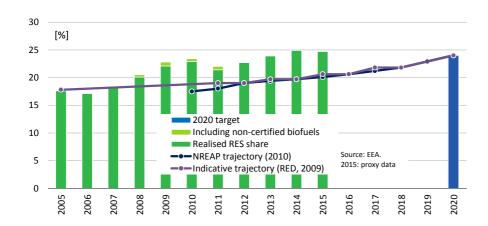
# Romania

### Summary

The promotion of renewable electricity in Romania relies primarily on a renewable quota scheme. Since 2017 the scheme has been closed for new projects. Renewable heating & cooling is promoted through investment subsidies. Renewable energy sources in the transport sector are promoted by a biofuels quota scheme and indirectly through a subsidy scheme for the purchase of electric vehicles.





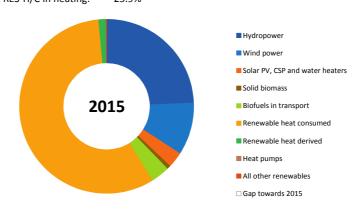
### Abbreviations used:

RES: renewable energy sources RES-E: renewable electricity RES-H/C: renewable heating/cooling RES-T: renewable transport fuels

# 2005

### Data for 2015

24.8%	Avoided fossil fuels:	10.3 [Mtoe]	
24.0%	Avoided fuel expenses:	1.9 [billion euro]	
43.2%	RES Turnover:	1570 [MEUR]	
5.5%	RES Employment:	17200 [jobs]	
25.9%			
	24.0% 43.2% 5.5%	24.0% Avoided fuel expenses: 43.2% RES Turnover: 5.5% RES Employment:	24.0% Avoided fuel expenses: 1.9 [billion euro] 43.2% RES Turnover: 1570 [MEUR] 5.5% RES Employment: 17200 [jobs]



Source: Eurostat, 2017.

	2005		2015	
	Energy	Energy	Employment	Turnover
Hydropower	1305.2 ktoe	1416.8 ktoe	2600 Jobs	30 MEUR
Wind power	0.0 ktoe	564.6 ktoe	1100 Jobs	150 MEUR
Solar PV, CSP and water heaters	0.0 ktoe	170.4 ktoe	1500 Jobs	85 MEUR
Solid biomass	0.5 ktoe	39.7 ktoe	11100 Jobs	1080 MEUR
Biofuels in transport	0.0 ktoe	202.5 ktoe	650 Jobs	200 MEUR
Renewable heat consumed	3183.5 ktoe	3330.9 ktoe		
Renewable heat derived	18.1 ktoe	78.7 ktoe		
Heat pumps	0.0 ktoe	0.0 ktoe	0 Jobs	0 MEUR
All other renewables	0.7 ktoe	5.3 ktoe	2850 Jobs	55 MEUR
Gap towards 2015	1301.0 ktoe			Source: Eurostat, EurObserv'ER, 201

Hydropower jobs & turnover only covers 'small hydropower'. PV=Photovoltaics, CSP=Concentrated Solar Power. Biofuels in transport only covers compliant fuels (employment and turnover additionally cover the non-compliant biofuels). Derived heat includes heat produced in main activity producer plants and heat sold produced in autoproducer plants. Its counterpart is the final heat consumption in the final consumption sectors (such as households).























## **CURRENT RENEWABLE ENERGY POLICY**

In Romania, electricity from renewable sources is promoted, mainly, by a renewable quota scheme. The scheme has been closed for new installations producing electricity from renewable sources on 31 December 2016. There has been much discontent regarding the main support scheme on the part of renewable generators after 2014 on account of heavy financial losses they had to endure. While both the producers and the Ministry of Energy have been discussing throughout the entire year 2016, how the main law 220/2008 defining the renewable quota scheme can be amended, no final decision was reached in 2016. In the 2016 version of the Romanian National Energy Strategy, no plans have been presented on how to shape support for new renewable electricity generating installations, except for the underdeveloped biomass sector.

Support for use of renewables in the heating and cooling sector include investment subsidies (notably for district heating) and a training programme for installers.

Renewable energy use in the transport sector is promoted by a biofuels quota scheme.

# **OVERVIEW OF MAIN SUPPORTING POLICIES**

The main financial support scheme for the production of electricity from renewable energy sources is a certificates-backed renewable quota scheme. The scheme has been open for new installations until 31 December 2016. Since 2017 there is no comprehensive RES-E support scheme in place. The existing certificates-backed renewable quota scheme is still valid for installations commissioned before 2017 and will remain in place until 2031. The renewable quota scheme having been closed for operators of new installations, the latter can still obtain an investment subsidy through the National Rural Development Programme.

Law No 122/2015 foresees the introduction of feed-in tariffs for installations smaller than 500 kW. Yet by May 2016 the methodology for the application of this mechanism has not yet been published.

To date, the following policies aim at promoting the installation, usage and distribution of installations producing electricity or heating on the basis of renewables. A general vocational training programme is conducted with some relevance for such installations. Furthermore, there is a recommendation in place considering the use of renewable energy sources in new buildings with a surface of more than  $1000 \text{m}^2$ . An investment subsidy programme encourages investment in the district heat infrastructure using bioenergy on local level and provides co-financing at concessional terms.

Support for the use of renewables in the heating and cooling sector is provided by investment subsidy programmes of the Romanian Environmental Fund and of the National Rural Development Programme.

The following policies aim at promoting the installation, usage and distribution of RES-installations in Romania. There are vocational trainings with limited relevance for RES-installations.

Renewable energy sources in the transport sector are promoted by a biofuels quota scheme. Fuel retailers are obliged to ensure that biofuels make up the prescribed minimum share of their annual sales.

There is a target for biofuels in place for adding biofuels to petrol and diesel (Art. 3 par. 1 Decision No. 935/2011). Only certified biofuels satisfying specific sustainability criteria can be taken into account for fulfilling the prescribed quota (art. 5 par. 3-9 Decision No. 935/2011). Furthermore, fuel retailers are required to reduce the greenhouse gas emissions of the market fuels (Art. 8 par. 10 Decision No. 928/2012 as referred to in Art. I par. 5 Decision No. 1121/2013). Non-biogenic renewable transport fuels are not directly promoted as such, but in April 2017 an electric vehicles subsidy programme was announced entitling the buyer of a battery electric vehicle to a €10,000 subsidy.

Table 1: Overview of support schemes to promote renewable energy

		REGULATORY POLICIES			FISCAL INCENTIVE AND PUBLIC FINANCES					
	Feed-in tariffs	Feed-in premiums	Tenders	Quota obligation with Tradable Green certificates 1)	Quota obligation without Tradable Green certificates 3)	Net-metering/ net-billing	Investment subsidies 2)	Tax credit mechanism I	Tax credit mechanism II	Soft loans
RES-E										
- Offshore wind				х			х			
- Onshore wind				х			х			
- Solar				Х			Х			
- Hydro				Х			Х			
- Geothermal				х			Х			
- Solid biomass				х			Х			
- Biogas				Х			Х			
RES-H/C										
- Solar thermal							Х			
- Geothermal							Х			
- Biomass							х			
- Biogas							х			
- Small scale installations, e.g. solar thermal collects, heat pumps, biomass boilers and pellet stoves							х			
- Others, i.e. aerothermal, hydrothermal							х			
RES-T										
- Bio gasoline					х					
- Biodiesel					х					
- Electric vehicles			-114		:		х			

<sup>1)</sup> Since 2017 the renewable quota scheme is closed for new projects.

- 2) Developers of electricity generation and heating & cooling projects from renewable energy sources can apply for an investment subsidy from the National Rural Development Programme. Developers of district heating projects, including projects based on bioenergy, are entitled to a specific investment subsidy.
- 3) Suppliers of transport fuels are mandated to participate in a biofuels quota scheme, not encompassing other renewable transport fuels.

Sources: EurObserv'ER, GSR/REN21, RES-Legal Europe (2017)

Table 2: Overview of main instruments used at present

Instrument	Description
Renewable quota scheme	Suppliers are mandated to source annually a set annual minimum share of their total electricity deliveries from generators of power from renewable energy sources, to be proven by surrendering certificates. Since 2017 the renewable quota scheme is closed for new projects.
Investment subsidy	Developers of electricity generation and heating & cooling projects from renewable energy sources can apply for an investment subsidy from the National Rural Development Programme.
Vocational training programmes for installers	Applicable, among others, to technicians installing heating & cooling appliances.
Government recommendation to use renewable energy in new buildings	Applicable to new buildings with a floor surface of more than 1000m <sup>2</sup> .
Investment subsidy for district heating	Also applicable to installations using bioenergy.
Biofuels quota scheme for transport fuels	Suppliers of transport fuels have to meet a certain minimum share of their annual turnover by biofuels that are certified to comply with regulated minimum sustainability criteria. Moreover, their transport fuel deliveries have to comply with certain minimum GHG emissions standards. The biofuels quota scheme does not encompass other renewable transport fuels.

# For further information:

CEER, 2017. Status Review of Renewable Support Schemes in Europe.

http://www.ceer.eu/portal/page/portal/EER\_HOME/EER\_PUBLICATIONS/CEER\_PAPERS/Electricity/2017/C16-SDE-56-03%20Status%20Review%20RES%20Support%20Schemes.pdf

EEA, 2017. [1] EEA, 2017 <a href="http://www.eea.europa.eu/data-and-maps/daviz/actual-res-progress-indicative-trajectory-2">http://www.eea.europa.eu/data-and-maps/daviz/actual-res-progress-indicative-trajectory-2</a>

Eurostat, 2017. Energy from renewable sources. <a href="http://ec.europa.eu/eurostat/statistics-explained/index.php/Energy">http://ec.europa.eu/eurostat/statistics-explained/index.php/Energy</a> from renewable sources

REN21, Global Status Report 2017 <a href="http://www.ren21.net/wp-content/uploads/2017/06/170607">http://www.ren21.net/wp-content/uploads/2017/06/170607</a> GSR 2017 Full Report.pdf

IEA/IRENA Joint Policies and Measures database <a href="https://www.iea.org/policiesandmeasures/renewableenergy/?country=Romania">https://www.iea.org/policiesandmeasures/renewableenergy/?country=Romania</a>

Member State Progress Report, available at the Renewable Energy pages of the European Commission, http://ec.europa.eu/energy/en/topics/renewable-energy

RES Legal database, <a href="http://www.res-legal.eu/search-by-country/romania/">http://www.res-legal.eu/search-by-country/romania/</a> <a href="https://www.iea.org/policiesandmeasures/pams/romania/">https://www.iea.org/policiesandmeasures/pams/romania/</a>

https://www.iea.org/policiesandmeasures/renewableenergy/?country=Romania:

https://www.iea.org/policiesandmeasures/pams/romania/name-33751-en.php

http://luiza.manolea.ro/blog/legislatie/energie-din-surse-regenerabile/legea-2202008-promovarea-producerii-energiei-din-surse-regenerabile-de-energie/ (legislation regarding promotion of renewable electricity through the renewable quota scheme)

http://www.mai.gov.ro/ (legislation regarding renewable heating and cooling)

http://www.electrans.co.uk/romania-introduces-new-fangled-ev-policy/ (regards announcement of an electric vehicles subsidy programme.)

http://www.economica.net/promisiunea-psd--vouchere-de-10-000-de-euro-si-20-000-de-statii-de-incarcare-a-masinilor-electrice\_131123.html#n (regards announcement of an electric vehicles subsidy programme)

http://www.europarl.europa.eu/RegData/etudes/IDAN/2015/540376/IPOL\_IDA(2015)540376\_ <u>EN.pdf</u> (regards planning of –mainly electrical – railways network)

http://globalcompetitionreview.com/insight/the-european-middle-eastern-and-african-antitrust-review-2017/1067815/eu-energy (Amendments to renewable quota scheme meet EEAG: DG COMP decision SA.37177 on 4 May 2015)



This project is funded by the European Union under contract n° ENER/C2/2016-487/SI2.742173

# Disclaimer

This document was prepared by the EurObserv'ER consortium, which groups together Observ'ER (FR), the Energy research Centre of the Netherlands (ECN, NL), the Renewables Academy (RENAC, DE), Frankfurt School of Finance and Management (DE), Fraunhofer-ISI (DE) and Statistics Netherlands (CBS, NL). The information and views set out in this publication are those of the author(s) and do not necessarily reflect the official opinion of the Commission. The Commission does not guarantee the accuracy of the data included in this study. Neither the Commission nor any person acting on the Commission's behalf may be held responsible for the use which may be made of the information contained therein.