SOUTH EAST EUROPE
Transnational Cooperation Programme

TRACE
Transnational Cooperation for the Improvement of Buildings Energy Performance and Efficiency

Programme co-funded by the EUROPEAN UNION

The use of ICT in buildings' energy efficiency

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Introduction

- sub activity 3.1.5 in TRACE.
- Report on the use of ICT in buildings' energy efficiency.
- The role of ICT in enabling and facilitating the development and/or restructuring of the administrative and management procedures of public authorities on energy efficient building issues.

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Introduction

- Task outsourced to a third party – in accordance with proposal and budget
- limited tender
  - three institutes invited
  - two supplied proposals
  - awarded to PROMEA

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Methodology

- extensive desk based research for relevant cases
  - official websites
  - previous reports of other European projects (e.g., Energy Sector Management Assistance Program)
  - forums of stakeholders (e.g., ICT4E2B forum)
- 16 cases
- 10 cases selected
  - 8 from TRACE countries
  - 2 from other SEE countries

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Methodology

criteria for selection

- ICT facilitating administrative and management procedures of public authorities
- promotion and communication of energy efficient buildings

- energy – buildings – ICT (EPBD)
- Structure for each case study
  - Background and context
  - Aims and objectives
  - Implementation
  - Key results

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Methodology

- report written in November 2013
- no quantifiable and objective criterion for case study selection
- report distributed to TRACE partners with the request for
  - corrections,
  - additions,
  - new developments.
- will be added as appendix to the report

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Summary of results

- ICT plays a central role in energy efficiency of buildings activities
  - real time monitoring
  - metering
  - central management of energy consumption
- importance of information
  - consequences of actions
  - cost accounting
  - characteristics of buildings (measuring and communicating energy efficiency)

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Summary of results

- Use of ICT has a high potential for savings of energy and costs
- Information needs to be
  - accurate and reliable,
  - available in real time (as much as possible),
  - comparable over time and across objects.
- The human factor is important
  - interests and incentives,
  - skills and knowledge,
  - trust in ICT instruments.

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Austrian case study - ZEUS

- housing subsidies – federal provinces (9 Bundesländer)
- EPC are usually a requirement for housing subsidies
- ZEUS is a database with web front end for the centralized collection and management of EPCs.
- 3 provinces: Salzburg, Carinthia, Styria

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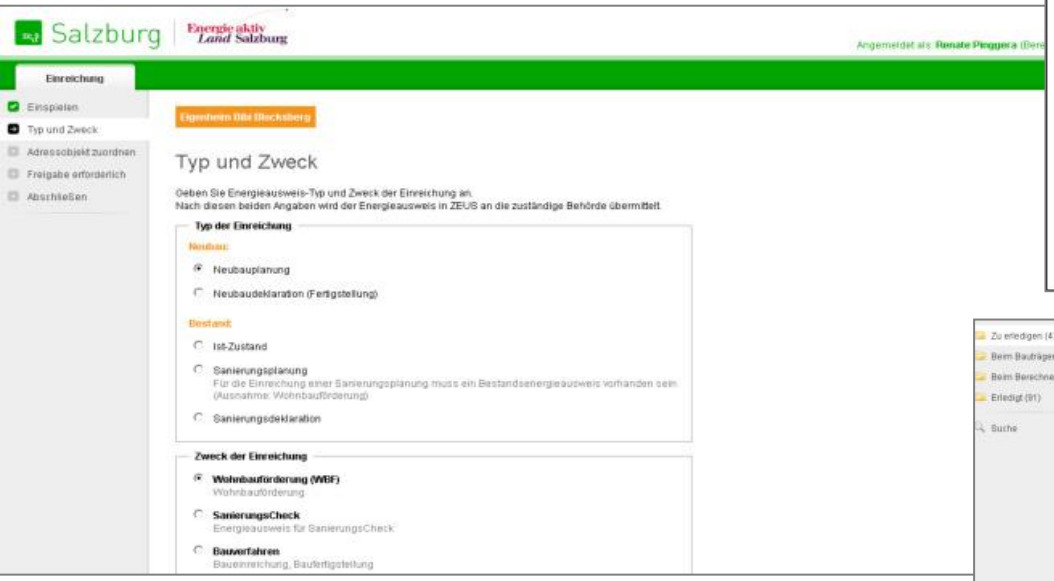
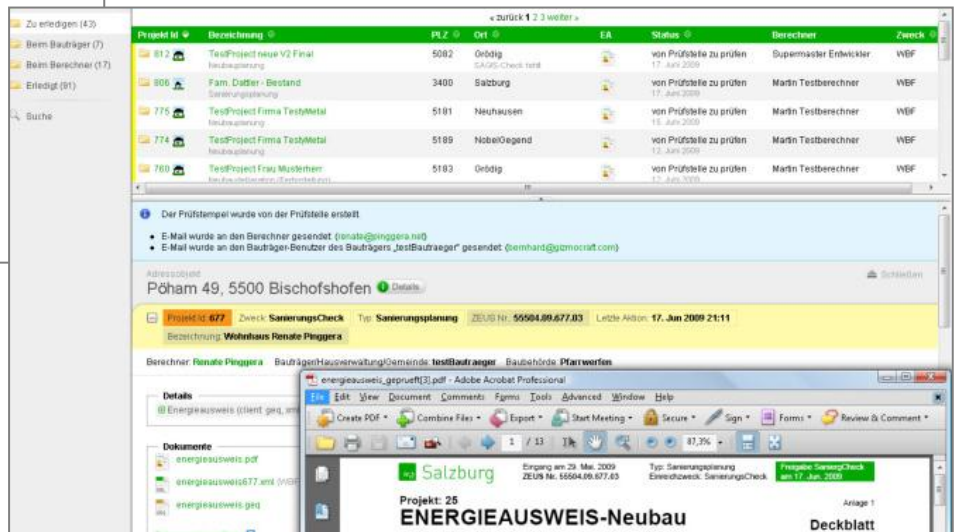
Austrian case study - ZEUS





Austrian case study - ZEUS

- main aim: to support and simplify the submission and review of EPC information
- procedures are standardized (ÖNORM)
- ZEUS interfaces with all leading vendors of EPC calculation software

- **ZEUS goes in the right direction**
- **But, ZEUS is only half a step**

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Austrian case study - ZEUS

- Only 3 out of 9 provinces use ZEUS
- Only required in the context of housing subsidies (mainly new construction)
- Austria wide regulation (EAVG) requires
  - calculation of EPC
  - information about EPC results in transactions and ads.
  - does not require reporting, central storage of results or making them publicly available

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Austrian case study - ZEUS

- Although the information has to be provided to interested customers and published in ads (low level of compliance)
- it is not available to the public
  - limited options for comparison
  - limited competition
  - limited options for monitoring improvements
  - limited options for controlling

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