

## HORIZON 2020 PROJECT TRACER

SMART STRATEGIES FOR THE TRANSITION IN COAL INTENSIVE REGIONS

#### Technological challenges and opportunities in the TRACER regions

28<sup>th</sup> April 2021, Just Transition Platform - Coal Regions Virtual Week Rita Mergner, Rainer Janssen, WIP Renewable Energies

### TRACER CONSORTIUM





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Research Institute for Post-Mining Landscapes, Germany http://fib-ev.de



University of Strathclyde, UK www.strath.ac.uk



Black Sea Energy Research Centre, Bulgaria www.bserc.eu



Güssing Energy Technologies GmbH, Austria http://get.ac.at



The Association of European Renewable Energy Research Centres, Belgium

www.eurec.be



Institute for Studies and Power Engineering, Romania www.ispe.ro



Energoprojekt ENTEL, Serbia

www.ep-entel.com



Coal Energy Technology Institute, Ukraine

www.ceti-nasu.org



University of Agriculture in Krakow, Poland

www.ur.krakow.pl



Welsh Government, UK

https://gov.wales



Charles University, Czech Republic

www.cuni.cz



Czech University of Life Sciences Prague, Czech Republic

https://www.czu.cz/en/



Jiu Valley Social Institute Association, Romania

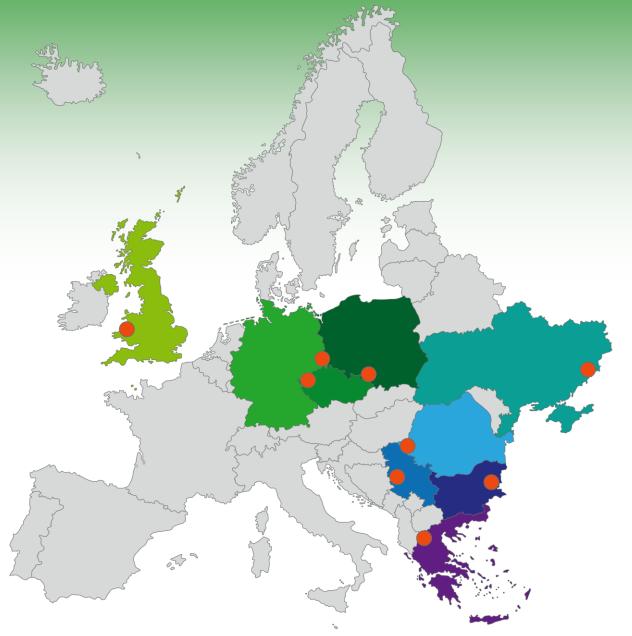
www.institutulsocialvj.ro



## TRACER TARGET REGIONS

- Southeast Region (BG34), Bulgaria
- Northwest Bohemia (CZ04), Czech Republic
- Lusatia Region, Brandenburg (DE40) and Dresden (DED2), Germany
- West Macedonia (EL53), Greece
- Upper Silesia (PL22), Poland
- West Region / Jiu Valley (RO42), Romania
- Kolubara Region (RS11&RS21), Serbia
- Donetsk Region, Ukraine
- Wales (UKL1, UKL2), United Kingdom





#### **CHALLENGES**

- Introduction of new technologies goes hand in hand with Research and Innovation activities -> low innovation rates in TRACER coal regions
- Developing storage capacity for both electricity and heat
- Lack of RES related field data, no regional / local potential assessment studies (e.g. Jiu
   Valley, Romania)
- Involvement of SMEs
- Long-term thinking to ensure that market design allows continued growth of renewables at least cost





#### **OPPORTUNITIES**

- Production of RES is projected to increase (possibilities for large scale installations)
- During TRACER interviews several key ideas for the regional transition to new businesses have been outlined:
- -> production of energy storage solutions, such as batteries for electrical vehicles and large storage for electricity and heat
- -> hydrogen
- -> energy crops
- -> district heating operation, substituting lignite dependency with alternative energy sources
- -> energy communities





# **RESULTS**

















https://tracer-h2020.eu







## THANK YOU!

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