

We are Carbon & Energy Hunters

HiPerWare – one platform for:

- Energy Optimisation
- Technical Operations Optimisation
- ESG Reporting
- Building Digital Trail

EUTECH



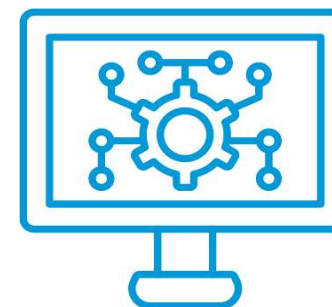
Industry challenges



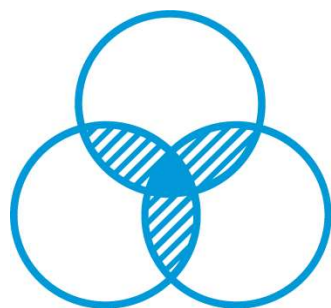
Lack of Big Data



Lack of operations
transparency



Lack of assets &
systems digitalisation



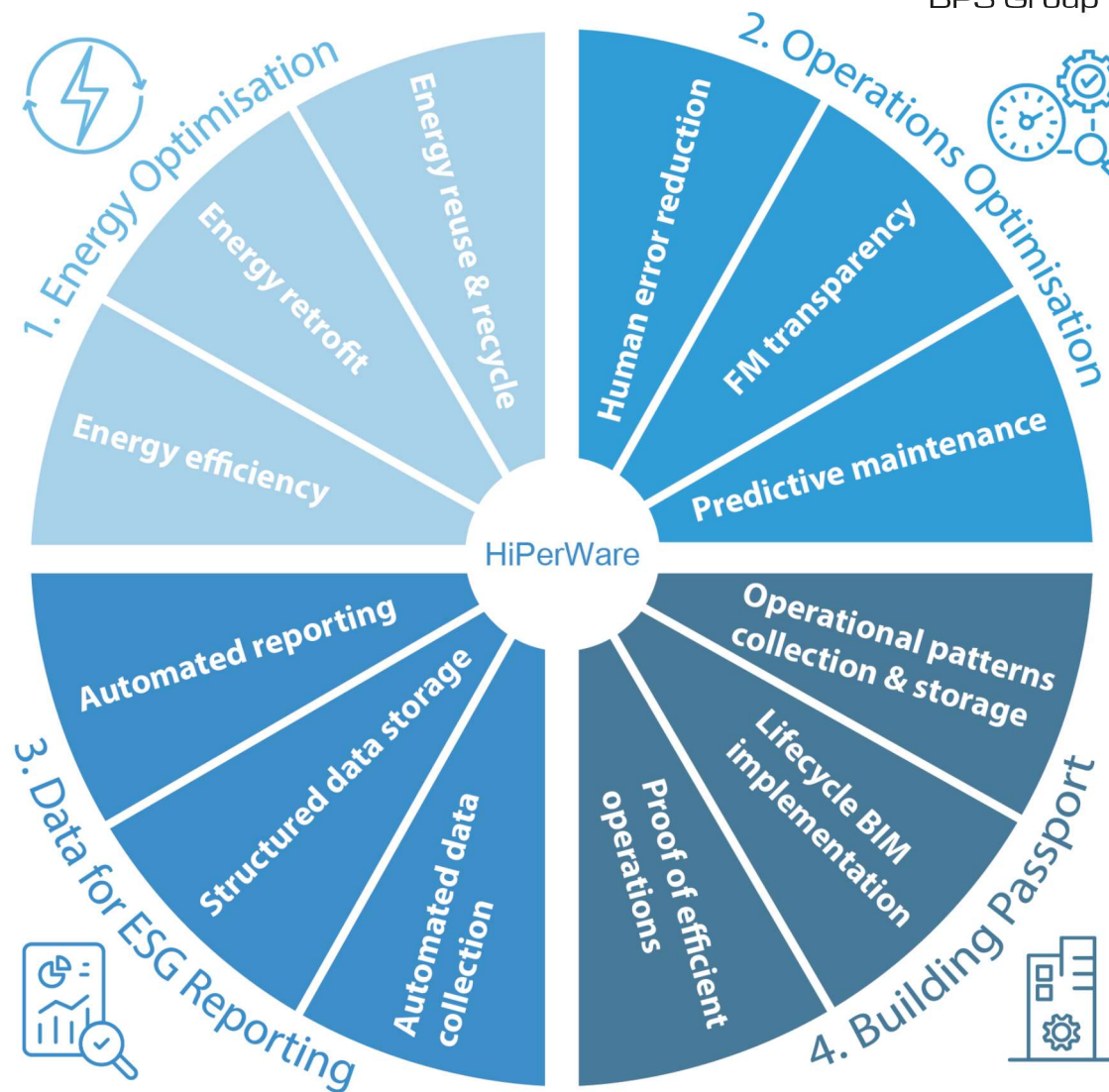
Lack of a single
integrated solution



Lack of a simple &
affordable solution

HiPerWare – a common platform for realising all 4 initiatives

Mass market PropTech solution to achieve **regulatory sustainability** and **decarbonisation targets** in real estate & manufacturing worldwide.



Innovative methodology – redefining energy optimisation

Dynamic EPC: Key components

1. Dynamic retrospective analysis of actual energy savings
2. Energy consumption & equipment operation based on actual demand
3. Elimination of energy waste
4. Dynamic generation, accumulation & transformation
5. Avoidance of power peaks & spot electricity consumption



[Learn more here](#)

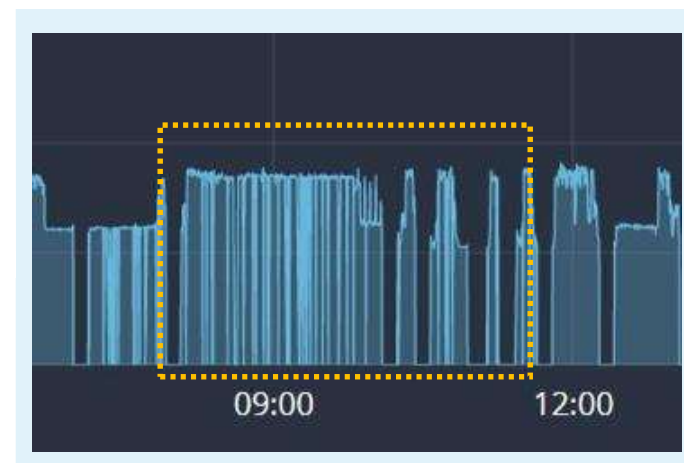
HiPerWare delivers better results based on Big Data

From “What needs attention?” to “Why this happened?”



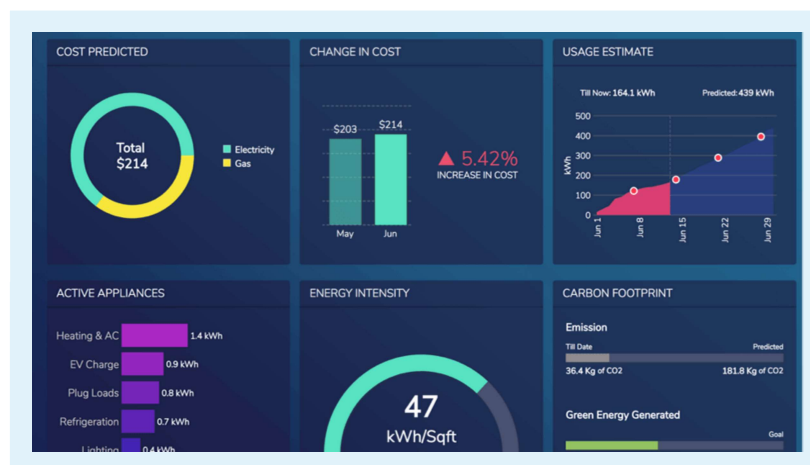
	Traditional solutions	HiPerWare
Data collection equipment	High price	Affordable & vendor agnostic
Number of data points	Limited	Numerous for every process
Data collection frequency	Once per hour/day/month	Continuous for ML/AI analytics
Analysis	Based on standard rules	Based on the library of operations patterns

HiPerWare uses AI-based tools for advanced analytics



	Rule-based solutions	Pattern-based solution (HiPerWare)
Principle	If ... then ...	When the pattern changes or matches the anomaly
Setup	Complex & non-automated	Automated , affordable & quick
Notification	After the incident	Before the incident, when the anomaly occurs

HiPerWare achieves more than a traditional EMS



	EMS	HiPerWare
Measurements	Only electric energy data	Electric energy data + other sources, granular processes & their outcomes (temp., pressure, CO2)
Analysis	Only static analysis	Static + pattern-based analysis for detailed diagnostics
Anomaly detection	What happened	What, where & why

HiPerWare – big data IIoT platform

Digitalisation of MEP for simplified navigation within the building systems: Anatomy (BIM) + process (IIoT data)

HiPerWare – end-to-end platform fully integrates:

1. 360° photo data
2. BIM live Digital Twin
3. Live graphs, P&I diagrams
4. Single-line diagram

The collage illustrates the integration of various data sources into the HiPerWare platform:

- 360° photo data:** A photograph of a mechanical room with a semi-transparent data window overlaid. The window shows 'Dynamic properties' for 'TE5 - Heated floors. Feed temperature' with a 'Last value' of 36.80 °C and a line graph showing temperature fluctuations over time.
- BIM live Digital Twin:** A 3D model of a complex piping system with various components like tanks and pumps, color-coded by function.
- Live graphs:** Two line graphs showing temperature trends. The top graph is for 'PF1-TE15 - PF1-TE15 Bottom Temperature' (last value: 47.87 °C) and the bottom graph is for 'PF1-TE17 - PF1-TE17 Upper Temperature' (last value: 48.91 °C). Both graphs show data from 06:00 to 12:00.
- P&I diagrams:** A detailed process and instrumentation diagram showing a 'Puffenspeicher' (buffer tank) with various sensors (PF1-TE17) and piping connections.
- Single-line diagram:** A schematic diagram of an electrical system with a table of components and their specifications.
- Current graph:** A line graph showing 'Current value' (1.01 A) over time, with a peak around 11:00.

Industries we support

HiPer it!
BPS Group



Offices



Hospitality



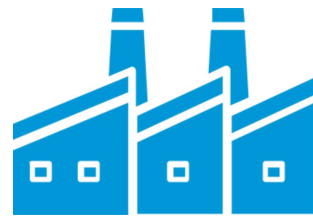
Residential



Retail



Healthcare



Manufacturing



RE Investment

Manufacturing case study - transforming energy waste

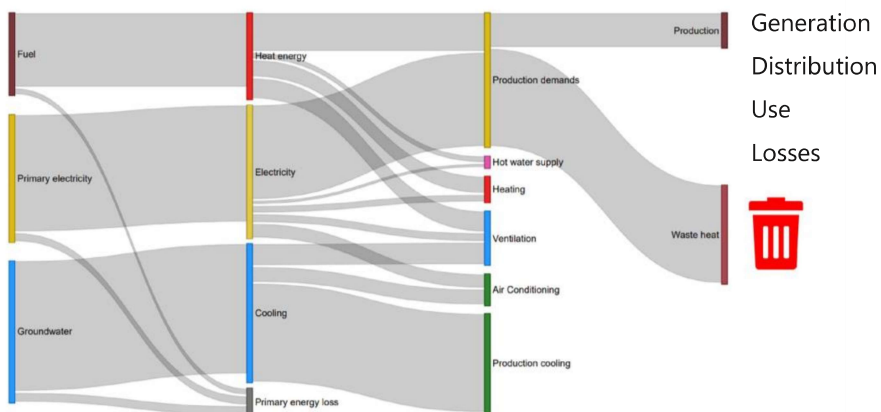
Industrial case study: Energy optimisation in metal sealant production for petrochemical industries

Project goals: achieve Green Deal targets and reduce energy consumption and CO2 emissions

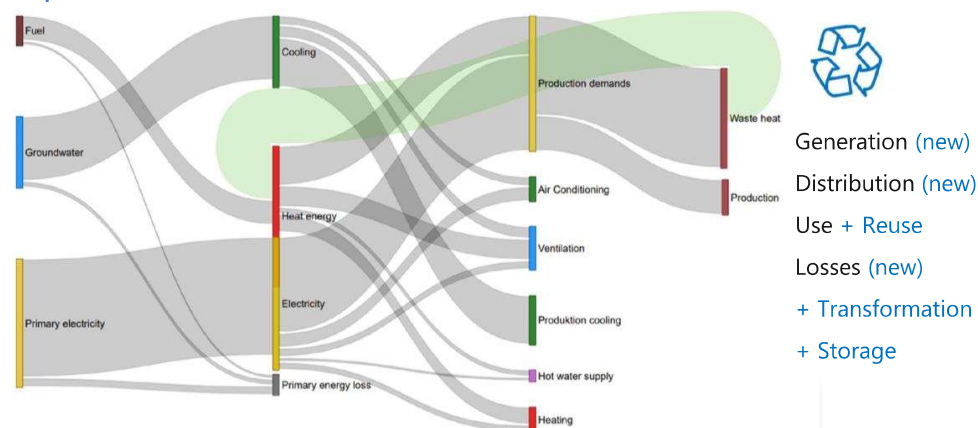
Project results: identifying and resolving energy waste and inefficient operations, resulted in **66%** energy costs reduction and **100%** CO2 emissions reduction



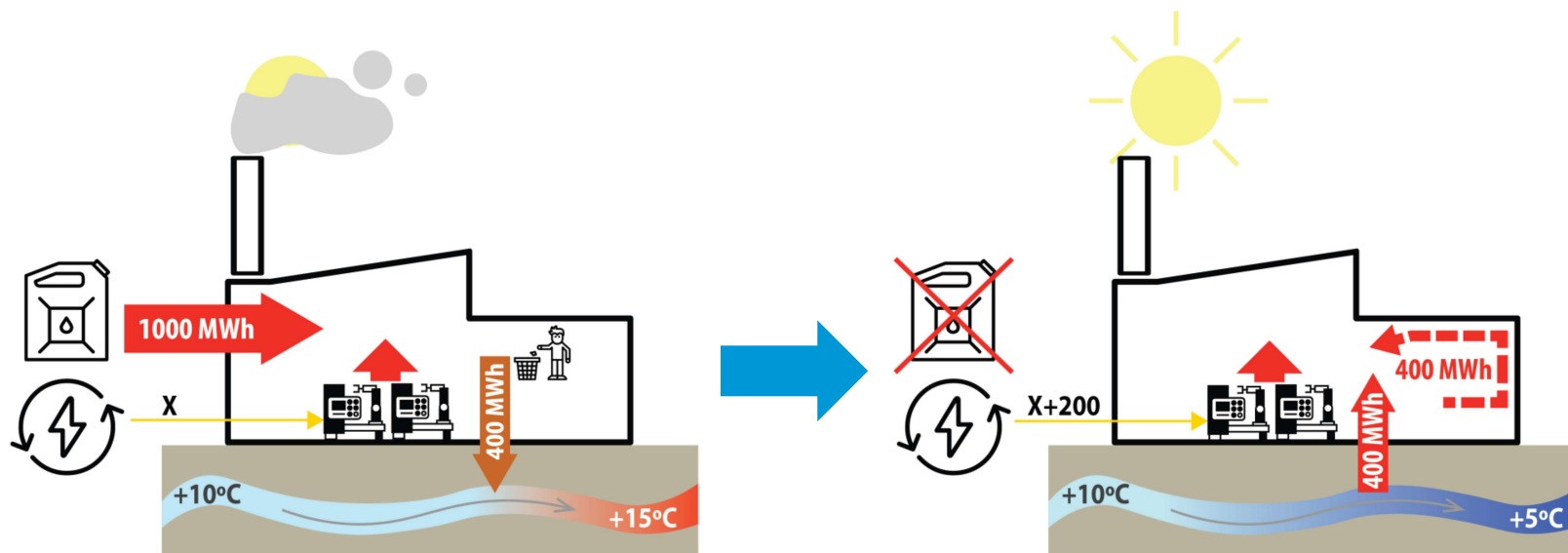
Initial state:



Optimised with HiPerWare:



Transforming energy waste into an asset



Existing Conditions

- Use of gas for heating
- Excess heat from production wasted into the ground river
- High CO2 emissions

Post Energy Retrofit by HiPer it!

- Use of only green electricity
- Recirculation of excess heat
- Achieved NetZero
- Reduced energy use & costs by 66%

Benefits: cost saving, asset value and efficiency increase



Decrease energy and operation costs



Reduce CO2 emissions and comply with Green Deal targets



Collect ESG data from any building system



Simplify maintenance through transparency



Gain green accreditations



Increase asset values and market demand



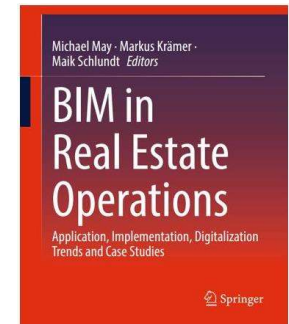
Futureproof through energy retrofit and optimisation



Use BIM for entire building life cycle

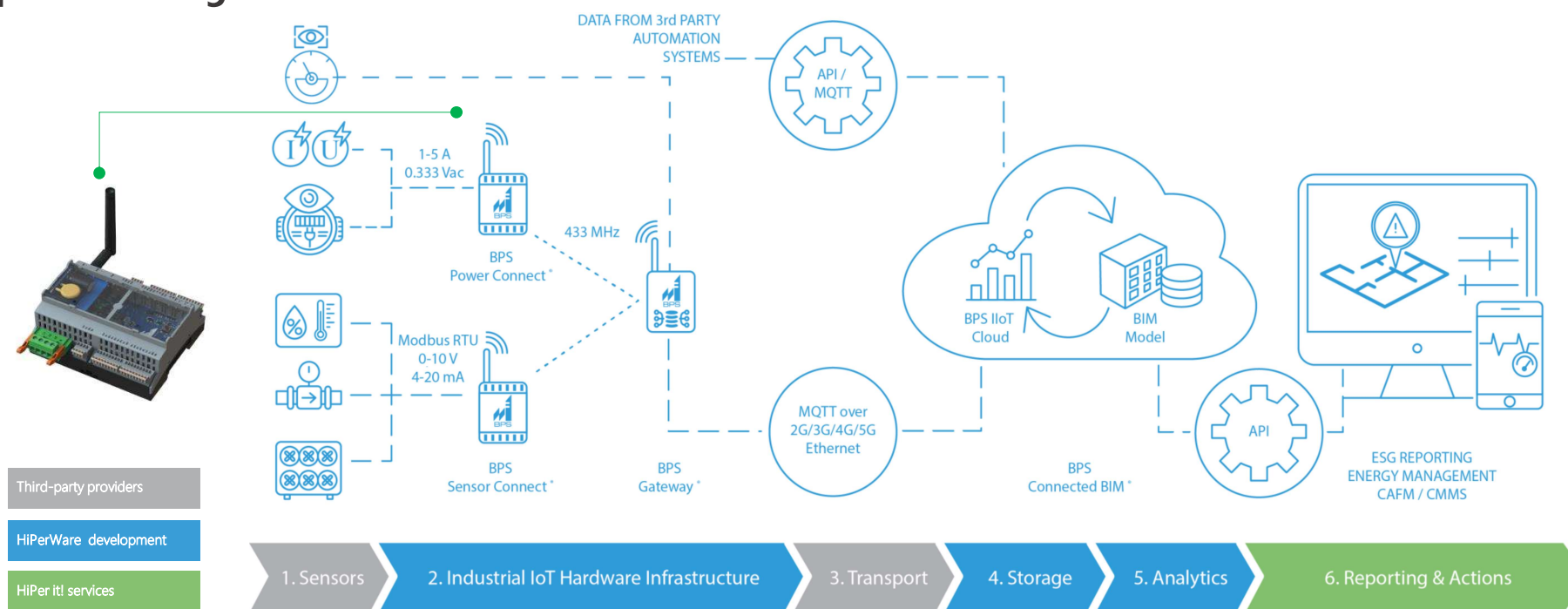
HiPerWare – awards & recognitions

- 2023 - Innovation World Cup Finalist
- 2023 - Green BIM Awards winners
- 2023 - German Federal Ministry of Economics and Export Control - BAFA certified EMS solution
- 2023 – EUTECH Chamber board member
- 2022 - Top 50 EU PropTech startups
- 2022 - EU grant from ENERBUILD
- Development partners with Autodesk since 2019



Appendix: HiPerWare platform architecture

- **Full stack development:** hardware, firmware, cloud software, big data analytics, SaaS, ML & AI
- **Mass non-invasive** Big Data collection, cost-effective even for “not-shiny” buildings (~**90% of market**) and analog meters
- Big Data + building anatomy = **Digital Twin** and full **digital trail** of operations
- **Open API integration**



Learn more – find additional information here

