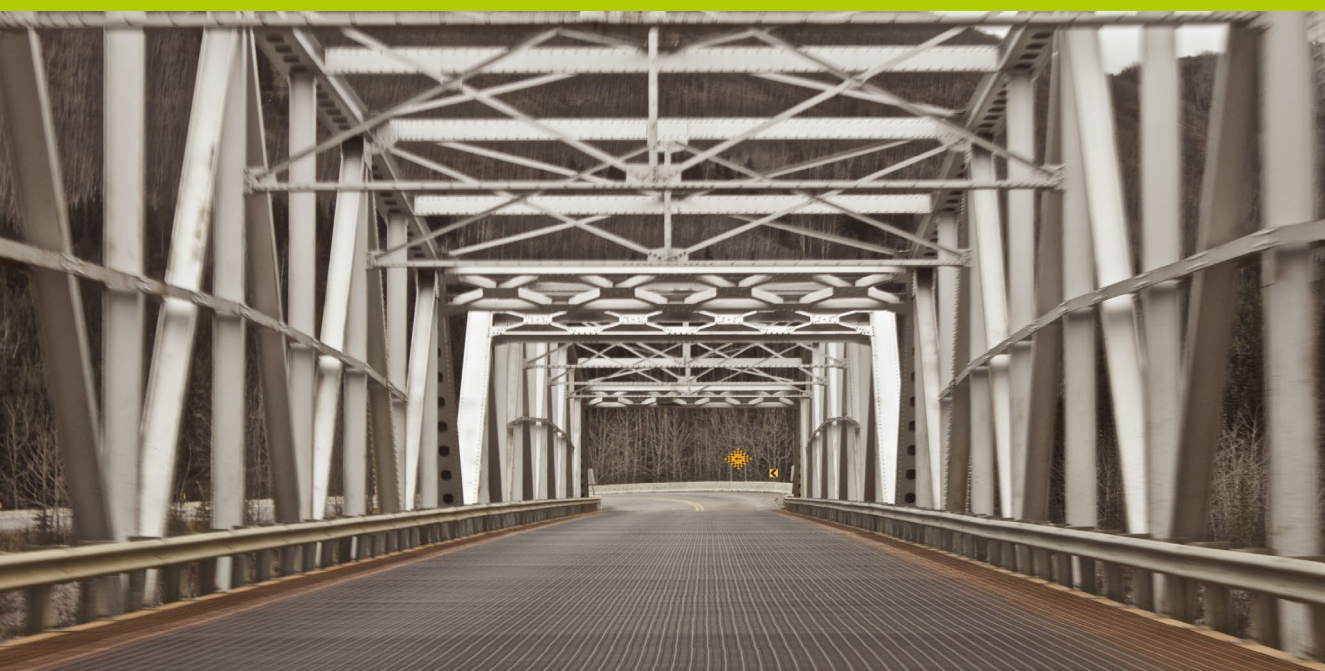




EUROPEAN BARRIERS IN RETAIL ENERGY MARKETS



ITALY Country Handbook

Prepared by **vaasa** **ETT** **REKK** **MRC** | CONSULTANTS AND TRANSACTION ADVISERS **THE ADVISORY HOUSE**
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Energy

EUROPEAN BARRIERS IN RETAIL ENERGY MARKETS PROJECT: Italy Country Handbook

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Please note that this and the other country handbooks form just part of the deliverables of the “European Barriers in Retail Energy Markets” project. For more detail on methodology, Europe-wide results and the Barriers Index, please refer to the following associated reports: “Final Report of the European Barriers in Retail Energy Markets Project”; “Report on the European Retail Energy Market Barriers Index”.

SUMMARY

Project Outline

The following project outline describes the overall European Barriers in Retail Energy Markets Project. It relates to all the countries and markets which are the focus of the project.

The Context

European retail energy market liberalization is now well into its third decade in the most mature markets. Customers of electricity and gas are now free to choose their electricity and gas suppliers in nearly all markets across the EU and in a number of other European markets. At the same time, the European Commission and national European regulators have created a basis for non-discriminatory market access for energy suppliers through a series of regulations and directives. In theory at least, the European retail energy market is a place where new suppliers and providers of retail services can enter the market and compete relatively freely and on equal terms for customers in the market; a place where formerly incumbent electricity suppliers can compete for gas customers and where gas suppliers can compete for electricity customers; a place where a supplier from one region or jurisdiction can compete in another, without facing unreasonable or excessive barriers; a place where a capacity aggregator or other innovative business model can compete to provide its services to retail energy customers.

Objective

The European Barriers in Retail Energy Markets project was established to research the extent to which the theory is the case in practice; the extent to which energy suppliers across Europe face a variety of barriers to enter and compete in the market; to identify which barriers exist and to provide some suggested solutions to those barriers. The project thereby aims to support the European Commission and Member States in developing policy and implementing actions to reduce barriers.

This project has also designed and calculated a performance index that ranks different countries according to how easy it is to do business in the retail energy segment by combining a selection of measurements into a single score. The project is on the other hand, not intended as a measure or indicator of the 'competitiveness' of any given market, and it does not in this respect judge the effectiveness of regulatory authorities or governments, many of which have put great effort into developing their markets.

It is also important to note that all the markets included in this research are continuously evolving. Changes are being planned and improvements (and in some cases additional barriers) are possible as a result. While this project highlights and considers known future changes, it cannot make assumptions as to the effectiveness and outcomes of those changes. This project is therefore weighted in the present, based on the actual context in the market, whilst accepting that the present context may change, in some cases imminently.

Competitor Perspective

What sets this project apart from previous Europe-wide projects looking at the issue of barriers is above-all that it primarily takes the perspective of the competitor rather than any objective view of regulators, economists or academics. This is an important distinction since it requires an acceptance that even if the existence of specific barriers may not seem logical or rational, and even if they are not permitted or legal, even if they were supposed to have been eradicated, those barriers are significant at least in the experience or expectations of competitors in the market.

Notwithstanding this however, the project does not simply accept whatever competitors claim. On the contrary, the researchers have gone to great lengths to ensure that claims are challenged and justified. Cooperation with regulatory authorities to understand the regulatory context of claims, along with survey and interview feedback from competitors (including incumbent suppliers) with alternative perspectives or points of view, have also been considered to ascertain a balanced evaluation of the barriers in any given market. This approach may therefore be of value to policy makers, and complementary to other studies addressing market outcomes.

In some cases, claims by respondents have been made which cannot be corroborated. For instance, there have been claims by many respondents across Europe about integrated utility behaviours that represent barriers to independent suppliers in the markets. Barriers apparently resulting from a lack full ownership unbundling. Such behaviours may well be regulated against, may even be considered illegal, and authorities may have powers to investigate them - and maybe do so. They are impossible to prove given the mandate and resources of the researchers of this project, yet they are widely reported by respondents and broadly documented in other researches. Such barriers may be considered allegations by the respondents, but where they appear to merit further consideration they have been raised since their potential impact on competition is substantial.

Scope & Scale of Research

The project focuses on electricity and (in most cases) gas markets in 30 European countries, namely the EU27 states plus Great Britain, Norway and Switzerland. It was conducted over the course of more than a year with the cooperation and assistance of nearly all of the relevant national regulatory authorities (the report does not however represent their views and has not been ratified by them), around 150 suppliers and many other stakeholder organizations, across all focus markets. Great Britain was included in the project and cooperation was received from numerous suppliers, the regulator (OFGEM) and other stakeholders. Switzerland and Malta were included to a lesser extent since they are not yet open markets for household customers.

Focus Markets



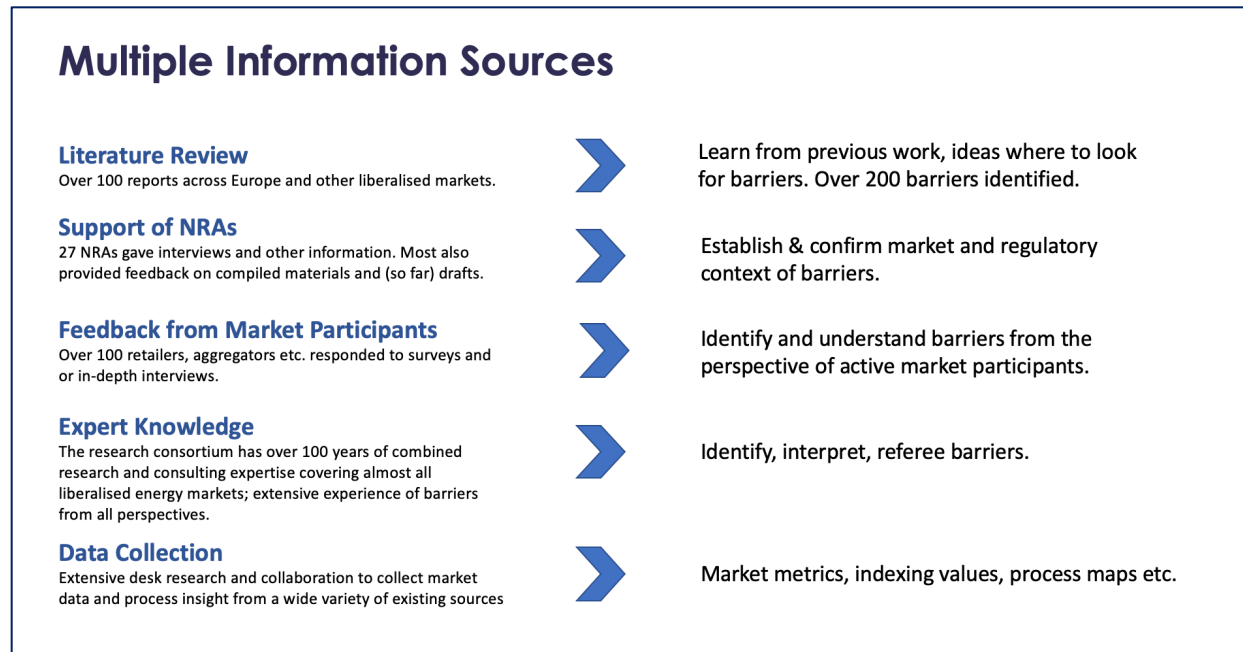
The project focuses on retail (supply), including also demand aggregation services, other additional offerings and new model retail, especially relating to the household segment customers (in some markets households and smaller SMEs may be difficult to distinguish). The project additionally concentrates primarily on barriers that are specific to the energy (electricity and gas) retail market - as opposed to barriers that are true of most markets, such as basic business costs and risk - and it gives priority to barriers for which a potential solution might be sought, as opposed to barriers which are a fact of any energy market and which could not realistically be overcome (such as the barriers relating to the core price volatility of energy as a commodity). The project does not aim to list every possible barrier in the market, however small.

Sources of Information

Many sources of information were used as part of the project. These included an extensive literature review of over 100 public reports, to assist in the targeting of survey questions; interviews with national regulatory authorities (NRAs) to understand the regulatory context in markets; feedback from market participants (suppliers and other competitors) and extensive data gathering for the purpose of collecting market metrics, market processes and

index values. For the latter the task of identifying sources that could deliver comparable and reliable index values was a key challenge of the researchers. The expert knowledge of the project consortium (which has extensive experience from the markets and issues concerned) was also used to add judgement to the process. Specifically, the core project team comprised over a dozen researchers and experts from nine European countries, including international experts who have analysed Europe's energy markets since even before they liberalized.

Figure 1 - Multiple Information Sources



Surveys & Interviews

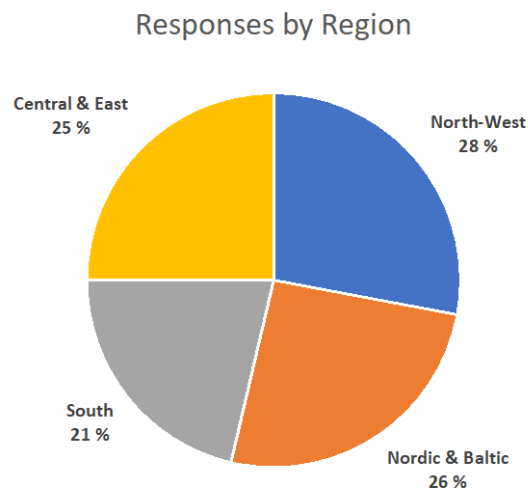
The primary research mediums used in the project were an extensive questionnaire and in-depth interviews. The purpose of the questionnaire, which contained separate questions depending on the type of respondent, was to provide a comprehensive and structured identification, weighting and magnitude of the barriers as experienced and perceived by suppliers and other competitors. Questions were categorized and broken down according to what was known through the body of existing literature and the experience of the project consortium, ensuring that all known barriers were addressed by the questionnaire. The questionnaire additionally facilitated the identification of barriers that hitherto had not been revealed by the literature review, or which were country specific. Interviews provided additional support and clarification to the findings from the questionnaire as well as allowing respondents to focus on top-of-mind barriers and the interviewers to dig deeper into key and / or unclear issues. While some respondents provided both questionnaire and interview responses, many provided one or the other.

The survey was publicly and widely promoted (via web sites, social media and by other direct means) to potential respondents from 17th June until late October 2019 but remained open until late February 2020 so that stakeholders contacted during Country Handbook development had the chance to respond. The dissemination of information on the project was further facilitated by a widely promoted public website through which over 300 people subscribed.

The Competitor Sample

143 questionnaire and interview responses were received representing 120 unique market-specific responses covering 28 focus markets. 71% of responses were through questionnaires versus 29% through interviews. Malta (a closed market for household customers) and Slovakia were the only markets from which responses were not received, although three additional markets received a level of response which was considered insufficient on which to conclude barriers based solely or primarily on respondent feedback. In these markets, namely Bulgaria, Cyprus, Czech Republic, the project consortium applied their expert insight and additional desk research to support the analysis of the markets. Switzerland, also a closed market for household customers, also naturally received insufficient response. The responses from 24 markets were therefore considered sufficient for the purpose of interpreting the barriers within those markets primarily based on respondent feedback. It is important to note that the response rate in no way impacted the index, which is not dependent on responses.

Analysis of the sample shows that responses were spread evenly among the regions. 66% of responses were non-incumbent competitors compared with 34% which were former incumbents in the markets concerned. In many cases the former incumbents are only former incumbents in one region within the overall country they are in. A large proportion of the former incumbents are furthermore active across multiple regions and countries, and therefore are



both incumbents and non-incumbents, defenders and challengers. Among the non-incumbent players were a mix of more established competitors and more recent new entrants, along with more traditional suppliers, new model suppliers and aggregators.

More information on the nature of the sample and responses can be found in the Final Report for this project.

Confidentiality

The importance of data protection and anonymity within the project cannot be stressed enough. Most respondents provided information on condition of anonymity. It was promised by default to questionnaire respondents and was in most cases explicitly requested by interviewees. Many participants additionally stated that they were nervous to respond at all since they were active in a market where there were only a handful of suppliers (or at least independent suppliers) which they felt meant that their responses could easily identify them. This risk was perceived as even greater in cases where the participant had made public statements on issues that would be contained in the research (the risk of readers putting two and two together was a concern). In some cases, respondents stated that they even feared a backlash from other stakeholders if their identity was revealed, or (for

e.g. a brand-new entrant in a market with one brand-new entrant) stated that if we revealed that they were a new entrant the market authority would instantly know who they were and that they were afraid it might inhibit their entry process.

Under such circumstances, it was decided that not only would all responses be anonymous, but also that the type of respondents would not be revealed in connection with given responses on a country level. It has been claimed by a handful of market authorities that this policy reduces the value of the research. The researchers feel that it in fact increases the value of the research since it has allowed respondents to provide information in an uninhibited fashion in a European market where, by and large, independent suppliers - and especially independent new entrant suppliers - are few and far between.

Deliverables

The project has three key deliverables:

- **28 country specific handbooks** detailing the barriers identified in each country together with suggestions for possible solutions. While most of the handbooks cover electricity and gas markets, some only cover electricity or cover gas to a lesser extent due to the absence or limited presence of gas. Additionally, two countries, Malta and Switzerland do not have country reports due to their closed nature with respect to household customers.
- **A robust, peer-reviewed barriers index** of how easy it is to do business in each country. The European Retail Energy Market Barriers Index, contained in the separate European Retail Energy Market Barriers Index Report, allows the objective comparison of market barriers across the focus markets. The report also includes a ranking of the focus markets.
- **An overall Final Report** containing a full project description and bringing together the findings and common learnings from all countries.



The Barrier Index and Ranking

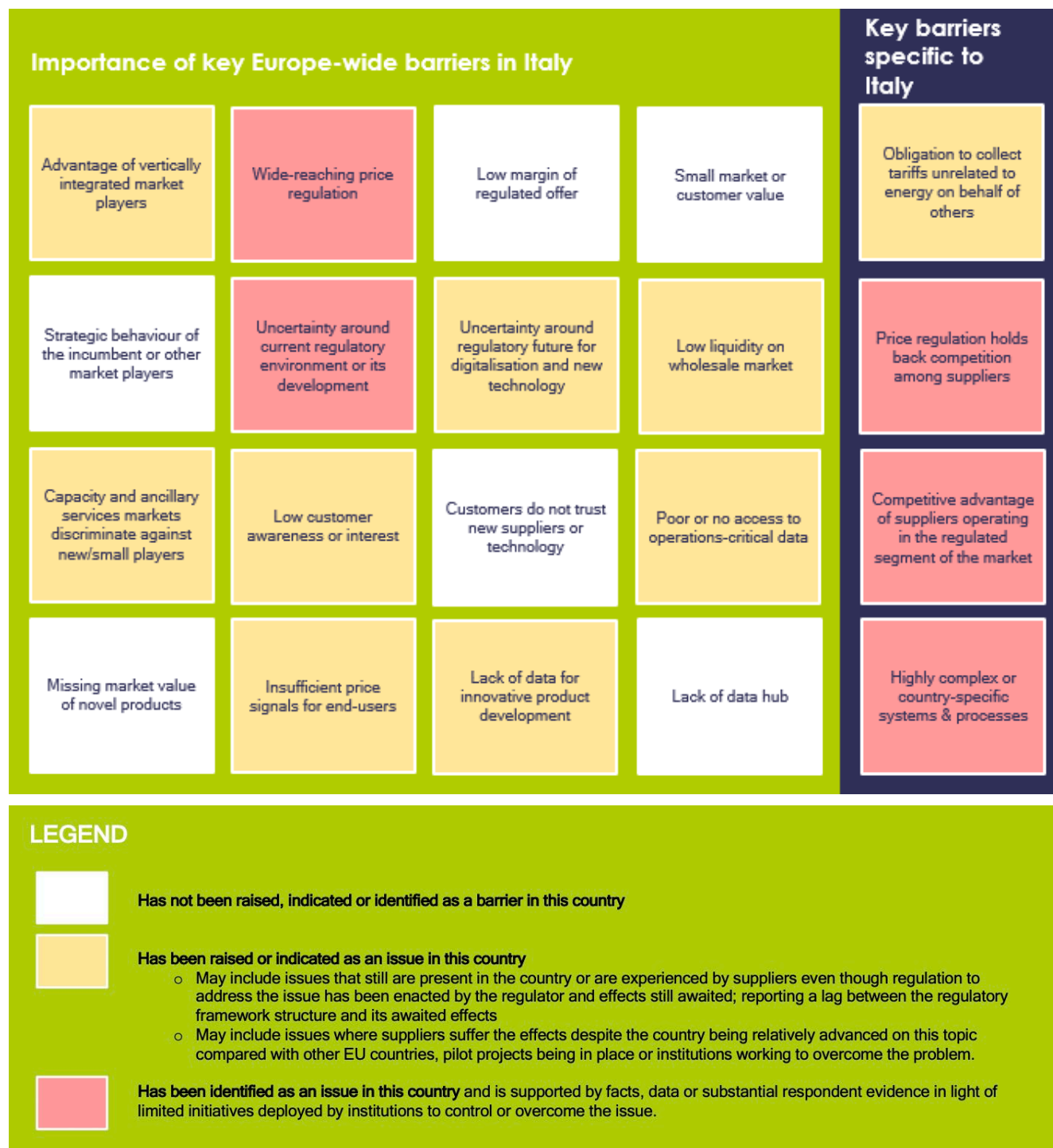
The purpose of the 'European Retail Energy Market Barriers Index' is to enable a degree of comparability between the barriers' context in each of the markets. It is based on metrics that can be collected for all markets, metrics for which available data currently exists. As such it provides a simple, best-available proxy benchmark measure for each of the categories of barriers identified by the project, for each market, and thereby ranks each market. It is intended to be used as an evolving periodical index and ranking on a European and national level.

The index and ranking should, however, presently be considered more of an approach and an indication than an absolute or definitive ranking. It represents the current state of market monitoring data in Europe and will evolve over time as data availability improves. Over time we would expect and recommend that governments and NRAs advance new metric collection to better enable future editions of the index and ranking.

A full description of the Index, its methodology and detailed findings and the ranking can be found in the separate Index report for this project. Within each country handbook the index values for that given country is presented.

Key barriers in the Italian market

The following figure highlights the key barriers identified in the Italian market. Please note, the terms are generic across all researched markets.



Key recommendations

The Italian market is one of the top European markets with the highest number of suppliers registered. With a proactive regulator that seeks to welcome new players and novel business models. However, despite being one of Europe's oldest liberalized markets and most fertile for new entrants, the project identified some issues that present significant barriers to the establishment and growth of new entrants and novel players. Identified barriers, can stifle market development and functioning, hence we set a list of recommendations going in the direction of a well-functioning retail energy market, as one where there is a good environment for innovation of energy services and products that benefit the consumer.

- To offset the slow transition to the free market, the change of the current paradigm under which customers who do not choose a supplier are supplied under price regulation regime, is recommended. Further opening of the market, through for instance auctioning of the customer base, which is still under price regulation, can be a way to set a level playing field to win customers in the free market. Also, an implicit way to rapidly reduce the market share of the major operators, could be to fix a ceiling as a maximum market share available to each supplier. Repeating the Letta decree experience that in Italy, at the beginning of the liberalization process, imposed a roof of 50% over the gas sales of single operator to end customers and a decreasing cap to the same operator imports for the period 2002-2009. Limiting in this way, the operators market shares.
- Actions which aim at stabilizing the current regulatory framework are recommended. Tracked directives at policy level could, among others, help suppliers' planification of activities and strategies. We refer to defined roadmap plan for the phasing out process of price regulation, aimed at showing the resulting market structure and regulatory framework. Such a plan should define the timing of the phasing out and the regulatory actions foreseen by the plan. For instance, defining a phase-out date (already defined, January 2022) with the actions to be taken in that year and during the subsequent years. Hence, if the intention is to auction part of the customer base (see the previous point), the stake of customers involved should be defined through the plan's years as well as the resulting antitrust ceilings for the dominant operators.
- It is recommended to relieve suppliers' burden when tasked of collecting charges unrelated to the energy sector. In principle, charges unrelated to supplier's business should be collected through different methods and collecting mechanisms. If this is not possible, collection failure should be protected by setting such charges as a mere pass-through or through a recovery fund.
- Technology improvements and innovation of market processes are factors influencing the scope for competition in the market. Italy is a pioneer in smart metering deployment in the electricity sector and one of the few Member States which keep on deploying smart meters in the gas sector. Yet, in the gas sector, a large part of the Italian customers still has the traditional meters requiring regulatory and monitoring activities aimed at boosting smart meters deployment. Also, in Italy, demand response, aggregation and demand participation to the ancillary service market are in pilot stage and very well advanced. However, there are some minor uncertainties by suppliers regarding the post-pilot stage. Pilot projects are

fundamental to eliminate “sunk costs” for new entrants and the roll-out of the service/product upon project completion raises market players’ confidence. Post-pilot rollouts of services need to be encouraged, with certain and fast timelines, developing rules to ensure they are as friendly for small generators and loads and aggregators as possible. An important footstep towards this direction is seen in the statement of the Italian Regulator in guaranteeing that resources identified during the pilot stage, will contribute to the future provision of this market.

- A data hub has recently been set-up for both electricity and gas market, guaranteeing equal opportunity among customers and market actors. However, we believe the effects of such action are still awaited because suppliers still report experiences over inequality in access and getting metering data. Constant monitoring by the Regulator on this topic is of great importance.
- Close monitoring by the Regulator with relevant actions aiming at studying the effectiveness of unbundling are recommended. Rebranding of DSO is still considered non-effective. uneven.
- Suppliers have raised concerns over asymmetric treatment of the operators in the ancillary service market; the Regulator must prevent such behaviour through monitoring activities and must guarantee the equality over restitutions measures.
- The authorities should communicate with market actors to identify the precise causes of new entrant feeling overlooked in the entry process. A clearer regulatory environment for new energy businesses and technologies would equip authorities to deal more effectively. Introduction of one-stop-shop one-window procedures to get market statistical data, is seen as a solution to reduce the number of entities involved and may rise the quality of service provided.
- Standardization across Europe of systems and procedures required by the country retail market for access and operation are important. Similar systems and procedures across Europe will help suppliers at capitalising their investments. For both, data access and ease of procedures, the Regulator should enhance activities of organizing seminars for suppliers, traders and aggregators on platforms usage and accessibility.
- Customer reaction to competitive offers need to be enhanced. Switching process is recommended to be quicker and the activities aimed at enhancing customer awareness should be strengthened. With a shorter switching timeframe, e.g. 24-48 hours, suppliers have the possibility to inform customers on the savings achieved within a shorter timeframe. New suppliers can thus develop new interactions, related to newer set of services where customers are seen as more active counterparts. For instance, comparative bills and evaluation on customers consumption performances, exposes customers to information that have not considered before. This topic is of a great importance for the Italian energy retail market, where customers still have strong incentives to remain regulated, feeling safer with the incumbent supplier services. In this direction, other recommended activities are the enhancement on suppliers precontractual and customer information provision, raising customer awareness, with the customers associations to better monitor suppliers’ behaviour, preventing unethical behaviour enhancing market reliability and attractiveness.

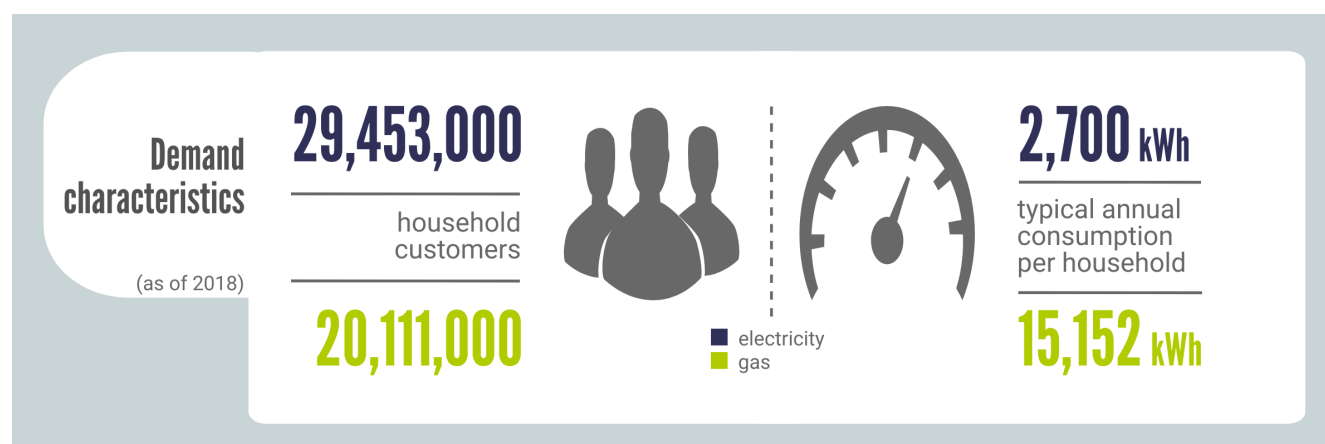
MARKET OVERVIEW

Introduction

In 2018, the Italian electricity demand reached the 321.9 TWh level, recording a +0.5% if compared with 2017, when the demand growth was of 2% on 2016 level. The domestic sector is composed by almost 29.5 million of households, in 2018, with 2,700 kWh of average annual consumption per household. While the Italian gas system, has 21.7 million of end users, as of 2018, with 15,152 kWh of average annual

consumption. In 2018 gas demand reached a level of 57 bcm sold in the Italian market, decreasing by 3bcm if compared with 2017 level. Considering auto consumption, volume sold in 2018 are of 71.4 bcm.

Number of customers	Electricity	Gas
Household	29.5 million	21.7 million
Non-Household	7.3 million	



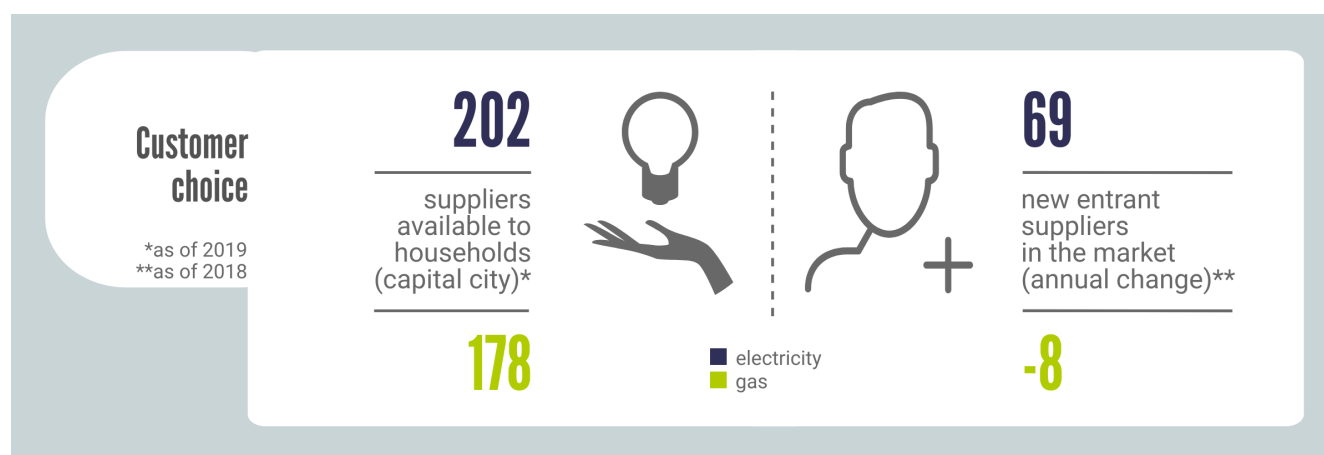
Background

Between 1990 and 2000, the Italian energy market was progressively liberalized. The substantial liberalization of the Italian electricity sector is rooted in the decree transposing Directive 96/92/EC, Legislative Decree 79/99 (so-called "Bersani Decree") which has made free the activities of production, import, export, purchase and sale. While reserving transmission and dispatching activities to the State and giving them in concession to a joint-stock company, the National Transmission Grid Operator (GRTN).

Later, the Legislative Decree 23/05/2000 number 164 (so called "Letta Decree") was transposing the Directive 98/30/EC and opening the gas market to competition. Hence from 2000, large gas customers had free market access. From 2003, all customers could choose their supplier on free market. From July 2004, the market has been definitively open to all non-domestic customers, in line with the entry into force of the European directive 2003/54 / EC. While from 1 July 2007, also domestic customers could exercise the right to freely choose the supplier.

To promote and monitor fair competition, ARERA, the Regulator, started its activities on in 1995 for the regulation of the electricity and natural gas industry. As independent authority, ARERA is responsible for establishing and complying with market rules. A further main task is the establishment, for the energy sectors, the tariffs for the use of the infrastructures by guaranteeing the equal access for the operators. Nowadays, ARERA is also in charge for the regulation and supervision of water and waste services.

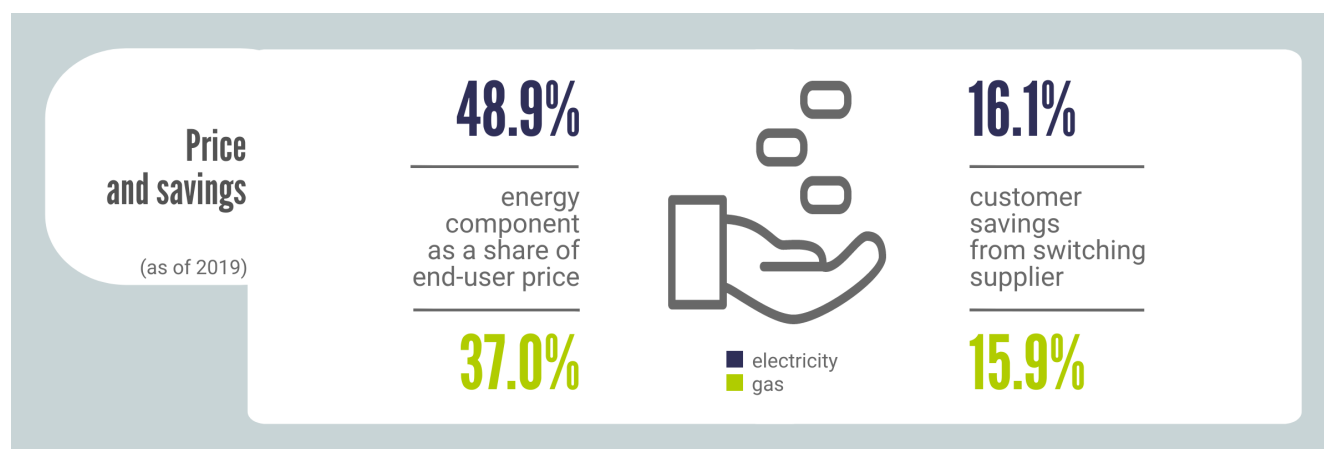
Many independent suppliers have established themselves after market liberalization. In the context of the Authority Operators Registry, 127 parties in the standard offer market, 2 in safeguarded category market and 638 in the free market, are carrying out the activity of sales of electricity today. While, 412 suppliers, are selling natural gas across the country. Figures accounting only for the capital city, for electricity and gas markets, are summarized in the below infographic.



In 2018, the dominant operator of the entire Italian electricity retail market, domestic and non-domestic, remains the Enel Group, whose market share (53%; if we consider the domestic market only this share rise up to around 70%) is still at a significant distance ahead of its nearest competitor group Edison. Hera is now the third group, up 1 position from 2017 and Eni the fourth group, which was second in 2017. Axpo Group bounced fifth from position number 7 in 2017. Regarding the gas market, the share of the biggest three companies is Eni with 19.3%, Edison with 13.2% and Enel with 11%.

At the end of 2018, the Regulator updated the tariffs for the electricity transmission, distribution and measurement services for domestic and non-domestic customers, to be applied in 2019. The average tariff to cover the costs of transmission, distribution and measurement for the year 2019 is equal to 2.745 c€/kWh. With an energy component of 48.9%. The gas average price (weighted for sold volumes), net of taxes, charged by sales companies to end customers, was equal to 40 c€/m³ in 2018. While in 2019, this price was 34.3 c€/m³. With a gas component of 37%.

On average, in 2019, the estimated consumer savings from switching supplier was 16.1% for electricity and 15.9% for gas.



Market structure

In 2015, the Authority updated the provisions on unbundling obligations for the electricity and gas sectors, approving the Integrated Text on Functional Unbundling (TIUF), in accordance with the provisions of Legislative Decree 93 of 1 June 2011 and Directives 2009/72/EC and 2009/73/EC. The innovations introduced by the TIUF, in force since 1 January 2016, include the introduction of new unbundling obligations concerning communication and brand policies for electricity and natural gas distributors, regardless of their size or business structure; they impose a complete unbundling between the sale and distribution of electricity and natural gas to avoid any risk of confusion. In 2018, the Authority ordered a series of non-compliant electricity and gas businesses to send in the mandatory notifications required by the TIUF.

Terna is the Italian certified TSO, owning and operating the high voltage and very high voltage electricity national transmission grid. Operating in natural monopoly more than 74 thousand km of lines.

In the gas sector, Snam Rete gas is the certified TSO. In July 2018, the Regulator certified the company Infrastrutture Trasporto Gas (ITG), operating a small part of the owning and operating a small part of the Italian natural gas network, as an operator in ownership unbundling, pursuant to Article 9, paragraph 1 of Directive 2009/73/EC. The provision was determined by the fact that ITG, which was already certified as an independent transport operator, submitted a request for recertification to the Authority following a change in its ownership structure, due to the sale of the entire shareholding in the company by Edison to Snam Rete Gas.

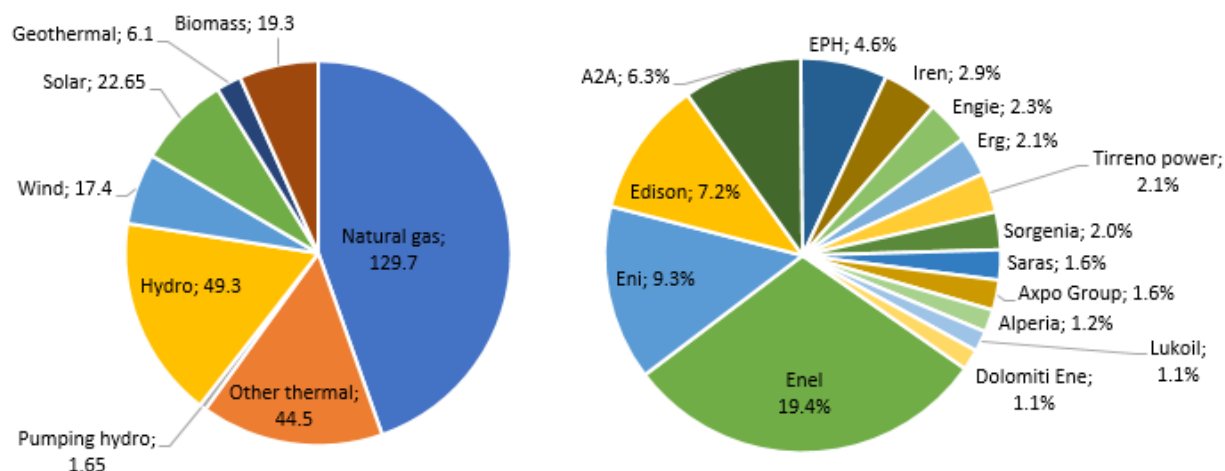
As of December 31, 2018, 130 electrical DSOs were registered on the Authority's Operator Database, four less than the 134 registered on December 31, 2017. While the active natural gas DSOs, in 2018, were 207, 3 less than those active in 2017.

In 2018, there was a decrease of 1.8% in gross national production, which fell to 290.6TWh from 295.8TWh in 2017. This decrease was recorded for all sources except for hydroelectric, which saw an increase of 36.1% compared to the previous year. In general, while thermoelectric production decreased by 8.4%, renewable energy

production increased by 10.4%, driven by a strong water source increase; photovoltaic (-7.1%) and wind (-1.4%) production was also down.

The share of the gross generation of the top three corporate groups (Enel, Eni and Edison) fell slightly (35.9% against 36.4% in 2017), while those of A2A and EPH, which are the fourth and fifth most important groups in Italian electricity generation, recorded a slight increase.

Electricity generated in Italy by technology (TWh) and by company (% of the first 15 groups by share) - 2018.



Regarding wholesale market activity, the Italian power and gas market is largely developed with most of the electricity and gas traded in the market negotiated in bilateral over the counter (OTC) transactions or through the organized market managed by GME (Gestore dei Mercati Energetici).

Traded Commodities and Traded Volumes at GME in 2018	Power Markets: 325,3 TWh
	Gas Markets: 57.4 TWh
	Environmental Markets: 48.67
	TWh (GO), 7.9 million toe (White Certificates)

In 2018 the amount of electricity exchanged in the Italian System, equal to 325.3 TWh, with different trends depending on the platform. The day-ahead market, slightly increased in 2018 with a +1.2% if compared to 2017, particularly in the central months of the year, reaching the highest level of the last six years. While GME gas platforms traded around 56 TWh in 2018.

Electricity import/export balance increased due to the net increase in imports, which in 2018 touched the 47.2 TWh while in 2017 they had stopped at 42.9 TWh. Accompanied by a marked reduction in exports (-36.3%) of almost 2 TWh lower than 2017. In fact, exports fell to 3.3 TWh from 5.1 TWh recorded in the previous year.

In 2018 gross imports of natural gas in Italy amounted to 67.87 bcm and therefore decreased by 2.6% compared to 2017, as Italy purchased 1.8 bcm less than the previous year. Exports, on the other hand, increased from 0.28 to 0.4 bcm. Therefore, the import/export balance fell from 69.4 to 67.5 bcm.

Electricity Market in 2018	GWh	Supply Points
Regulated Segment	45,271	19,705
Household	30,658	16659
Non-Household	14,613	3046
Safeguard Segment	4,269	80
Free Market Segment	205,582	16,973
Household	26,520	12794
Non-Household	179,062	4179
Total Retail Market	255,122	36,758

The Italian electricity retail market, during 2018, was made up of just over 255 TWh sold to the final market to around 37 million customers. Compared to 2017, the total consumption of electricity remained substantially stable with a slight downward decline, - 0.5%, as well as consumers, which fell by 0.4%.

The total number of consumers decreased in 2018 by 138,000 units, thus falling to 36.7 million. Supply points decreased in the regulated segment, which

lost 1.75 million supply points, and in the safeguard service segment, which was reduced by 11,000 units, while in the free market segment, supply points grew by 1.62 million if compared to 2017. In terms of energy, these trends were reflected in the amount of electricity sold to those customers category. The overall share of energy sold in the regulated segment fell to 17.7% of all the energy sold to the final market (compared to 19.5% in 2017), that of the safeguard service segment remained at 1.7% (same share since 2016), while that of the free market segment has reached 80.6% (against 78.8% in 2016). In terms of withdrawal points, the ratio tends to turn upside down: 53.6% of customers are still served under price regulation regime, while the 46.2% have moved to the free market.

Regarding the gas sector, sales have decreased compared to 2017 in almost all sectors, except for those to households' consumers. In 2018, in fact, a total of 839,000 customers left the regulated market segment with a reference price, while the free market recorded 1.27 million more. It is worthy to highlight the exit of 821,000 families from the regulated segment, while in the free market there are 1.26 million more domestic customers than in 2017.

Gas Market in 2018	Bcm	Redelivery Points
Regulated Segment	8,070	10,113
Self-Consumption	14,473	2
Free Market Segment	48,674	11,498
Total Retail Market	71,217	21,613

Switching indicators

(as of 2018)

9.1%

of household customers switched supplier annually

6.6%



■ electricity
■ gas

46.4%

of customers no longer with the incumbent

50.1%

Political and regulatory orientation

Although twenty years have elapsed since 1999, when market liberalisation started in the Italian electricity market, the process has not yet been completed. Indeed, Italy so far has not phased-out regulated tariffs in the electricity and gas sectors, currently scheduled to end on January the 1st 2022. There is a perception among certain energy market actors that still there is a long way to go, both in terms of policy to be deployed and in terms of customers expected to migrate from the regulated segment of the market to the free market segment. In 2018, considering electricity and gas markets together, over 50% of customers were still under a price regulation regime, and given that little has changed in the period to January 2020, there are now under two years to bring the other half of customers into the free market segment a challenging prospect.

Some market actors see this as an indication of a short-sightedness and politically driven uncertainty that could hinder the development of healthy and fair competition in the market. As a recent example, the National Antitrust Authority has found the Enel SpA, Acea SpA and A2A SpA guilty of alleged abuse of dominant position¹ (Art. 102 TFUE) consisting in a policy of progressively moving customers already supplied under the price regulation regime "maggior tutela" towards free market options/contracts.

To certain market actors, the Italian retail energy sector (household) is going through a moment of uncertainty, with a procrastination around certain crucial issues such as the definition of the market structure once regulated tariffs have been removed. Examples they cite are the current policy and regulatory initiatives to raise end-customers' awareness about free market, which do not appear sufficient, and the inability of suppliers in the regulated segment to deny the activation of customers unlikely to be able to pay their bills, while suppliers in the free market are able to do this. Additional issues they flag are the need for an increased sector digitalization, including the possibility of online subscription on supplier portals, having personalized and informative customer areas, or contact methods for customers implemented by various market players (including email, social media and chats).

Regulatory market characteristics

Price regulation

In Italy, domestic consumers and small businesses connected in low voltage, who have not chosen, or do not want to choose, their suppliers are supplied under the Italian price regulation regime, called "maggior tutela" (protection regime). The service is guaranteed by local supply companies (legally unbundled and belonging to the same group as the local DSO) or by local vertically integrated companies (small DSOs with less than 100,000 users connected to their network), based on economic and commercial quality conditions indicated by the Italian Regulator. In the electricity sector, "Maggior tutela" price is set by the Regulator based on costs borne by the Single Buyer (Acquirente Unico) in procuring electricity, through a mix of spot and long-term contracts. To safeguard

¹ See the National Antitrust Authority decisions A511, A513/2019.

competition, the Single Buyer wholesale price is then increased by a markup to match the supposed entry and operating costs of the so called “efficient” new entrant. In the gas sector, a reference price is computed starting from a hub index price, plus a cost of transport, plus a markup. For both, electricity and gas sectors, prices pass on all costs to consumers, not creating tariff deficits or tariff cross subsidies. Also, in both sectors, customers can be contended and are free to move from the protection regime to the free market and vice versa.

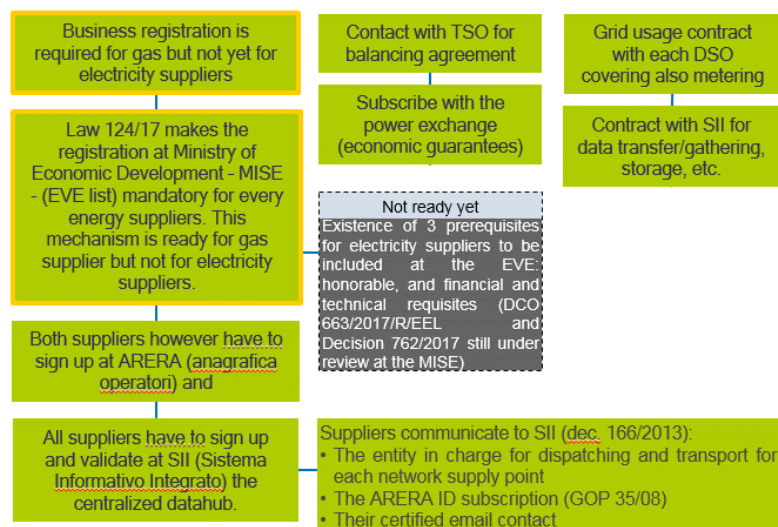
Supplier registration and contracts

The supplier business registration or formation is, at the moment, asymmetric between gas and electricity and starts with:

- supplier registration at the Ministry of Economic Development - MISE (only for gas at the moment),
- a mandatory sign up at ARERA (the so called “anagrafica operatori”) and
- accreditation at SII, the central data hub.

The SII datahub is one of the strategic elements that ARERA has identified for its action aimed at completing the development of competition in the electricity and gas markets. Foreign energy supply companies - regardless of their place of business - must also follow the same registration path of national suppliers for the supply to household customers in Italy.

More details on licensing, registration and contracts required to enter and operate in the retail electricity and gas system are reported in the following figure.



Regulatory orientation

The Regulator, ARERA, is recently developing a series of initiatives aimed at raising electricity and gas awareness. Establishing for instance that supplier operating within the regulated segment should send to their customers, within the bill, a specific information, with content defined by the Authority, regarding the expected overcoming of price regulation.

Hence, in 2018, ARERA defined and communicated to the sellers the content of the information to be reported on the bill. Informing the customers about the opportunities on the free market. Also, the indication on how to change the contract or supplier with the guarantee of continuity of the service and the elements that should urge the end customer to take advantage of the Authority's tools aimed at informing electricity and gas customers, such as the portal for electricity and gas offers named PLACET.

The price regulation regime should have been phased-out in July 2020, but this deadline has been postponed to the 1st of January 2022. Still the Regulator is entrusted with the task of adopting provisions to ensure the safeguard service for vulnerable domestic customers and small businesses without an electricity supplier through competitive bid procedures by territorial areas, and on conditions that encourage the passage to the market free. This service will therefore have the task of guaranteeing the continuity of the service in residual cases where the customer is not supplied on the free market. Still there is a long way to go and the Regulator, as of January 2019, has not indicated the complete picture, including all the components and features of the resulting regulatory framework that will be in place, once the price regulation regime will be phased out.

Valuable developments have been recorded by the Regulator regarding the centralized data hub. From September 2018, the SII is now the unique and official interface for collection and dissemination of electricity and gas metering data, has recorded by distribution companies. Therefore, the process of making available metered data and related adjustments is carried out by interfacing the distribution companies responsible for the data measurement with the SII, which acquires and certifies the timing of making the data available. Similarly, this process is repeated for the exchanging of switching data and statistics, with the SII acquiring the data and certifying the timing of data availability. These processes found application starting from the measurement data available in November 2018.

Planned regulatory developments

The Ministry of Economic Development, the Ministry of the Environment, the Ministry of Infrastructures and Transport and the Ministry of Economy and Finance are proposing energy plans that seek to consider the potential benefits inherent in the wide diffusion of renewables and energy efficiency, related to the reduction of polluting emissions, the improvement of energy security and economic opportunities for the production system.

These three Ministries intend to continue with conviction on this path, with an approach that increasingly puts the citizen at the center, also in the capacity of prosumer, and companies, in particular medium and small. This evolution is facilitated by the constant attention on the efficiency and cost reduction of some renewable technologies, among which the photovoltaic will become increasingly important.

Italy's Ministry of Economic Development (MISE) issued the country's new National Integrated Plan for Climate and Energy 2030, which has provided more clarity on the renewable energy targets laid out in the energy strategy for the period 2020-2030 - the Strategia Energetica Nazionale (SEN), defined by the government in November 2017.

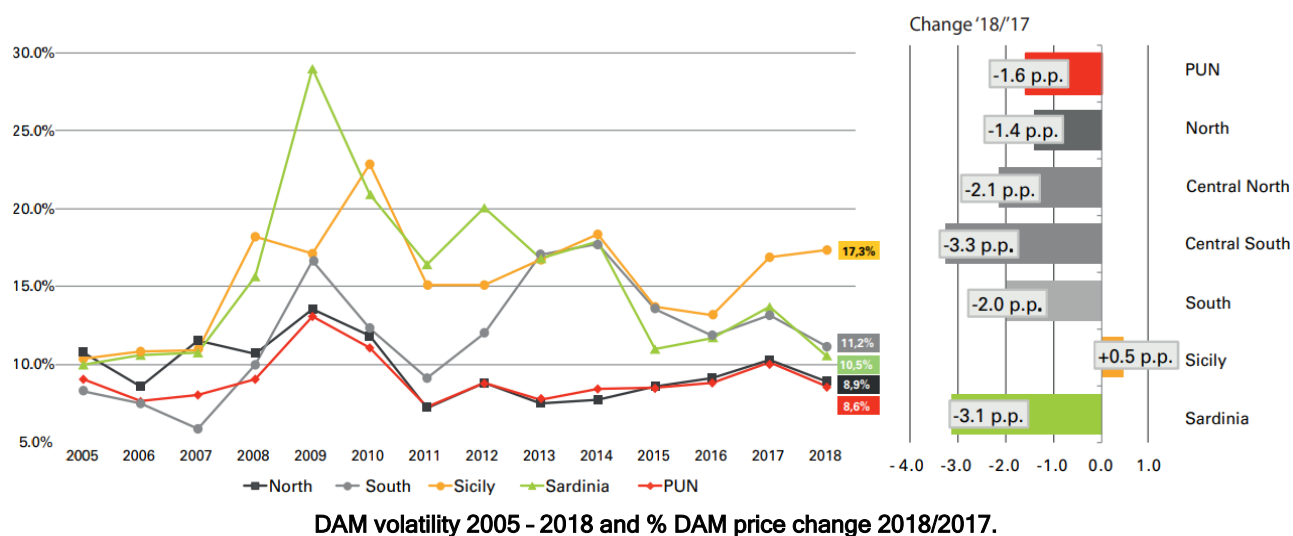
The SEN, among the others, was fixing target for final consumption reduction of 10 Mtep/year in 2030 and to have a 28% share of renewables sources in the gross consumption mix. The new plan for energy and climate settled more ambitious targets that mainly are:

- a percentage of energy production from RES (Renewable Energy Sources) in the GFEC (Gross Final Energy Consumption) equal to 30%, in line with the objectives set for Italy by the EU;
- a share of RES energy in the GFEC of 21.6% compared to the 14% forecast by the EU;
- a reduction in primary energy consumption compared to PRIMES 2007 scenario of 43% (EU target: 32.5%);
- the reduction of GHG vs 2005 for all non-ETS sectors of 33%, a 3% higher target than EU.

Other market characteristics

Volatility of wholesale & retail prices

In 2018, the spot national price (PUN) was standing at 61.31 €/MWh (+7 €/MWh, + 13.6% over 2017), the second increase compared to the historical low recorded in 2016 and the highest since 2014. Day ahead market volatility has reduced during 2018, however Sicily remains the area with the highest price and volatility, having the higher number of hours with a price standing at 0 €/MWh, also favored by the availability of renewable energy sources (RES-E) and a significant share of hours characterized by prices above 100€/MWh.



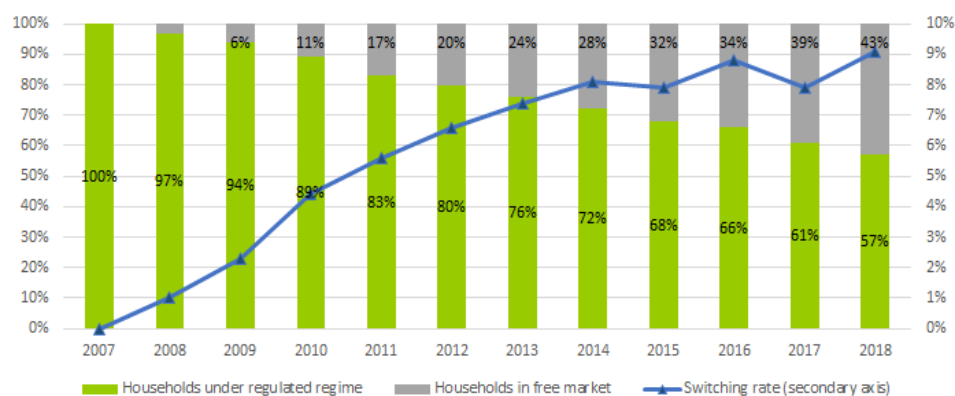
Regarding electricity retail prices, Italy is characterized by a high price variability in all consumption classes, albeit with some differences. In 2018, prices charged to domestic customers divided by consumption class had values between €170/MWh, which can be found for larger customers (over 15,000 kWh/year) and the maximum of 535 €/MWh, relating to the smallest class (0-1000 kWh). The price constantly drops as the size of customers increases.

Prices of all Italian gas spot markets substantially aligned to 24 €/MWh and on levels slightly below the gas hub PSV prices standing at 23.84 €/MWh. On the other hand, the volatility of System Average Price (SAP) and PSV drops to 1.46% and 1.35% respectively, getting closer to the higher one of the TTF (1.33% against 0.72%). Retail gas prices in 2018, recorded an average price (weighted by the quantities sold), after taxes, set by the sales companies operating on the end market, of 40 €/m³. This price was 34.3 €/m³ in 2017. Therefore, the overall average end price of gas in Italy increased by 5.7 €/m³ or 16.6%.

Small market and customer value

Italy will phase-out electricity retail price regulation by January 1st, 2022. This is the last step in the process of electricity market liberalization, that started in 1999. Until then, residential customers and small businesses who do not choose their supplier, will be supplied under a transitional, price regulation service named “maggior tutela”.

In 2018 the number of household customers under price regulation regime is of 16.7 million, while 12.8 are supplied under free market rules. The share of households supplied under the price regulation regime is shrinking year after year as reported in the Figure below.



Share of households supplied under price regulation regime since market opening in 2007.

The phasing out of regulated prices might facilitate the entrance of more suppliers that increases choice for consumers, consumers could be more engaged, and the market appear to be more competitive, with lower market concentration and more contract diversification. Notably, Member States which have phased out or are in the process of phasing out price regulation have a higher variety of electricity contracts, including dynamic price contracts.

Context for aggregation/demand response

Ancillary Service Market (MSD) - Conditions for participation

From 2017, Italy has slowly started to take the regulatory steps needed for a solid framework for Demand-Response. By Resolution 300/2017/R/eel “Prima apertura del mercato per il servizio di dispacciamento (MSD)” the Italian Authority defined the criteria to allow consumption units and production units, until now excluded

(relevant, but intermittent renewables; not relevant), to the ancillary service market, MSD, in order to provide balancing services. This has been done through definition of pilot projects. The term “pilot project”, derives from the goal to test functioning of the new resources and subsequently proceed, together with ARERA, with a complete review of the ancillary services market and Grid Code (compliant with the EU balancing code), under which such resources would be fully integrated in the ancillary services market.

By the release of “Regolamento UVAC MSD” on the 30th of May 2017, integrated by Terna via the “Procedura e regole per l’approvvigionamento a termine di risorse di dispacciamento per l’UVAC per il periodo 18 giugno-30 settembre 2018”, the Italian Authority defined the characteristics of the subjects qualified as Virtually Aggregated Consumption Units (UVAC), that can freely participate to the regularly held ancillary service market tenders. The participation mechanism, aimed at procuring dispatching resources within the MSD, consists of two distinct phases:

1. phase of creation and qualification of the UVAC to the MSD for which the applicant is the owner or has received a mandate for all withdrawal points associated to the UVAC (pooling of withdrawal points);
2. offers submission phase on the MSD relating to the UVAC to be selected by TERNA, aimed at activating the corresponding resources.

Minimum power threshold identified is from 10 MW to 1MW, providing reduction of withdrawal by at least 1 MW within 15 minutes of TERNA request.

The Italian pilot projects, in 2019, have evolved towards mixed aggregations called UVAM - Virtually Aggregated Mixed Units - enabling consumption and production units as well as storage systems to participate to MSD.

In the context of the UVAM project promoted by the Italian TSO Terna for the provision of ancillary services to the system, a large number of different aggregators took part in the tender procedures (in the last annual auction the entire banned contingent has been exhausted) for the assignment of the service.

Italy wants to leverage the experience gained through pilot projects to develop proposals for a complete redesign of the ancillary services market. Incentivizing competition and increasing participation of resources in existing services, attempting to also progressively involve other low-consumption resources in the tertiary and/or domestic sector.

BARRIERS

The European Barriers to Entry and Competition in Retail Energy Markets project has researched barriers across 30 European markets. From this research, barriers to entry have been identified and grouped into four over-arching pan-European barriers' blocks.

Over-arching pan-European barrier blocks

Barrier Blocks	1	Regulatory disincentivisation
	2	Market inequality
	3	Operational and procedural hinderance
	4	Customer inertia

Description of the four-over-arching pan-European barrier blocks:

1. **Regulatory disincentivisation:** barriers arising as a consequence of the general regulatory framework of the natural gas and electricity retail markets. We address the impact of price regulation, burden (-sharing), regulatory unpredictability and access to innovation. All these items may disincentivize competition within the natural gas and electricity retail markets, as well as entrance by new suppliers.
2. **Market inequality:** barriers arising from an uneven playing field for different types of suppliers. Often, certain market players already have a competitive advantage by being very close to the formerly integrated DSO (or still being vertically integrated in case the de-minimis rule applies), controlling a large amount of generation capacity or having a large market share. If market rules do not prevent this, such players can exercise their market power to treat other market players in a discriminatory way, creating market barriers. We examine issues related to unbundling, historical roles and access to market mechanisms.
3. **Operational and procedural hindrances:** barriers arising as a consequence of the complexity and national/regional differences in standards and procedures in different process areas, affecting how easily new entrants can enter and operate in the energy retail market. We look at issues and differences in licensing, signing up and operations compliance, as well as data access, processes and data management from the suppliers' point of view.
4. **Customer inertia:** barriers arising due to customer behavior and attitude. For the energy market to function, end-users must be willing and able to switch supplier. If customers do not switch supplier, suppliers need not worry about losing customers, so there is no incentive for suppliers to improve their services, minimize prices or innovate to compete for customers. We examine barriers related to customer inactivity or disinterest in the energy markets.

Within each of these high-level blocks are contained sub-categories, which are also mostly pan-European in nature. Each of these sub-categories contain the specific barriers which relate to individual markets as described in the following page. Altogether, we identified 45 barriers, most of which broadly across Europe. Only a selection of them apply to the Italian case as reported in the following chapters of this handbook.

HOW TO READ AND INTERPRET THE FOLLOWING SECTIONS

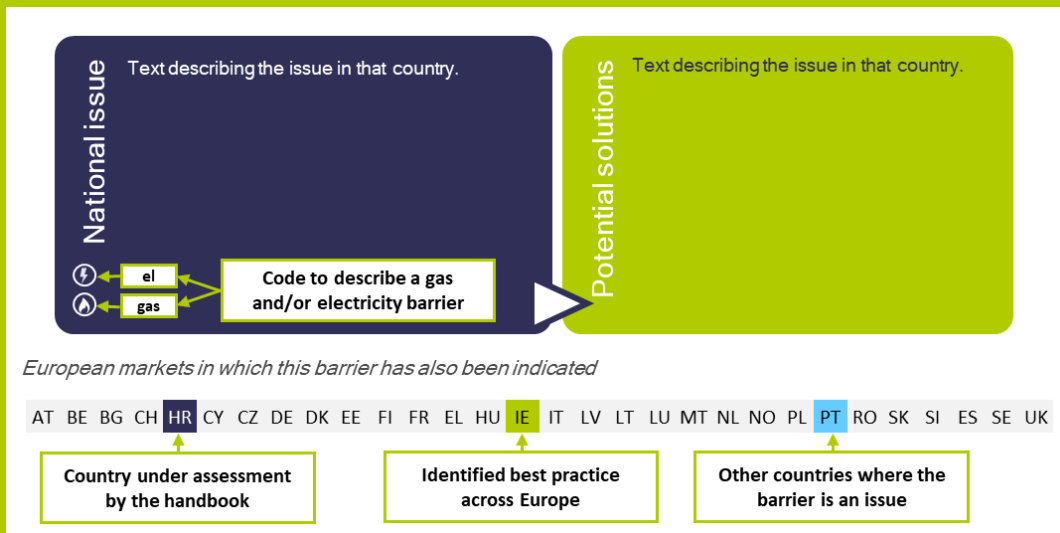
Each of the following four chapters explores one of the four pan-European blocks of barriers and report how each sub-category barrier apply to Italy. When a barrier applies to Italy, it will be highlighted in the table following a general description of the barrier itself, as shown in the example below:

#) Name of the Pan-European Block	
#. Name of the Barrier category and description.	
Text that will generally describe the barrier category . . .	
List of barriers identified across Europe under this barrier category:	
• Barrier 1	When highlighted - applies to the specific country described in this Handbook
• Barrier 2	
• Barrier 3	
• Barrier 4	

As showed in the above figure, the table lists all the barriers we have identified in Europe within the specific barrier category. Only if a sub-category barrier is highlighted in the table, it means that suppliers raised it as a barrier, and it is perceived as a prevalent issue in Italy.

Highlighted sub-category barriers are then briefly described following a twofold methodology which:

- reports what the suppliers are experiencing in the market as a national issue and
- suggests potential solutions to the problem as depicted in the below figure.



At the end of each chapter, Italian's performance within the category, according to quantitative indicators, is then presented.

For additional market context, please see Appendix 1: Process Maps, which gives a high-level graphical overview of the most critical steps involved in establishing and operating as a supplier in the national market.

1) Regulatory disincentivisation

Within regulatory disincentivisation, barriers across Europe have been sub-categorised into four areas encompassing 17 specific barriers²,

1. **Price regulation.** Regulated prices usually refer to regulation or control of end-user's prices by a public authority, usually the National Regulatory Authority (NRA). Price regulation can take different forms, such as setting or approval of prices, price caps or various elements of these. In Europe, there still exist Member States which have maintained end-user regulated prices during the market opening process and after, in the intention of protecting households or even non-household customers from significant increases in energy prices, especially in a context of limited competition. In some cases, this regulation has led to below cost prices and to low margin to cover the supplier activity risk, discouraging investments and the emergence of newcomers.

According to CEER³, 14 European countries out of 27 answering a recent CEER survey have price intervention in electricity for household consumers. Where regulated prices remain, NRAs tend to consider them as a significant barrier to entry for alternative suppliers. All Member States, where NRAs consider regulated prices as a significant barrier, are planning to remove them, at least for non-household customers. Across Europe, the following specific barriers related to "price regulation" were detected by this study. Those highlighted in blue have been either raised, indicated or identified as barriers in Italy:

- Price regulation discriminates against certain suppliers.
- High penetration of price regulation
- Low margin of regulated offer (margin squeeze)

2. **Burden sharing.** Energy suppliers across Europe are often required to collect payments for services not part of their business, or to provide other services such as services related to energy efficiency, or to manage assets such as those of the metering system. These requirements can pose a barrier for suppliers' operation on the retail market by raising their costs and distracting focus from their core business and might deter entry into the retail market by newcomers. Across Europe, the following specific barriers related to "burden(-sharing)" were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy:

- Obligation to collect tariffs unrelated to energy on behalf of others
- Obligation to keep a minimum-security stock as a gas reserve

3. **Regulatory unpredictability.** The establishment of an internal natural gas and electricity market in the European Union is an ongoing process. European legislative packages are boosting this process, making market regulation evolve rapidly. Transposition of regulation into the national regulatory frameworks is not

² Please note: these definitions are Europe focused, not Italy specific. Highlighted barriers have been identified as country specific.

³ Monitoring Report on the Performance of European Retail Markets in 2018. CEER Report 4 November 2019.

always smooth and NRAs' actions are sometimes unpredictable. This leads to uncertainties for suppliers related to unclear and unknown future developments of the regulatory framework, including the attitude of the institutions that regulate the retail market and oversee market operation and organization. This uncertainty is a barrier that impacts suppliers' business, preventing their entrance in the market, making strategic business planning difficult or forcing them to adopt different approaches during operation. Across Europe, the following specific barriers related to "unpredictability of regulatory framework" were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy:

- Suppliers face uncertainty because of a newly liberalized regulatory environment or uncertain future development of the regulatory framework
- Uncertainty caused by industry actors influencing legislation, e.g. incumbent or associations shape legislation
- Uncertainty regarding future regulatory developments, especially in the field of digitalization and new technology
- Attitude of authorities hinders development of the market
- Uncertainty regarding environmental obligations and non-renewable generation capacity

4. **Access to innovation.** Most European energy market are currently designed based on practices as they were during the period of national monopolies by what today are incumbent suppliers. Allowing suppliers and new entrants to be innovative depends not only on the opportunity to compete on prices, but also to diversify, welcoming new products, market actors and business models. When national regulatory frameworks do not take into account innovation in the retail market (regarding e.g. availability and functionality of smart metering, the possibility of flexible contracting and tariffs, or whether the demand side can bid in the balancing system), this may pose a barrier for new market entries, particularly more modern players. If new entrants are to be enabled in order to increase the level of competition in the retail market, regulations must accommodate future developments on the energy markets, especially considering that in the future new entrants may not only be electricity and gas suppliers but also act as aggregators or energy service companies (ESCOs). Across Europe, the following specific barriers related to "innovation-friendliness" were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy:

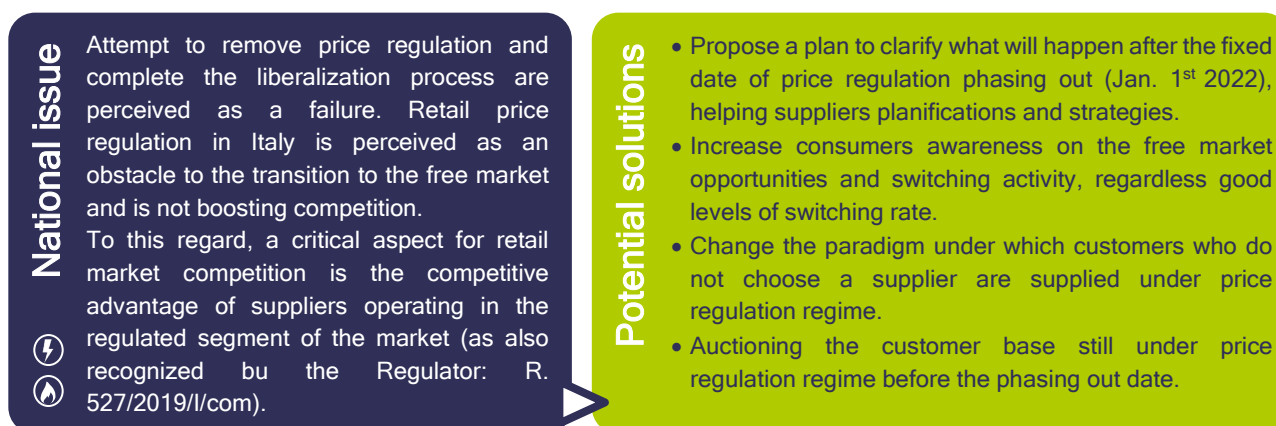
- Data protection issues
- Lack of incentivisation for novel pilot projects or post-pilot market rollout
- Lack of data for innovative product development
- No fit between new business models and existing regulation/obligations
- Missing flexibility in tariff structures
- Missing information and incentives for demand-side grid management
- Market structures does not incentivize novel products (missing market value)

1.1 Description of regulatory disincentivisation barriers in Italy: Price regulation

Price regulation discriminates against certain suppliers. In the research, this barrier was identified as an issue in Italy.

This issue, generally, may place a barrier when price-regulated markets allow one (or few) market participant to serve price-regulated customers. However, the level of discrimination depends very much on the specific design of the country regulation.

In the case of Italy and regarding price regulation, suppliers' concerns relate to the model under which customers who do not choose a supplier are supplied under price regulation regime and by the DSO selling company. Also, suppliers' main concerns are focused to the incoming phase-out of the price regulation regime, so called "*maggior tutela*". Now rescheduled to happen in January 2022. This date has been postponed twice, with a not clear plan. During the redaction of this handbook, there is an ongoing legislative process in Italy (as the removal of "*tutela*" cannot stem out of a decision of the regulator, it needs to be a law) which will be completed in the near future. In the meanwhile, the ARERA has already had a consultation in autumn 2019 on the topic. The identified national issue and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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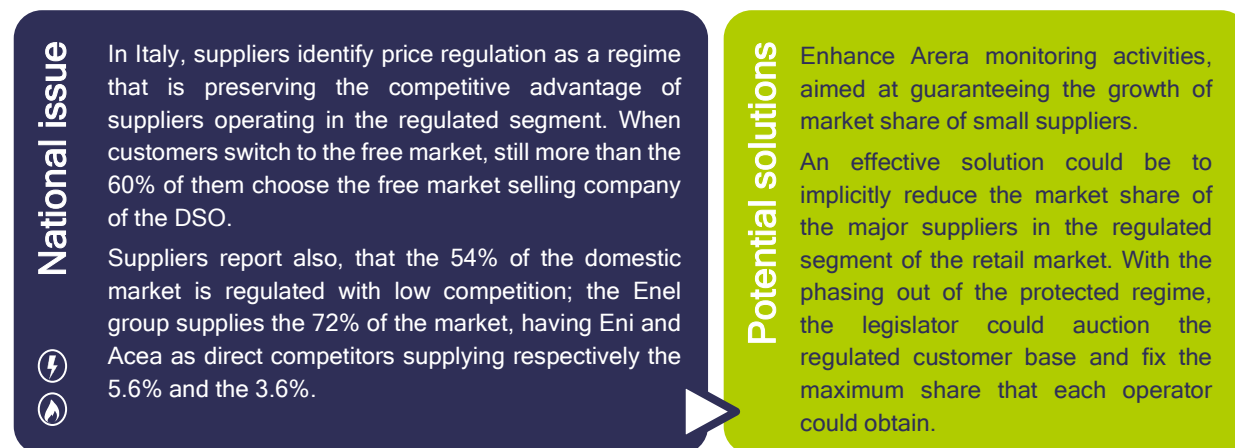
High penetration of price regulation. In the research this barrier was identified as an issue in Italy.

As a general concept, under price regulation regime the retail market usually maintains the old structure, where consumers do not face risks and do not have to care about comparing offers and choosing a supplier. Price regulation keeps the market at an immature phase where neither consumers nor suppliers can learn how a competitive market works. With difficulties to reach with competitive offers customers that already have access to regulated services.

In Italy, the regulator, recognizes that competition at household level is improving but however limited. The 44% of domestic customers is already supplied under free market conditions, however the domestic segment in Italy is still experiencing a low dynamism if compared with the other customer categories. Domestic customers in Italy

still have a scarce ability to select free market offer, together with the critical aspect of the competitive advantage of suppliers operating in the regulated segment that still characterize the Italian retail market.

Identified national issue and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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PORTUGUESE BEST PRACTICE CASE: Roadmap for removal of regulated retail prices.

Portugal removed end-user price regulation for non-household customers and the transitional period ended in 2016. As part of the phase-out process, which started in 2010 for gas non-household customers and in 2011 for electricity non-household customers, a transitional period was defined by the government in Portugal in order to enable customers supplied under regulated end-user prices to choose a new market supplier and move to the liberalised market. During this period, the NRA (ERSE), sets a tariff (called the 'transitional tariff'), which may include an additional value, whose objective is to promote customers to switch to a market tariff.

Lastly, under the terms of Government Ordinance N. 39/2017 of 26 January 2017, consumers who still have regulated tariffs have a transitional period until 31 December 2020 to choose an electricity market supplier. While, under the terms of Government Ordinance N. 144/2017 of 24 April 2017, consumers who still have regulated tariffs have a transitional period until 2023 to choose a natural gas market supplier.

1.2 Description of regulatory disincentivisation barriers in Italy: Burden (-sharing)

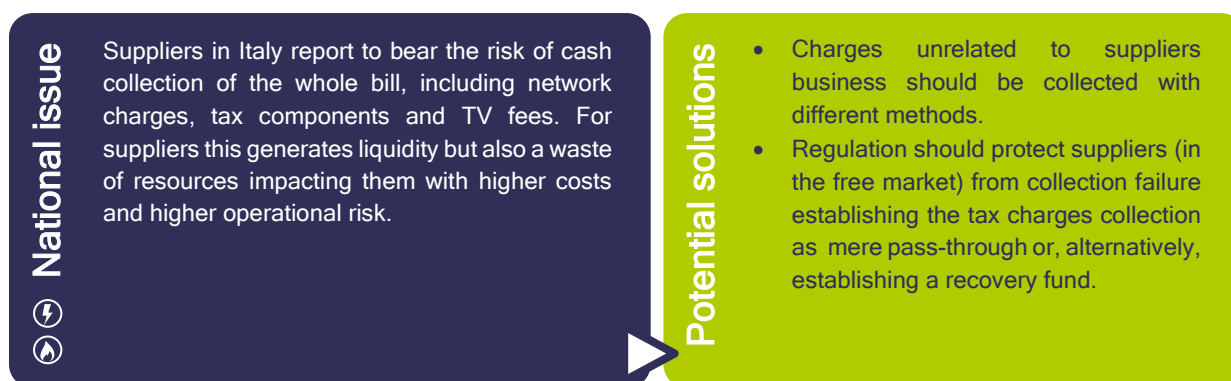
Obligation to collect tariffs unrelated to energy on behalf of others. In the research this barrier was indicated as an issue in Italy.

In general, the obligation to collect non-energy-related tariffs, with the risk of delayed or non-payment, presents a barrier as it can substantially increase the total risk as well as required cash reserves. In other European markets,

energy suppliers may be tasked with collecting fees for unrelated services, e.g. TV licence fees, or providing other services, e.g. energy efficiency measures.

In Italy, energy suppliers are tasked to collect general tax charges and TV fee. The latter does not impose any financial burden to the supplier but collection costs/operational risks only. Hence, if customers do not pay, retailers do not transfer the money to the tax administration. While for all the other general tax charges, retailers take the whole risk.

Identified Italian national issue and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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1.3. Description of regulatory disincentivisation barriers in Italy: Regulatory unpredictability

Suppliers face uncertainty because of a newly liberalized regulatory environment or uncertain future development of the regulatory framework. In the research this barrier was identified as an issue in Italy.

In general, suppliers may experience uncertainty because of unpredictability around what the future regulatory framework will look like and hence what business opportunities will be possible.

National issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.

National issue

The regulatory framework does not have a clear and defined long-term design. What will happen after the phase-out of regulated price “maggior tutela” is perceived as unclear by the suppliers. The lack of a certain and traced direction at political level towards the identification of appropriate measures for properly completing the internal market liberalisation for gas and electricity, does not facilitate the regulatory context, leading to procrastinate crucial issues for the market, such as the definition of market structure once regulated tariffs have been removed.

Potential solutions

Actions aiming at stabilizing the current regulatory framework, with certain and tracked directives at political level. Identifying appropriate measures to complete the market liberalization phase. For instance, if the plan is to phase out regulated prices, it is necessary to define a phase-out plan showing the resulting market structure and regulatory framework.

European markets in which this barrier has also been indicated

AT BE BG HR CY CZ DE DK EE FI FR EL HU IE **IT** LV LT LU NL NO PL PT RO SK SI ES SE UK

Uncertainty regarding future regulatory developments, especially in the field of digitalization and new technology. In the research this barrier was identified as an issue in Italy.

Generally, new technological advances require regulatory frameworks in order to be fully rolled out without excessive business risk for suppliers. Also, regulatory uncertainty regarding the future of demand response aggregation or other novel services can hinder investment/innovation in these areas.

National issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.

National issue

Suppliers highlight the fact that, in the Italian electricity sector, the demand participation to the ancillary service market is still at the pilot stage and not defined regulatory framework is in place. Nor a defined plan on how the regulatory landscape will look like after the testing session through pilot project will be over.

Potential solutions

Advancing with pilot projects to innovate and change the demand participation environment is already a big step forward. However, concerns regarding the phase after the pilot projects are justified. However, Arera, confirms that in the reform of the existing ancillary services market, the resources present in the pilot phase will contribute to the future provision of ancillary services.

European markets in which this barrier has also been indicated

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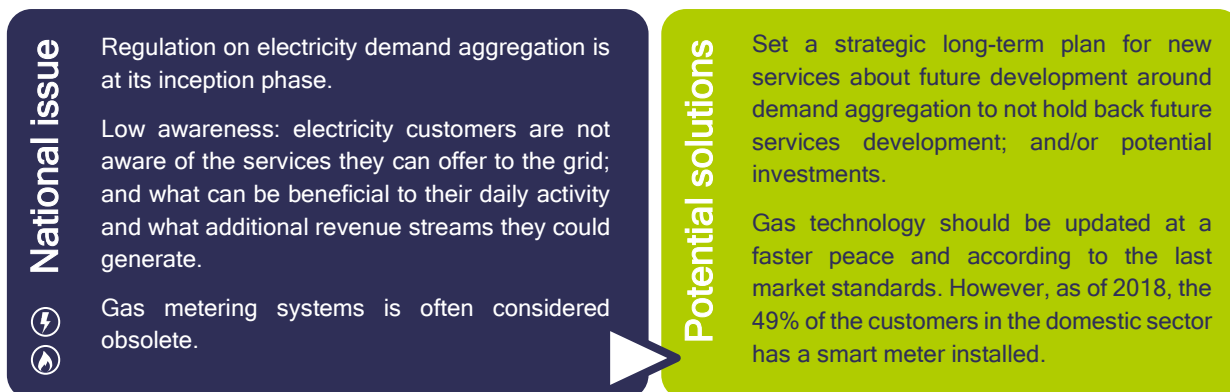
1.4. Description of regulatory disincentivisation barriers in Italy: Access to innovation

Lack of data for innovative product development. In the research this barrier was raised as an issue in Italy.

Generally, smart meters open-up opportunities for novel demand-side and aggregation services that rely on almost real-time consumption data to be able to match grid requirements and balancing product bids.

In Italy, the early implementation of smart meters is helping the innovation around new products and services. However, there are some aspects that are not helping suppliers' perception on the possibilities offered by innovative products.

The national issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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Market structures does not incentivize novel products (missing market value). In our research this barrier was raised as an issue in Italy.

Generally, without an existing market and/or mindset for novel services such as DR, new entrants face the barrier of establishing themselves in a market that still is at its inception phase. A low level of perceived value, due to a technology lag or customers being unaware or not incentivized, or little competition between traditional suppliers may results in little need for suppliers to innovate/differentiate.

National issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

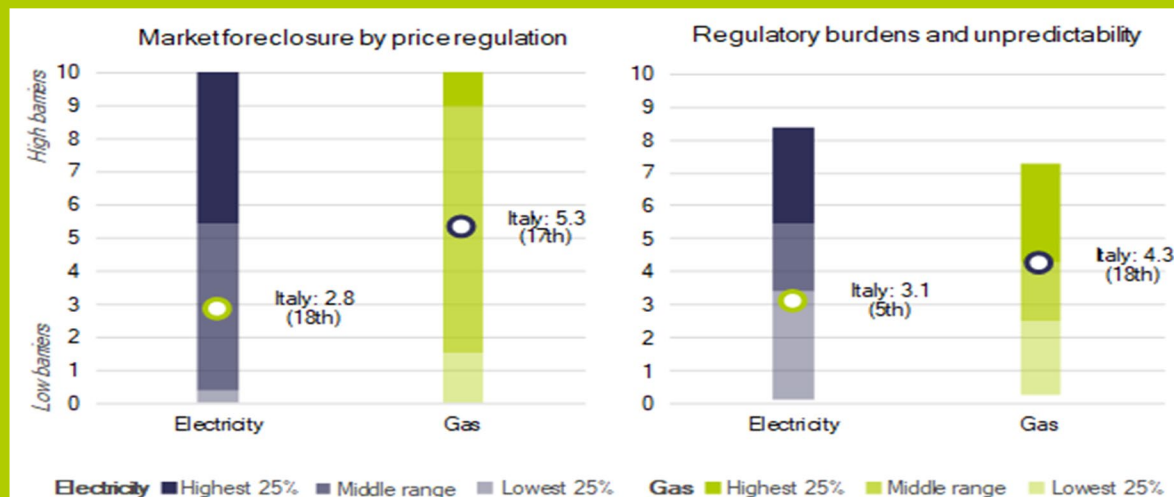
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1.5. Italy's performance in this barrier category

The following figure shows quantitative indicators of how far regulatory disincentivisation acts as a barrier in this market. The values for Italy are shown against the range across all analyzed countries. These scores contribute to the performance index. The performance indicators of regulatory disincentivisation are the following:

- **Market foreclosure by price regulation:** The index consists of two sub-indicators, the penetration of price regulation (among residual customers), and the mark-up of the regulated offer. A high score is attributed if a high share of customers is supplied at regulated price, and the mark-up is significantly lower than the average mark-up on the competitive markets.
- **Regulatory burdens and unpredictability:** The index consists of two sub-indicators. Regulatory burdens reflect the non-energy share of the energy bill in an average household, which are regulated (taxes, network fees). Regulatory unpredictability was measured via the related question in the supplier survey conducted for this project. A high score is attributed if the share of the non-energy elements is high, and if survey respondents scored the question highly (as an important barrier).

Performance indicators



Italy was ranked in the middle range for market foreclosure indicator. Scored on the top EU 5 countries for regulatory burdens and unpredictability for Electricity, while in gas ranked in the middle high barrier range.

2) Market inequality

Within market inequality, barriers across Europe have been sub-categorised into two areas encompassing 8 specific barriers⁴:

1. **Unbundling and market power.** In order to facilitate better competition and improve performance of the individual parts of the energy companies, the Energy Directives introduced rules for legal, functional and accounting unbundling between DSOs and supplier. Although legal unbundling has been implemented throughout all EU member states, barriers arising from vertical integration can still be observed in many markets, raising the question if the required level of unbundling is sufficient in order to meet the goal of a fair and competitive retail market. Companies serving less than 100,000 customers are only obliged to implement accounting unbundling.

In order to avoid confusion among end customers between the separate parts of integrated energy businesses, rebranding has been a focus area for NRAs over the last years. Nevertheless, in several EU countries, the difference in the branding of the supplier and the DSO is perceived as insufficient. Strategic and unfair advantages for incumbent suppliers around transparency, pricing and access to information and data occur in most of the European countries studied. Access to production capacities can also be limited for small suppliers if market players with a large generation portfolio can withdraw production capacity from the accessible markets. Balancing and ancillary services markets can also be distorted as they are often still designed to mainly benefit large-scale generation, discriminating against smaller market participants. Below, we describe these barriers related to market power in more detail.

Across Europe, the following specific barriers around “unbundling and market power” were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy:

- Lack of brand unbundling
- Discriminating, strategic behaviour of incumbent, and obstruction by other market players.
- Strategic, unfair advantage of vertically integrated market players and lack of transparency.
- Limited or biased access to production.
- Discrimination against new and small market players in capacity and ancillary services markets.

2. **Equal access to and maturity of wholesale market.** The wholesale markets present one of the most important sources for energy procurement for all market participants. New and small suppliers tend to have weaker bargaining position in bilateral negotiations, which occurs higher sourcing costs, therefore leading to a competitive disadvantage. Access to a well-functioning wholesale market (an energy exchange) therefore enables smaller suppliers to buy energy for competitive prices.

Barriers related to the wholesale market can arise by discriminatory market platform access and the absence of any viable alternative. Furthermore, a lack of available products and low liquidity can both lead to an increase in risk, disadvantaging small market participants substantially more than large, established suppliers. Across Europe, the following specific barriers around “equal access to and maturity of wholesale

⁴ Please note: these definitions are Europe focused, not Italy specific. Highlighted barriers have been identified as country specific.

market” were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy:

- Discriminatory market platform access (standards, guarantees, etc.)
- Low liquidity in the wholesale market
- High price or volume risk in energy procurement

2.1. Description of market inequality barriers in Italy: Unbundling & market power

Discriminating, strategic behaviour of incumbent, and obstruction by other market players. In the research this barrier was identified as an issue in Italy.

In general, market players with a large market share may act in an obstructive way, especially around data exchange. This can especially disadvantage small suppliers with only a limited customer base to draw metering data from.

In Italy, incumbent/existing suppliers have been known to have advantages in shifting customers from the regulated to the non-regulated segments of the market, by means of inducing confusion to end users (see the National Antitrust Authority decisions A511, A513/2019). The competition authority already took actions aimed at removing strategic behaviour favouring incumbents due to their legacy of vertically integrated structures. Today, vertical integrated operators are organized under functional unbundling, have a different brand and their respective employees operate in separate physical spaces preventing cross transfers of data and resources.

The persisting national issue identified by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.

⚡ National issue

Along with vertical integration (see following barrier), this was raised as the most fundamental and largest barrier for independent suppliers in both gas and electricity. In Italy, the biggest suppliers in terms of number of customers supplied are, in most of the cases, incumbents integrated with the DSO. This situation, in the recent past, was proven to encourage DSOs to operate in ways that benefit the commercial supply side, distorting the market at the expense of novel and independent suppliers. Certain suppliers were reported to engage in strategic behavior unavailable to new entrants, or to obstruct market processes.

In Italy, suppliers point out that regarding the incidence of vertically integrated companies, in absence of a property unbundling, the current situation still generates inequality of opportunity among suppliers. Consultations and recent provisions by the regulator regarding the brand unbundling and other measures to have a better functioning retail market seems not to have deployed the awaited effect, at the moment.

For suppliers, the recent cases of abuse of dominant position prove the uneven opportunity that is still present to reach out customers in the free segment of the market. In those cases, incumbent suppliers were using customers information provided under regulated price regime to make targeted offer for the free market

Potential solutions

This barrier stems partly from the historic market structure, which is gradually change thanks to the important and significant regulatory measures issued by the regulator in the recent years.

In 2016, the 4 DSOs with $\geq 500k$ customers changed their name to comply with the provisions on functional unbundling; where distribution companies belonging to vertical integrated undertakings distinguish themselves from other group companies in terms of identity, brand and communication policies.

During 2019, retail market concentration indexes were improving and the close monitoring of ARERA the regulator is playing a crucial role, driving the market in the direction of a well-functioning retail market, at the service of customers.

European markets in which this barrier has also been indicated

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Strategic, advantage of vertically integrated market players and lack of transparency. In our research this barrier was identified as an issue in Italy.

It has been found that in Europe, vertically integrated companies still have advantages over small suppliers, in terms of being able to target customers based on consumption profiles (“cherry-picking”) or win back customers during the switching process, or in terms of access to financing with better terms.

The issues identified in the Italian domestic retail market and related potential solutions regarding the Italian case are reported in the graphic below.

National issue

In association with the above barrier, this was raised as a fundamental barrier on the Italian market. Indeed, suppliers believe cross-subsidisation between the grid and supply side is still considered the biggest barrier in the electricity market overall. At its root, the issue arises due to insufficient unbundling, notwithstanding the recent measures taken by the ARERA.

Suppliers in Italy perceive unbundling inefficiency between DSO and suppliers, with unequal opportunity of getting metering data. Notwithstanding the existence of a complete datahub. Vertically integrated suppliers have a data advantage over new entrants, especially with regards to data for innovative products, as they can access their co-owned DSOs' historical data on customer consumption and behavior.

Also, suppliers believe the brand unbundling is still uneven within the vertically integrated groups. There still are similarities in the brand colors and symbols that still can influence the customers' choice.

Finally, suppliers report that in the Italian retail market, statistics as price levels, switching rate, consumption and in general market information are not provided on time and often delayed

Potential solutions

Legislation and regulatory measures to prevent DSOs favouring sister companies already exists but based on supplier experiences has not been sufficient to prevent anti-competitive behavior. Vertical integrated operators are organized under functional unbundling, with distribution and supply companies strictly separated and not only from an accounting point of view. However, monitoring activities on the effects of such measures can be beneficial to market competition. Given the recurrence of this problem in many European markets, it appears that the only effective solution would be to require complete unbundling of DSOs from supply companies. With DSOs that could be excluded from any other activity than provision of network services.

Besides, regarding the concerns around data gathering opportunity, in Italy, these concerns could be easily addressed by stricter regulation around data quality and timeliness standards, designed to ensure that all actors can benefit equally. Continuous development of the SII data hub should consider likely future data requirements to ensure it remains fit for purpose.

European markets in which this barrier has also been indicated

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GREAT BRITAIN BEST PRACTICE CASE: Unbundling of DSOs and supply businesses

Great Britain provides an example of well-functioning separation between distribution and supply. Ten of the 14 electric DNOs (distribution network operators) are free standing companies, while 4 are part of groups that include generation and supply businesses. Of the 4 companies that distribute gas, only 1 is part of a group that also owns a gas supply business. The companies that have generation or gas supply affiliates are effectively unbundled. In this study, we found no evidence of incomplete unbundling presenting a problem in Great Britain. DNOs are prohibited from providing end-user services, they are invisible to the customer, and no suppliers in the study had experience of the supplier/DNO relationship being exploited.

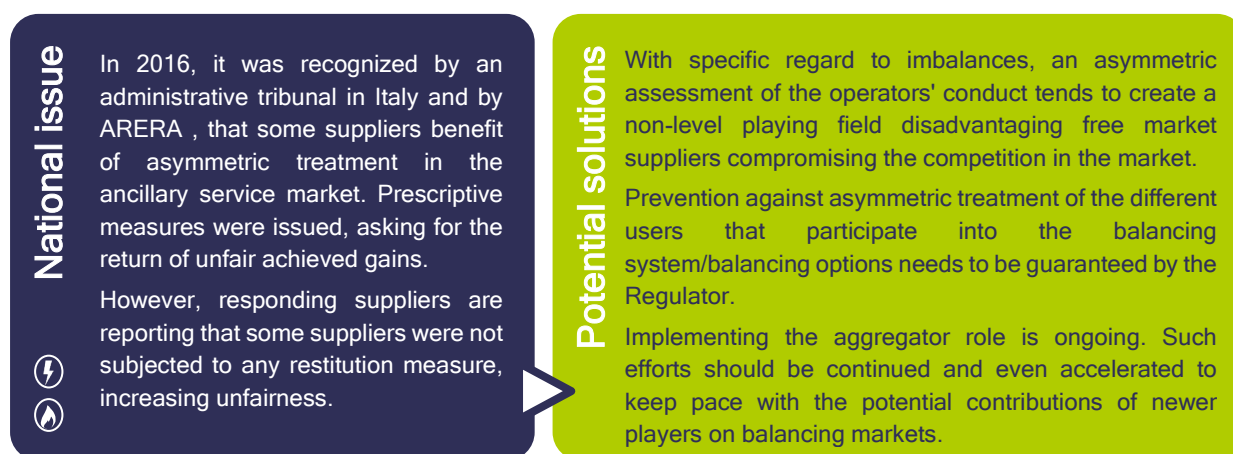
Discrimination against new and small market players in capacity and ancillary services markets.

In our research this barrier was identified as an issue in Italy.

Generally, in Europe, the balancing landscape was designed mainly for and remains focused on large-scale generation. This can exclude smaller-scale/aggregated generation or demand-side bids from participating in balancing markets as they cannot meet the product requirements. Also, inefficient capacity markets can lead to a market distortion, benefitting specifically incumbents and other established market players who are able to meet the large generation-focused market conditions (bid minimum size, treatment of users with asymmetric balancing etc.).

In Italy, the obstacles to the participation to the ancillary service market of individual resources, has been recently reduced to 1MW. As a consequence, a large number of different aggregators took part in the pilot project tender procedures for the assignment of the service, with the entire auction banned contingent exhausted. If participation is not an issue, fairness of resources treatment seems to represent a problem.

The Italian national issue identified by suppliers to this regard, and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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FINLAND BEST PRACTICE EXAMPLE: Consumption bids in balancing

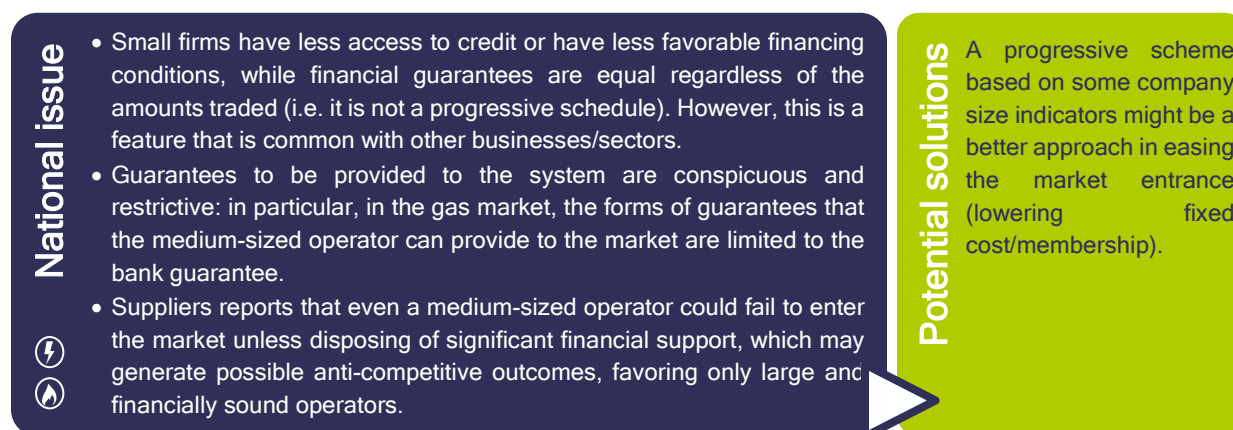
Several respondents active in aggregation and demand response expressed satisfaction at how Finland has redesigned balancing products to make them amenable for demand-side bids, complemented by its market-centric approach to DR. This indicates a willingness to let flexibility play a bigger part in the evolving energy system. Indeed, Finland's attitude to DR is positive and flexible, with respondents feeling that Fingrid is easy to work with and open to novelties. Many of the market structures for DR are an example of how to incorporate demand-side flexibility into the energy system. Some products are necessarily constrained by e.g. fast response times or minimum bid size due to their function, which make them difficult for DR providers to fulfill. However, open-minded amendments such as allowing pooling of loads, enabling stepwise activation or reducing minimum bid size where possible have opened up several products to DR. Developments remain ongoing, e.g. imbalance settlement for aggregators is currently under discussion. Progressive changes at the consumer end have also helped open the aggregation market in Finland, for example allowing 3rd party providers to access customers. Market players reported that the other Nordic countries are now developing in the same direction that Finland already has done, in this and other DR- and novelty-related aspects.

2.2. Description of market inequality barriers in Italy: Equal access to & maturity of wholesale market

Discriminatory market platform access (standards, guarantees, etc.). In our research this barrier was identified as an issue in Italy.

In general terms, across Europe, if the same requirements/treatment for establishing market access are applied regardless of company size, small suppliers bear a disproportionate administrative or financial burden for market access.

Italian national issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

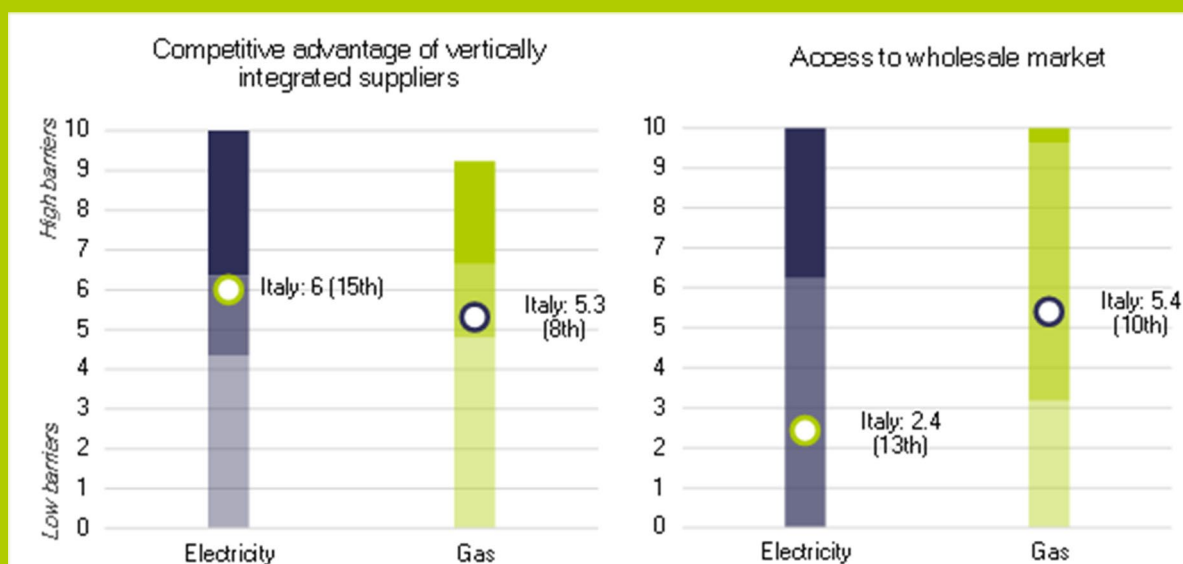
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2.3. Italy's performance in this barrier category

The following figure shows quantitative indicators of how far market inequality acts as a barrier in this market. The values for Italy are shown against the range across all analyzed countries. These scores contribute to the performance index. The performance indicators of market inequality are the following:

- **Competitive advantages of vertically integrated players.** The index consists of two sub-indicators, the market share of vertically integrated suppliers (on the residential market), and the strictness of DSO unbundling. A high score is attributed if the vertically integrated suppliers have a high aggregated market share, and the unbundling regime is not very strict (brand unbundling is not in force, high share of local, integrated companies).
- **Access to wholesale market.** The indicator measures the accessibility of the wholesale market by quantifying the liquidity of wholesale markets. High score is attributed if the traded volume is relatively low compared to the consumption of the country (churn rate). Traded volume includes volumes that are traded at hub as recorded by brokers (OTC) or exchanges and does not include 'contracted' (LTC or other bilateral deals) volumes which are conducted 'off market'.

Performance indicators



Italy was ranked in the middle range for both indicators. As well as in the general ranking with the other countries. However, high barriers are recorded in the electricity sector regarding the competitive advantage of vertically integrated suppliers.

3) Operational and procedural hindrances

Within operational and procedural hindrances, barriers across Europe have been sub-categorised into two areas encompassing 13 specific barriers⁵:

1. **Sign-up & operations compliance.** Sign-up, licensing or registration, along with other administrative requirements or system establishment such as arranging contracts with relevant stakeholders (TSOs, DSOs, BRPs) are among the first steps that a new supplier undergoes to enter and operate in a retail energy market. To deliver natural gas or electricity to final consumers in Europe, an energy supplier usually needs to be registered to a certain institution list, or to proceed with a notification, or follow a process to grant a licence. Entrance processes for suppliers often requires commitments such as a minimum standard of customer service obligations, requirements on service quality, to provide financial guarantees or to have a communication system in place.

In most responding NRA countries, suppliers need to register and make contracts with certain stakeholders (mainly TSOs and DSOs) to procure the access to the energy grid: transport capacity, balancing. This procedure can be very different from a country to another. Accessing wholesale markets and balancing may also require a license or prior agreement/registration with the market operator. In some markets, business processes to enter and operate in the retail market can be extremely detailed and burdensome. The lack of a functioning national wholesale market may also hinder the entrance of retail companies that are not vertically integrated.

Across Europe, the following specific barriers around “sign-up & operations compliance” were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy.

• Poor availability of information for market entrants & active participants
• Heavy administrative process for entry (registration / licensing)
• High financial requirements (incl. long working capital cycles) and forced risk during operations
• Excessive reporting requirements during operations
• Excessive information requirements around billing and energy labelling
• Highly complex or country-specific systems & processes
• Regional differences or differences between DSOs within a country
• Cumbersome or biased switching process
• Unduly burdensome environmental obligations
• Unduly burdensome or insufficiently regulated market exit

2. **Data access & processes.** Data access and management refers to the processes by which data are sourced, validated, stored, protected and processed and by which it can be accessed by suppliers or customers. In a well-functioning energy retail market, it is important that the information required to operate in the market is available to newcomers (subject to applicable legislation on data protection). This

⁵ Please note: these definitions are Europe focused, not Italy specific. Highlighted barriers have been identified as country specific.

may include information on, for example, individual consumption or more specific meter details. This data is required in order for suppliers to carry out their market role, such as initiating a switch, or billing a customer. A standardized approach to the provision and exchange of data creates a level playing field among stakeholders and helps to encourage new, challenging market actors to enter the market. In order to avoid data management and access processes acting as a significant barrier to entry, Member States' initiatives to standardize data format and processes, including investments in data hub infrastructure, have the potential to make a positive impact.

Across Europe, the following specific barriers around "data access & processes" were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy.

- Lack of data hub
- Complex, heterogeneous IT infrastructure and/or low level of digitalisation
- Missing access or poor quality of operations-critical data

3.1. Description of operational and procedural hindrances barriers in Italy: Sign-up & operations compliance

Poor availability of information for market entrants & active participants. In this research this barrier was raised as an issue in Italy.

In general terms, detailed information about legislation, licensing requirements and procedures during operations etc. are not readily available. This makes it difficult for potential new entrants to (1) understand the market and judge its suitability for their business; (2) efficiently go through the entry process to establish on the market; (3) operate effectively and efficiently.

National issue identified by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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AUSTRIAN BEST PRACTICE CASE: Availability of information for market entrants & active participants.

The Austrian NRA, E-Control offers a comprehensive “starter kit” with all the necessary information for new market entrants in German and English language. Furthermore, statistical data, covering switching rates, price levels, smart metering rollout progress and others is frequently being published. Therefore, a barrier is not only non-existing, but even more, the situation in Austria can be regarded as a best practice.

Heavy administrative process for entry (registration/licensing). In this research this barrier was raised as an issue in Italy.

In general, it might be the case that the processes required to enter a market constitute a large administrative burden. Overly complicated and very time-consuming processes and requirements present a barrier in terms of the time and money that new entrants must invest. This barrier refers to all steps required to deliver energy to the first customers and not only to obtain a license or registration.

In Italy, energy supplier registration is foreseen at the Ministry of Economic Development - MISE (only for gas at the moment), together with a mandatory sign-up at the ARERA (the so called “anagrafica operatori”). Also, suppliers have to be accredited by SII, the central data hub. Discrepancies exist between gas and electricity sector with not exactly the same procedures to be accredited as a supplier. The national issue identified by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.

National issue

Non-homogeneous, complex and highly bureaucratic procedures were raised as a substantial barrier for both electricity and gas accreditation processes.

To be officially accredited as a supplier in Italy, is non-homogeneous between electricity and gas markets (see appendix 1) and information is available for new entrants but way too complex.

Also, the experience with the entities in charge to help suppliers in the market entrance process, is not evaluated as helpful as in other countries.

**Potential solutions**

A supplier licence system in the electric power segment will be implemented, raising supplier's reliability and homogeneity between markets.

Introduction of one-window/simplified procedures, reduce the number of entities involved and may rise the quality of service provided to new entrants.

The authorities should communicate with market actors to identify the precise causes of new entrant feeling overlooked in the entry process. A clearer regulatory environment for new energy businesses and technologies would equip authorities to deal more effectively.

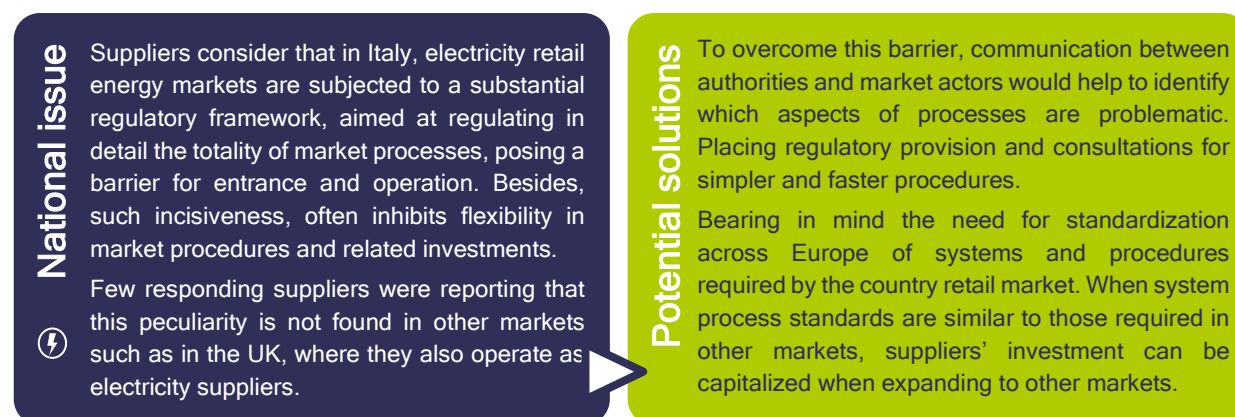
European markets in which this barrier has also been indicated

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Highly complex or country-specific systems & processes. In this research this barrier was raised as an issue in Italy.

In general, the systems landscape (forecasting, customer service etc.) can require significant costs, especially when first being established or if are too country specific.

National issue identified by suppliers in Italy and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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Cumbersome or biased switching process. In this research this barrier was indicated as a barrier in Italy.

Generally, switching is difficult for the suppliers due to the amount of information that must be provided, the time it takes, permissions that must be sought, complex technical systems etc. Existing suppliers have an advantage because they are the default supplier if the switch is not completed and may get warning for preemptive win-back. Italy has a high switching rate proving a dynamic energy retail market. However, suppliers highlight biased switching activities driven by dominant suppliers' behaviour.

National issue identified by suppliers in Italy and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

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IRELAND BEST PRACTICE CASE: Switching and win-back functions well despite DSO integration

The central messaging center in Ireland is well designed, requiring timely messaging of switches and with fair access to that information for all players. Switching messages must be sent only after a customer signs a new contract, but within four days. Win-back may only start after this and is restricted to a 10-day window. Hence, despite there not being a centralized data hub that includes data storage as well as messaging, access to information and the opportunities arising from it are considered equal across market players. Other industry processes were felt to be similarly well-developed and fair.

Unduly burdensome or insufficiently regulated market exit. In this research this barrier was raised as a barrier in Italy.

In general, the possibility for suppliers to exit the retail market very easily or being able to act without sufficient/timely sanctions on improper behavior, is not advantageous to market function, nor does it transmit confidence to customers.

In Italy, questionnaire respondents were raising the issue that unethical and irresponsible suppliers have negatively affected the retail market by discouraging new suppliers from entering and reducing customer trust and hence willingness to engage with the market.

National issue identified by suppliers in Italy and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

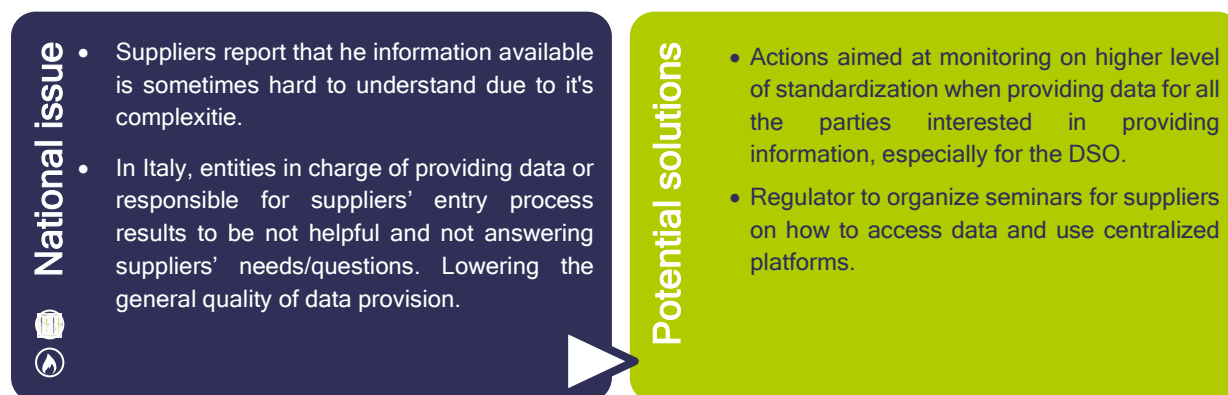
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3.2. Description of operational and procedural hindrances barriers in Italy: Data access & processes

Missing access or poor quality of operations-critical data. In this research this barrier was raised as an issue in Italy.

In general terms, non-availability or delayed or low quality of operations-critical data (incl. smart meter data) presents a main barrier as it increases the need for manual processing and therefore costs.

Italian national issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

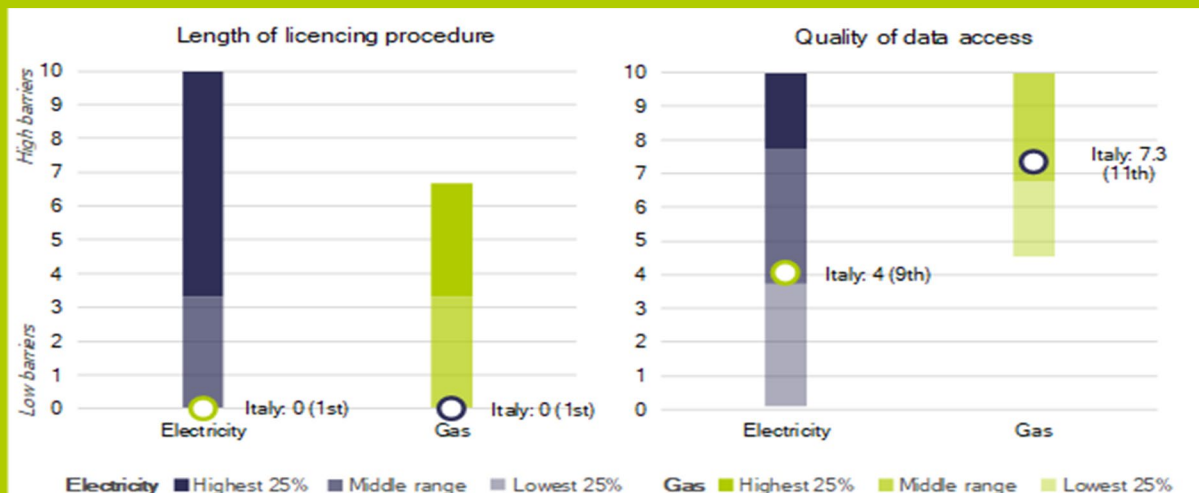
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3.3. Italy's performance in this barrier category

The following figure shows quantitative indicators of how far operational and procedural hindrances act as a barrier in this market. The values for Italy are shown against the range across all analysed countries. These scores contribute to the performance index. The performance indicators of operational and procedural hindrances are the following:

- Length of licensing procedure.** The complexity of the licensing procedure is quantified using the legal deadline of the licensing procedure. A higher score is attributed the longer the regulator's authorization period, while a score of 0 is attributed if there is no licensing obligation in the country.
- Quality of data access.** Barriers relating to the quality of data access are measured with a checklist indicator, which focuses on the DSO's practices regarding data collection and access provision to suppliers. A high score is attributed if the format of the data provision is not standardised, third party access is not available via website or data hub, and the smart meter rollout is small.

Performance indicators



Italy was ranked first among the EU countries regarding the length of getting a license because no explicit licensing procedure is foreseen. Here we do not consider the time to be registered at MISE and ARERA (anagrafica operatori) and the time to be validated at the SII (data hub). For the considered standards, Italy seems to have a good quality of data access.

4) Customer inertia

Within operational and procedural hindrances, barriers across Europe have been sub-categorised into one area encompassing 6 specific barriers⁶:

1. **Customer orientation.** Whether customers want to or can engage with the market depends on a broad range of market characteristics, including how well authorities inform and support customers and how energy companies are viewed by the customer. For example, if there is no trusted central place to compare offers from different suppliers, customers may struggle to make an informed choice; or if customers perceive all energy companies as irresponsibly profit-driven, or providing a poor service, they may feel there is nothing to be gained from switching. Moreover, across Europe, most energy markets have been liberalized relatively recently (last 20 years, some only a few years ago), so for a considerable portion of customers the potential for them to engage may still feel unfamiliar.

Across Europe, the following specific barriers around “customer orientation” were detected by this study. Those highlighted in blue have been raised, indicated or identified as barriers in Italy.

- Lack of information regarding available offers and switching possibilities
- Low customer awareness or interest makes it difficult to attract customers
- Insufficient price signals for end-users
- Changing supplier is cumbersome or has little pay-off for the customer

⁶ Please note: these definitions are Europe focused, not Italy specific. Highlighted barriers have been identified as country specific.

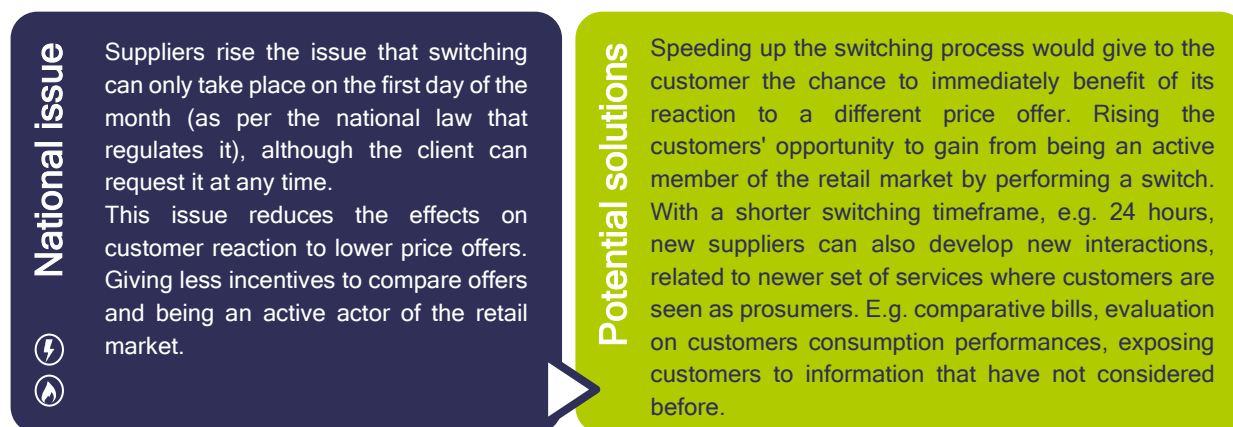
- Consumers prefer status quo
- Lack of trust in new or foreign suppliers and in new technology

4.1. Description of customer inertia barriers in Italy: Customer orientation

Changing supplier is cumbersome or has little pay-off for the customer. In this research this barrier was identified as an issue in Italy.

Generally, a slow switching process, prone to delays and errors, may discourage customers to switch, which in turn lead to low customers engagement. Effective price competition between suppliers requires rapid and effective switching suppliers process, such that customers see the benefit to them in a short timeframe.

In Italy, the switching process is a completely free of charge activity and it is an activity performed according to the European standards. However, there are still national issue raised by suppliers. Regarding the Italian case, that are reported in the graphic below. Together with the related potential solutions.



European markets in which this barrier has also been indicated

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Consumers prefer status quo. In this research this barrier was identified as an issue in Italy.

Generally, customers can experience strong incentives to stay on a regulated price (e.g. because it is cheaper, or safer and they mistrust new suppliers).

This is the case in Italy, where suppliers responding to the questionnaire and suppliers that wanted to be interviewed for this project, perceive that customers prefer to stay under the price regulation regime. The Italian national issue raised by suppliers and related potential solutions regarding the Italian case are reported in the graphic below.



European markets in which this barrier has also been indicated

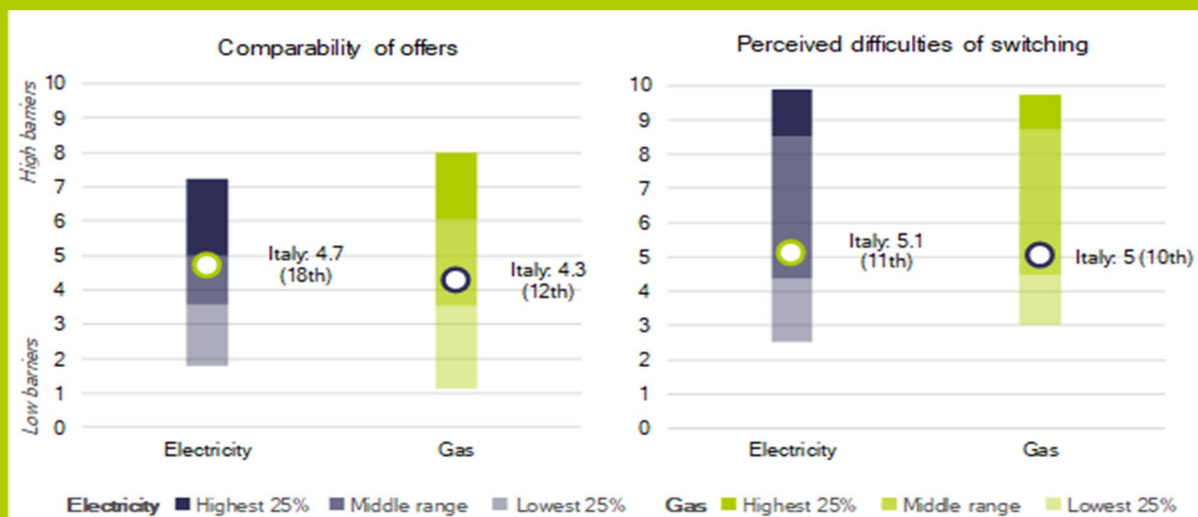
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4.2. Italy's performance in this barrier category

The following figure shows quantitative indicators of how far customer inertia acts as a barrier in this market. The values for Italy are shown against the range across all analyzed countries. These scores contribute to the performance index. The performance indicators of customer inertia are the following:

- **Comparability of offers.** The index consists of two sub-indicators. The first measures consumers' ability to compare offers, based on a survey commissioned by the DG Justice and Consumers. The second is a checklist indicator which quantifies the availability of comparison websites, based on their number and functionalities. A high score is attributed if the consumers gave low scores for comparability, and there are no comparison websites in the country.
- **Perceived cost of switching.** Difficulties around the switching process are also measured based on DG Justice's survey. The indicator incorporates the experience and opinions both of customers who have switched, and also of those who have not because they faced obstacles or thought it might be too difficult. A high score is attributed if a high share of consumers reported a bad experience of or poor opinion on the switching process, among all customers who considered switching.

Performance indicators



The index did not show significant barriers to customer engagement: Italy was ranked in the middle range for both comparability of offers and for perceived difficulties of switching.

5) Other

Other aspects of the market not directly related to its functions, as addressed above, may also impact suppliers' ease to enter and operate in the market. These relate to characteristics of the market that are not necessarily a barrier per se, but their impact on the energy retail environment could be minimized to benefit market function.

Description of other barriers in Italy: N.A.

N.A.

N.A.

N.A.

N.A.

European markets in which this barrier has also been indicated

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FINDINGS & RECOMMENDATIONS

This handbook provides a high-level framework of relevant barriers to entry and operate for energy suppliers into the Italian retail electricity and gas markets, as well as examples of actions that relevant institutions as NRAs, ministries, etc., have taken, are taking or could take in the future to remove them.

In particular, the handbook groups the barriers to entry and operate in the energy retail market into four different categories as listed below.

1. Regulatory disincentivisation.
2. Market inequality.
3. Operational and procedural hindrances.
4. Customer inertia.

In this section we report the main findings and recommendations for each category.

Under the first group, **regulatory disincentivisation**, suppliers' main concerns relate to the model under which electricity customers who do not choose a supplier are supplied under the electricity price regulation regime (the protection regime "*maggior tutela*") and by the DSO selling company (this is not the case in the gas sector). Suppliers believe that, in this way, their activity in the regulated segment of the electricity market are thus able to preempt this customer base. Although the identification of the phasing out of price regulation as the step to complete the market liberalization, this process has been postponed several times, intensifying suppliers' frustration in winning new shares of the retail market. Identifying a situation in which the transition to the free market has been slowed down and that will not be completed before 2022. Hence, keeping up with the degree of competitive advantage of suppliers operating in the regulated segment of the retail market, already recognized by the Regulator itself in its retail market monitoring report. With still more than the 60% of switching customers that prefer to stay with the supplier of the DSO company, in 2018. Unveiling a lower degree of competition in the domestic segment if compared with the others. The Enel group still supplies the 72% of the domestic segment, having as direct competitor Eni at 5.6% (supplier only for the free market). To offset the slow transition to the free market, a change in the paradigm under which customers who do not choose a supplier are supplied under price regulation regime is recommended. Auctioning the customer base still under price regulation can be a way to set a level playing field. An implicit way to rapidly reduce the market share of the major operators could be to fix a maximum market share as a ceiling. Repeating the Letta decree experience that in Italy, at the beginning of the liberalization process, imposed a roof of 50% over the gas sales of a single operator to end customers and a decreasing cap to the same operator imports for the period 2002-2009. Besides, actions aimed at stabilizing the current regulatory framework with tracked directives at policy level, that among the other could help suppliers planification activities and strategies are recommended. Here we refer to a roadmap plan for the phasing out of price regulation, that could show the resulting market structure and regulatory framework. It is recommended to relieve suppliers' burden when tasked of collecting charges unrelated to the energy sector. In principle, charges unrelated to supplier's business should be collected through different methods and collecting mechanisms. If this is not possible, collection failure should be protected by setting such charges as a mere pass-through or through

a recovery fund. Finally, technology improvements and innovation of market processes are factors influencing the scope for competition in the market. Hence, regulation around innovative services should be promoted through a faster deployment of gas metering systems, considered obsolete, as well as around demand aggregation and participation to the ancillary services. Pilot projects are fundamental to eliminate “sunk costs” for new entrants and the roll-out of the service/product upon project completion raises market players’ confidence. Making authorities serious on the need for integrating novel players into the system, and the potential for soon becoming commercially active which naturally acts as a strong attraction for companies to get involved in such pilots. In Italy, demand response, aggregation and demand participation to the ancillary service market are in pilot stage and very well advanced. However, with small uncertainties by suppliers regarding the post-pilot stage. Post-pilot rollouts of services need to be encouraged, with certain and fast timelines, developing rules to ensure they are as friendly for small generators and loads and aggregators as possible. An important footstep towards this direction is seen in the statement of the Italian Regulator in guaranteeing that resources identified during the pilot stage, will contribute to the future provision of this market.

Regarding **market inequality**, barriers have been identified arising from a perceived uneven playing field reported by suppliers responding to the survey or that have been interviewed, often describing a retail market conditioned by inequality of opportunities. The Italian electricity and gas retail markets seem to be characterized by the uneven opportunity of getting market statistical data or metering data and by the competitive advantage of certain suppliers in winning customers in the free market. On the data provision side, a data hub has recently been completed for both, electricity and gas market guaranteeing equal opportunity among customers. However, we believe the effects of such action are still awaited and the obsolete status of the gas metering system suggests a need for further actions and monitoring by the Regulator. Regarding suppliers’ competitive advantage, functional unbundling has been deployed with DSO, with its consequential re-branding. Yet, suppliers report uneven re-branding results with still significant similarities in brand colours and symbolism. During 2018, concentration indexes were slightly improving in the domestic sector, however far from reporting a good level of competition among suppliers in the domestic sector and worsening if considering the total market (C3). Close monitoring by the Regulator with accessory actions aimed at studying the effectiveness of unbundling are recommended. Finally, suppliers’ concerns refer also to the asymmetry treatment of suppliers in the ancillary service market. The Regulator has the responsibility to prevent such dynamics through its monitoring activities and must guarantee the equality over restitutions measures.

Operational and procedural hinderances are regarded as barriers by some of the suppliers responding to the survey or being interviewed. Complexities and differences in standards and procedures may affects suppliers’ entrance and operation in the retail market. Suppliers still experience discrepancies in getting metering data, with the required information regarding the retail market usually not delivered on time or way too complex. Also, entities in charge of such services are not reported as helpful. As previously stated, data hub effects on the efficiency of getting customers’ data are still awaited, with the Regulator required to monitor on such effectiveness. Introduction of one-window procedures could reduce the number of entities involved and may rise the quality of service provided. The authorities should communicate with market actors to identify the precise causes of new entrant

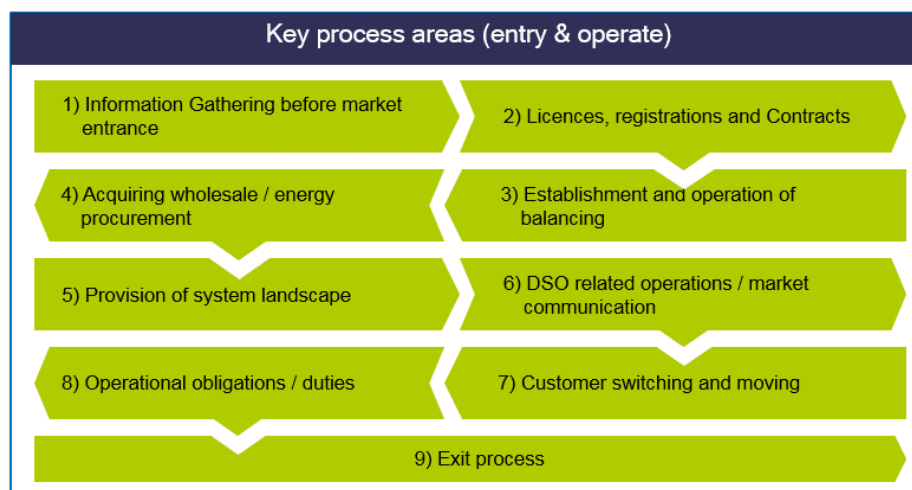
feeling overlooked in the entry process. A clearer regulatory environment for new energy businesses and technologies would equip authorities to deal more effectively.

Besides, Italy is usually pointed out by suppliers as a market in which the regulatory framework is substantial, with high level of details and with an incisiveness that inhibit flexibility and investments. Standardization across Europe of systems and procedures required by the country retail market for access and operation are important. Together with actions aimed at capitalising suppliers' investments. For both data access and ease of procedures the Regulator should enhance activities of organizing seminars on platforms usage and accessibility.

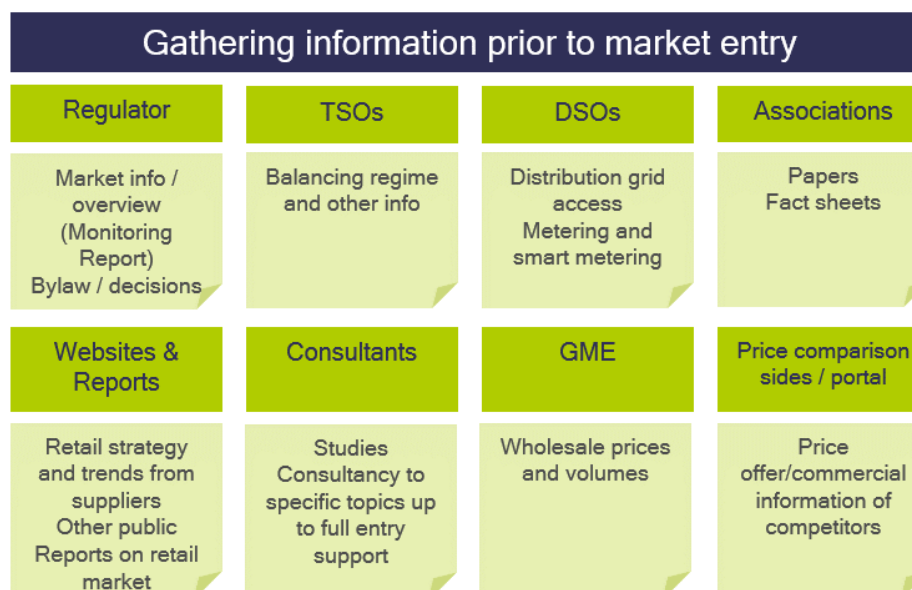
Customer inertia barriers category, groups all those issues related to customer behaviour and attitude within the retail energy market. By considering the supply points, in 2018, the switching rate has increased (9.1%) in Italy if compared with 2017 (7.9%). Same trend recorded in the gas sector (from 5.2% to 6.6%). However, customers' behaviour during the last years has been diverted by incumbent suppliers' behaviour, as found by the competition authority fining few companies for alleged abuse of dominant position. Besides, suppliers report that switching activity is still biased and can take place only during the first day of the month. Certainly, reducing the effects of customers' reaction to lower price offers, as an active actor of the retail market. Customer reaction to price offers need to be safeguarded. Switching process is recommended to be quicker and the activities aimed at enhancing customer awareness should be strengthened. With a shorter switching timeframe, e.g. 24-48 hours, suppliers have the possibility to inform customers on the savings achieved within a shorter timeframe. New suppliers can thus develop new interactions, related to newer set of services where customers are seen as more active counterparts. For instance, comparative bills and evaluation on customers consumption performances, exposes customers to information that have not considered before. This topic is of a great importance for the Italian energy retail market, where customers still have strong incentives to remain regulated, feeling safer with the incumbent supplier services. In this direction, other recommended activities are the enhancement on suppliers precontractual and customer information provision, raising customer awareness, with the customers associations to better monitor suppliers' behaviour, preventing unethical behaviour enhancing market reliability and attractiveness.

APPENDIX 1: PROCESSES

This section describes market processes in energy retail in Italy. This gives a high-level overview of the most critical aspects involved in establishing and operating as a supplier in the national market. The stages of market entry and operation are described in sequence, each with an illustration (“process map”) showing that stage’s various processes together with comments/details on market specifics.



1) Information gathering before market entry

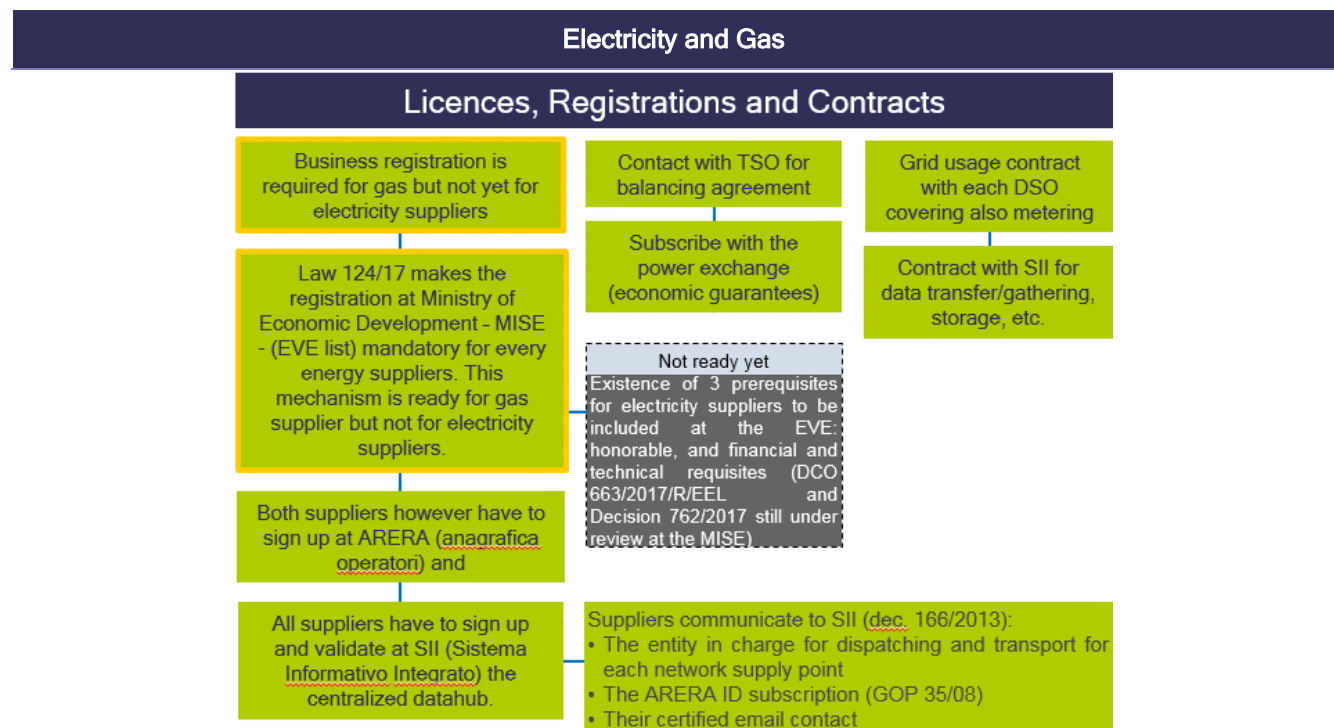


Relevant comments on information gathering

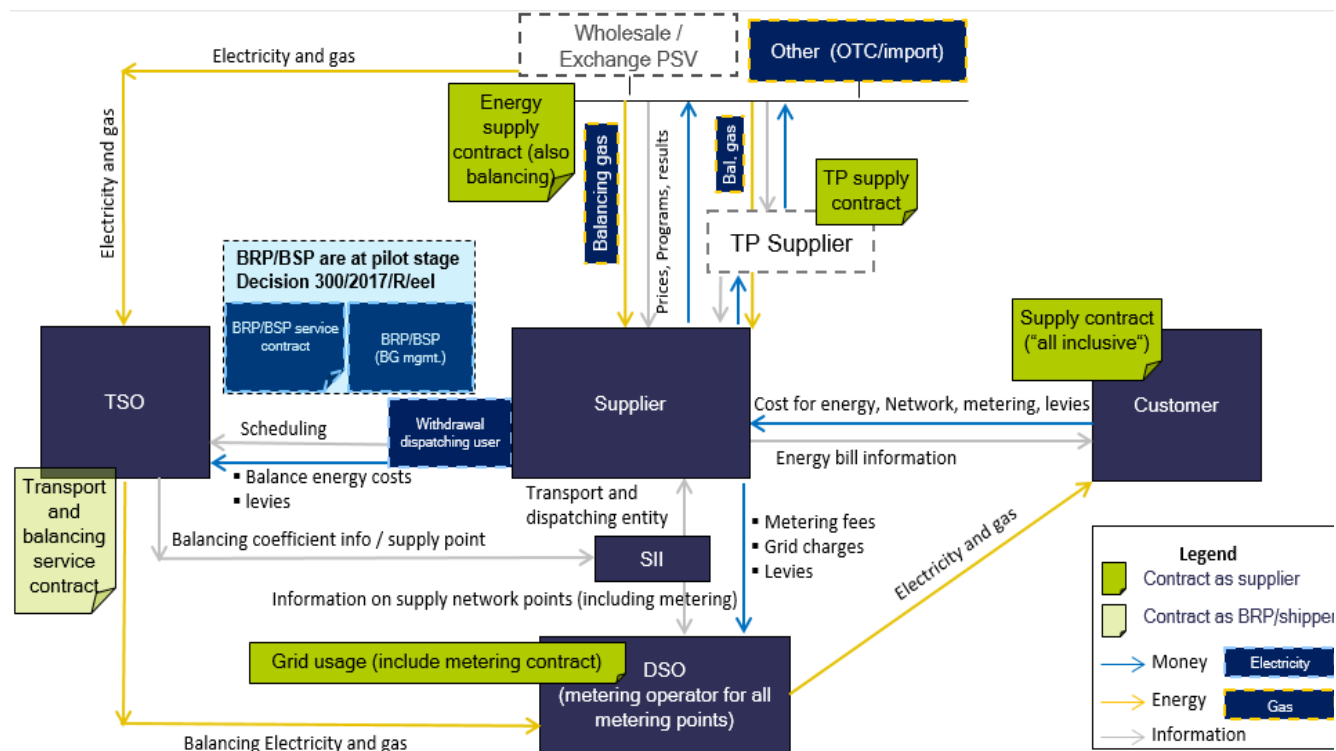
- ARERA is a point of contact with plenty of market information; monitoring report of the regulators give a good high-level overview of market structure, and developments (also available in English).
- No central point of contact for all concerns and no central tariff registers

- Official electricity and gas price comparison website at ARERA is www.ilportaleofferte.it while others, non-official, are prezzoenergia.it, altroconsumo.it.
- Resolution of controversies and collective procurement at <http://www.sportelloperilconsumatore.it> and for accessing the data hub SII www.consumienergia.it.
- Laws and standard contracts (e.g. with TSO and DSO) available in Italian only.
- TSO with more information on physical infrastructure and balancing regime (also available in English).
- From 2016 ARERA publish and update every 3 months DSO "reference grid tariff" charged to customers (del. 654/2015 all. A art. 5). Published also by DSOs within 30 days.
- Balancing regime very well described on TSO websites and grid code.

2) Licenses, registrations and contracts



Dependencies / Contracts for Electricity and Gas

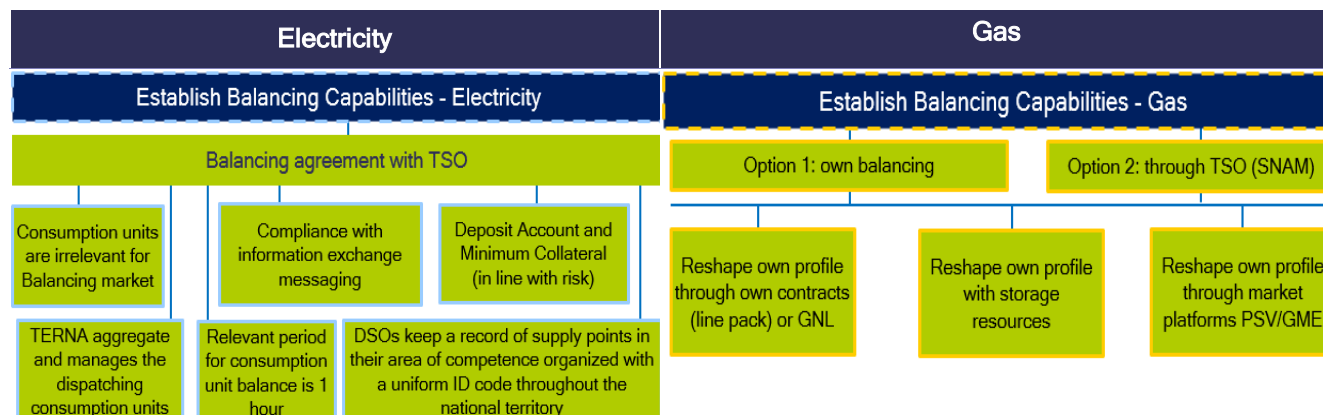


Further comments

- Energy supplier registration is foreseen at the Ministry of Economic Development - MISE (only for gas at the moment), a sign up is also mandatory at ARERA (the so called "anagrafica operatori") and be accredited by SII, the central data hub.
- Foreign energy supply companies - regardless of their place of business - must also follow the same registration path of national suppliers for the supply to household customers in Italy.
- SII datahub is one of the strategic elements that ARERA has identified for its action aimed at completing the development of competition in the electricity and gas markets.
- TERNA and SNAM (TSOs respectively for electricity and gas), the regulator ARERA, the MISE, the SII and the market operator GME ask to each supplier candidate to provide several legal/financial documents (accounts, certificates of being up to date with payments to fiscal authorities, etc.) and ask for a minimum technical capacity related to IT systems.
- Grid usage contract must be concluded with DSO (paper contracts); this include also metering obligations (no separate contract for metering).
- The total time span from registration to delivery of first customers can be as fast as 3 to 4 months.
- GME market access guide:

<http://www.mercatoelettrico.org/It/MenuBiblioteca/Documenti/20041011GuidaME.pdf>

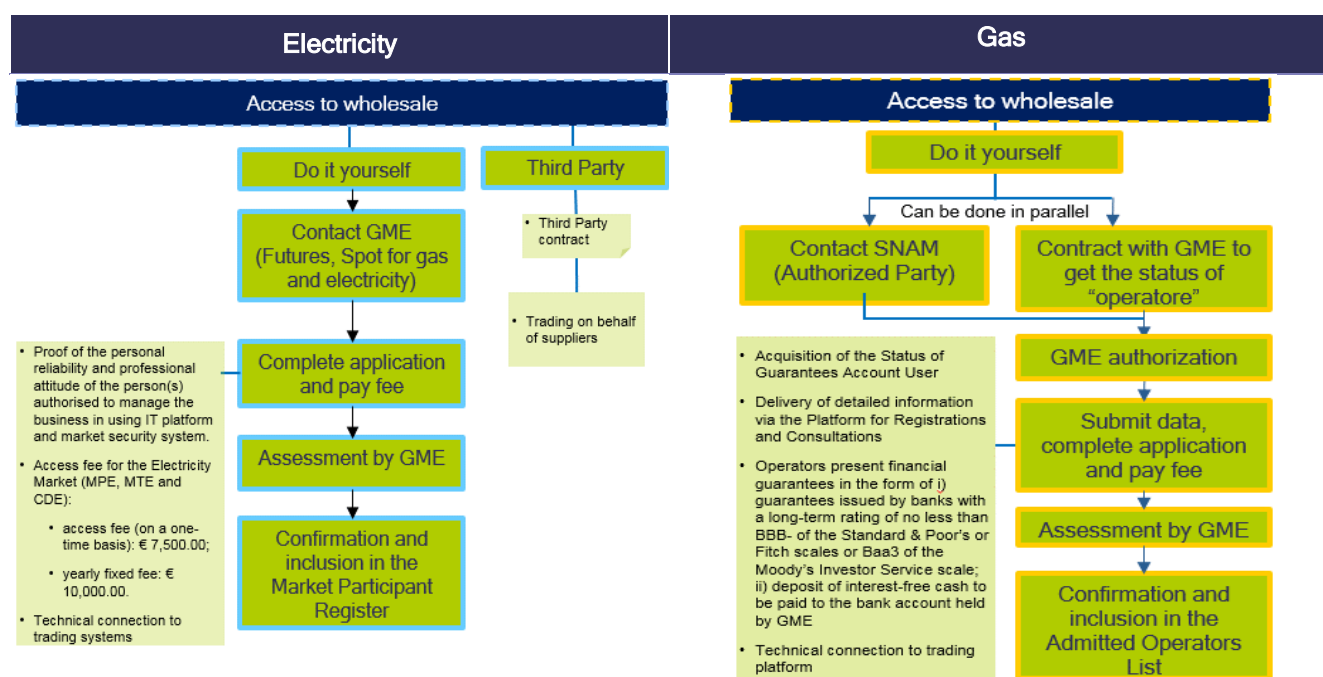
3) Balancing

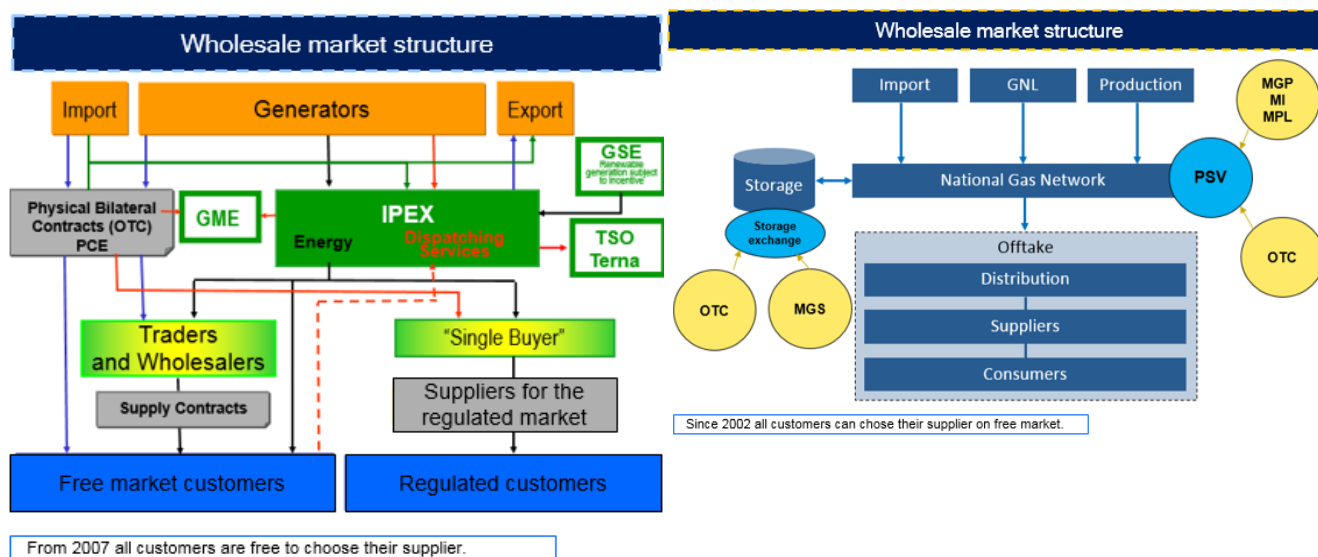


Further comments

- Suppliers are mandated to forecast volumes and imbalances and to keep the represented parties posted on regulatory changes and foreseeable implications. Suppliers usually perform subsequent analysis to rise the quality of their forecasts.
- Balancing activity typical risk is related to imbalances and forecast errors of both volumes and prices.

4) Wholesale

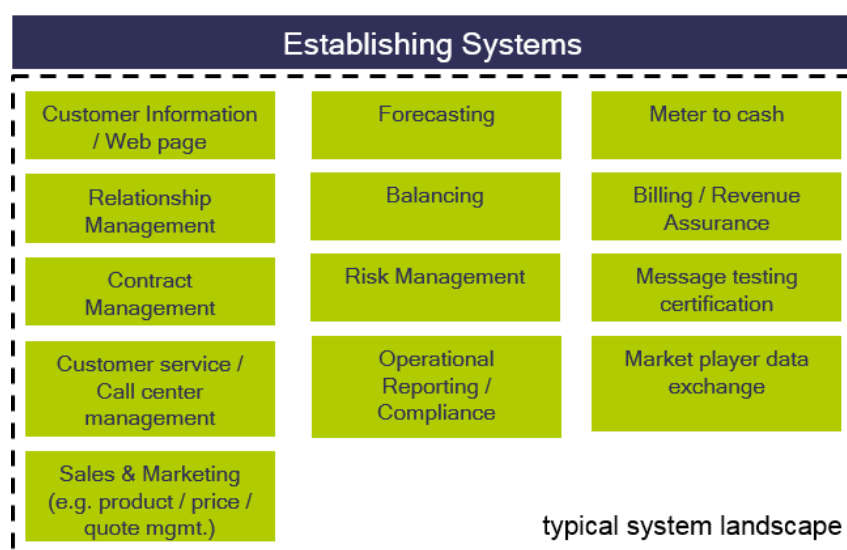




Further comments

- Accessing the wholesale market is a straightforward process by following the standard rules that are in compliance with the EU market standards.
- Energy procurement and related risks can be fully outsourced to external service provider (most expensive)
- Trading on behalf of supplier can be done by the BRP or other third parties (e.g. brokers, financial institutions, ...)
- Procurement of suppliers happens at both exchange through the GME (also at PSV for gas) and OTC or through non-standard contracts
- Depending on business model and internal trading know-how suppliers procure energy directly on wholesale markets (exchange, OTC)
- There are no obligations in the way of procuring energy
- Own generation capacities are not mandatory
- RES can participate to balancing market since 2018 (383/2018/R/eel). Minimum capacity bid is 1MW.

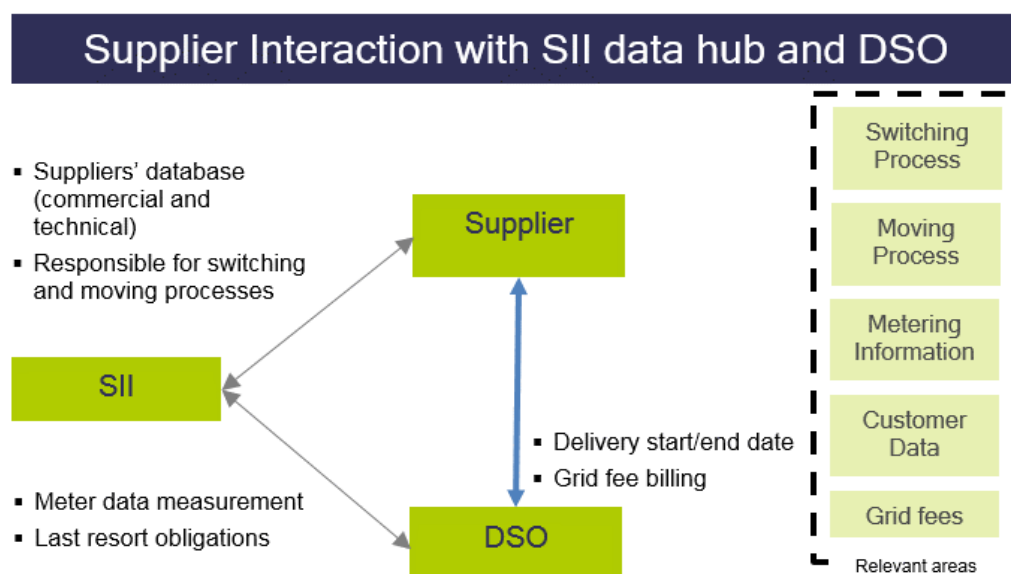
5) System landscape



Further comments

- Data exchange with market players is using a standard software which is free in the basic version; There are three options to realize this:
 - Integration into own IT system
 - Contracting an IT service provider
- Mandatory connections to:
 - SII datahub
 - DSO/supplier: for gas for some technical performances there are bilateral communications.

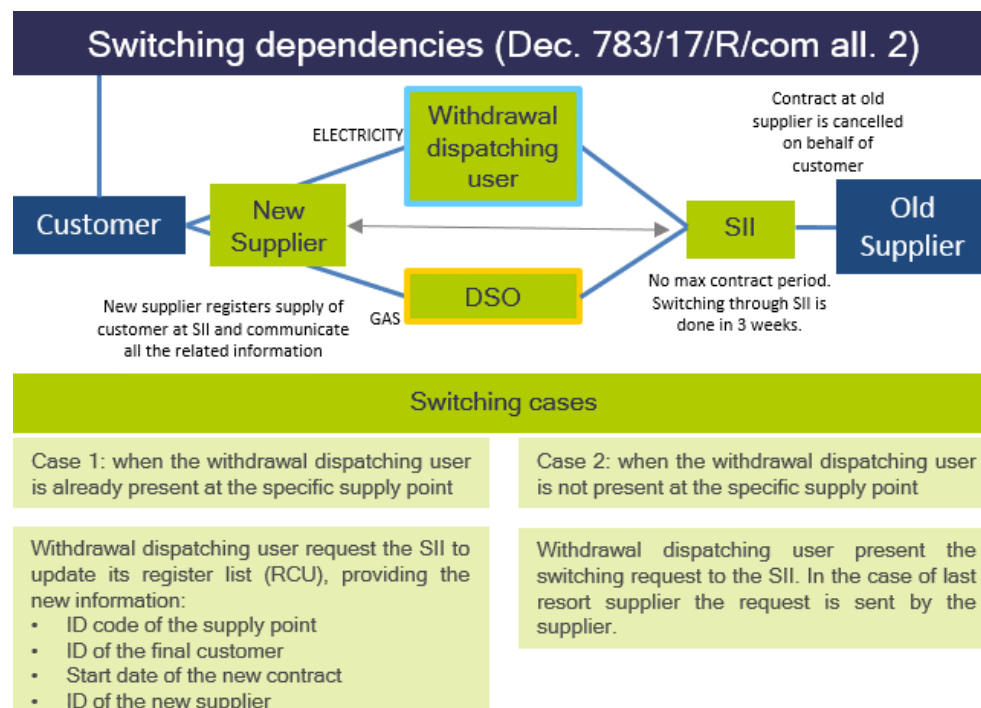
6) Supplier interaction with SII data hub and DSO



Further comments

Format of data received by DSOs and transferred to SII: Personal Consumer Data (Name, Address), Consumption site info (Metering point ID, meter type, meter number, profile class, etc), Consumption Data (Yearly, Monthly, Hourly consumption).

7) Customer switching & moving

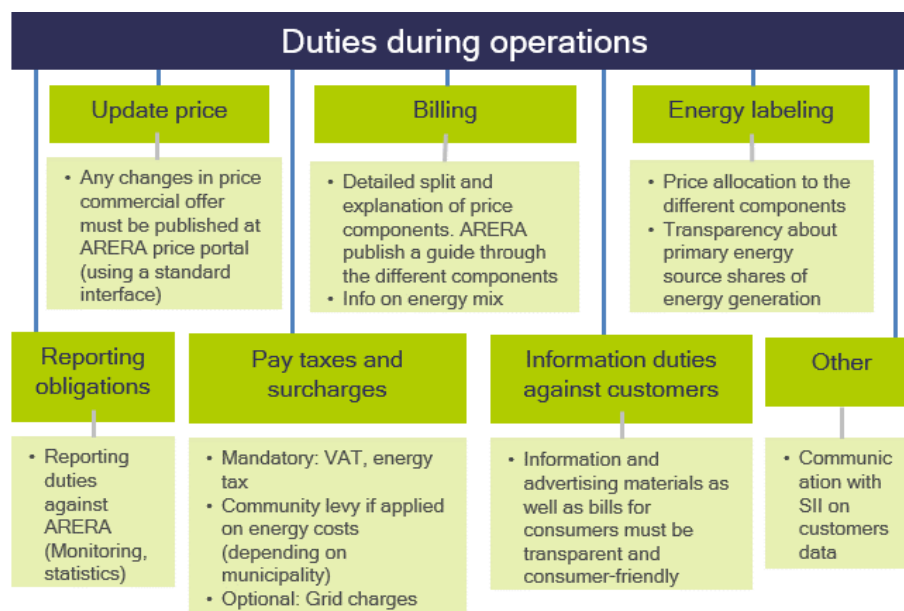


Further comments

Switching process

- Switching process are standardized and foresee deadlines for each business process and market players (for electricity: decision 487/2015 attachment A; gas: decision 77/2018 attachment A).
- It is possible to change suppliers during the month on any day of the week but only before the 10th of each month and request is processed by the following month.
- There are no contacts between customer and old supplier. The SII as a centralized data hub manage all the information and during the switching procedure informs the DSO, the new supplier and the old supplier.
- In case 2, the request for the switching is presented by the supplier in case of last resort suppliers. In all other cases is the withdrawal dispatching user that present the request to the SII.
- Switching procedure can be cancelled within 7 days from the cancelling request to the SII.
- New supplier takes care of reactivation.

8) Operational obligations / duties



Further comments

- The bill must contain certain pieces of information (e.g. system charges, taxes and surcharges, and energy costs must be stated separately); the bill will be only one document.
- Price information checked by ARERA.
- Customers have a right to receive a paper invoice.

The amount of the community levy and calculation method (applied on energy costs or grid charges) varies amongst municipalities: need to integrate the different levels into supplier accounting and billing system.

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