

# Documentation Energy source division - group 23

Luce Zoontjens - s2678934

Lasse van Eerden - s2741571

Marije Rekker - s2634678

Brend Boer - s2861011

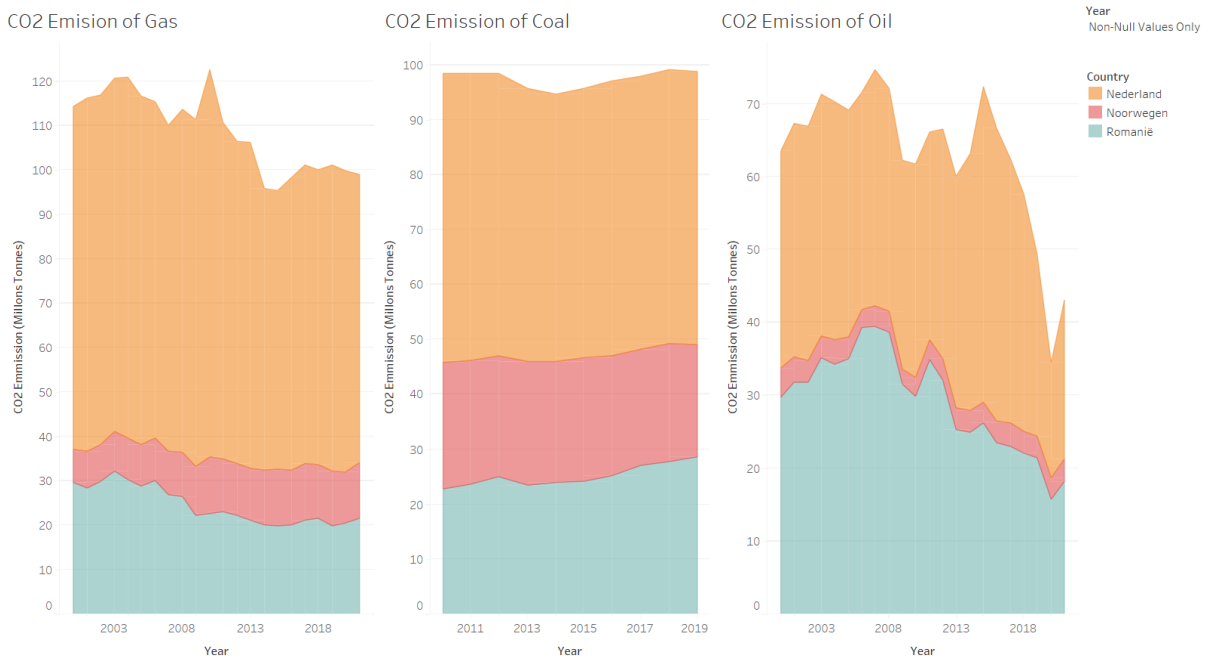
Jorick Schöndorff - s2847728

Jorrit Kolsteeg - s2613778

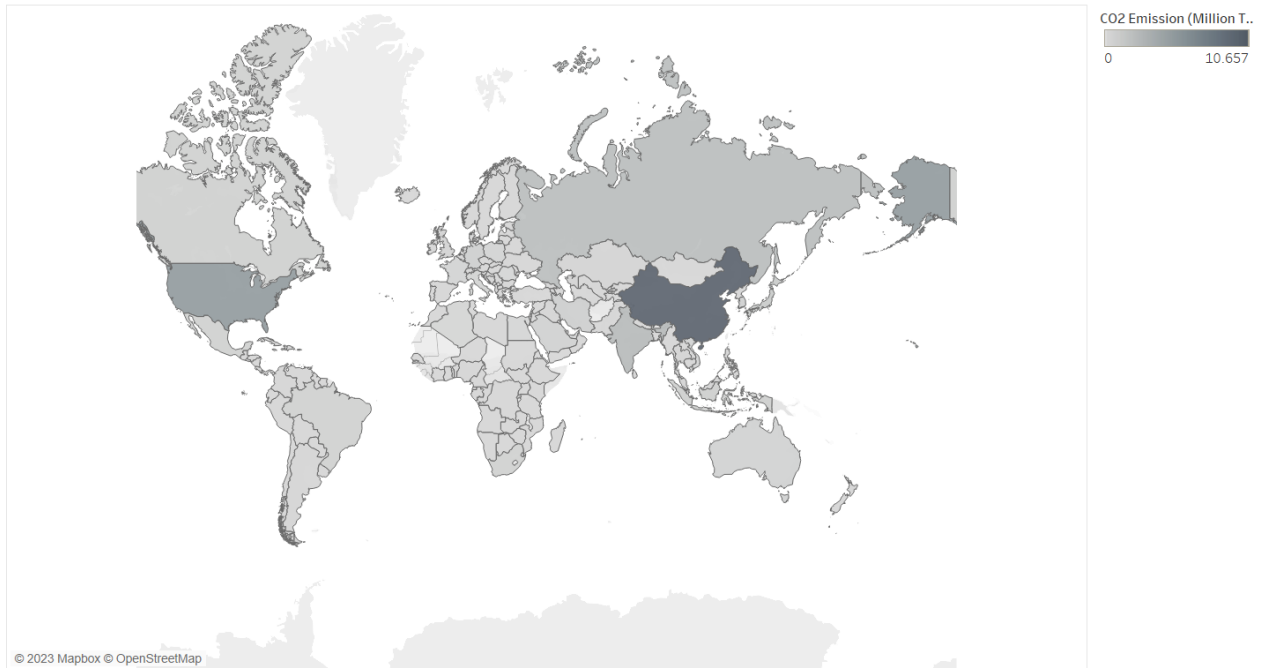
## CO2 pollution

Dataset used:

<https://www.iea.org/data-and-statistics/data-product/greenhouse-gas-emissions-from-energy-highlights#>



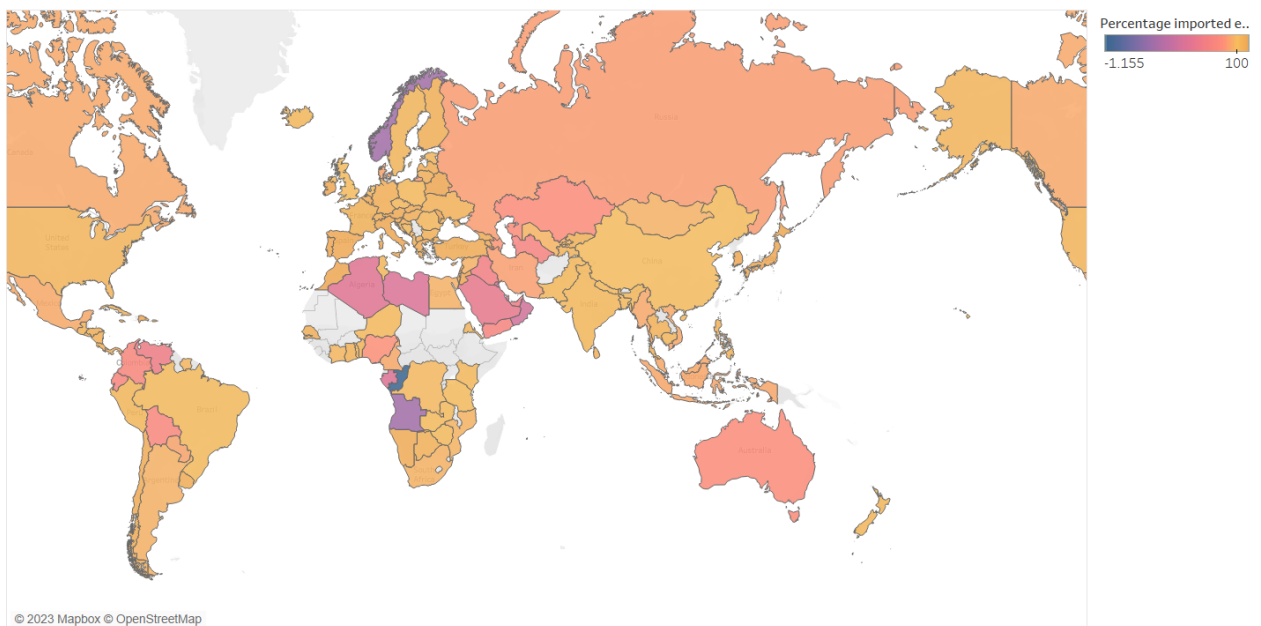
## CO2 Emission of Energy



Map based on Longitude (generated) and Latitude (generated). Color shows sum of Total. Details are shown for Country. The data is filtered on Year Year, which keeps 2019. The view is filtered on Latitude (generated) and Longitude (generated). The Latitude (generated) filter keeps non-Null values only. The Longitude (generated) filter keeps non-Null values only.

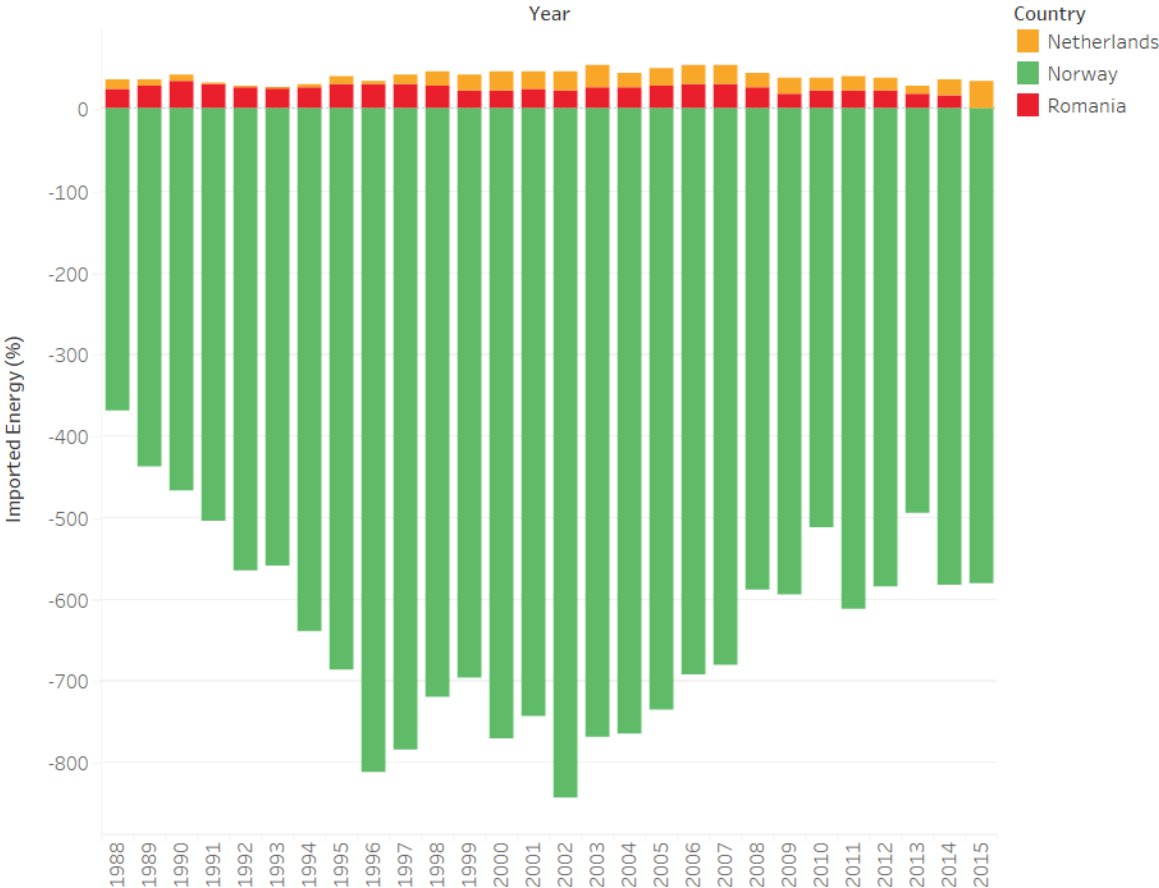
## Energy import of countries

Percentage of energy used in a country that is imported per year



Map based on Longitude (generated) and Latitude (generated). Color shows sum of Percentage imported energy. Details are shown for Country. The data is filtered on Year Year and Year Year. The Year Year filter ranges from 1988 to 2015. The Year Year filter keeps 2005.

### Percentage of energy used in a country that is imported per year



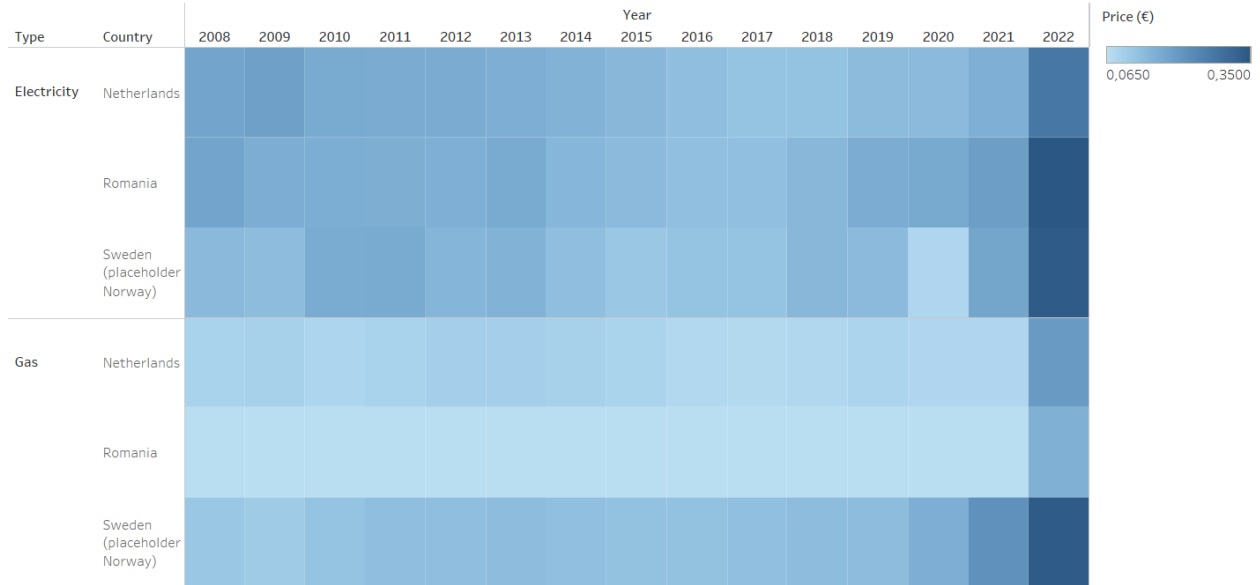
Sum of Percentage imported energy for each Year Year. Color shows details about Country. The data is filtered on Year Year, which ranges from 1988 to 2015. The view is filtered on Country, which keeps Netherlands, Norway and Romania.

<https://wits.worldbank.org/CountryProfile/en/country/by-country/startyear/LTST/endyear/LTST/in-dicator/EG-IMP-CONS-ZS>

### Consumer energy prices

### Consumer electricity and gas price in Euro per kWh per country

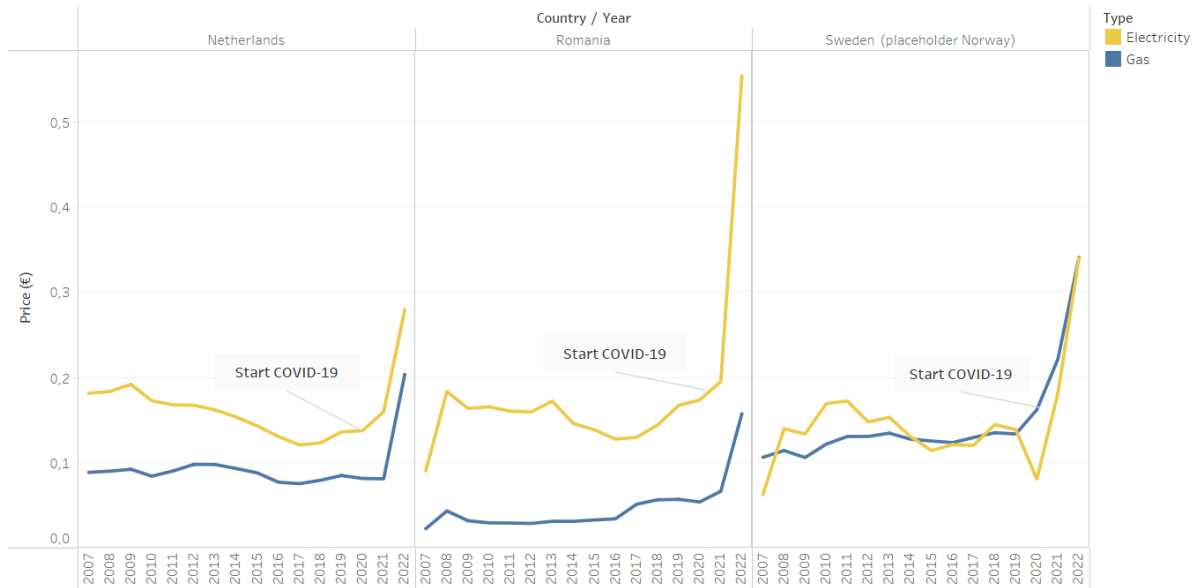
Average national price in Euro per kWh including taxes and levies applicable for the first semester of each year for medium size household consumers (Consumption Band Dc with annual consumption between 2500 and 5000 kWh).



Sum of Price (color) broken down by Year Year vs. Type and Country. The data is filtered on Year Year, which ranges from 2008 to 2022.

### Consumer electricity and gas price in Euro per kWh per country

Average national price in Euro per kWh including taxes and levies applicable for the first semester of each year for medium size household consumers (Consumption Band Dc with annual consumption between 2500 and 5000 kWh).



The trend of sum of Price for Year Year broken down by Country. Color shows details about Type. The data is filtered on Year Year, which ranges from 2007 to 2022.

### Used Datasets:

<https://ec.europa.eu/eurostat/web/products-datasets/-/ten00117>

<https://ec.europa.eu/eurostat/web/products-datasets/-/ten00118>

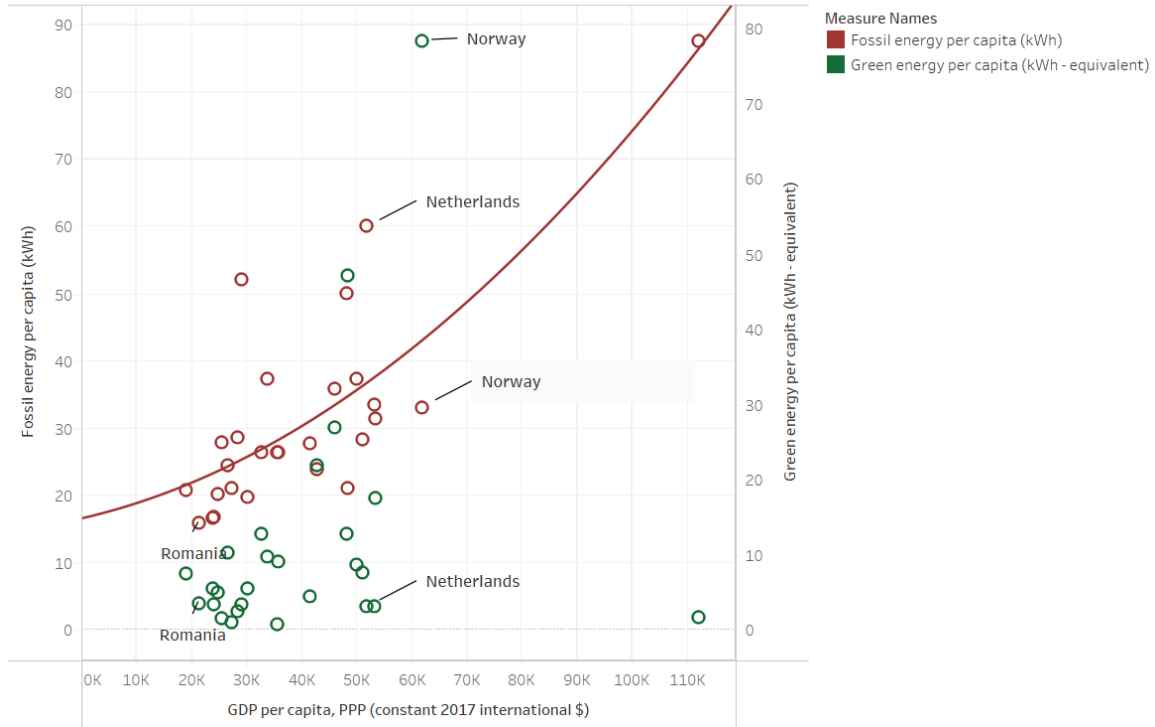
### Development vs production

Data used for visualizations:

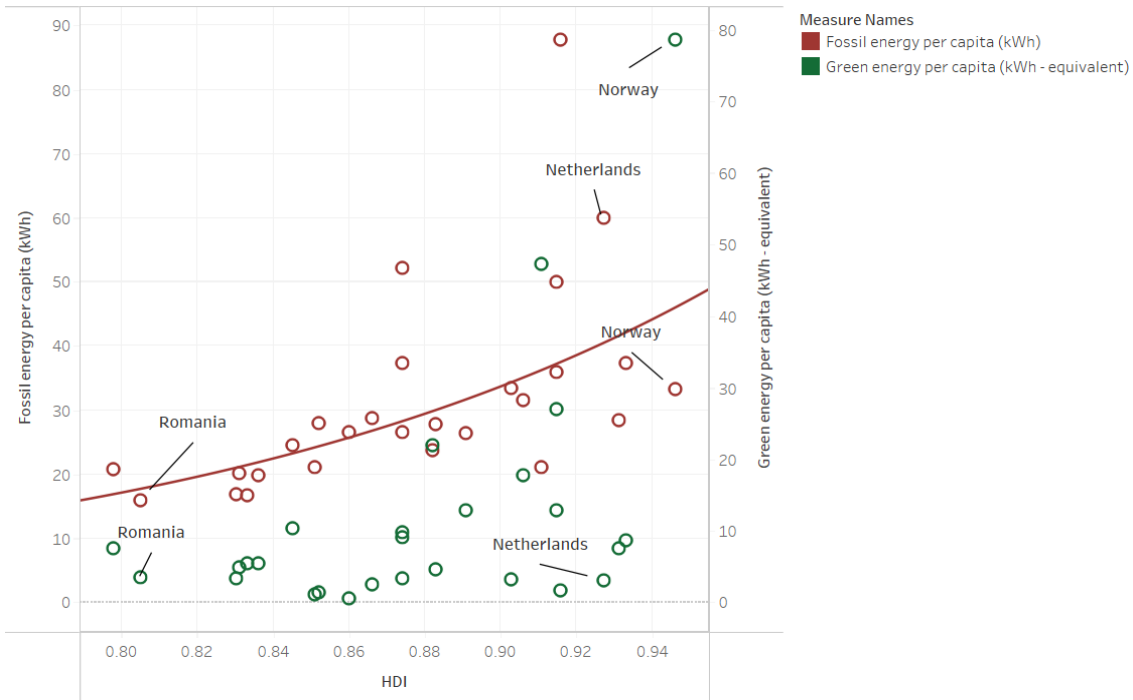
<https://hdr.undp.org/data-center/documentation-and-downloads>  
[https://hdr.undp.org/sites/default/files/2021-22\\_HDR/HDR21-22\\_Composite\\_indices\\_complete\\_time\\_series.csv](https://hdr.undp.org/sites/default/files/2021-22_HDR/HDR21-22_Composite_indices_complete_time_series.csv)  
<https://ourworldindata.org/grapher/per-capita-fossil-energy-vs-gdp>  
<https://ourworldindata.org/grapher/per-capita-low-carbon-vs-gdp>

### Visualizations:

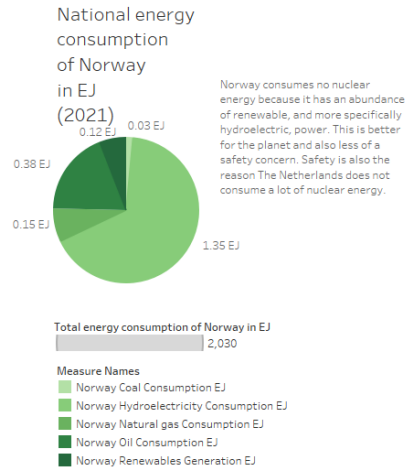
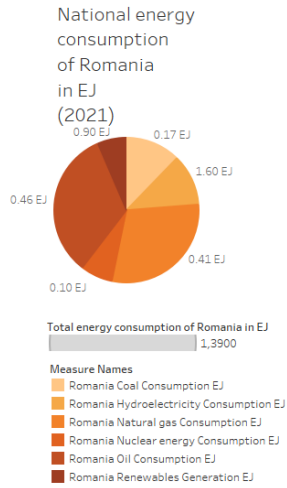
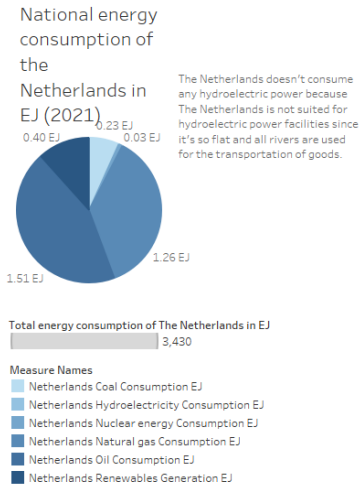
Fossil and Green energy per capita (kWh) vs GDP per capita (\$)



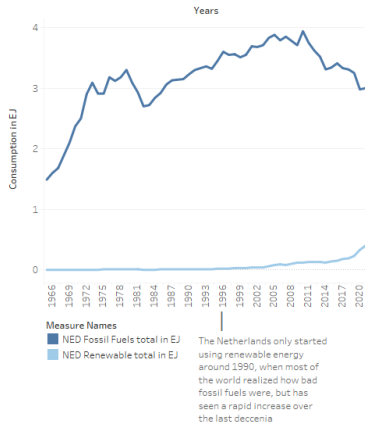
## Fossil and Green energy per capita (kWh) vs hdi per country



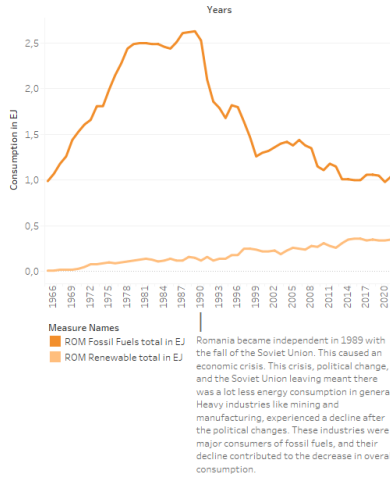
## Energy Consumption



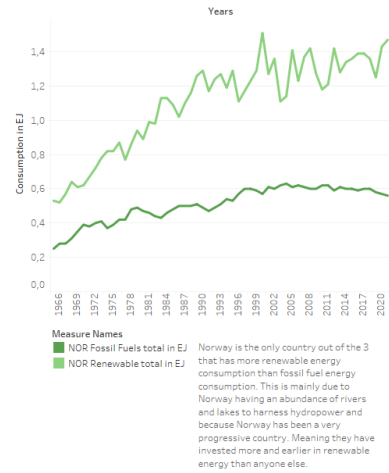
Netherlands Comparison of Fossil Fuel and Renewable Energy Consumption in the Netherlands (EJ) over Decades



Romania Comparison of Fossil Fuel and Renewable Energy Consumption in the Netherlands (EJ) over Decades



Norway Comparison of Fossil Fuel and Renewable Energy Consumption in the Netherlands (EJ) over Decades



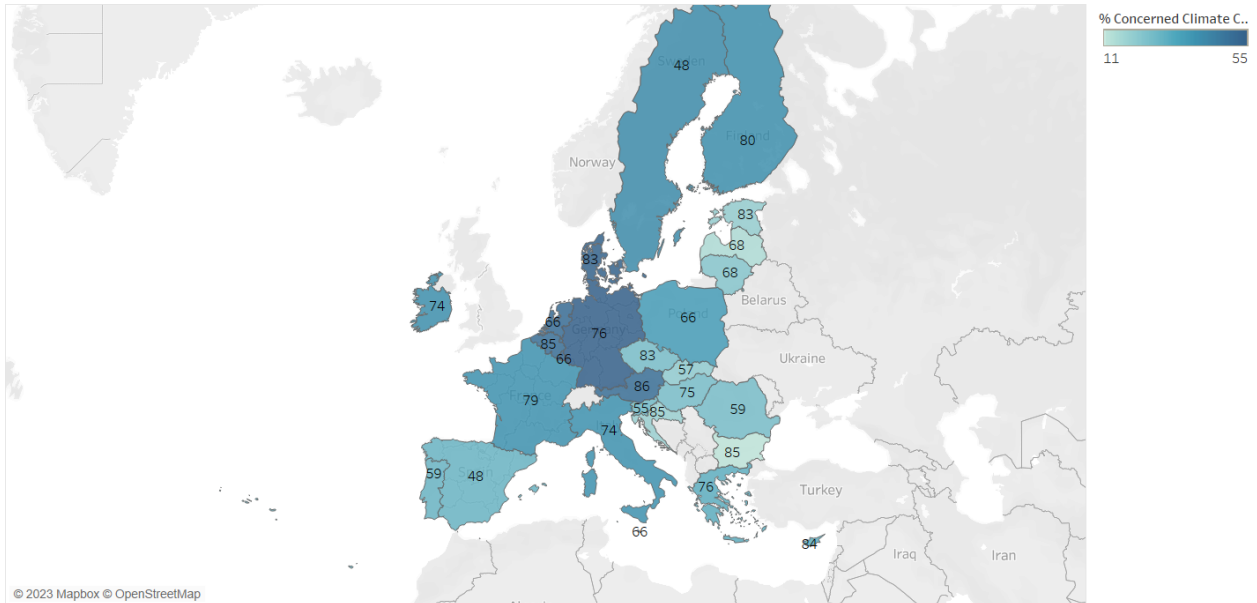
Data source:

<https://www.bp.com/en/global/corporate/energy-economics/statistical-review-of-world-energy/energy-charting-tool-desktop.html.html#/results/et/prim-cons/oil-cons/natgas-cons/coal-cons/nucl-cons/hyelec-cons/renew-gene/unit/EJ/regions/NLD/NOR/ROU/view/table>

## National opinion

Parts of Europe that see climate change as the biggest challenge

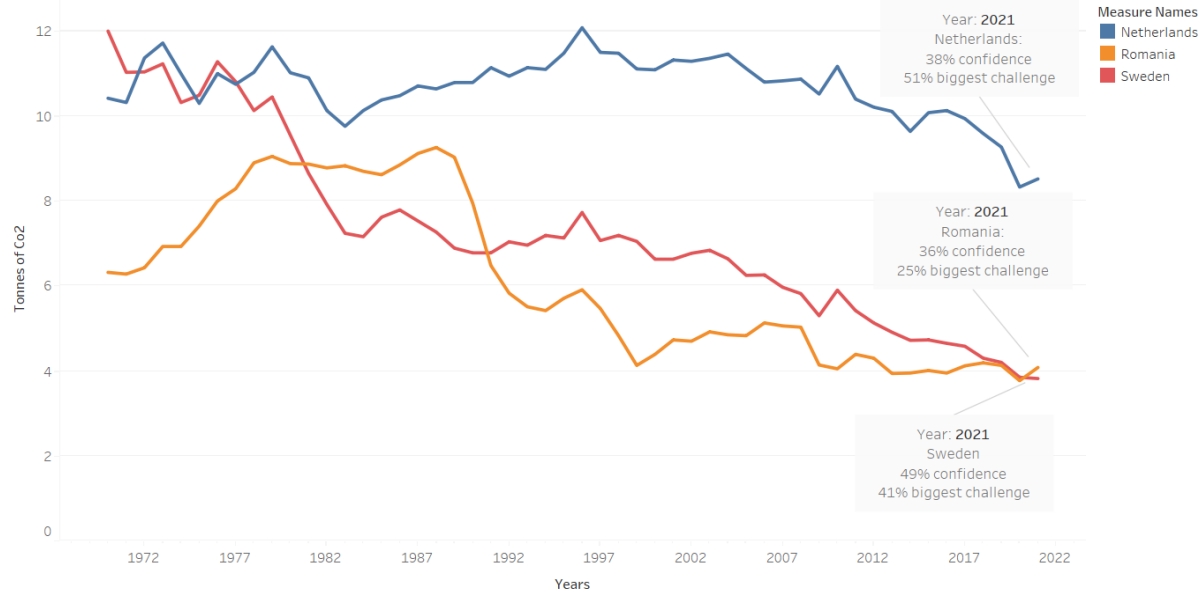
Value represents the percentage of people that feel more concerned than their government about climate change



Map based on Longitude (generated) and Latitude (generated). Color shows sum of percent believes climate change is the biggest current challenge. The marks are labeled by sum of Percentage that feels more concern than their government is. Details are shown for Countries. The view is filtered on Countries, which excludes Null.

## Co2 emmissions per capita

confidence represent the confidence that their country will be emmission neutral in 2050



The trends of Netherlands, Romania and Sweden for Years Year. Color shows details about Netherlands, Romania and Sweden. Details are shown for Netherlands, Romania and Sweden.

### Data source:

[https://edgar.jrc.ec.europa.eu/country\\_profile/ROU](https://edgar.jrc.ec.europa.eu/country_profile/ROU)

[https://edgar.jrc.ec.europa.eu/country\\_profile/SWE](https://edgar.jrc.ec.europa.eu/country_profile/SWE)

[https://edgar.jrc.ec.europa.eu/country\\_profile/NLD](https://edgar.jrc.ec.europa.eu/country_profile/NLD)

European Investment Bank, The EIB climate survey – Citizens call for green recovery : calls for a green recovery, Publications Office of the European Union, 2022,

<https://data.europa.eu/doi/10.2867/414948>