EXECUTIVE SUMMARY AND KEY RECOMMENDATIONS

EXECUTIVE SUMMARY

The Italian government has made substantial progress in a number of sectors since the last in-depth energy policy review in 2003. The success of the green certificate and white certificate schemes, the reorganisation and continued reform of the electricity and natural gas sectors and the implementation of incentive schemes for renewable energy are notable achievements. Other accomplishments include new investment in carbon capture and storage (CCS) research, development and deployment schemes and the adoption of simplified planning procedures for essential new energy infrastructure. Each of these significant steps builds on the recommendations contained in the 2003 review.

The government has gone a large way towards addressing some of Italy's considerable energy challenges, thus strengthening the country's energy security. It has developed a framework to implement an energy market policy that is consistent with European requirements. It has also succeeded in diversifying gas supply routes, at least in terms of pipeline gas, added significant amounts of electricity generating capacity, and is in the process of further diversifying fuels for electricity generation. In addition, a European Union Emissions Trading Scheme (EU-ETS) Allocation Plan has been implemented and the independence of the sectoral regulator, the Regulatory Authority for Electrical Energy and Gas (AEEG), has been enhanced and strengthened. An offshore liquefied natural gas (LNG) terminal has been commissioned, more LNG facilities are being built, and a law aimed at allowing the construction of a number of nuclear power plants after a moratorium of more than twenty years was approved in mid-2009. The IEA commends Italy for its continued progress.

Notwithstanding the success of the white certificate scheme and other tax-based tools, Italy needs to take greater steps to develop a more comprehensive and consistent, evidence-based energy efficiency strategy. While the first National Energy Efficiency Action Plan represents good progress in this regard, weaknesses remain; it is unclear how many of the proposed savings will be achieved or if the plan can deliver the significant levels of savings intended. Following the enactment of Law no. 99/2009 the government is elaborating on a new plan of action on energy efficiency, which has the capability to address many of the weaknesses identified in present policy.

Italy, the only member of the Group of Eight (G8) nations without nuclear power, has recognised the need to diversify its energy portfolio to reduce the heavy dependence on imports of fossil fuels and electricity and also to reduce, at least in the long term, emission levels. The country had one of the earliest nuclear energy programmes in Europe but abandoned it in 1987 following a referendum. In May 2008, the newly elected government announced its intention to recommence the country's nuclear power programme and to start building a new nuclear power plant by 2013. The government's intention became law in July 2009. This new law provides a legislative basis to address concerns in relation to plant siting, waste disposal, risk management and plant decommissioning. The new law will also allow Italy to reactivate the relevant regulatory institutions and train the human resources needed to support and regulate nuclear power installations.

Despite struggling during the initial stages of liberalisation and market reform of the electricity market, good progress has been made in recent years, which lays a solid framework for development of a competitive Italian energy market and the secure and efficient provision of electricity for the long term. Italy has set in place the necessary institutions and market design for a competitive electricity market to develop, and has already gained many of the benefits of such a framework, including new entry into the generation market, enhanced competition levels, better long-term planning of network infrastructure and sound incentives to develop new capacity in the locations where it is most needed. This progress, however, cannot mask the fact that some work remains to be completed, particularly in the retail market where there is little sign of real competition emerging or of final consumers being any better off.

The natural gas market has also evolved and matured since the previous review. The government has undertaken a series of ongoing compulsory changes to the structure of the gas market in order to ensure fair access to pipelines and effective competition in supply. The previously vertically integrated gas incumbent has been legally unbundled into separate transmission, supply and storage businesses. Excellent progress has been made in relation to import pipelines and new capacity is being built or is at an advanced phase in its development. Conversely, and despite some recent successes, some LNG import facilities remain at the planning phase and expansion of pipeline export capacity remains limited. Furthermore, much work remains to be done in the retail market before consumers feel the full benefits of market reform.

Whereas the government invests in technology research and development and various measures are introduced at different times by different government institutions, the overall energy research and development strategy appears unclear owing to devolution of authority and fragmentation of responsibilities, which sometimes complicates decision making and potentially reduces national impacts of policies. Nonetheless, the government is to be commended for increasing funding available to energy-related research and development programmes.

MAJOR CHALLENGES REMAIN

The European Union's (EU) climate and energy package greatly increases the challenge facing Italian policy makers. The 2020 targets relating to greenhouse gas (GHG) mitigation, renewable energy and energy efficiency will strongly influence energy policy in Italy and other EU member states in the coming decade. On the basis of the climate and energy package, Italy will have to reduce emissions from the sectors outside of the EU-ETS by 13% below 2005 levels. With regard to the Kyoto Protocol target, Italy's emissions at present are 12% higher than in 1990, leading to an 18.5% gap with no reversal in the trend expected in the medium term. Even if Italy rapidly prepares and implements a comprehensive strategy of domestic measures, complemented by an increased use of Kyoto flexible mechanisms, there remains a strong possibility that it will be unable to meet its 2012 obligations.

A common theme that emerges in the various sectors reviewed is the difficulties faced by energy infrastructure providers in bringing projects from the initial planning phase to completion. While numerous initiatives have been taken at central government level over recent years, fundamental problems remain as evidenced by the delays in the construction of new LNG facilities, upstream oil and gas production, electricity transmission infrastructure and renewable energy installations. Under present circumstances, it is likely that the recently adopted nuclear energy proposals may face similar obstacles. Law no. 99/2009 contains a series of provisions that have the capability to address many shortcomings. The government must continue to build on the potential offered by the new law, with a view to creating a streamlined, integrated and transparent process. The goal should be to highlight to all stakeholders, including the public, the costs and benefits of new infrastructure and involve all stakeholders in the process from the outset.

The government needs an integrated long-term vision that will translate into effective development of the energy sector. The Italian energy position remains vulnerable in several respects and, in the recent past, a consistent and well-balanced strategy to address these weaknesses was lacking, despite promising developments visible in many sectors. In particular, energy security remains a major concern. Growth in electricity generating capacity has been largely gas-fired, leading to increased dependence on imported gas. Conversely, this dependence has the potential to decline in the longer term should plans to develop nuclear capability succeed. The import capacity of natural gas pipelines has expanded but interconnections to other European natural gas markets remain limited. This has happened within the context of delays to the planned diversification from pipeline gas to LNG, partially due to the lengthy period it takes to permit and develop LNG terminals. Delays have also marked the development of renewable energy, the conversion of oil-fired to coal-fired electricity generating plants, as well as the issuing of hydrocarbon exploration and production licences, although many simplified procedures have been introduced by means of recent legislation.

KEY RECOMMENDATIONS

The government of Italy should:

- *Build a comprehensive long-term strategy for the development of the national energy sector consistent with the principles of a liberalised energy market.*
- *Continue to implement an efficient process for identifying where critical energy infrastructure, including nuclear power, is needed and subject it to an effective, streamlined siting and permitting process.*
- *Step up efforts to comply with its EU 2020 obligations, specifically by developing and putting in place a comprehensive climate change strategy for the years until 2020.*