EDM Webinar 🖭







How to use a semantic layer to deliver actionable insights at scale







A conversation with



Dave Mariani Founder & CTO AtScale



Bill Inmon "Father of the Data Warehouse"









ATSCALE

Moderated by **Mike Meriton** Co-Founder & COO, EDM Council

- Joined EDM Council full-time 2015 to lead Industry Engagement
- EDM Council Co-Founder & First Chairman (2005-2007)
- EDM Council Finance Board Chair (2007-2015)
- Former CEO GoldenSource (2002-2015)
- Former Executive for D&B Software and Oracle
- FinTech Innovation Lab Executive Mentor (2011 Present)





Today's speakers









Dave Mariani Founder & CTO AtScale



Bill Inmon

Founder and Chairman Forest Rim Technology "Father of the Data Warehouse"



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Poll #1:

What's your level of familiarity with the term **"semantic layer"**?

A semantic layer is a business representation of corporate data that helps end users access data autonomously using common business terms. A semantic layer maps complex data into familiar business terms such as product, customer, or revenue to offer a unified, consolidated view of data across the organization.

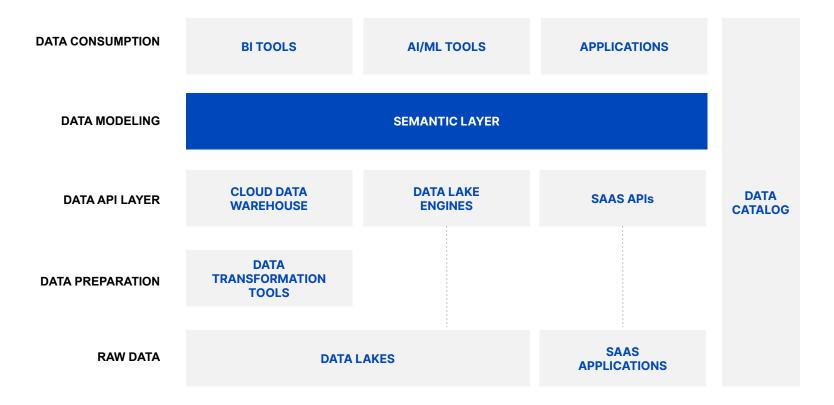
https://en.wikipedia.org > wiki > Semantic_layer

Semantic layer - Wikipedia

A semantic layer provides the agility, consistency, and control needed to scale enterprise BI and AI



Where does a semantic layer fit in the stack?



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Poll #2:

How important is **standard data definitions** to your analytics users? (1= Low and 5= High)



CLOUD ANALYTICS OPTIMIZATION

Speed of thought analytics on live cloud data, agile data integration with minimal data movement.



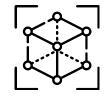
ENTERPRISE METRICS STORE

Single source of governed enterprise metrics that can be self-served from any Al/Bl tool.



BRIDGING AI AND BI

Common view of data assets and platform for publishing Al-generated insights to decision makers.



OLAP MODERNIZATION

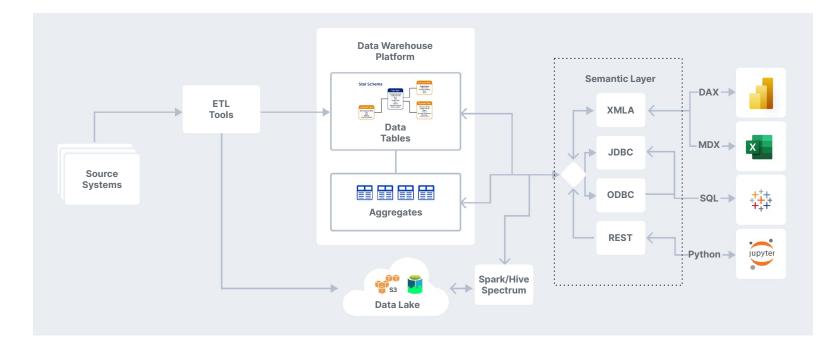
Migrate legacy OLAP (e.g. SSAS) models to modern cloud-first infrastructure.

How is a semantic layer used?

Poll #3:

How important is **trust in data** to your analytics users? (1= Low and 5= High)

How to Deploy a Semantic Layer



Live Audience Q&A

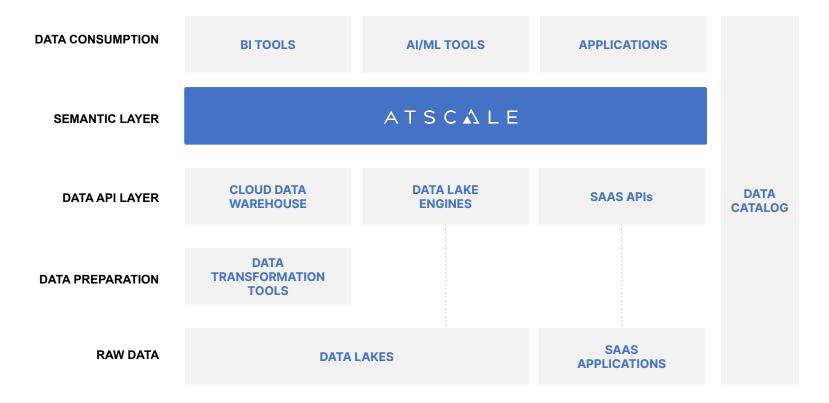
What does AtScale do?

The industry's only universal semantic layer platform delivering fast, secure and governed data for BI and AI/ML teams.

- AtScale does not move data.
- AtScale leverages existing BI and cloud data infrastructure.
- AtScale integrates with existing data security infrastructure.



Where does a Semantic Layer fit in the data stack?



TPC-DS 10TB Benchmark: Improvements with AtScale

Test	Improvement Factor with AtScale				
	BigQuery	Redshift	Snowflake	Synapse	Databricks
Query Performance ¹	4x Faster	11x Faster	3x Faster	6x Faster	4x Faster
User Concurrency ²	11x Faster	31x Faster	12x Faster	11x Faster	15x faster
Improved ROI ³	3x Better	4x Better	16x Better	2x Better	6x Better
Complexity ⁴	76% less complex SQL queries				

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1. Elapsed time for executing 1 query five times

2. Elapsed time executing 1 (x5), 5, 25, 50 queries

3. Compute costs for cluster time (Redshift, Snowflake) or bytes read (BigQuery) for user concurrency test

4. Complexity score for SQL queries for number of: functions, operations, tables, objects & subqueries (AtScale = 258, TPC-DS = 1,057)



 $\mathbf{\Lambda}$

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