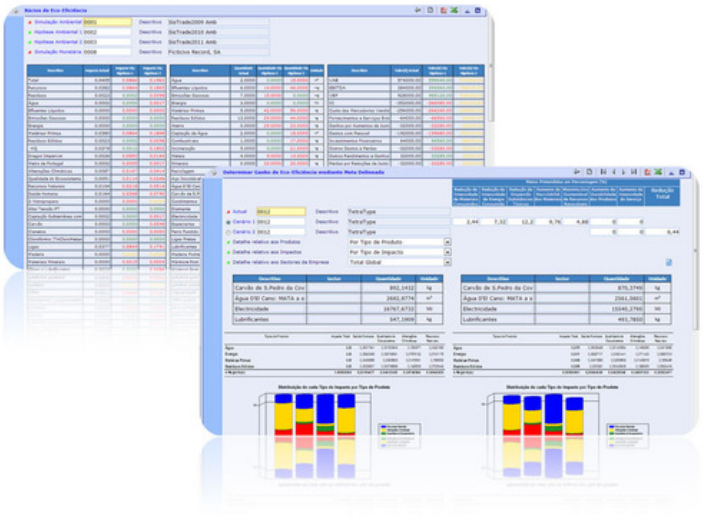
EcoManager



A TOOL TO CHARACTERIZE AND IMPROVE THE ECO-EFFICIENCY OF PRODUCTION SYSTEMS

ECO-EFFICIENCY UNITES TWO “ECO” DIMENSIONS - ECONOMY AND ECOLOGY, TO RELATE THE PRODUCT OR SERVICE VALUE TO ENVIRONMENTAL INFLUENCE. THE PRIMARY GOAL IS TO INCREASE THE NET VALUE OF THE COMPANY/PROCESS/PRODUCT “DO MORE WITH LESS”

MAIN FEATURES

- Facilitates the analysis/evaluation of mass balance and production systems energy (Inputs/outputs).
- Includes methodologies for defining indicators of economic and environmental performance (KPI and KEPI).
- Allows the integration of economic performance with the company's environmental performance (or processes) and generates the information necessary for the evaluation of eco-efficiency.
- Dashboards of charts and tables based on the key variables for the user.
- Generation of the economic and environmental profile of the company or process.
- Depending on the results obtained, the user can set priorities and measure the most significant inefficiencies, which also allow the implementation of the improvement actions focused on reducing costs, on the more efficient use of resources and raw materials, and reducing the environmental impacts of the activity.

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INFORMATION FOR DECISIONS IN FOUR AREAS:

- Analysis of Mass Flow and Energy (AMFE)
- Environmental Performance Evaluation (EPE)
- Model of Environmental Impact Calculation (MEIC)
- Value Calculation Model (VCM)

STANDART PROCEDURES

- Consumption and emissions inventory
- Mass and energy balance for each area of study
- Identifying environmental aspects
- Evaluating the significance of environmental aspects
- Setting goals and objectives
- Identifying the eco-efficiency principles for improvement
- Evaluating environmental impact
- Setting value of functional feature
- Calculating value according to Accounting Standardisation System
- Identifying and quantifying the performance indicators
- Calculating eco-efficiency ratio
- Parameterising company process/service
- Determining eco-efficiency development
- Simulating and comparing the alternative improvement measures

ECO-EFFICIENCY RATIOS AND PERFORMANCE INDICATORS

$$\text{Ecoefficiency} = \frac{\text{Product Value}}{\text{Environmental Influence Value}}$$

$$\text{Performance Indicators} = \frac{\text{Product Value}}{\text{Environmental Influence Value (Physical Value)}}$$

ECO-EFFICIENCY CAN BE PERFORMANCE METRICS OF SUSTAINABLE COMPANIES AND ORGANISATIONS, IN ORDER TO SHOW THE ECONOMIC AND ECOLOGICAL PROGRESS