SDG Goal 12	**Responsible consumption and production**
SDG Target 12.2	**By 2030, achieve the sustainable management and efficient use of natural resources**
SDG Indicator 12.2.2	Domestic material consumption, domestic material consumption per capita, and domestic material consumption per GDP
Time series	Domestic material consumption (DMC)

1. General information on the time series

- Date of national metadata: 04 November 2021
- National data: http://sdg-indikatoren.de/en/12-2-2/
- Definition: The time series measures the amount of materials used in a national economy in metric tons. It is calculated as the domestic extraction of raw materials from the environment plus imports of goods (raw materials, semi-finished and finished products) minus exports of goods. Imports and Exports of goods enter the time series with their actual weight.
- Disaggregation: Not available.

2. Comparison with global metadata

- Date of global metadata: February 2021
- Global metadata: https://unstats.un.org/sdgs/metadata/files/Metadata-08-04-02.pdf
- The time series is compliant with the global metadata.

3. Data description

- Data on domestic material consumption is calculated within the material flow accounting system run by the Environmental-Economic Accounts unit of the Federal Statistical Office. Data on domestic extraction of raw materials stems from various, mostly official, statistics and data sources. For imports and exports, data from foreign trade statistics is used.

  Data on population are the results of the latest population census (currently: 2011 Census) rolled forward in a breakdown by sex, age, marital status and citizenship, using both statistics of population change (migration, births, deaths, entering into marriages or registered same-sex partnerships) and information on changes in citizenship and the dissolution of marriages or registered same-sex partnerships. For the years before 2011, the results for population were calculated backwards using the census 2011 and migration, birth and death statistics. For the calculation of DMC per capita, the average population of the respective year is used.

  The data on GDP is calculated by the Federal Statistical Office's National Accounts as a secondary statistic. GDP is adjusted based on a price base changing every year (previous year's price base). After several revisions due to new data input, final results are available four years after the first preliminary release.

4. Accessibility of source data

- Raw materials, material flows, water - domestic material consumption (DMC) (only available in German):
  https://www.destatis.de/DE/Themen/Gesellschaft-Umwelt/Umwelt/UGR/rohstoffe-materialfluesse-wasser/_inhalt.html
- Intercensal population updates as annual average – GENESIS online 12411-0040:
  https://www-genesis.destatis.de/genesis//online?operation=table&code=12411-0040&bypass=true&language=en#abreadcrumb
- National accounts - Gross value added, gross domestic product (nominal/price-adjusted) – GENESIS online 81000-0001:
  https://www-genesis.destatis.de/genesis//online?operation=table&code=81000-0001&bypass=true&language=en

5. Metadata on source data

- A methodological description for the calculation of the domestic extraction part of domestic material consumption is given in Germany's annual quality report for Eurostat:
  https://ec.europa.eu/eurostat/cache/metadata/EN/env_ac_mfa_simsmf_de.htm
- Raw materials, material flows, water -supply and use in raw material equivalents (RMC) (only available in German):
  https://www.destatis.de/DE/Themen/Gesellschaft-Umwelt/Umwelt/UGR/rohstoffe-materialfluesse-wasser/_inhalt.html
- Quality Report - Microcensus 2020 (only available in German):
  https://www.destatis.de/DE/Methoden/Qualitaet/Qualitaetsberichte/Bevoelkerung/mikrozensus-2020.pdf

6. Timeliness and frequency

- Timeliness: t + 2 years
- Frequency: Annual

7. Calculation method

- Unit of measurement: 2015 = 100; Million tonnes; Tonnes per capita
- Calculation method:

$$\textbf{DMC [Mn t]} = \text{Domestic Extraction [Mn t]} + \text{Imports [Mn t]} - \text{Exports [Mn t]}$$

$$\textbf{DMC [t per capita]} = \frac{\text{DMC [metric t]}}{\text{Average population [number]}}$$

$$\textbf{DMC [per real GDP (2015 = 100)]} = \frac{\dfrac{\text{DMC [metric t] t1} \cdot 100}{\text{DMC [metric t] t0}}}{\text{Real GDP [2015 = 100]}} \cdot 100$$

$$t1 = \text{current year}; t0 = \text{base year (2015)}$$