

Regional Policy and Market Support Initiatives for Solar and Renewable District Heating

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IEE project **SmartReFlex**



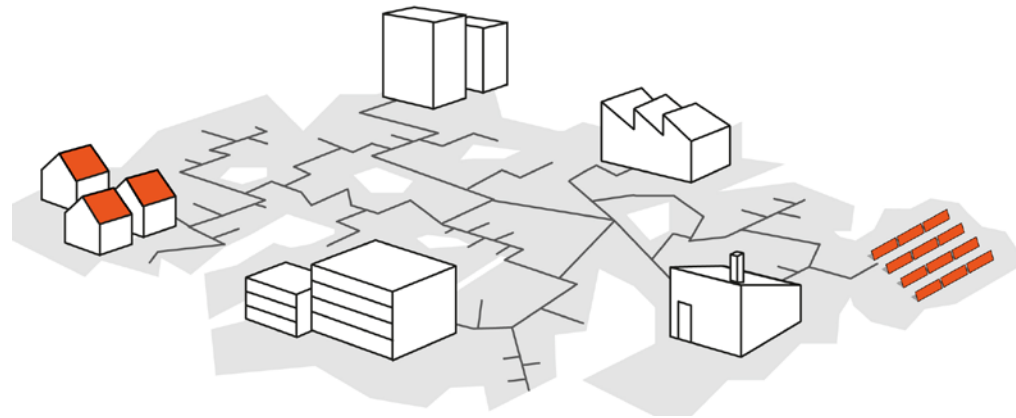
H2020 project **SDHp2m**

Objective: **RES DH market support on regional level**

Content:

- DH sectors and technologies in the focus
- Approach used for the regional initiatives
- Three implementation cases
- Where to find information and how to join

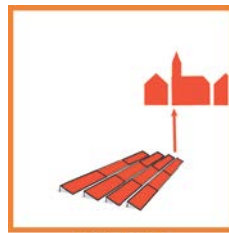
District Heating – Platform for RES and efficiency technologies



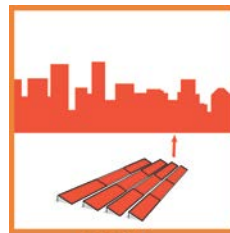
- biomass
(heat plants, CHP)
- solar thermal
- geothermal
- CHP
- industry surplus heat
- power-to-heat from RES
(electric boilers,
heat pumps)
- thermal energy storage



DISTRICT



VILLAGE



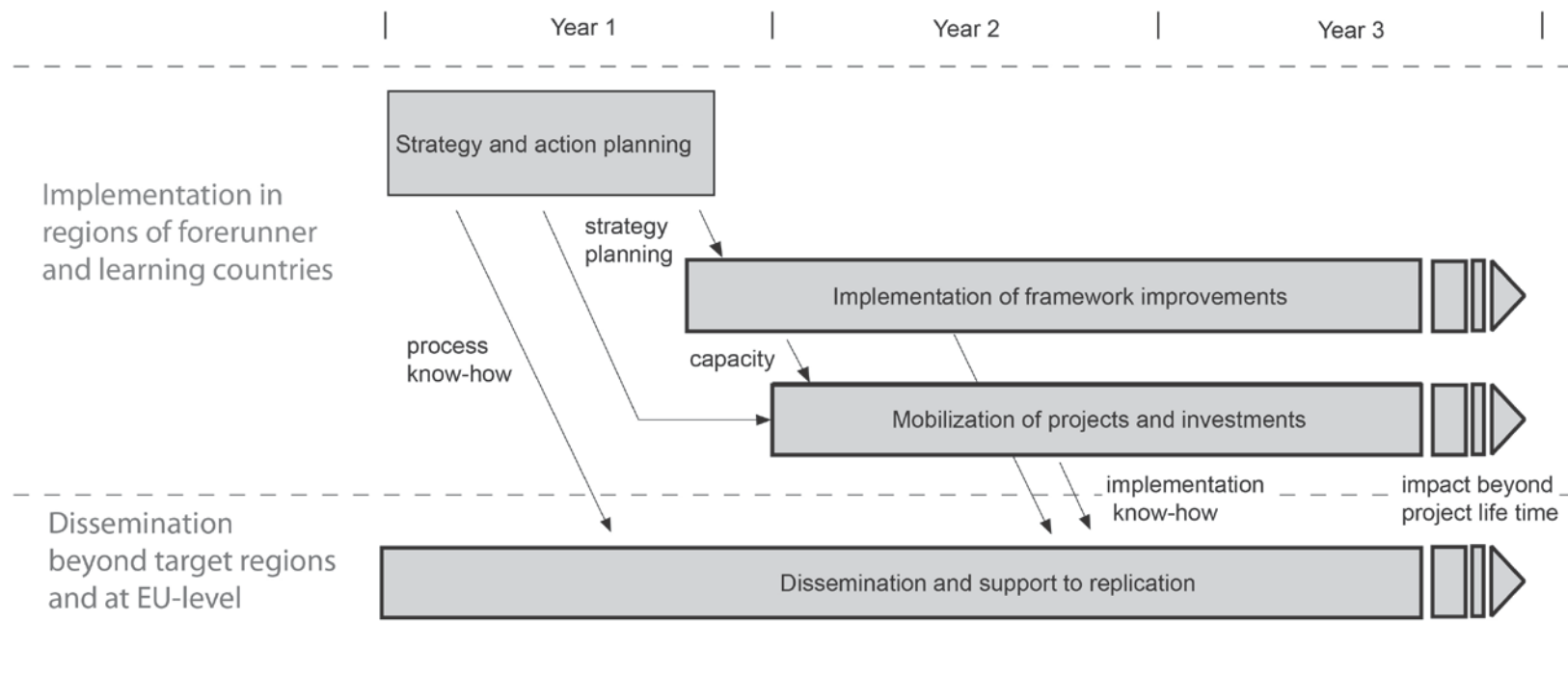
CITY

Solar thermal for district heating and cooling



- Emission-free and 100 % RES
- Mature and market available
- Available everywhere, but need for areas
- Capacity up to 100 MW
- Solar fraction up to 50 %
- Stable heat cost of 30 - 50 €/MWh
- New opportunities in the H/C sector

SDHp2m ... developing strategies and action plans for policy and market support measures



Best-practice: *SDHp2m* in Auvergne-Rhône-Alpes

- Complementary Team



La Région
Auvergne-Rhône-Alpes



- Stakeholder Group

Associations, policy makers (Région, Métropoles), DH operators and planners, energy cooperatives and initiatives (Usera), municipalities city planners, heat planning experts, financing institutions, national authorities (ADEME), engineering office (Tecsol, Kalice, Inddigo), solar industry (Clipsol, Viessman)

- Complete action plan



Examples for solutions / actions to market development

Energy Planning:

- Include a mandatory study of the option with solar when a DH study is financed by a public actor, include it in templates for feasibility studies
- Integrate solar thermal in regional and communities planning scheme

Capacity:

- Creation and dissemination of a toolbox and a guide (SDH models adapted to the region and the boundary conditions, technical and economical)
- Case studies

Communication and Dissemination:

- Specific guide for mayors and city planners with first French examples
- Rely on existing structures to identify potential projects (TEPCV network, local authorities)
- Raise end consumer acceptance via national association

Energy Transition / Heat Transition in Baden-Württemberg



www.50-80-90.de

E!  **Energiewende**
Baden-Württemberg
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Ministerium für Umwelt, Klima und
Energiewirtschaft Baden-Württemberg

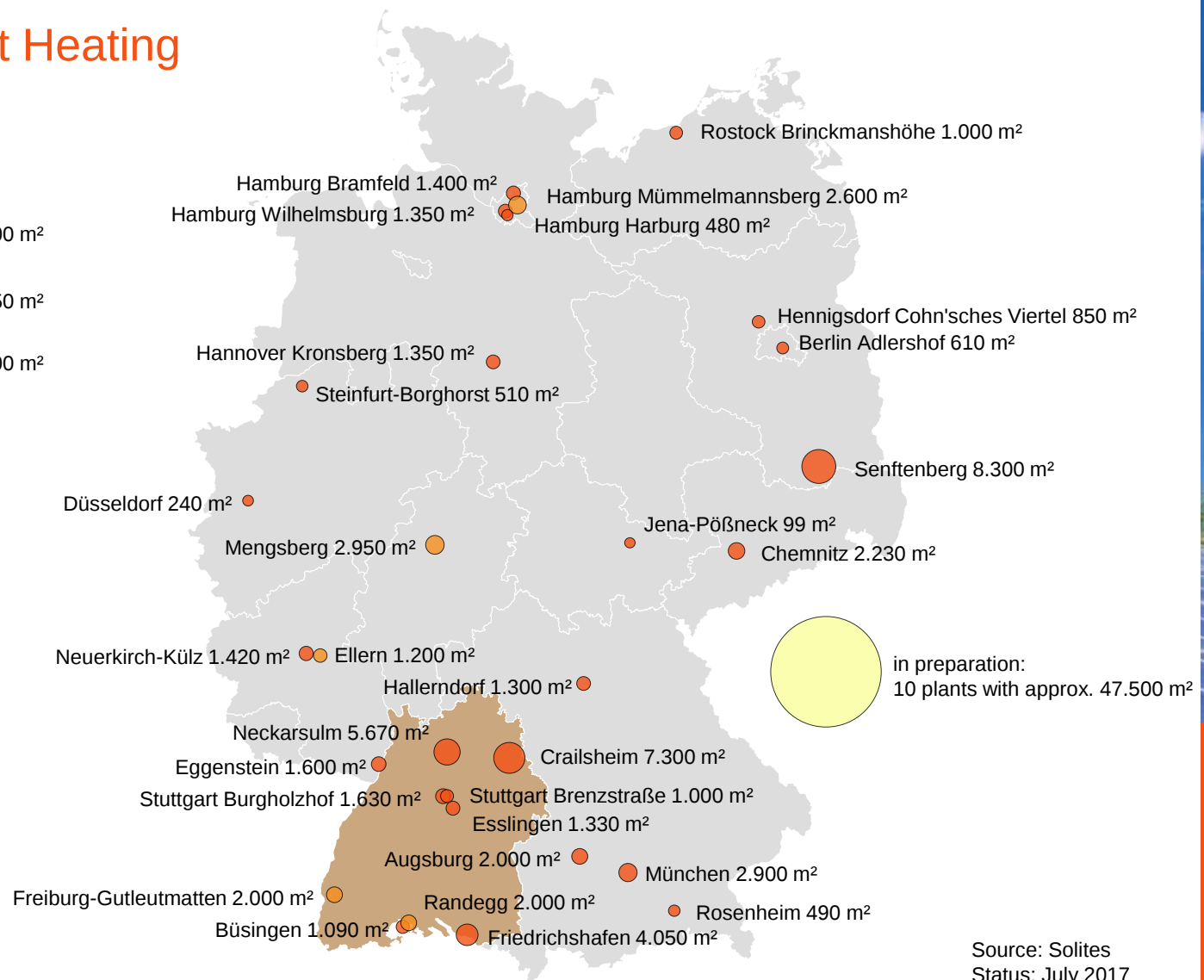
RES DH activities by the Ministry of the Environment BW

- Objective: RES DH for 'Energy Villages'
- Intense stakeholder consultations
- Incentive programme
'Energieeffiziente Wärmenetze'
 - Financial support to Energy Planning
 - Support campaign in 10 of 12 districts
 - Financial incentives (bonus system)
- Since 2016: 34 applications and 20 projects approved



Solar District Heating in Germany

- in operation:
approximately 50.200 m²
- in planning:
approximately 10.750 m²
- in preparation:
approximately 47.500 m²



Source: Solites
Status: July 2017

Availability of land areas for solar and other RES

Styria, AT:

- Taskforce 'Land Availability'
- Statics for large-scale roofs

Hamburg, DE:

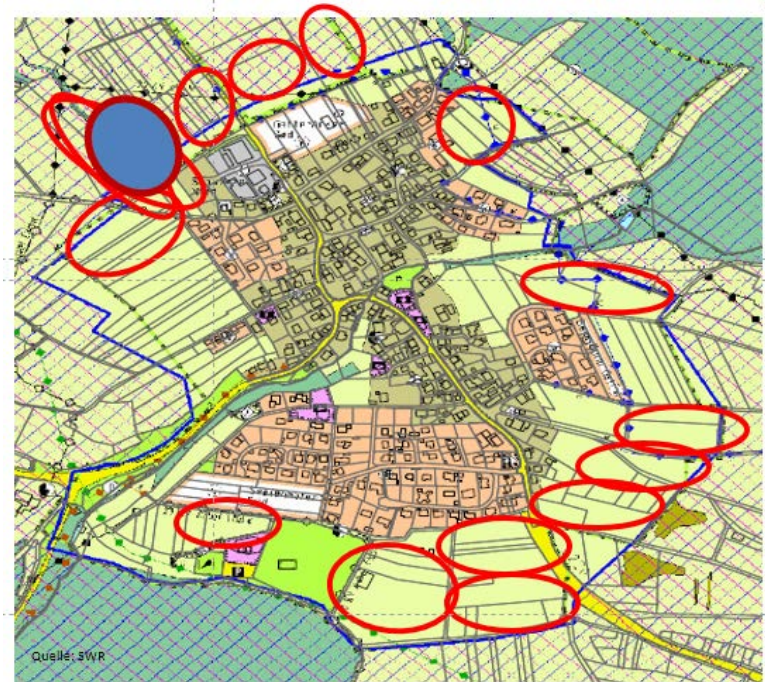
- Guide 'Policy recommendations and legal framework'
- Case studies

Aosta and Veneto, IT:

- Simplification of authorization procedures

Baden-Württemberg, DE:

- Guide: 'Development of SDH areas, including ecological concepts'



Source: Stadtwerke Radolfzell

The SDHp2m project



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and contact:



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www.solites.de
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Implementing
authorities:



AUVERGNE – Rhône-Alpes

Consultant
partners:



AMBIENTEITALIA



PlanEnergi



Supported by:



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SmartReFlex – Smart and flexible 100% renewable district heating and cooling systems for European cities

Six regions in DE, ES, IE and IT
implement legislative and organizational
measures for promoting renewable district
heating and cooling

Duration: Mar. 2014 – Feb. 2017

Supported by:



Baden-Württemberg

MINISTERIUM FÜR UMWELT, KLIMA UND ENERGIEWIRTSCHAFT

Coordinator: AMBIENTEITALIA

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SDH
solar district heating

5th International
Solar District Heating
Conference

11-12 April 2018
Graz, Austria

www.solar-district-heating.eu

Call for abstracts until 6 October 2017

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