

# Finnish Climate Act and the climate work in Finnish municipalities and regions

Webinar “Good practices in the  
climate work of municipalities and  
regions”

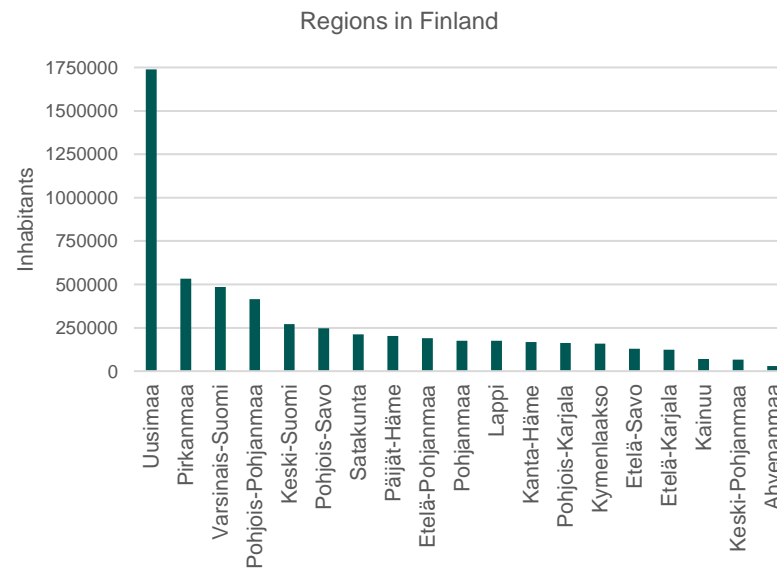
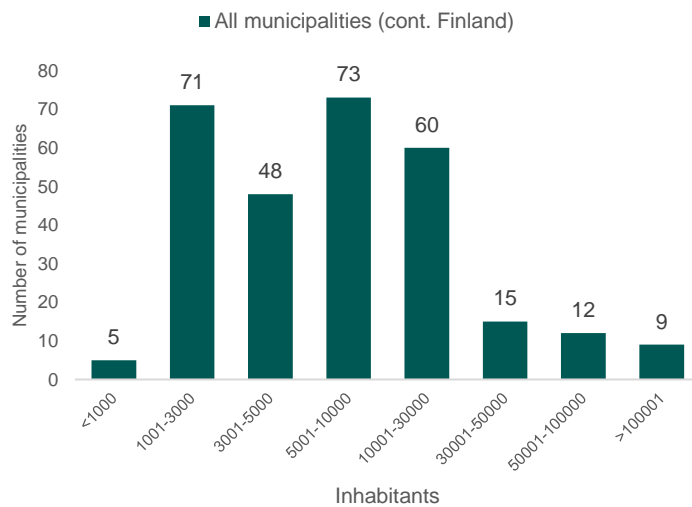
Teemu Ulvi  
25-May 2023



Suomen ympäristökeskus  
Finlands miljöcentral  
Finnish Environment Institute

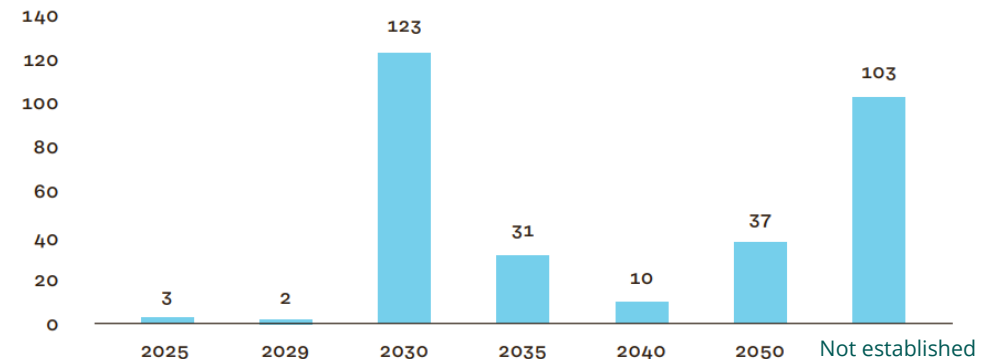
# Regions and municipalities in Finland

- 19 regions
  - Biggest Uusimaa (Nyland, 1,75 milloin inhabitants) smallest Ahvenanmaa (Åland, 30 000 inhabitants)
- 309 municipalities
  - 293 in continental Finland, 16 in Åland
  - Biggest Helsinki (660 000 inhabitants), smallest in continental Finland 700 inhabitants (8 smaller in Åland)
  - Median size 6 000, average 18 000 inhabitants



# Climate work in regions and municipalities

- All **regions** have taken an active role in climate work in their areas
  - Regional councils have prepared climate roadmaps or strategies
    - many of them have been already updated or updating is in progress
    - municipalities are members of regional councils and have been actively involved in the preparation process
  - Councils are financing climate projects for example through ERDF programmes as regional development authorities
    - Councils themselves realise also climate-related projects
  - 5 regions belong to the national Towards carbon neutral municipalities network Hinku (<https://hiilineutraalisuomi.fi/sv-FI/Hinku>)
- Little more than half of **municipalities** have set some kind of a climate objective
  - Mainly related to GHG emission reduction, some municipalities have also objectives related to adaptation to climate change impacts
  - Emission reduction objectives are typically -80 % reduction until 2030 (with variation in base year) or carbon neutrality
- 126 municipalities have joined the municipal energy-efficiency agreement (<https://energiatehokkuussopimukset2017-2025.fi/sv/>)
- About 70 municipalities have prepared a climate plan voluntarily (in the future it is obligatory)



Municipalities' carbon neutrality goals (Source: [Sitra, 2021](#))

# Typical climate activities in municipalities

- Preparation of climate plans
- Organisation of climate work in municipality (incl. climate management)
- Changing of energy sources in heating
  - In separate heating from oil to heat pumps
  - In district heating from peat to bio-based fuels
- Investments for better energy efficiency in buildings (automation, LED lights, solar power plants, energy-efficient new buildings)
- New wind power production sites to land-use plans
- Investments in bicycle and pedestrian traffic, low emission vehicles in public transport and in municipal services, and charging points
- Investments in waste sorting possibilities





**Sustainabilityleap.fi**

Database for compiling impressive solutions in climate mitigation, circular economy and protecting biodiversity



➤ **Extensive compilation of concrete actions in Finnish, some examples also in English:**



Off-grid solar and small hydro energy solutions for Erä-Eero cottage in Lieksa



Pirkkala aims to set an example for climate resilient life

HINKU AWARD 3/2019



Heating of the Jakkukylä school from oil to air-water heat pump, li



Porvoo parish achieving significant savings through ground heat

HINKU AWARD 4/2019



Pioneering stormwater management with nature-based solutions

# New Climate Act (Klimatlag) 423/2022)

- Sets demanding objectives on national level
  - GHG emission reduction goals (-60 % in 2030, -80 % in 2040 and -90 % in 2050 from 1990)
  - Objective for carbon neutrality in 2035
  - General objective to strengthen the adaptation to climate change
- **Amendment to Climate Act comes into force 1-March 2023**
  - New obligation to municipalities (14 a §) who must prepare a climate plan containing at least
    1. Objective for GHG emission reduction
    2. Measures for reducing emissions
    3. Development of emissions in the municipality
    4. Information of monitoring of the climate plan
  - Climate plan must be updated at least once in every 4-year term of the municipal council
  - Municipalities can apply state subsidy for preparation and updating of plans
- More information <https://ym.fi/sv/kommunernas-klimatplaner>

# Guidebook for preparation of climate plans

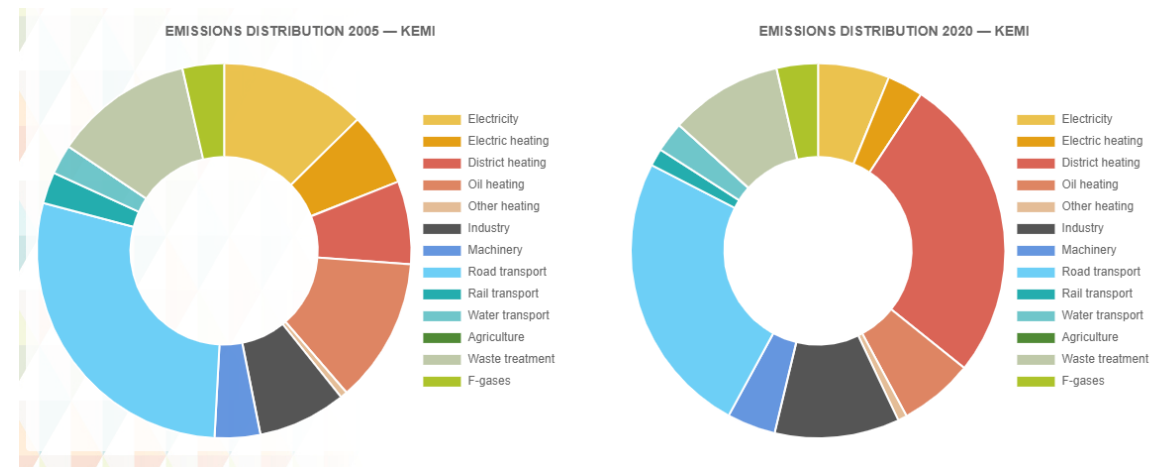
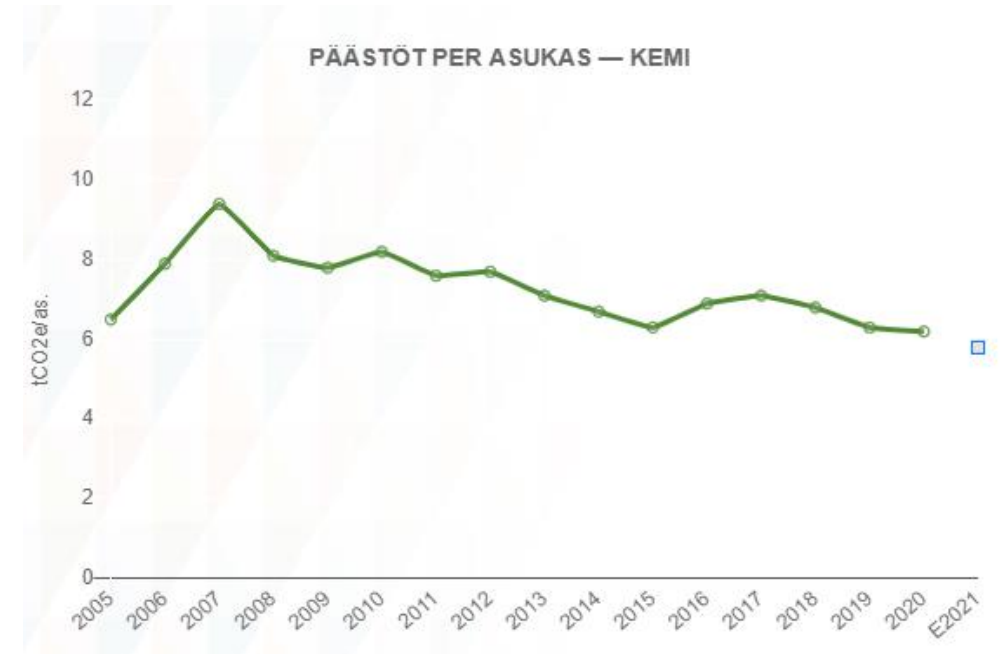
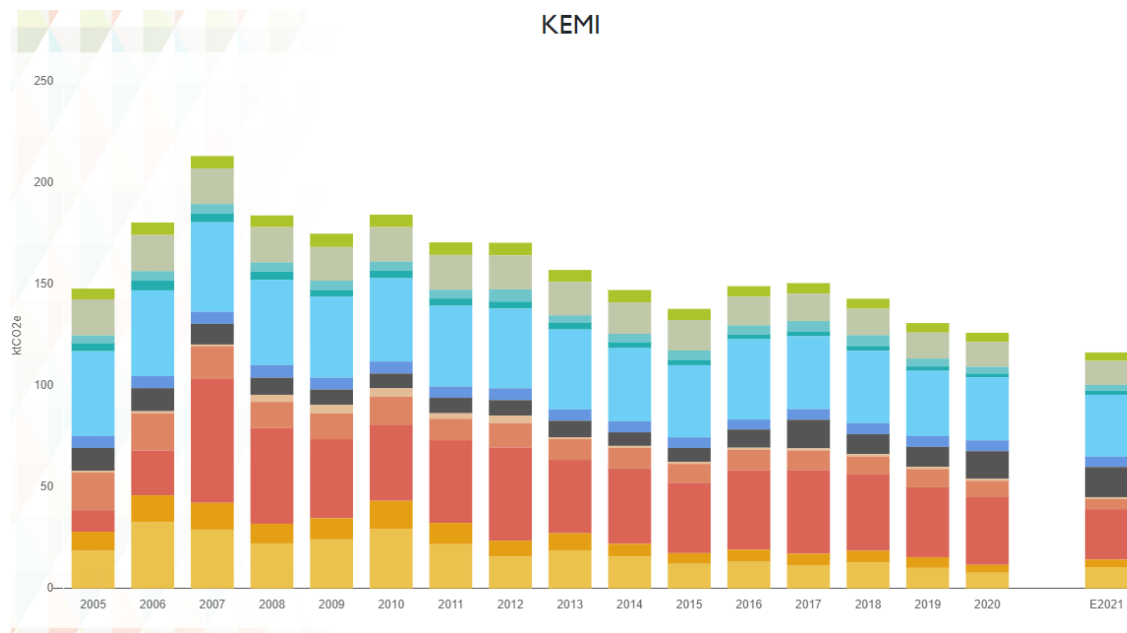
- Main target group are municipalities who are at the start line in climate work
- Gives an overview of the new legislation, ideas for planning process and instructions how to plan the obligatory contents
- Gives ideas also for themes that could be included into more ambitious plan
  - For example increasing of carbon sinks and biodiversity, adaptation, public procurement, climate management
- Will be published also in Swedish in June



**Many tools have been created to help  
regions and municipalities in their  
climate work**



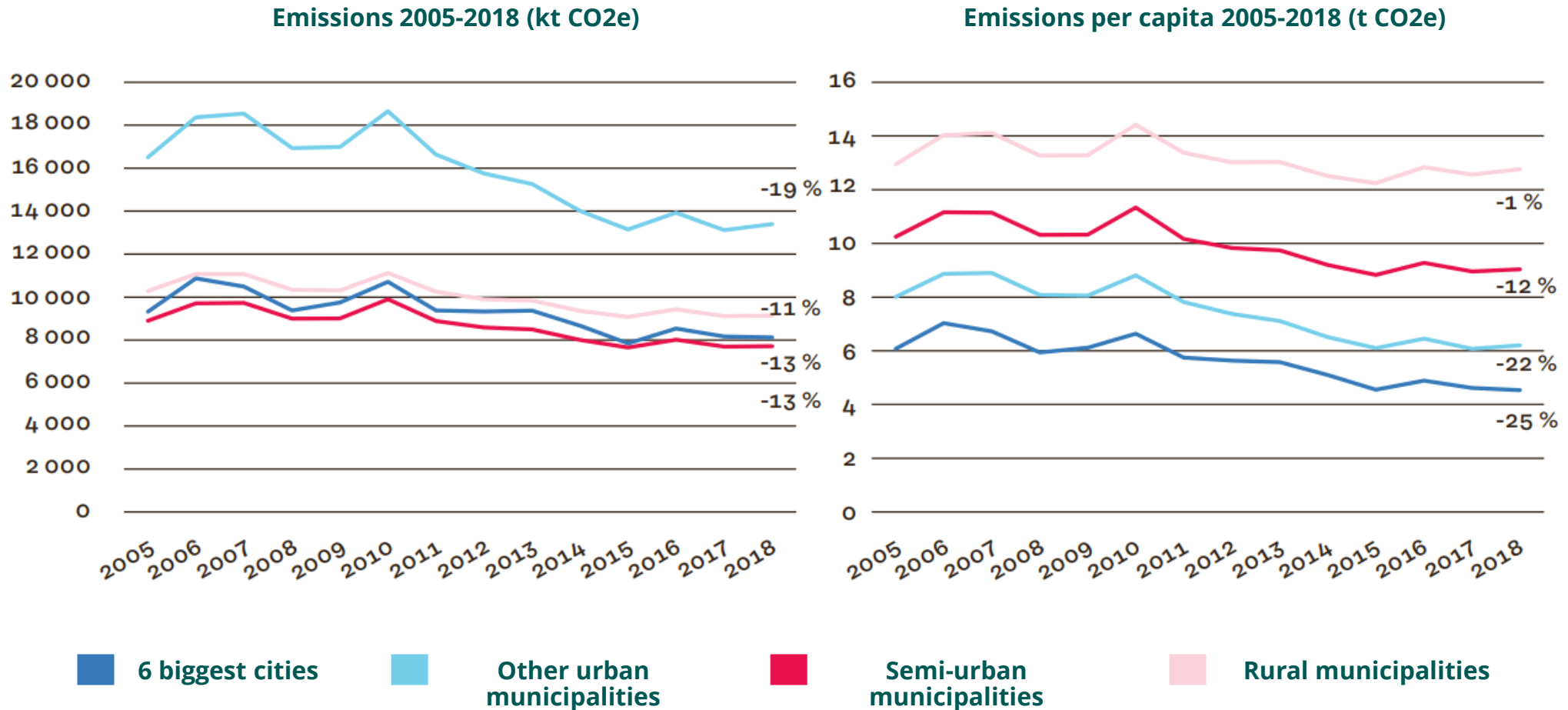
# Usage-based emission database



- [https://hiilineutraalisuomi.fi/en-US/Emissions and indicators/Municipalities and regions usagebased greenhouse gas emissions](https://hiilineutraalisuomi.fi/en-US/Emissions%20and%20indicators/Municipalities%20and%20regions%20usagebased%20greenhouse%20gas%20emissions)

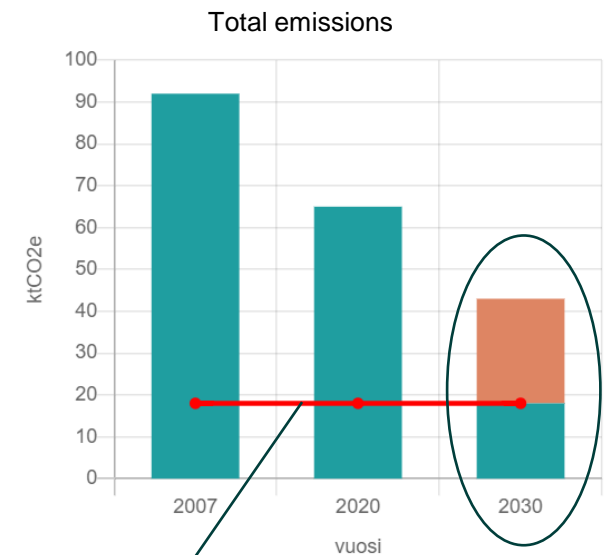
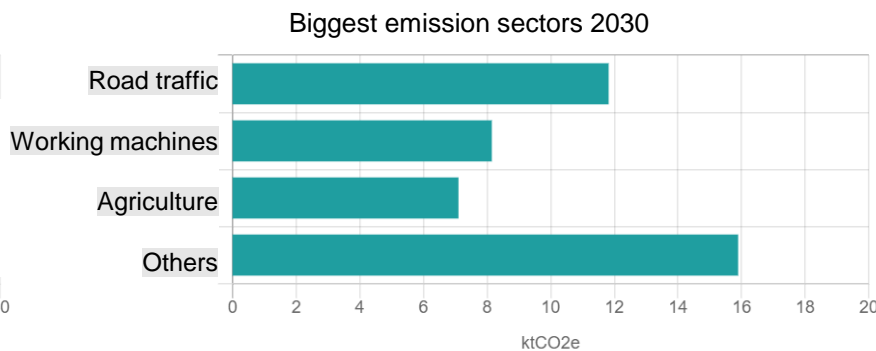
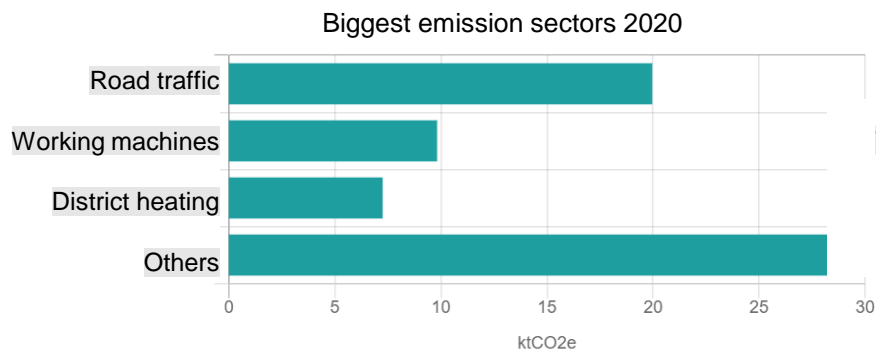
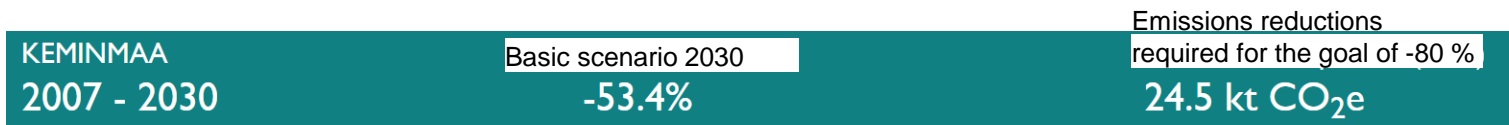
# Emissions of different types of municipalities

Emissions data: Syke (ALas 1.1, Hinku-calculations without wind compensation); Graph: [Sitra, 2021](#)



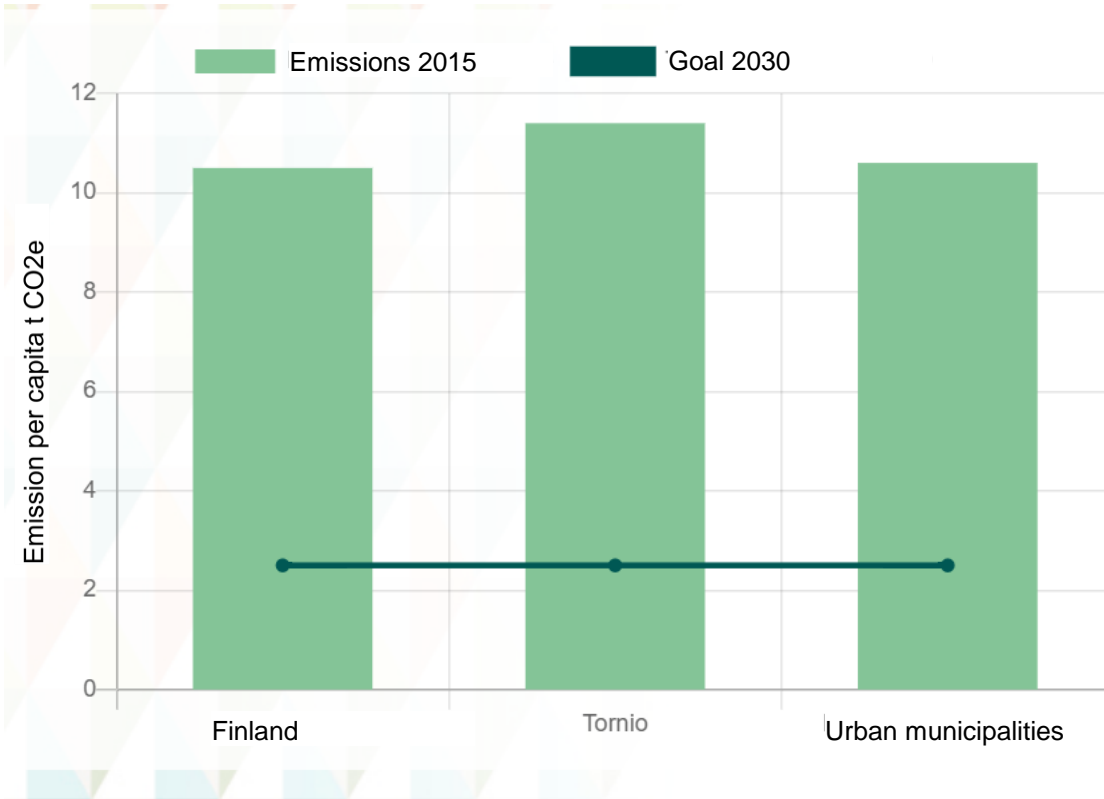
# Emission scenario tool (only in Finnish)

- Tool calculates the basic scenario that is based on different political decisions and policy instruments for different sectors
- <https://skenaario.hiilineutraalisuomi.fi/>



Emission reduction goal  
-80 % from 2007 until  
2030

# Consumption-based emission database (only in Finnish)

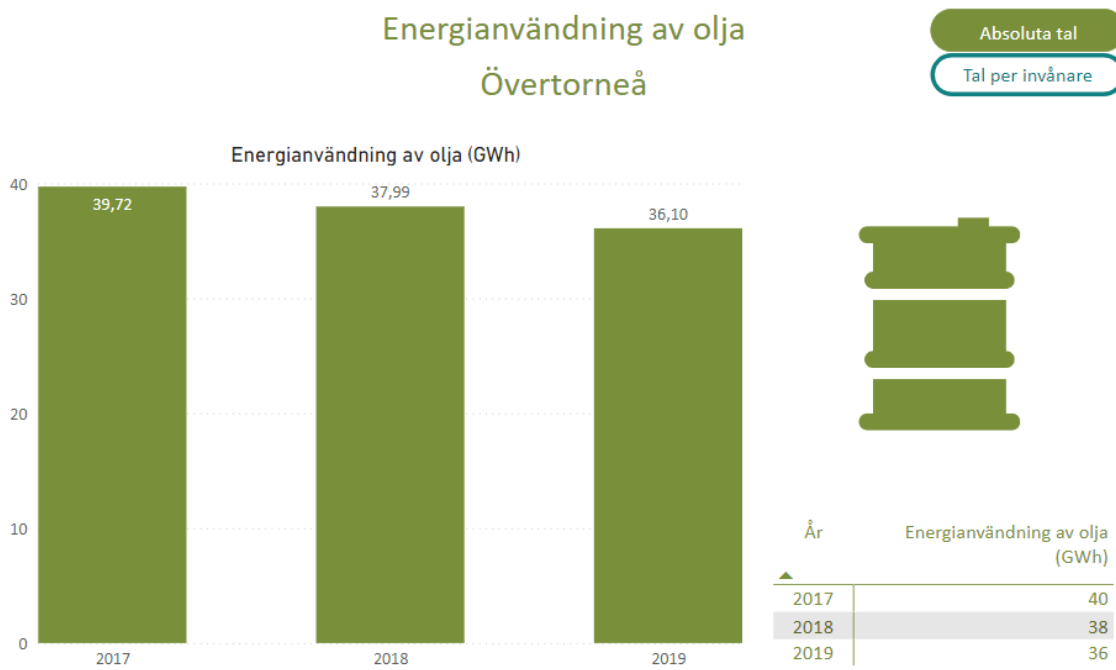


- <https://kulutus.hiilineutraalisuomi.fi>

# Climate indicators for municipalities and regions

- Finnish Environment Institute (Syke) has compiled various indicators relating to energy and transport for Finnish municipalities and regions.
- Alongside greenhouse gas emissions, these indicators help monitor the progress of municipal and regional climate work.

- Available indicators:
  - Total energy consumption
  - Oil consumption for energy production
  - Consumer electricity, housing
  - Residential buildings' heating energy consumption
  - Capacity and production of solar power
  - Capacity and production of wind power
  - Number and floor area of buildings using geothermal heating
  - Number of passenger cars and their average emissions
  - Number and shares of electric, plug-in hybrid and gas cars
  - Number of charging stations and gas filling stations



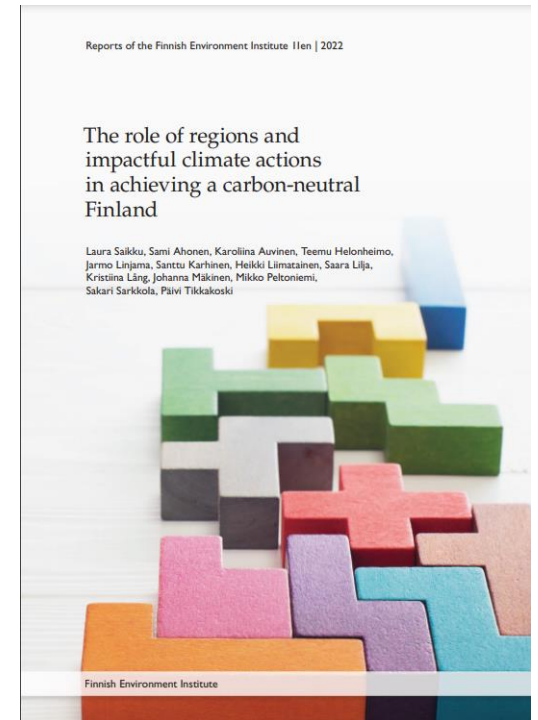
ENG [Indicators of municipal and regional climate work \(app.powerbi.com\)](https://app.powerbi.com)

FIN [Kuntien ja alueiden ilmastotyön indikaattorit \(app.powerbi.com\)](https://app.powerbi.com)

SWE [Kommuners och regioners indikatorer för klimatarbete \(app.powerbi.com\)](https://app.powerbi.com)

# Model climate roadmap for regions

- Has been created to help in preparation of regional climate roadmaps
- The measures in the model roadmap are based on emission reduction studies and example measures selected from the roadmaps of 7 regions
- Themes of measures
  - Clean energy production
  - Decentralised energy production and energy efficiency of buildings
  - Agriculture
  - Forests
  - Transport
  - Adaptation
- [hiilineutraalisuomi.fi/en-US/Climate\\_action/Regional\\_model\\_roadmaps](https://hiilineutraalisuomi.fi/en-US/Climate_action/Regional_model_roadmaps)



Emission reduction measures	Emission reduction tasks	Effectiveness
Reducing the negative climate impacts of forest damage (S)	Advancing thinning in areas that are susceptible to damaged caused by snow. (H)	**
Forest management that mitigates climate change (S, P, NO, SK)	Afforestation of fields and wasteland areas. (H)	**** (#&)
Special measures for the climate-sustainable management of peatland forests (S, NO)	Ash fertilisation of nutrient-rich peatland forests. (N)	****
Regional forest programmes, certification, advice (P-H, PI, NO)	Considering and monitoring climate goals in the municipalities' own forests and planning efforts	
Special measures for the climate-sustainable management of peatland forests (S, NO)	Controlled damming of ditches in excessively drained areas. (N)	***

## More information

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