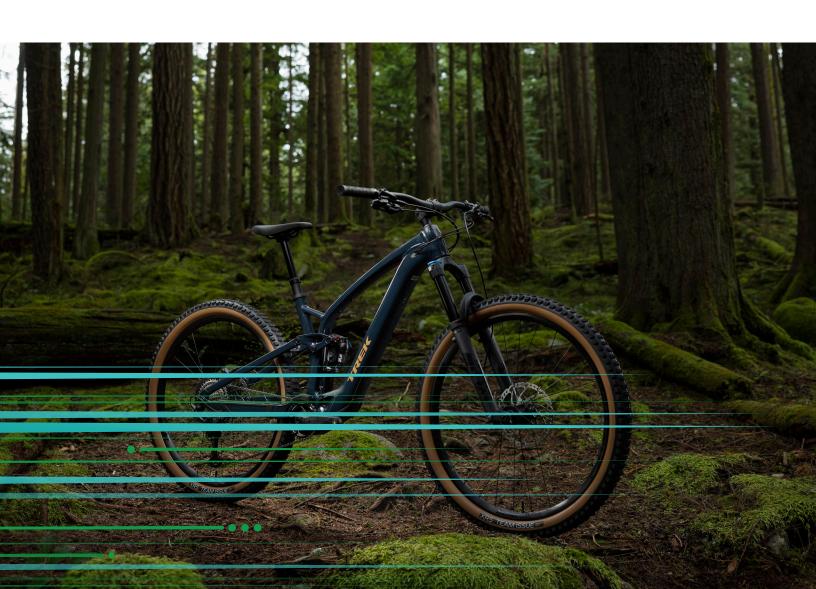


DATA INTEGRATION



WATERLOO, WISCONSIN | SINCE 1976

Trek unifies data and analytics with Qlik and Databricks to gain a holistic view of its business



"Databricks Data Intelligence Platform, along with data replication using Qlik, aligns perfectly with our broader cloud-first strategy."

Steve Novoselac, Vice President, IT and Digital, Trek Bicycle

Delivering the digital experience

Trek Bicycle started in a small Wisconsin barn in 1976, but the founders always saw something bigger. Decades later, the company is on a mission to make the world a better place to live and ride. Trek only builds products they love and provides incredible hospitality to customers as they aim to change the world for the better by getting more people on bikes.

Frustrated by the rising costs and slow performance of their data warehouse, Trek migrated to Databricks Data Intelligence Platform. The company now uses Qlik to replicate its enterprise resource planning (ERP) data to Databricks in near-real time and stores data in Delta Lake tables.

With Qlik and Databricks, Trek has dramatically accelerated its retail analytics to provide a better experience for its customers with a unified view of the global business to its data consumers, including business and IT users.

A new priority for a new platform

As Trek grew, it became increasingly frustrated by the rising costs and slow performance of its data warehouse. Specifically, running analytics on retail data proved challenging as Trek relied on a platform that couldn't scale cost-effectively.

"The more stores we added, the more information we added to our processes and solutions," explains Garrett Baltzer, Software Architect, Data Engineering at Trek Bicycle. "Although our data warehouse did scale to support greater data volumes, our processing costs were skyrocketing and processes were taking too long.

Solution Overview

Customer Name

Trek Bicycle

Industry

Retail, Consumer Products

Geography

Waterloo, Wisconsin

Function

IT

Challenges

- Build a high-quality digital customer experience
- Accelerate data processing and analytics
- Unify data from multiple countries and regions

Solution

Trek migrated to Databricks Data Intelligence Platform, using Qlik Cloud® Data Integration to replicate ERP data in the lakehouse in near-real time.

Results

- Run-times for global retail analytics accelerated by 80-90%
- Daily lakehouse data refreshes increased by 300%
- Data replication times cut from weekly to near-real time

"Some of our solutions were taking over 30 hours to produce analytics, which is unacceptable from a business perspective."

Trek needed an agile data ingestion and transformation solution for its lakehouse that would keep pace with growth and integrate with Databricks to deliver a global view of its performance and allow it to process data more quickly and regularly.

"We were processing retail data separately for our North American, European and Asia-Pacific stores, which meant everyone downstream had to wait for actionable insights for different use cases," recalls Advait Raje, Business Intelligence Specialist at Trek Bicycle. "We soon made it a priority to migrate to a unified data platform that would produce analytics more quickly and at a lower cost."

Maximizing ERP data value

Looking to modernize its data infrastructure to speed up processing and unify sources around the world, Trek migrated to Databricks Lakehouse Platform.

Using Qlik Cloud Data Integration to help feed the Databricks Lakehouse, the company's processing speeds increased immediately. The new replication capabilities provided by Qlik also allow Trek to build a wide range of valuable data products for its sales and customer service teams.

"We still rely on a lot of on-premise data warehouses and that's not likely to change," Baltzer explains.
"However, Qlik enabled us to move all that data into Databricks, where we don't have to worry about scaling vertically because it automatically scales in parallel. Since 70 to 80% of our data engineering information comes from our ERP system, Qlik has made it possible to get far more out of our ERP data without increasing our costs."

Trek now uses Qlik to ingest and transform data into Databricks Lakehouse Platform from point-of-sale data at nearly 500 stores around the globe.

"Databricks Data Intelligence Platform, along with data replication using Qlik, aligns perfectly with our broader cloud-first strategy," says Steve Novoselac, Vice President, IT and Digital at Trek Bicycle.

All computation now happens on top of the lakehouse in a newly built data warehouse, with a semantic layer sitting on top to power everything from strategic high-level reporting for C-level executives to daily sales reports for individual store employees.

How do you scale up analytics without blowing a hole in your technology budget?" Baltzer asks. "For us, the clear answer was to run all our workloads on Databricks Data Intelligence Platform and replicate our data in near-real time with Olik."

New levels of development velocity

The result is a dramatically accelerated retail analytics capability and a unified view of the global business to data consumers including business and IT users.

"Databricks Lakehouse has been a game-changer for Trek," says Raje. "Our company deploys its own POS system in stores around the world. With Qlik Cloud Data Integration, it became possible to replicate all transactional data to our Databricks Lakehouse in real time, which made it far more accessible for downstream analytics. Suddenly, data from multiple repositories was all available in one place, enabling us to reduce costs and deliver on business needs much more quickly."

Meanwhile, Trek extracts customer care interaction data from the application programming interfaces (APIs) of its phone system into a data lake using Auto Loader functionality in Delta Live Tables. From there, it transforms the data from bronze to silver or gold according to the medallion architecture. Trek's analysts leverage Databricks SQL, its serverless data warehouse, for ad hoc analysis to answer business questions much more quickly. For example, users can consume customer care data from gold tables. This ease of analysis helps the company monitor and enhance its Net Promoter Scores.

"Delta Live Tables have greatly accelerated our development velocity," Raje reports. "In the past, we had to use complicated extract, transfer and load (ETL) processes to take data from raw to parsed. Today, we just have one simple notebook that does it and then we use Delta Live Tables to transform the data to silver or gold as needed."

New approach, new insights

By moving its data processing to the lakehouse and integrating data with Qlik, Trek has dramatically increased processing speeds and overall data availability. Instead of replicating enterprise resource planning (ERP) data once a week using bulk copies, Qlik helps to facilitate the process in near-real time.

"We used to have to work with stale ERP data all week because replication only happened on Sundays," Raje remarks. "Now we have a nearly up-to-the-minute view of what's going on in our business. That's because Qlik lets us keep replicating through the day, streaming data from our JD Edwards ERP platform into our lakehouse."

Trek's retail analytics solution used to take 48 hours to produce meaningful results. Today, Trek runs the Qlik solution on Databricks Lakehouse Platform to get results in six to eight hours — an 80 to 90% improvement. This solution can also refresh three times per day, compared to only once a day previously.

"Before Databricks, we had to run our retail analytics once a day on North American time, which meant our other regions got their data late," Raje adds. "Now, we do three runs a day, one for each region, and stakeholders receive fresh data in time to drive their decisions."

He concludes: "Based on the results we've achieved with Qlik, we're taking a Databricks-first approach to all our new projects. We're even migrating many of our on-premise BI solutions to Databricks because we're all in on the lakehouse."

The keys to success



80-90% acceleration in run-time for global retail analytics



"Since 70 to 80% of our data engineering information comes from our ERP system, Qlik has made it possible to get far more out of our ERP data without increasing our costs."

Advait Raje, Business Intelligence Specialist at Trek Bicycle



About Qlik

Qlik transforms complex data landscapes into actionable insights, driving strategic business outcomes. Serving over 40,000 global customers, our portfolio leverages advanced, enterprise-grade AI/ML and pervasive data quality. We excel in data integration and governance, offering comprehensive solutions that work with diverse data sources. Intuitive and real-time analytics from Qlik uncover hidden patterns, empowering teams to address complex challenges and seize new opportunities. Our AI/ML tools, both practical and scalable, lead to better decisions, faster. As strategic partners, our platform-agnostic technology and expertise make our customers more competitive.

qlik.com