Unlocking your SAP Financials with Microsoft Advanced Analytics

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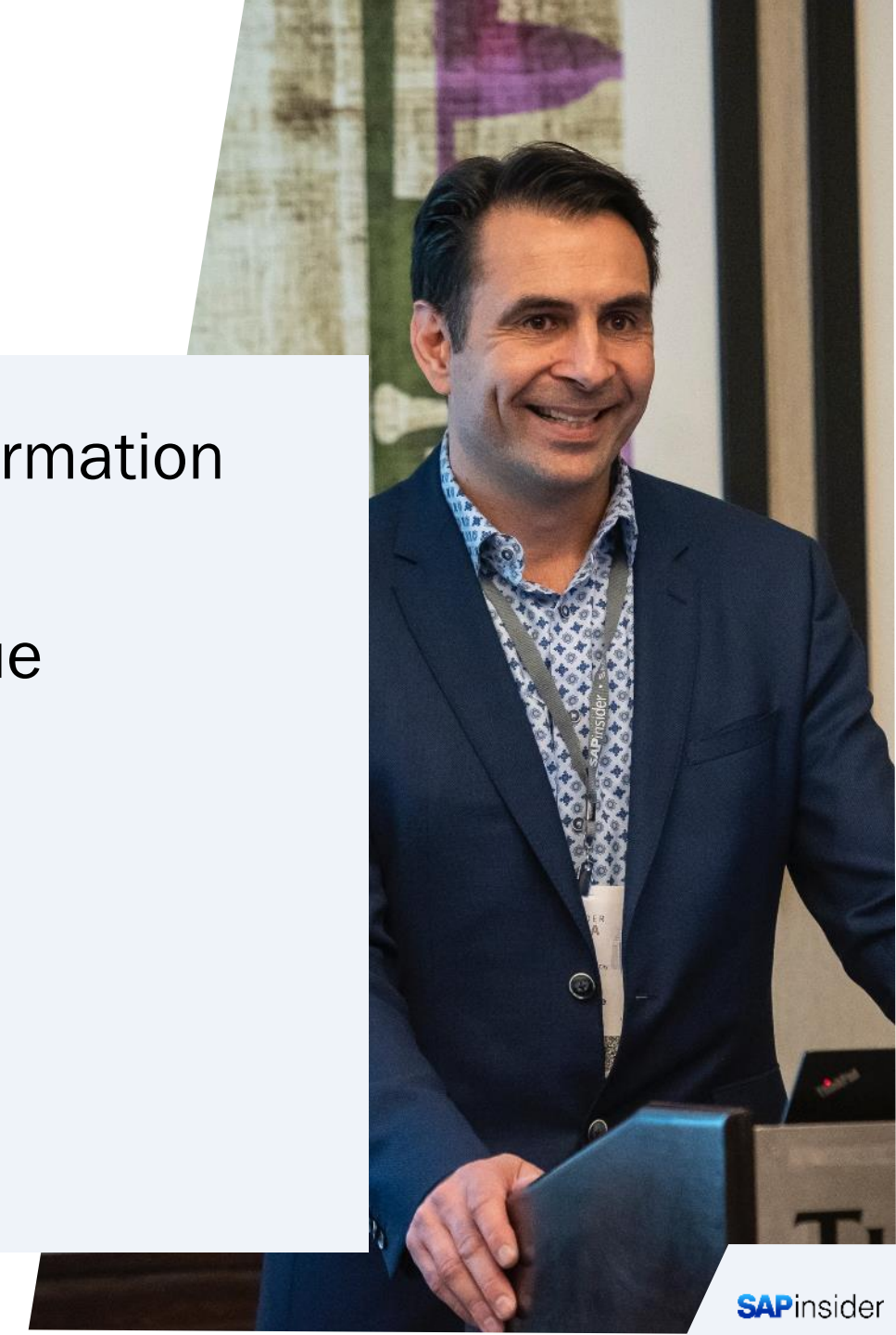
In This Session

- Discuss Microsoft's strategy and approach to getting greater value from its SAP S/4HANA data (and a little bit of ECC ☺) by utilizing the latest data and AI technologies.
- Talk about how you can leverage the same approaches in your environments.

Agenda

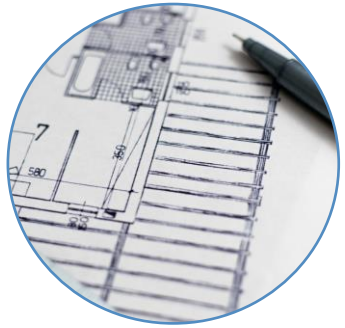
- The “Why” of Financial Transformation
- Microsoft’s Journey
- Key Capabilities to Unlock Value
- How You Can Get Started
- Wrap-Up



Financial Transformation

The Why

Current Challenges



Situation:

The digital era emphasizes the importance of data as a primary asset, and with the backdrop of digital transformation and AI-driven innovations, the need for reliable data becomes crucial

Complication:

For large enterprises, this vital data source is found in ERP systems like SAP's S/4 HANA. Despite its importance and impact, SAP ERP data can be difficult integrate with non-SAP solutions in a diverse system landscape

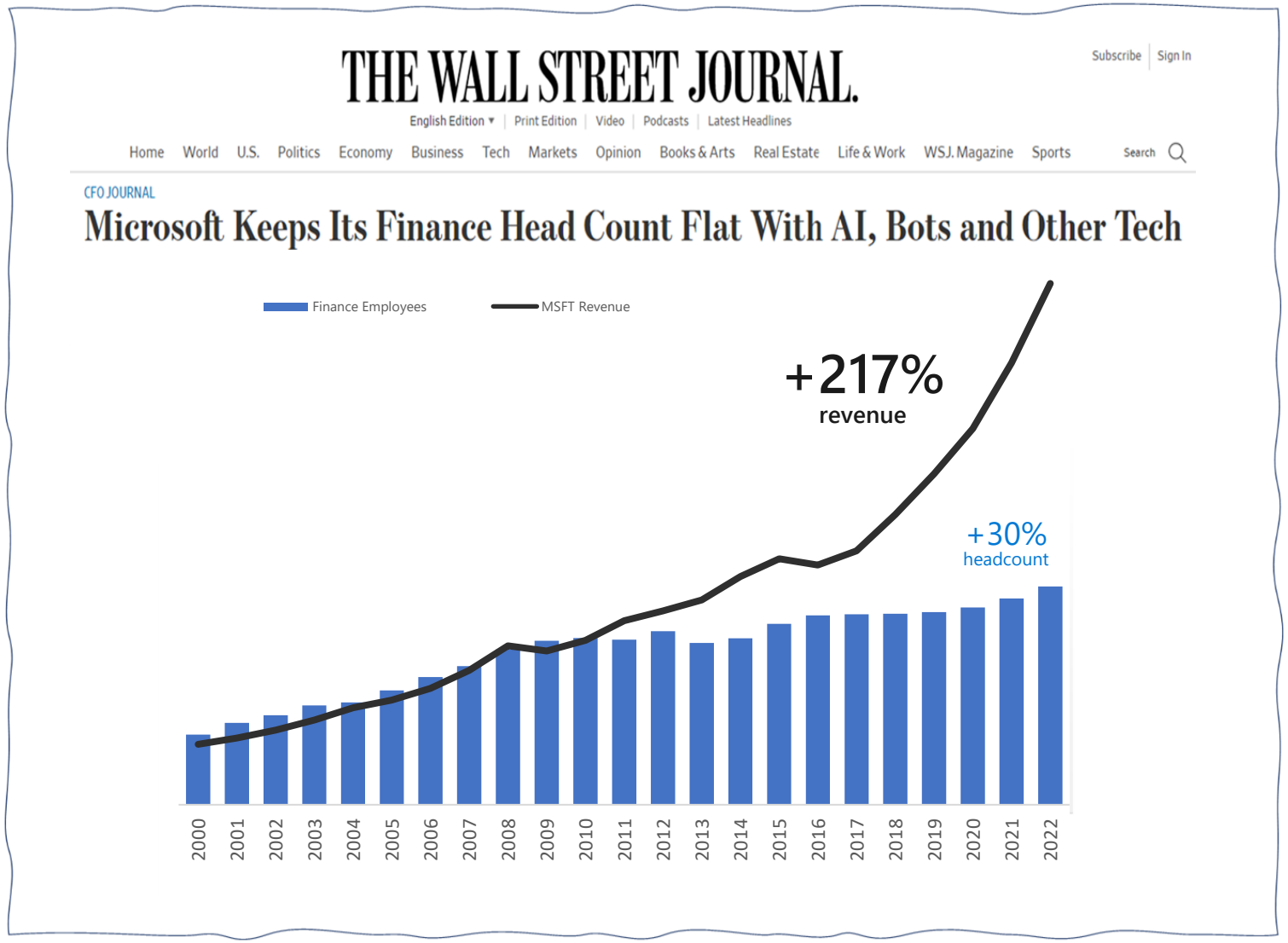
Solution:

Advanced, end-user consumable technologies (including out-of-box integration with SAP S/4Hana systems), providing business relevant insights, advanced ML and business user consumable AI

Microsoft Approach

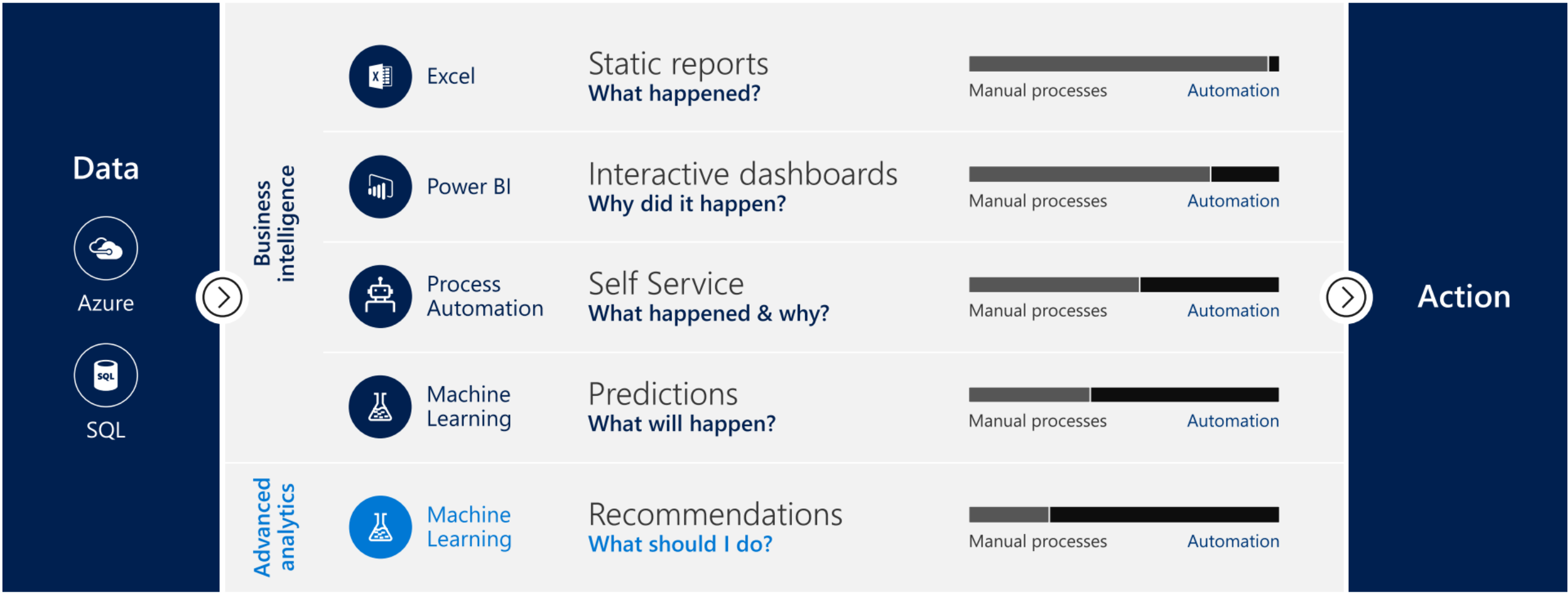
The AI Era of Modern Finance

- The “Why”: decouple cost from growth and increase impact



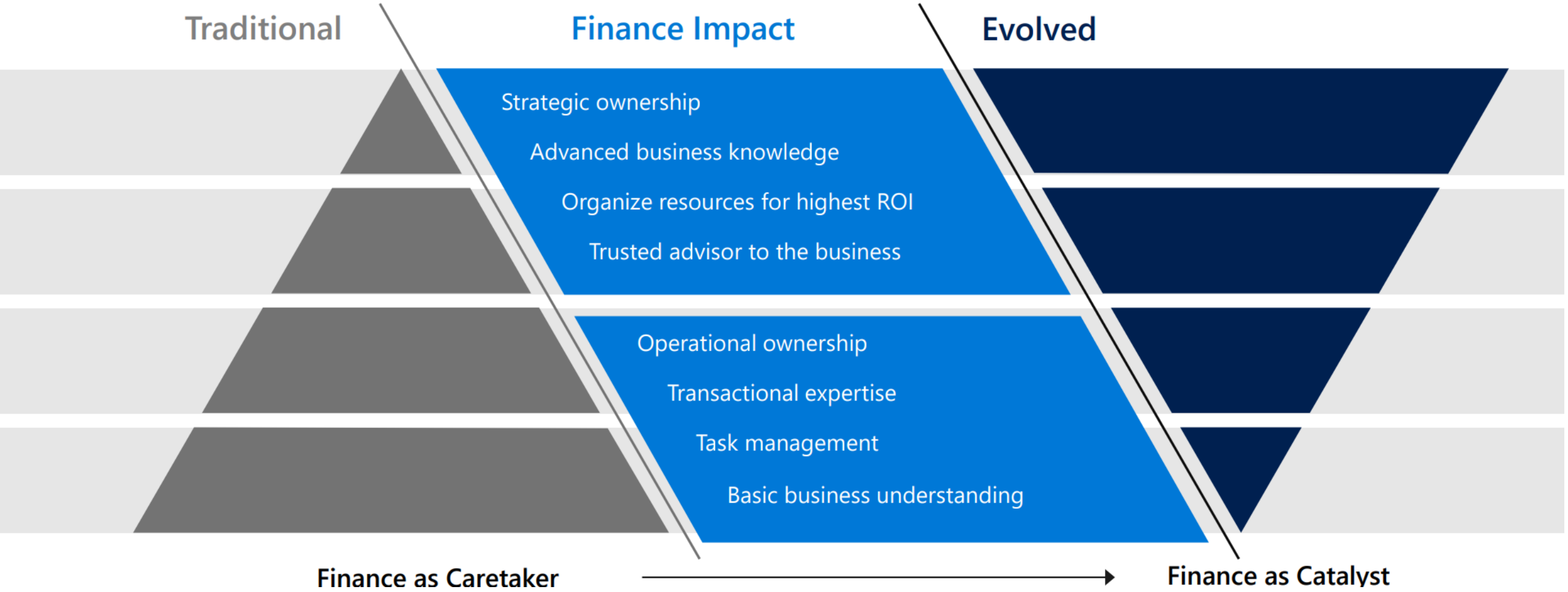
“By adopting innovative technologies, finance will strengthen its business leadership through compliance, accuracy, and efficiency.”

Technology Shortens Time to Value



Value

Finance Leaders are repositioning to be a catalyst for business transformation and value creation



The 4 Pillars of Microsoft Finance's Digital Transformation

Microsoft’s Journey

25+ years of partnership innovating with SAP for our customers

1989 Technology agreement

1993 Microsoft becomes SAP customer

Intel and Microsoft collaborate with SAP for early access to SAP solutions

1997 SAP R/3 on SQL Server and Windows NT

2001 SAP .NET connector

2005 SAP is SQL Server 2005 launch partner

2009 SAP HANA is officially launched with Intel as the reference architecture

Office announced as native SAP UI

2013 Azure certified for Netweaver

The entire SAP HANA memory-management layer is mapped to Intel "Optane" persistent memory (PMem)

Azure certified for SAP HANA

World's first public demo of Intel Optane with persistent memory with SAP HANA

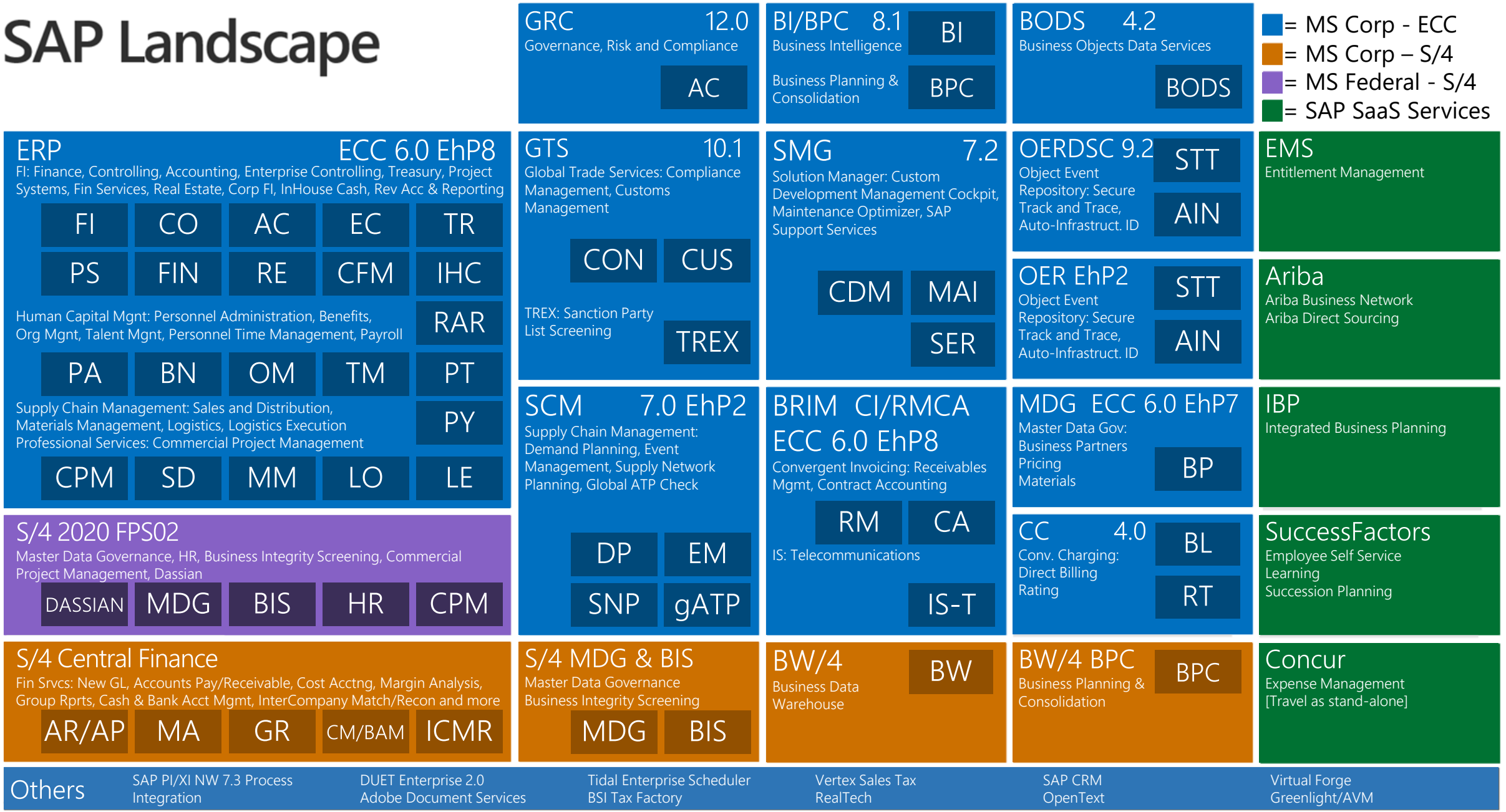
2018 EMBRACE agreement

2019 RISE with SAP

2021 RISE with SAP Expansion

2022

SAP Landscape



Pillar 1: Our data platform transformation for Analysis & Reporting

From manual, static, inconsistent to automate, dynamic, and centralized

Planned to build Data solution based on Analytical Framework

Combined forces to have **one set of procedures, rules and definitions**

Consolidated to one data source and structured output data into a standard architecture

Used powerful apps and plugins to give data structure

Output data to quickly and effectively analyze

100+ Data Sources

Finance Data Warehouse

Custom Mapping

Analytics & Reports

Pillar 2: Utilize Machine Learning to Transform Forecasting

Goals	Challenge's pre-ML	ML opportunity
Accuracy	Conscious & unconscious bias Layers of management judgment Undesirable error rate	No human bias No management judgment Highly accurate statistical model
Time-to-market	3 weeks to produce a forecast Unable to react to market changes	30 minutes to produce a forecast CFO can react to market changes
Efficiency	Hundreds of analysts forecasting Data & tool issues	Analysts can work on higher ROI projects No data & tool issues

Using ML to transform financial forecasting

From:

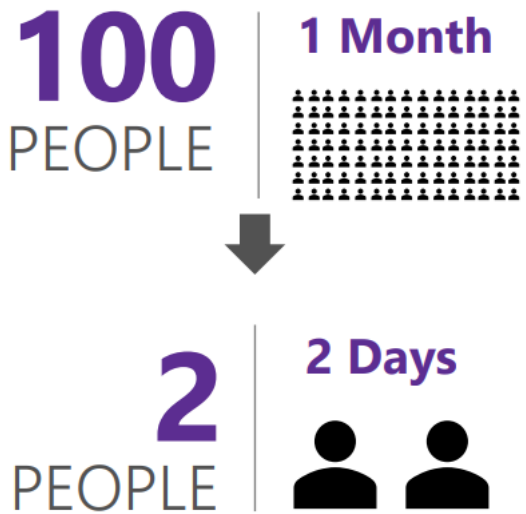
Local & product forecasts → Management reviews → Global & executive reviews

100+ analysts build Excel forecast models 2 weeks prior to quarter end

Over 1-2 weeks, product and sales leads use their expertise to judge up/down the forecasts

CFO and HQ finance teams push product and sales teams to land balanced, closest-to-the-pin forecasts

To:



AI in Enterprise Functions

Applied AI examples from Microsoft

Finance process	AI integration	Efficiency
Record to report Scaling commercial contract reviews	Reads 10K contracts and provides risk scoring to tag 30% that require an assessment by a technical accountant and to zero in on flagged terms	↓ 50% less time reviewing standard contracts
Order to cash Augmenting collection prioritization	Identifies accounts receivable customers deemed high risk of delinquency then generates a prioritized workflow list to speed up cash collection calls	↑ 10% collection efficiency
Tax & treasury FX cash collection forecast	Centralizes FX cash collection forecast, frees up time for subsidiary to prepare and submit forecast, improves forecast accuracy by 6% and reduces FX impact on other income by 25%.	↓ 25% FX impact on other income
Planning & analysis Forecasting with machine learning	User-friendly tool that applies 25+ models to thousands of time series in parallel, automatically handling feature engineering, back testing and model selection to deliver results in minutes	↓ 50% less time on forecasting
Procure to pay Streamlining invoice approvals	Assigns real time risk scores in order to automate more than 1M low-risk invoices and cutting manual effort for the rest by 50%	↓ 125K hours saved per year
Risk management & compliance Journal entry anomaly detection	Machine learning algorithms built to review thousands of journal entries to detect anomalies in order to reduce financial reporting risks of fraud or misstatements	↓ 15% time savings

How AI Copilots may assist in the future:

Journal entry anomaly detection

- Identify anomalies in journal entries
- Recommend if existing documentation supports the journal entry
- Validate journal entry approvers

Based on historical data, are there any journal entries which have been booked to infrequent General Ledger accounts?

Yes, 20 material journal entries were booked to a seldom-used property account this quarter.

Out of the 20 journal entries, which one is the most material entry?

The most material dollar value entry was $54,000,750.

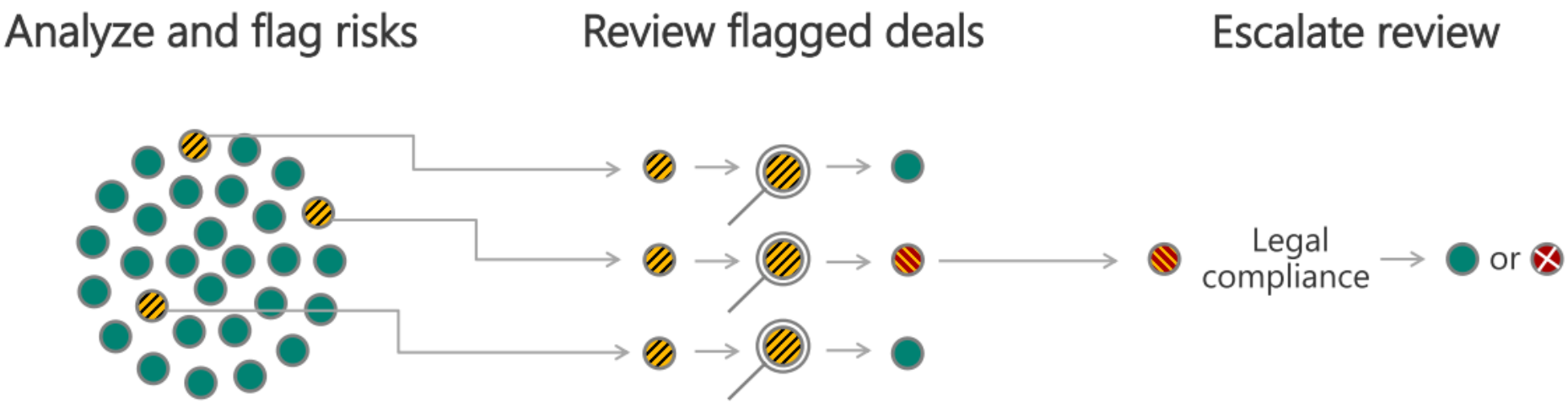
Does the documentation support this entry?

The attached excel spreadsheet does not support the entry created, I could not reconcile the support to the $54,000,750 amount in any of the cells.

Was the journal entry approved by a full-time employee?

No, the entry was approved by someone with vendor credentials.

Pillar 3: Digitizing Risk Management



Ingest and integrate

Train risk model

Score deals

Flag outliers for review

Initiate review

SME contribution

Finance review

Compliance Conclusions

Defining and identifying a high-risk deal

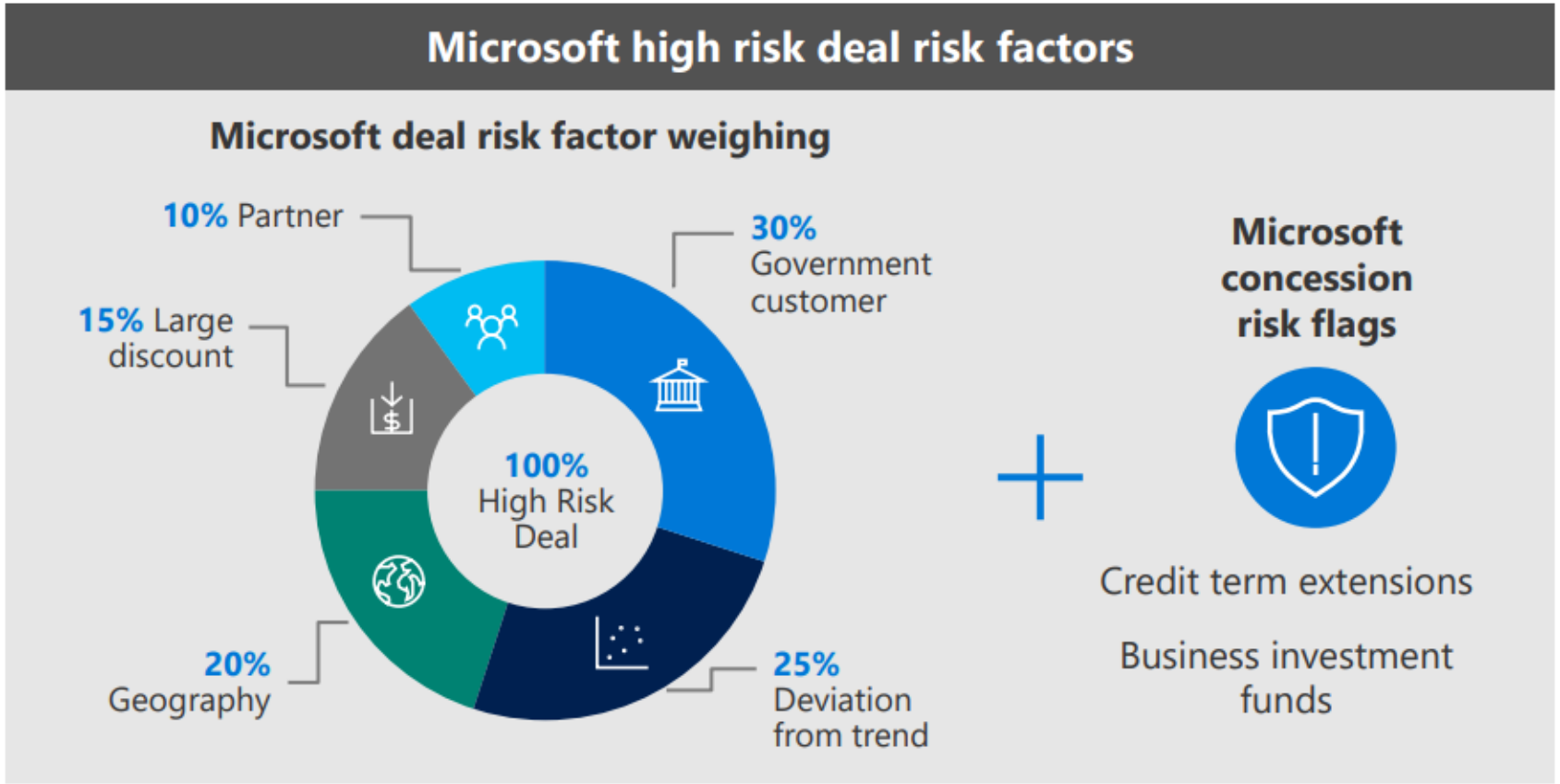
Core concept: a single risk factor may not itself be significant to identify high risk transactions. Yet, a deal **having 'signals' from multiple risk factors** can produce unique insights **compared to evaluating each factor on its own**.

Sample risk potentials

- Geography
- Government customer
- Discounts
- Trend of deal size
- Partner

Concession risk flags

- Credit term extensions
- Business investment funds



Pillar 4: Business Process Automation

Key Capabilities to Unlock Value

MSFT Data and AI Solutions

have become a key Value Driver and Differentiator for our customers

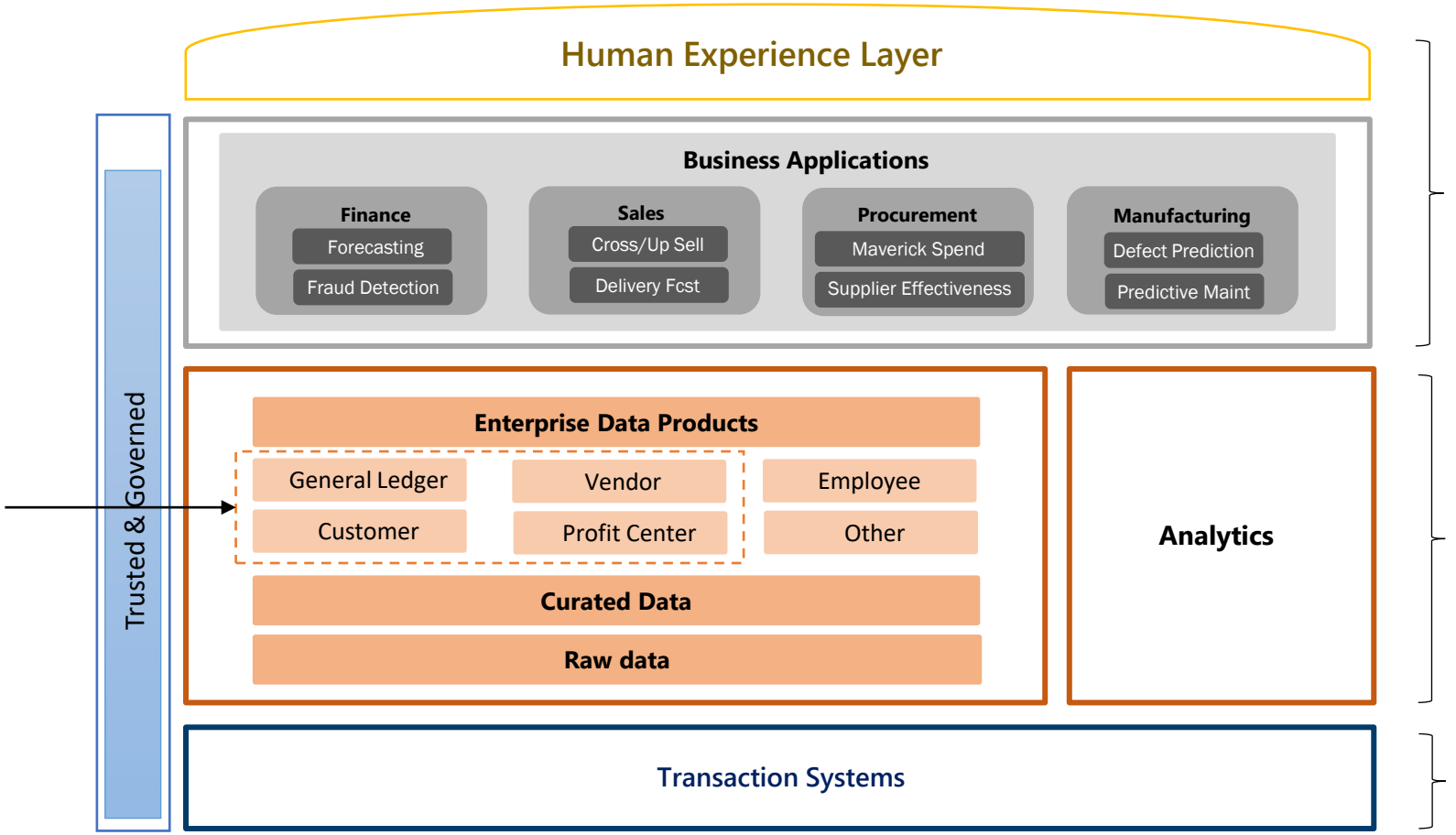
- Microsoft AI solutions and advanced analytics is a **value multiplier** for customers' SAP investments
- Moving SAP workloads onto Microsoft Azure **unlocks the transformation potential** through providing access to Microsoft generative AI and advanced analytics
- Becomes the **foundation** for this next generation Innovation

Enterprise Reference Architecture

Big Picture

Data assets, when rooted deeply within an enterprise's framework, provide the foundation for consistent, scalable, and reliable analytics and AI.

Microsoft capabilities for SAP S/4HANA as central Data Product for enterprise (schematic)

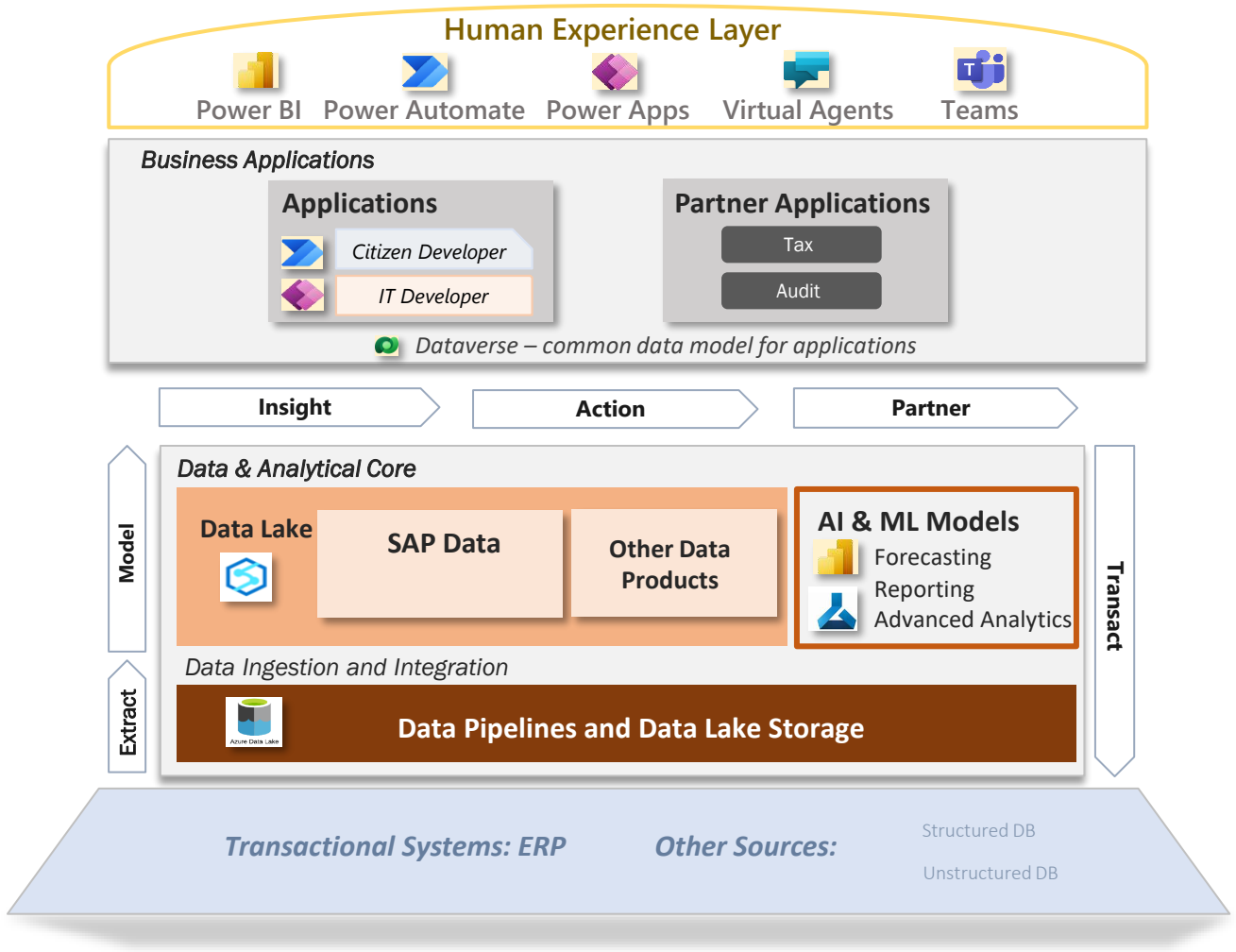


Microsoft Data Solutions

Enabling enterprise analytics

Capabilities for SAP S/4 Hana offers:

- ✓ Consistent, governed visibility to data lineage and flows
- ✓ Deployable data models in the Azure data lake for SAP subjects
- ✓ PowerBI dashboards and reports for SAP use cases
- ✓ Data mapping and transformation for requited SAP data flows



Demo

How You Can Get Started

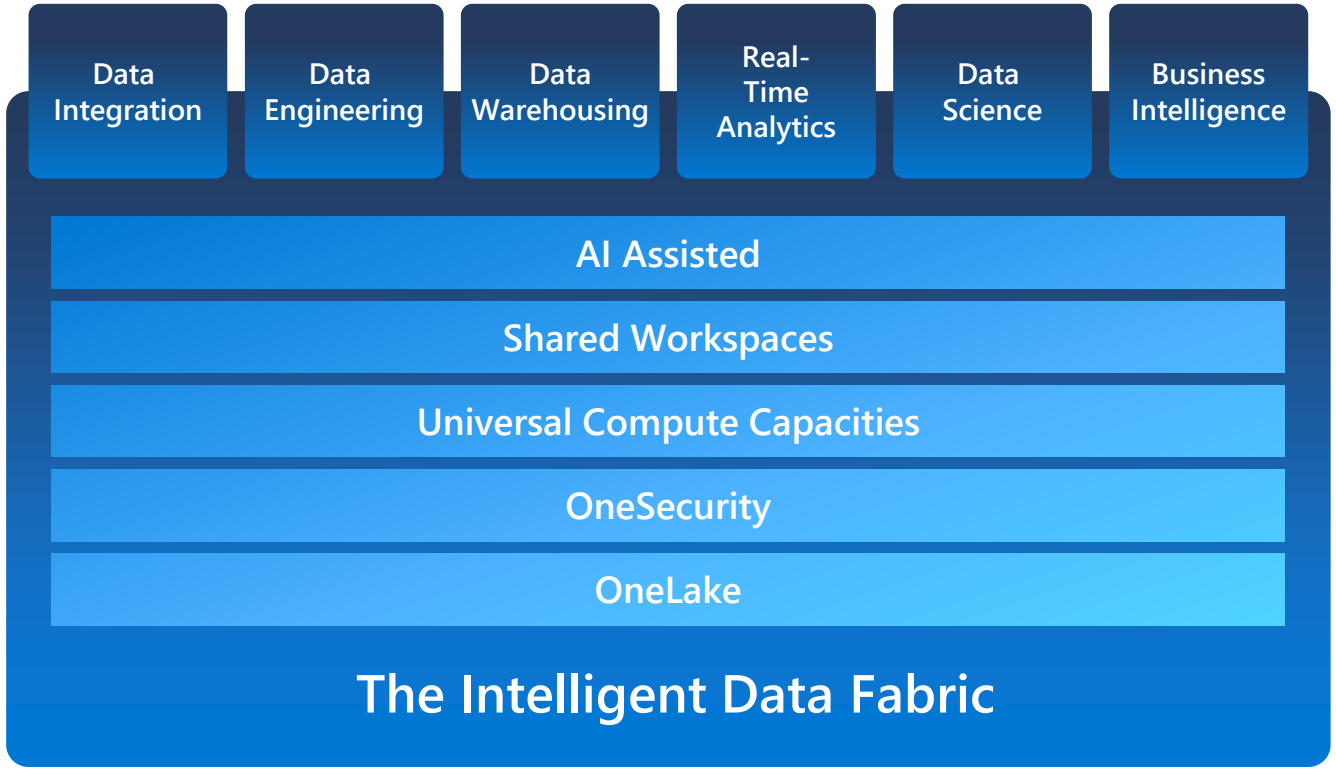
Microsoft Fabric

Data Integration | Data Lake | Spark Engines | Data Warehouse | Real Time Analytics | Data Science | Business Intelligence | Governance

Unified analytics fabric

End-to-end analytics data fabric
From the data lake to the business user

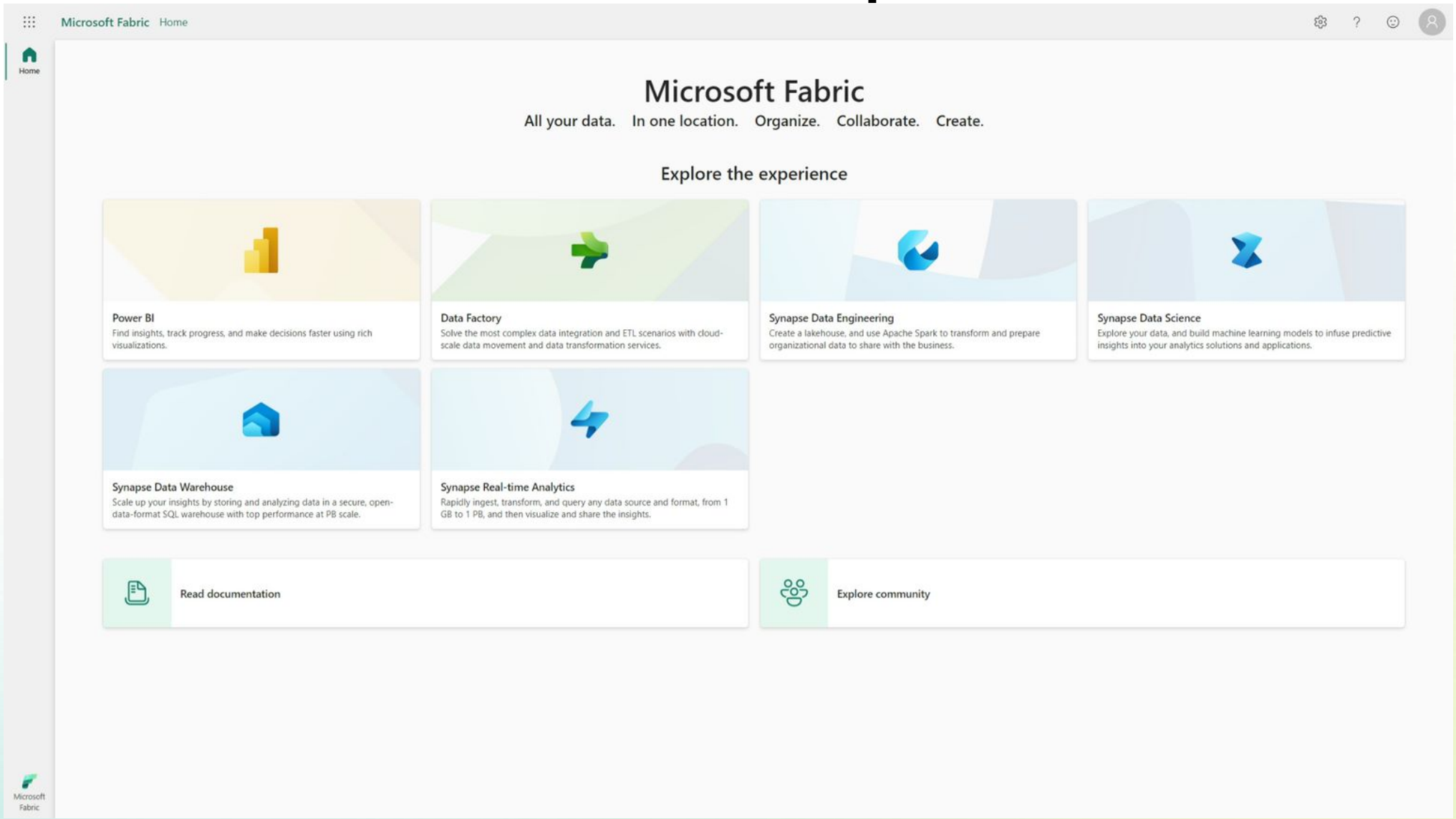
Microsoft Fabric



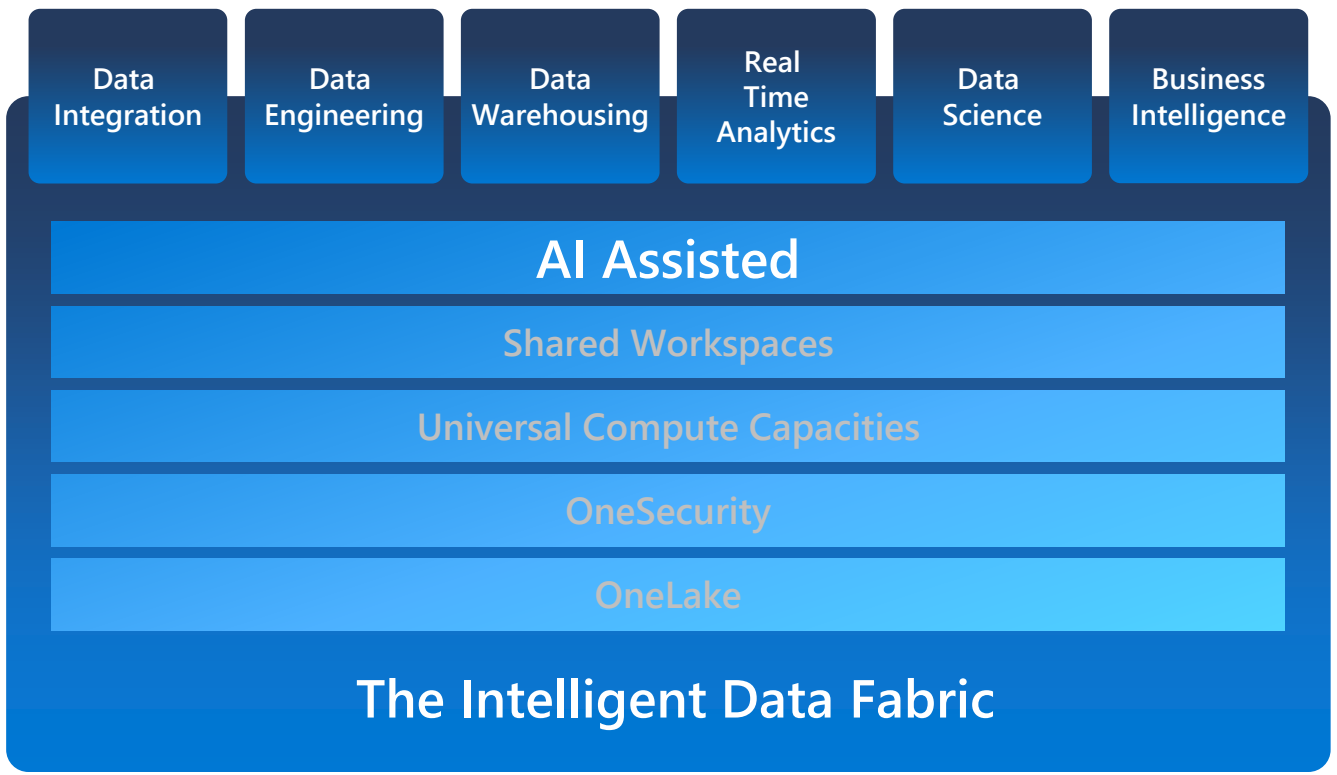
Single...

- Onboarding and trials
- Sign-on
- Navigation model
- UX model
- Workspace organization
- Collaboration experience
- Data Lake
- Storage format
- Data copy for all engines
- Security model
- CI/CD
- Monitoring hub
- Data Hub
- Governance & compliance

Persona Centric Experiences



AI Assisted Creation in Microsoft Fabric



The Fabric platform includes built in Azure Open AI based assistant that will serve all the workloads

First GPT-based feature is already shipping in Power BI - NL2DAX – DAX calculation creation based on natural language prompts

Ongoing major ramp-up for pervasive AOAI based product-wide AI assistance

Machine Learning Roles in Finance

Finance Business Owners

- **Define business problem(s) and desired outcome(s)**
- **Provide requirements, model evaluations, and signoffs**
- Manage change including how data will be used in decision making processes
- Identify and utilize insights to generate value and actions

Data Analysts

- Provide a solid understanding of Microsoft data sets for data acquisition and generating business rules
- **Integrate machine learning output with traditional business intelligence and action frameworks**
- **Build Power BI reports and visuals**

Center of Excellence

Strategy
Operating Model
Governance
Optimization

Data Scientists

- Retrieve, cleanse and map data
- Design, test and evaluate hypotheses
- **Customize and tune models to discover and learn from the data**
- **Apply existing algorithms and models to new business problems**
- Innovate to discover new algorithms &/or statistical models

Architects & Engineers

- Deliver available, scalable, secure, and fault tolerant infrastructure
- Create and deploy solutions, platforms and end user experiences
- Stitch APIs together, automate models and integrate data

FORECASTING

Lessons learned

- Have conviction on ROI and other benefits
- Stakeholder buy-in is essential
- Think about where centralization makes sense
- Try, fail, learn, improve
- Understand the machine learning “black box”
- Continuous improvement
- Finance + data scientists
- Feature selection responsibility

PROCESS AUTOMATION

Lessons learned

Grow tech insights across all career stages

Reimagine the ideal process before automating

Automation and compliance go hand-in-hand

Create and own your automation roadmap

Try, fail, learn, improve

Wrap up

- Creating the right data foundation is essential to creating the future digital transformation you want
- Unfortunately diverse legacy landscapes combined by composable, plug-and-play architectures makes this challenging.
- You need a robust location to consolidate information, recognizing it must be flexible enough to evolve with requirements
- But **TECHNOLOGY IS NOT ENOUGH** – you must create the people and processes to drive the business outcomes required

Where to Find More Information

- Microsoft's Financial Transformation Journey

  https://www.wsj.com/articles/microsoft-keeps-its-finance-head-count-flat-with-ai-bots-and-other-tech-11644489001

- Microsoft Fabric:

  https://www.microsoft.com/en-us/microsoft-fabricsider.org

- PowerBI CoPilot:

  https://powerbi.microsoft.com/en-us/blog/introducing-microsoft-fabric-and-copilot-in-microsoft-power-bi/

- Modern Finance at Microsoft

  https://www.microsoft.com/en-us/modernfinance/digitaltransformation.aspx

Key Points to Take Home

- Advanced technologies to predict & **interpret** your SAP data are realities today
- Microsoft Finance created significant savings and identified value through deployment of these technologies
- We’re making these technologies available to our customers to drive better returns for our ERP customers
- These solutions can be easily deployed in the cloud – even if your ERP is still on-premise
- Through self-service BI and analytics end-users can be empowered to unlock their own informational insights

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