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MVP – an effective tool for policy evaluation

Final conference Vienna, Austria

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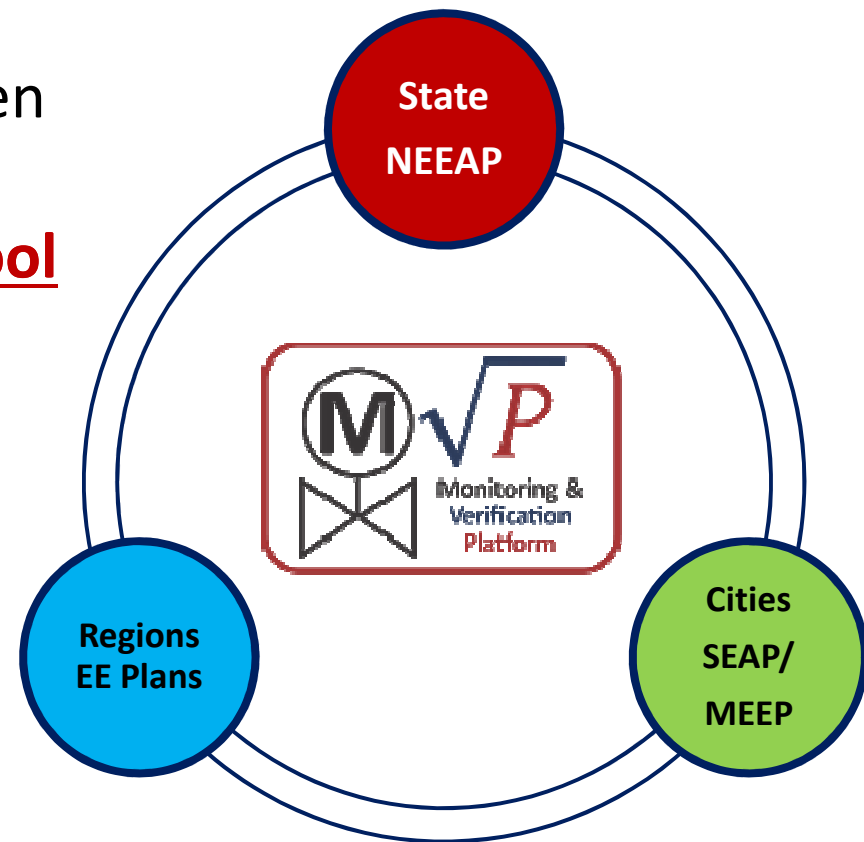
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- What is MVP web tool?
- Bottom-Up (BU) methodology as an engine under the hub!
- What is alternative for BU methodology?
- Big picture of policy planning and monitoring!
- MVP basic logic and data structure!
- Final remarks!

What is MVP web tool?



- Platform for systematic **information exchange** between different policy levels!
- Evidence based **monitoring tool** for individual measures and programs!
- Platform for **simultaneous monitoring** of all EE and CO₂ policy plans in one country!
- Long term vision – tool for **strategic planning and monitoring!**



✓ **SIMPLE, INNOVATIVE AND COST-OPTIMAL MONITORING SOLUTION!**

BU Methodology – engine under the hub!



Buildings

$$TFES = (U_{Ref_env} - U_{Eff_env}) * A * HDD * f * \frac{1}{\eta_{Ref}}$$

$$TFES = (P_C * h_{FL}) * \left(\frac{1}{ESEER_{Ref}} - \frac{1}{ESEER_{Eff}} \right) * n$$

$$TFES = n * \left(\frac{P_{Ref} * t_a - P_{eff} * t_a * fLPr}{1000} \right)$$

$$fLPr = t_{Q100\%} * Q_{100\%} + t_{Q75\%} * Q_{75\%} + t_{Q50\%} * Q_{50\%} + t_{Q25\%} * Q_{25\%}$$

Industry

$$TFES = P * t * f_l * \left(\frac{1}{\eta_{ref}} - \frac{1}{\eta_{eff}} \right) * n_m$$

Transport

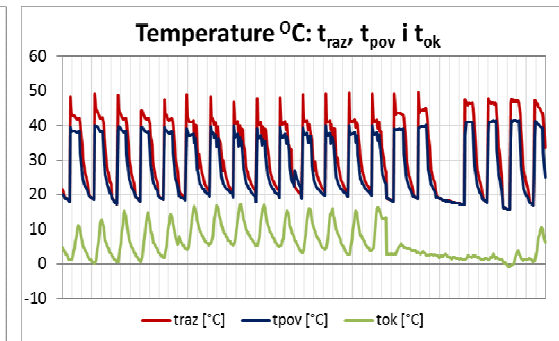
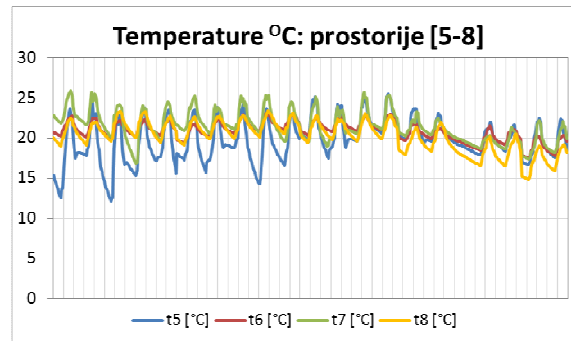
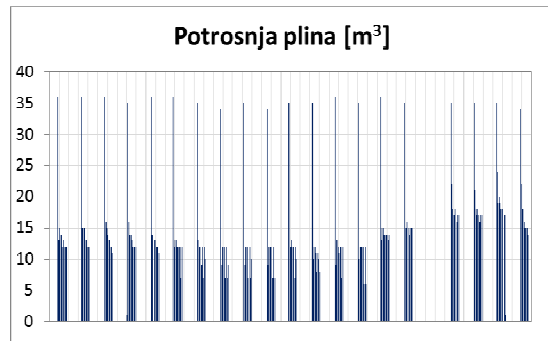
$$TFES = E n_{Ref} * \left(1 - \frac{E n_{Eff}}{E n_{Ref}} * EV_{lub} * EV_{tyr} \right) * \frac{Mil}{100} * n_i$$

and many others ...

What is in common for all measures?

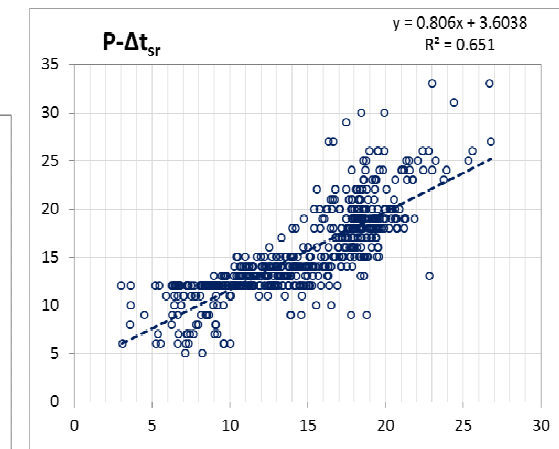
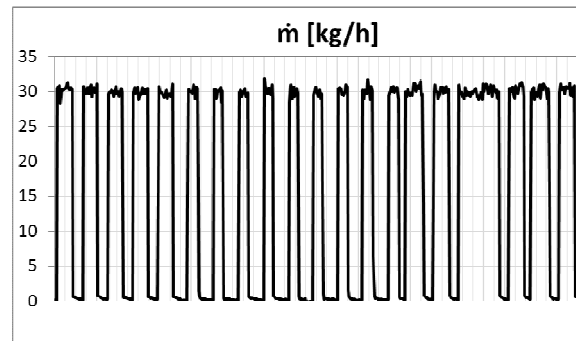
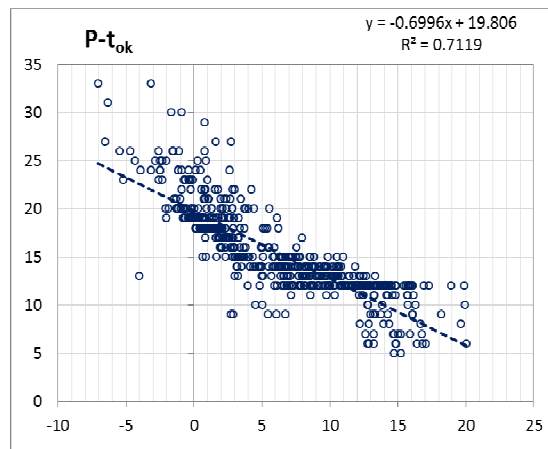
- Simple algebraic expressions!
- Existence of reference values!

What is alternative for BU calculations?



Detailed analysis of measured energy consumption in buildings/processes!

Modelling and simulations – transients, differential equations, controls?

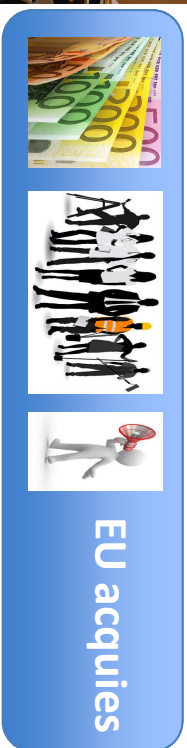


Big picture of policy planning and M&V!



€, kWh, tCO₂

Regions

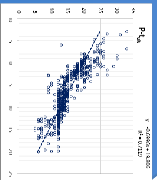
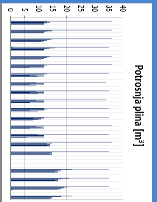
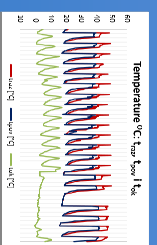
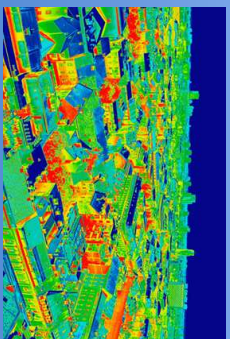
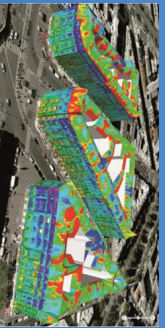


Individual buildings or processes

Cities Municipalities

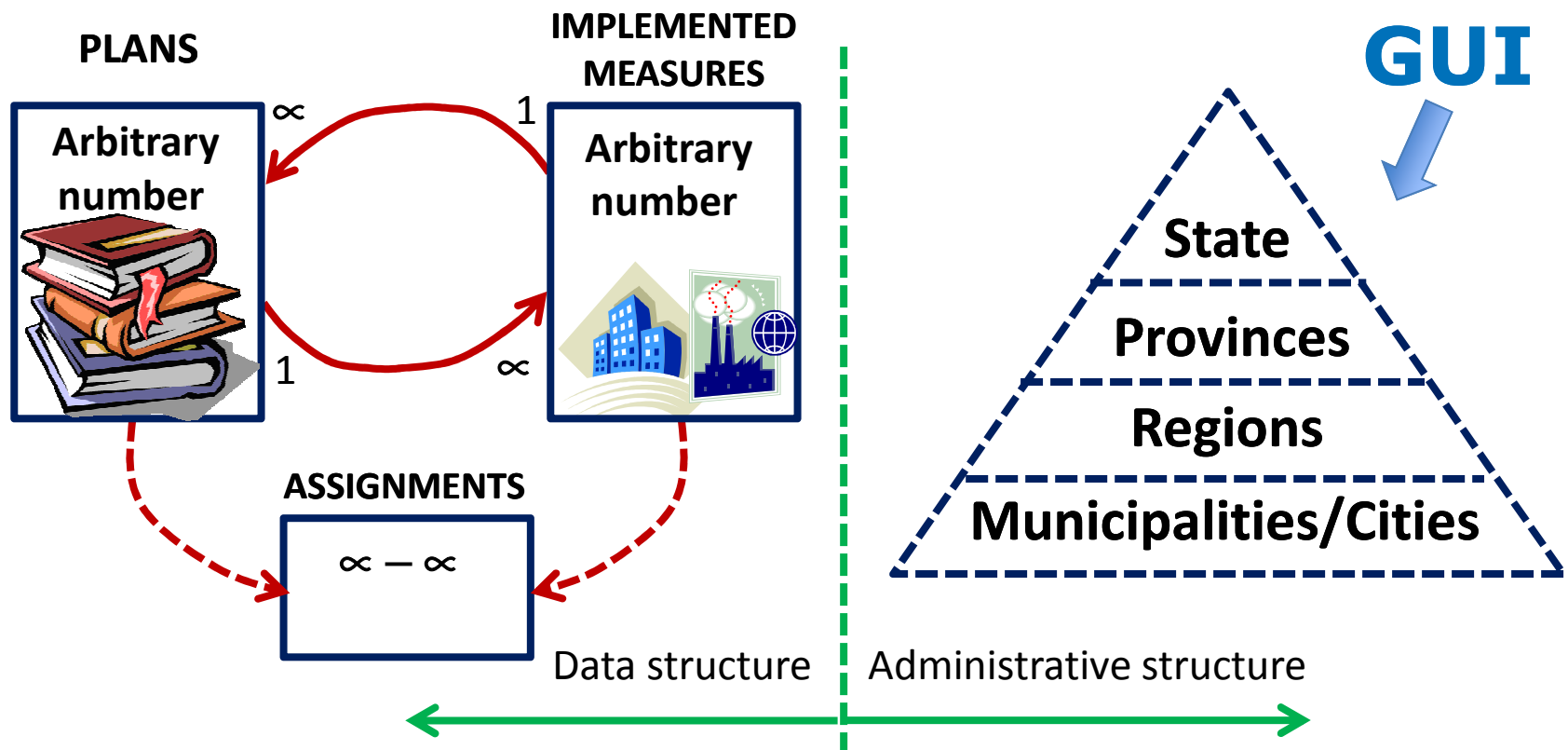
Regions

Huge amount of data!
Filtering criteria???



Basic logic and data structure

Arbitrary number of plans, arbitrary number of implemented measures and flexible administrative structure!



Reference values – editable!!!

Final remarks



- Design of administrative structure via GUI!
- Bottom-Up methodology as an engine!
- All reference values (BU methodology) are in Codetables – can be changed any time!
- Arbitrary number of policy plans either energy savings or CO₂ emission can be registered!
- Arbitrary number of implemented measures in the field can be registered!
- Simultaneous monitoring of all EE and CO₂ emission reduction policy plans at country level!
- **Simple, simple, simple ...**

THANK YOU FOR YOUR ATTENTION

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