



EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

New Challenges for  
Europe's Cohesion

# Welcome!



#EURegionsWeek



# **Energy independence: how large-scale solar heat frees European cities from fossil fuels**



EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022



MODERATOR

**Alexandra Şuţu**

Solar Heat Europe



SPEAKER

**Heidelinde Adensam**

Austrian Climate Ministry



SPEAKER

**Joakim Byström**

Solar Heat Europe



SPEAKER

**Christian Holter**

Solarwärme MZ GmbH

**New Challenges for  
Europe's Cohesion**

## AGENDA

**Welcome  
About Solar District Heating  
Panel discussion  
Q&A  
Closing**

**#EURegionsWeek**





EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

**New Challenges for  
Europe's Cohesion**

# **The energy and climate crises, and Solar District Heating**

**#EURegionsWeek**







EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

## Climate Crisis

New Challenges for  
Europe's Cohesion

**Reduce GHG emissions**



#EURegionsWeek





EUROPEAN WEEK OF  
REGIONS & CITIES

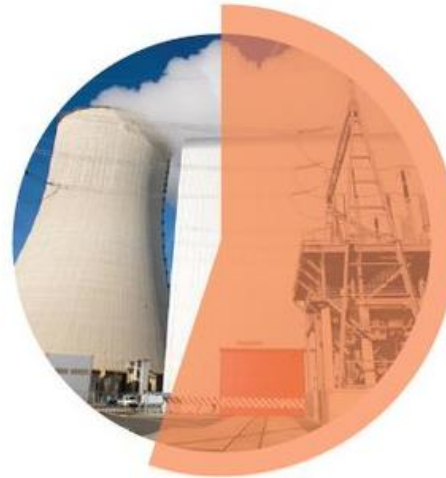
2003 - 2022

## Climate goals

New Challenges for  
Europe's Cohesion

# Europe's goal: Going climate-neutral by 2050

We propose to **reduce  
emissions** by at least  
**55%**  
by 2030



## Milestone

#EURegionsWeek





EUROPEAN WEEK OF  
REGIONS & CITIES

2023 - 2024

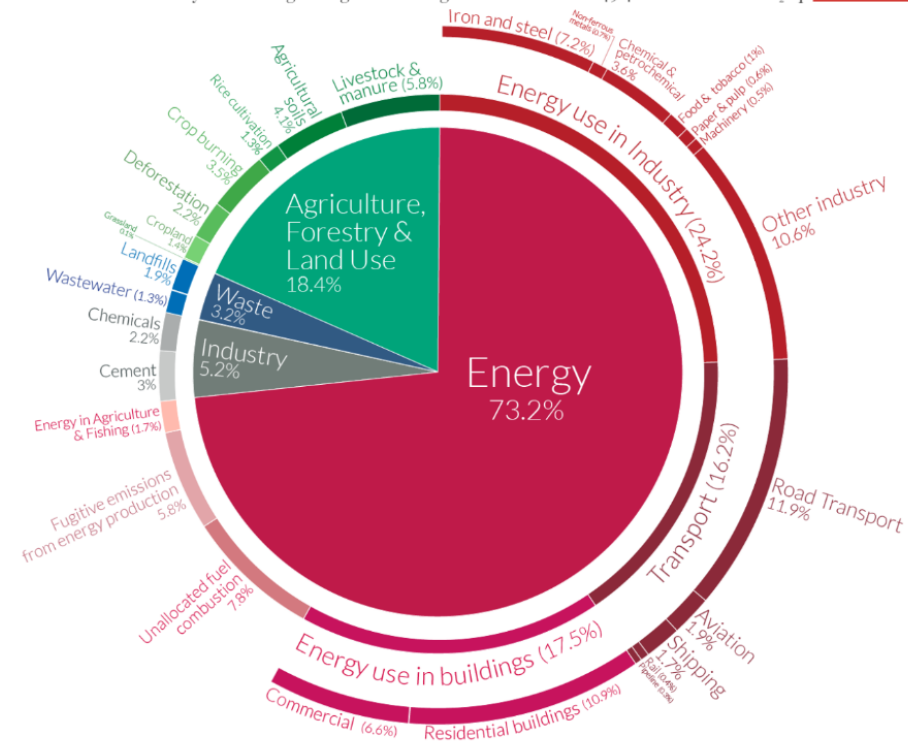
# ENERGY

## New Challenges for Europe's Cohesion

### Global greenhouse gas emissions by sector

This is shown for the year 2016 – global greenhouse gas emissions were 49.4 billion tonnes CO<sub>2</sub>eq.

Our World  
in Data



OurWorldinData.org – Research and data to make progress against the world's largest problems.

Source: Climate Watch, the World Resources Institute (2020).

Licensed under CC-BY by the author Hannah Ritchie (2020).

#EURegionsWeek



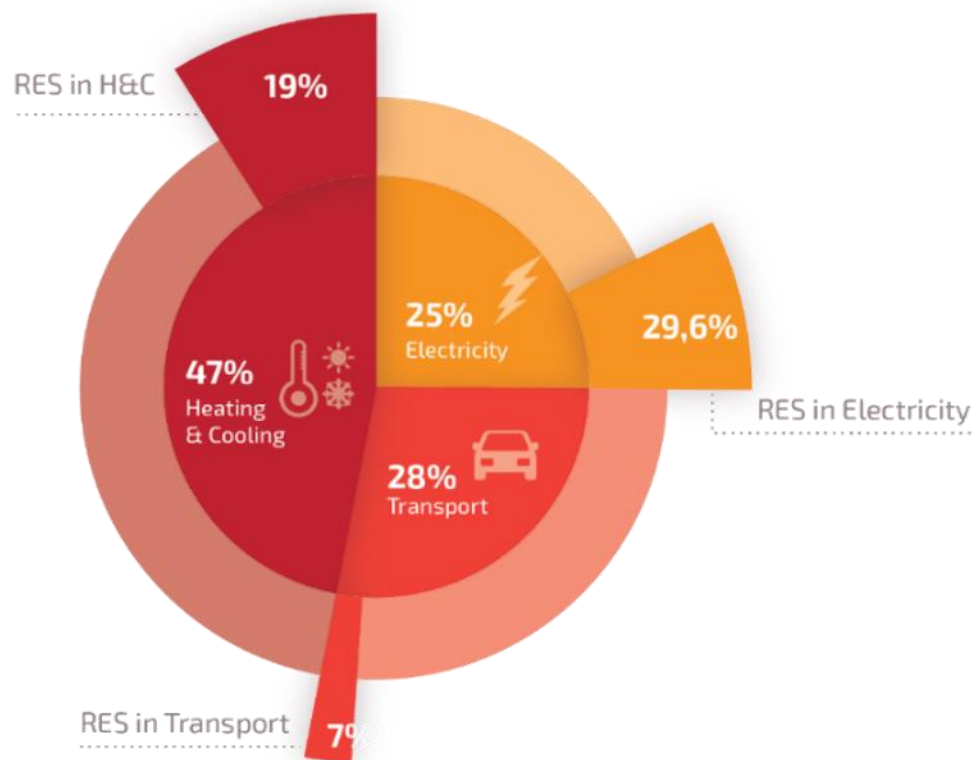


EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

## Heat is Half

New Challenges for  
Europe's Cohesion



#EURegionsWeek







EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

New Challenges for  
Europe's Cohesion

The **ENERGY CRISIS** is a **HEATING** crisis.

#EURegionsWeek



# Renewable heat

## Solar Heat

### New Challenges for Europe's Cohesion



*Harnessing the energy of the sun to generate thermal energy for residential, commercial sector, and industry.*

#### Key facts

- Clean & direct renewable heat generation
- European-based industry, net exporter
- Reduces carbon emissions
- Increases energy security and independence, locally based
- Over 10 million solar thermal systems in Europe
- Thermal storage included
- Can be combined with any other technology

© IRENA

#EURegionsWeek





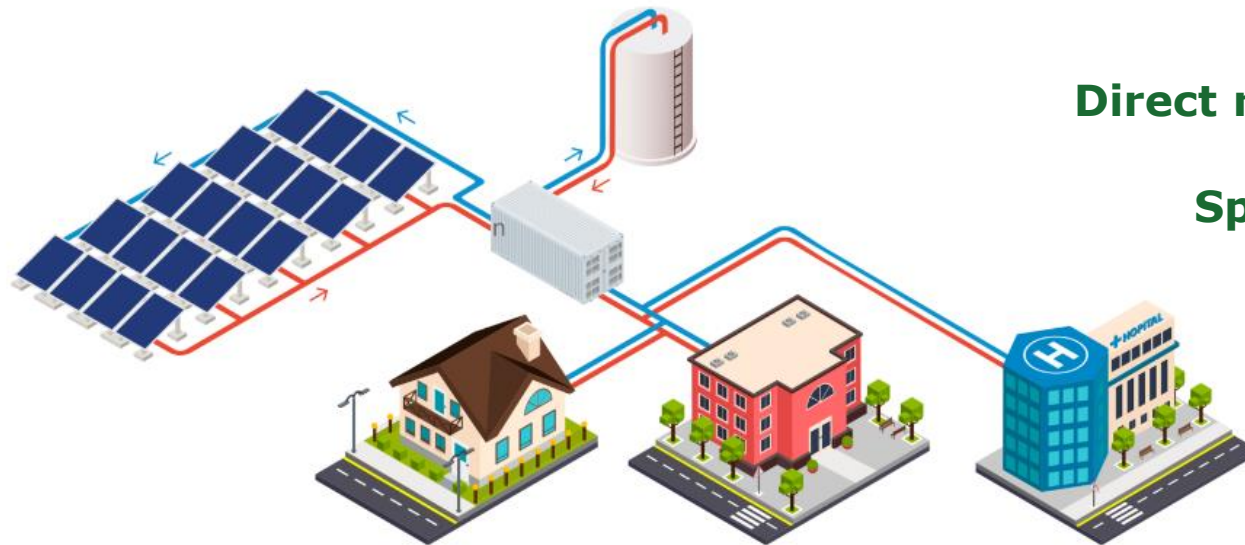
EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

# Solar District Heating

*Over 200 solar district heating plants in Europe*

**New Challenges for  
Europe's Cohesion**



© NewHeat

**Direct renewable heat produced locally**

**Space heating & domestic hot water**

**More efficient, more economic**

**Seasonal storage**

**#EURegionsWeek**





# The Danish example

*World's largest solar district heating plant*

New Challenges for  
Europe's Cohesion



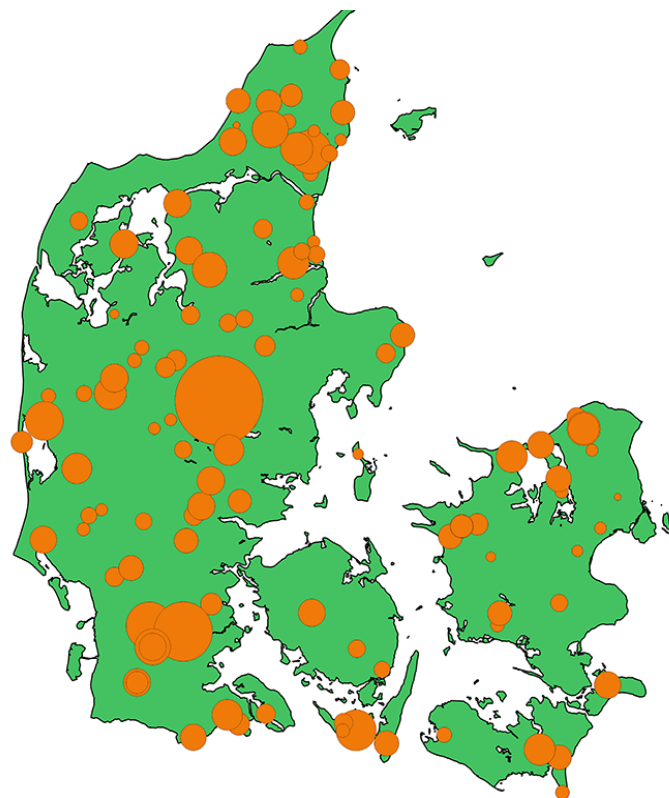
110 MW plant supplying  
20% of the annual local  
district heating demand

Silkeborg, Arcon-Sunmark



# The Danish example

Over 100 villages, towns, and cities use solar heat



Vojens, Arcon-Sunmark



Ulsted, Arcon and Ulsted Varmeværk



In operation

Total collector area (in operation): 1 302 331 m<sup>2</sup>



Dronninglund, Arcon-Sunmark

#EURegionsWeek







EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

## SDH in Austria

New Challenges for  
Europe's Cohesion

### Friesach, Austria

4th largest solar district heating plant in Austria

Size: 4MW

Collector surface: 5 750 m<sup>2</sup>

Facts:

- Supplies 100% of the hot water demand in the city's district heating network during the summer months
- Connected to biomass heating plant



© GREENoneTEC

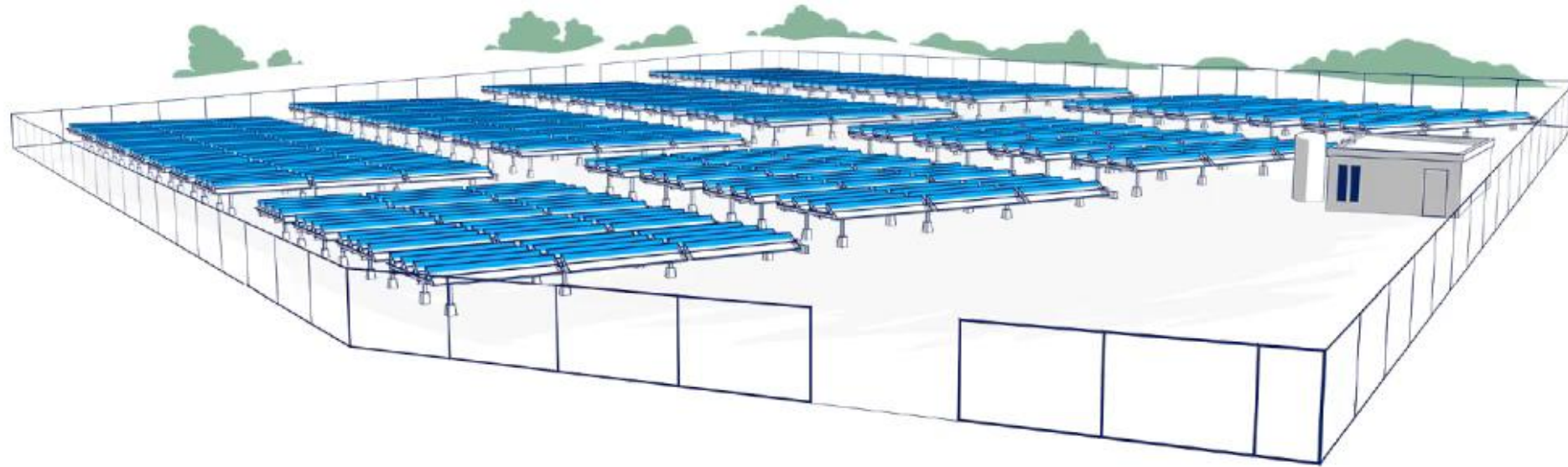
#EURegionsWeek





# Högslätten 2023

## Digital groundbreaking



Oktober 28th, 2020



EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

## New Challenges for Europe's Cohesion

### PANEL DISCUSSION



**SPEAKER**

**Heidelinde Adensam**

Austrian Climate Ministry



**SPEAKER**

**Joakim Byström**

Solar Heat Europe



**SPEAKER**

**Christian Holter**

Solarwärme MZ GmbH

#EURegionsWeek





EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

**New Challenges for  
Europe's Cohesion**

**Q&A**

**Use the chat or raise your hand.**

**#EURegionsWeek**





EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

New Challenges for  
Europe's Cohesion

THANK YOU!

#EURegionsWeek







EUROPEAN WEEK OF  
REGIONS & CITIES

2003 - 2022

**New Challenges for  
Europe's Cohesion**

**Learn more about  
#SolarHeat**



**Get in touch**  
[info@solarheateurope.eu](mailto:info@solarheateurope.eu)

**#EURegionsWeek**

