



Bundesministerium
für Ernährung
und Landwirtschaft

German Methane Mitigation Policy in Agriculture

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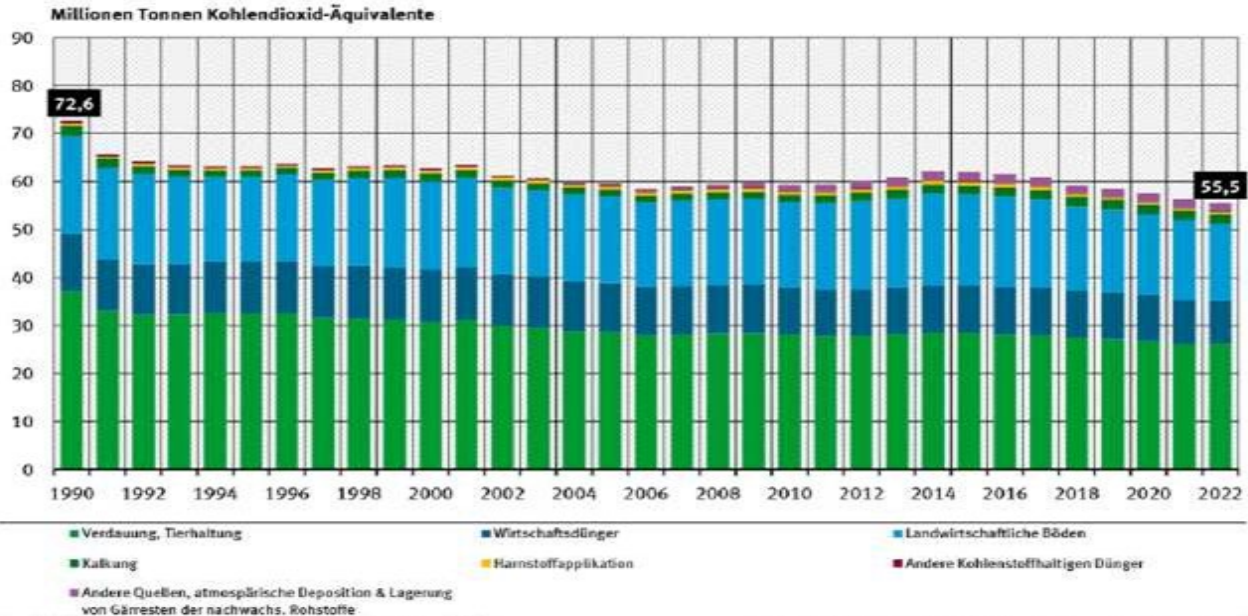
GMI Session 2024 March 20

Overview

1. Greenhousegas Emissions in the Sector Agriculture of Germany
2. Methane Emissions in Germany
3. Policy Priorities
4. Further Options

Greenhousegas Emissions in the Sector of Agriculture in Germany

Treibhausgas-Emissionen der Landwirtschaft nach Kategorien

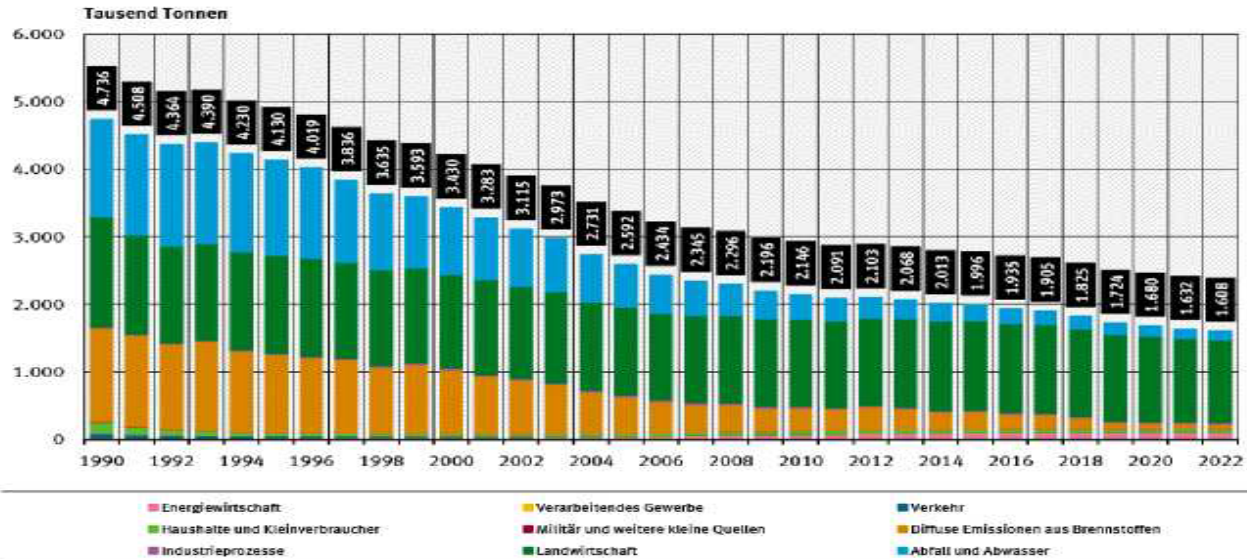


Hinweis: Die Aufteilung der Emissionen entspricht der UN-Berichterstattung, nicht den Sektoren des Aktionsprogrammes Klimaschutz 2020

Quelle: Umweltbundesamt, Nationale Treibhausgasinventare 1990 bis 2021 (Stand 03/2023), für 2022 vorläufige Daten (Stand 15.03.2023)

Methane Emissions in all Sectors in Germany

Methan-Emissionen nach Kategorien



Emissionen ohne Landnutzung, Landnutzungsänderung und Forstwirtschaft
 Verkehr: ohne land- und forstwirtschaftlichen Verkehr
 Haushalte und Kleinverbraucher: mit Militär und weiteren kleinen Quellen (z.B. land- und forstwirtschaftlichem Verkehr)

Quelle: Umweltbundesamt, Nationale Treibhausgasinventare 1990 bis 2021 (Stand 03/2023), für 2022 vorläufige Daten (Stand 15.03.2023)



Of the total greenhouse gas emissions in Germany (745 million tonnes of CO₂ equivalents) in 2022, around 7.5% came from agriculture (55.5 million tonnes of CO₂ equivalents).

Approximately 63.0% of this was accounted for by livestock farming and manure management.



Methane formation during digestion accounts for a significant share of emissions from livestock farming (26.2 million tonnes of CO₂ equivalents). The dominant factor is ruminant farming (in Germany mainly cattle).

Due to the special features of fermentation in the rumen, 25 million tonnes of CO₂ equivalents can be attributed to this area (as of 2022). A further 6.6 million tonnes of methane CO₂ equivalents are generated by manure management (mainly manure). This is also the case for 2.3 million tonnes of N₂O.

Consistently high methane emissions lead to the maintenance of their contribution to anthropogenically induced global warming. This effect can be reduced by reducing methane emissions in comparatively short periods of time.



Political Priorities I

➤ Reduction in livestock numbers, especially ruminants

Climate benefit: high due to agricultural structural developments, the number of cattle in Germany is falling statistically significantly. This development is supported in Germany by promoting the animal welfare-friendly conversion of animal husbandry. A central component is the **federal program to promote the conversion of agricultural livestock farming**, to meet higher animal welfare standards. Federal government is making €1 billion available for this purpose over the next few years. With respect to the **transformation of our livestock sector**, it is our goal to have less numbers of animals (and less emissions) under better conditions. A **new law for mandatory animal labelling system** entered into force last year, which gives the consumer the possibility to make an informed decision.



Political Priorities II

➤ Area restrictions of animal husbandry

Climate benefit: medium (land binding, when considered in isolation, could lead to regional redistribution. Therefore, large-scale consideration of land binding. If a reduction in the number of animals occurs, this primarily affects poultry and pigs, here only comparatively low methane emissions from feeding, but from manure storage and handling and output). Various other effects, e.g. B. with a view to soil fertility, nitrate inputs, nutrient cycling, animal disease prevention and control, regional concentration of odor and ammonia emissions.



Political Priorities III

- **Reducing the consumption of animal products (including through changing consumer preferences)**

Climate benefit: is assessed as significant (if at the same time the number of animals kept decreases and no climate-damaging consumption compensation takes place).

- **Reducing waste from products of animal origin**

Climate benefit: significant (if the number of animals kept decreases at the same time).

- **Reduction of losses in primary production and the further stages of the food chain (“chain losses”).**

Climate benefit: is assessed as at least medium (optimization depending on the type of farm animal (and food); formula: “Healthy animals, less stress, higher revenues”, reducing animal losses, optimizing animal hygiene, preventing loss of performance, increasing the productive (lactations) , reduced resource consumption, improved revenue situation).



Additional Options

- **Fermentation of manure in biogas plants**
- **Optimized feeding concepts (including: establishment of improved systems in the companies with regard to feed evaluation, ration planning and feeding control)**
- **Animal breeding (longevity)**
- **Animal health**
- **Animal welfare-oriented and climate-friendly stable construction**
- **Methane-reducing feed additives**
- **Acidification of manure, addition of methane inhibitors**





Thank you for your attention!

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Climate Protection, Climate Adaptation and Water