SMART FACTORIES

Computer Vision

- Algorithm development
- Camera hardware
- Quality inspection
  - Few-shot learning
  - eXplainable AI
  - Based on WiseEye
- Defect detection

Wiring Harness

- Improvement
  - ,product design (cable, connectorS)
  - process automation
- Replacement
  - Wireless (RFID, Li-fi)

3D Printing

- AI based
  - Cost analysis
  - Monitoring & control
- Tool design automation

Digital Twins

- Sensors(multisensor, noise based)
- Data compression & Transmission
- Real-time condition monitoring
- Cloud infrastructure

Cobots

- Machine learning: Control & close tracking
- Cobot control via VR
- Automatic teaching of AR based cobot

Wireless Transmission

- Energy (near-field/far-field)
  - magnetic field/resonance/waves
  - IR, Light
  - Ultrasound, Radio Frequency
- Information (Li-fi)

HYUNDAI | KIA | UNKNOWN