



energyPRO

Use Case: Industrial Decarbonization

In industries with many different processes, each with its own needs for raw materials and energy, it can be a challenging task to replace the existing energy sources with green alternatives.

There may be dependencies across processes and other technical constraints that makes it a complex task to assess the consequences of investing in new energy plants and finding the right configuration of devices that will allow operations to be maintained as before.

In this session, you will learn how to model such industrial processes. For the specific application we formulate a reference model, based on demand and cost patterns, which is validated with operational data. By comparison of the financial and environmental benefits with the existing set-up as reference, the most promising technological solution is identified to mitigate CO2 emissions while minimizing operational costs.

The robustness of the solutions is challenged by various sensitivity analysis to create a sound decision basis.

Focus areas:

- Industrial processes
- CO2 emissions
- INTERFACE module
- Cross sectional
- Multi-objective optimization

Please note that the participation in this session requires either participation in the introductory session or experience in working with energyPRO!