

Energy Security in Europe: From Crisis Response to Structural Transformation

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The ECSRI – A Multidimensional Measure of Energy Security

Energy and Climate Security Risk

Geopolitical Risk

Security of Oil, Natural Gas and Raw Materials Imports

Affordability Risk

Oil & Natural Gas Imports Expenditures, Energy Expenditures, Retail Electricity and Natural Gas Prices, CO2 Costs

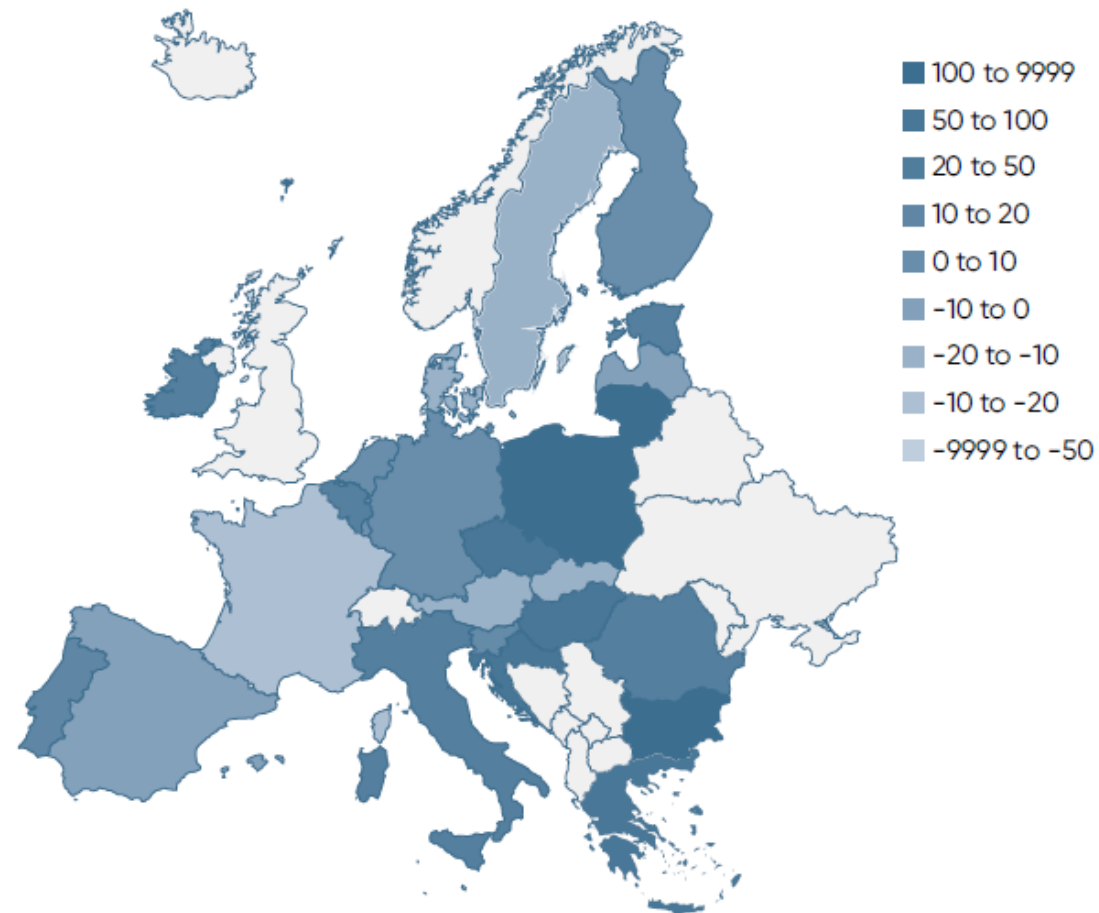
Reliability Risk

Electricity Capacity Margins, Electricity Capacity Diversity, Gas Stocks, Gas Infrastructure Reliability, Energy Efficiency

Sustainability Risk

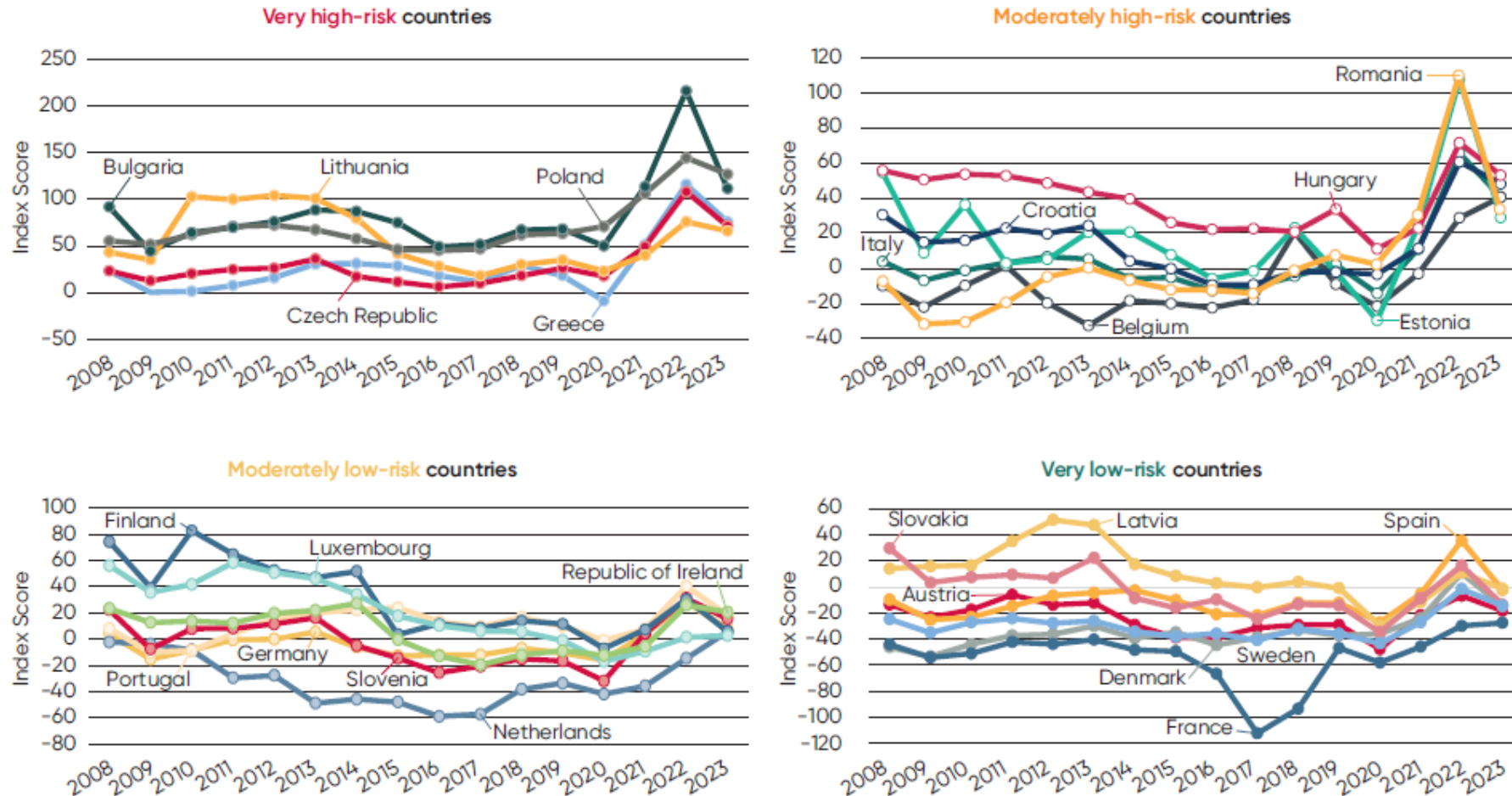
Energy Intensity, Emissions Intensity, Electricity Non-CO2 Share, Waste per Capita, Circular Material Use Rate, Material Footprint

Energy security risks in the EU have declined from their 2022 peak but major vulnerabilities persist



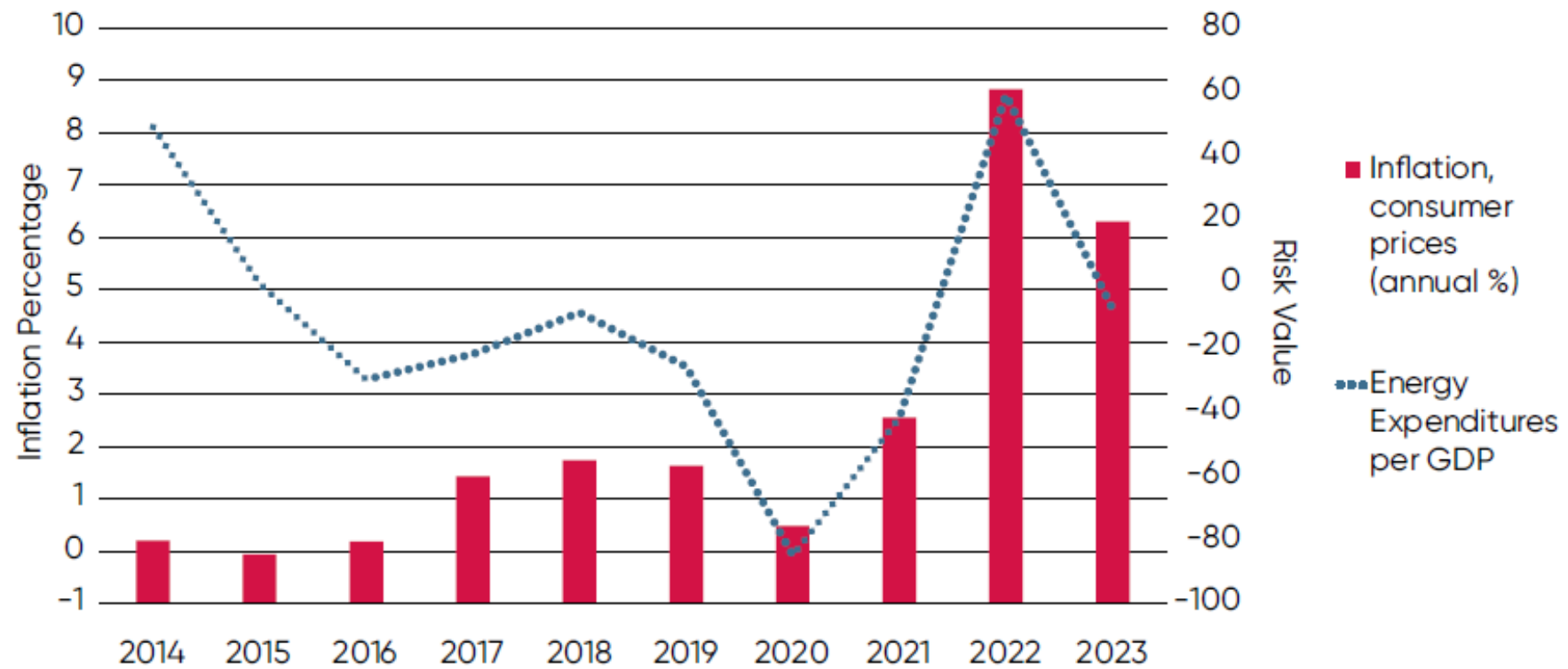
Source: CSD based on ECSRI.

Widening gap between transition leaders and laggards: energy security risks tend to be related to high emissions intensity and geopolitical exposure



Source: CSD based on ECSRI data.

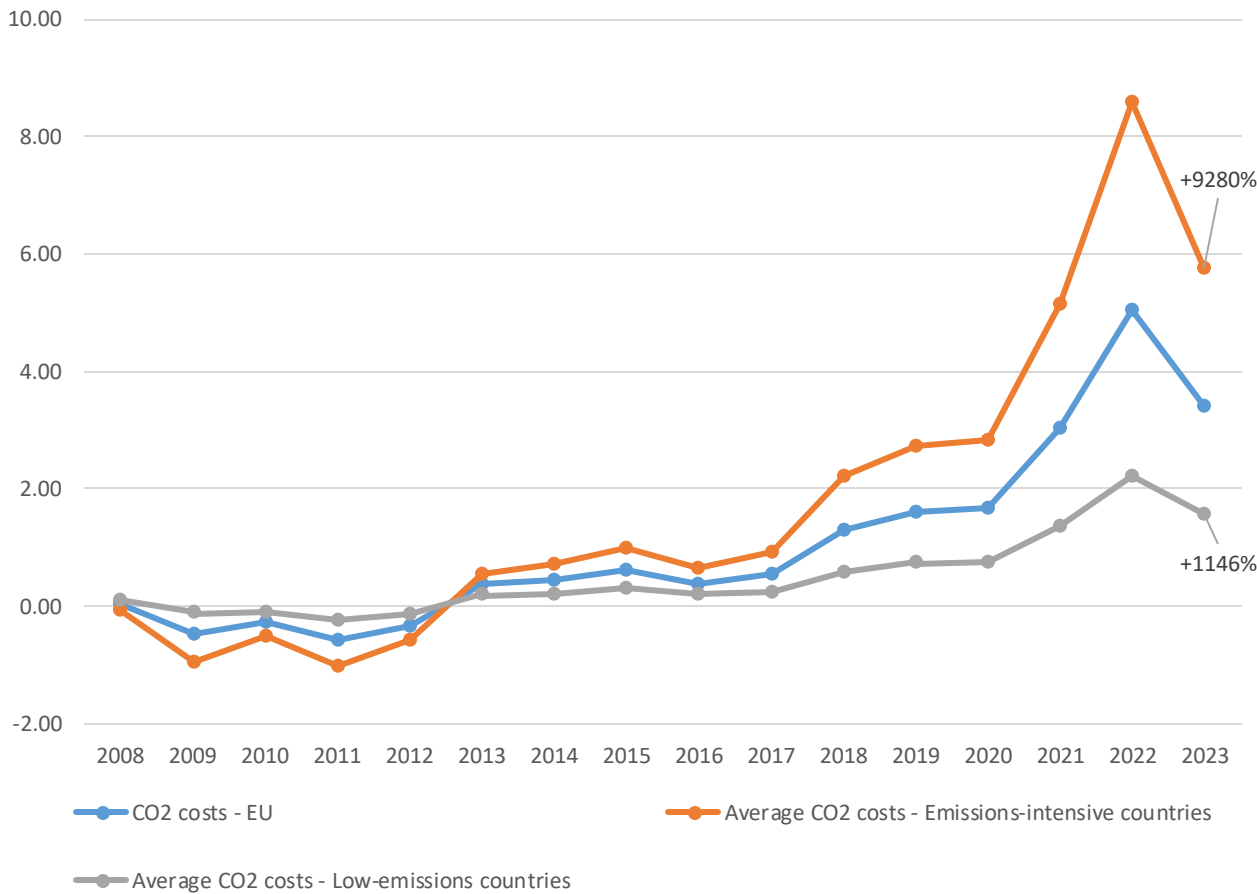
Energy price shocks have been one of the biggest drivers of EU inflation and affordability risks



Source: CSD based on Eurostat data.

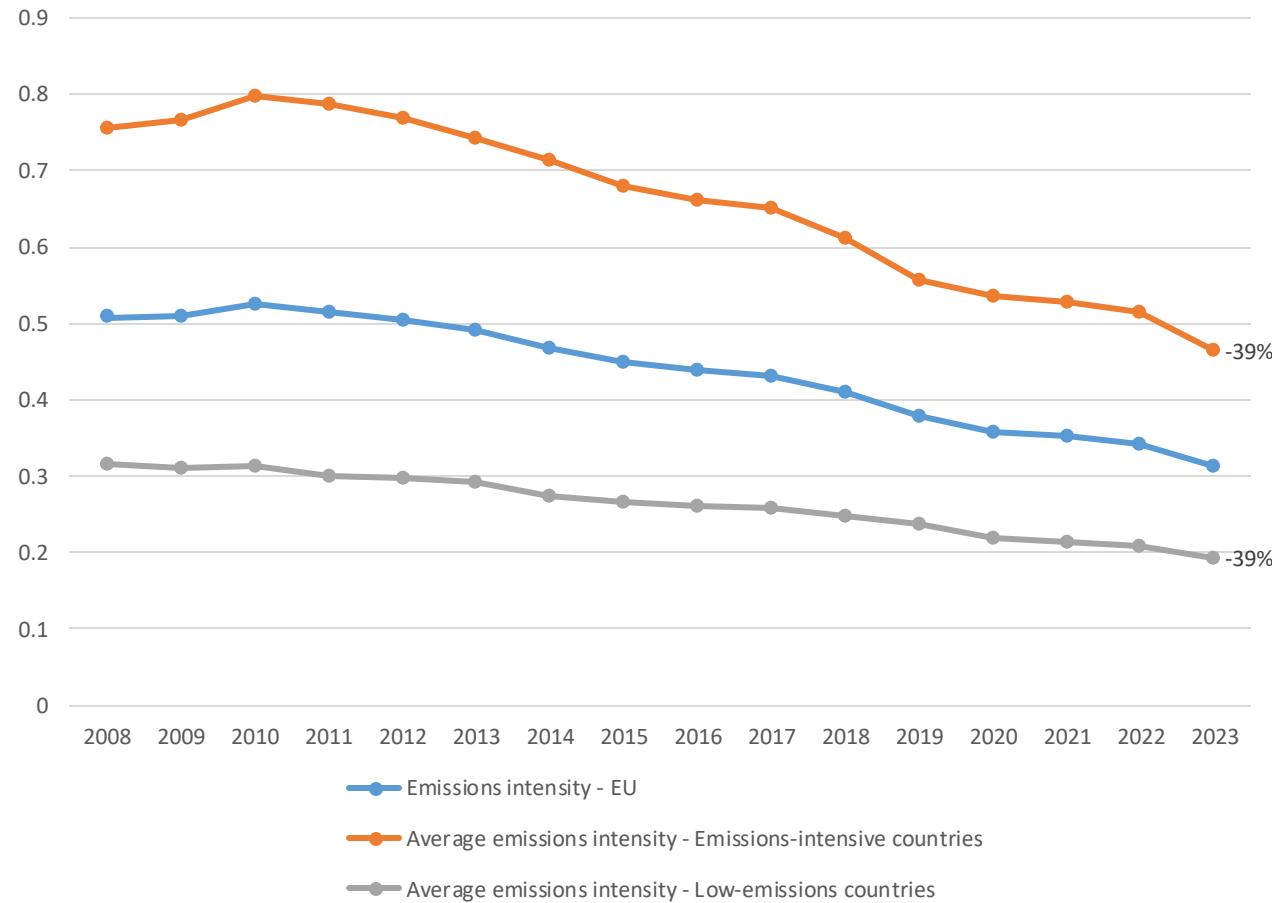
Although member states are decarbonising at a similar speed, major differences in emissions intensity and carbon cost burdens persist.

Average CO2 costs in € per €1000 GDP



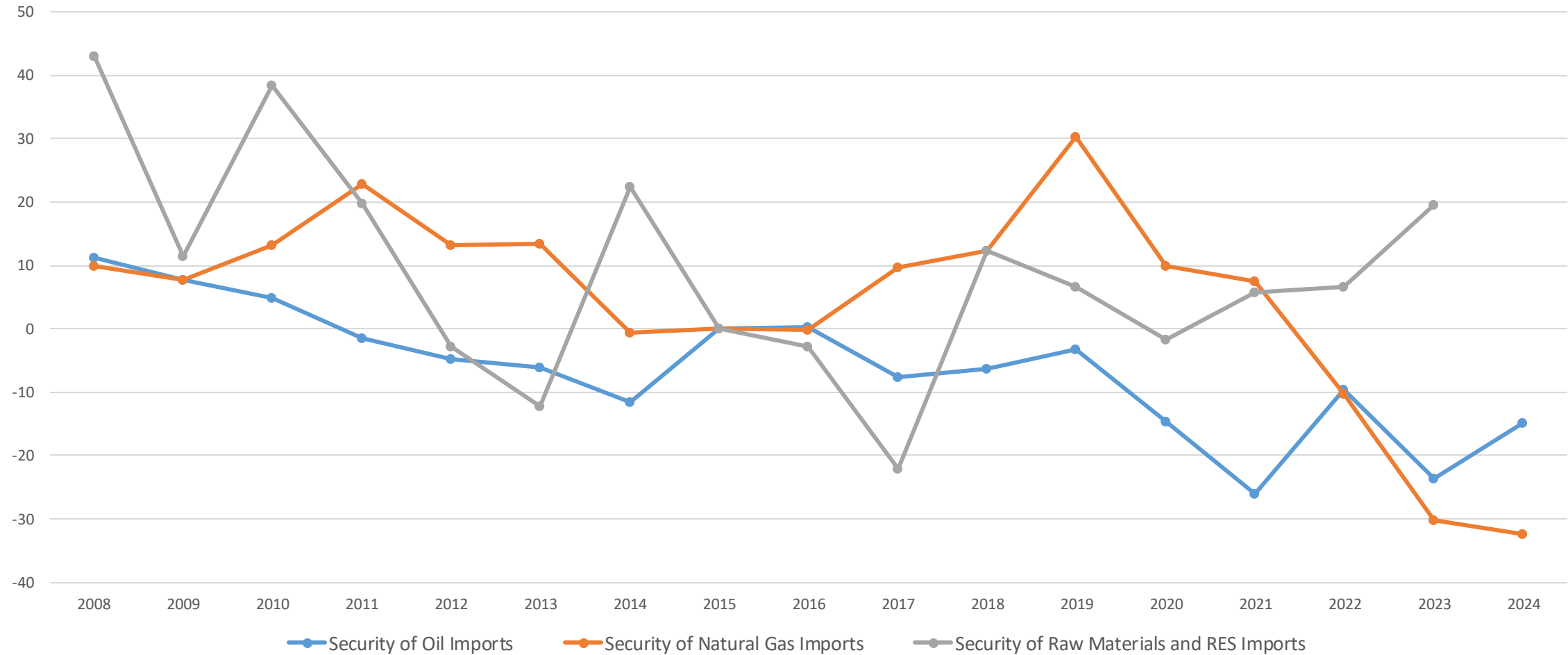
Source: CSD based on ECSRI data

Average emissions intensity in tCO2e per €1000 GDP



Source: CSD based on ECSRI data

The challenge of geopolitical risks is changing with the emergence of new dependencies in the clean energy sector



Source: CSD based on ECSRI data.



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Check out the interactive visualisations and
download the full dataset from the ECSRI website.

