

Toronto Parking Authority

ERP – SAP Recommendation

Background Summary

Objectives, Requirements, Assessment and Recommendation



Executive Summary

Key business issue and how proposed solution will address it

- TPA's current financial and operational systems are unable to support strategic objectives and are approaching a state of obsolescence. Financial and operational procedures are designed to provide manual, paper-based work around solutions due to system limitations and are not designed to optimize outcomes.
- Visibility to analytics, metrics, trends, operational or statutory compliance risks are limited. Resolution of a number of outstanding Auditor General recommendations is contingent on this automation and system modernization.
- Solution discovery conducted through RFI process; scalability provides for economy of scale for additional future phase operational requirements. Annual savings based upon discovery sessions is estimated at \$415K with a 6.5 year break-even
- Recommended solution will provide a robust, scalable, non-customized, 'model company' implementation which will leverage the City's SAP contract, delivering value within a short implementation time-frame:
 - All required functionality comes out-of-the-box, no customization
 - Accurate and timely reporting to support fact-based decision making
 - Reduced cost of administration; automated integration and reconciliation of revenue
 - Work order and asset management applications will support project prioritization and efficient deployment of staffing
 - Provide visibility to compliance risk areas, such as contract management, procurement, asset management and revenue control
 - Assessment of solution focused on outcomes and maximizing value to our customers and the City
- Implementation plan risk strategy: mitigation of key risks identified include clear definition of roles and responsibilities, retaining a project manager and data integration specialist with SAP S/4HANA experience and only configuring the SAP Model Company. Staff will drive change management, engaging all levels in the change.

TPA Strategic Focus - All About the Customer

ERP objective is to modernize operational and financial capabilities

Modernize Internal Capabilities:

Set the organization up to succeed and excel at delivering top quality, efficient services by enhancing foundational internal capabilities.

We strive to be thought of as the preferred choice of parkers and be seen as the leader in parking and Bike Share.

To TPA this means:

- ✓ Never disappointing customers in their base expectation of quality, cleanliness, usability, safety, convenience, competitive pricing and consistency.
- ✓ Exceeding base expectations through value-added features.
- ✓ Offering innovative new services, where there is:
 - ✓ a reasonable expectation of improving the customer's experience;
 - ✓ no negative impact to base expectations;
 - ✓ a potential increase in the return to the City.

TPA Strategy Map 2018-2020			
OUR PURPOSE	To support the vibrancy of businesses and the livability of the communities we serve, and in doing so serve our customers with excellence.		
STRATEGIC OBJECTIVE	All About The Customer <i>To be seen as the leader in municipal parking and Bike Share.</i> 1. To meet and exceed our customers' expectations by providing a consistent, high quality, value-added municipal parking and Bike Share service. 2. To judiciously innovate and seek opportunities to enhance the customer service offering, which will increase the return to the City.		
ADVANTAGE	To be the preferred choice of short stay parkers and Bike Share users through an experience that is safe, attractive, convenient and affordable.		
BUILDING BLOCKS	Customer experience second to none	State of the art eco-friendly parking infrastructure	Industry leading technology to support operational and customer excellence
THE SIX PILLARS	Day to Day Excellence Through Existing Operations	Improve and Expand Existing Customer Experience	Improve / Modernize Internal Capabilities
	Innovate for Future Enhancement of Customer Experience	Connect With and Understand Our Customers	Offer More Than Expected
VALUES	Excellence	Innovation	Collaboration
	Service	Respect	Commitment

Anticipated Outcomes

Strategic Enterprise Wide Objectives

- **Leverage City of Toronto's SAP contract** to ensure preferred pricing and potentially participate in the City's shared services opportunities
- **Fully out-sourcing a non-customized, robust, scalable, financial and operational platform** to maximize value and ensure solution remains current with the latest features
- **Provide effective, efficient, transparent, exception management focused back-office administration** to support growth and transformation
- **Provide accurate and timely business information and metrics to support decision making**, daily management and oversight of operations to employees, managers and senior management, including analysis and relevant feedback on the impact of decisions made
- **Drive operational efficiency** to support customer service focus
- **Provide visibility** to monitor and manage governance and compliance risk
- **Provide effective, efficient contract management and procurement tools**
- **Provide customer relationship management, work order and asset management capabilities to align resources** and staff activities
- **Provide HR functionality** – recruiting, cost of hire, training, performance management

Anticipated Outcomes

TPA's journey to bring Finance to best in class

Support the Role of Finance by moving from data entry and transaction processing to business partner focus

- **Compliance and Control** – are at the top of the agenda for Finance in recent years. The future business needs to optimize risk management, compliance and control to establish a sustainable cost effective control environment which meets today's requirements as well as being flexible for future changes in TPA strategy and business environment. Support meeting the governance objectives.
- **Efficiency in Finance** - means performing tasks in a timely and cost effective manner, typically via simplified and standardized processes that leverage technology. Minimize the cost of admin.
- **Business Insight** - is a key objective for most Finance functions and entails effective partnering with the business to create value. Delivering relevant and timely management information and supporting corporate performance are key priorities.

Current State Issue Summary

Current State Issues	Risks
The financial system is approaching a state of obsolescence and is unable to support strategic and transformational objectives	- Finance team remains data entry and report compilation focused; little analysis, planning performed, unable to meet reporting demands of the business without either additional staff/technology. Today there is a performance gap. - Limited visibility to trends, data, analytics, cost of hire, org structure, etc.
The financial system architecture is fragmented and was not designed to scale	- Current levels of parking transaction volume exceed the capabilities of the existing system - System processes, controls require full manual support for operational audit
The Toronto Parking Authority's general ledger is not structured to support current reporting requirements, nor does it provide reporting functionality	- Data is not captured or made available to stakeholders in a sufficient or timely manner in which to base long-term decision making - All key processes, documentation reside outside of the current ERP (in excel / word); duplicate reporting maintained with high risk of error
Operational challenges include work planning, prioritization, inventory management, asset and work order management	- Procedures are designed to accommodate system limitations, rather than optimize end-to-end processes - Manual procedures and documentation result in inefficient, inconsistent results - Maintenance and cost tracking not readily available for maintain or replace decisions - Asset tracking of revenue control machines manual with risk of error
Visibility to governance and compliance risk areas poor	Documentation not readily accessible in a single location to demonstrate compliance

Current State Issue Summary

Existing ERP Limitations

- Utilizes a text based command line user interface
- Does not support any type of front-end configuration
- Does not feature a development / test environment
- Does not feature workflow and approval functionality
- Does not support audit-trails that can be accessed by end-users
- Features limited reporting and data extraction capabilities
- Limited purchasing & payables functionality (single point of contact for PO creation, no automated two or three-way matching, etc.)
- Does not support inventory or asset management, project or job costing
- Does not feature an integrated data model resulting in the creation of redundant / duplicate data across modules
- Little to no support documentation
- Highly dependent upon an external third-party vendor for changes, maintenance and general troubleshooting

Cost Benefit Analysis

- ✓ Legacy system savings primarily include sole consultant hired to maintain existing PICK financial system
- ✓ Work order tracking and project management capabilities are expected to reduce overtime 70%
- ✓ Automation of revenue control, reporting procedures and workflows will remove reliance on manual processing and control activities
- ✓ Contract staffing required: project manager, data integration, senior business analyst and accounting subject matter expert with SAP S/4HANA experience

Projected annual benefits

Legacy system savings	\$	120,613
Operation cost avoidance		422,096
Finance cost avoidance		370,500
Projected annual benefits	\$	913,208
Annual license fees		498,491
Projected annual savings rate	\$	414,717

Implementation fees

TPA contract staffing	\$	550,000
SAP consulting - finance		1,871,972
Contingency - 15%		280,796
Implementation fees	\$	2,702,768

Break-even (years)	6.5
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Business Case

Selection Support

S/4HANA is the recommended solution as it provides a robust, scalable, non-customized, model company implementation which will leverage the City's SAP contract, delivering value within a short implementation time-frame:

- All required functionality, both financial and operational, comes out-of-the-box, no customization
- Cloud based solution preferred because of the lower level of in-house maintenance and support required; 2 software upgrades per year managed by SAP
- Accurate and timely reporting to support fact-based decision making
- Reduced cost of administration through use of standardized work flows, automated controls
- Work order and asset management applications will support maintenance programs, work management (planning and scheduling of tasks, efficient deployment of staffing)
- Provide visibility to compliance risk areas, such as contract management, procurement, asset management and revenue control
- Assessment of solution focused on outcomes and maximizing strategy delivery
- No add-ons or third party applications to maintain; operational software which would otherwise be separate solutions, such as asset management, work order management, contract management, human capital management and customer relationship management; potential ability to tie into City reporting and shared services initiatives, such as Ariba
- Revenue integration solution which supports automated controls to support completeness and accuracy of reporting
- Provides clear visibility to analytics, metrics, trends, operational or statutory compliance risks. A number of Auditor General recommendations will be addressed through automation and system modernization.

Business Case

Risks and Assumptions

Timeline risk mitigation:

- ✓ Employ a tailored agile methodology that utilizes key elements of Scrum to guide the delivery of the project work. Agile methodologies target the rapid delivery of business value and are useful when working on projects with a high degree of uncertainty
- ✓ Clear definition of roles and responsibilities; use contract support with S/4HANA experience and ensure subject matter experts dedicated to project with clear priorities and accountabilities
- ✓ Ensure required contract resourcing fully in place prior to commencing planning and discovery activities

Change management risk mitigation:

- ✓ Engage staff using Centre of Excellence model
- ✓ Engage promoters from each area of the organization for user acceptance testing and training

Key assumptions include:

- ✓ Preconfigured model company provides all functionality required by Finance as provided by SAP, including automation of revenue reconciliation procedures
- ✓ Database size provides for significant room for growth
- ✓ No customization, configuration only
- ✓ SAP team able to deliver on schedule, providing dedicated, knowledgeable resources
- ✓ TPA is able to recruit appropriate, required talent in key risk managing roles: project manager and data integration specialist
- ✓ TPA has sufficient and appropriate staff to determine future state processes and procedures required in new solution
- ✓ Historical data limited to profitability data for 3 years
- ✓ Work order mobility app fully functional on existing handhelds

Assessment of Alternatives

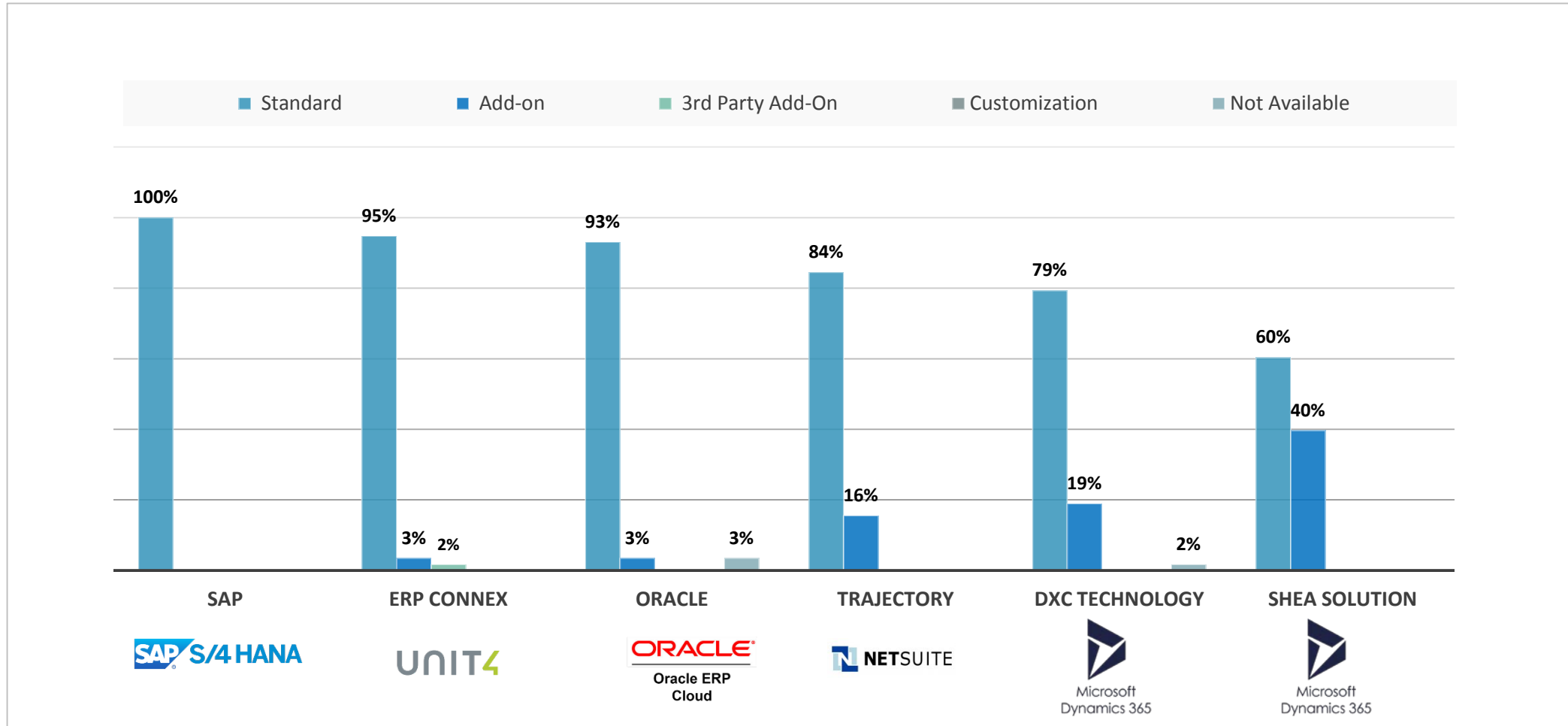
Analysis of comparable solutions

RFI Response Submission Overview



	SAP	Oracle / KPMG	DXC Technology	ERP Connex	Trajectory	SHEA Solution
Type of Vendor	Vendor	Vendor	Value Added Reseller	Value Added Reseller	Value Added Reseller	Value Added Reseller
ERP Product	SAP S/4HANA Cloud Single Tenant Edition	Oracle ERP Cloud	Microsoft Dynamics 365 for Finance & Operations Platform	Unit4 Business World (formerly Agresso)	Oracle NetSuite	Microsoft Dynamics 365 for Finance & Operations Platform
Annual Sales Value of ERP Product	\$19.5M euros	\$1B	\$375-500M	\$600M euros	\$500M	\$375-500M
Recommended Infrastructure	Cloud Based SaaS	Cloud Based SaaS	Cloud Based SaaS *	Cloud Based SaaS	Cloud Based SaaS	Cloud Based SaaS *
Reporting Solution	SAP Analytics Cloud or SAP BusinessObjects Platform	Oracle Business Intelligence / Oracle Embedded Analytics	DXC Action Analytics	Integrated within ERP Solution	Integrated within ERP Solution	SQL Server / Power BI
Provides Implementation Services	Yes	Implementation Services offered in partnership with KPMG (Mandatory)	Yes	Yes	Yes	Yes

Percentage of RFI Requirements Satisfied by Proposed ERP Solution



RFI Response Pricing Overview

	SAP	Oracle / KPMG	DXC Technology	Unit 4 ERP Connex	Trajectory	SHEA Solution
Product	SAP S/4HANA Cloud Single Tenant Edition	Oracle Cloud ERP	Dynamics 365 Finance & Operations	Unit4 Business World	Oracle NetSuite	Microsoft Dynamics 365 for Finance & Operations Platform
Included	- SAP S/4HANA Cloud Single Tenant Edition - SAP Asset Manager for SAP S/4HANA - SAP Analytics Cloud for Business Intelligence, Predictive Edition, Private Option (User) - SAP Analytics Cloud for bi, predictive edition	- Engagement Cloud - Financials Cloud - Purchasing Cloud - Expenses Cloud - Maintenance Cloud - Project Financials Cloud - Inventory Management Cloud - Core HR - Talent Management Cloud	- Dynamics 365 Finance & Operations - Business Intelligence - Daxeam Enterprise Asset Management	- Foundation Platform Engine - Financial & Planner Engine - Project Engine - Procurement Engine - HR Engine (no payroll) - Field Force	- NetSuite Mid-Market Fixed Asset - Project Management Contract Renewals Procurement - Work Orders & Assemblies - SuitePeople Core HR - Revenue Management	Dynamics 365 Finance & Operations
Annual Licensing Fees	\$466,651 (5 Year Term)	Not provided	\$343,177 + add on	\$185,200 (missing key functionality)	\$228,372 (missing key functionality)	\$360,000 + add on
Number of Users	100		100	350	100	Not provided
Derived Cost Per User	\$4,666		\$3,431	\$529	\$2,284	N/A
Cost for Implementation Services	Not provided		\$1,994,686 One-time	\$750,000 - \$1,200,000 One-time	Not provided	\$1,500,000 One-time

SAP Proposal

Summary of Recommended Solution

SAP Product Modules & Features

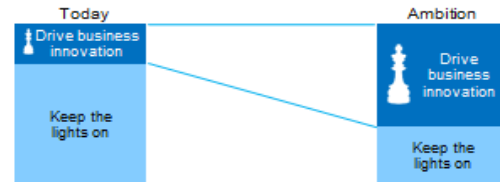
Software Details

SAP S/4HANA Cloud, single tenant edition - Standardized packages covering all your needs

10 Benefits of

S/4HANA Cloud, single tenant edition

- 1 Easy to try.** Take advantage of next generation demo, pilot and proof of concept opportunities to discover the solution.
- 2 Easy to buy.** Simple modular cloud subscription pricing, no upfront investment.
- 3 Easy to start.** Start in weeks with predefined services / Quick onboarding with proven methodology / Fast Time-to-value.
- 4 Easy to run.** World class service level agreements allow your IT to focus on business, not operations.
- 5 Easy to use.** Improve user acceptance and onboarding speed with an intuitive user interface across devices.
- 6 Easy to adopt innovations.** Benefit from latest innovations without the hassle of updates.
- 7 Safe.** Operate with Enterprise-caliber data security and expertise from SAP, the market leader.
- 8 Global availability.** Local Data centers compliant to your legal regulations.
- 9 Expandable & scalable.** Instant reaction on new requirements with new functionality, new countries, additional users or sizing needs.
- 10 Hybrid scenarios.** Benefit from mixed delivery models according to needs and preferences



Time reduction for you as a customer from two perspectives:

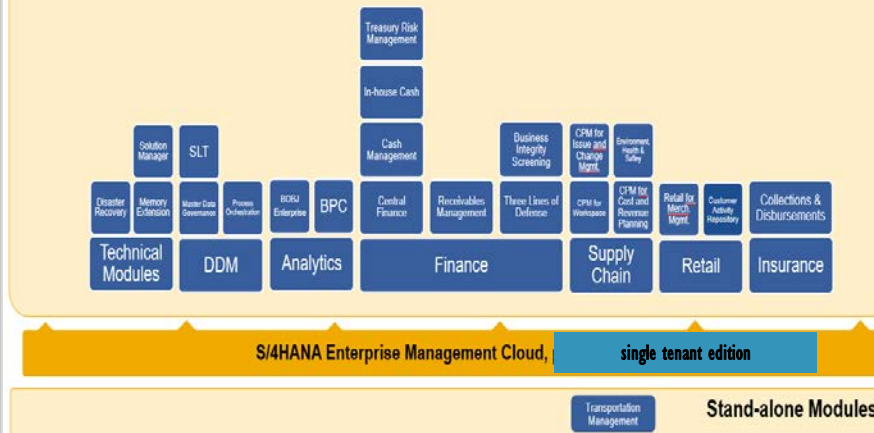
- Simplified processes and architecture based on S/4HANA functionality
- Taking over system management and application operations

Start small and grow through different dimensions according to your business needs

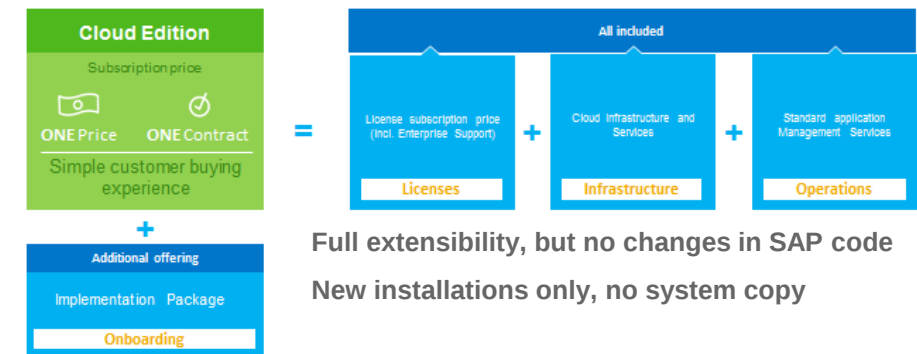
- Add users
- Add functionality
- Add system size
- Add disaster recovery



Portfolio as of January 2018



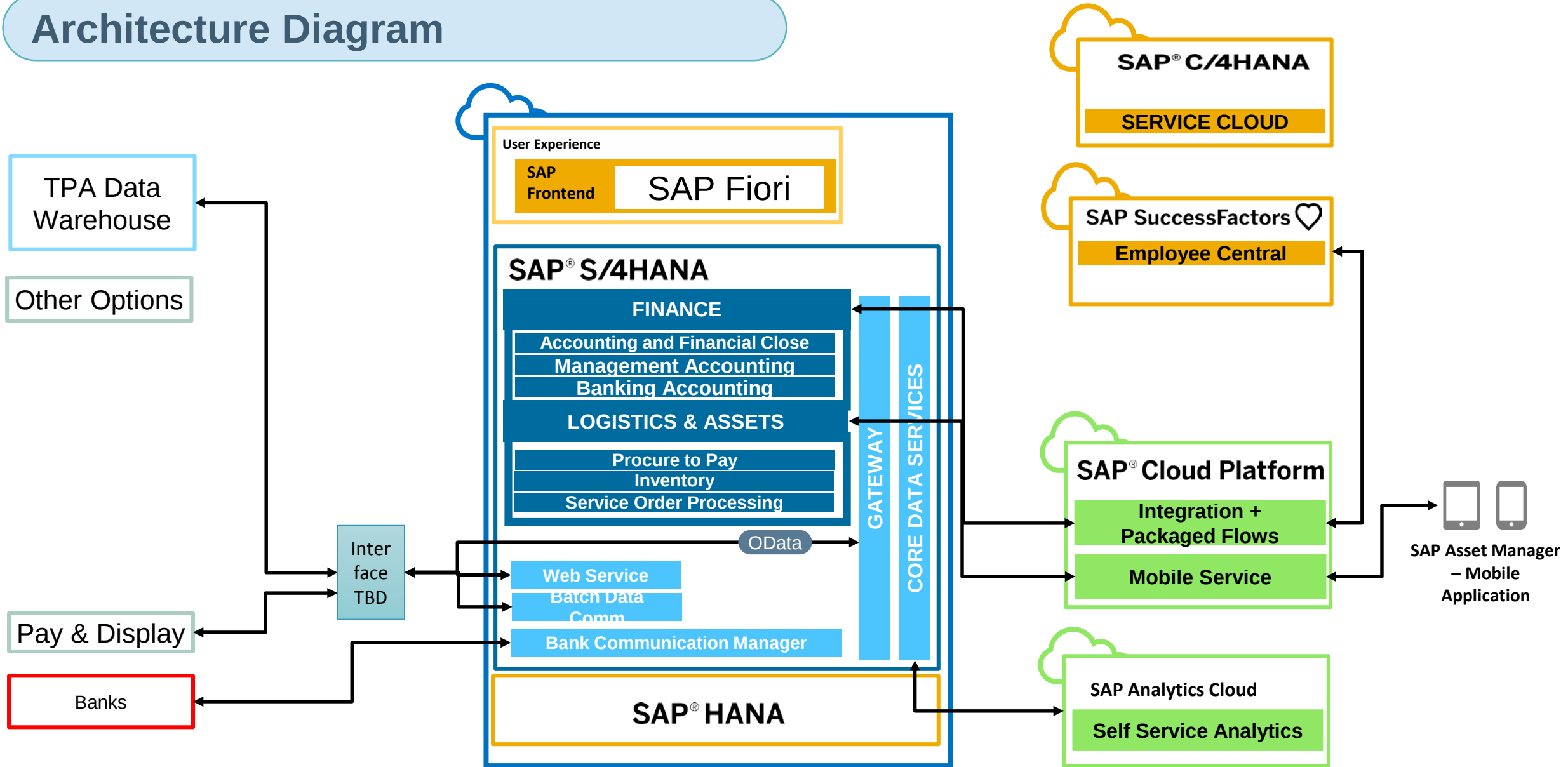
Cloud single tenant edition package



Benefit from a complete portfolio in the cloud with SAP S/4HANA Cloud, single tenant edition

Single tenant cloud edition gives you as a customer the choice to consume the SAP S/4HANA solution portfolio in a cloud delivery model based on a simple subscription pricing. The combination of SAP's 43 years experience bundled with a broad solution portfolio based on SAP HANA, combined with a modern user interface (SAP Fiori) and availability in the cloud makes this offer unique.

Architecture Diagram



Services: Project Timelines

Timeline - S/4HANA Finance

Activate Methodology Phase	Duration (Weeks)	Start Week	End Week	2019																											
				01-Jul-19	08-Jul-19	15-Jul-19	22-Jul-19	29-Jul-19	05-Aug-19	12-Aug-19	19-Aug-19	26-Aug-19	02-Sep-19	09-Sep-19	16-Sep-19	23-Sep-19	30-Sep-19	07-Oct-19	14-Oct-19	21-Oct-19	28-Oct-19	04-Nov-19	11-Nov-19	18-Nov-19	25-Nov-19	02-Dec-19	09-Dec-19	16-Dec-19	23-Dec-19		
Prepare	5	1-Jul-19	29-Jul-19																												
Explore	5	5-Aug-19	02-Sep-19																												
Realize	8	9-Sep-19	28-Oct-19																												
Deploy	3	4-Nov-19	18-Nov-19																												
Run	2	25-Nov-19	02-Dec-19																												
23																															

Timeline - MC4HR - Manage Workforce

Activate Methodology Phase	Duration (Weeks)	Start Week	End Week	2019																											
				01-Jul-19	08-Jul-19	15-Jul-19	22-Jul-19	29-Jul-19	05-Aug-19	12-Aug-19	19-Aug-19	26-Aug-19	02-Sep-19	09-Sep-19	16-Sep-19	23-Sep-19	30-Sep-19	07-Oct-19	14-Oct-19	21-Oct-19	28-Oct-19	04-Nov-19	11-Nov-19	18-Nov-19	25-Nov-19	02-Dec-19	09-Dec-19	16-Dec-19	23-Dec-19		
Prepare	2	2-Sep-19	09-Sep-19																												
Explore	2	16-Sep-19	23-Sep-19																												
Realize	6	30-Sep-19	04-Nov-19																												
Deploy	2	11-Nov-19	18-Nov-19																												
Run	2	25-Nov-19	02-Dec-19																												
14																															

Services: The Importance of Model Company & Shared Services

The City of Toronto has an established Shared Services Strategy covering: Exhibition Place, Toronto Parking Authority, Toronto Police Service, Toronto Public Health, Toronto Public Library and Toronto Transit Commission.

Within that Strategy, one of the key levers was the provision of common IT Infrastructure Services from the City of Toronto. Building a common set of single S/4HANA and SuccessFactors Applications will go a long way to driving value across the entire Shared Services Strategy.

One key question every shared service project has to grapple with is the common shared services design. SAP's Model Company can help accelerate the design phase by building the solution using SAP Best Practices.