

Case Study: Oil & Gas

Extracting More Value with Digital Hydrocarbon Accounting

In the cost-conscious oil industry, knowing who gets what, and how much goes to waste, is a key challenge.

Every drop of oil counts for petrochemical companies faced with historically fluctuating gas prices. In the many steps from oil field to pump, it's easy to find that gasoline goes missing, but much harder to see where it has gone. Keeping track of what goes where is particularly important for our client, a leading U.S. petroleum and natural gas company that shares infrastructure with other industry players and has to allocate production across a number of business partners.

The company required significant human intervention to prepare production data, risking errors with every keystroke. It was mixing data with operations and production, so when it needed a clear view of the latter its people had to work overtime. All of this made it difficult to comply with Sarbanes-Oxley regulations. Just as important, the issues in managing data meant the company could easily make mistakes and miss out on potential revenues. The situation was challenging for production accountants, and the systems in place were not easy to change.

At a glance

A leading U.S. petroleum and natural gas exploration and production company, focused on the capture of quality resources in emerging oil provinces, faced a challenge in production accounting. Its existing processes and platforms were ill-equipped to handle complex production allocation and reporting needs. The client also faced the risk of regulatory non-compliance due to weak control over access to systems and historical data. We offered fully auditable control over access to data, which provided 100% accuracy and compliance, as well as increased user efficiency.

Outcomes

- Achieved 100% accuracy for allocation and revenue reporting due to accurate modeling of energy flow and associated assets. Easier navigation and easy-to-understand screens

Dealing with the client's challenge was not only about IT expertise. It also required a deep understanding of the entire reservoir-to-cash process, and expertise in business process automation. We worked with the client to harmonize its business processes and implement a digital hydrocarbon accounting platform that could provide:

- **Complete reconciliation** of actual quantities of hydrocarbons produced and those sent for export, storage, consumption and allocation back to the wells and platforms
- **Accurate determination** of ownership of comingled flows, corresponding revenues for each partner and processing of digital data to enable processes in other departments
- **Easy reporting** for Sarbanes–Oxley and other legislative requirements

Along the way, we captured the end-to-end requirements for hydrocarbon production, and accurately modeled field arrangements and production-sharing contracts to obtain a real-world view of the company's operations. We also performed exhaustive quality assurance and user training to enable a smooth adoption of the digital platform. The result was an on-time, on-budget implementation that is considered a model within our client's IT projects to date.

Today, the client enjoys 100% accuracy in production accounting and revenue generation. The improved accounting is equivalent to getting an extra 0.5% margin of production, which is a big result for a company looking to squeeze every drop of profit out of its operations. What's more, all this is with a platform that ticks all the company's regulatory boxes and can be scaled and configured easily to work in new markets, wherever the need arises.

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eliminated errors generated from manual entries

- Improved user efficiency and time savings thanks to deep automation, separation of production data and elimination of the need to reconcile various data points in the production field
- Provided fully auditable control over access to data, which lead to better compliance with Sarbanes–Oxley and other legislative reporting in a multi-user environment
- Delivered greater application flexibility through configurable application design and customization, allowing for any future changes in the production field environment
- Improved scalability for inclusion of other sites and faster time to market (TTM) for subsequent implementations, enabled by reusable templates
- Enhanced accounting to get an extra 0.5% margin of production

About Cognizant

Cognizant (Nasdaq-100: CTSH) is one of the world's leading professional services companies, transforming clients' business, operating and technology models for the digital era. Our unique industry-based, consultative approach helps clients envision, build and run more innovative and efficient businesses. Headquartered in the U.S., Cognizant is ranked 194 on the Fortune 500 and is consistently listed among the most admired companies in the world. Learn how Cognizant helps clients lead with digital at www.cognizant.com or follow us [@Cognizant](https://twitter.com/Cognizant).

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