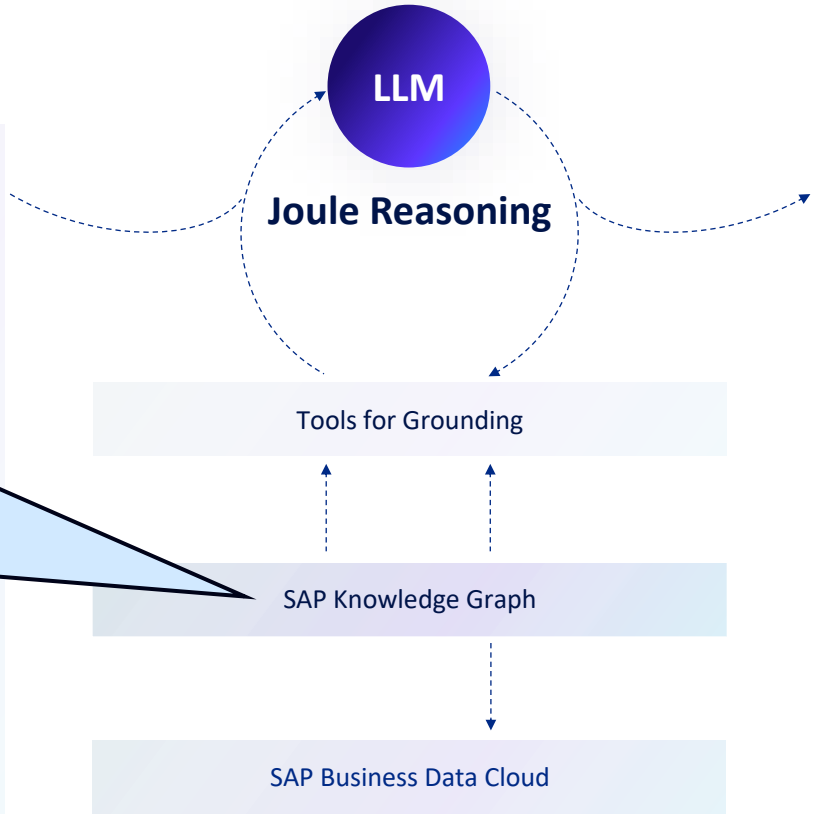
Over due by Country

Without trust, AI is a toy

SAP Business AI see the big picture & makes relevant connections to act reliably

Resolve this dispute





The customer is disputing the billing period.

I've verified the billing start date on the invoice does not match the delivery date on the shipping receipt.

The invoice should be reissued with an adjusted billing period.

Evaluation

LLM alone

30-70% Hallucination

17-30% Recall

LLM + KG

0% Hallucination

30-70% Recall

HOMO SAPIENS

The three laws of Self-Evolving AI Agents

I ENDURE

Self-evolving AI agents must maintain safety and stability during any modification.
This forms the primary constraint on all other forms of adaptation.

II EXCEL

Subject to the First Law, self-evolving AI agents must preserve or enhance existing task performance

III EVOLVE

Subject to the First and Second Law, self-evolving AI agents must be able to autonomously optimize their internal components in response to changing tasks, environments, or resources.

SAP's Vision

SAP's vision is to be the undisputed leader in enterprise Agentic AI, empowering every SAP customer to achieve **unprecedented levels of intelligent automation** & **operational excellence.**

Mission 1

Empower Businesses with Pre-built Agents

- Suite of rapidly deployed pre-built agents

Mission 2

Democratize Agent Development for the Enterprise

- Expanding Autonomy, Customization & Control

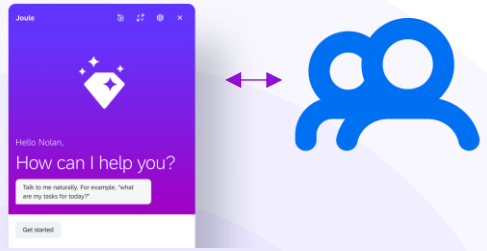
Mission 3

Foster a Thriving Agentic Ecosystem

- Agentic Business Transformation, Next Level Business Grounding & Versatile Inter-Agent Collaboration

Tomorrow: Your AI-First Enterprise

Faster decisions
Less hierarchy
Higher productivity
New services



Sales Agent | Procurement Agent | Supply Chain Agent | Finance Agent | HR Agent | Analytical Agent

Sales

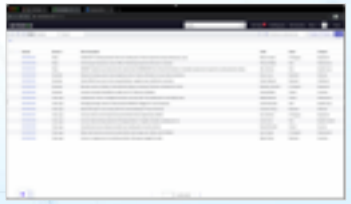
AI Shopping Assistant
Visual Search
Service Agent
...

Procurement

Sourcing Event
Market Strength
....
...

Supply Chain

AI-Assisted Planning
...
...



Finance

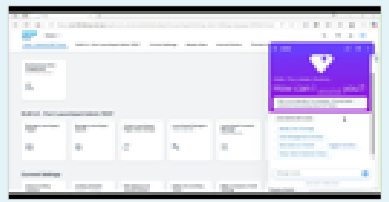
AI Assisted closing
...

HR

AI powered Self service
CV Matching
...

Analytics

AI Assisted Analytics
...



Tuesday, May 20th

Hi Philipp!

Add Content | Recap | My Home Settings

To Dos

Tasks (4) | Situations (2)

Unprocessed Accrual Posting

1 hour ago

Utilities (Water) - G/L Account: 652000 - Company Code: 1010 - Period: 05 /2025

Unprocessed Accrual Posting

2 hours ago

Warranty - G/L Account: 65008600 - Company Code: 1010 - Period: 05 /2025

News

Intelligent Street Lights Power the Future of Modern Cities

SAP News

May 20, 2025

Read

Pages

- Periodic Activities
- Journal Entries
- Tax Declaration
- My Inbox
- Reporting & Chart of Accounts

Apps

Favorites | Recently Used | Requently Used | More

- Post General Journal Entries
- Display Line Items in General Ledger
- Manage Journal Entries
- Clear G/L Accounts — Manual Clearing
- Manage G/L Account Master Data
- Balance Sheet/Income Statement
- Display Line Item Entry
- Manage My Timesheet
- My Inbox — All Items
- My Inbox — Expert Mode (All Items)

Mail - Will Riker | ServiceNow – N... | Business Plan – ...

servicenow.com/tickets/

servicenow

Search | My Tasks 2 | My Requests | My Favorites | More | WR | Tours

Users | Number | Search | Actions on selected rows | Update | Resolve | New

All

Number	Opened	Short description	Caller	Status	Category
INC0001037	Today	Forklift #27 is leaking hydraulic fluid near loading dock. Needs inspection during maintenance cycle.	Bessie Cooper	In Progress	Equipment
INC0001038	Today	Cold storage temperature sensor offline. Monitoring impacted until sensor is restored.	Theresa Webb	New	Maintenance
INC0001039	Today	URGENT: Quality issue detected with material batch #200001050 from PowerCell Solutions. Immediate replacement required to avoid production delays.	Alex Johnson	New	Quality Issue
INC0001040	Yesterday	Shipment tracking system shows duplicate entries. Needs verification to ensure data consistency.	Devon Lane	Resolved	Software
INC0001041	Yesterday	Order #87645 was sent to the wrong distributor. Logistics team notified for correction.	Kristin Watson	Resolved	Fulfillment
INC0001042	Yesterday	Barcode scanner at Station 3 intermittently failing to read tags. Technician scheduled for review.	Brooklyn Simmons	In Progress	Equipment
INC0001043	Yesterday	Inventory mismatch identified on pallet rack D-5. Recount scheduled.	Annette Black	Closed	Inventory
INC0001044	2 days ago	Loading dock 2 door is misaligned and does not close fully. To be addressed in next facility check.	Ralph Edwards	Closed	Maintenance
INC0001045	2 days ago	Packaging damage noted on inbound batch #X98124. Flagged for visual inspection.	Leslie Alexander	New	Quality Issue
INC0001046	2 days ago	Daily shift report is not syncing with the central dashboard. IT team informed.	Courtney Henry	Resolved	Software
INC0001047	2 days ago	Conveyor belt at Line B experiencing intermittent halts. Engineering notified.	Guy Hawkins	In Progress	Equipment
INC0001048	2 days ago	Incorrect label printing reported at Packaging Station 4. Supplies reloaded, awaiting test run.	Jacob Jones	New	Quality Control
INC0001048	3 days ago	Unauthorized access attempt recorded near loading dock. Security alerted.	Ronald Richards	Closed	Security
INC0001049	3 days ago	Water leak found near electrical outlet behind cold storage unit. Safety check initiated.	Jane Cooper	In Progress	Maintenance
INC0001050	3 days ago	Cartons in staging area not matching manifest. Discrepancy logged for audit.	Albert Flores	Resolved	Inventory

1 to 20 of 622

Planned innovation
Subject to change

2025 Roadmap

AI Agents - planned across CX, Finance, HCM, Spend, Supply Chain, Industry

CX

- Sale and Service Case Classification Agent
- Sales and Service Q&A Agent
- Service Knowledge Creation Agent
- Sales Quote Creation Agent
- Commerce Shopping Agent
- Commerce Digital Service Agent
- Commerce Catalog Optimization Agent

Finance

- Dispute Resolution Agent
- Accounts Receivable Agent
- Accounting Accruals Agent
- International Trade Classification Agent
- Cash Management Agent

HCM

- Performance and Goals Agent
- HR Service Agent
- People Intelligence Agent
- Career and Talent Development Agent

Spend

- Sourcing Agent
- Bid Analysis Agent
- Booking Agent
- Meeting Location Planner Agent
- Expense Report Validation Agent
- Receipt Analysis Agent

Supply Chain

- Field Service Dispatcher Agent
- Maintenance Planner Agent
- Shop Floor Supervisor Agent
- Production Planning and Operations Agent
- Change Record Management Agent
- Supplier Onboarding Agent

Cross Suite

- Industry
  Utilities Customer Self-Service Agent
- Business Transformation
  Process Content Recommender Agent
- Business Transformation
  Workspace Administration Agent

Generally Available | Beta/EAC | Planned for H2 2025 | Planned for H1 2026

© SAP SE

Role

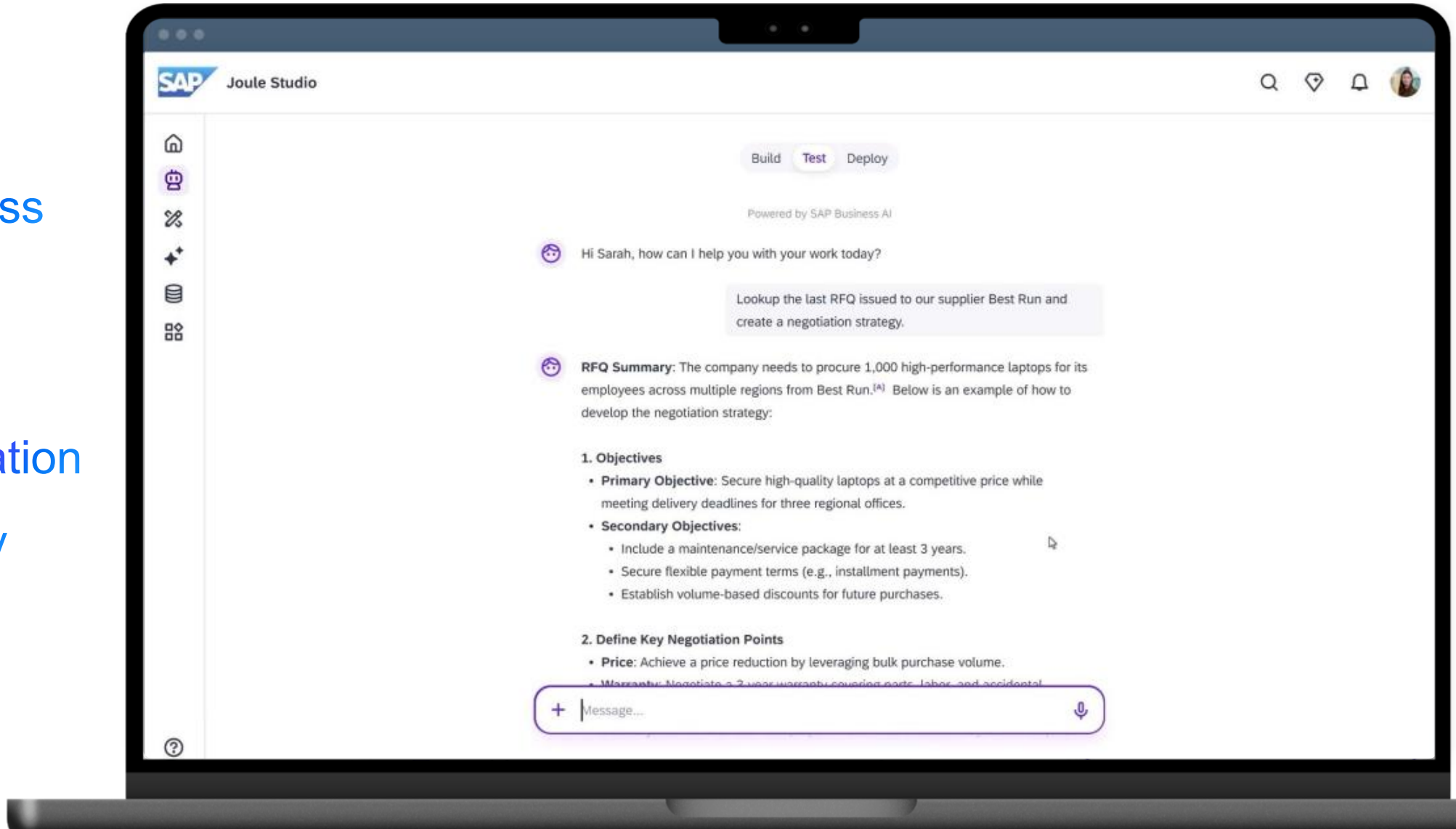
Business Process

Relevant Data

Right Skills

Agent Collaboration

Test and Deploy



Scaling Intelligence

From Command to Coordination

1 : 5

Scaling Intelligence

From Command to Coordination

1 : 100

Agentic Orchestration

When decentralizing actions, retain trust and truth centrally.

From Command to Coordination

Potential Externalizations

- Productivity & Domain specific agents
- Ecosystem AI apps & experimental

Trusted Extensions

- Certified solutions
- Industry compliance add-ons

Agentic Mesh

Retain

- Process semantics (Language)
- Authorizations & identity (Agency)
- Orchestration & governance (Rules)
- Trusted transactional data (Memory)

Embed

- AI copilots & skills across applications
- Embedded AI use cases

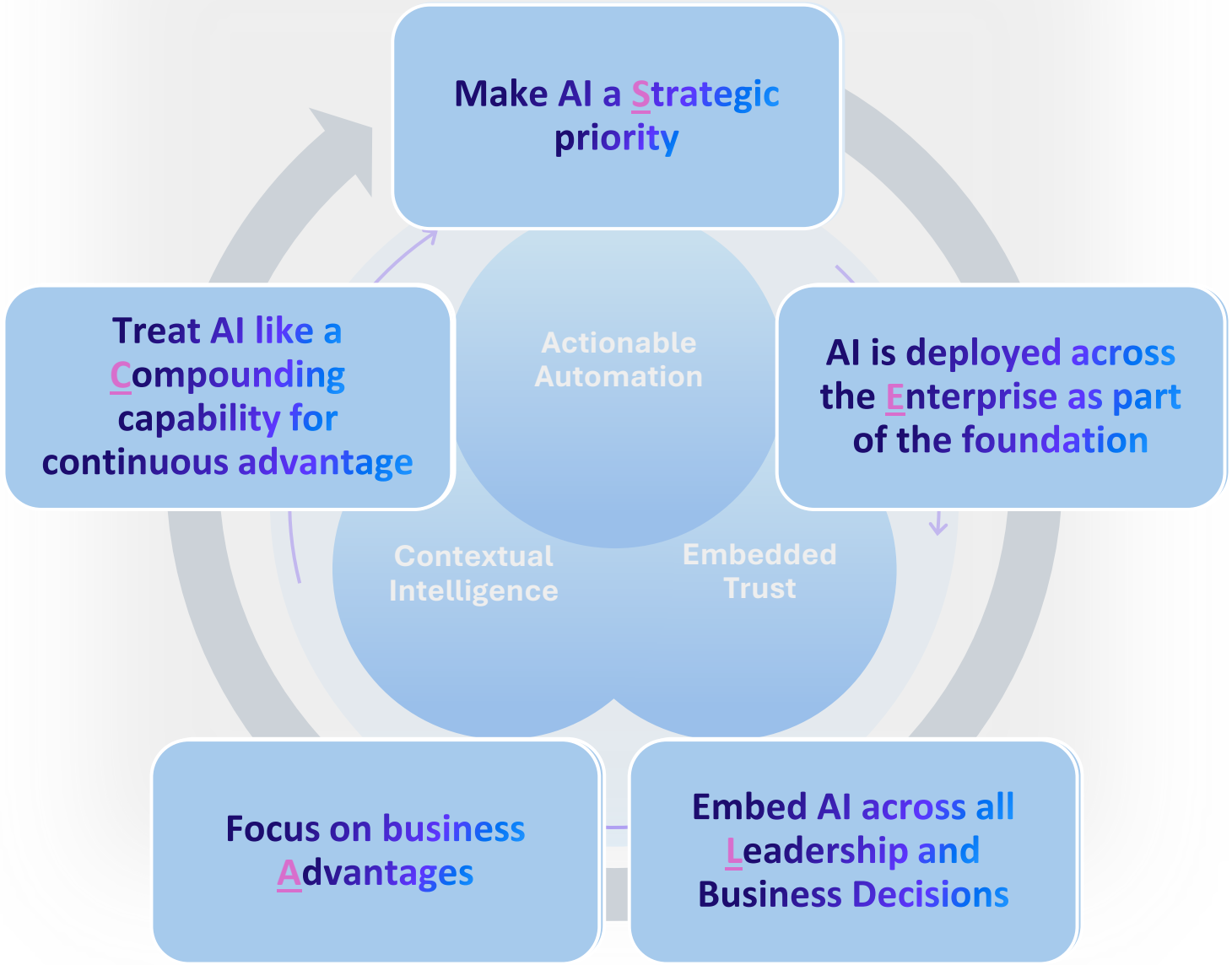
Core Orchestration

Joule Control Tower

Monitoring I Configuring I Responsibility I Notifications

The AI-First Enterprise

SCALE to compete in the Age of Intelligence



Thank you

Jesper Schleimann

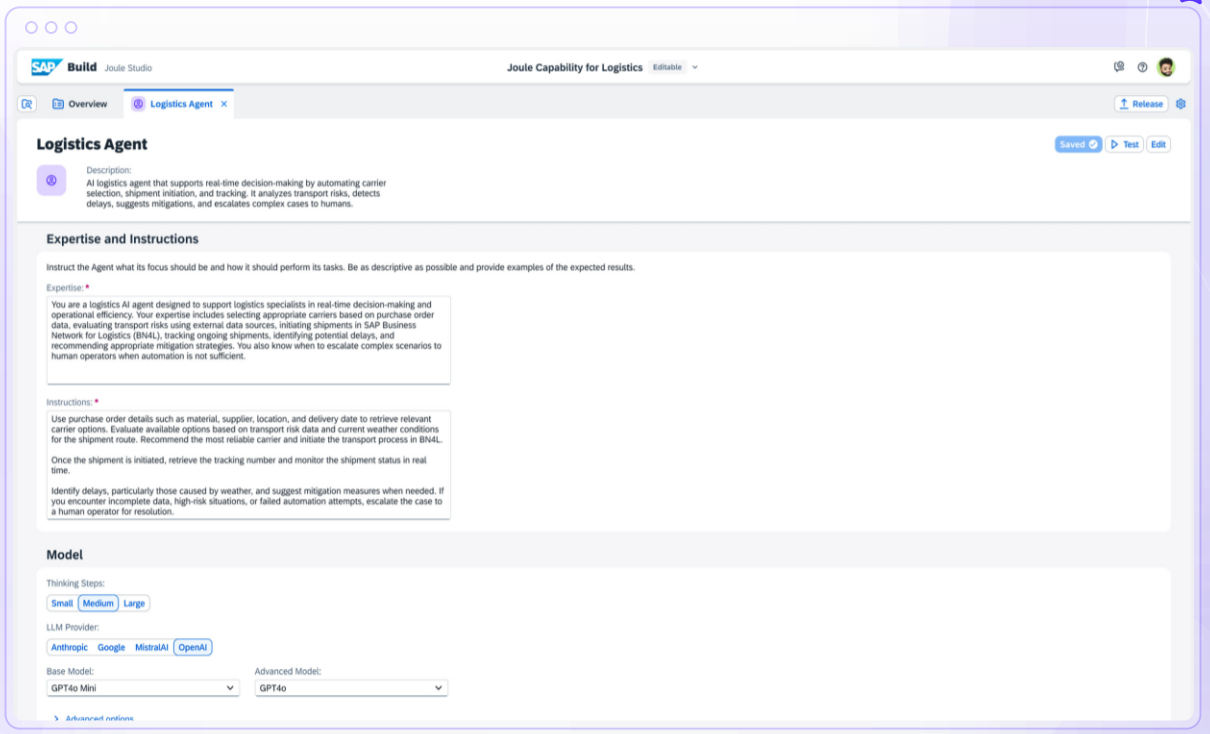
AI Officer, SAP EMEA

SAP Business AI Use Cases

Planned for Q4 2025

Coming soon

Joule Studio: create custom enterprise-ready agents



Deep grounding in business processes

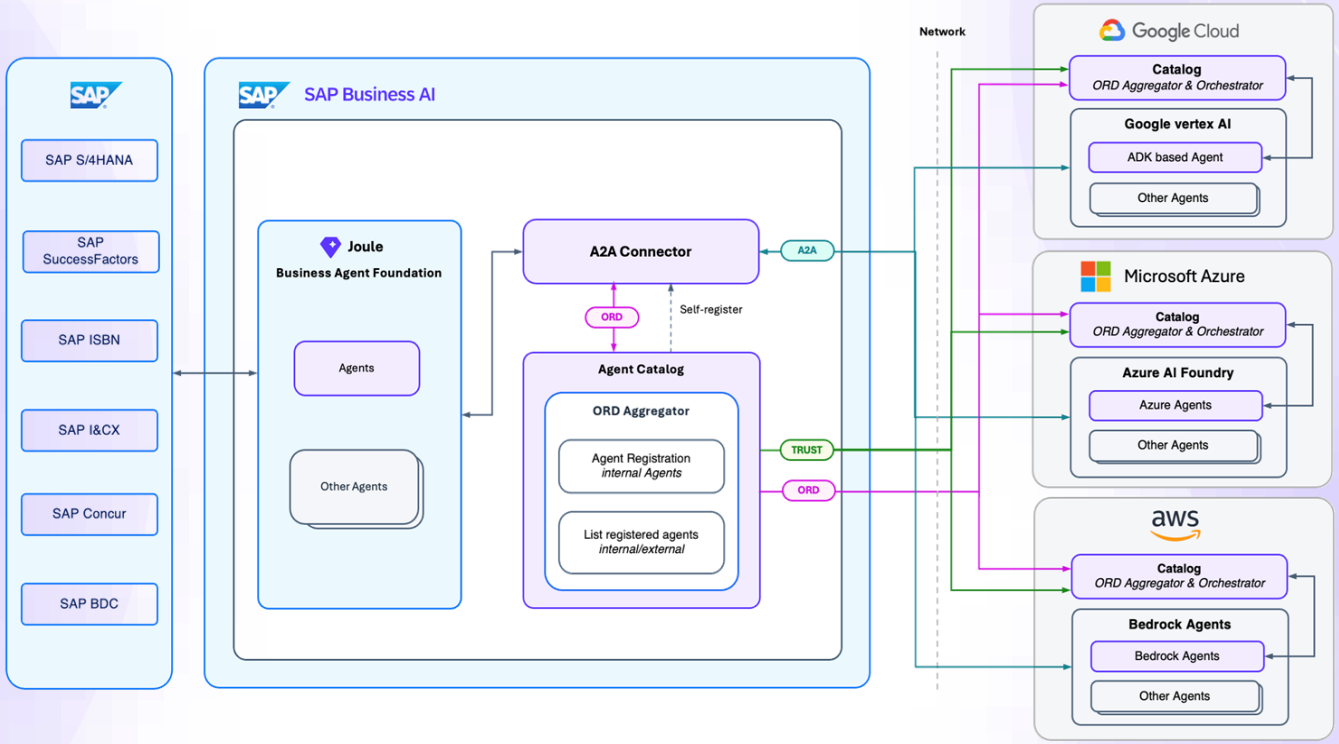
An open and extensible framework

Built-in security and compliance

Planned for H1 2026

Coming soon

Agent2Agent: unlocking secure, open collaboration across intelligence platforms



Gemini

Apple Intelligence

Copilot

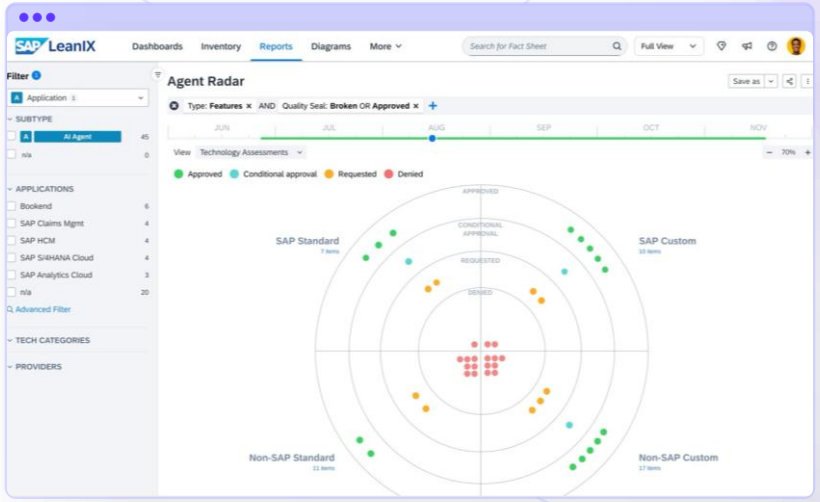
Planned for Q4 2025

Coming soon

AI Agent Hub: discover, manage, and govern agents for business impact at scale

Third-party agents

Joule Agents



Custom agents built in Joule Studio