Modern Investment Data Platforms With Lakehouse for Financial Services

Asset managers, broker-dealers, capital markets and investment firms are rapidly modernizing their strategies to become more data driven in their investment approaches. As investors gain access to increasing volumes and varieties of data, new challenges emerge, and existing platforms struggle to process data at scale. Taking a unified approach to data — especially alternative data (unstructured and semi-structured) and streaming market data feeds — creates new opportunities to generate alpha and maintain competitive advantage.

Unlock the power of data with the Databricks Lakehouse for Financial Services

Databricks Lakehouse empowers institutional investors to extract the value of all their data, at scale, with powerful analytics and AI capabilities to deliver transformative solutions, from updating portfolios in real time to running real-time analytics on order books.

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Databricks Lakehouse for Financial Services
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Leading capital market firms power innovation with Databricks

The Lakehouse Platform is enabling financial organizations to collaborate and unlock data-driven innovation for a wide range of use cases, all aimed at driving more profitable investments through the use of data and AI.

Customer story

S&P Global
Helping customers glean insights from alternative data sets — from ESG to textual — driving more responsible, sustainable investments and mitigating risk.

Customer story

Point 72
Enabling alternative data sources and machine learning to create high-quality industry compliance research to help investment teams achieve alpha.

Customer story

GEMINI
Accelerating rapid analysis of order book spread, volatility and liquidity costs to unlock intelligent insights generated from terabytes of data and billions of records in milliseconds.

Customer story

Modern data architecture for capital market firms and institutional investors

Data Sources
- FACTSET
- S&P Global
- FUNDAMENTAL DATA
- NYSE
- ICE
- TICK DATA
- 7PARK
- ALTERNATIVE DATA
- SAFEGRAPH
- aladdinn
- Bloomberg
- API BASED DATA

Data Transformation and Process
- Databricks Lakehouse
- AS-OF joins
- Enriched time series
- Trends
- Events
- Predictive analysis
- Risk aggregation

Output
- Investment research (BI/MI)
- Trading desk
- Risk management

Systems Fed
Platform benefits

PERFORMANCE AND SCALABILITY
Enable backtesting at scale with the ability to create complex calculation engines

REAL-TIME ANALYTICS
Capitalize on time series market and trading data in real-time with streaming feeds

INTELLIGENT INSIGHTS
Layer automated monitoring and alerting on top of your lakehouse to deliver AI-driven insight to achieve alpha

Accelerate data-to-value with these Solution Accelerators

Databricks has created a suite of purpose-built Solution Accelerators — fully functional notebooks and best-practices guides — to speed up results across your most common and high-impact use cases. They’ll help you move from idea to proof of concept (PoC) in as little as two weeks.

Modern Investment Data Platform
Transaction Cost Analysis
Real-Time Intra Day Risk
Volatility Forecasting From Fundamental and Technical Data
Portfolio Analysis
Value at Risk Calculations
ESG Scoring With Natural Language Processing (NLP)
Modern Investment Data Platforms With Lakehouse for Financial Services

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<th>Core Product</th>
<th>Business Benefits</th>
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<td><strong>Delta Lake</strong> forms the foundation of the Lakehouse by combining structured, unstructured and semi-structured data in a reliable single source of truth that enables a cost-effective, highly scalable lakehouse.</td>
<td>▪ Reduce time to deliver reports, such as transaction cost analysis or historical benchmark analysis, from hours to minutes and gain competitive strategy</td>
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<td><strong>Databricks SQL</strong> is a serverless data warehouse on the Databricks Lakehouse Platform that lets you run all your SQL and BI applications at scale with up to 12x better price/performance, giving you real-time visibility across your portfolios and assets.</td>
<td>▪ Reduce TCO and empower analysts and portfolio managers with faster time to insight for ad hoc analysis</td>
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<td><strong>Unity Catalog</strong> is a unified governance solution for all data assets, including files, tables and machine learning models in your lakehouse on any cloud, to enable collaboration both internally and externally with technology and business partners.</td>
<td>▪ Provide the ability to centralize catalog management and audit tracking and apply fine-grained access controls at the account level across multiple clouds</td>
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<td>▪ Automate discovery and lineage generated from data sources to determine the origination of alpha sources and high-value assets</td>
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Our Trusted Ecosystem of Partners
Simplify the discovery and integration of data, analytics and AI solutions with your lakehouse to power any of your analytical and AI use cases.

**Confluent**  
**dbt**  
**Fivetran**  
**KX**

Discover more about Lakehouse for Financial Services
Tap into these [educational resources](#) to learn more about how Databricks can help you generate alpha and maintain competitive advantage. Download these [Terraform templates](#) to accelerate your path to automatically deploy Lakehouse for Financial Services.

Databricks Marketplace
Databricks Marketplace is an open marketplace for exchanging data assets such as data sets, notebooks, dashboards and machine learning models. To accelerate insights, data consumers can discover, evaluate and access more data products from third-party vendors than ever before.

Financial Services institutions can accelerate projects to monetize data and build alternative streams of revenue (e.g., monetizing unique data sets and models) more seamlessly to a broad audience. The Databricks Marketplace will set the stage for capital market firms to accelerate having data as an asset on the balance sheet.

**Data providers:**  
[dund & Bradstreet](#)  
[Nasdaq](#)  
[S&P Global](#)  
[precisely](#)  
[SAFEGRAPH](#)

Learn more about the Databricks Lakehouse for Financial Services at [dbricks.co/fiserv](http://dbricks.co/fiserv)