

ASAPIO enables SAP Systems for Event Messaging with Solace PubSub+

Product Overview | May 2021



SAP® Certified
Powered by SAP NetWeaver®



ASAPIO – SAP® Partner for Cloud Integration and Procurement Solutions

Experts in integration of cloud systems, SAP procurement solutions and technology.

Founded in 2003 and managed by three former SAP employees, we are today an SAP Silver partner with a growing team of consultants and software developers. We operate worldwide, with headquarters in Munich, offices in Hamburg and Stuttgart, and our own nearshore center.

ASAPIO Integration Add-on

Native connectivity for SAP systems

ASAPIO Consulting

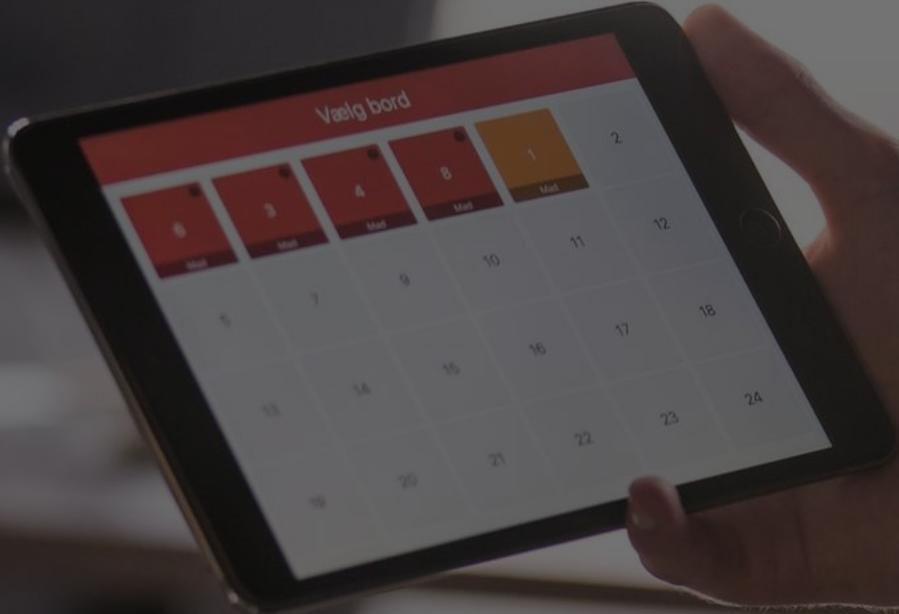
Strategy and implementation services





Companies are becoming Software-defined

Online Shops, Digital Manufacturing,
Real-time Logistics, Personalized Aftersales



...and this requires data from SAP systems!

Top requirements for SAP system integration

Scalable and fast to implement, because Digitalisation brings a growing number of interfaces

Time-to-market is crucial, and building custom SAP interfaces always caused significant effort

Flexibility is a requirement, because IT landscapes and business needs will change

Strategic solutions are necessary, aligned with customers and SAP's product strategy

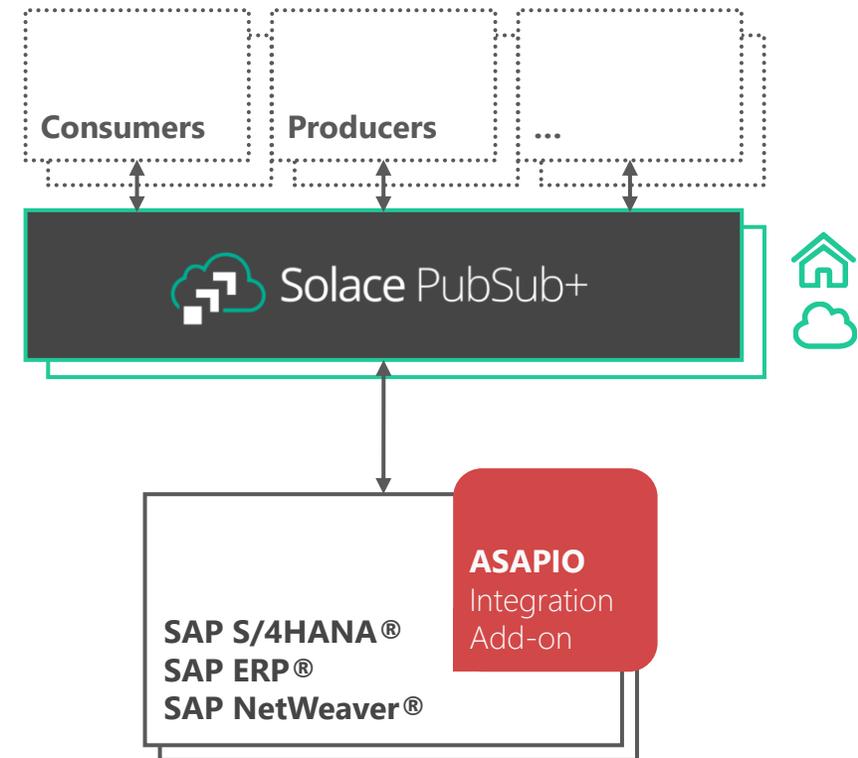
Universal connectivity approaches are required, to reduce overall complexity and efforts in operation



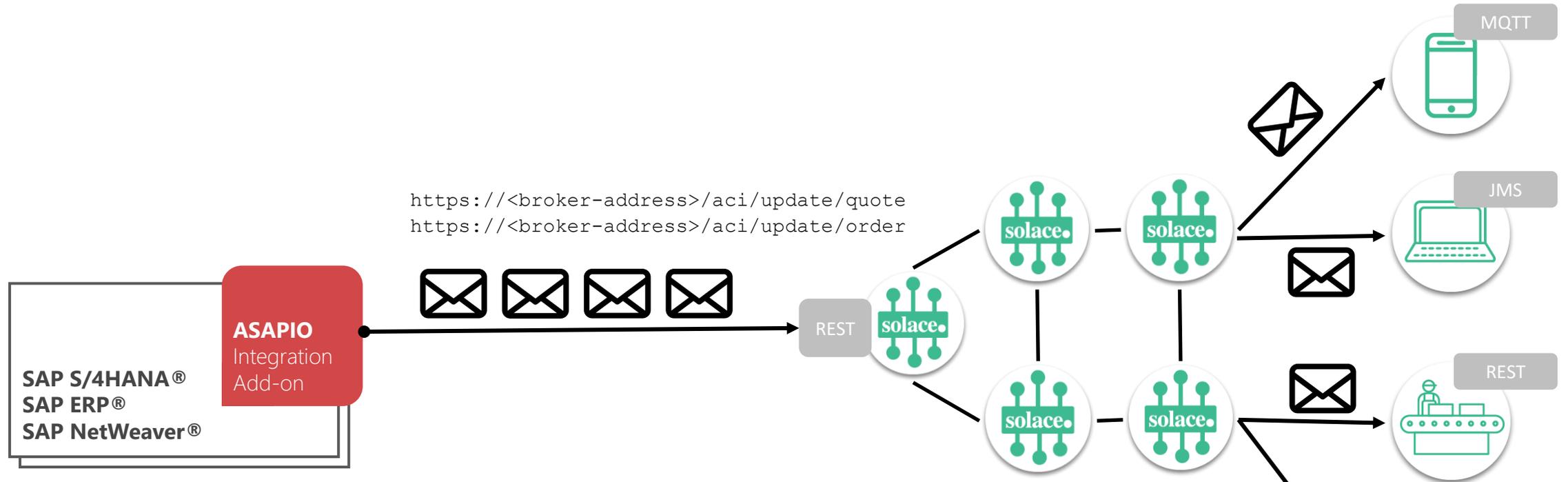
ASAPIO Connector for Solace® PubSub+

Native connectivity for SAP® systems to Solace PubSub+

- ✓ One solution for any SAP connectivity
- ✓ Real-time events + mass data transfer
- ✓ Outbound + inbound messaging
- ✓ Change Data Capture for SAP applications
- ✓ Code-less + custom code
- ✓ Certified + available from Solace



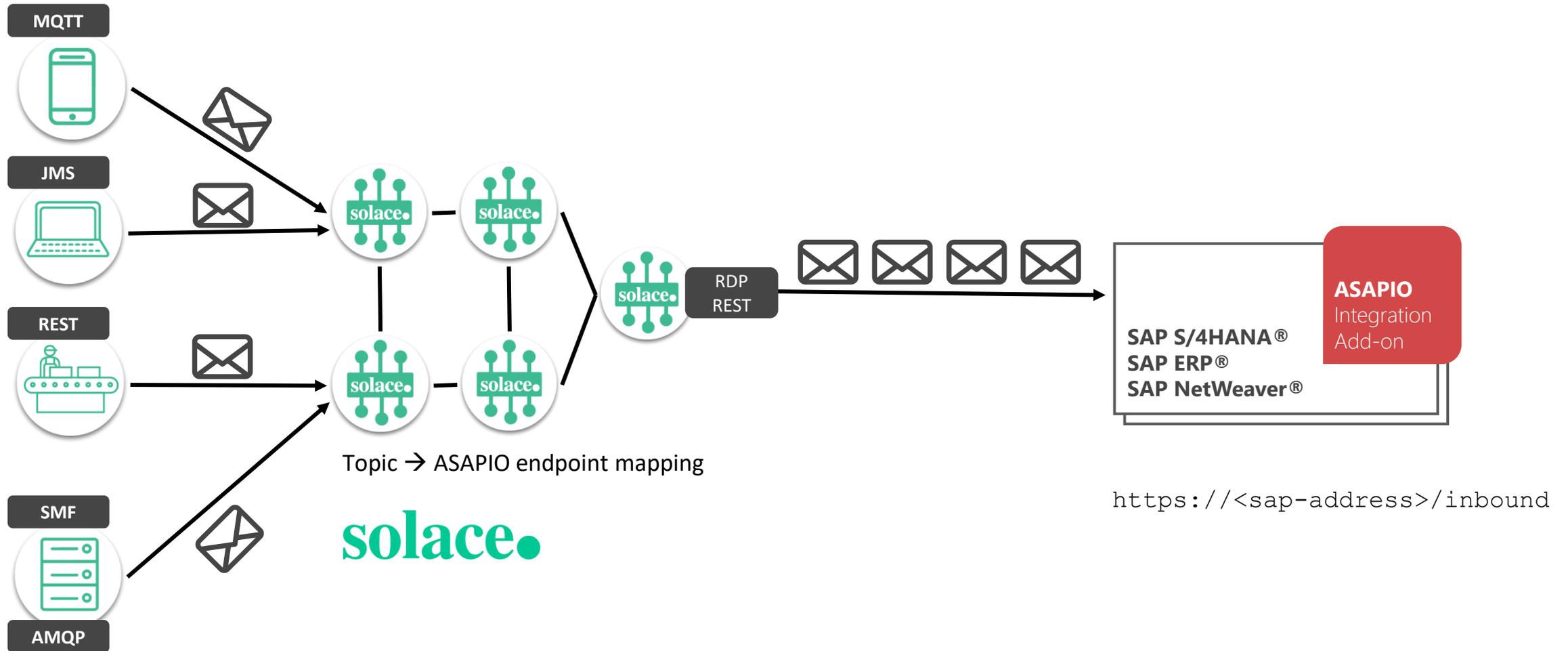
Outbound event processing with Solace & ASAPIO



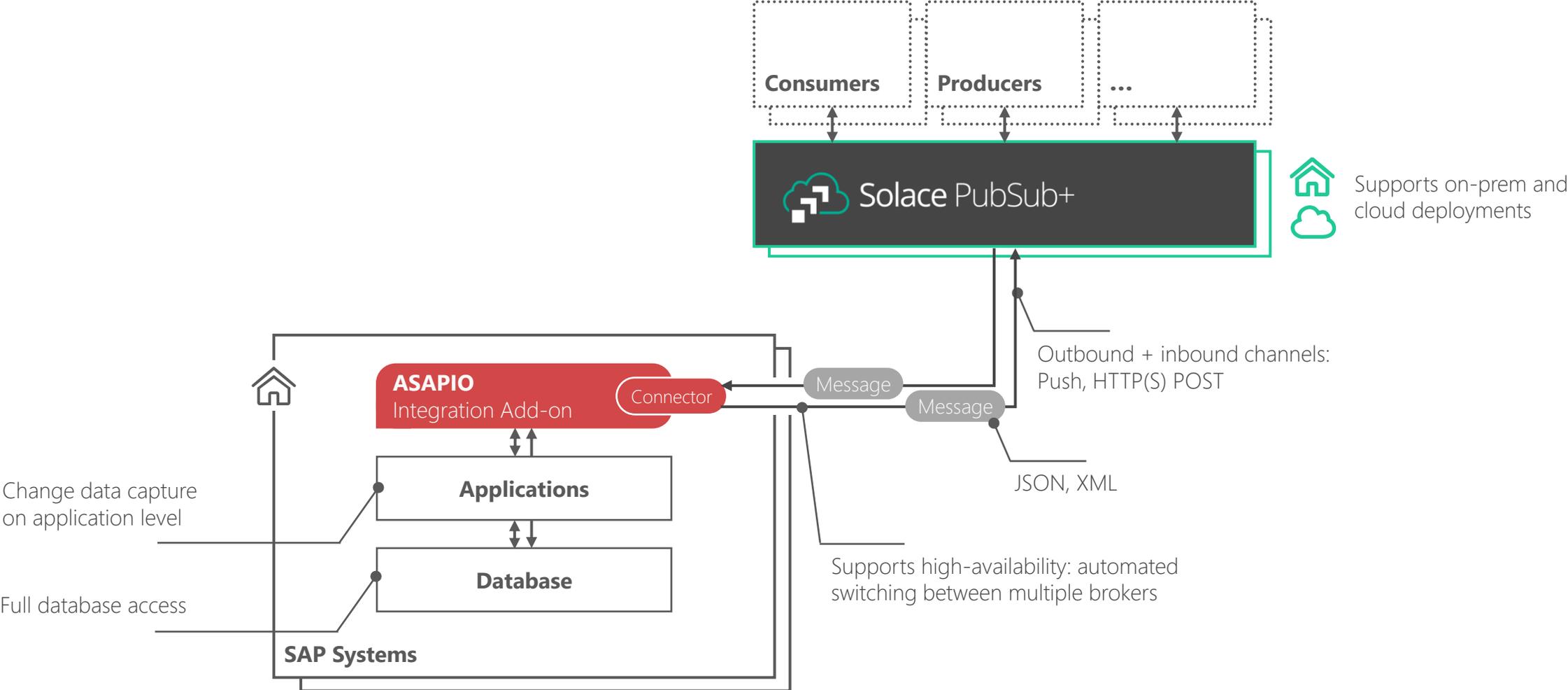
REST Endpoint → Solace Broker Topic Mappings

SAP-ACI Endpoint	Topic
<a href="https://<broker-address>/aci/update/salesorder">https://<broker-address>/aci/update/salesorder	aci/update/salesorder
<a href="https://<broker-address>/aci/update/quote">https://<broker-address>/aci/update/quote	aci/update/quote
<a href="https://<broker-address>/aci/update/warehouse">https://<broker-address>/aci/update/warehouse	aci/update/warehouse

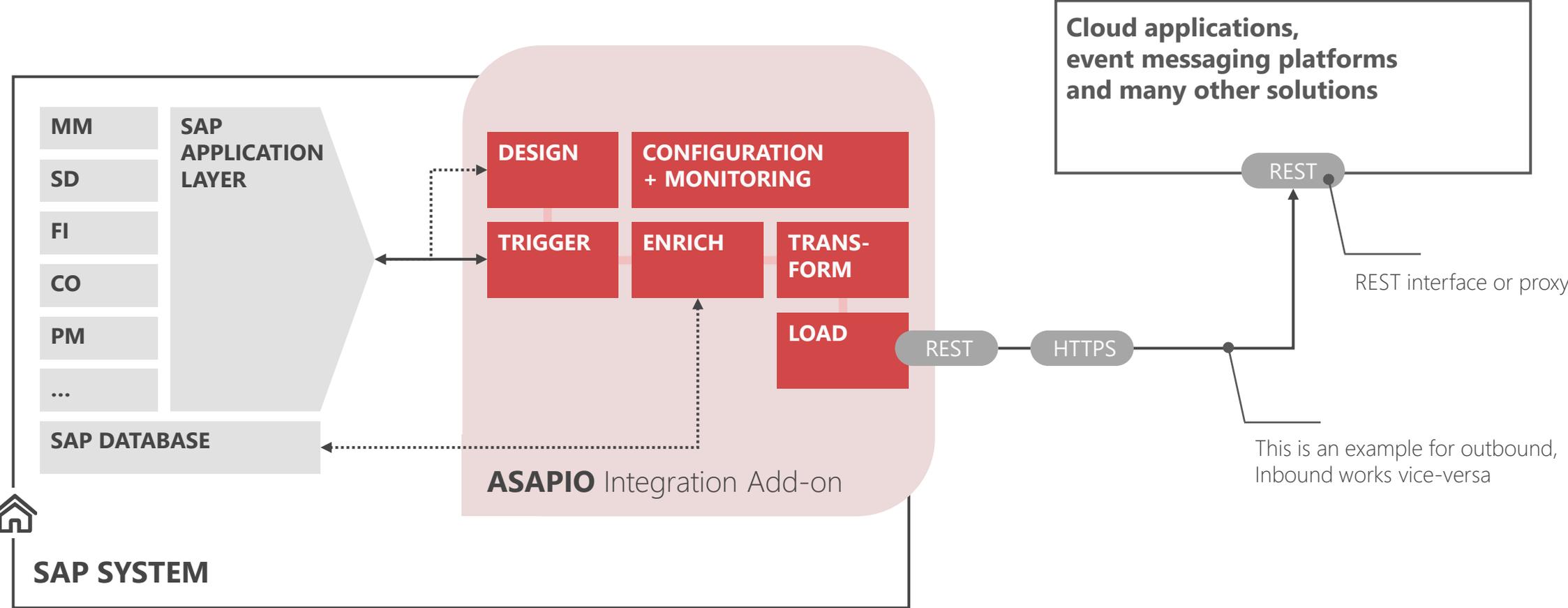
Inbound event processing with Solace & ASAPIO



ASAPIO Connector for Solace® PubSub+



Architecture / How does it work?



Why use ASAPIO for SAP integration?

Our customers choose ASAPIO Integration Add-on because it is fast to implement and delivers high performance. It enables SAP systems for both event-driven and mass data transfer, supporting inbound and outbound communication. The Add-on provides Change Data Capture (CDC) on SAP application layer, which has significant advantages over middleware or database-only approaches.

80%
less time

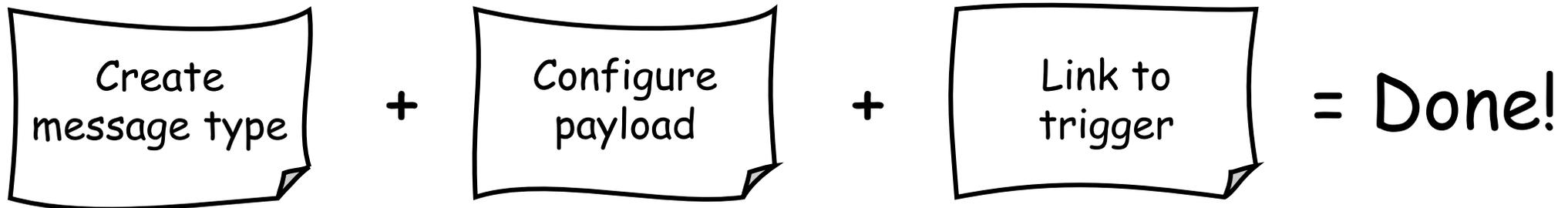
“With the help of ASAPIO’s integration solution, we could reduce our interface development and deployment time by ~80%. It is easy to configure and operate, because it leverages proven SAP standard technology.”

— Technology Architect, Oil & Gas Customer (US)

How to configure an outbound event

Just 3 steps to send out messages, based on e. g. SAP business object changes:

1. Create a message type for any configured outbound channel
2. Configure the payload (message content) e. g. using Message Builder, Event Notifications or custom code
3. Link the trigger to the message type (business object event, scheduled job or custom trigger)



Features for code-less message configuration

ASAPIO delivers built-in features for code-less creation of events.

- ✓ **Event Notification** handler can automatically generate events from SAP business object events, with event name, SAP object type and id. Compatible with SAP S/4HANA event notifications.
- ✓ **Message Builder** generates message payloads automatically, based on tables and fields which can be configured in database views. The handler creates a structured JSON message body and can be used in both event-driven and batch-mode transfers.

Event Notification

Event name,
SAP business object type,
SAP object ID

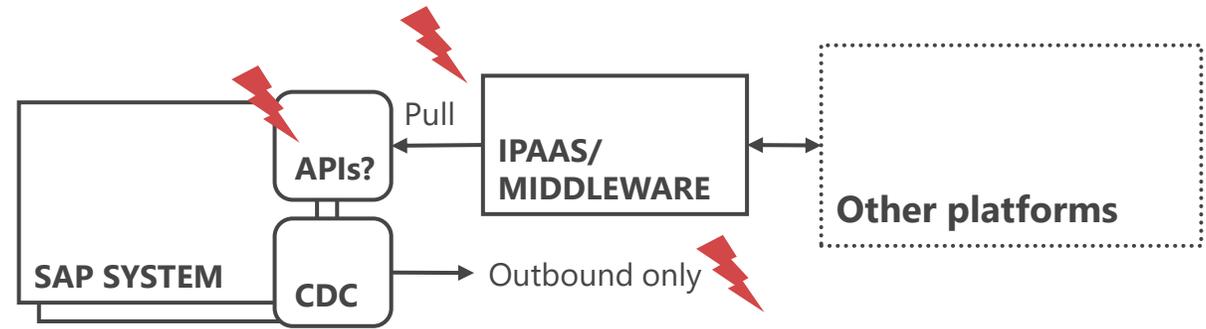
Message Builder

```
{
  "specversion": "1.0",
  "type": "asapio.aci.acievents01.msctest",
  "source": "SAP_EM/MATERIAL_CHANGE",
  "id": "MATERIAL_CHANGE2020110322541650 ",
  "time": "2020-11-03T22:54:15.565Z",
  "data": {
    "MARA": [
      {
        "MANDT": "100",
        "MATERIAL_NUMBER": "CP_5001",
        "MTART": "FERT",
        "MATKL": "015",
        "BASE_UNIT": "ST",
        "MARM": [
          {
            "ADDITIONAL_UNIT": "KAR",
            "UMREZ": 15,
            "UMREN": 1,
            "EAN11": "4015000267397",
            "BRGEW": 3.750,
            "GEWEI": "KG"
          }
        ]
      }
    ]
  }
}
```

ASAPIO + Solace approach, compared to others

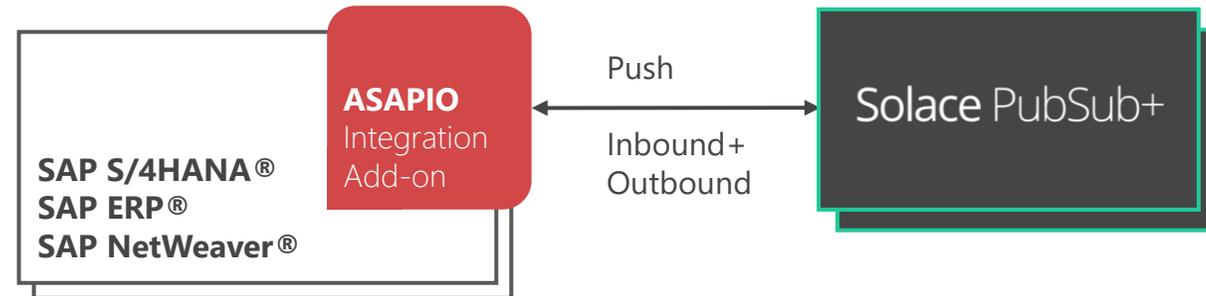
Downsides of Middleware or Database CDC approaches:

- Custom API developments required
- iPaaS or middleware required
- CDC tools are fast, but have no application access
- Typically only 1:1 connectivity
- Middleware is a performance bottleneck



Benefits of ASAPIO approach:

- Native connectivity
- Change Data Capture on application layer
- Full database access
- Certified by SAP and Solace
- Supports high availability scenarios



ASAPIO Integration Add-on is built for high performance

Performance:

- ✓ Multi-threaded batch mode, for load distribution to multiple SAP work processes
- ✓ Close to zero latency, for true real-time messaging
- ✓ Minimal system performance impact in daily operation

*Example figures from April 2021, from one of our large enterprise customers. Connectivity use-case: SAP ERP to a data lake, via ASAPIO Integration Add-on and REST proxy.

8.000
events/second*

Outbound
Multi-threaded
Batch mode

260.000
events/day*

Outbound
Event-driven

Key benefits of using ASAPIO Integration Add-on for Solace®

Native SAP connectivity

- ✓ Change data capture on SAP application level
- ✓ Full database access
- ✓ Outbound + inbound
- ✓ for SAP S/4HANA®, SAP ERP® and other systems

One integration solution,
for any connectivity

Code-less + custom code

- ✓ Notification Events built-in, for SAP business objects
- ✓ Message Builder creates message payload, code-less
- ✓ Business content available
- ✓ Fully extensible

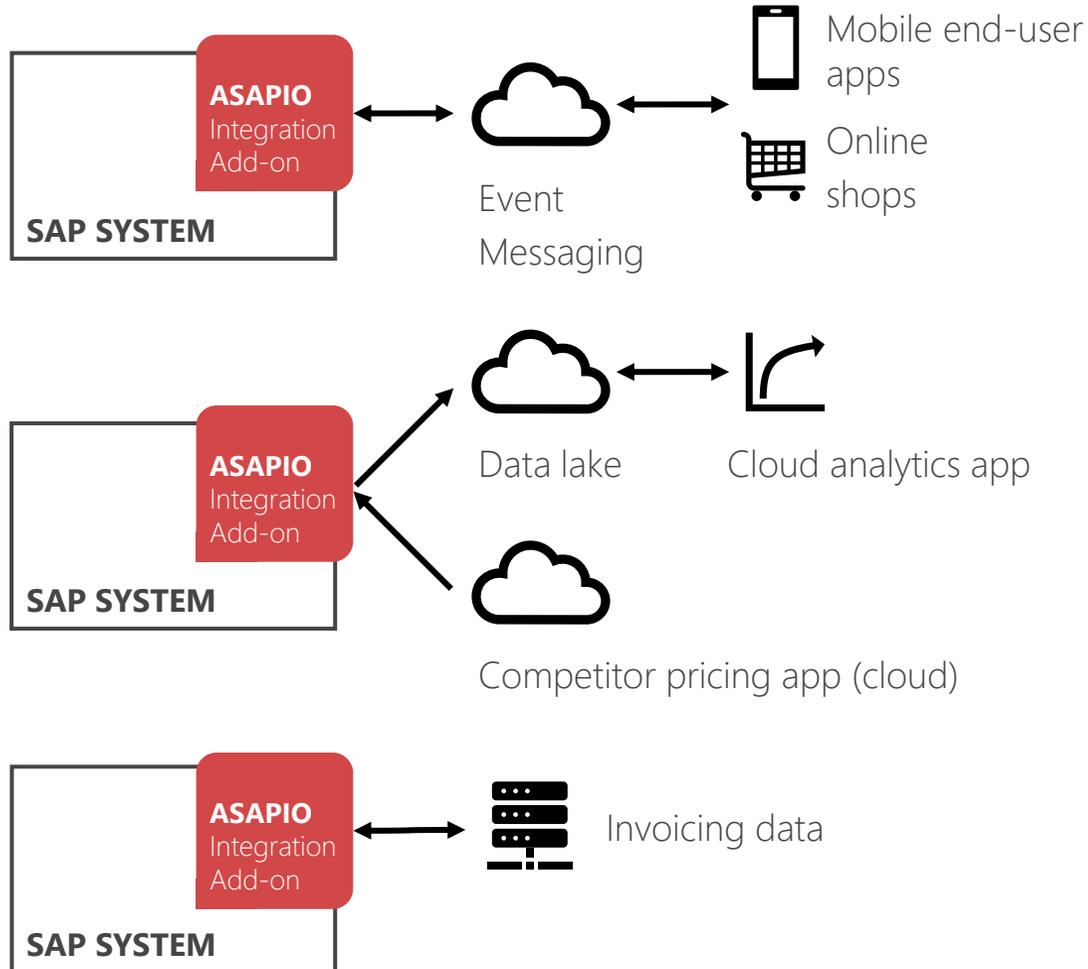
Saves time, reduces risk +
lowers maintenance efforts

Real-time + mass data

- ✓ Single event mode
- ✓ Batch mode
- ✓ Multi-threaded mode, for large data volume
- ✓ Trigger events by configuration

Event-driven integration is
strategy, at SAP + customers

Business use-case examples from our customers



Sales, logistics and procurement data

Provide high-volume data (SAP sales orders and logistics info), for buffered data provisioning to data lakes, end-customer mobile apps, online shops and more.

Retail sales and material stock data

E. g. send SAP order volume and stock info data to data lakes, for real-time analytics during high-volume promotions (Black Friday).

Product pricing data

Inbound process, for event-driven load of competitor pricing into SAP ERP®, for automated price benchmarking.

Invoice management integration

Inbound application integration, e. g. event-driven transfer of invoicing data to SAP and non-SAP systems.

ASAPIO services for customers and partners

ASAPIO supports customers and SAP partners:

- ✓ Consulting services for design and implementation
- ✓ Enablement sessions for SAP consultants and developers
- ✓ Pre-sales and sales support (e.g. Demos, Presentations)
- ✓ Global back office support from two time zones possible
- ✓ Early info about roadmap and product updates
- ✓ ASAPIO is open to co-design prepacked solutions and additional connectors, together with customers/partners
- ✓ Co-sellers and resellers are welcome

CONSULTING

TRAINING +
CERTIFICATION

DEVELOPER
ENABLEMENT

BACK OFFICE
SUPPORT

CO-SELLING

Get ASAPIO Integration Add-on for your Solace connectivity!

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Visit solace.com/asapio/ for more information



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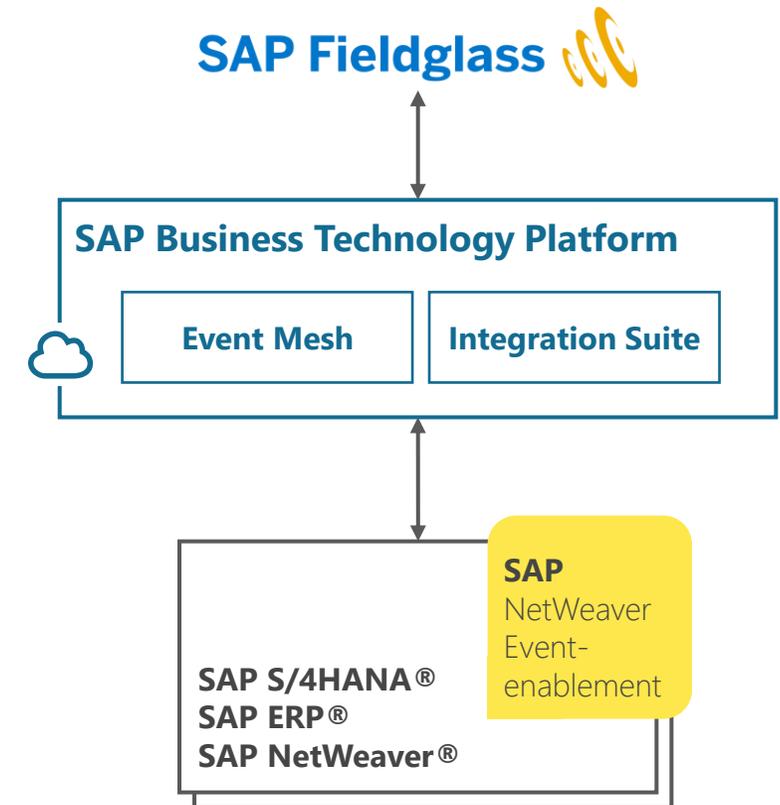
Contact

ASAPIO and SAP

ASAPIO is proud to be part of SAP's integration strategy, with two SAP-branded applications available for customers, developed and maintained by ASAPIO:

- ✓ **SAP NetWeaver® Event-enablement Add-on:** Connect to Event Mesh on SAP Business Technology Platform®
- ✓ **SAP Fieldglass Integration Add-on** provides end-to-end master data and process integration for SAP ERP and SAP S/4HANA, based on SAP NetWeaver Event-enablement Add-on

Both Add-ons are included in the subscription of SAP Event Mesh and "ERP Editions" of SAP Fieldglass.



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