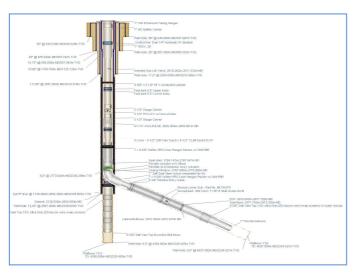


CSD, Completion String Design, is an advanced Norwegian software solution for planning and presentation of completion strings and well history tracking. CSD allows you to quickly and accurately create **well schematics**, and provides the engineers and staff with a comprehensive set of tools for planning and implementing completions and well interventions!

Completions Services acknowledge the importance of gathering all your well documentation in one place for easy access, easy retrieval and easy update. CSD offers intuitive visualization and reporting, as well as real time quality assurance and information protection tools!

CSD BENEFITS

- Build Single, Dual, Multilateral and ESP completions
- Well Schematic diagrams onshore / offshore wells
- Drag & drop string construction
- Built in equipment symbol package
- Default equipment database
- String inside string functionality
- 3D well trajectory visualization
- Completion data export / import / integration
- Revision control / well history / approve & finalize
- Customizable Excel reports
- Real time well schematics QA verification

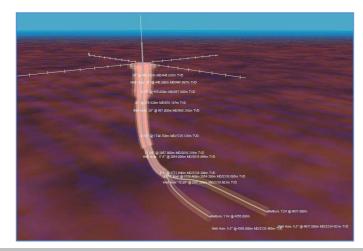


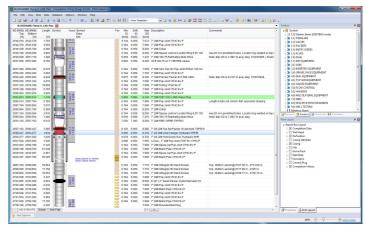
Design Features

Drag & drop string construction along with intelligent component editing, enables you to optimise completion strings for all well scenarios. CSD provides a range of other features for use on advanced well completions. Revision control of plan and tally data ensures that engineers have the most up-to-date information at their fingertips.

Reporting and Graphical Outputs

CSD's extensive graphics and reporting facility is designed to present the most useful information at the touch of a button. The Cdim (CSDWeb) module enables you to view the CSD completion string schematics through a web browser.





Design to Completion

You begin by entering the well conditions, directional profile, and casing/cement configurations through CSD's intuitive data entry dialogs. Parts and equipment information are held centrally within an inventory, and can be tracked over the lifetime of the well. CSD displays all components by description, and equipment symbols are fully customizable. CSD comes with an extensive symbol package, as well as standard reports to Excel and a real time QA check function.

Well Conditions

- Drilled sections
- Casings and cementing
- Casing restrictions
 Open hole sections
- Perforation intervals
- Under reamed sections
- Formation/zone information
- Radioactive markers
- Junk/Fish
- Cement plugs
- Survey visualization
- Well Head
 - Multiple rig references datum

String Design Capabilities

- Parts inventory
- Toolbox library / Part Explorer
- Revision tracking
- Equipment assemblies
- Plan, Tally, Actual and P&A mode
- Single, Dual, ML, ESP completions
- Installed (inserted) equipment
- String within string
- Custom report templates
- Downhole equipment and instrument cables

Computing Features

- Drag & drop string construction
- Full MDI (Multiple Document Interface)
- Multi-user, Client/Server environment
- Full database/user security
- Customizable units systems
- User access control & restrictions