Enhancing your network reliability

CGI OpenGrid
Network

CGI

The imperative for network optimization

Network management powered by digital capabilities can vastly improve how utilities respond to outage disruptions and manage restoration operations—driving greater operational efficiency and peak performance.

With an increase in extreme weather conditions and growing pressure on outage restoration activities, coupled by security concerns and higher customer expectations, utilities today face intensifying business pressures to adapt and immediately respond to outage events. Furthermore, the industry shift toward grid modernization and distributed energy resources enabled by the latest technologies requires utilities to offer a better and more comprehensive customer experience.

Business transformation paves the way to enable greater access to digital information and grid security. Utilities today need to invest in innovation and digital capabilities to improve power quality with advanced grid management capabilities.

They also need to mitigate risks from cyber threats.

CGI OpenGrid Network
delivers critical operational
tools such as advanced
analysis and field-proven
monitoring and control to
optimize the performance,
reliability and safety of your
power distribution grid.

CGI OpenGrid Network: Minimizing outages through digitization

CGI OpenGrid Network is the answer to address your operational needs today and tomorrow. Built specifically for utilities in close partnership with our utility clients, our modular network management solution helps automate and optimize your outage restoration lifecycle. It reinforces the distribution grid ahead of the storm and minimizes its impact by efficiently managing restoration operations.

Combining our deep industry expertise, best practices and advanced technologies, CGI OpenGrid Network helps minimize the disruption and costs of outages while improving network reliability. It strengthens your outage response and network management process with a real-time view of outages and critical visibility and control for managing large-scale, high-volume outage events.

Key benefits include:

- Improved electric grid reliability and performance
- Minimized restoration time
- Enhanced customer experience
- Reduced costs and risks

Faster outage restoration – Powerful outcomes

With CGI OpenGrid Network, your utility can improve electric grid reliability and performance from initial detection to full restoration. The solution's real-time critical visibility and powerful incident prediction enable faster and more effective responsiveness—driving peak uptime and a better customer experience.

Proof points include:

- Outage frequency reduced by more than 50%

- SAIDI reduced by more than 60%

- Outages of unknown causes reduced by more than 90%

- More than $1M in unnecessary equipment replacement avoided

Gain real-time network visibility

What sets CGI OpenGrid Network apart is the ability to provide real-time connectivity between your customers, the control room and field crew activities—enabling multi-channel communication and accurate predictions of outage restoration times. Moving your utility forward in its digital transformation journey, our solution leverages emerging technologies such as all-digital switching management and GIS-agnostic capabilities.

Our unique solution capabilities include:

- Highly configurable and flexible outage analysis engine for modeling and simulation of complex transmission and distribution networks

- Streamlined switching management approval and execution workflows

- Real-time visibility into outages and accurate predictions of restoration times, leveraging dashboards and reports tailored to various utility stakeholders (operators, clients, executives, media)

- Easy integration with CIS for customer information and callback information, and GIS for network connectivity modeling and validation

- Powerful incident prediction and grouping algorithm

Boost your network reliability and performance

CGI OpenGrid Network helps deliver powerful outcomes that matter.

Improve electric grid reliability and performance – Our solution provides comprehensive monitoring, restoration and analysis capabilities for electric distribution networks while leveraging an integrated mobility platform to optimize and monitor restoration activities. It offers embedded integration points to AMI, SCADA and DMS to increase the accuracy of outage detection and confirmation of service restoration, which contributes directly to improving your customer satisfaction scoring.

Minimize restoration time – CGI OpenGrid Network delivers situational awareness, control and tracking of service restoration efforts through the outage analytics engine, which is at the heart of the solution. This highly flexible outage analysis takes into account telemetry from field devices, smart meters, fault indicators and human intelligence gathering (e.g., damage assessments) to optimize field activities. Concurrently, it provides control room operators, supervisors, executives, media relations and other stakeholders with key visualizations.

Enhance customer experience – With our solution, you can leverage real-time visibility and proactive communications regarding outage predictions, crew dispatch, restoration tracking and regulatory reporting. Powerful algorithms take into account the many properties of individual outages as well as indicators such as travel time and traffic to calculate estimated restoration times.

Reduce costs and risks – CGI OpenGrid Network delivers all-digital switching workflows to drive faster restoration times and minimize disruption to increase your network reliability, which helps decrease operational costs and secures the grid for increased resiliency.

Trusted partner focused on your needs

CGI is trusted by the world's leading utilities to implement their most complex and mission-critical systems. Drawing on more than 30 years of industry experience as an end-to-end services provider that has co-developed successful industry solutions with our clients, our CGI OpenGrid360 suite (including CGI OpenGrid Network) is designed to meet the unique needs of transmission and distribution (T&D) utilities.

CGI in Utilities

As the need to move to a secure, affordable and fair low-carbon energy ecosystem intensifies, CGI supports the energy transition by helping utilities transform themselves. Our solutions help address growing volumes of distributed energy resources, exploit data insights and other digital enablers to diversify revenue streams, support real-time operational excellence, and enhance customer experience, all while keeping the business secure.

9/10
of the largest utilities worldwide partner with CGI.

60
of the top 100 utilities in North America rely on CGI solutions for outage, work and asset management, enterprise mobility and analytics.

6K
CGI consultants are helping utilities around the world drive profitable growth.
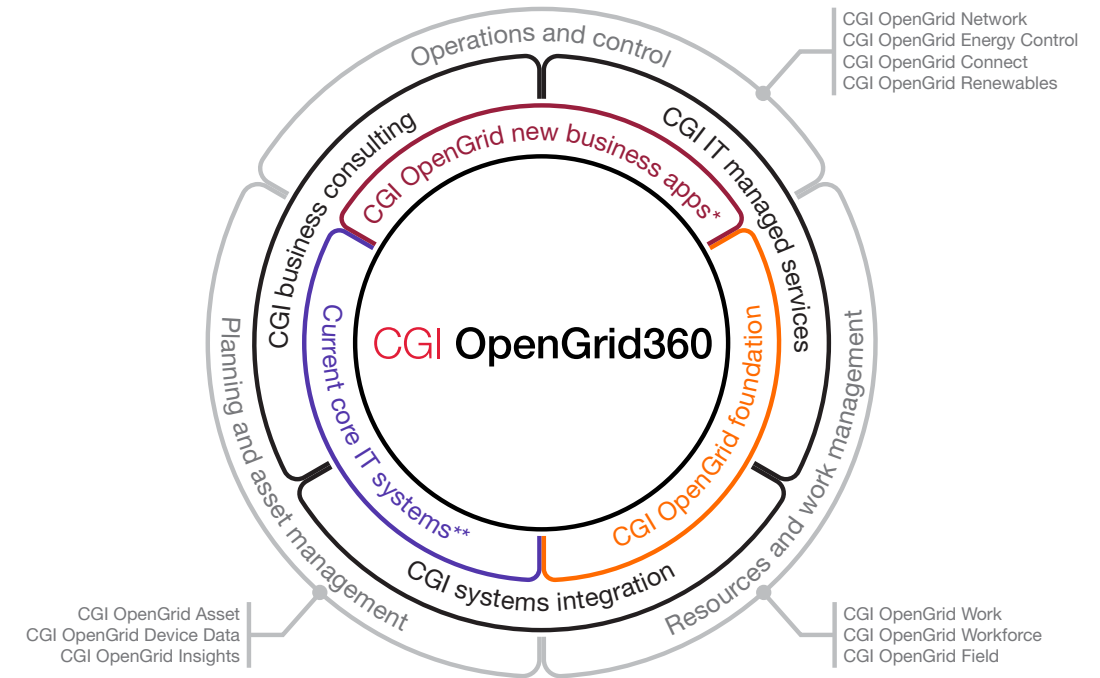
CGI OpenGrid360

Accelerating innovation by unlocking the value of data for the move to a sustainable future grid

T&D utilities need to accelerate change, optimize operations and support future energy market needs. CGI OpenGrid360 is an innovative suite of solutions and services designed to improve your data insight and accelerate innovation to meet the evolving demands of the new energy system. It supports the complete network value chain from asset to outage management and more.

Co-developed with large network operators on UK smart grids innovation programs, for example, the hub of the solution is the CGI OpenGrid Foundation, a master data management and integration layer that provides a single view of a utility's network. By allowing data to be centralized and securely shared across IT, operational technology (OT) and business systems, our unique approach supports real-time decision-making and more rapid development of new applications and services for a competitive edge. This kind of business value is not possible using traditional relational databases or unstructured data lakes. Our CGI OpenGrid360 portfolio includes modules for asset, network and mobile workforce management, as well as solutions for managing advanced smart grids and renewable operations. These applications will help you maximize the benefits of data from the grid and endpoints. While modules can be used individually, even greater value can be achieved by implementing the full CGI solution suite. CGI OpenGrid Asset is part of this portfolio.

CGI OpenGrid Network
CGI OpenGrid Energy Control
CGI OpenGrid Connect
CGI OpenGrid Renewables

CGI OpenGrid Work
CGI OpenGrid Workforce
CGI OpenGrid Field

CGI OpenGrid Asset
CGI OpenGrid Device Data
CGI OpenGrid Insights

* = Delivering value-added services for consumers, prosumers and other market parties
** = Current core IT systems of utility network owners and operators; CGI offering or offering from any other vendor

Connect with us to learn more

As a trusted advisor with a proven track record in the utilities industry, CGI is committed to your success.

Connect with us to learn more:
cgi.com/utilities and cgi.com/opengrid

About CGI

Insights you can act on

Founded in 1976, CGI is among the largest IT and business consulting services firms in the world.

We are insights-driven and outcomes-based to help accelerate returns on your investments. Across hundreds of locations worldwide, we provide comprehensive, scalable and sustainable IT and business consulting services that are informed globally and delivered locally.

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