



Cloud-based health data platform enables successful Truveta participation within complex analytics infrastructure

Using healthcare data to save lives

Truveta is a consortium of healthcare organizations committed to sharing de-identified data to accelerate research, advance health equity, and save lives.

As a founding member of Truveta, Advocate Aurora Health (AAH) was aiming to be among the first healthcare systems in the Truveta network to initiate data submissions, but given that they were at the beginning of their cloud journey, they were in need of some support to expedite their participation.

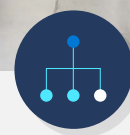
AAH was simultaneously developing its goals and strategy for a cloud data platform and was just at the start of its process to build internal expertise in Azure data infrastructure and data pipeline development. The result was a set of unique opportunities and challenges for creating a solution that would satisfy the Truveta infrastructure requirements.



AAH completed the fastest Truveta implementation to date



AAH integrated on-premises and cloud data for the first time



AAH has a source-agnostic cloud data migration and data delivery solution

INDUSTRY: Healthcare

SUB-VERTICAL: Provider

INDUSTRY PRIORITY SCENARIO: Improve operational and clinical analytics



A partnership is an effort that involves all parties. In this engagement, all the right traits were displayed: we worked toward one well-understood objective, we ensured the right resources were engaged on both sides, we got 'deep' when we needed to ensure barriers were removed and oversight was appropriate, and we course-corrected together when needed."

**Tina Esposito, SVP,
Chief Health Information Officer**



Solving for efficiency and security

Long term, AAH required a cloud-based healthcare data platform that would ensure core systems were housed in a secure, reliable, and flexible environment. This would subsequently enable internal needs around artificial intelligence (AI) and machine learning (ML) use cases as well as data democratization efforts. In the short term, however, the need to get Truveta data was pressing.

After assessing Truveta's data and infrastructure requirements, data content formatting, data volumes, and current-state architecture, Tegria collaborated with AAH to design system architecture and integration points as well as a rapid prototype data extract. Tegria's findings and recommendations enabled AAH to finalize future system design and data integration plans, developing a source-agnostic data migration solution.

Ensuring an end-to-end pipeline

For six weeks in mid-2021, AAH and Tegria worked with Truveta to catalog existing data security and sharing compliance processes. From there, the team developed a proof-of-concept data pipeline to transport data from the AAH Azure database into Truveta's Azure environment.

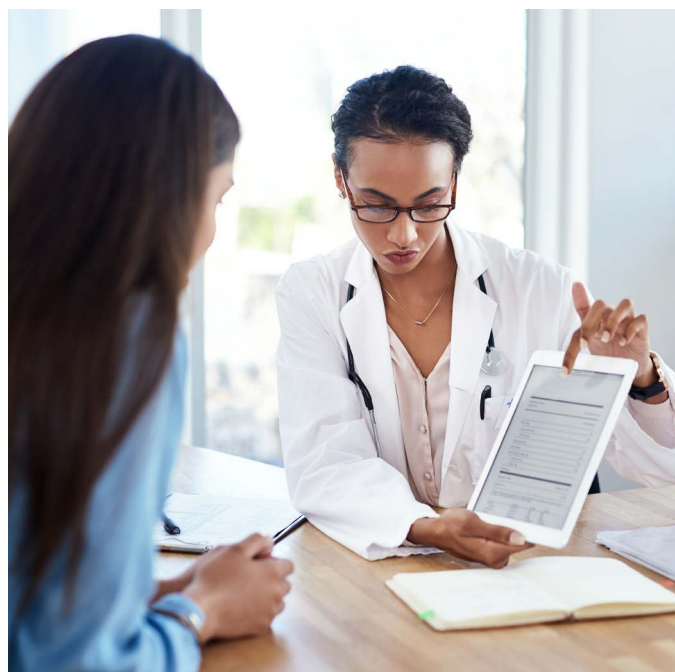
Next, the proof-of-concept solution was expanded to include data mapping, data pipelines, and submissions to Truveta across a wide range of clinical concepts. AAH's initial dataset spanned five years of allergies, conditions, encounters, immunizations, medications, medication administrations, procedures, observations, lab results, and social history for a patient population of approximately 6.5 million.

The team leveraged current infrastructure from an ongoing pilot project as the data source for Truveta while building a data-source agnostic Azure cloud solution with connections that could be easily reconfigured to align with the infrastructure developed as part of their larger organizational analytics strategy.

As part of this implementation, Tegria also added monitoring of daily and weekly data loads in the pipelines and developed metadata-driven workflows to make the solution scalable for future needs.

Finally, Tegria consultants worked with AAH to establish the build and configuration to enable recurring data transfers from AAH to Truveta. In collaboration with Truveta, the team refined and expanded the initial dataset and integrated additional data objects into the solution build.

In addition, AAH hired and integrated a cloud data architect whose scope included their Truveta data pipelines, and the Tegria team was able to fast-track a knowledge and data transfer to this lead resource.



Tegria

About Tegria

Tegria provides consulting and technology services to help organizations of all sizes humanize each healthcare experience. Founded by Providence, with teams throughout the United States and internationally, Tegria is comprised of more than 3,500 colleagues who help their customers integrate technology, transform operations, accelerate revenue, and optimize care. To learn more, visit tegria.com.