EDM for Energy: Well Master

Corporate-wide master well definition, which is integrated with all data models and use cases and automatically synchronized across systems

Well and well-related data is at the core of E&P operations. However, keeping data consistent across multiple systems, users and partners is typically challenging. Established data models impose standards, but they are usually fixed, thereby limiting attribution. This often leads to function-specific solutions, technical silos and a lack of data continuity. As each department uses well data differently, transformations of data are performed without reference to other systems, resulting in poor quality assurance and increasing the risks of bad data in decision-making.

With its data-agnostic design, EDM’s Well Master solution allows firms to apply complex matching criteria across multiple sources to define a blended well master for all situations. This includes full and enriched attribution, creating a usable single source of the truth. Firms can leverage a range of industry standard data models, including but not limited to PPDM 3.8 and 3.9.

With EDM’s dynamic data model, all use cases can be accommodated while maintaining the integrity of a master record. This keeps systems aligned and provides clear, cross-application integration. The platform monitors changes to source systems, flags quality issues, executes exception management processes and distributes the well master record to downstream users.

EDM can be implemented on premise, in the cloud or as a managed service leveraging industry leading cloud technology and application management capabilities. The latter option enables firms to reduce implementation times, future-proof and outsource many human resource-intensive tasks.

Data mastering
EDM matches data from multiple sources at the attribute level, with source prioritization, data quality verifications and cross-source reference normalization.

Auditability and data lineage
Users have the ability to track data flows through the organization and assess the adherence of systems to mastered records. They can also force updates or raise awareness of update availability, monitor improvements over time and implement standards.

Enhanced and enriched data
Defined data models set limits on well header attribution and are typically focused on a data use case, such as geoscience, engineering, operations, finance or land. EDM’s dynamic data model approach allows for assessment of all use cases and development of a master record that is enhanced and enriched to support each scenario.

Data transformation
Data can be transformed when pushed to downstream systems to ensure the master record adheres to other data model standards (including but not limited to industry standards, such as PPDM 3.8 and 3.9) while maintaining consistency and auditability. All transformations are tracked and can quickly be reviewed by end-users.