



# AI for energy savings in the public sector. - **Executive Summary**

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# 1 Subject of the PIP trajectory

Terra is the patrimony and energy database of the Flemish Government managed by the Flemish Energy Company (Vlaams Energie Bedrijf (VEB)). By using innovative technology, the VEB wants to be able to make maximum use of this data for the detection, initiation and follow-up of energy-saving projects and renewable energy projects.

With the deployment of Artificial Intelligence, insights could be created about:

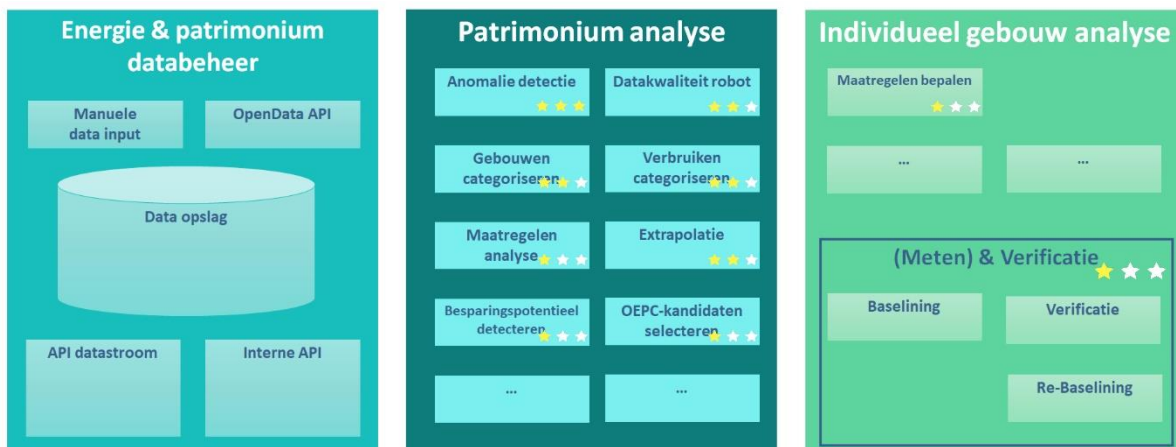
- occupation of buildings;
- patterns in building criteria where similar saving measures can be applied;
- projections of the savings potential of certain clusters of similar buildings;
- anomaly detection in energy consumption as a trigger for reporting on changes to buildings (occupancy, structural changes, use, energy saving changes);
- extrapolation of insights from buildings for which a lot of manually collected data is available to buildings for which less data is available.

# 2 Course of the study

- Thorough investigation of the need in order to clearly describe purpose, context and challenges
- Mapping out desired types of market players
- Organising market consultation on the basis of research questions
- Innovative meeting techniques ensure inclusive interaction between participants
- Conclusions and advice

# 3 Conclusions of the market consultation

The market was questioned about the possibilities and feasibility of AI applications in the different functional areas of the future TERRA. Below you will find an overview with the priority indicated in stars.



## 4 Degree of Innovation

During the study, we detected a series of aspects that make this an innovative project. The following aspects were touched upon:

- AI in energy saving
- AI in data enrichment
- Order size of data source
- Modular solution structure
- Innovative project development
- Ethics and Explainable AI