

Microsoft Fabric

Er dette fremtiden for dataanalyse?

DynUG 22. november
Marthe Moengen og Trond Brande









Marthe Moengen

Managing Data Analyst

- Data Saturday Oslo
- MDPUG Norway
- Fabric February
- WITs Who Lunch Oslo

- Data Architecture
- Data Governance, Data Catalogs, MDM

- When not geeking
 - Outdoors
 - Trad climbing and skiing

-  @mmoengen
-  data-ascend.com
-  /marthemoengen
-  marthe.moengen@soprasteria.com



Trond Brande

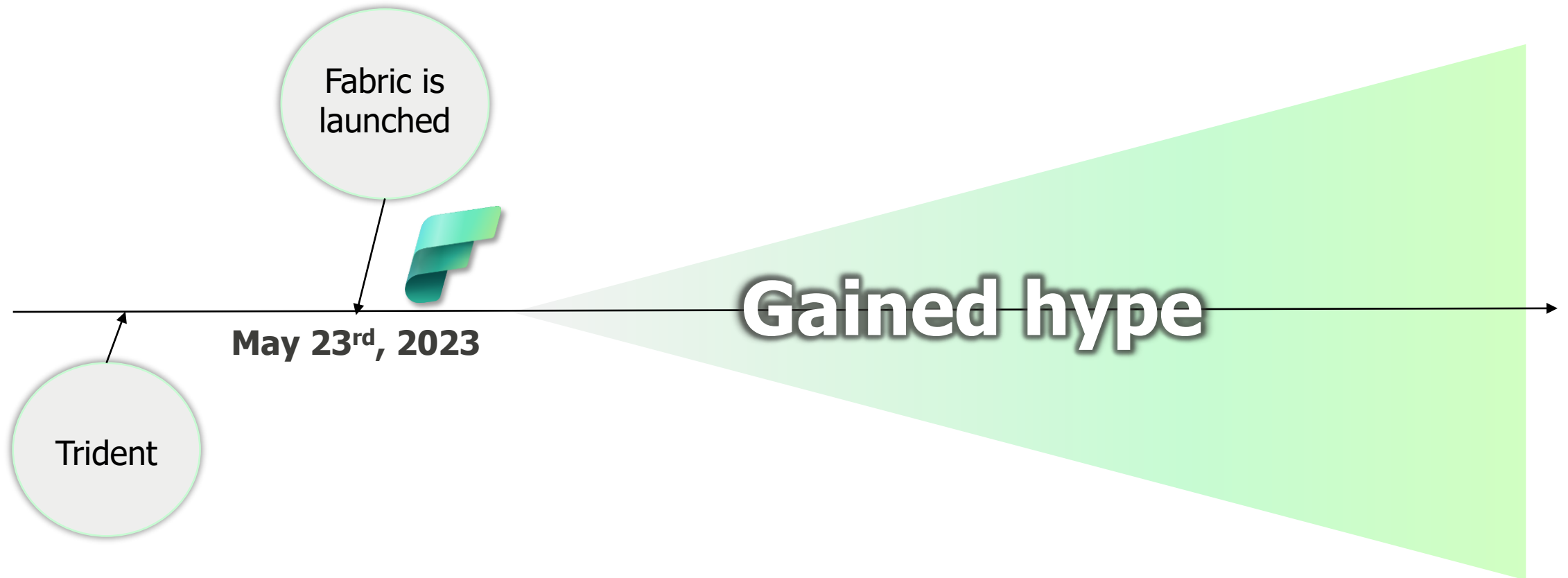
Senior Manager

- 10 years @ Microsoft
- Data Architecture and Analytics
- When not geeking about Analytics
 - Geeking about wine

 /trondbrande

 trond.brande@soprasteria.com

What happened?



What happened?



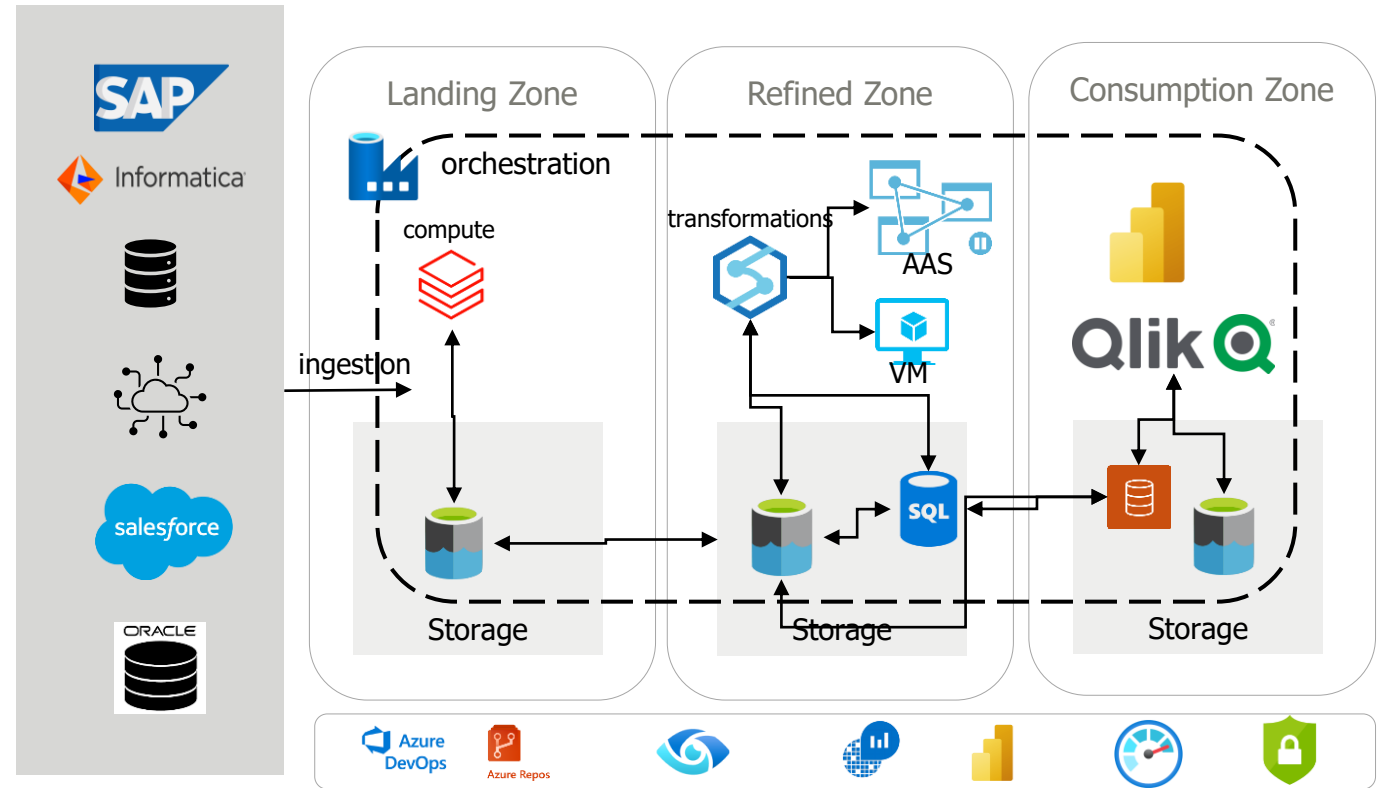
All-in-one analytics solution for enterprises
From the data source to the business user

What happened?

Why is Fabric so revolutionary?



AS IS before Fabric



What happened?

Why is Fabric so revolutionary?

Challenges

Multiple tools and vendors

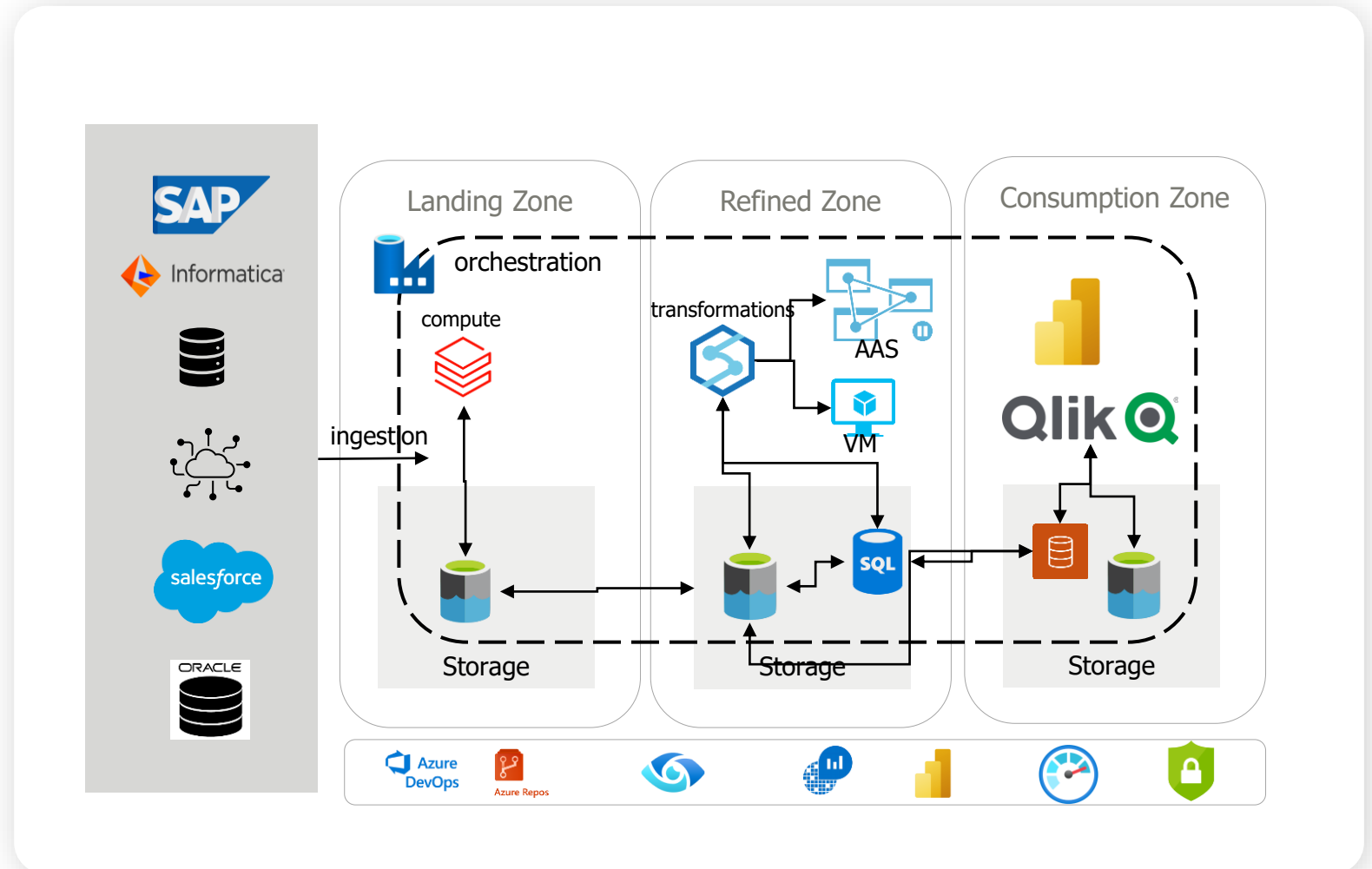
Multiple storage areas

Integration at scale is complex

Governance and monitoring is complex

Multiple specific technical skills are required

Duplicates and multiple versions





What happened?

Why is Fabric so revolutionary?

Benefits

Multiple tools and vendors

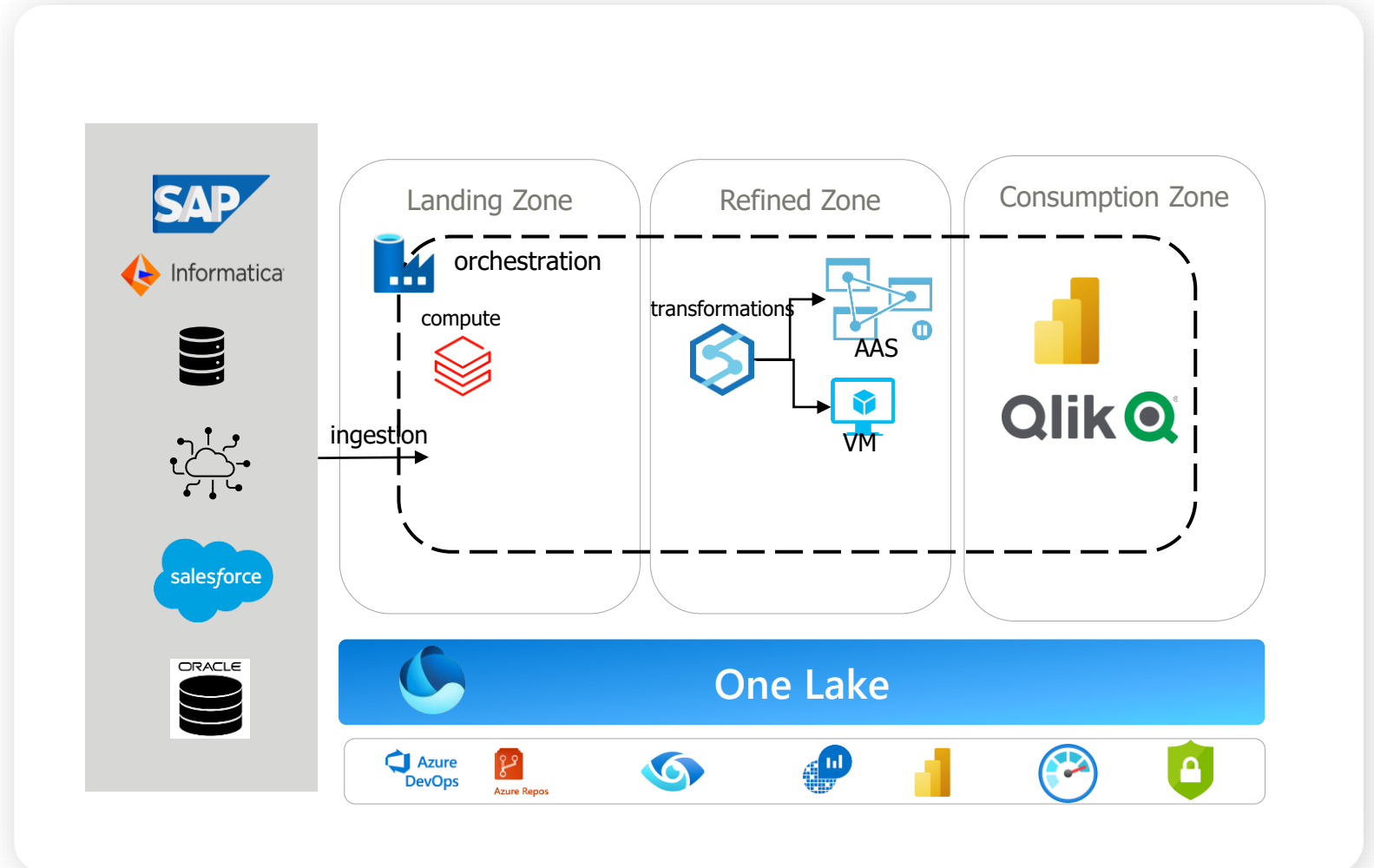
Multiple storage areas

Integration at scale is complex

Governance and monitoring is complex

Multiple specific technical skills are required

Duplicates and multiple versions





What happened?

Why is Fabric so revolutionary?

Benefits

Multiple tools and vendors

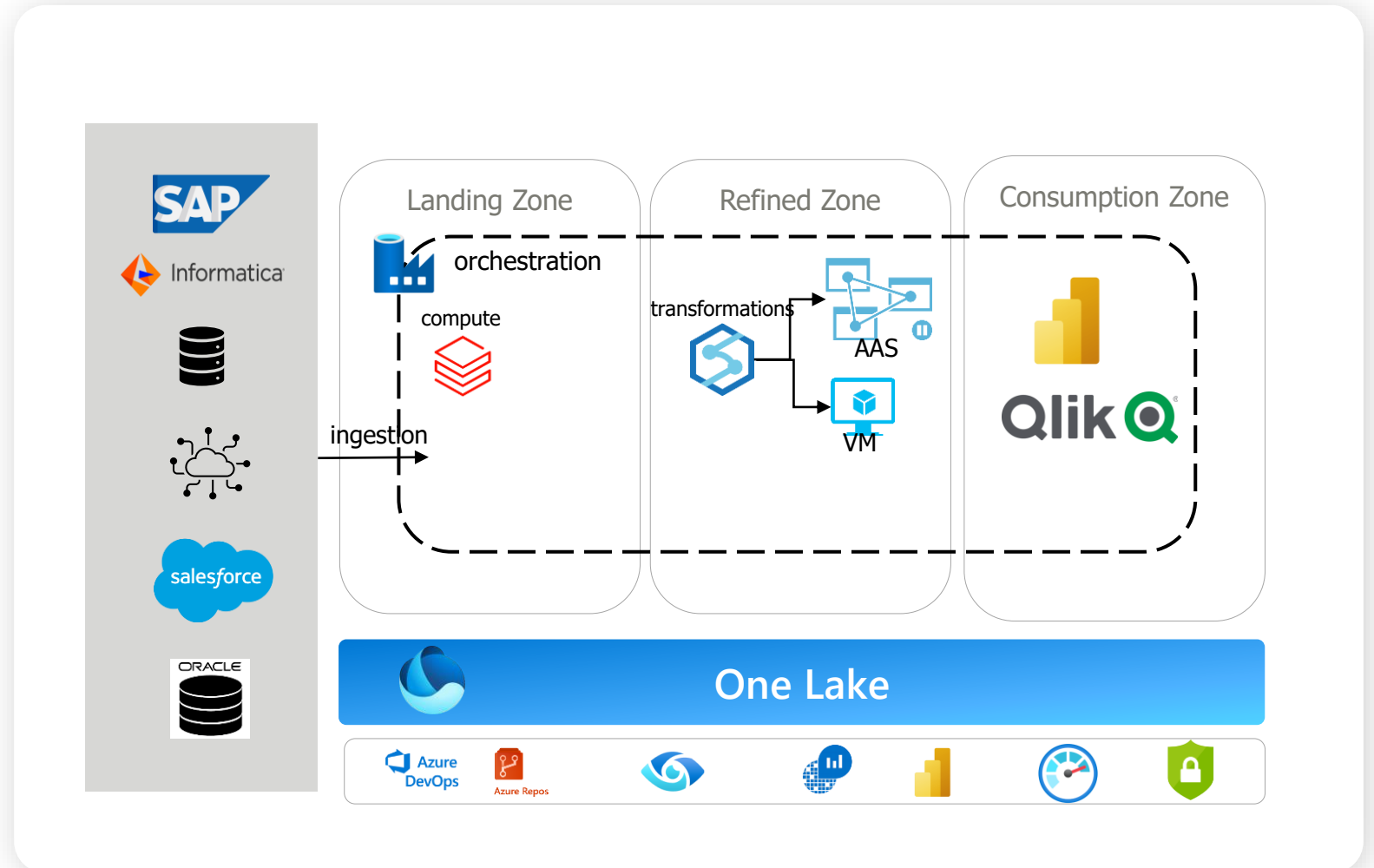
One Lake for all your data

Integration at scale is complex

Governance and monitoring is complex

Multiple specific technical skills are required

~~Duplicates and multiple versions~~





What happened?

Why is Fabric so revolutionary?

Benefits

Multiple tools and vendors

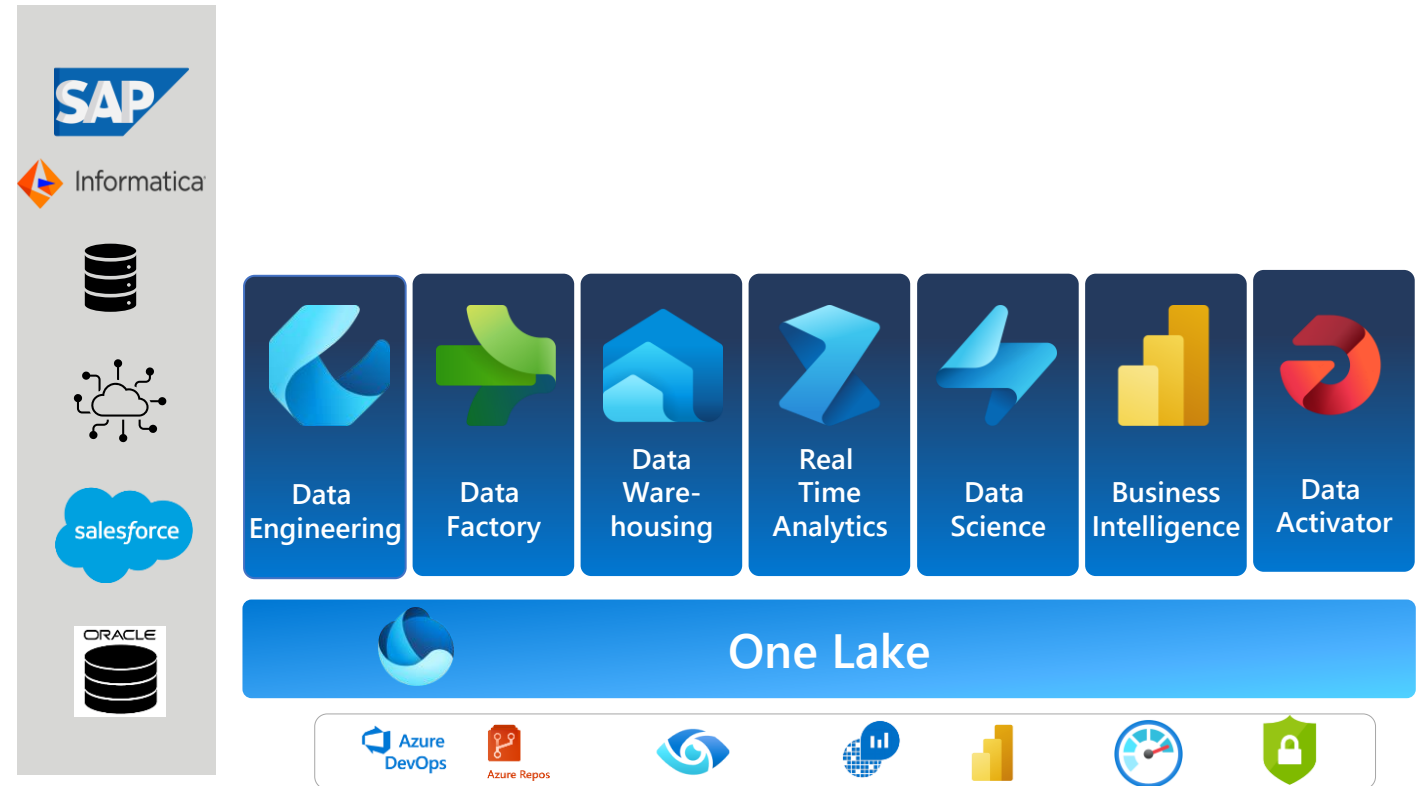
One Lake for all your data

Integration at scale is complex

Governance and monitoring is complex

Multiple specific technical skills are required

Duplicates and multiple versions





What happened?

Why is Fabric so revolutionary?

Benefits

Single storage format

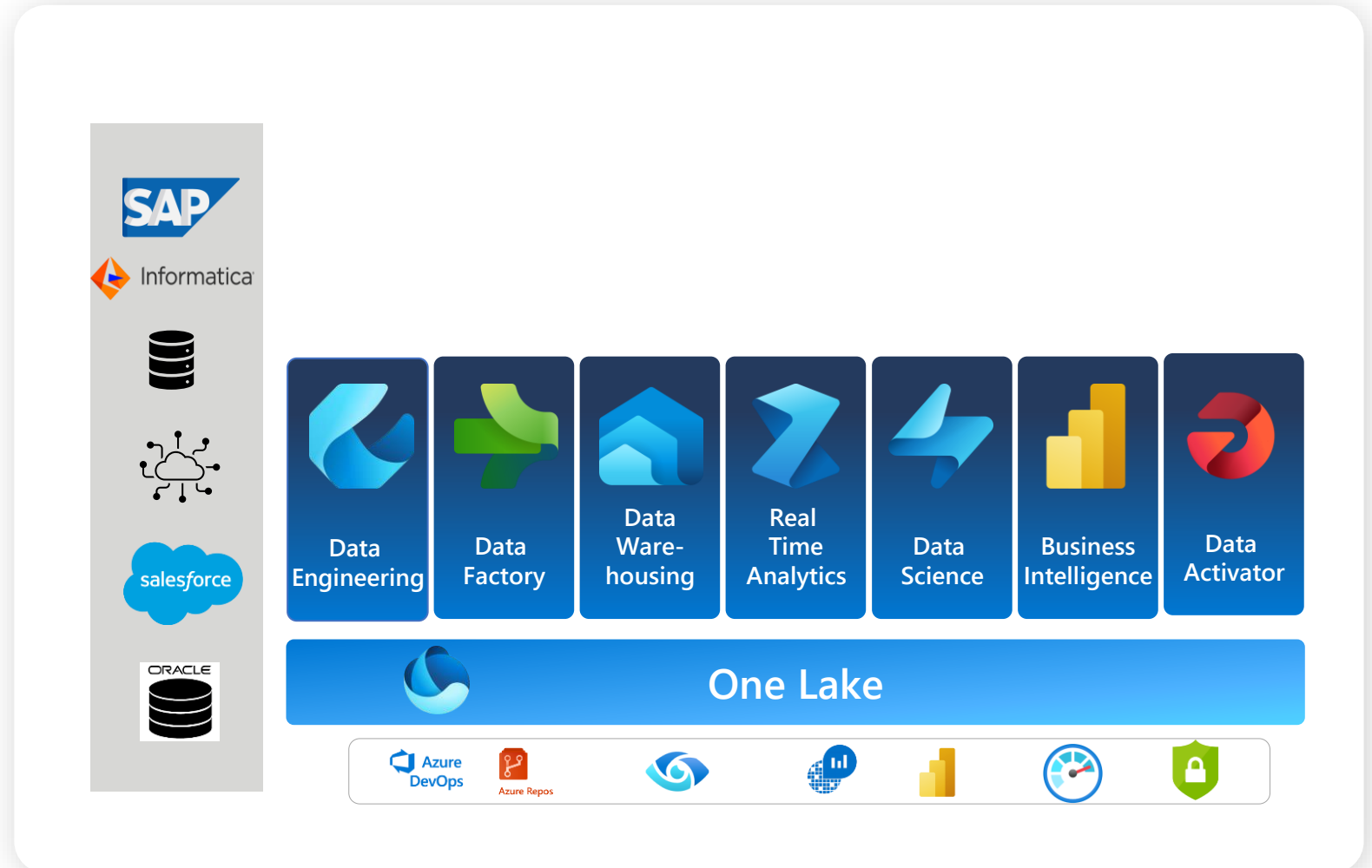
One Lake for all your data

Fully integrated by default

Governance and monitoring is complex

Collaboration experience

Flexible technical skills





What happened?

Why is Fabric so revolutionary?

Benefits

Single storage format

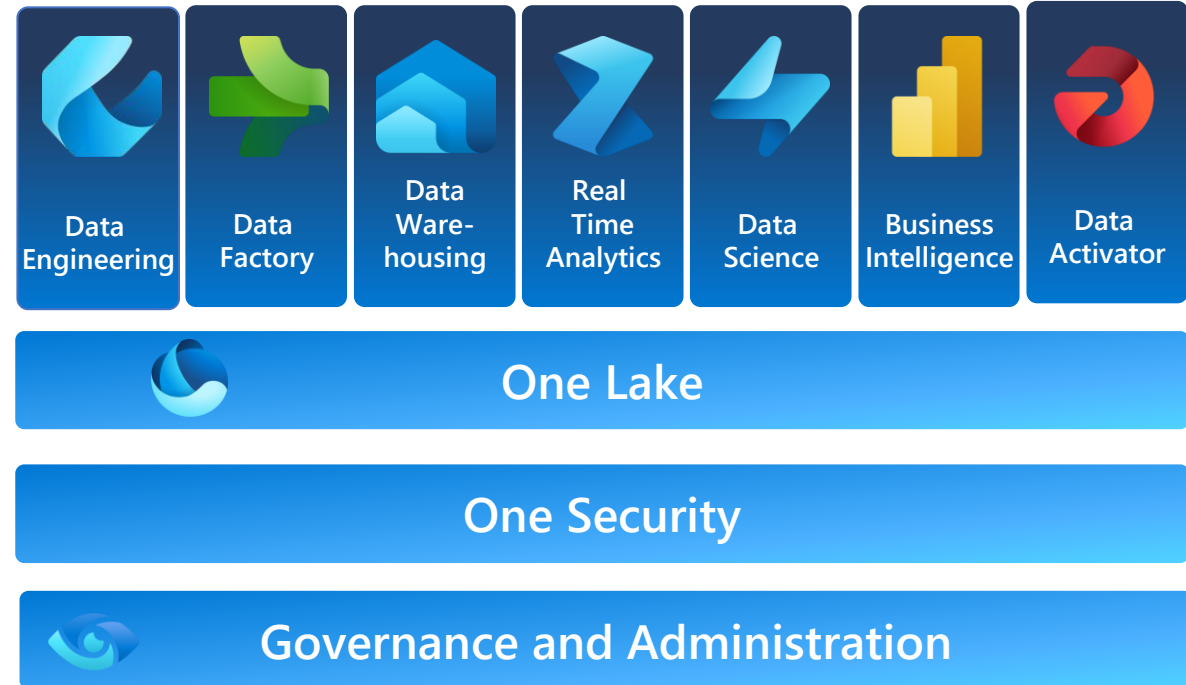
One Lake and One Copy

Fully integrated by default

Governance and monitoring is complex

Collaboration experience

Flexible technical skills



What happened?

Why is Fabric so revolutionary?



Benefits

Single storage format

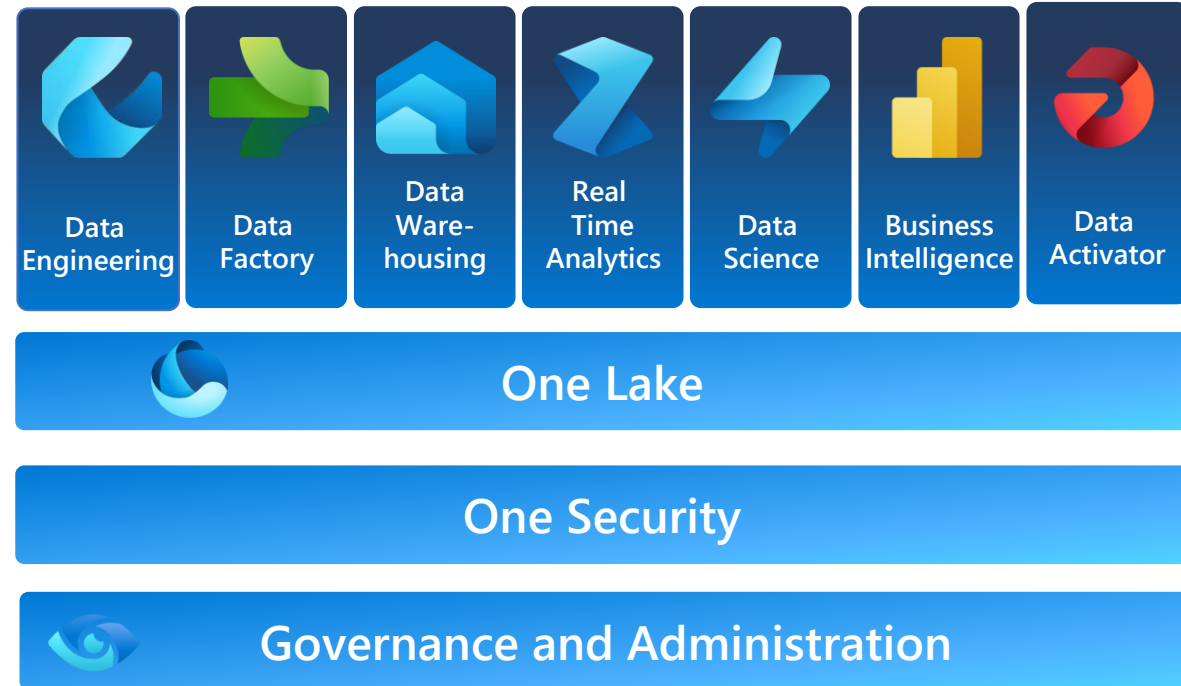
One Lake and One Copy

Fully integrated by default

Centralized administration and governance across all experiences

Collaboration experience

Flexible technical skills



What happened?

Why is Fabric so revolutionary?



Benefits

Single storage format

One Lake and One Copy

Fully integrated by default

Centralized administration and governance across all experiences

Collaboration experience

Flexible technical skills



What is Microsoft Fabric?



AI Assisted

Software as a Service (SaaS)

All-in-one analytics solution

- Data movement
- Data storage
- Data science
- Real-Time Analytics
- Business intelligence
- Data Governance
- Data Security

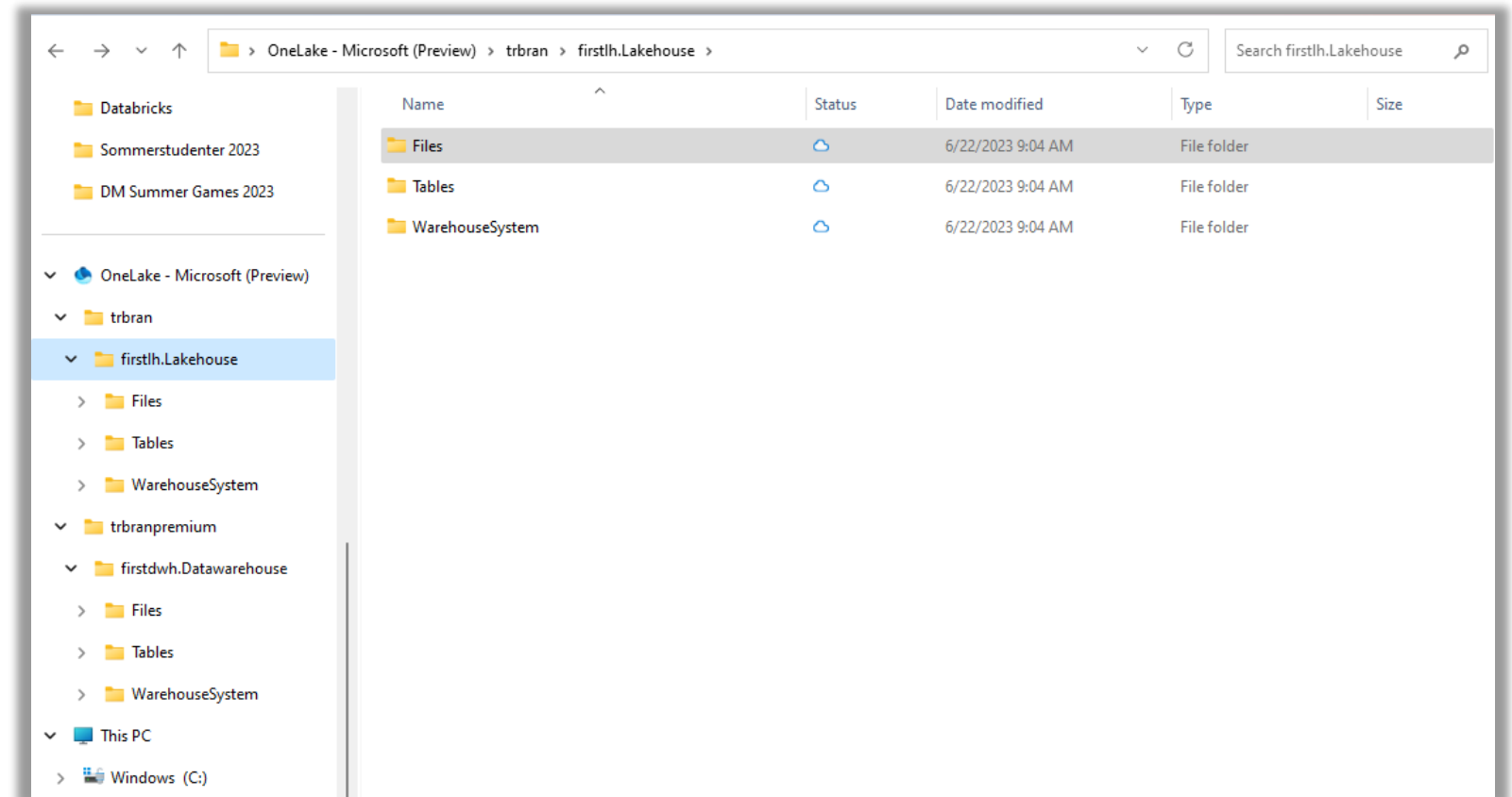
What is Microsoft Fabric?



Key features



OneLake = *OneDrive for data*





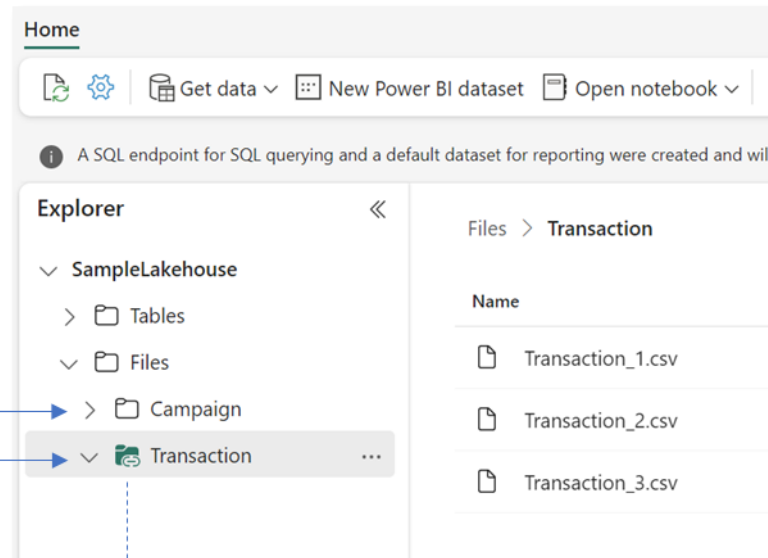
What is Microsoft Fabric?

Key features

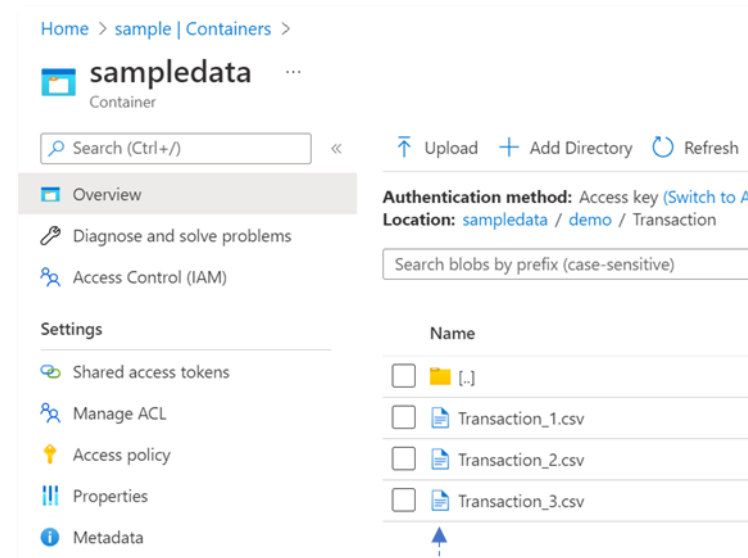


Shortcuts are objects in OneLake that point to other storage locations.

Fabric Lakehouse



ADLS Gen2 Account



Local Data

Shortcut to ADLS

Resolved Shortcut Location

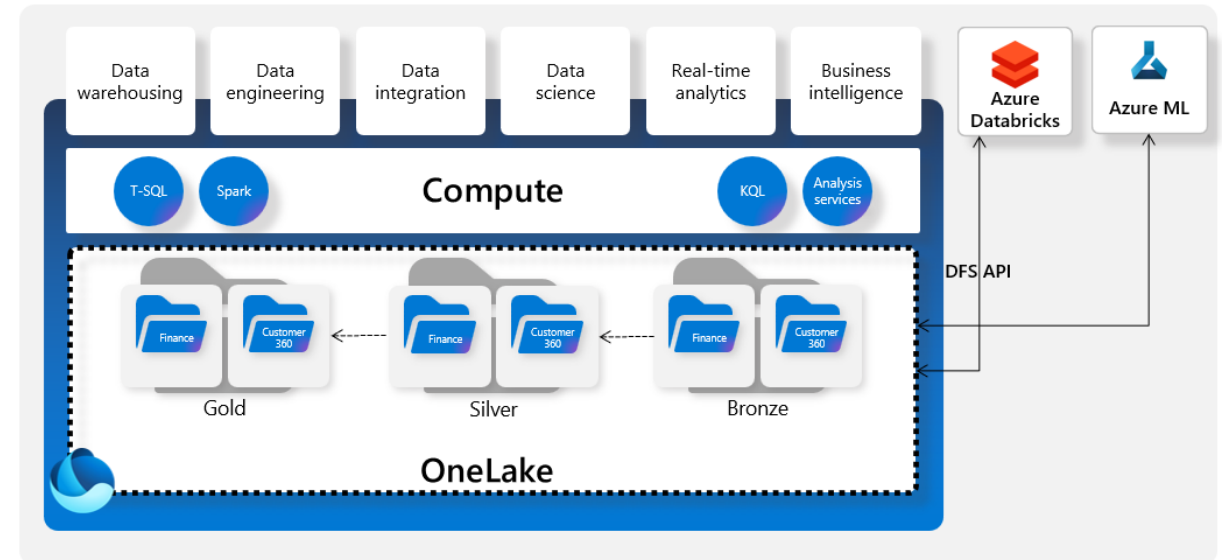
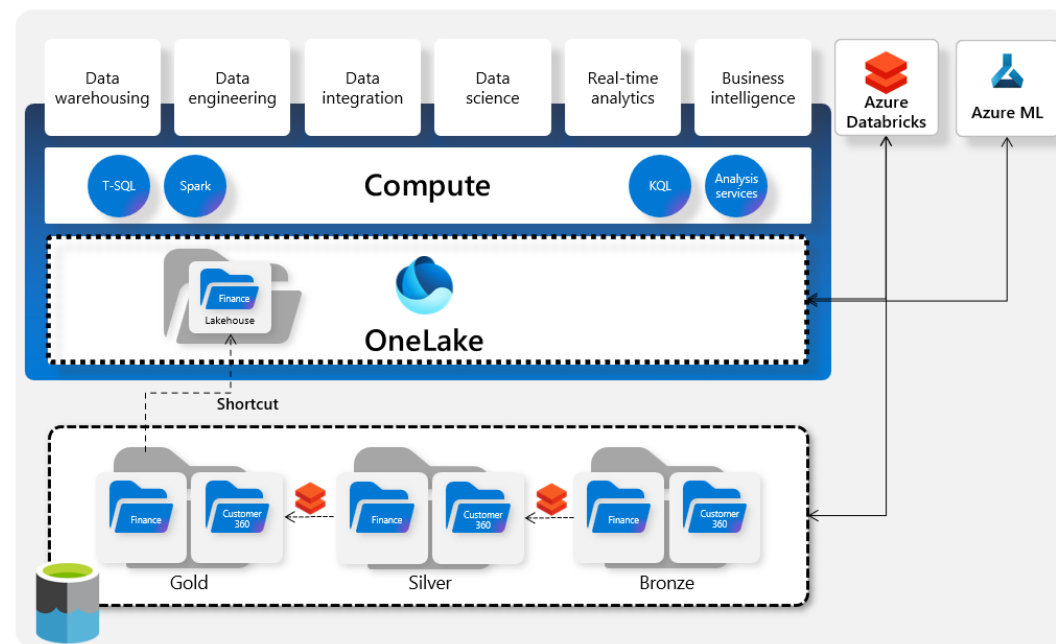


What is Microsoft Fabric?

Key features



Shortcuts are objects in OneLake that point to other storage locations.



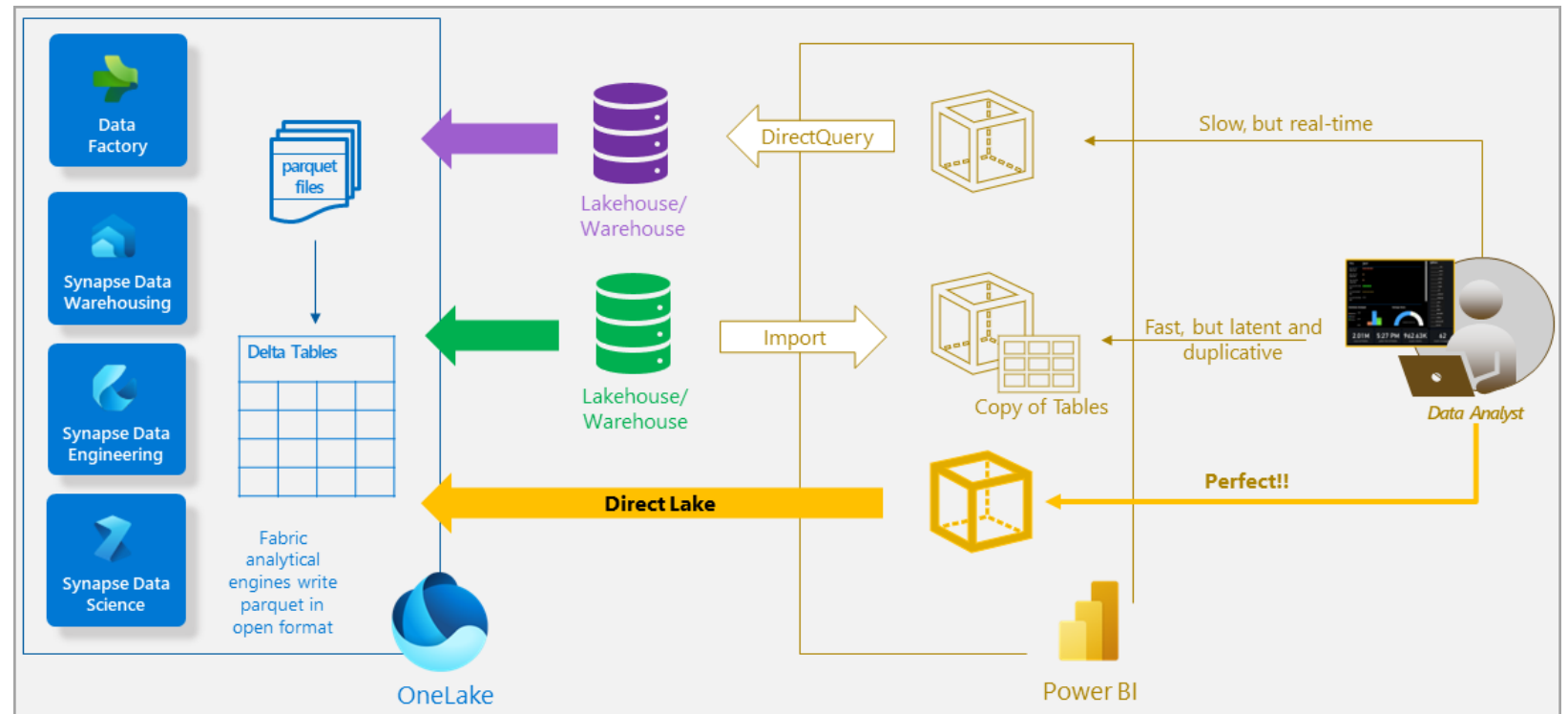


What is Microsoft Fabric?

Key features



Direct Lake is based on loading parquet-formatted files directly from a data lake without having to query a Lakehouse endpoint, and without having to import or duplicate data into a Power BI dataset.



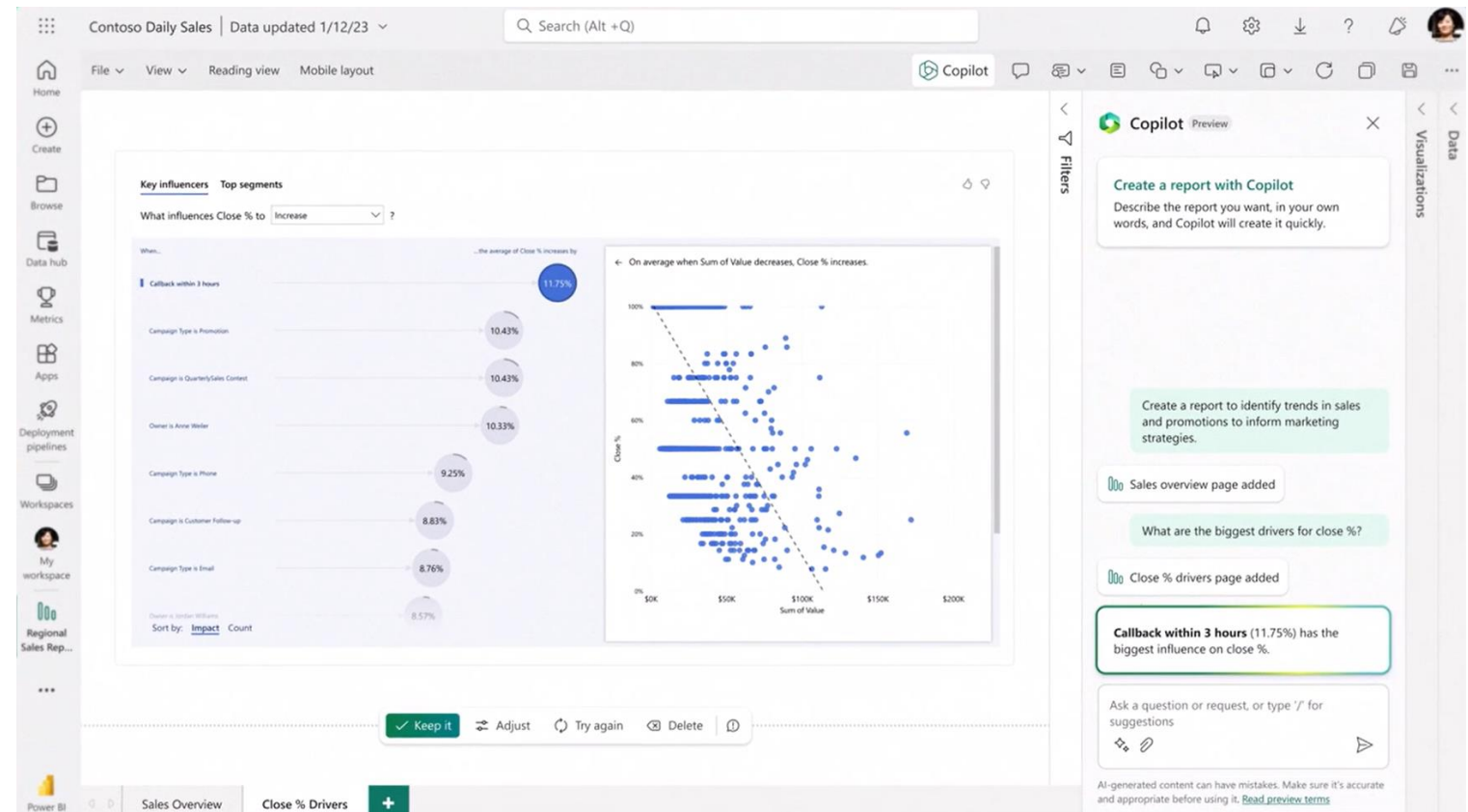
What is Microsoft Fabric?



Key features

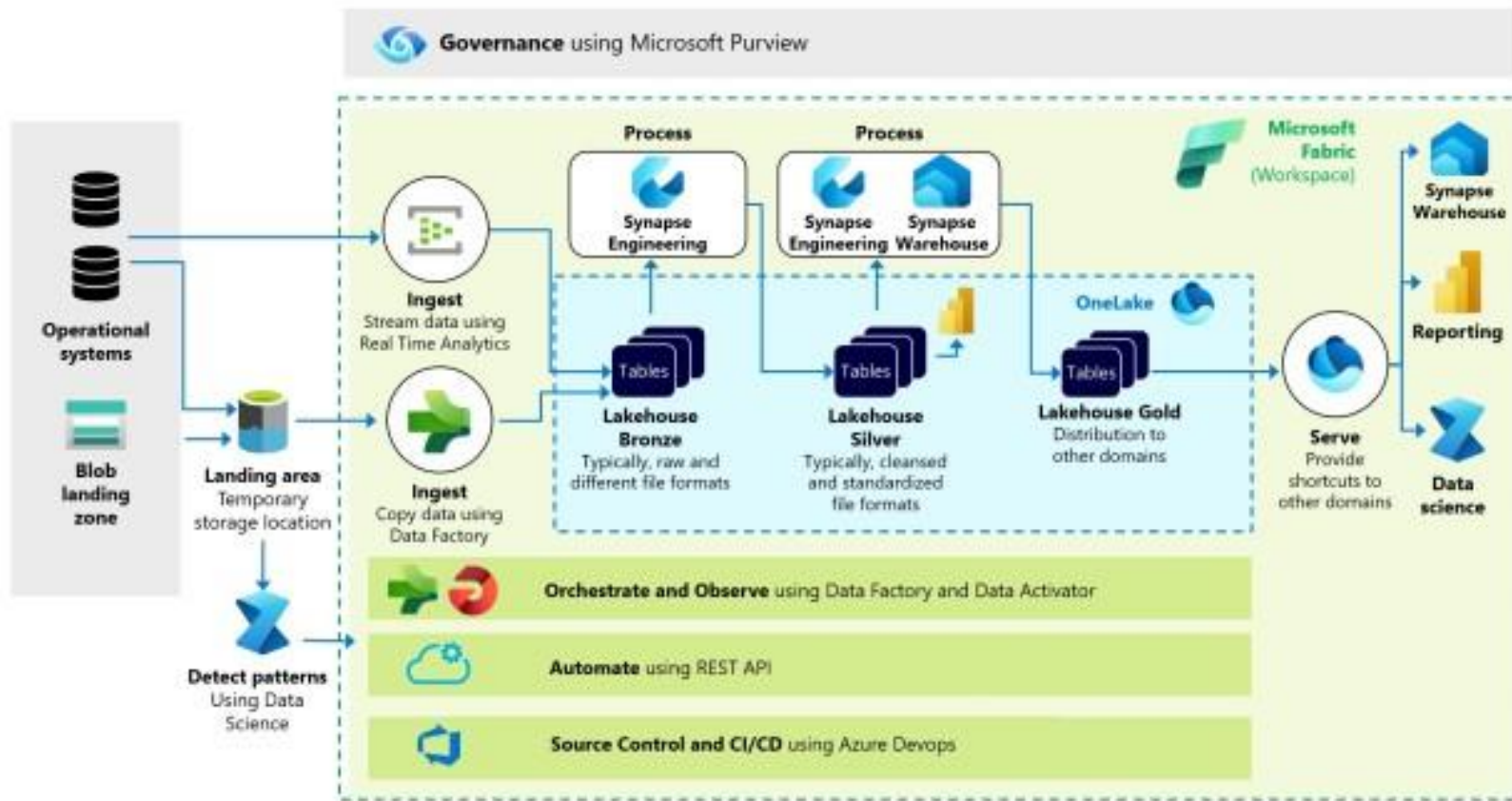


- **Power BI**
 - Create reports
 - Create calculations and measures
- **Azure Data Factory**
 - Create pipelines
- **Synapse Data Warehousing and notebooks**
 - Code suggestion
 - Clean-up and document code





All Up – Fabric Demo



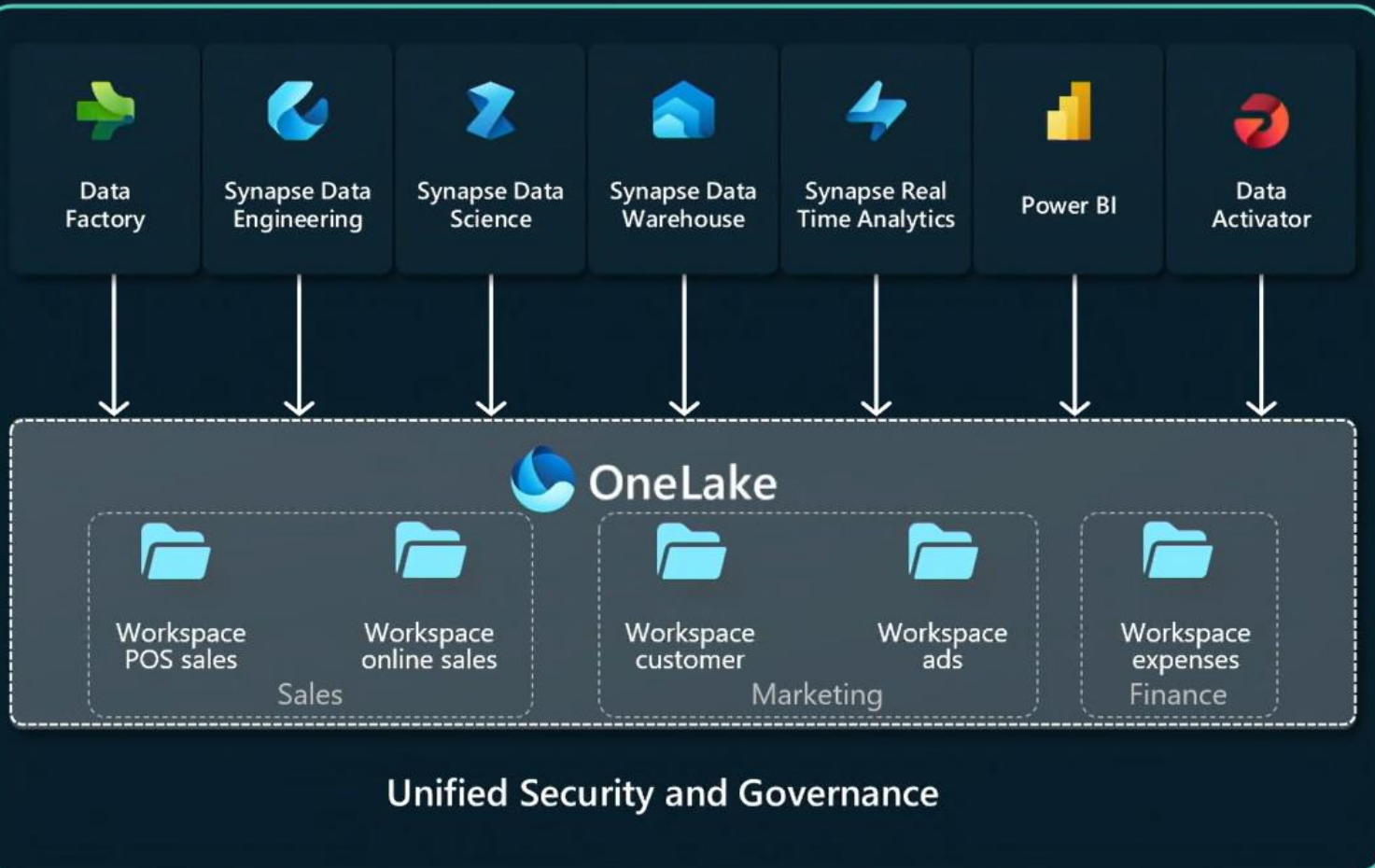
Demo

- OneLake Explorer
- Notebooks
- Files vs Tables
- Dataflow Gen 2
- PBI integration
- Dataverse
- Eventstream
- Kusto/Data Explorer
- Shortcuts
- Data Activator



What is Microsoft Fabric?

Key features



Introducing domains as an integral part of Fabric: A domain is a way to logically group together all the data in an organization relevant to an area or field, according to business needs.

Domains are defined with domain admins and contributors who can associate workspaces and group them together under a relevant domain.

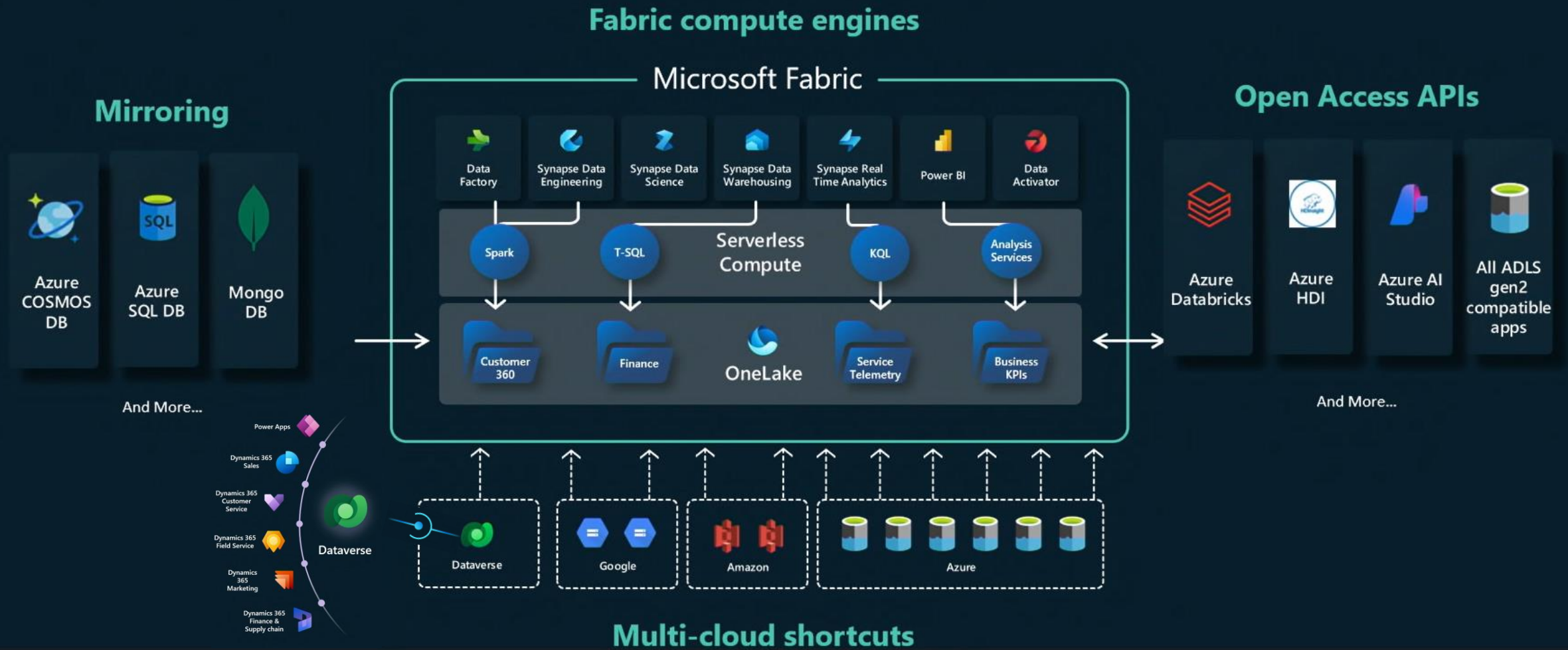
Federated governance can be achieved by delegating settings to domain admins, thus allowing them to achieve more granular control over their business area.

Domains simplify discovery and consumption of data across the organization, thus allowing business optimized consumption.

Avoid data swamps by endorsing certain data as certified or promoted, thus encouraging reuse.



Creating Data Gravity in OneLake



How can we be ready?

What drives revolutionising technology?



New
technology
becomes
available



AI/ML



Change in
funding
options and
risk



SaaS



Shift in
customer
expectations,
needs or
preferences

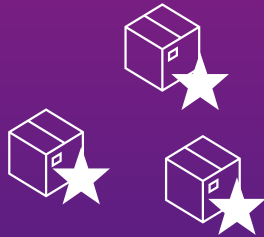


Easy, fast

How can we be ready?

... it is not easy

We had these trends...



Best of Breed



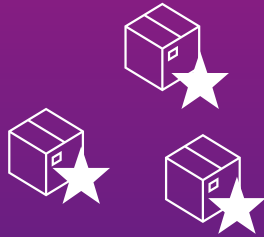
Avoid vendor lock-in



Data Mesh
Data Products

... it is not easy

Now we have these



Best of Breed

**End-to-end
ecosystem**



Avoid vendor lock-in

Easy integration



Data Mesh
Data Products

Data Fabric

What are we learning from the last technological change?



New standards

Delta Parquet

Python and SQL

Databricks

ADF

Copilot

Git integration

Test it!



What do we know about the future?

By 2024, enterprises that primarily build applications leveraging a data and analytics (D&A) **ecosystem from a single cloud service provider** will outperform competitors, despite vendor lock-in

Gartner, Inc.

By 2024, 50% of new system deployments in the cloud will be based on a **cohesive cloud data ecosystem** rather than on manually integrated point solutions.

Gartner, Inc.

What do we know about the future?

MDM is a necessary business initiative. Treated as a technology initiative in isolation invariably leads to failure.

Gartner, Inc.

By 2026, 5% of workers will routinely use AI against their employer's wishes to complete tasks.

Gartner, Inc.

So, is Microsoft Fabric worth the hype?

Q&A

Thank you!

Trond Brande

 /trondbrande

 trond.brande@soprasteria.com

Marthe Moengen

 @mmoengen

 data-ascend.com

 /marthemoengen

 marthe.moengen@soprasteria.com