

Industrial Internet in Business and Society

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Tieto is Committed to Develop Society Through Technology

Turnover in 2014: EUR 1523 million

Services support operations that are critical for society

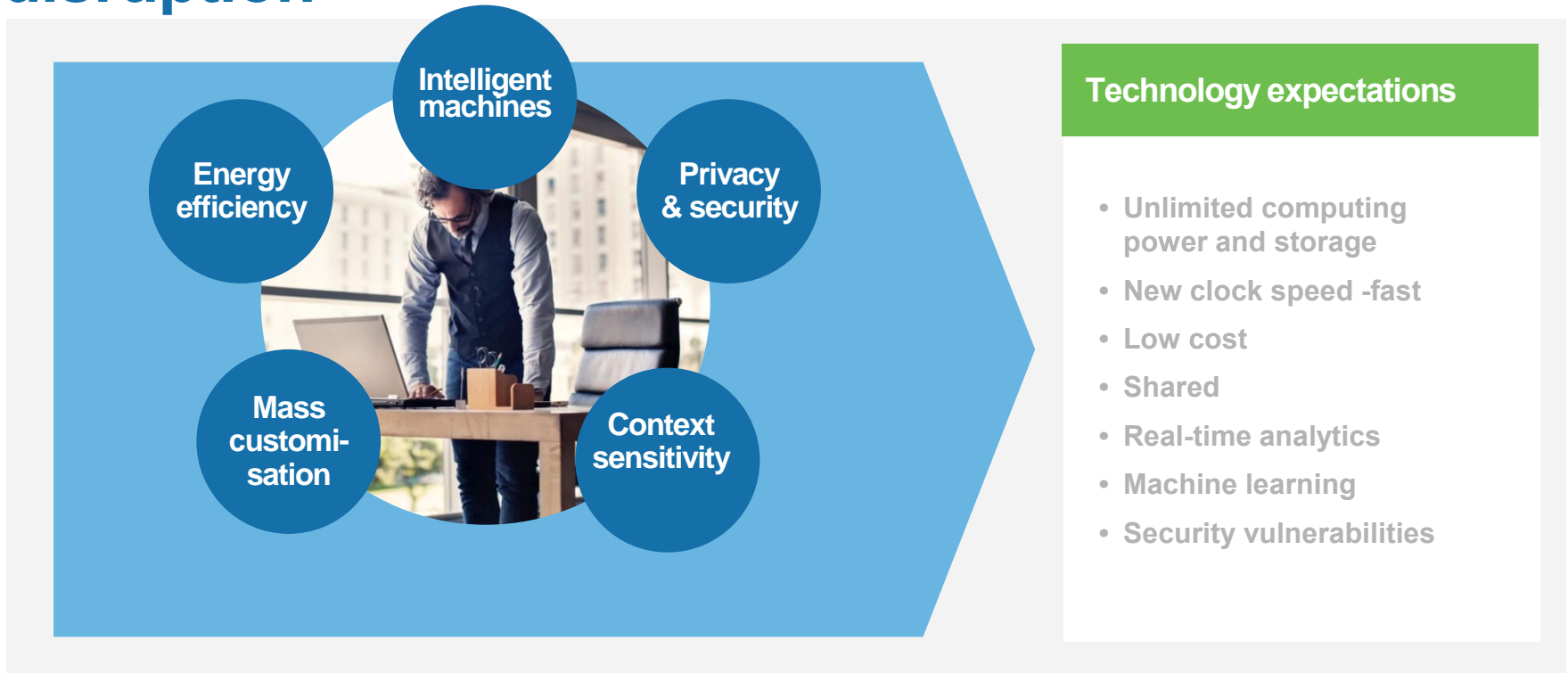
Recognized for achievements in corporate responsibility



More than 13 000 IT professionals, of which over 4 000 in Finland

Invest more than EUR 100 million annually in technology

Digitalisation is centred around each individual and is pushing the limits of technology towards disruption



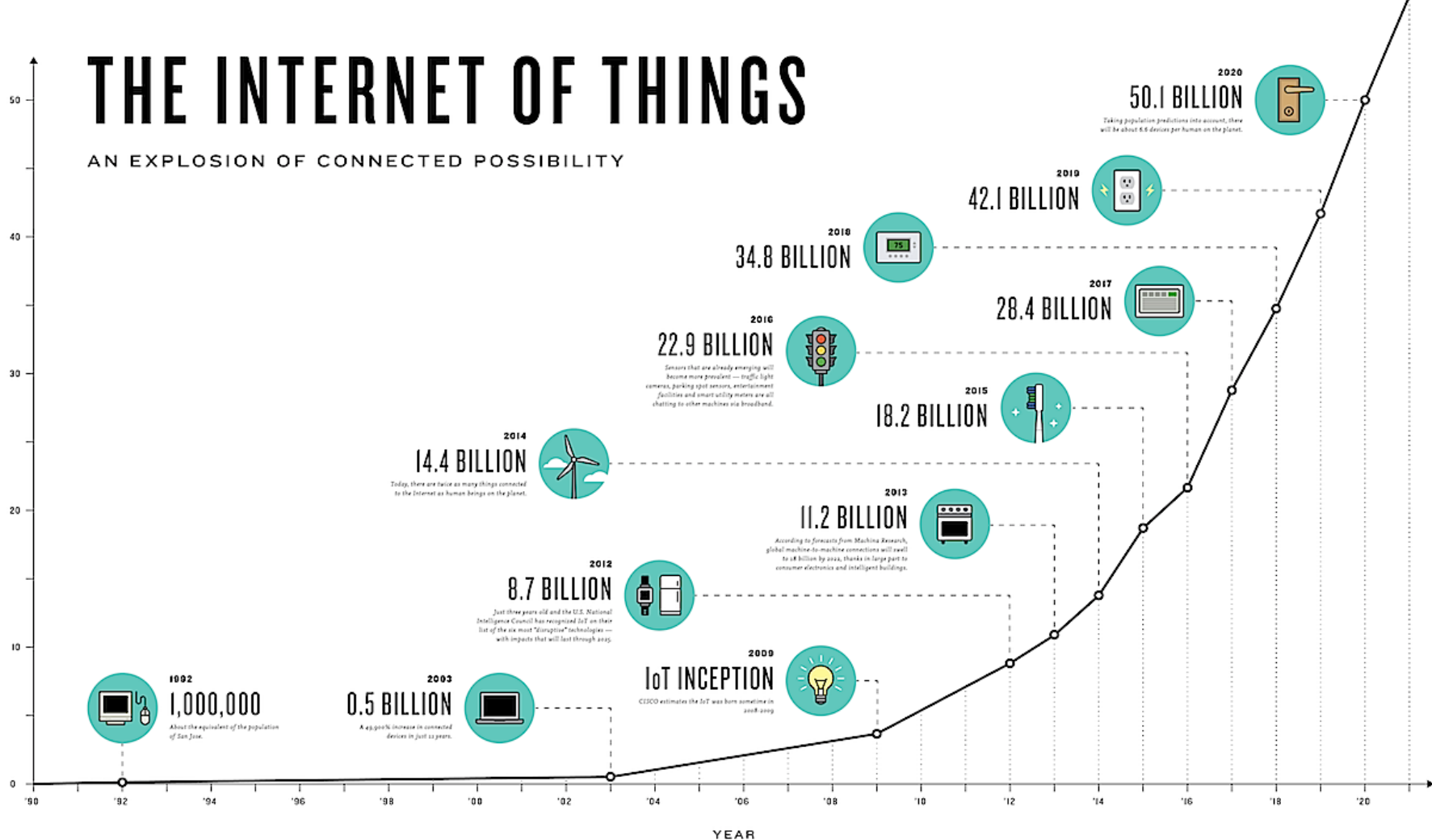
What is Industrial Internet?

- Wikipedia definition:
- The **industrial internet** is a term coined by General Electric^[1] and refers to the integration of complex physical machinery with networked sensors and software. The industrial Internet draws together fields such as machine learning, big data, the Internet of things and machine-to-machine communication to ingest data from machines, analyze it (often in real-time), and use it to adjust operations

THE INTERNET OF THINGS

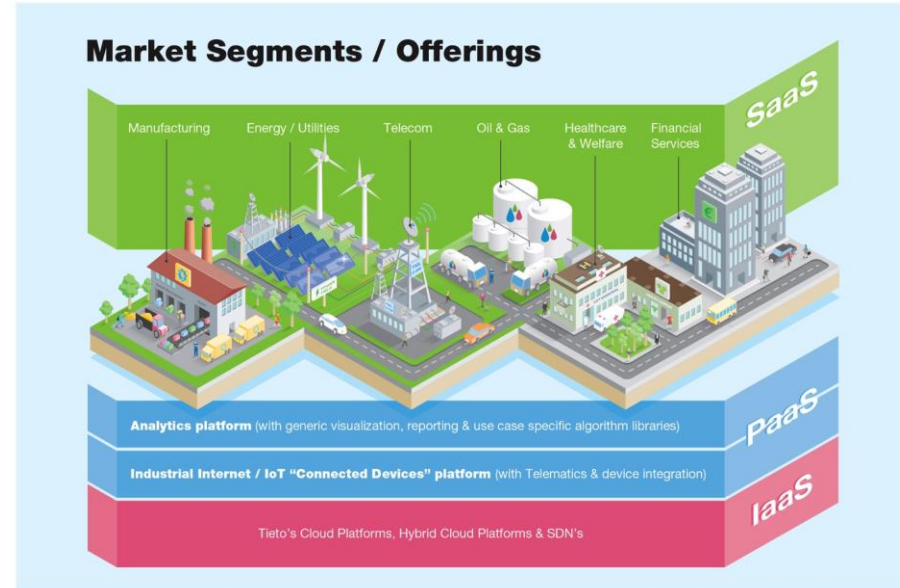
AN EXPLOSION OF CONNECTED POSSIBILITY

BILLIONS OF DEVICES



Tieto connects intelligent people, machines and processes.

- Tieto Industrial Internet integrates physical machinery, smart processes, big data and advanced analytics.
- Data is collected from intelligent machines for analysis, optimization of processes and ensuring more efficient businesses.



Industrial Internet in Business and Society

AGRICULTURE

Analyzing planting, growth, fertilization and harvesting processes.

FORESTRY

Integrating forestry machines to ERP systems for measuring harvesting volumes and providing operators with instructions.

ENERGY

Measuring and optimizing energy intake and consumption.

MEDIA

Providing online dimensions to traditional offline services, while providing media owners valuable information on media usage.

PUBLIC SECTOR

Public services, such as infrastructure, citizen participation and transport can be made more transparent and interactive.

FINANCIAL SERVICES

Collecting and analyzing data and automating transactions and investments.

MANUFACTURING

Collecting, measuring and analyzing data for better performance.

LOGISTICS

Tracking stock and transportation, monitoring location and optimizing routes.

HEALTHCARE & WELFARE

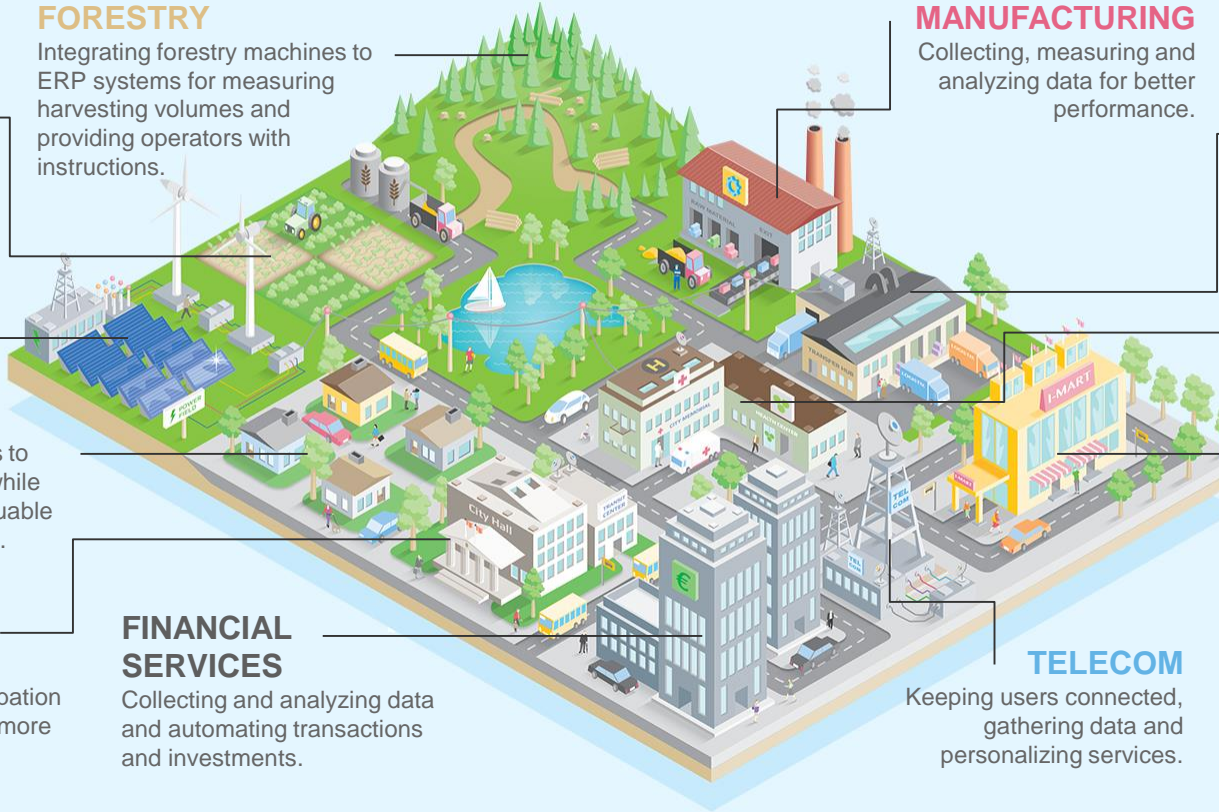
Vital and realtime collected data improves your daily routines as well as the freedom quality for your client.

TELECOM

Keeping users connected, gathering data and personalizing services.

RETAIL

Automating stock, services and tracking consumer shopping habits.



Examples of The Importance of Big Data and IoT for the Economy

- **Revolutionizing Healthcare**

- Better healthcare, better medicine, telemedicine, better quality medical diagnosis, less error, longer life, direct utilization of Human DNA

- **Better results from Education & Learning**

- Better tools for institutions to improve the outcomes for each individual student

- **Smarter and more effective Transportation & Logistics**

- Smarter, more automated transportation, cars, trucks, rail traffic, sea transportation, minimized energy consumption, optimized routes, less pollution, less traffic jams

- **New Paradigm for Energy consumption, production and delivery**

- Real-time monitoring and control, analysis, consumption forecasting on individual level as well as for societies and nations. Less energy spill, less waste and pollution. Better utilization of natural resources.

Examples of The Importance of Big Data and IoT for the Economy

- **Improved and more sustainable everyday products around us**

- Products become more intelligent and aware of the users and circumstances where they are being used
- New products make life easier

- **Safety & Security**

- Less crimes, less terrorism, less accidents, better defence

- **Banking and Financial Services**

- Real-time economy
- Better management of financial risk
- Better financial analysis and forecasting, anti money laundering
- Better financial products through understanding the customer needs.

Changing perspectives™

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