



Aalto-yliopisto

Business Pitch

Project number and name: Project # 1-3
Distributed intelligent production involving remote actors

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Need

- Companies need logistic robots for flexible automation (costly)
- More and more different devices are needed in manufacturing facilities, like AGVs (automated guided vehicles)
- Demand for better interoperability and technical service, even for remote facilities (long distances)
- Solutions are limited to high investments that can be expensive for factories as buying their own AGVs
- A lot of manual work in warehouses and logistics still today: business opportunity!

Approach

- Solution: provide affordable and interoperable AGVs solutions to companies as a service
- Leasing of robots for factories with service contracts to industrial companies with respect to time
- Use of MiR 100 robots: remote control and setup of robots provided
- IPSec/OpenVPN connections
- Wireless integration to automation systems

Benefits

- Customer doesn't have to buy AGVs themselves: saving money with leasing
- Reduces workforce needed in warehouses and factories: more money saved → reduced costs
- Cheaper products for end user
- Benefit for the provider: steady cash flow from service contracts
- Money for the provider also from licensed software interface



Markets

- Automated Guided Vehicle (AGV) Market in 2019: USD 3.0 Billion, expected to grow (source: grandviewresearch.com), in Euros: 2.5 Billion
- Global industrial automation market size in 2018: USD 157.04 Billion, expected to grow (source: marketwatch.com), in Euros: 130 Billion
- Our market share estimation of AGV business in 5 years: 35 Million Euros, about over 1 % of the global market

Competition

- Key players and competitors in AGV market: Toyota Industries Corporation, Dematic (KION Group), Swisslog Holding AG (KUKA Group), Omron
- Key players and competitors in global industrial automation: ABB, Siemens, Mitsubishi Electric
- Our solution's advantages: factory can get AGVs with our leasing contract for 10 years, no need to buy!
- Remote control and setup of robots provided by us
- Reduce overhead costs of owning assets and incidental services expenses