## **Infrastructure in the UE:**

## Developments and Impact on Growth

The economic and financial crisis resulted in a sharp decrease in both private and public investment in the EU. Stimulus efforts were put in place right at the beginning of the crisis in 2008, which resulted in support for infrastructure investment worth about EUR 32 billion (0.25 % of EU GDP) (1), over 2009 and 2010, but these measures subsequently stalled as the crisis wore on and governments decreased investment as part of their efforts to strengthen public finances.

Today, investment needs are high in areas such as research, innovation and ICT which are important drivers of growth and competitiveness. However, there are also arguments to suggest that Europe should invest in energy and transport infrastructure. Energy and transport infrastructure play a vital role in the integration and efficiency of the EU's internal market. Moreover, they are central to the EU's strategic transformation towards a low-carbon economy over the medium-long run. Investment in cross-border energy infrastructure is also needed to improve the EU's energy security and the functioning of the energy market. The EU's energy and transport infrastructure investment needs are expected to remain high in the near future.

This report analyses the macroeconomic impact of infrastructure development in the EU, focusing on inland transport and energy. It also assesses infrastructure investment patterns in Member States, before and after the economic crisis.

Over the last four decades, all Member States have expanded their transport and energy infrastructure networks. Since the mid-1990s, the development of road infrastructure has increased significantly and in some cases has exceeded the growth in road traffic (freight and passenger). Railway infrastructure has grown more slowly as trains have been losing market share in both passenger and freight traffic. The expansion of electricity infrastructure, however, has increased in line with electricity consumption.

Despite these positive developments, the availability and quality of infrastructure still varies considerably across the EU. The difference in the quality and availability of infrastructure in older and newer Member States has narrowed and reflects the catching up of these countries. In some older Member States, the quality of infrastructure has deteriorated due to insufficient maintenance spending and the ageing of networks. Cross-border transport and energy connections, which are vital to make the EU's internal market work, remain insufficient, particularly when it comes to railways and electricity. Building these missing interconnections to achieve a fully interconnected internal market could contribute to economic growth.

The report confirms that there is a positive relationship between the growth of transport and electricity infrastructure and economic growth. Policies that promote spending in these areas have a

<sup>(1)</sup> European Commission (2009).

positive impact on growth, provided they do not create excess capacity, as overprovision of infrastructure has been shown to create inefficiencies by diverting resources away from more productive investments.

Member States have different infrastructure needs and increased investment in those sectors should take account of their investment pattern before and after the crisis. Analysis of recent infrastructure investment patterns in the Member States reveals signs of underinvestment in some countries. In the core countries of the euro area, there are indications of low investment in both road and rail infrastructure so boosting investments in these networks would be justified. In the euro area periphery, there seems to be an adjustment following a period of high investment in roads. In the newer Member States, investment in both road and rail infrastructure has been higher than expected, with a sustained increase in investment that corresponds to their need to catch up with the rest of the EU. In most of these countries, the stock of infrastructure is still lower than the EU average. Investment in energy across the EU has been dynamic in most Member States, reflecting the shift to renewable and low-carbon energy encouraged by the EU's climate and energy strategy.

Increased investment in infrastructure can have a positive impact on growth, provided it is well targeted. Evidence suggests that Member States in which the stock of infrastructure is low, or has suffered from underinvestment, could benefit from higher infrastructure investment. To meet the EU's policy goals, considerable investment will be needed in energy infrastructure but such investment decisions are largely in the hands of the private sector and need to take place in well-designed markets (²). This paper by no means provides a blanket justification for undiscriminating public investment in infrastructure. Targeted public infrastructure investment can be very valuable in some cases but must take into account macroeconomic conditions, including fiscal constraints and the need to increase private financing.