





# Phase-out 2020: monitoring Europe's fossil fuel subsidies

Leah Worrall and Matthias Runkel

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# Italy



#### Leading on phasing out fossil fuel subsidies:

- Italy is demonstrating commitment to report on its fossil fuel subsidies, as part of the EU agreements.
  Following the approval of a Green Economy package by Parliament, the Italian Ministry of Environment released a summary of subsidies with harmful and beneficial impacts on the environment. This includes Italy's tax expenditures and budgetary support for fossil fuels, but does not include support provided through public finance or state-owned enterprises.
- Domestic oil and gas production are in decline, which may account for low domestic support for fossil fuel production infrastructure in Italy through its development bank Cassa Depositi e Prestiti (CDP).
- Remaining national subsidies to coal mining and coal-fired power are comparatively low in Italy, indicating the possibility for a complete phase-out of support for these subsidies by 2018, in line with its EU-level commitment to phase out hard-coal mining by 2018.

#### Lagging on phasing out fossil fuel subsidies:

- The Fiscal Reform Delegation Law introduced in 2014 required the removal of environmentally harmful subsidies, but it has never been implemented. All sectors reviewed in this analysis still receive fossil-fuel subsidies (see Table 1).
- The transport sector receives the most support through government spending. This includes a reduced excise tax rate for diesel compared with petrol fuel, at an annual average cost of €5 billion.
- Support for fossil-fuel production and electricity infrastructure in 10 countries and other global investments were worth an annual average of €1.3 billion during the period 2014 to 2016. This was provided through the Servizi Assicurativi del Commercio Estero (SACE) and Cassa Depositi e Prestiti (CDP).

# **Brief**

Czech Republic France Germany Greece Hungary Italy Netherlands Poland Spain Sweden United Kingdom European Union

#### Status of the energy transition in Italy

In recent years, to improve the competitiveness of its energy sector the Italian government has prioritised the privatisation and liberalisation of the market and infrastructure development (International Energy Agency (IEA), 2016). The low level of competition in Italy's electricity market results in tariffs that are amongst the highest in Europe (IEA, 2016). The energy incumbent Enel, which is 31% owned by the Italian Ministry of Economy and Finance, remains the largest supplier to the Italian electricity grid (IEA, 2016; Enel, 2017). Enel has recently pledged to close all of its coal plants by 2035 and gradually to end investments in coal, becoming carbon neutral by 2050 (Enel, 2015; Brundisium, 2017; Greenpeace, 2015).

Italy's last remaining coal mine, Carbosulcis, is stateowned and set to close by 2018. This timeframe is on schedule for the European Union (EU) deadline to end subsidies to hard coal mining. Support for land restoration is set to continue until 2027 however (Carbosulcis, 2014; 2015; Patel et al., 2017). Italy produces oil and gas through domestic onshore and offshore oil and gas fields, but this only accounts for 10% of domestic usage (IEA, 2016). Since 2005, domestic natural gas and oil production declined by 43% and by 11% respectively (IEA, 2016).

Fossil fuels account for a significant, but declining, proportion of Italy's electricity mix, decreasing from 81% in 2000 to 60% in 2015 (World Development Indicators (WDI), 2017). Coal, natural gas and oil provided 17%, 38% and 4.8% respectively of Italy's electricity supply in 2015, with the remainder (39%) coming from renewables and hydroelectricity resources (WDI, 2017).

Italy has major plans to expand its gas networks. Although much of this expansion is projected to be funded by private sector investment, Snam, the minority stateowned operator of natural-gas transmission, is planning a  $\in$ 4.7 billion investment (31% ownership through CDP) (LNG World News, 2017). This is in addition to other gas projects including Snam's  $\in$ 270 million investment to connect Italy to the Trans Adriatic Pipeline Project (southern gas corridor) and the EDF Edison investment in the Galsi Pipeline, costing  $\in$ 120 million to connect Italy with Algeria (LNG World News, 2017; Edison, 2016).

Italy's 2013 National Energy Strategy<sup>1</sup> has the stated aim of delivering a secure, sustainable and competitive energy system in the country (Ministry of Economic Development, 2013). The strategy's decarbonisation objectives internalise the commitments of Europe's 2020 Strategy and Roadmap 2050 (European Commission (EC), 2017; Roadmap 2050, 2017). For more information please refer to the summary report *Phase-out 2020: Monitoring Europe's fossil fuel subsidies*. Italy is currently on track to meet these targets; growth in the road transport sector, however, the second-largest sector for greenhouse gas (GHG) emissions, could increase emissions above these targets (IEA, 2016).

#### Status of fossil fuel subsidy phase-out in Italy

The European Union (EU) including all its Member States have committed to phasing out environmentally harmful subsidies, including those to fossil fuels, by 2020 (European Commission, 2011). In addition, EU Member States are committed to phasing out subsidies to hard coal mining by 2018. As party to the Paris Agreement, Italy has also committed to '[m]aking finance flows consistent with a pathway towards low greenhouse gas emissions and climate-resilient development' (United Nations Framework Convention on Climate Change (UNFCCC), 2015). As a member of the EU bloc that is party to the G7, Italy has committed to phasing out its 'inefficient' fossil fuel subsidies, and called on all countries to do so as well, by 2025 (G7, 2016). As a member of the EU, and therefore a part of the G20, Italy has repeated its commitment to phase out fossil fuel subsidies every year since 2009 (G20, 2017). With nearly 40 other countries and hundreds of companies, Italy signed a communiqué in 2015 calling on countries to eliminate inefficient fossil-fuel subsidies (Friends of Fossil Fuel Subsidy Reform (FFFSR), 2015). Italy introduced the 2014 Fiscal Reform Delegation Law, which requires the removal of environmentally harmful subsidies, as part of environmental fiscal reform (under Article 15). This has not yet been implemented (Ministry of Environment, 2016).

Italy's Minister for Economic Development, Federica Guidi, has promoted a reform package to reduce electricity subsidies by an estimated  $\in 1.5$  billion per year or 10% of total subsidies (Stagnaro, 2014; Patel et al., 2017). Given that 60% of Italy's electricity is derived from fossil fuels, this reform is estimated to reduce fossil fuel-related electricity subsidies by  $\notin 900$  million a year (WDI, 2017). Former Prime Minister Matteo Renzi advocated for a full phase-out of coal power but with no firm timeframes (Littlecott, 2016; Patel et al., 2017). Ahead of the 2018 elections, the new administration has shown no new policy ambition on this.

### Overview of fossil fuel subsidies by Italy

As the current President of the G7, Italy has demonstrated leadership in committing to improve its transparency on environmentally harmful subsidies (Green Budget Europe, 2016). In February 2016, a package of measures came into force following approval by Parliament, aiming to promote a Green Economy in Italy. Under this package, the Italian Ministry of Environment published an inventory

<sup>1</sup> Strategia Energetica Nazionale: per un'energia più competitiva e sostenibile

of environmentally harmful and beneficial subsidies, including those related to electricity delivery and fossil fuels (Ministry of Environment, 2016).

This is a positive step in holding the Italian government to account on phasing out fossil fuel subsidies. However, it does not consider subsidies through public financing (through public banks and export credit agencies) and investments by partially state-owned enterprises, and has not been subject to external verification or peer review.<sup>2</sup>

Despite Italy's commitments to phase out fossil fuel subsidies, all sectors reviewed in this analysis continue to receive domestic support, and Italy is still providing support to oil, gas and coal abroad.

Based on available information Table 1 below provides an estimate of the scale of Italy's fossil fuel subsidies on average per year between 2014 and 2016 (using publicly available sources).

Overall, total national subsidies to domestic coal production remain relatively low compared to other EU countries (Whitley et al., 2017; Worrall and van der Burgh, 2017). Financial support to oil and gas, however, is significant, and is mostly provided through tax exemptions, followed by government budget support. For more information on the sources of data and the methodology used in this report, please refer to the Methodology chapter of the summary report, *Phase-out 2020: Monitoring Europe's fossil fuel subsidies.* 

Most domestic government spending is supporting fossil fuel use in the transport sector, amounting to  $\notin 8.7$ billion per year between 2014 and 2016, followed by the household and electricity sector. International support for oil, gas and coal production is also relatively high at  $\notin 1.3$ billion on average per year between 2014 and 2016.

Due to limited transparency, our research found no data for 24% of the fiscal support instruments identified for this report.

The following sections give more detail on subsidies provided to the production and consumption of oil, gas and coal, and to fossil fuel-powered electricity. The summary below is not comprehensive; the full list of subsidies can be found in the Italy Datasheet.

	Production				Consumption					
Activity / instrument	Coal mining	Oil and gas	Electricity	Multiple or unclear	Transport	Industry and business	Households	Agriculture	Multiple or unclear	TOTAL
National subsidies (Budget expenditure + tax exemptions + price relief)	n/a	1,406	2,422	417	8,746	728	1,670	1,203	13	16,604
Public finance	192	1,073	0	1	0	0	0	0	0	1,266
Domestic + Europe	0	151	0	0	0	0	0	0	0	151
International	192	922	0.3	1	0	0	0	0	0	1,115
State-owned enterprise investments	0	0	0	0	0	0	0	0	0	0

#### Table 1. Subsidies to fossil fuel production and consumption in Italy, by activity (Euro millions, average 2014-2016)

Note: For sources and data, see country data sheet and summary report available at odi.org/Europe-fossil-fuel-subsidies \* There are no state-owned enterprises (SOEs) that fit the SOE definition adopted by this report.

<sup>2</sup> G20 members have participated in peer reviews of fossil fuel reporting. This process encourages countries to provide more detailed inventories and to commit to the sequencing of reforms (Steenblik, 2016).

## **Coal mining**

#### **Domestic**

The Carbosulcis state-owned coal mine, whose sole shareholder is the Sardinian regional government, has been experiencing annual net revenue losses of  $\in 6.6$  million in 2014 and  $\in 4.5$  million in 2015 and hence requires government support (Carbosulcis, 2015; Patel et al., 2017). Given this study's focus on *national* fossil-fuel subsidies, and the mine is a *regional* state-owned enterprise, this value is excluded from Table 1.

#### International (outside of the EU)

The Italian export credit agency, Servizi Assicurativi del Commercio Estero (SACE), has supported investments in coal infrastructure overseas, including a €633 million guarantee for the Punta Catalina project in the Dominican Republic (Oil Change International (OCI), 2017). This is for the development of two 376 megawatt (MW) coal-fired power plants and a coal-receiving terminal (OCI, 2017). In 2015 SACE also provided a €6 million guarantee to Gruppo Magaldi, a leading manufacturer of the steel belt conveyors that are used in coal-fired power plants (OCI, 2017; Magaldi, 2017). This was used to strengthen the company's presence in overseas markets where coal is of strategic importance, such as in Australia, India, Japan, South Korea and the United States (OCI, 2017).

### **Oil and gas production**

#### **Domestic, and EU countries**

The government provides financial incentives for oil and gas extraction and production in Italy. Royalty-free thresholds for oil and gas extraction create an average tax expenditure of €1.4 billion a year (Legambiente, 2016; Organisation for Economic Cooperation and Development (OECD), 2015). The relevant 1996 Act provides an exemption on the first 20,000 tonnes of oil produced onshore (or 50,000 tonnes offshore) and the first 25 million cubic metres of natural gas onshore (or 80 million cubic metres offshore) (OECD, 2015). The tax exemptions applied thereafter are up to 10% reduction for onshore drilling or 7% for offshore drilling (Legambiente, 2016).

The Cassa Depositi e Prestiti (CDP) Italian investment bank is 80% owned by the Italian Ministry of Economy and Finance. CDP loans have recently supported the development of Italian gas production infrastructure, and in 2014 the company agreed a  $\notin$ 222 million loan for the refinancing of the '2i Rete' gas distribution network that distributes gas to 1,961 municipalities in Italy (OCI, 2017). The same year, a  $\notin$ 269 million CDP loan refinanced a transmission joint venture with CDP Reti (OCI, 2017).

#### International (outside of the EU)

SACE has supported oil and gas infrastructure in Angola, Azerbaijan, Brazil, Egypt, Oman, Turkey and Viet Nam, investing an average of €922 million per year between 2014-2016 (OCI, 2017). Major projects include a €1.1 billion multi-year guarantee, agreed in 2015, to modernise and expand the Middle East Oil Refinery (MIDOR) in Egypt (OCI, 2017).

In 2014 the Socar Turkey Aegean Refinery project in Turkey received a multi-year guarantee worth  $\in 600$ million, for the construction of a refinery near Izmir (OCI, 2017). In 2015 a  $\in 300$  million multi-year guarantee in Brazil underwrote Cidade de Saquarema's contracts for the construction of an offshore floating production, storage and offloading unit, alongside a  $\in 167$  million guarantee for the development of a floating production, storage and floating vessel in Lula Central (OCI, 2017).

# **Electricity production**

Power plants in Italy receive various tax credits and deductions. Plants that operate on fossil fuels for the generation of electrical power or co-generation of heat received tax reductions worth €366 million in 2016 (Ministry of Environment, 2016). Fossil-fuel power plants with 'reduced operation' receive income-tax deductions worth an additional €51 million in tax expenditure in 2016 – the rate of reduction varies between 0.4% and 1.1% based on threshold operator revenues (Ministry of Environment, 2016). Natural gas power plants also received additional tax breaks worth €7 million in 2016 (Ministry of Environment, 2016).

Electricity-generating power plants receive further budgetary support through the CIP6 subsidy and the UC4 subsidy mechanism, worth €426 million and €22 million in 2015 respectively (Legambiente, 2016). Other government spending is earmarked through the dispatch payment mechanism, worth €1.2 billion a year on average and covered through electricity bills (Legambiente, 2016). Meanwhile, the government supports gasification in coaland gas-fired power plants to the sum of €310 million a year (Legambiente, 2016). The government also provided budgetary support for grid connections with other European countries worth an average of €450 million a year (Legambiente, 2016). It is estimated that €269 million a year supports fossil fuel-based electrical distribution, based on the proportion of fossil fuels in Italy's electricity grid (60%) (Legambiente, 2016; WDI, 2017). At the regional level, power plants receive budgetary support under the EU Emissions Trading Scheme (ETS). This is discussed further in the 'Industry and business' section below and in the summary report Phase-out 2020: Monitoring Europe's fossil fuel subsidies.

#### Transport

The Italian government gives tax breaks and exemptions to several transport sub-sectors. The largest subsidy is a reduced excise tax rate on the consumption of diesel fuel for road transport in Italy, worth an estimated  $\in$ 5 billion in 2016 (Ministry of Environment, 2016). The tax rate applied to diesel is 23% lower than petrol in terms of energy content (Ministry of Environment, 2016). The Department of Finance also provides reimbursements for diesel excise tax when diesel is used for road freight transport (in vehicles of category 2 or lower<sup>3</sup>), equivalent to 15% savings or  $\in$ 1.4 billion on per year between 2014 and 2016 (Ministry of Environment, 2016; OECD, 2015).

Italy's shipping, rail and air transport fuels also receive fuel-tax exemptions. The reduced excise duty on fuel for air navigation is valued at  $\in 1.6$  billion in 2016 (Ministry of Environment, 2016)<sup>4</sup>. Fuel tax exemptions for the marine transportation of goods and passengers (including fisheries vessels) averaged  $\in 548$  million per year between 2014 and 2016 (Ministry of Environment, 2016; OECD, 2015). Fueltax reductions on rail transport of goods and passengers generated tax expenditures of  $\in 6.6$  million in 2016, with an additional  $\notin 65$  million awarded to electric railways that year (Ministry of Environment, 2016; OECD, 2015). Given that 60% of electricity in Italy still comes from fossil fuels, the latter supported fossil fuel production by an estimated  $\notin 39$  million that year (in 2015; WDI, 2017).

Italy's border regions with Austria and Switzerland receive budgetary support through a fund to reduce the price of petrol and diesel at the pump, worth  $\in$ 5 million a year (Ministry of Environment, 2016). Though we found no estimates on the total amount of support, fuel tax on the use of petrol for public transport is reduced by up to 60% (excluding railways) (OECD, 2015). Domestic and non-domestic passenger transport also receive VAT reductions (a VAT rate of 10%, compared with the normal rate of 22%) (CASE et al., 2014), though these figures are not quantified. The revenue foregone is potentially very large. Other sectors that receive fuel subsidies include the army, ambulances and taxis.

Of all the support identified for consumption of fossil fuels in transport, 1% was targeted at a specific part of the population (at ambulances, armed services and taxis).

#### Industry and business

Under the EU Emissions Trading System (ETS) Italy's industry and power sectors received free emissions allowances estimated at €654 million in 2016 (Ministry of Environment, 2016). In addition, EU ETS allocation errors made by the Italian government in 2008-2012

have resulted in reimbursements to operators since 2013 valued at €168 million a year since 2012 on average (Qual Energia, 2016; Legambiente, 2013; Legambiente, 2016).

Tax breaks for large industrial users of natural gas lead to 40% reductions on the cost of natural gas, equivalent to an average expenditure of €60 million a year (OECD, 2015; Ministry of Environment, 2016). The measure excludes support to power plants (see 'Electricity' section for other subsidies to power plants). There is also an excise duty reduction on the use of liquefied petroleum gas (LPG) used in industrial centralised systems to as low as 10% of normal rates for LPG, resulting in an annual average tax expenditure of €11.7 million (Ministry of Environment, 2016).

Other tax breaks include those to natural gas use in building sites, stationary engines and hydrocarbon extraction; lubricating oils in rubber production; the production of magnesium from sea water; and blast furnaces (OECD, 2015; Ministry of Environment, 2016). These financial mechanisms are awarded on a much smaller scale, with each of these tax expenditures worth €1 million or less a year (OECD, 2015; Ministry of Environment, 2016).

#### Households

After the transport sector, households receive the second highest magnitude of fossil-fuel subsidies. Social energy tariffs target low-income families, giving them discounts on electricity bills. These apply to all types of electricity, including but not limited to fossil fuels. Therefore, this measure was not included in the data. Disadvantaged remote areas also receive social bonuses for the consumption of natural gas, which also benefit from reductions on the excise tax that normally applies to sales of petroleum products (OECD, 2016).

VAT breaks for electricity use in homes were estimated at  $\in$ 1.8 billion in 2016 (Ministry of Environment, 2016; EC, 2014). It is calculated that  $\in$ 1.1 billion contributes to the consumption of fossil-fuel based energy (based on 60% contributions of fossil fuels to electricity; WDI, 2017). Households with a monthly consumption of electricity between 3kWh and 150kWh get excise duty exemptions, estimated at  $\in$ 634 million in 2016 (Ministry of Environment, 2016). It is calculated that  $\in$ 379 million supports fossil-fuel-based electricity. The Department of Finance, meanwhile, aims to provide 'disadvantaged households' – those living in poor and disadvantaged areas where access to natural gas can prove challenging, including mountain regions, Sardinia and smaller islands – with tax relief for petroleum (OECD, 2015; Ministry of

4 This excludes recreational aviation and instructional flights (Ministry of Environment, 2016).

<sup>3</sup> Category 2 vehicles include vehicles for the carriage of goods and having a maximum mass exceeding 3.5 tonnes but not exceeding 12 tonnes; and vehicles designed and constructed for the carriage of passengers, comprising more than eight seats in addition to the driver's seat, and having a maximum mass ('technically permissible maximum laden mass') not exceeding 5 tonnes (Transport Policy, 2017).

Environment, 2016). This support is estimated at  $\notin$  225 million a year during 2014-2016 (OECD, 2015; Ministry of Environment, 2016).<sup>5</sup>

Of the 5 support measures identified for households, 3 were targeted at those who need it.

#### **Agriculture**

The agricultural sector receives significant financial support for fossil fuels from the government. A reduced excise tax is applied to diesel (22% lower than the standard rate) and natural gas (49% lower than the standard rate) for use in the agricultural sub-sectors of farming, horticulture, forestry and aquaculture (OECD, 2015; Ministry of Environment, 2016). Collectively, this is worth an annual average of €970 million (OECD, 2015; Ministry of Environment, 2016). VAT concessions are applied also to petroleum products for use in agriculture and inland fisheries, worth €233 million a year on average (Ministry of Environment, 2016). This results in agricultural and aquaculture sector support worth more than €1.2 billion each year. The high level of support to agriculture is not necessarily surprising, however; many other European countries reviewed for this study reflect the same trend.

<sup>5</sup> The 'disadvantaged households' measure is applied in paragraph 242 of Article 1, December 23, 2014 Law #190 (also called the Law of Stability) (OECD, 2015)

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For the purposes of this country study and accompanying country data sheet, fossil fuel subsidies include: fiscal support from governments (budgetary support, tax breaks, and price and income support), public finance, and investment by state-owned enterprises (SOEs). The years for which data was collected and analysed is 2014, 2015 and 2016, and findings are expressed in annual averages across this period.

The summary report *Phase-out 2020: Monitoring Europe's fossil fuel subsidies* provides a more detailed discussion of the methodology used for this country study. The authors welcome feedback on both this country study and the accompanying country data sheet to improve the accuracy and transparency of information on fossil fuel subsidies.



Overseas Development Institute 203 Blackfriars Road London SE1 8NJ Tel +44 (0)20 7922 0300 Fax +44 (0)20 7922 0399 www.odi.org info@odi.org



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