



Bringing industrial data to life

www.dat-uh.com

Discover insight faster with Dat-uh

Gather

Automated data profiling speeds data preparation all while providing a fast and scalable way to work with more data across diverse data sources.

Contextualize

Identify patterns and correlations hidden deep within blended data while data models continuously retrain themselves, creating deeper insights with every new data point.

Predict

Shift from historical reports that tell you why something happened to predictive insights that prevent failures, optimize factory floors and foresee energy demand.



Every manufacturer has the potential to integrate machine learning into their operations and become more competitive by gaining predictive insights into production.

CHANGE IS HAPPENING

RAPIDLY



Adoption of Industrial IoT

Near-term

OPERATIONAL EFFICIENCY

- Asset utilization
- Operational cost reduction
- Worker productivity

NEW PRODUCTS/SERVICES

- Pay-per-use
- Software-based services
- Data monetization

Long-term

OUTCOME ECONOMY

- Pay-per-outcome
- New connected ecosystems
- Platform-enabled marketplace

PULL ECONOMY

- Continuous demand-sensing
- End-to-end automation
- Resource optimization & waste reduction



Technology adopters should

TAKE ACTION

Reorient
strategy in light
of Industrial IoT

Orchestrate
organization's
ecosystem

Start with
pathfinder
projects



“Maintenance is increasingly seen as a strategic business function as opposed to a necessary evil.”

BIG DATA & PREDICTIVE ANALYTICS

Not when, but how



The Business Case for Predictive Analytics

\$9_{USD}

The average maintenance cost for plants operating a predictive maintenance program on their pumps.


75%

The average number of breakdowns eliminated by oil & gas companies that have implemented predictive maintenance programs.

15%

The average amount of maintenance time currently spent on predictive maintenance activities in the manufacturing sector.



A row of white wind turbines is shown against a blue sky with light clouds. The turbines are arranged in a line, receding into the distance. The text is overlaid on the right side of the image.

Predictive maintenance has provided tangible benefits to wind farm owners, which include reduced operation and maintenance costs and increased production revenues resulting in ROIs in as little as 6 months.



Predictive maintenance is reducing breakdowns and increasing production of highly critical assets.

75%

Elimination in breakdowns

25%

Reduction in maintenance costs

20%

Increase in production





**Reducing Maintenance
Costs, energy optimization
and Ensuring Quality in the
Manufacturing Process.**



Using advanced analytics to anticipate temperature and humidity deviations from pre-defined acceptable ranges and adjusts fan speed accordingly.

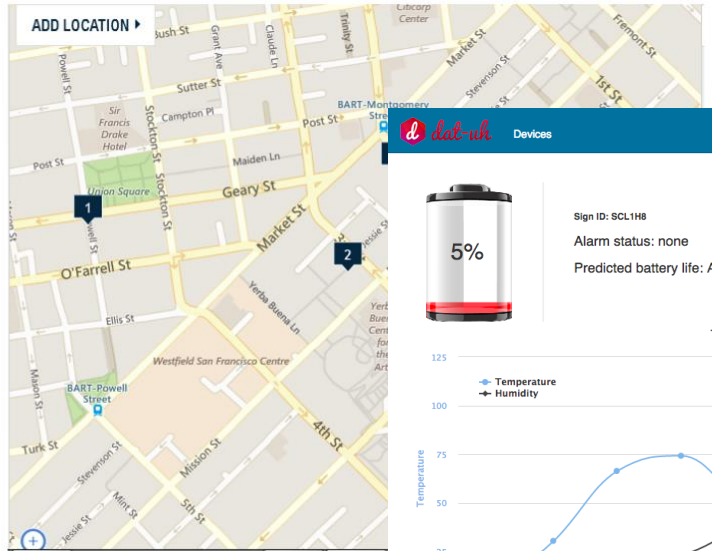


Predictive battery health

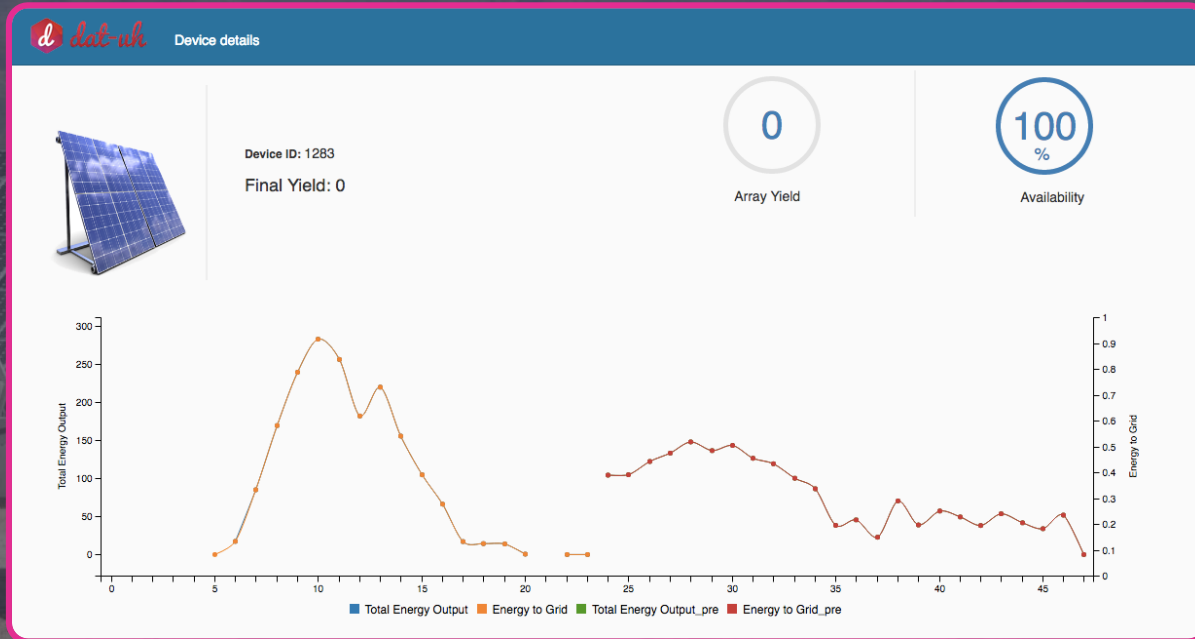
Current System



SCL1H2	0%
Temp: 23 Hum: 47	No charge
SCL2H1	0%
Temp: 27 Hum: 58	No charge
SCL2H2	1%
Temp: 72 Hum: 20	Critical
SCL2H3	4%
Temp: 36 Hum: 47	Critical
SCL2H4	5%
Temp: 44 Hum: 77	Critical
SCL3H1	9%
Temp: 67 Hum: 53	Low



Renewable energy asset utilization



INCREASE REVENUE

Ability to sell on the day-ahead market

REDUCE COSTS

Minimize penalties for inaccurate forecasts during scheduling

REDUCE CARBON FOOTPRINT

Know when to use more renewables vs. buying energy on the real-time market



Dat-uh Automated Analytics

- Bridging the gap in IoT data acquisition and operationalization
- Automates predictive analytics
- No need for you to monitor the performance of your model and decide when and how to retrain it - the self-tuning engine monitors performance and ensures it remains optimal at all times.
- No need for you to scale out as you get more data
- Lowers the total cost of analytics ownership



Automated analytics makes it easier to...

Eliminate unnecessary
maintenance tasks

Reduce component
replacement costs

Extend asset lifecycles

Reduce unplanned downtime





THANK YOU

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