



SAP Integration Architecture Patterns Guide - Brochure

Intro

SAP integration decisions shape far more than technical connectivity. They affect programme risk, business continuity, data quality, operating cost, vendor accountability, and the ability to change safely after go-live.

The **SAP Integration Architecture Patterns Guide** helps executives, sponsors, enterprise architects, and transformation leaders understand the main integration patterns used across SAP-centric landscapes and how to select them with confidence.

Description

This guide provides a practical, executive-level overview of SAP integration architecture patterns across S/4HANA, ECC, SAP BTP, SAP Integration Suite, SaaS platforms, data platforms, legacy systems, trading partners, and cloud services.

It explains the purpose, strengths, risks, and decision criteria for common integration approaches, including API-led integration, event-driven architecture, asynchronous messaging, IDoc-based integration, file and batch exchange, EDI and B2B integration, data replication, master data synchronisation, side-by-side extensions, and hybrid middleware patterns.

Designed for busy leaders and architecture teams, the guide helps organisations avoid integration sprawl, reduce unnecessary point-to-point connections, challenge vendor proposals, and establish clearer integration standards during ERP and transformation programmes.

Ideal for

- CIOs, CTOs, transformation sponsors, and programme leaders involved in SAP transformation decisions
- Enterprise architects and solution architects defining integration strategy across SAP and non-SAP systems
- SAP S/4HANA, ECC, BTP, Integration Suite, and cloud programme teams
- Organisations modernising legacy middleware, PI/PO, custom interfaces, IDocs, APIs, or batch integrations
- Teams reviewing vendor architecture proposals or integration workstream designs
- Mid-market and enterprise organisations seeking clearer integration governance before delivery complexity increases

Contents

- **SAP Integration Architecture Patterns Guide (.pdf)**
A practical executive guide to SAP integration architecture patterns, decision criteria, risks, anti-patterns, and governance templates for SAP-centric transformation landscapes.

Key outcomes

- Understand the main SAP integration patterns and when each one is appropriate
- Choose more suitable approaches for APIs, events, IDocs, files, data replication, EDI, and extensions
- Reduce integration sprawl and avoid unnecessary point-to-point connectivity
- Improve architecture governance across SAP, cloud, SaaS, legacy, and data platforms
- Challenge supplier proposals, solution designs, and middleware decisions more effectively
- Support cleaner, more scalable, and more supportable SAP transformation landscapes

Preview

Contents	
1. Executive overview	3
2. Who this guide is for	4
3. How to use this guide	5
4. The executive principle	6
5. Why SAP integration architecture matters	7
6. Integration architecture decision model	8
7. Pattern 1: API-led synchronous integration	10
8. Pattern 2: Asynchronous messaging	12
9. Pattern 3: Event-driven integration	14
10. Pattern 4: IDoc-based integration	16
11. Pattern 5: File and batch integration	18
12. Pattern 6: EDI and B2B trading partner integration	20
13. Pattern 7: Data replication and analytics integration	22
14. Pattern 8: Master data synchronisation	24
15. Pattern 9: Side-by-side extension integration	26
16. Pattern 10: Hybrid middleware and transition architecture	28
17. SAP integration pattern decision matrix	30
18. Integration anti-patterns	31
19. Governance checklist	34
20. Executive questions to ask	36
21. Architecture review template	38
22. Practical decision workflow	40
23. Closing guidance	42
Appendix A: Important notice	43
Appendix B: Licence and use	44

1. Executive overview	
SAP integration is rarely just a technical workstream.	
In many transformation programmes, integration becomes the hidden architecture of the business. It connects orders, customers, suppliers, logistics, finance, product data, inventory, payroll, reporting, tax, marketplaces, warehouses, banking, manufacturing, and customer channels.	
When integration decisions are strong, the landscape feels controlled. Systems exchange the right information at the right time. Failures are visible. Ownership is clear. Support teams understand where to look. New change can be delivered without pulling apart a bowl of digital spaghetti.	
When integration decisions are weak, problems spread quietly. Programmes accumulate point-to-point interfaces, inconsistent patterns, duplicated logic, fragile data flows, unclear ownership, manual reconciliations, and hidden dependencies. Delivery teams may still hit milestone dates, but the business inherits complexity after go-live.	
This guide helps executives, sponsors, and architects understand the most common SAP integration architecture patterns and when each one should be used.	
It is not a developer manual. It is a practical decision guide.	
The goal is to help leaders ask better questions, challenge poor design choices, and establish integration standards that support delivery rather than slow it down.	