



# Analyst meeting

November 15th 2023 - Kortrijk

**BARCO**

# Agenda

1. Welcome and coffee
2. Deep-dive ClickShare with visit ClickShare Experience Centre
3. Lunch meeting with An Steegen, Charles Beauduin and Ann Desender
  - Presentation innovation and Q&A
  - Deep-dive operations and focused factories
4. Barco Labs with live demos on innovations and product launches



# Meeting Experience

Stijn Henderickx and Jan van Houtte

Analyst Day – Kortrijk – November 15th 2023

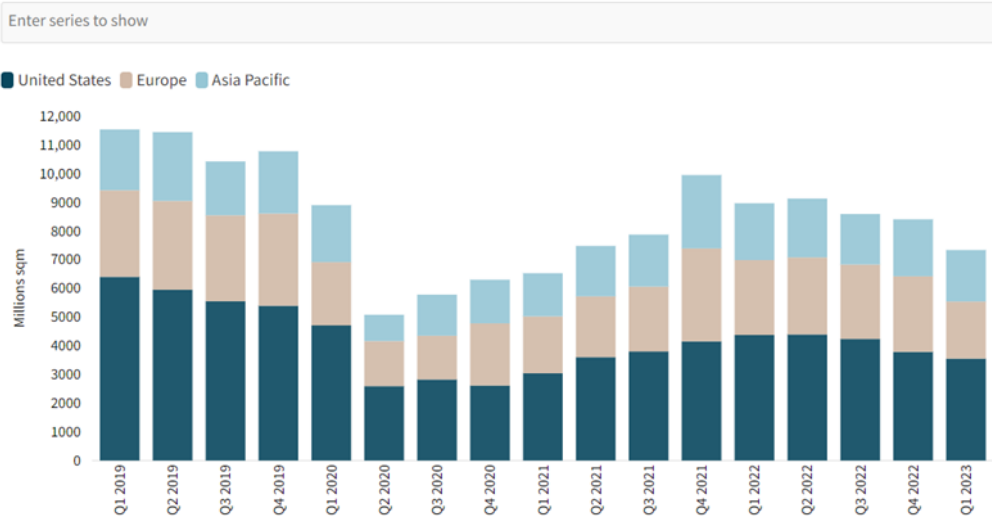


# Mid to long-term prospects are positive for meeting room related technology

## Reduced office space

Declining leasing volumes and increasing vacancy rates now **hybrid work** has finally settled

Quarterly global office gross leasing volumes, Q1 2019 - Q1 2023

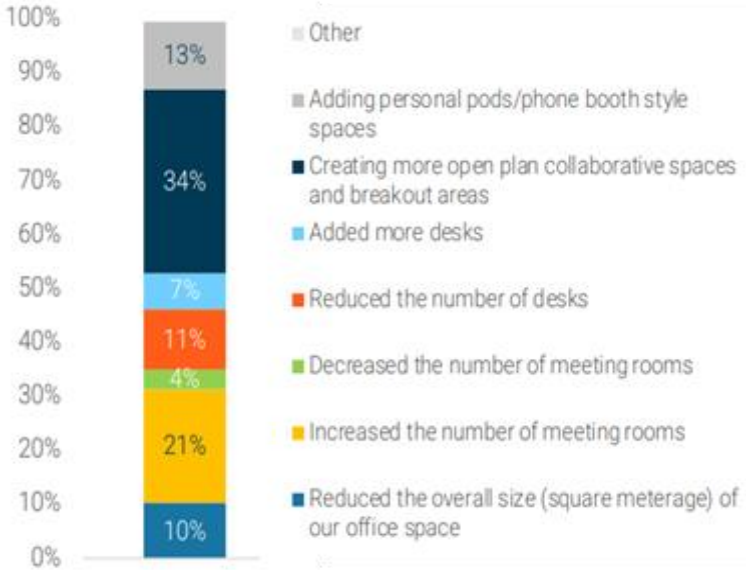


Source: JLL, May 2023  
23 markets in Europe; 50 markets in the U.S.; 22 markets in Asia Pacific.

Source: JLL May 2023

## Increased focus on meeting rooms

Collaborative work with colleagues as key driver for "return to the office" requiring higher investment in **collaboration technology** and more **flexibility**



Source: Futuresource May 2023

# ... but with short-term market softness



## Micro economic challenges

- Companies' IT budgets and COVID-time investment being under additional scrutiny
- Investment cycles became longer – cost of cash
- Return to office challenges and uncertainty



## Macro economic factors

- High inflation
- High interest rates
- Political uncertainty

# In 2023 we have further expanded our lead and strengthened our position



Launch of  
CX 50 Gen 2



Dual  
display



Flexible  
switching



XMS new  
user  
interface



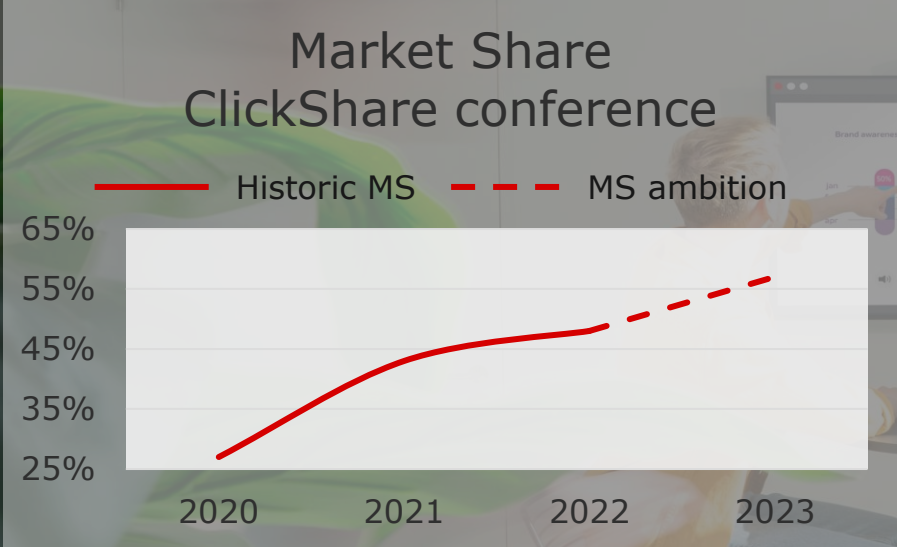
Investment in  
sales & marketing



R&D investments  
at the next level



# Barco is winning share in the agnostic market

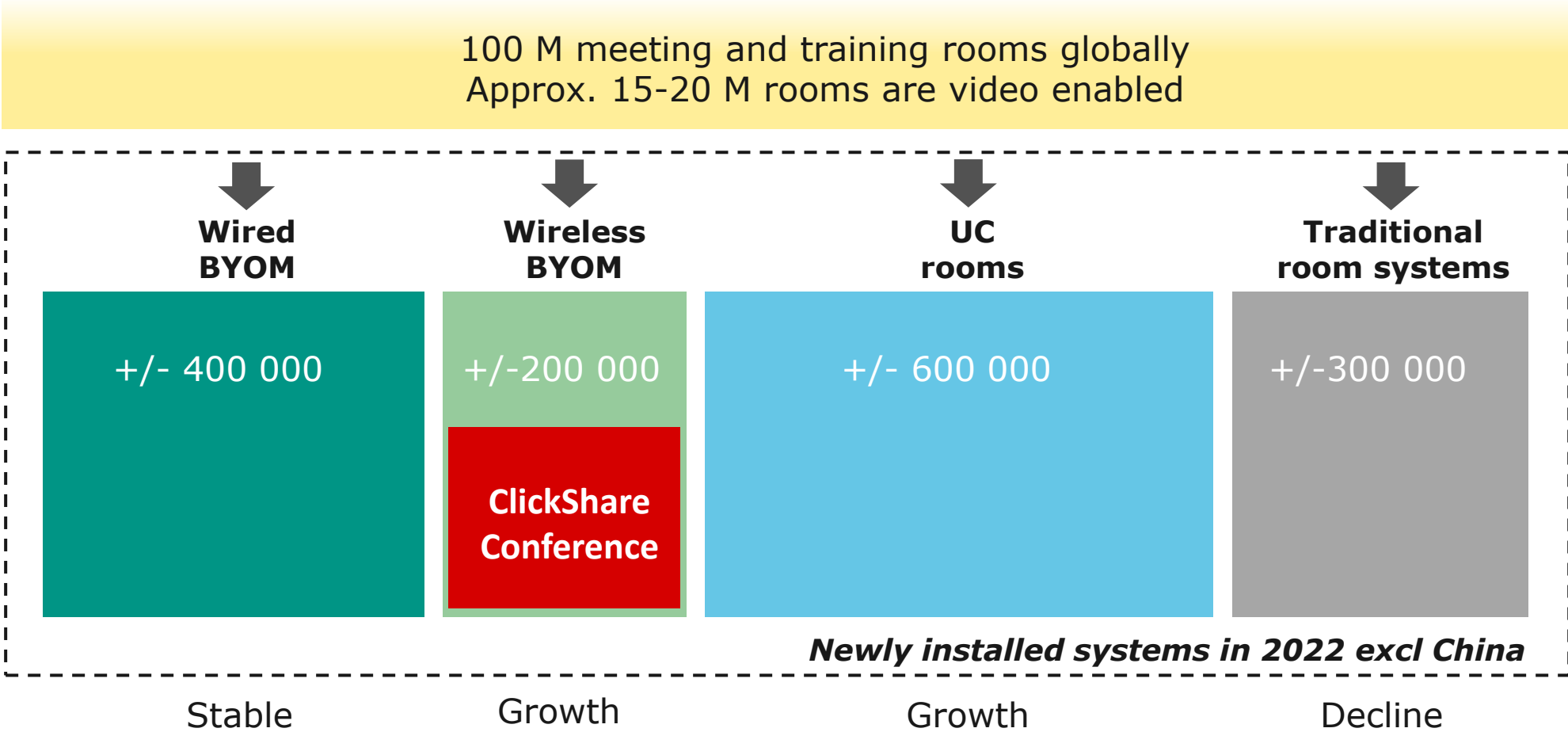


In volume, global corporate excl China

*"The biggest change in the market since 2021 has been the emergence of Barco as the clear global leader in Wireless Conferencing. While Barco has traditionally been strong in European markets, it has made up significant ground in the United States."*

FutureSource  
Global Video Conferencing Market Review  
August 2023

# Our perspective on the videoconferencing enablement market





A woman in a white top with an orange collar is presenting a line graph on a screen to a group of people in a meeting room. The graph shows data points connected by lines, with some points labeled with numbers. The room has a clock on the wall and a large plant.

**Improving our  
position with  
wireless BYOM**

**1**

# We bring ClickShare to the next level



## Product & Technology

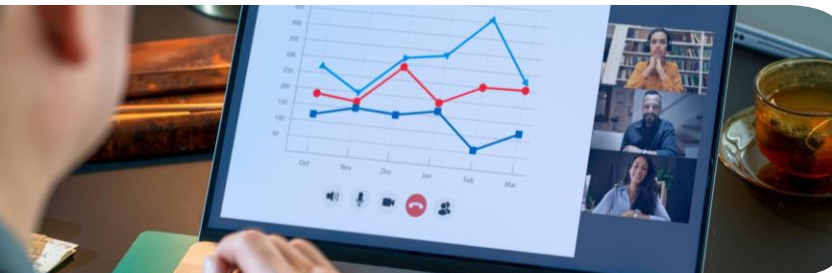
- Unique innovations and new features (e.g. Meeting room equit, LTS,...)
- Continuous improvement of customer experience (e.g. App score)
- New form factors

**All based upon deep technological insights, market understanding, customer and partner feedback.**



## Marketing

- Updated differentating brand positioning
- Increase awareness of the ClickShare offering
- Focus on IT manager



## Service

- Direct Barco end customer support
- New in-house team as of January

# Protecting and monetizing our IP with assertive follow-up in the market



Sep 10, 2023



## Barco and Crestron announce patent license agreement regarding a set of essential ClickShare patents

Kortrijk, Belgium and Rockleigh, New Jersey, September 12, 2023 – Barco and Crestron Electronics, Inc., both global leaders in workplace technology, have entered into a global patent license agreement earlier this year. This enables Crestron to utilize some of Barco's ClickShare patents for Crestron's own collaboration solutions, including AirMedia® wireless conferencing and presentation systems. The agreement will further spur growth of solutions for the BYOM market with the development of additional presentation and conferencing solutions.

In today's working environment, 60% of workers still face technical challenges when they're joining a hybrid meeting. The Bring Your Own Meeting (BYOM) concept enables users to host calls from their own laptop with their preferred conferencing solution, using the audio and video equipment in the meeting room. Because of the growing interest in hybrid meetings, Barco and Crestron expect the market for wireless conferencing systems to accelerate significantly over the coming years.

Barco has been leading the BYOM market, with innovations covered by patented inventions. The company will continue to develop collaboration technologies that put the user at the heart of the experience. Moreover, the agreement between Barco and Crestron aims to further spur the growth of the BYOM market, with each company investing in technology that enables collaboration with a simple experience for employees.

"Our customers expect fully integrated solutions that make workplace collaboration simple. With this agreement we will bring robust wireless conferencing based on Barco's ClickShare intellectual property to our popular digital workplace technologies to meet the growing demand for BYOM solutions," said Andrew Ludke, Senior Director, Product Management at Crestron.

"Intellectual property is at the heart of technological innovation, so it must be embraced and safeguarded," said Stijn Henderickx, EVP Meeting & Learning Experience at Barco. "This agreement between Barco and Crestron demonstrates that mutual beneficial solutions can bolster development and innovation in the market, while recognizing the value of patents and intellectual property."

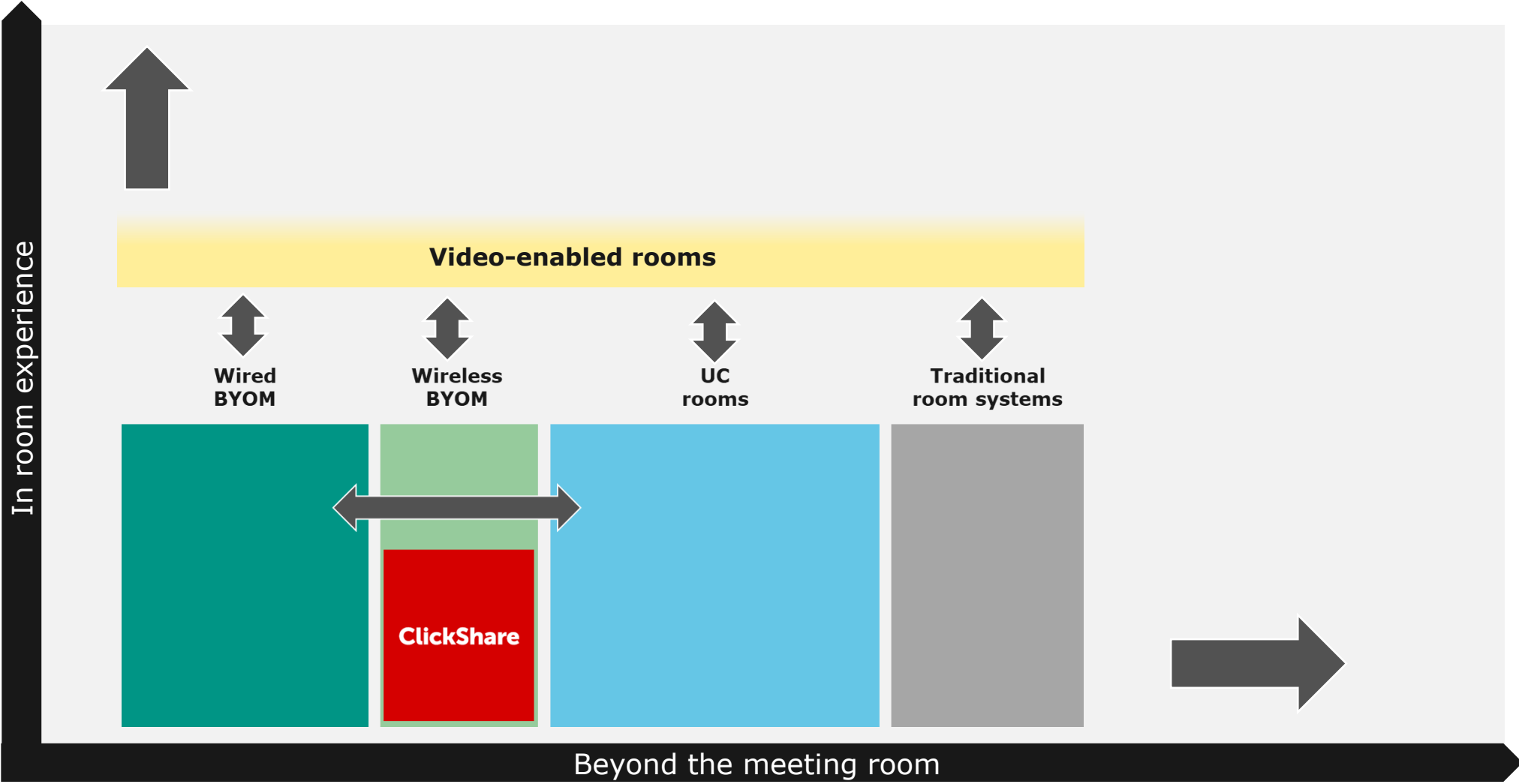
Innovation is an essential part of Barco's DNA. In particular to ClickShare, Barco has obtained more than 50 patents in major jurisdictions like EU, US and China. The patents cover a broad range of innovative wireless presentation and conferencing features, underlining ClickShare's simplicity and ease of use. Barco continues to closely monitor the wireless presentation and conferencing market. The company has built a strong track record in enforcing its intellectual property rights against companies copying ClickShare's unique features.

A group of four people (two men and two women) are sitting around a light-colored wooden table in a modern office setting. They appear to be in a meeting or collaborative work session. In the background, there is a large screen displaying a video conference with several participants. To the left, there is a black metal shelving unit with several colorful binders. The room has large windows on the right side, providing natural light. The overall atmosphere is professional and collaborative.

# Moving outside wireless BYOM

# 2

# Extending our role within the video conferencing enablement market and growing along two axes



# Strong confidence in the future



**Thank you!**





# Innovate for impact

Overarching technology themes behind Barco's innovation strategy

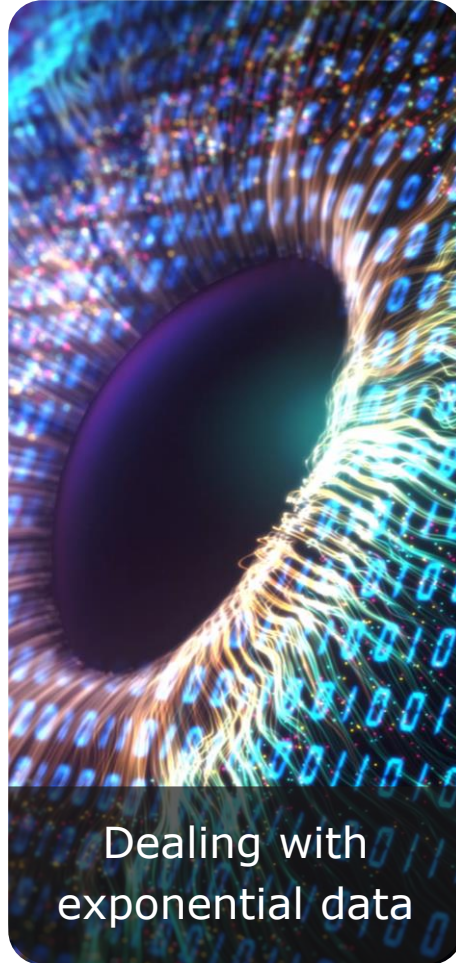
An Steegen

November 15th 2023 - Kortrijk

**BARCO**



# Technology themes that connect and inspire us

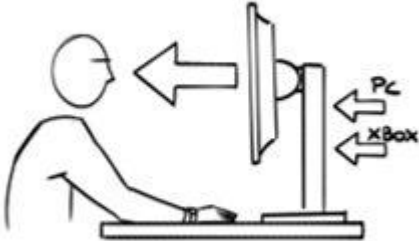




# 1. Changing paradigms of visualization

# From passive to ubiquitous visualization

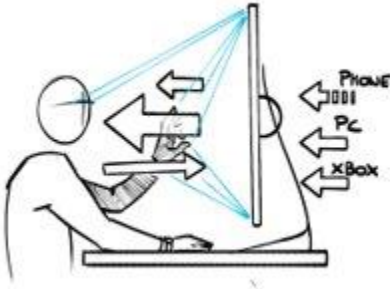
**Static Era**  
"Passive visualization"



**One-directional visualization**

*Visualization acts as the peripheral only*

**Interactive Era**  
"Dynamic visualization"



**Bi-directional visual experience**

*The user, the content & the visualization device all interact with each other dynamically*

**Ubiquitous Era**  
"Seamless visualization"



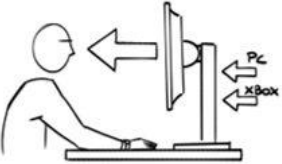
**Symbiotic lifelike experience**

*Visuals merge seamlessly with the real world.  
Any content, anywhere*

# From passive to ubiquitous visualization

## Static Era

"Passive visualization"



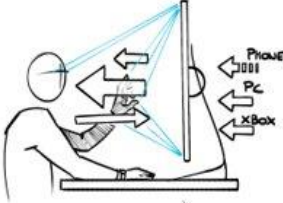
One-directional visualization



## Interactive Era

"Dynamic visualization"

Today



Bi-directional visual experience



## Ubiquitous Era

"Seamless visualization"



Symbiotic lifelike experience



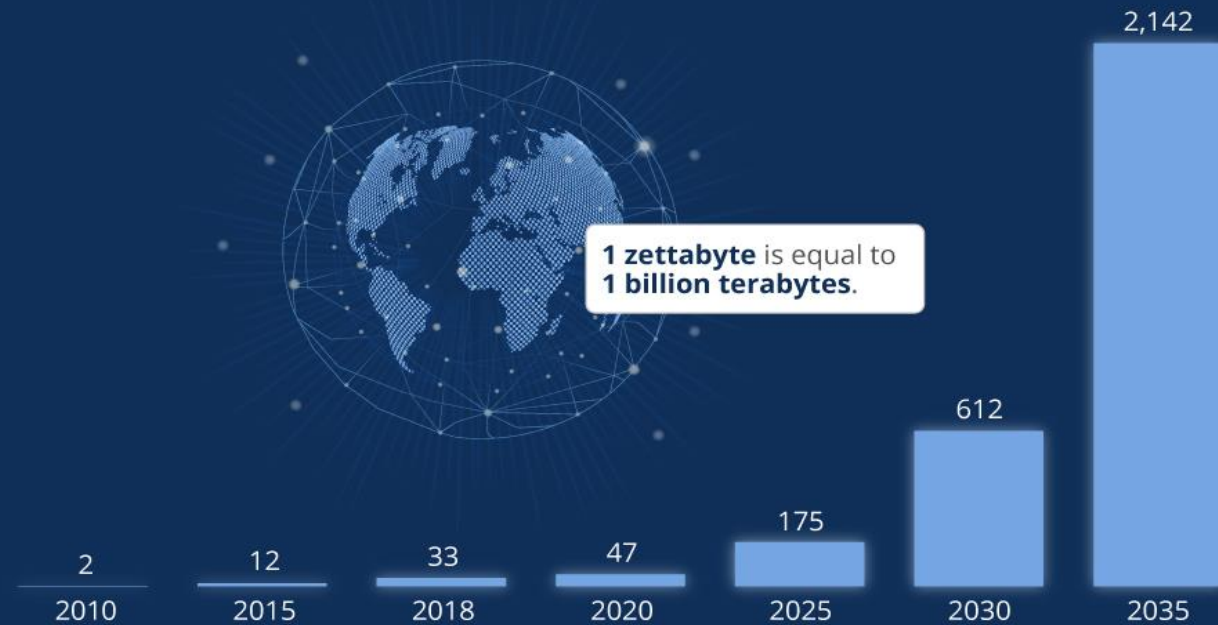
The background features a digital tunnel of binary code (0s and 1s) in shades of blue and green, receding into a central black circle. The text is overlaid on this background.

## 2. Dealing with exponential data

# Visualization takes the lead

## Global Data Creation is About to Explode

Actual and forecast amount of data created worldwide 2010-2035 (in zettabytes)



- Data is growing exponentially
- The best way to obtain insights is through **smart visualization**
- Visualization is not an interface anymore but becomes **THE** platform for meaningful insights



@StatistaCharts Source: Statista Digital Economy Compass

statista

BARCO

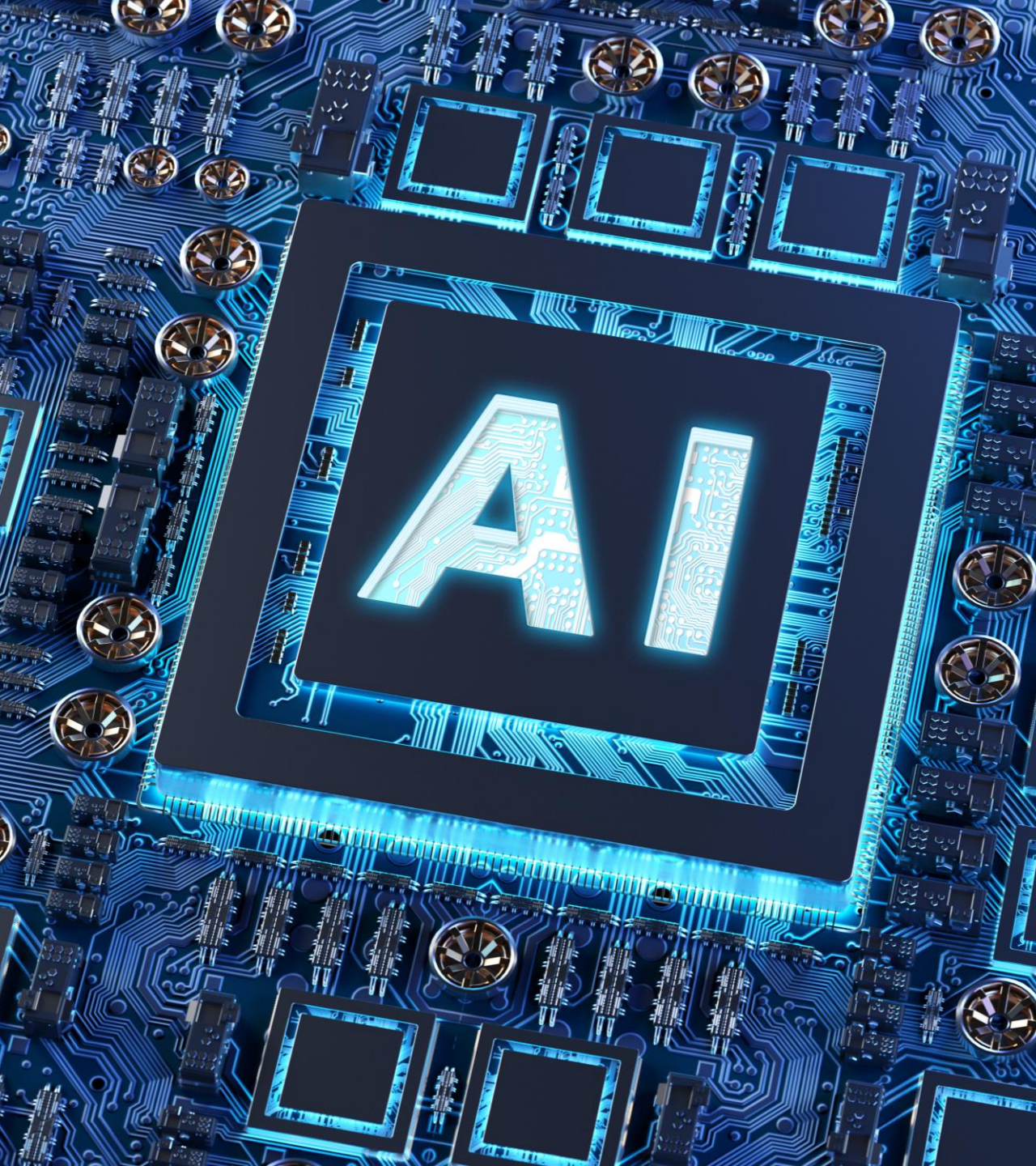
# Data-driven Barco innovations





### **3. Real-time compute and AI**





## **GPUs satisfy the needs of both advanced AI algorithms & real-time compute requirements of our applications**

- GPU&CPU based platforms along with game engines (like Unreal) are starting to gain significant momentum in the AV industry
- Connectivity, Compute & Image processing are all converging to such new platforms
- At the same time, AI models for future workflows need the accelerated compute that GPUs can provide

# Light Steering

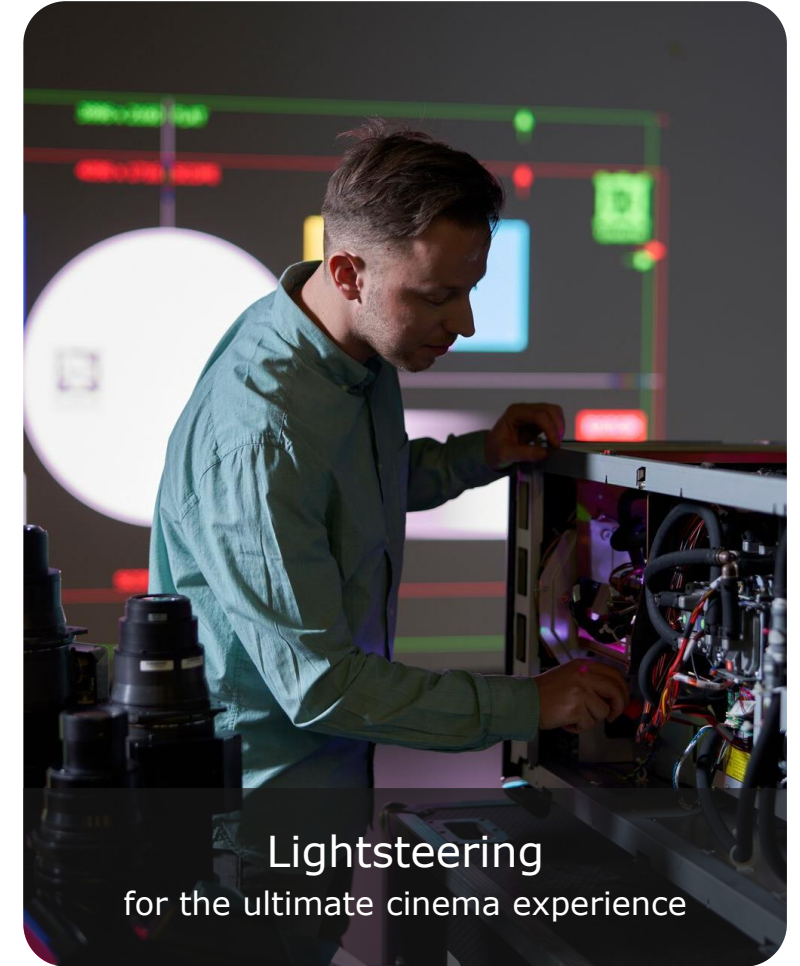
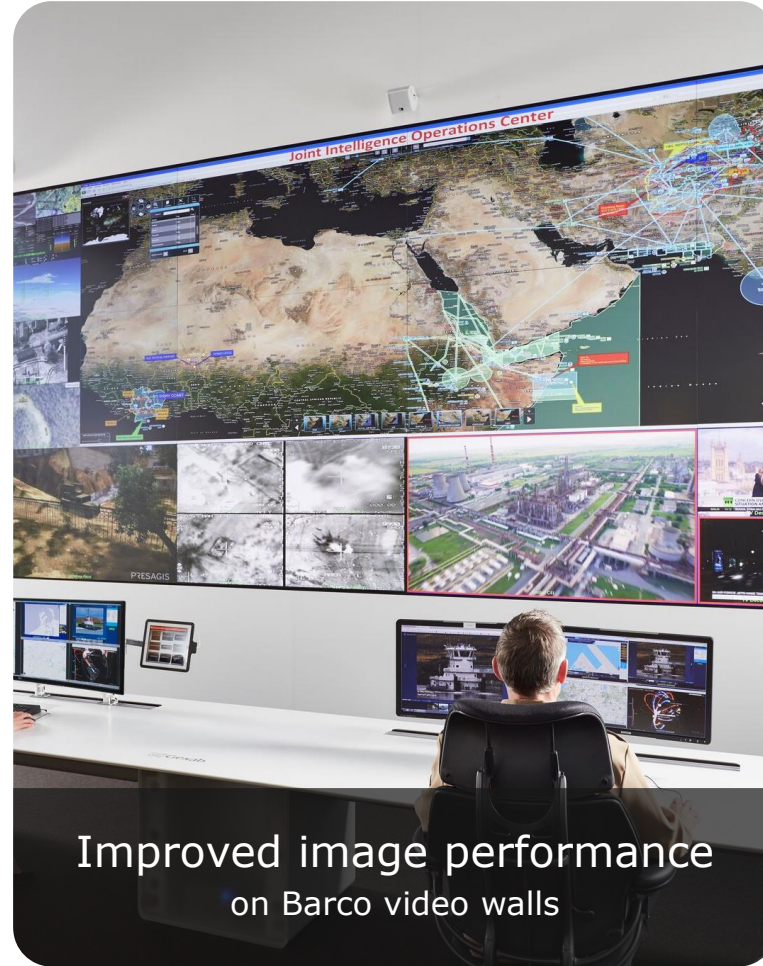
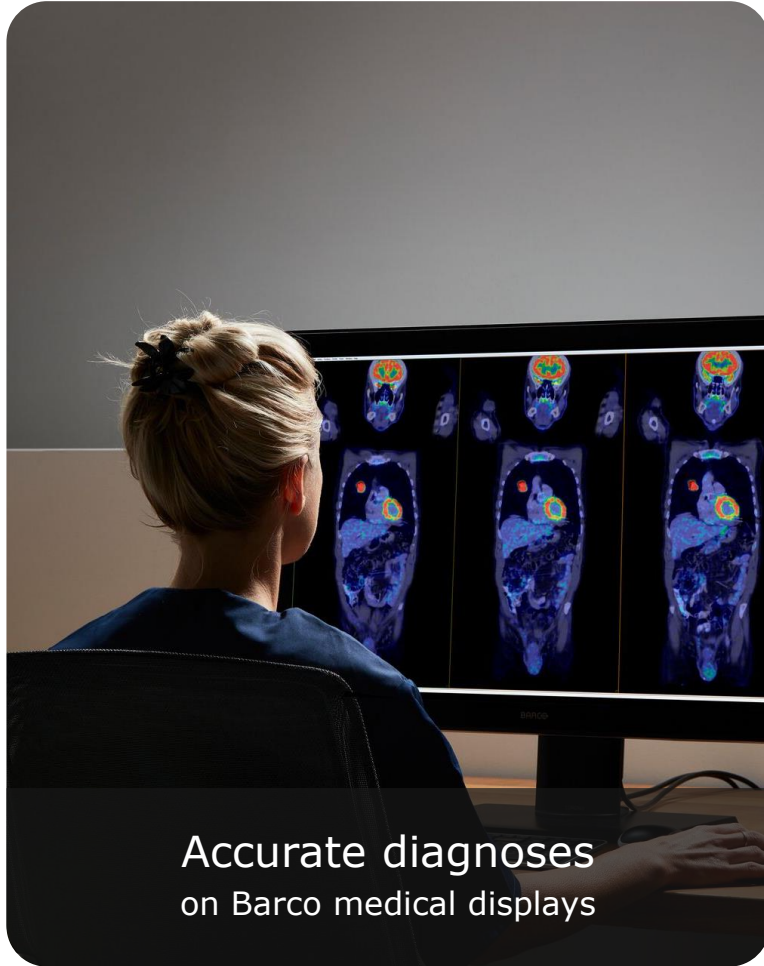


A person is seen in silhouette, looking up at a large, vibrant, abstract digital display. The display features a complex, multi-colored pattern of blues, purples, pinks, and yellows, resembling a nebula or a microscopic view of a material. The person is standing in a dark room, and the display is the primary source of light. The overall scene is immersive and artistic.

## 4. Raising the bar on image quality

3

# The pursuit of high image quality remains key



# 5. Sustainability and impact





# Innovation with the planet in mind

## **Energy performance**

We design with a strong focus on energy efficiency

## **Use of materials**

We choose recycled and durable materials

## **Packaging & logistics**

- We use light packaging that can be fully recycled and re-used
- We maximize the use of sea shipment to limit our end-to-end logistic footprint

## **Lifecycle**


We improve material efficiency and reduce the impact at end of life

# Sustainable innovations



**G50**

- Highest Lm/W in the market
- Long-lasting laser phosphor light



**CX-50**

- Carbon neutral
- Ecological packaging
- Designed for recycling



**OverView MVL**

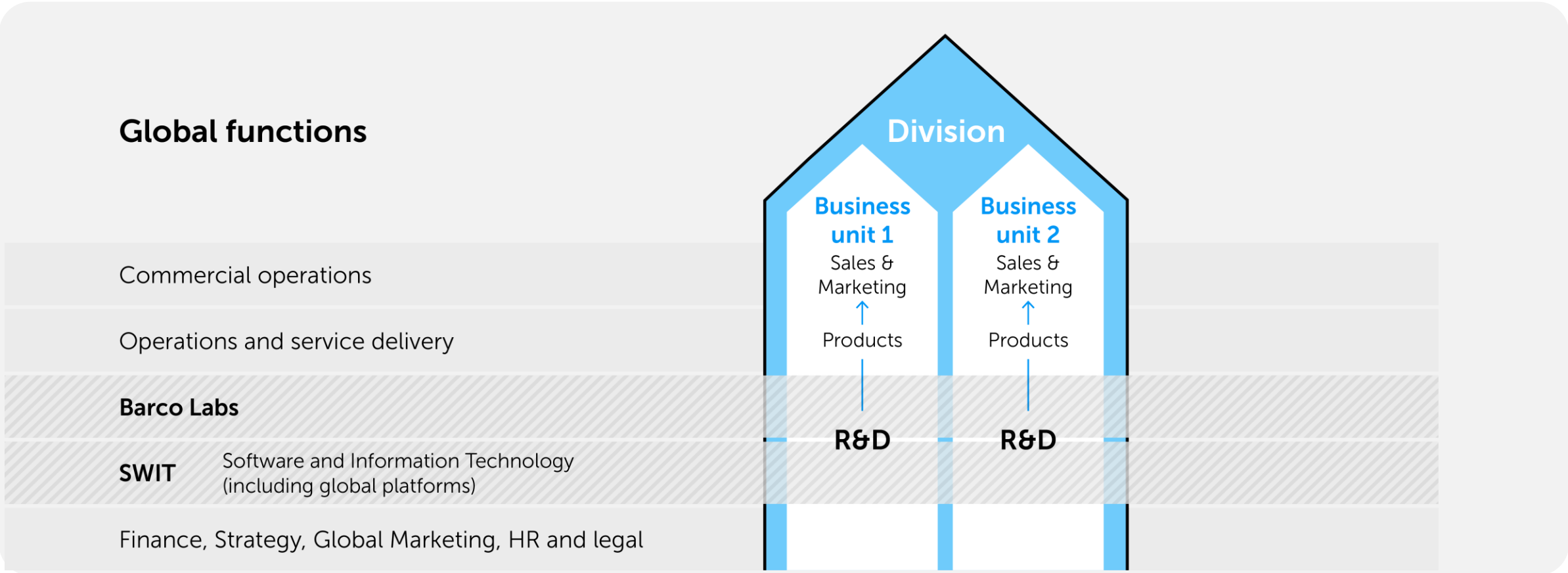
- Limited power consumption
- Long lifetime
- Ability to upcycle

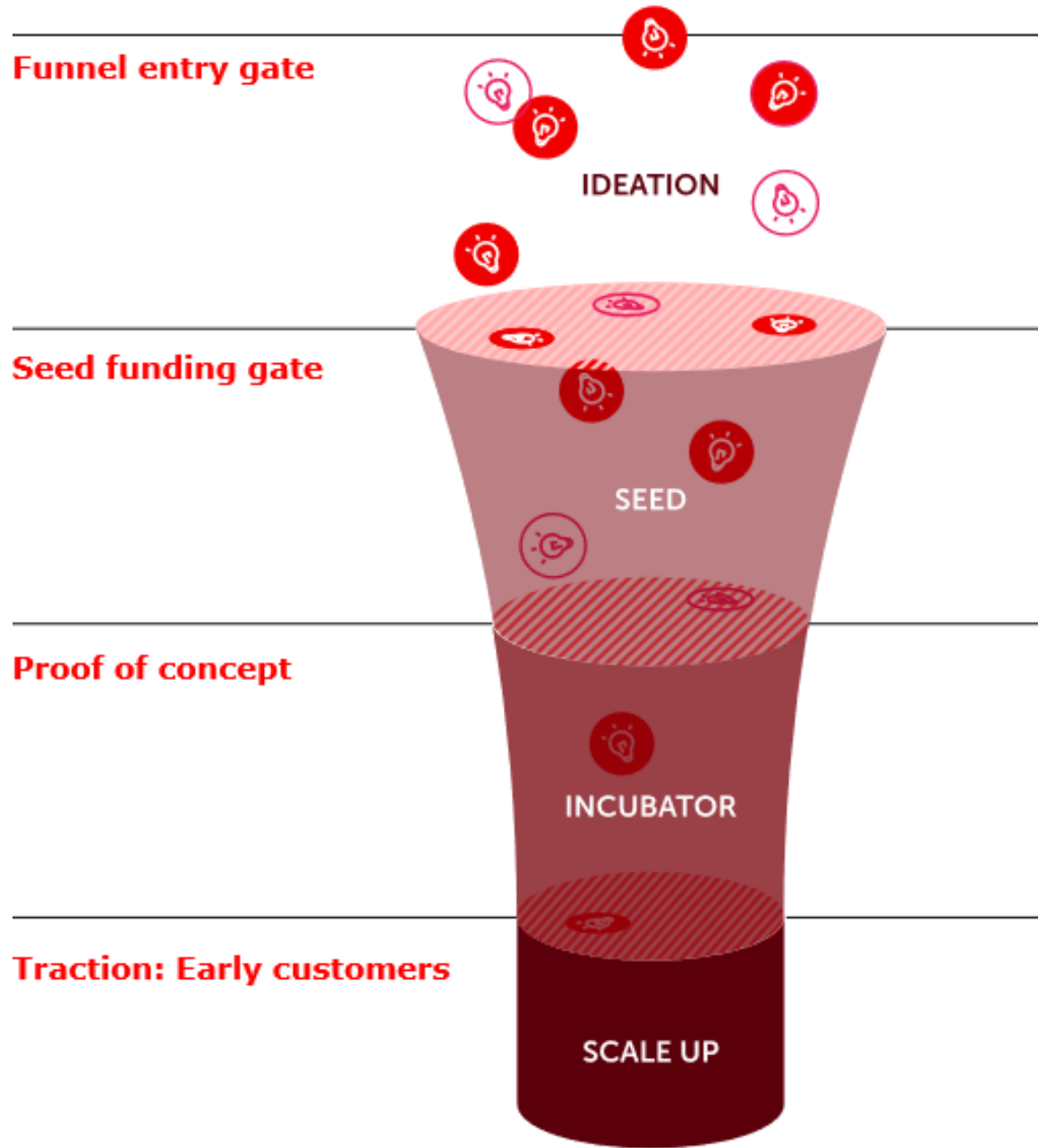


**How does Barco execute on these technology themes?**



# Centralized Barco Labs at the core of disruptive innovation

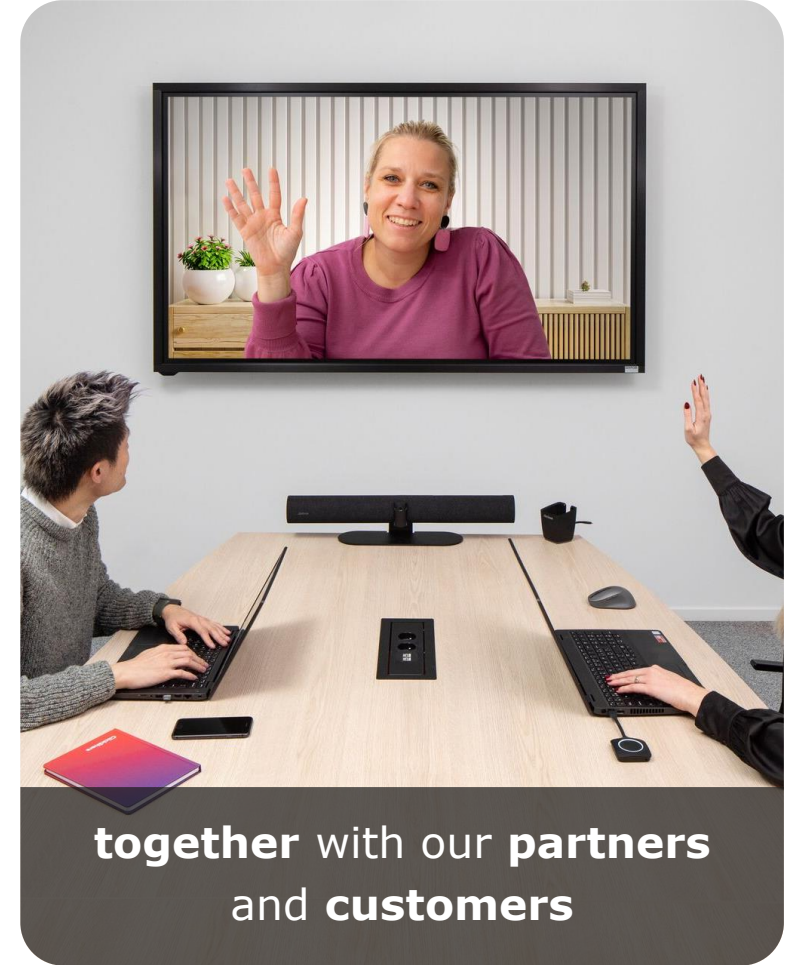
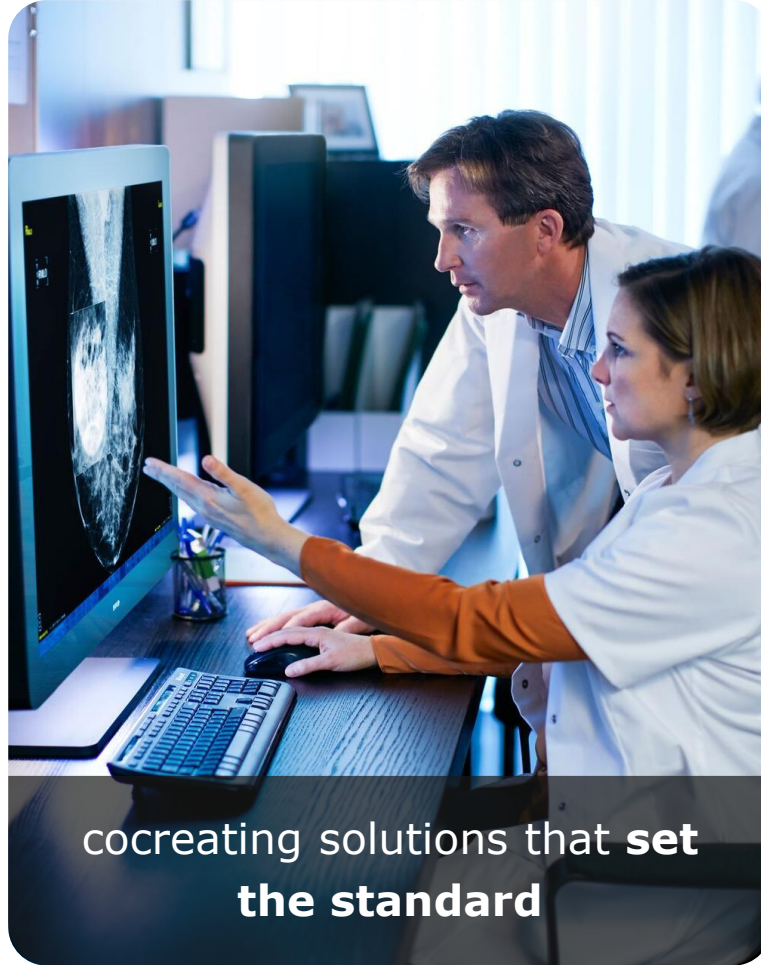
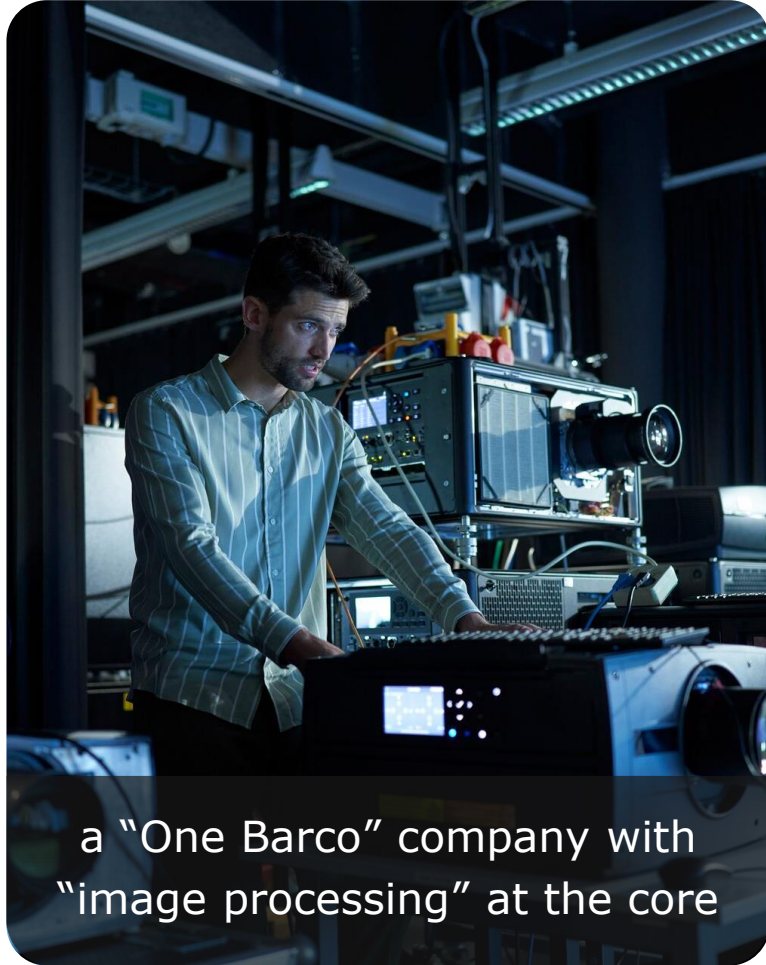




## An innovation framework focused on technology themes

- Barco Labs works in tandem with all BU stakeholders in this internal corporate venturing framework to bring new disruptive ideas to market
- New disruptive ideas can be presented to the innovation board run by the Co-CEOs & CTO throughout the year
- Seed & Growth funding is provided during the funding rounds to selected proposals
- Successful projects are then transitioned to Business Units

# In summary



The background of the slide features a vibrant city skyline at night, with various skyscrapers and lights. Overlaid on this are the dark silhouettes of five people, their arms raised in a celebratory gesture. The scene is bathed in a blue and orange glow, suggesting a sunset or sunrise. The overall composition conveys a sense of achievement and forward momentum.

# Manufacturing strategy

Transitioning to Focused Factories

Analyst Day - November 2023 – Rob Jonckheere

**BARCO**

# Global Operations – overview

While building and ramping up new factories, overall supply is secured in a challenging market with high customer inventories



- Implementation of our **focused factories** is full execution
- **Healthcare transfer** to Suzhou and Saronno on track and Suzhou operating at high **productivity**
- Further investments in **vertical integration & automation** as well as **insourcing of Image Processing Devices** in Kortrijk
- Component **shortages disappeared** and **logistic costs normalized** (still higher than 2019)
- Sales linearity is lower than usual with **higher inventories** (internal and at customers)

# Manufacturing footprint

Wuxi factory operational in 2024 – transfers to Suzhou complete by mid 2024



# Investing in focused factories



## Recap CMD'22:

Barco is investing € ~100m over 2023-2025 to enhance its manufacturing capabilities

## Current view on manufacturing CAPEX

- 2023 so far spent: 20M EUR
- Total forecast 2023->2025: ~80 M EUR



## Manufacturing footprint

**Focused factories** to tailor and accelerate business unit specific solutions



## Manufacturing operations

**Deepening value chain position from assembly to manufacturing** (automated manufacturing & integrated automated warehouses)



## Service operations

Driving **Operational Excellence, 24/7 support and service digitization** (and advanced service business models)

# Focused factories – Suzhou Healthcare

Suzhou factory meeting the targets in terms of output, cost and quality



Transition plan from Kortrijk and Saronno largely on track

- **All products transitioned by end of 2023**, Kortrijk to stop Healthcare production by end Q1 2024

Local sourcing

- Full focus on **localization** leading to component **savings of 15-20%**

Process & Product Quality

- Drive **Productivity** (OEE=Quality\*Performance\*Availability as quality standard)
- **Targeting 80% OEE**

Automation and vertical integration

- **Expanding the manufacturing lines** to their maximum capacity
- Glass **bonding line** to be **installed** by end **Q4 2023**



# Focused factories – Saronno Healthcare

Moving to and integrated and automated warehouse next to enhanced production capabilities



- Goal
  - Integrate the **Milan sales** office, the **external warehouse** and tailor the dimensions to the needs of a mirror fab/R&D site
  - Planning to **start** building by **mid 2024** and **move** in by **Q1 2026**
- Status
  - **Plans submitted** to local authorities
  - Land **registration Q1 2024** and **build permit** targeted **Q2 2024**

# Focused factories – Wuxi Projection

Largely automated plant with integrated warehouse ready for Mid-Segment launch May 2024



- **Building of Wuxi site on track** with only a few weeks delay given heavy rain during summer period
- **ASRS** (Automated Storage & Retrieval System) **installed**, ready for test runs
- Plan to **automate manufacturing** of the **projector line** and **subassemblies** (lens holder, laser plate). Automated cooling assembly will be transferred from Changping.



BARCO

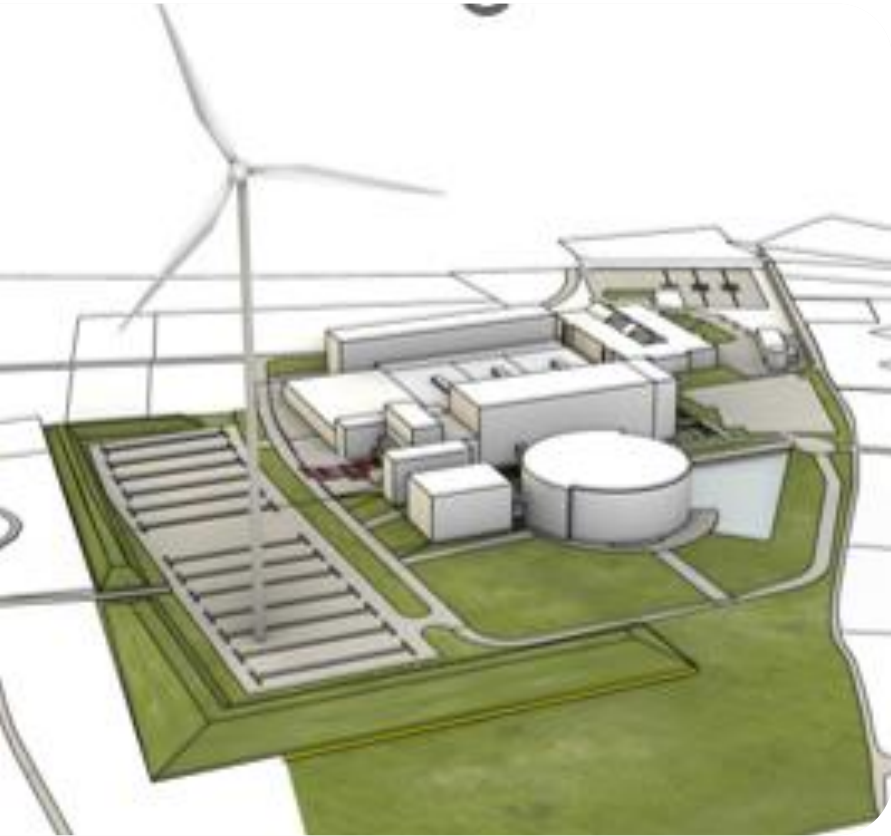
BARCO

铂珂(无锡)科技有限公司

Barco (Wuxi) Technology Co., Ltd.

# Focused factories – Kortrijk Projection

Planning to revamp the Kortrijk factory and integrate the Kuurne warehouse by end 2027



- **Healthcare transition** to Suzhou and Saronno **on track**
  - All **product** and **repair** activities to be **transferred by end 2023**.
- **Insourcing of (sub)assemblies**
  - **Image Processing insourced** with realized savings of 10-15%
  - **Transfer Xcite** on track and to be **finalized by end 2023**
  - Planning to **insource video controllers** by mid **2024**
- **Automation** plans and a new **Manufacturing Execution System (MES)** being **studied** to support an efficient production flow
- **'New' Kortrijk factory** and integration of the **Kuurne warehouse** are in concept phase

# Value creation in Manufacturing & Services

Transitioning from assembly to manufacturing supported by automation

## Value Creation in manufacturing



Move from Assembly to **Manufacturing**

Insource and drive **late point configuration** and **value engineering**

Enable **new features** and ensure **consistent quality** through increased **automation**

## Value Creation in service



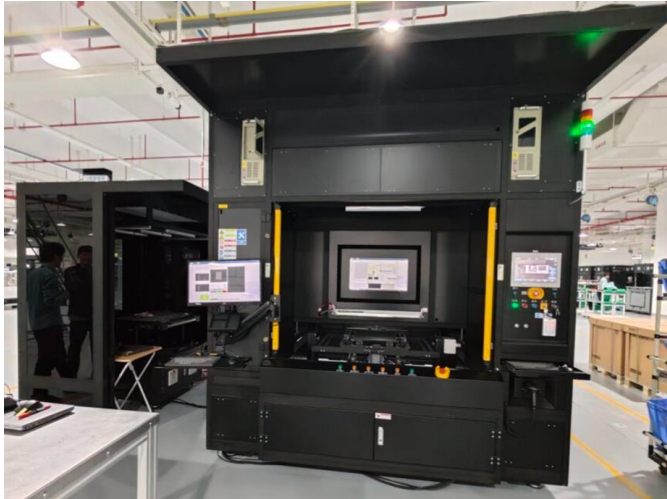
Globally connect the regional NOCs with **24/7** helpdesk, **'follow the sun'**

Enable **'same day delivery'** based on spare parts in worldwide hubs

**Enhance responsiveness** by deploying regional repair centres

# Suzhou Healthcare – insourcing

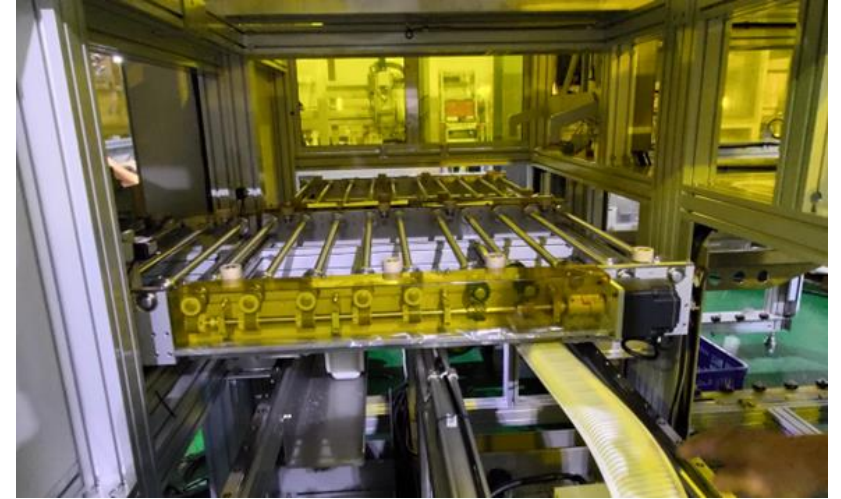
Fully automated bonding line supported by Automatic Optical Inspection of glass, LCD and assembly



Automatic Optical Inspection



Automatic bonding line

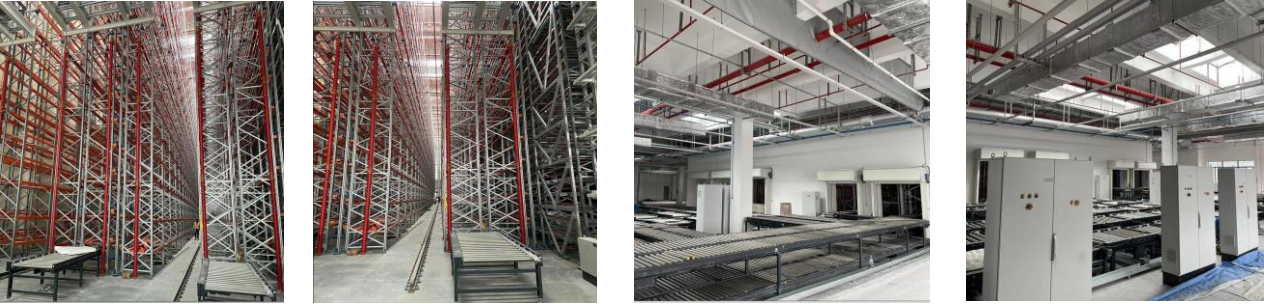


Automatic panel thickness measurement

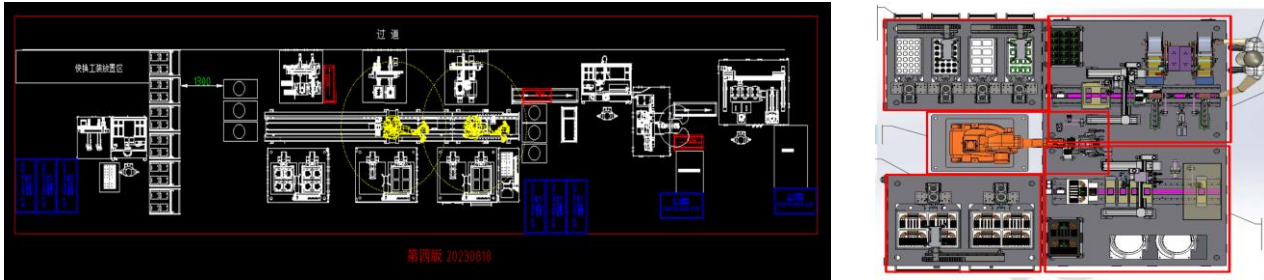
- Investment allowing automatic optical bonding up till 33"
- Installation planned in November, first bonding planned in January 2024

# Wuxi Projection – automation

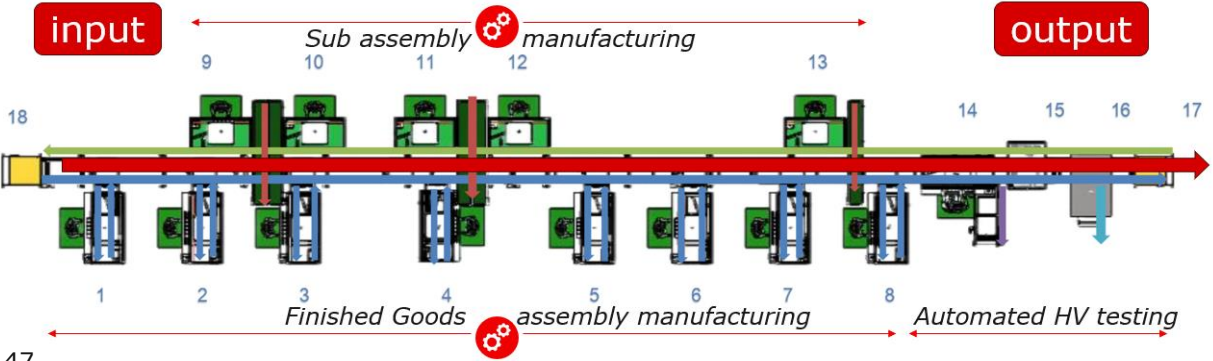
Automations in warehousing, lens holders & laser plates and mid-segment projection



**Automated Storage and Retrieval System** with automated material flow within the factory and Software Warehouse Management System connected to the Barco systems



**Automated work cells** for lens holder and laser plate manufacturing and testing



**Dedicated assembly line** to support mid-segment projection





# Kortrijk Projection – automation

Investing in automated manufacturing of laser banks and laser drivers

- Fully automated line for Laser Drivers and Laser Banks
- In production since 2023





# Conclusion

- Our **focused factories strategy** is in full execution with new 'highly automated and integrated' sites being built and transfer of products ongoing. Local component sourcing and efficient production are key.
- Our plan to **move from pure 'low added value' assembly to manufacturing** is gradually being implemented.
- **Automation and subassembly insourcing** will support Barco in driving quality, costs and will enable new features



# Visioneering a bright tomorrow

