Over half of the EU’s generated power in 2015 came from low carbon sources and the share of renewables in the power mix continues to rise.
Capacities across conventional generation assets are shrinking, gas capacities are being mothballed due to difficult market conditions while renewables, especially wind and solar, are continuing their surge.

In order to meet the challenges brought about by decentralisation and intermittency, and to ensure security of supply, the market must adequately value energy, flexibility, and capacity.
The European power sector continues its progressive trajectory in reducing key air pollutants and carbon dioxide emissions.

### Key Emissions Across the European Power Sector

- **SO₂**
  - 1990: 13,140 kt
  - 2000: 6,152 kt
  - 2014: 1,376 kt

- **CO₂**
  - 1990: 1,186 Mt
  - 2000: 1,164 Mt
  - 2014: 1,002 Mt

- **NOₓ**
  - 1990: 3,321 kt
  - 2000: 2,139 kt
  - 2014: 1,263 kt

### Electricity IS Decarbonising

The average CO₂ content per kWh of electricity produced in Europe continues to decline, as electricity becomes the energy carrier of a decarbonised Europe.

- **1990**: 414 gCO₂/kWh
- **2000**: 363 gCO₂/kWh
- **2005**: 338 gCO₂/kWh
- **2010**: 363 gCO₂/kWh
- **2011**: 362 gCO₂/kWh
- **2012**: 343 gCO₂/kWh
- **2013**: 343 gCO₂/kWh
- **2014**: 331 gCO₂/kWh

### Notes

- **2021**: Limited to 50 gCO₂/km by 2021
- **2025**: Limited to 95 gCO₂/km by 2025

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*Source: EURELECTRIC + Eurostat*
Renewable technologies deliver increasing shares of Europe’s electricity output.

Renewable generation technologies are able to cover national demand to varying degrees. However, peak generation periods are not always in line with national demand peaks. System variations and variable renewable generation is best addressed through a well-functioning internal energy market.
Whilst the share of low carbon generation continues to increase, the share of electricity across EU-wide electricity demand also continues to rise.
While wholesale costs have decreased and network costs have remained relatively stable, the proportion of policy costs and taxes in the consumer electricity bill have increased by 47% between 2008 and 2014.

Governments in 14 EU Member States interfere in the retail market by regulating energy prices.
The Union of the Electricity Industry - EURELECTRIC is the sector association which represents the common interests of the electricity industry at pan-European level, plus its affiliates and associates on several other continents. We currently have over 30 full members, representing the electricity industry in 32 European countries.

Data in this publication is based on the latest available industry figures (2015) gathered from EURELECTRIC statistical experts and complemented by public information.

The data contained in this report covers EURELECTRIC member countries (referred to as Europe in this publication), namely Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Spain, Sweden, Switzerland and the UK.

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Unless indicated otherwise, the data presented has been collected via the EURELECTRIC annual power statistics survey.