

Intelligent Automation for SAP Transformations

How Automation De-Risks Custom Code Modernization:

ASUG Research, Solutions, & Real-World Results

# About Me

Jason Narinian
Account Executive

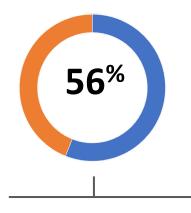
jnarinian@smartshift.com 978-502-3894



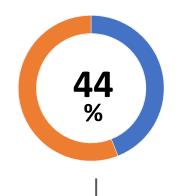


## **Custom Code is Needed**

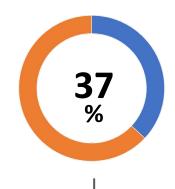
**ASUG Research Findings** 



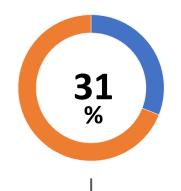
Industry specifics not covered by SAP Standard



Necessary to connect systems



Necessary
due to
regulatory
requirements



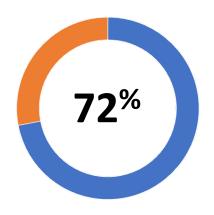
Essential due to localization or different geographies

Source: smartShift/ASUG Market Research



## **Custom Code Remains Critical**

As customers upgrade their SAP systems, they'll need to remediate and transform their custom code



The majority of survey participants plan to retain their custom code as they proceed with upgrading to S/4HANA and beyond

Q. As your organization moves forward with SAP S/4HANA or other SAP system upgrades, how will your organization's custom code be handled? (Please select all that apply.) (n=177)



# Custom Code Presents Challenges for Modernization



Barrier to upgrading/ migrating to a new SAP offering

**58**%



Difficulty finding expertise to maintain/enhance custom code

**37**%

Source: smartShift/ASUG Market Research

# **Automation Offers Modernization Options**



### Speed

Accelerate the transformation process by minimizing the need for manual remediation



### Confidence

Enhance the overall quality, security, and stability of the transformed code



### **Productivity**

Eliminate the need for business disruption



### **Innovation**

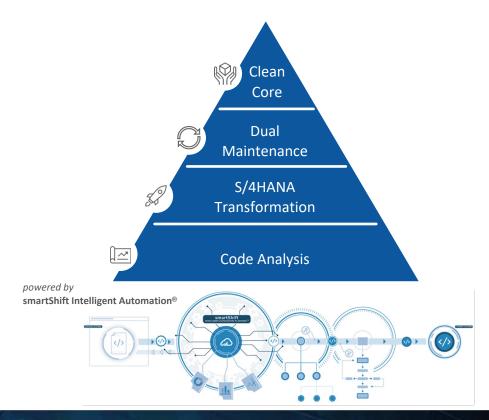
Modernize the system to be more flexible, scalable, and agile



- The only Intelligent Automation for SAP Custom Code Transformations
- 11 Patents 10+ years of SAP ABAP Research & Development
- 3000+ Successful SAP Transformation Projects
- 3.5+ Billion lines of Code Remediated with 99.99% Code Transformation Accuracy



At smartShift, we develop and deliver automated solutions to accelerate business growth and de-risk the transformation of SAP custom code and applications.



# Code Analysis



#### **Code Analysis**



powered by smartShift Intelligent Automation®

#### What it delivers:

- Complete ABAP repository analysis: HANA, S/4HANA, Unicode, Stability, Security, Usage, and Optimization (250+ intelligent rules)
- Landscape comparison analysis for each landscape
- Outputs: Code decommissioning insight, reporting of categorized issues, simplification insight, data-driven plan for realizing end-state

#### Why it matters:

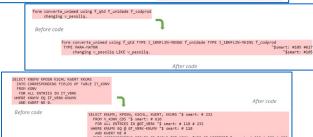
- De-risk w/data-driven planning. Know all changes for S/4HANA upfront & plan with confidence.
- Ensure version discrepancies between environments are identified and corrected.
- First step to realize guaranteed compatibility & comprehensive optimization of the code repository.

# **Code Transformation**



#### **Code Transformation**





powered by smartShift Intelligent Automation®

#### What it delivers:

- Comprehensive, automated transformation of ABAP: HANA, S/4HANA, Unicode, Stability, Security, and Optimization (250+ intelligent rules)
- Unused code decommissioned
- Version alignment within each landscape right version, right place
- Modification adjustment (SPDD/SPAU/SPAU ENH)
- Outputs: All code transformed and posted to designated transport in the target environment, full audit and before/after reports

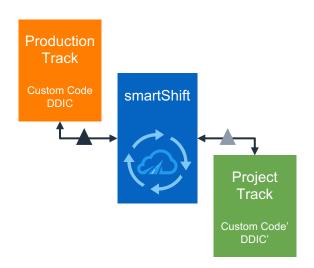
#### Why it matters:

- Comprehensive transformation and optimization, not limited
- Guaranteed quality 1,000X better than manual approach
- Guaranteed compatibility full coverage, all severities, best practice
- Timeline acceleration, protection, and risk reduction
- Elimination of technical debt/obsolete code, plus future-readiness
- Secure, stable, & optimized, not just compatible
- Cost certainty

## **Automated Dual Maintenance**



#### **Dual Maintenance Automation**



powered by smartShift Intelligent Automation®

#### What it delivers:

- Automated comparison, merge, and upgrade compatibility (e.g. ECC
   → S/4HANA) for ABAP & related DDIC
- Integration with change management (ChaRM, Active Control, Rev-Trac, etc.)
- Delivered to SLA committed cycle frequency & capacity
- Outputs: Merged, compliant code in transport in target, transports and issues processing reports, change management integration

#### Why it matters:

- Solves the difficult challenge of ABAP dual maintenance, especially for S/4HANA and complex scenarios
- Enables continued business agility and innovation development restrictions, prolonged code freezes no longer necessary
- Protects development teams and maintains strategic focus
- Program timeline, quality, and risk managed

# Clean Core Analysis

Informed feasibility, design, approach, and planning for application modernization.



#### Cloud Readiness Side-by-Side Extensions Cloud Ready Candidates that are eligible for **Development as Custom Enhancement** Candidates that are Development using RAP/CAP Eligible for S/4HANA Cloud Deployment in BTP /Steampunk Eligible for in-app extension Integratable to 3rd party Cloud apps Side-by-Side In-app Extensions Extensions Loosely coupled Tightly coupled (Hybrid) Candidates that are Cloud-Ready Not eligible for BTP Extensions Classical Extensions Classical Candidates that are required to be Classical Core Modifications Enhancements Extensions **Development as Custom Enhancement** Core Plug-Ins 0 Can not be moved to RAP/Fiori Specific Industry Solutions Deployed On-Stack to support BTP integration 3rd party plug-ins (Legacy-Non-S/4) Modifications/Classical On-Stack Classical Custom Extensions

# S/4HANA Customers

Trusted solutions for the largest SAP customers in the world



- S/4HANA migration factory for 80+ system landscape
- Automation for S/4HANA, security, standardization, and performance
- Agile, sprint-based methodology
- To date:
  - o Over 60 projects completed
  - o 10MM+ LoC, 100k+ objects remediated
  - o Over 7MM EUR saved

#### JABIL

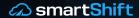
- ECC to S/4HANA
- 46K custom ABAP objects
- Dual Maintenance automated with smartShift Retrofit
   Critical enabler of agile
  - continuous development & test process



- Multi-wave ECC to S/4 rollout
- 42K custom ABAP objects /
   3.5MM lines of code
- Transformation and optimization
- Selective data/carve-out approach
- Automated Dual Maintenance with smartShift Retrofit ensuring continuous alignment EEC to S/4HANA



- Automation for 200k custom ABAP objects. Manual approach not feasible.
- 9 system consolidation to 3 templates + S/4HANA conversion
- Strategic development partner
  - Automated Interface Identification
  - Dual Maintenance
  - App Modernization



## smartShift Overview - Global Customers



























































































# smartShift Advantage

"smartShift works at industrial scale with virtually no errors. The defect rate is so low because they have automated everything and reduced the human touch as much as possible."

#### **Dilip Kumar**

Global Supply Chain Platform Architect, Procter & Gamble



# Call to Action

Test drive our analysis capabilities

A free custom code health check to gain insight into your SAP modernization roadmap



# smartShift