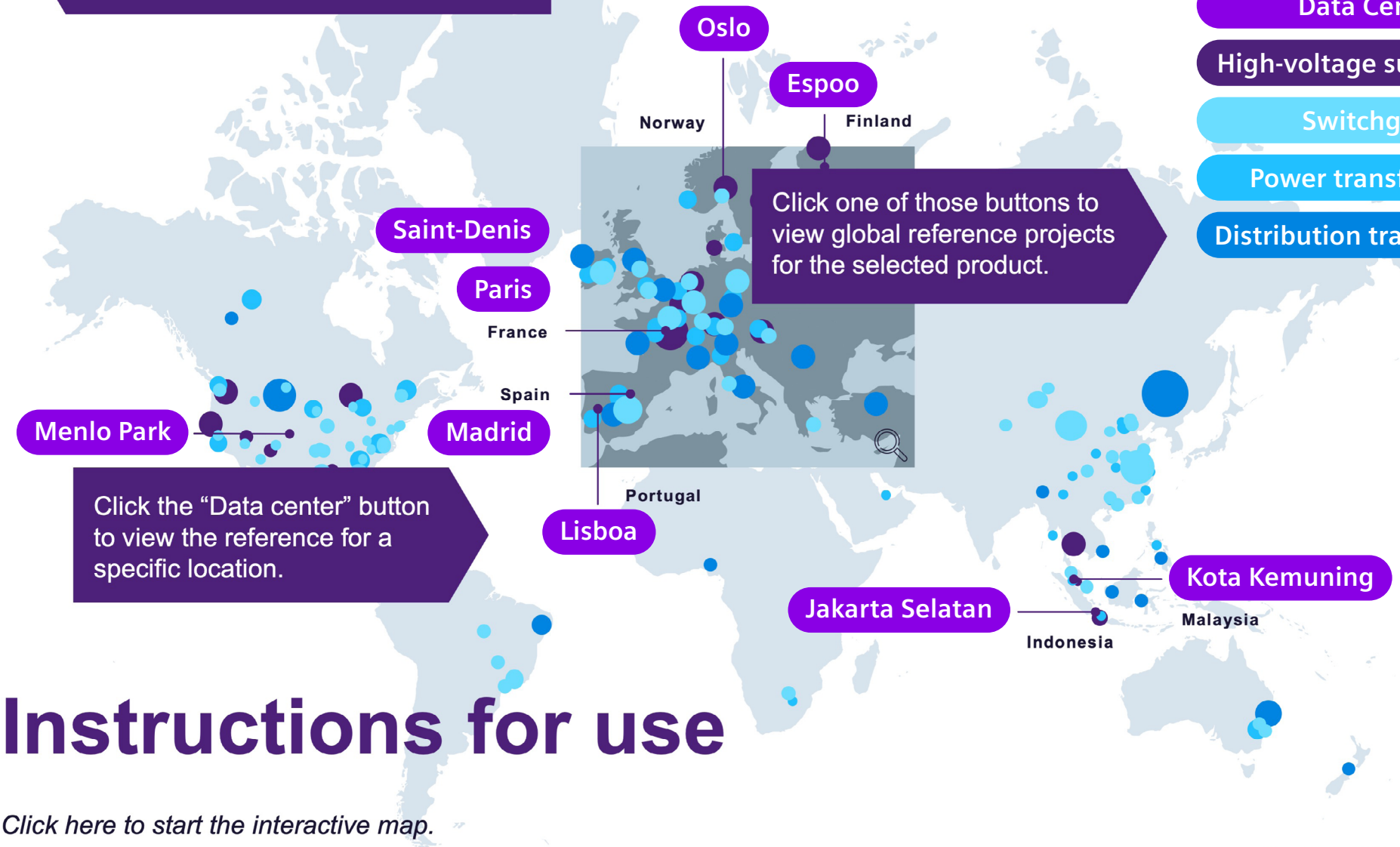
Interactive presentation for data centers

This interactive map is designed to showcase Siemens Energy data center product portfolio across key global regions, enabling customers and partners to explore our solutions in the context of real-world applications.
By connecting regional product offering with customer reference cases, the experience demonstrates our proven ability to deliver reliable, scalable energy infrastructure that supports the world's digital demands.



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Click here to return to the home screen.



Data Center

High-voltage substations

Switchgear

Power transformers

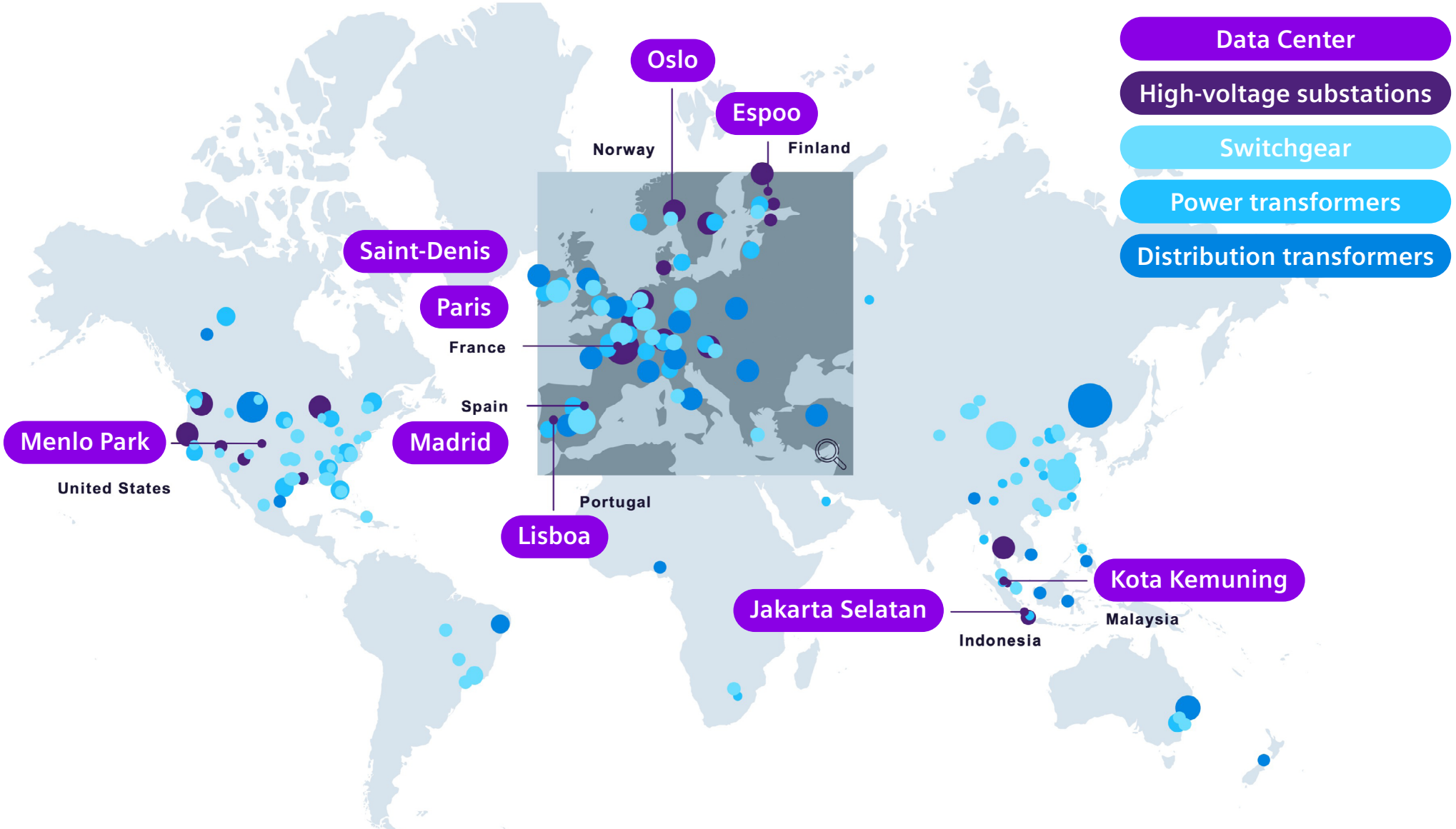
Distribution transformers

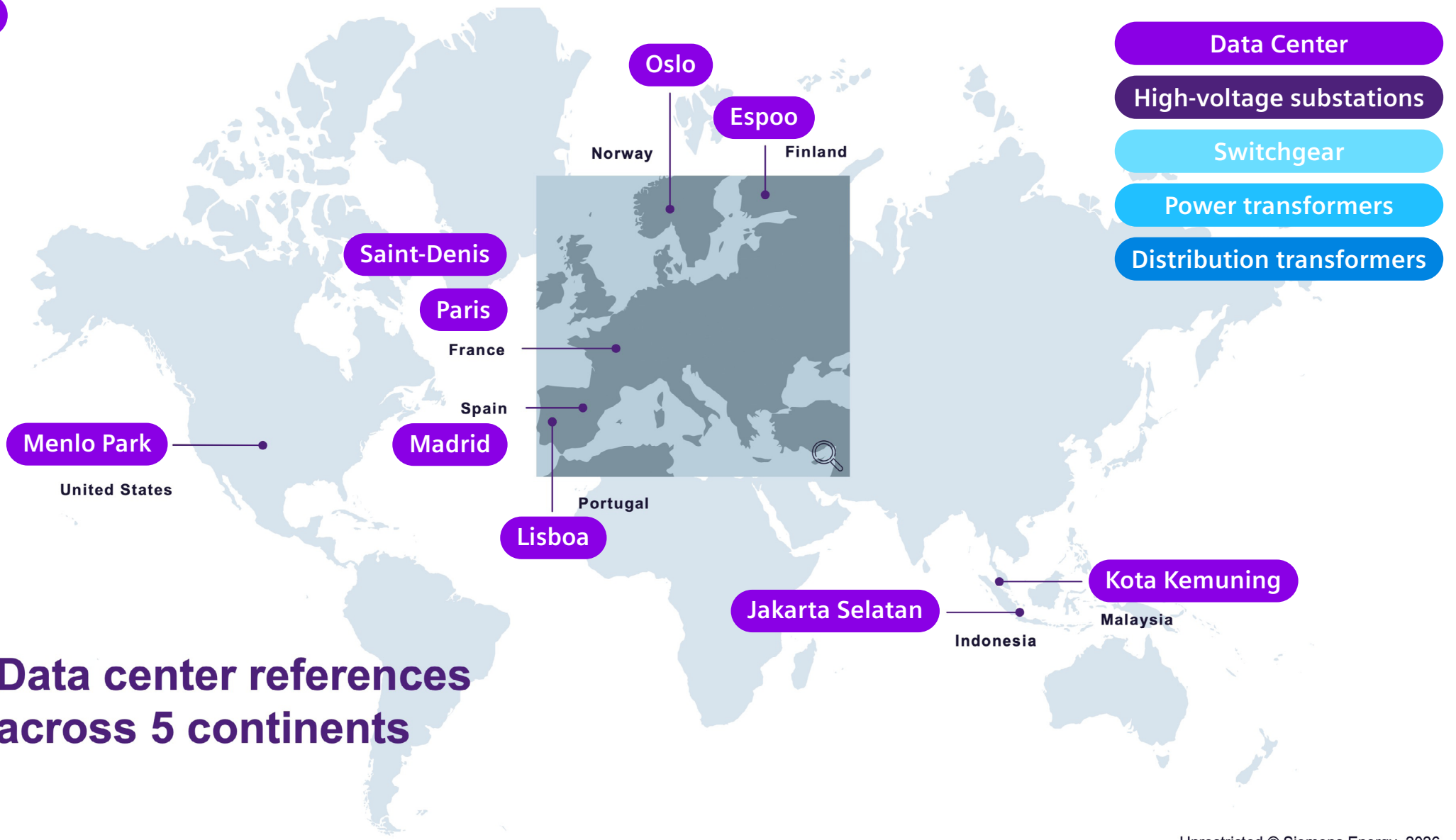
Click one of those buttons to view global reference projects for the selected product.

Click the “Data center” button to view the reference for a specific location.

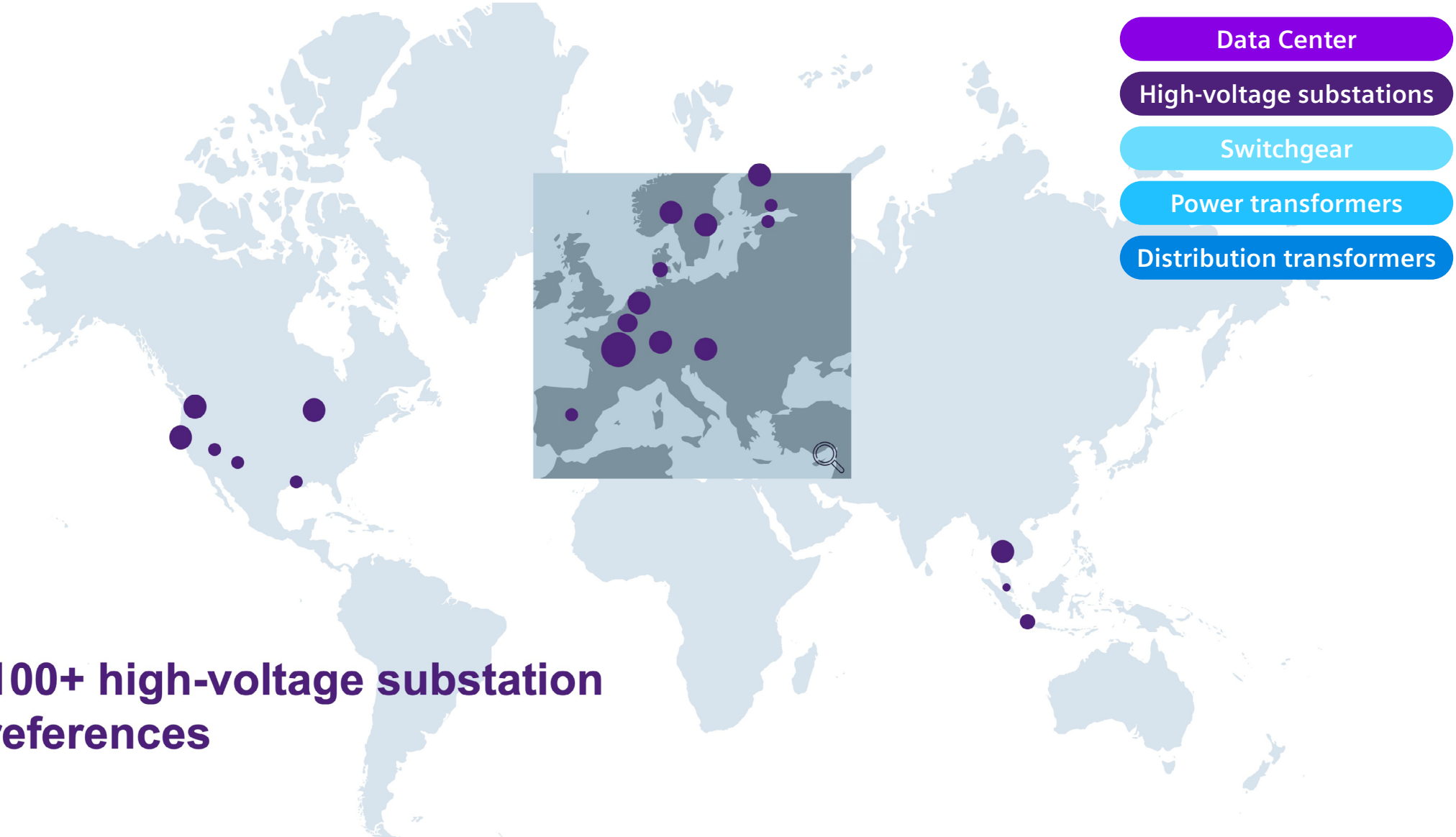
Instructions for use

Click here to start the interactive map.


Data Center
High-voltage substations
Switchgear
Power transformers
Distribution transformers
Oslo
Norway
Espoo
Finland
Saint-Denis
Paris
France
Spain
Menlo Park
United States
Madrid
Portugal
Lisboa
Kota Kemuning
Malaysia
Jakarta Selatan
Indonesia



Data center references across 5 continents



100+ high-voltage substation references

Data Center

High-voltage substations

Switchgear

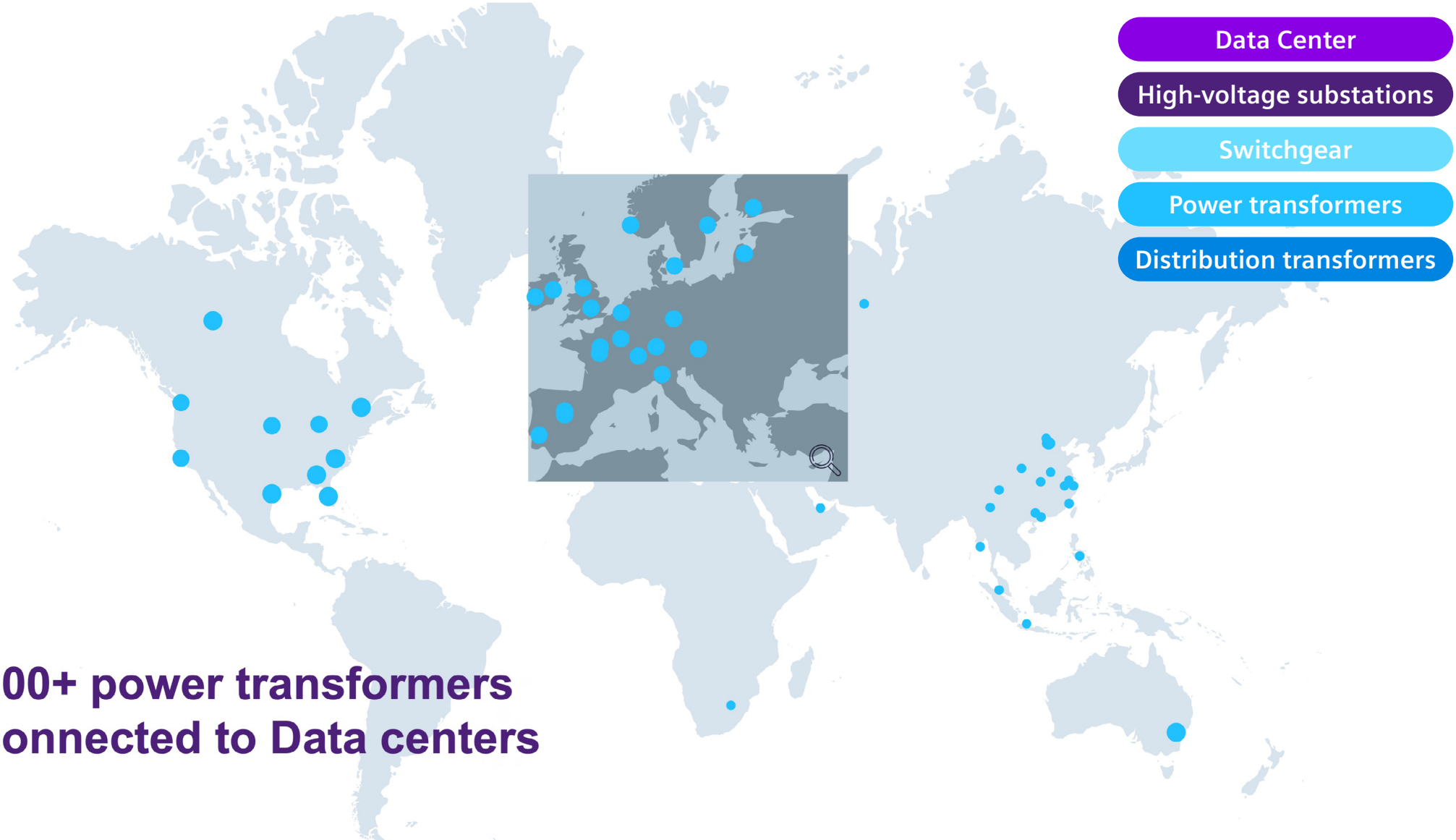
Power transformers

Distribution transformers



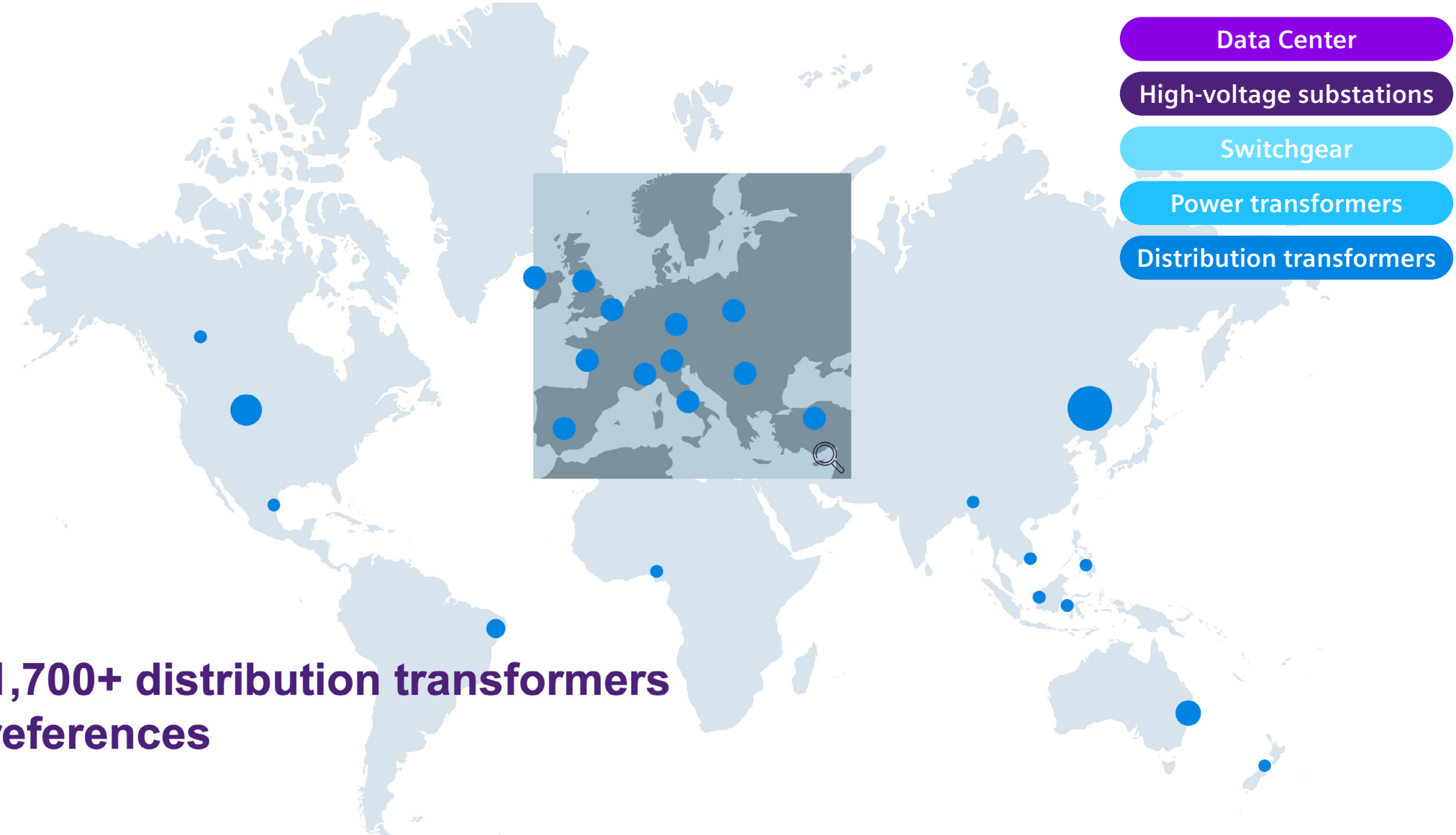
1,000+ switchgear installed

Unrestricted © Siemens Energy, 2026

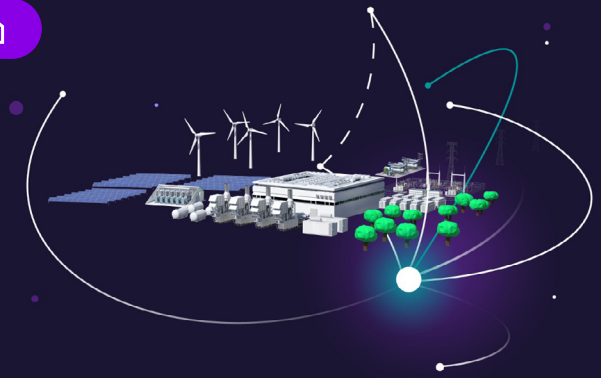


300+ power transformers connected to Data centers

Unrestricted © Siemens Energy, 2026



1,700+ distribution transformers references



Country: Malaysia

Industry: Data centers

Commercial operation: June 2026

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Engineering excellence for a sustainable and efficient future

Challenge / Opportunity

- Comprehensive EPC solution for a new Data center
- Managing multiple complex interfaces including civil work, building architecture, and integration with existing infrastructure

Solution

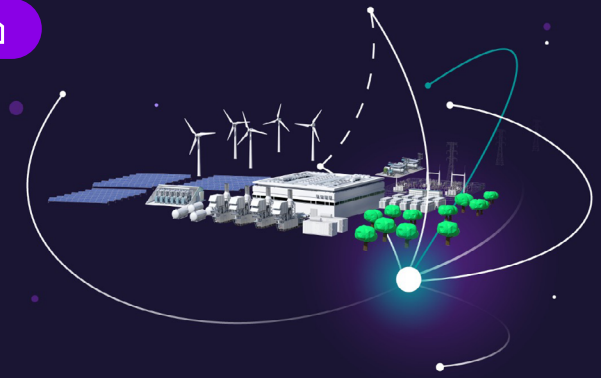
- Engineering, procurement, construction of a 275 kV GIS substation
- 275/33 kV transformers (75/90/110 MVA) and associated auxiliary panels.

Benefits

- Increased efficiency
- Improved reliability
- Enhanced safety
- Cost savings
- Increased productivity

Contribution to the energy transition

- Ester oil instead of mineral oil transformers
- Low-loss transformers



Country: Spain

Industry: Data centers

Commercial operation:
September & October 2024

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Enhancing cybersecurity and operational flexibility with Sensformer™ and Sensgear™

Challenge / Opportunity

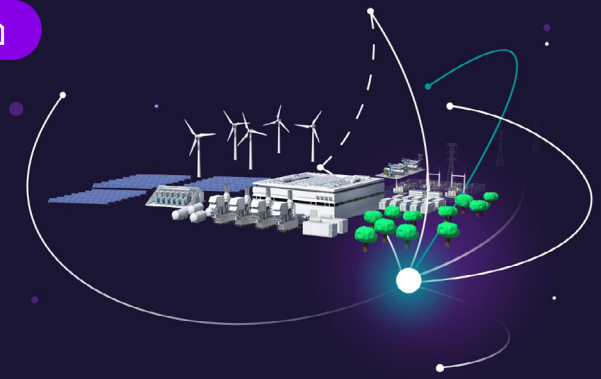
- Special emphasis on cybersecurity and the implementation of our Sensformer™ and Sensgear™ technology
- Milestone in the digital grid and service business with Data center customers

Solution

- Electrification with 20x 132 kV GIS bays and 4x 132/13 kV 50/63 MVA transformers
- The transformers are online on the cloud with a specially developed SSO

Benefits

- State-of-the-art cybersecurity
- Increased performance and operational flexibility
- Tailored and customized solutions
- Reliability, environmental protection, and safety



Country: France

Industry: Data centers

Commercial operation:
September 2023

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Transforming Data center infrastructure: advanced 225 kV substations for enhanced efficiency and integration

Challenge / Opportunity

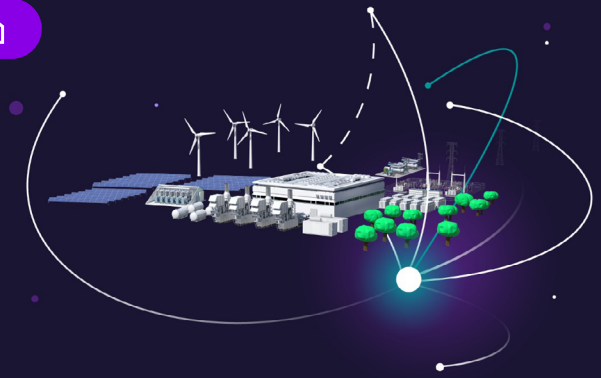
- The project encompasses two 225 kV high voltage substations A&B (two full redundant systems) to feed a data center in the suburbs

Solution

- Turnkey supply of two 225/11 kV GIS substations
- 2 x 4 GIS 225 kV bays
- 2 x 2 power transformers 225/11 kV ONAN/ONAF 40/55 MVA
- 2 x 2 MV rooms equipped with 10 cells 11kV
- HV Cables
- Control and protection systems
- Auxiliaries

Benefits

- Fully redundant system
- Perfect integration in the site
- Completion period: 21 months



Country: France

Industry: Data centers

Commercial operation: May 2024

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Revolutionizing energy infrastructure: implementing a high-tech 225 kV substation

Challenge / Opportunity

- 225 kV high voltage substation to feed a Data center in a suburban area.

Solution

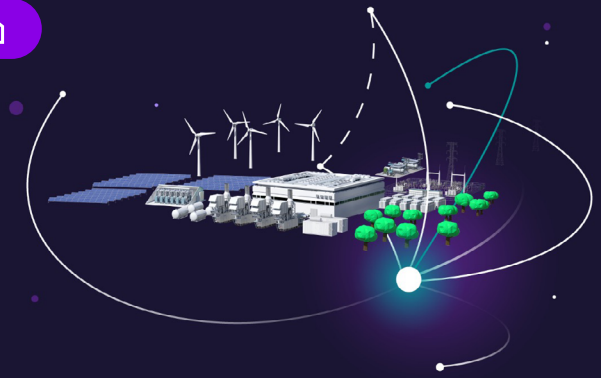
- Full turnkey supply of one 225/11 kV GIS substation
- 2 in/out 225 kV GIS bays
- 2 power transformers 225/11
- 65/75 MVA Knan/Knaf
- 2 MV switchgear 8 cells 11kV
- Control and protection systems
- Auxiliaries
- MV cable system

Benefits

- A fully redundant substation was provided
- Highly compact design, only covering 400 m^2

Contribution to the energy transition

- Installation of PV panels on the building roof
- Use of low-carbon concrete



Country: Indonesia

Industry: Data centers

Commercial operation:
November 2025 & June 2026

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Pioneering technological advancements: implementing a 150 kV for enhanced efficiency and sustainability

Challenge / Opportunity

- Full EPC solution including civil work, HDD work, building architecture, and integration with the local power grid (PLN)

Solution

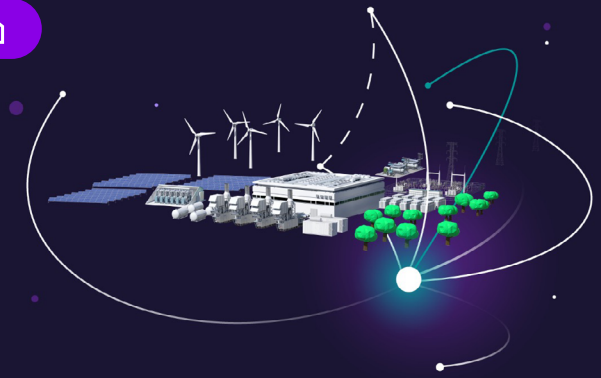
- Engineering, procurement, construction of a GIS 150 kV substation
- Design, engineering, construction, supply, delivery, supervision, installation, testing, and commissioning

Benefits

- Increased efficiency
- Improved reliability
- Enhanced safety
- Cost savings
- Increased productivity

Contribution to the energy transition

- Use of esther oil instead of mineral oil
- Low-loss transformers



Country: United States

Industry: Data centers

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Accelerating Data center development: advanced engineering and rapid deployment for an 800 MW facility

Challenge / Opportunity

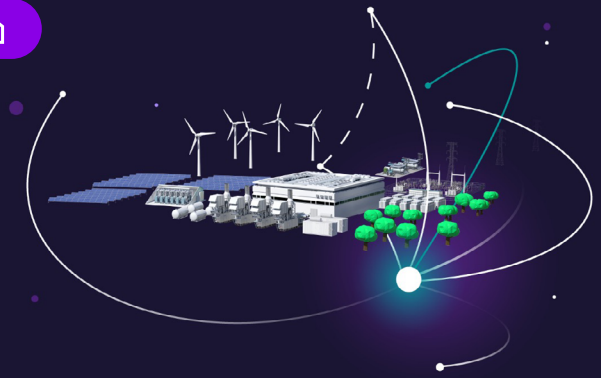
- 800 MW Data center facility with tight project timelines
- Partnership with qualified EPC contractors to provide comprehensive services

Solution

- Provided long lead equipment (transformers and HV breakers).
- 20 x 345 kV dead tank breaker SPS2–362
- 8 x 100 MVA / 133 MVA / 167 MVA transformers
- Completed installation, testing, and commissioning for certain components.

Benefits

- Timely equipment securing of essential long lead equipment early to meet timelines.



Country: Finland

Industry: Data centers

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Waste heat from a Data center replaces fossil fuel energy

Challenge / Opportunity

- Eliminate fossil energy from district heating production in Espoo to achieve carbon neutrality by 2030, while maintaining full operability of Data center

Solution

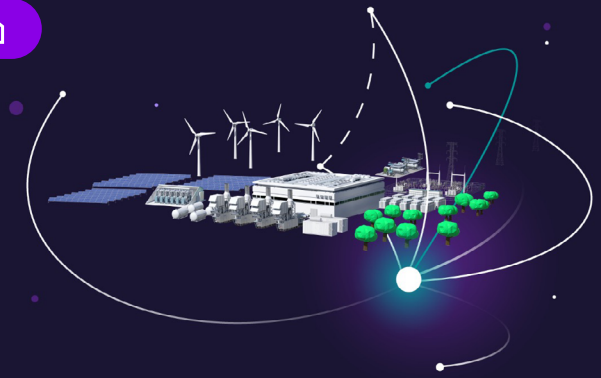
- 400/110 kV greenfield substation
- 400 kV as GIS
- 4 bays of 400 kV and 14 bays of 110 kV
- 20 21 kV 50 MVA shunt capacitor banks
- 8 400 kV 100 MVA shunt capacitor banks
- Installation & civil works

Benefits

- Reduction of CO_2 emissions
- Increased energy security
- Waste reduction

Contribution to the energy transition

- Utilization of waste heat to provide district heating



Country: Norway

Industry: Data centers

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Building sustainable Data centers in Norway

Challenge / Opportunity

- Meet the increasing demand for data storage while ensuring sustainable and reliable energy solutions
- Utilize advanced technologies and renewable energy sources to develop state-of-the-art Data centers

Solution

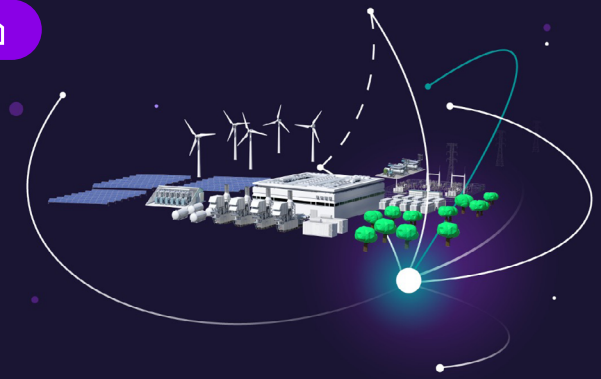
- Pre-engineering for 8 132/22 50 MVA transformers
- 12 bays 145 kV Blue GIS including control & protection
- 10 bays 145 kV Blue GIS including control & protection
- Blue CB 3AV1 FI 145 kV

Benefits

- Provides reliable and sustainable Data center solutions
- Enhances energy-efficiency and reduces carbon footprint

Contribution to the energy transition

- Use of environmentally-friendly Blue Portfolio
- Utilizing advanced cooling technologies



Country: Portugal

Industry: Data centers

Commercial operation:
Planned for completion by 2028

Strategic levers

Reliability | Efficiency | Speed | Availability

Use case

Utilities & IPPs

Powering Europe's largest colocation Data center with Siemens Energy solutions

Challenge / Opportunity

- Meet the growing demands for data and electricity while ensuring stable access to electricity
- Deliver mission-critical power and support the construction on site

Solution

- 400/150 kV 2 x 450 MVA
- 150/22 kV 4 x 80 MVA
- 150/11 kV 2 x 20 MVA
- 4x400 kV+17x150 kV bays, double busbar; Substations: 5x(150 / 22 kV 4x80 MVA) and 1 x (150/60 kV 2 x 20 MVA "Nest")
- 60 / 30 kV Blue GIS substation
- (2 x 20 MVA)

Benefits

- Reliability and redundancy at competitive power prices
- Enhances power reliability and sustainability
- Support in the construction and fit-out of the sire
- Facilitates the connection to renewable energy source