

Guarantees of Origin Market

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Guarantees of Origin and Disclosure of Electricity

A guarantee of origin is an electronic document centrally regulated by the EU Renewable Energy Directive, which has the sole function of demonstrating to a customer that a given share or quantity of energy was produced from renewable sources. A guarantee of origin is transferred independently of the energy to which it relates, in order to facilitate cross-border trade of renewable electricity and allow the retail market to contribute to the development of energy from renewable sources.

Each guarantee of origin is an electronic certificate of 1 MWh standard size, with a lifetime of 12 months. The governance of the system has certain rules:

- issuing bodies shall not have overlapping geographical responsibilities;
- only one guarantee of origin shall be issued for one MWh of electricity;
- guarantees of origin shall be issued, transferred and cancelled electronically;
- each guarantee of origin has a unique identification number and a specific information content: renewable source, production period, support if any, location, type, capacity and commissioning date of the installation;
- when the producer receives financial support from a support scheme the market value of the guarantee of origin for the same production shall be taken into account appropriately in the relevant support scheme.

The amount of renewable electricity tracked with guarantees of origin to specific consumers shall be subtracted from the total electricity produced in a country to cover consumption. The share of energy sources available for disclosure to consumers who have no preference on the origin of the electricity, is calculated after the use of guarantees of origin has been accounted for and represents a country's residual mix. The calculation of residual mix in Europe is centrally coordinated, to account for the physical transfer of electricity through interconnections and the attributes of renewable electricity internationally traded through guarantees of origin.

It is important to point out that the guarantees of origin are not used for the calculation of the gross final consumption of energy from renewable sources and the compliance with the member states binding targets for 2030.

European Market of Guarantees of Origin

A European standard for guarantees of origin has been developed by CEN/CENELEC, based on the European Energy Certificate System "EECS" developed and operated by the Association of

Issuing Bodies “AIB”. The Association is a nonprofit organization founded in 2002, which consists of 24 members representing 21 European countries. The AIB operates also an inter-registry communications HUB that facilitates the international exchange of guarantees of origin.

The growing interest in environmentally friendly consumption and the trust of the consumers to the system have resulted to an increased demand for guarantees of origin in Europe. The most guarantees of origin are sold to businesses that want to report to customers, investors and other stakeholders the achievement of their environmental targets. In the RE100 initiative, for example, over one hundred large multinational companies have committed “to go 100 percent renewable”. There are also consumers that are conscious of their impact to the environment and prefer guarantees of origin from recently built and/or local power plants.

The trade of guarantees of origin depends mostly on bilateral contracts. A great amount is also traded via brokers. Another way to obtain guarantees of origin is from auctions, organized in some member states. The guarantees of origin offered in the auctions are issued for renewable stations that are financially supported by public funds. Italy was the first to set up auctions of “supported” guarantees of origin, Luxembourg launched the first auction in January 2019 and France has announced that will do the same in September this year.

The situation in Greece

The Guarantees of Origin Registry in Greece has been operating since 2010, in full compliance with the Directive 2009/28/EC, supported by an information system that provides security and traceability for all transactions performed.

After almost a decade of operation, guarantees of origin are not widely used in the country and there are very limited international exchanges. A significant reason for this is the absence of disclosure regulation. The amount of electricity that is sold to a customer or exported from the country using guarantees of origin, remains in the share of renewable electricity disclosed to all Greek consumers alike. This is called “double counting” of electricity.

As a result, electricity suppliers in Greece do not promote the use of guarantees of origin to their customers and most EU member states do not recognize the Greek guarantees of origin for disclosure in their domain.

Nevertheless, guarantees of origin may significantly contribute to the compliance with the national target for renewable electricity production, because they are an important asset of renewable energy stations, especially for those that are not getting any financial support. To this direction, the new Renewable Energy Directive (EU/2018/2001) has envisaged a Union-wide green label with the view to promote the use of renewable energy coming from new installations.

Taking into consideration the experience of the European electricity market and the provisions of the new Renewable Energy Directive that promotes the use of guarantees of origin, the standardization of guarantees of origin issued in Greece and the integration into the European environmental market is necessary in order to meet the ambitious target of 2030.

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