



## Avelgem-Avelin, one step closer to security of supply for Belgium and France

**TOURNAI | On 2 December 2022, the electricity transmission system operators of Belgium (Elia) and France (RTE) unveiled the reinforcement of the electricity connection between their two countries in the presence of the Walloon Minister of Energy, Philippe Henry and representatives from the French public authorities. The Avelgem-Avelin connection is now equipped with high temperature, low sag (HTLS) conductors, state-of-the-art technology which enables twice the amount of power to be carried across it (from 3 to 6 GW). This reinforcement of the European backbone will contribute to the security of supply of both countries, to the integration of renewable energy into the system and to the strengthening the integrated European grid.**

### **Avelgem-Avelin: meeting three major needs**

The Avelgem-Avelin project is essential for meeting the energy and climate challenges of today and tomorrow. By optimising the existing infrastructure, the two TSOs are ensuring the following:

- the enhancement of security of supply in both countries, due to a higher capacity for electricity exchange between them;
- increased integration of the European electricity market, which guarantees greater convergence of electricity prices in Europe;
- the integration of renewable energy produced by new generation units, thereby helping to achieve climate objectives.

The reinforcement of the Avelgem-Avelin connection with high-performance electric conductors has allowed Elia and RTE to optimise their existing infrastructure. Indeed, where possible, they favour the use of existing infrastructure in order to avoid the construction of new lines.

### **HTLS technology**

Replacing the conductors with HTLS technology doubles the capacity for electricity transmission between the two countries, from 3 GW to 6 GW. In real terms, this figure amounts to an electricity supply for nearly 6 million households.

An HTLS conductor can carry up to twice as much current as a conventional conductor. Thanks to its carbon core (rather than steel core), it expands less and can withstand greater thermal heating. There is also less sagging of the conductor when it carries a greater amount of current, making it more efficient than a conventional conductor.

### **10-year collaboration for a multi-phase project**

After an initial cooperation agreement between the two transmission system operators in 2011, the two worked on studies and completing administrative procedures until 2017. The four-year project was then able to be started. It was

carried out in several phases, as follows: adapting the relevant high-voltage substations; reinforcing certain pylons and their foundations; replacing the original conductors with high-performance HTLS conductors. The unveiling of the reinforced connection celebrates ten years of excellent collaboration between the RTE and Elia teams. Despite the difficult environment and the COVID-19 pandemic, the work was completed on time and without any accidents, which was a major area of concern for the two transmission system operators.

*"With the Government of Wallonia, we want to make every effort to support a cost-effective energy transition. This means more renewables and a more efficient use of energy. To achieve this, the electrification of end use and the development of renewables are essential. Against this background, the reinforcement of interconnectors improves the energy mix, the expansion of demand and the capacity for flexibility that can be activated by all grid users."*

**Philippe Henry, Walloon Minister of Energy**

*"The optimisation of Avelgem-Avelin doubles the exchange capacity of the interconnector to 6GW. This is the realisation of an important project which reinforces our backbone in Belgium. We are now better equipped to meet the challenges of the future. Carrying out this work makes it possible to deliver more societal wellbeing in our respective countries. The increase in electricity transmission capacity also contributes to European decarbonisation objectives by facilitating the integration of renewables. I would like to thank the teams from both countries who worked together for more than 10 years to complete the work on time."*

**Chris Peeters, CEO of Elia Group**

*"I am proud of our collaboration with Elia, which has increased the exchange capacity between our two countries, and this is a perfect illustration of European electrical solidarity. Solidarity that is essential in the midst of the energy crisis but also in the longer term to achieve our objectives of carbon neutrality."*

**Xavier Piechaczyk, President of the Management Board of RTE**

To enhance your press articles, you will find illustrations of the project here:  
<https://rd.eliagroup.eu/AvelgemAvelinPhotosProject>

You can also find photos of the event here: <https://rd.eliagroup.eu/AvelgemAvelinPhotosEvent>

## About Elia Group

### One of Europe's top five TSOs

Elia Group is a key player in electricity transmission. We ensure that production and consumption are balanced around the clock, supplying 30 million end users with electricity. Through our subsidiaries in Belgium (Elia) and the north and east of Germany (50Hertz), we operate 19,192 km of high-voltage connections, meaning that we are one of Europe's top 5 transmission system operators. With a reliability level of 99.99%, we provide society with a robust power grid, which is important for socio-economic prosperity. We also aspire to be a catalyst for a successful energy transition, helping to establish a reliable, sustainable and affordable energy system.

### We are making the energy transition happen

By expanding international high-voltage connections and incorporating ever-increasing amounts of renewable energy into our grid, we are promoting both the integration of the European energy market and the decarbonisation of society. We also continuously optimise our operational systems and develop new market products so that new technologies and market parties can access our grid, thus further facilitating the energy transition.

### In the interest of society

As a key player in the energy system, Elia Group is committed to working in the interest of society. We are responding to the rapid increase in renewable energy by constantly adapting our transmission grid. We also ensure that investments are made on time and within budget, with a maximum focus on safety. In carrying out our projects, we manage stakeholders proactively by establishing two-way communication channels between all relevant parties very early on in the development process. We also offer our expertise to different players across the sector in order to build the energy system of the future.

### International focus

In addition to its activities as a transmission system operator, Elia Group provides consulting services to international customers through its subsidiary Elia Grid International. In recent years, the Group has launched new non-regulated activities such as re.alto - the first European marketplace for the exchange of energy data via standardised energy APIs - and WindGrid, a subsidiary which will continue to expand the Group's overseas activities, contributing to the development of offshore electricity grids in Europe and beyond.

The legal entity Elia Group is a listed company whose core shareholder is the municipal holding company Publi-T.

For further information, please contact:

#### Corporate Communication

Jean Fassiaux (FR) | M +32 474 46 87 82 | [jean.fassiaux@elia.be](mailto:jean.fassiaux@elia.be)  
Marie-Laure Vanwanseele (NDL) | M +32 499 86 51 58 | [marielau.re.vanwanseele@elia.be](mailto:marielau.re.vanwanseele@elia.be)  
Marleen Vanhecke (EN) | M +32 486 49 01 09 | [marleen.vanhecke@elia.be](mailto:marleen.vanhecke@elia.be)

#### Elia Transmission Belgium SA/NV

Boulevard de l'Empereur 20 | Keizerslaan 20 | 1000 Brussels | Belgium

[eliagroup.eu](http://eliagroup.eu)

