Digital Transformation with Siemens

Digital Business Media Day
October 13, 2022 – Berlin, Germany

Rainer Brehm
CEO Factory Automation
Siemens Digital Industries

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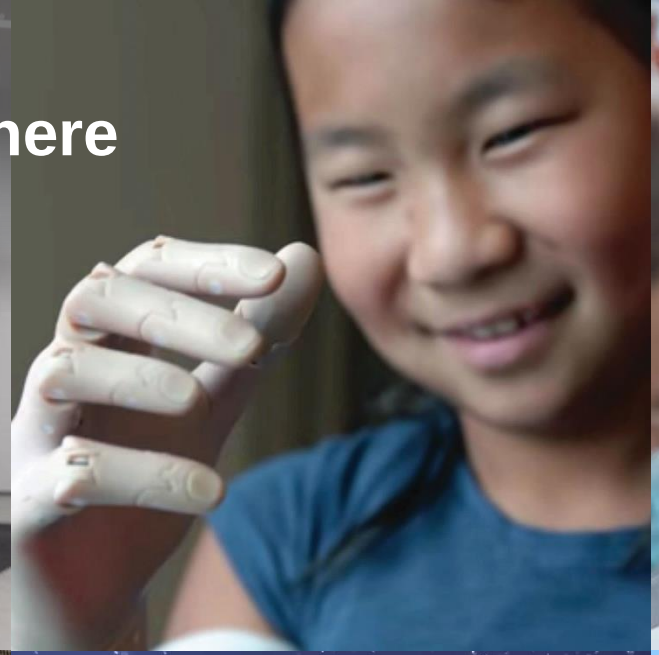
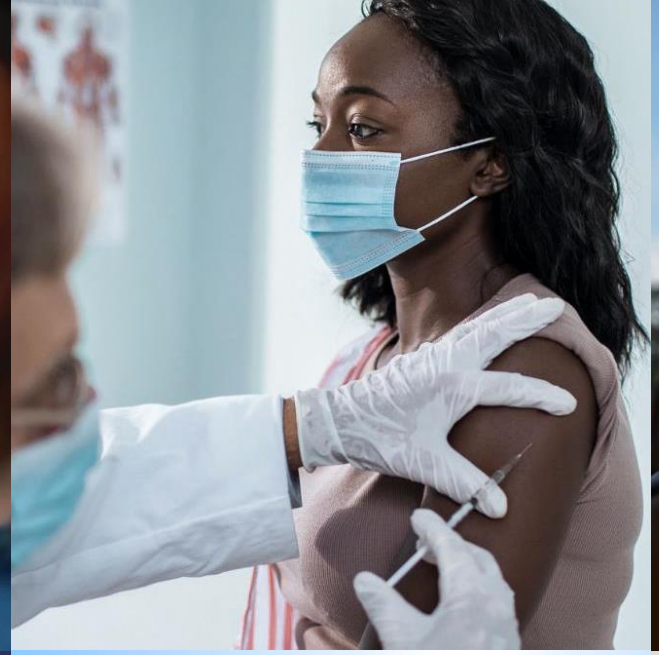
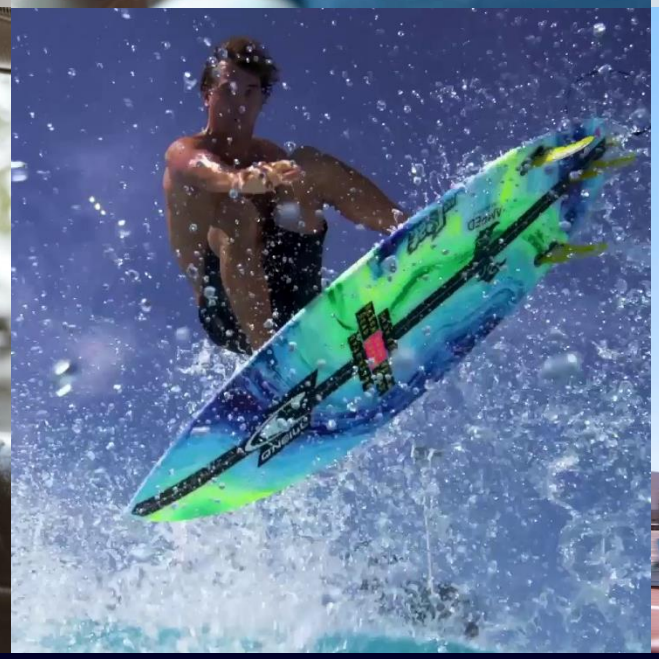
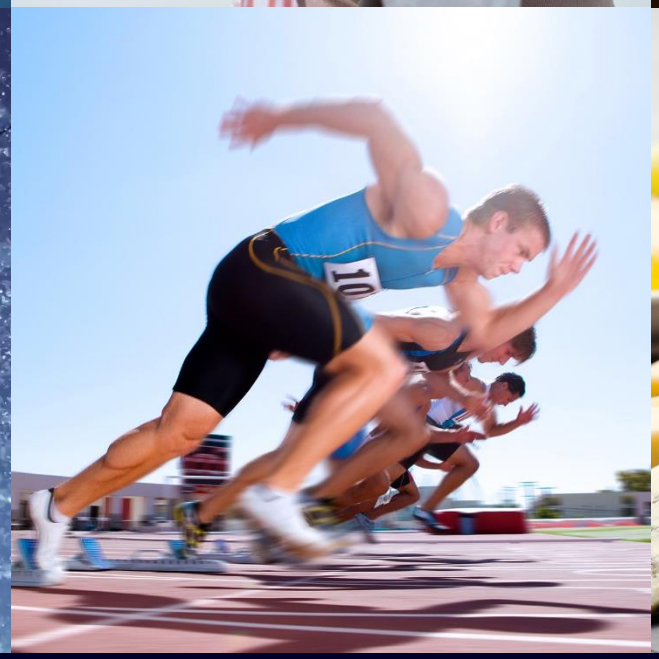
Industry is **everywhere**

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Sources: WEF | IEA | Accenture

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Industry's challenges are multiplying – with new ones being added all the time

Cost pressure and efficiency

Faster innovation cycles

Quality

Flexibility

+

Sustainability

Lack of talent

→

Adaptability at the speed of software

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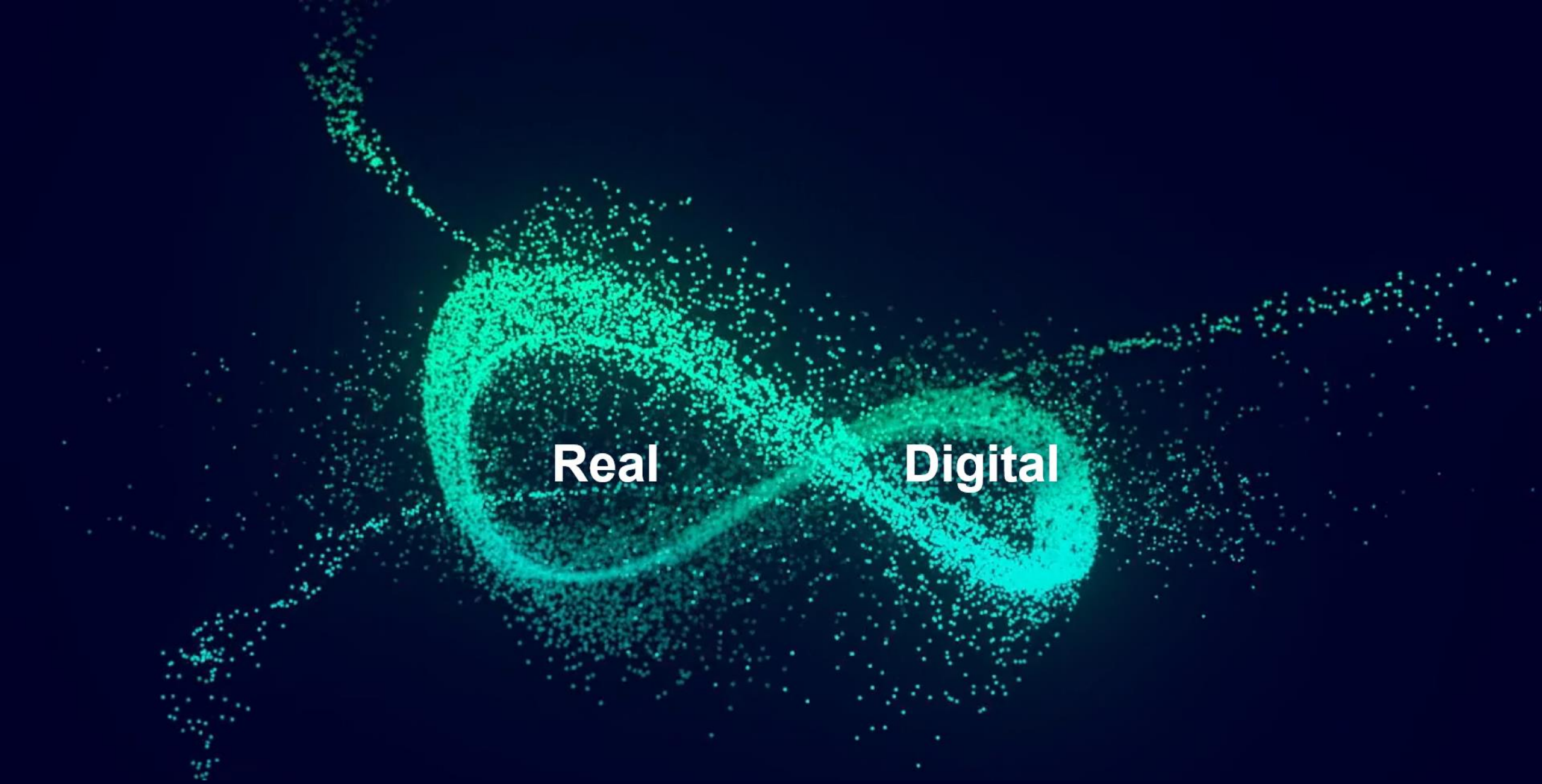

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Before: process-driven

Following pre-defined processes and steps

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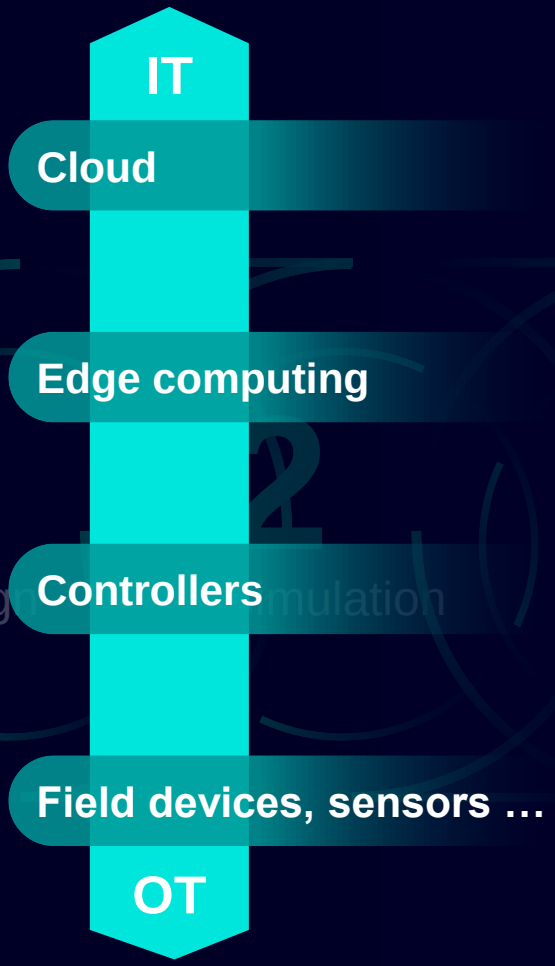
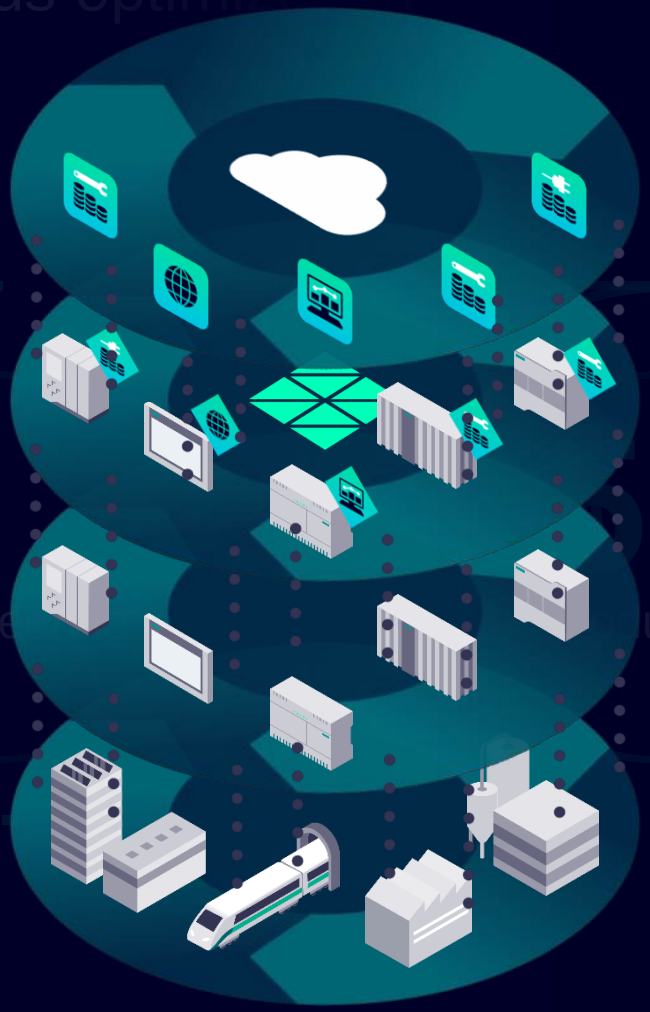
Now: data-driven

Flexible decisions for continuous optimization





Leverage the full value of data from sensor to edge to cloud

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100TB/h ~ all Netflix movies

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for Industry

Siemens Xcelerator

Our vision to accelerate the digital transformation of industry

Easy – open – flexible.

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Start with business problem
Build modular solution
Stay in control

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Productivity

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- Structured lean digital factory
- Smart robotics
- AI-powered process controls
- Predictive maintenance
- One of WEF’s worldwide Lighthouse Factories

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Efficiency

VERTICAL FARMING

- Digital Twin for indoor farming
- Higher yields
- Less water consumption
- No pesticides

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Sustainability

NORTHVOLT

- Digitalized manufacturing processes
- Reduce carbon footprint across the value chain
- Help recycling of lithium batteries

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Speed

PHARMACEUTICAL COMPANY

- Digital Twin
- Anticipate failures
- Optimize quality
- Self-Learning throughout the vaccine lifecycle

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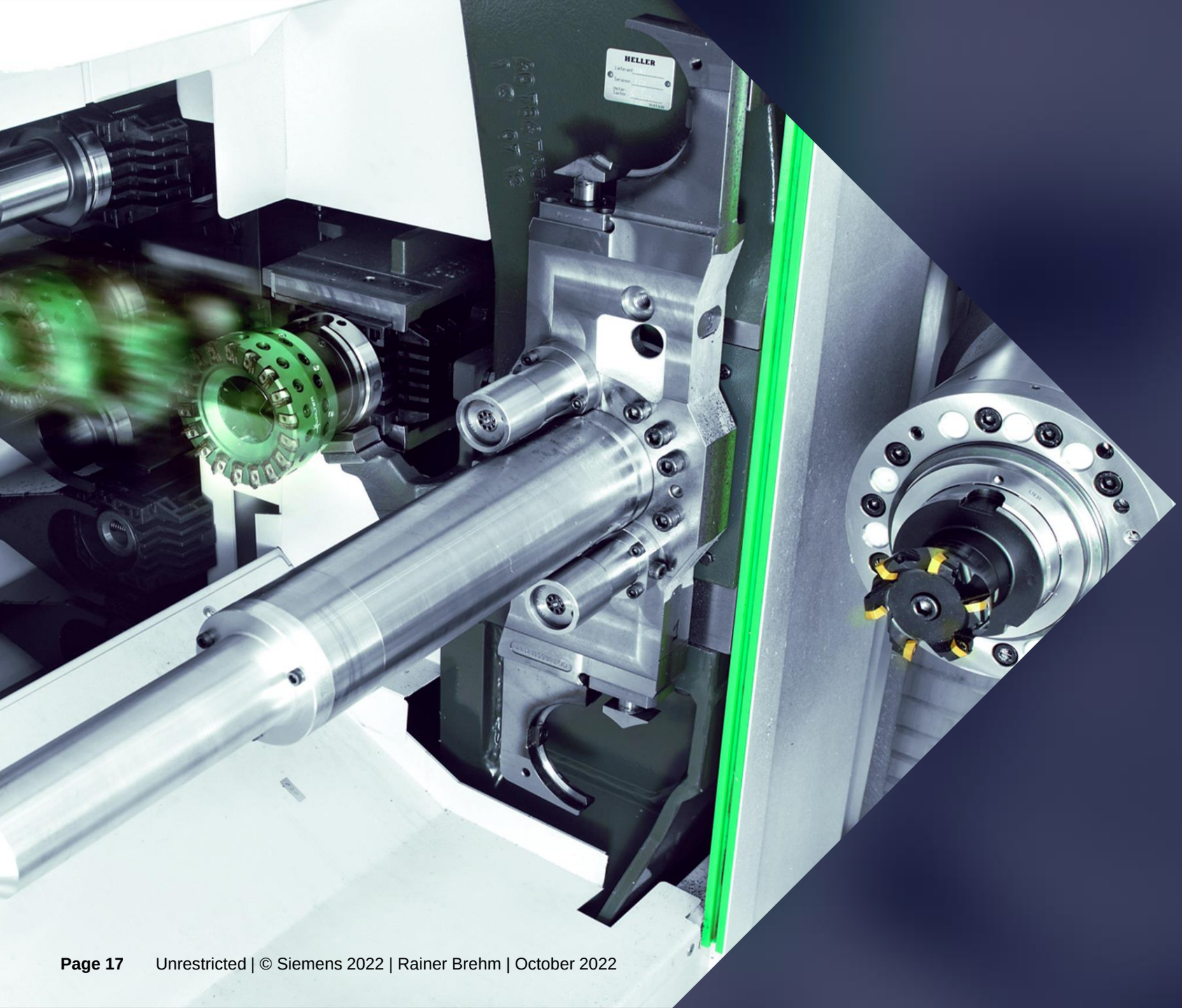

New Business Model

HELLER

- “Hardware as a Service”
- From basic functionality to premium feature at press of a button

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Growing Siemens Xcelerator partner ecosystem

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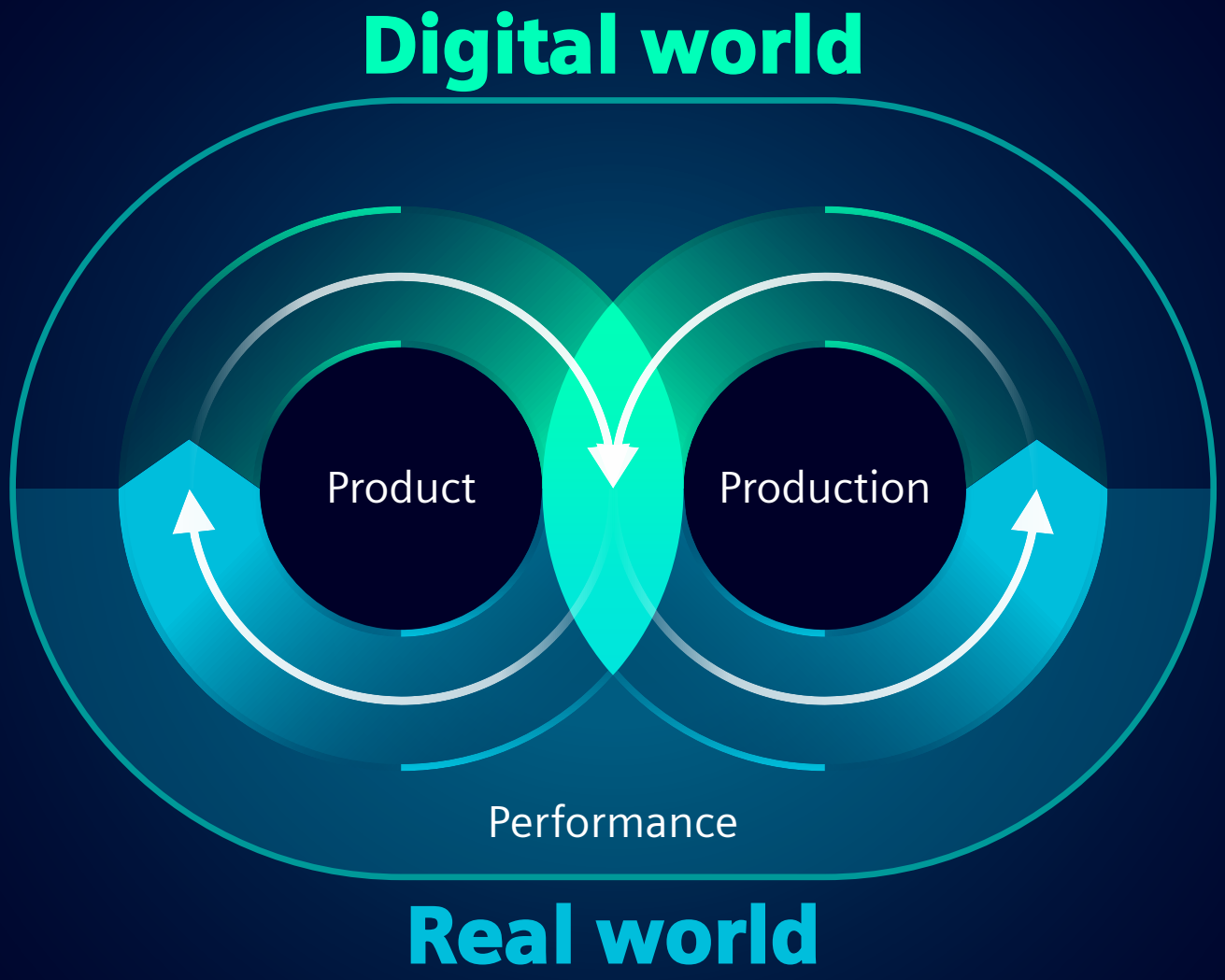

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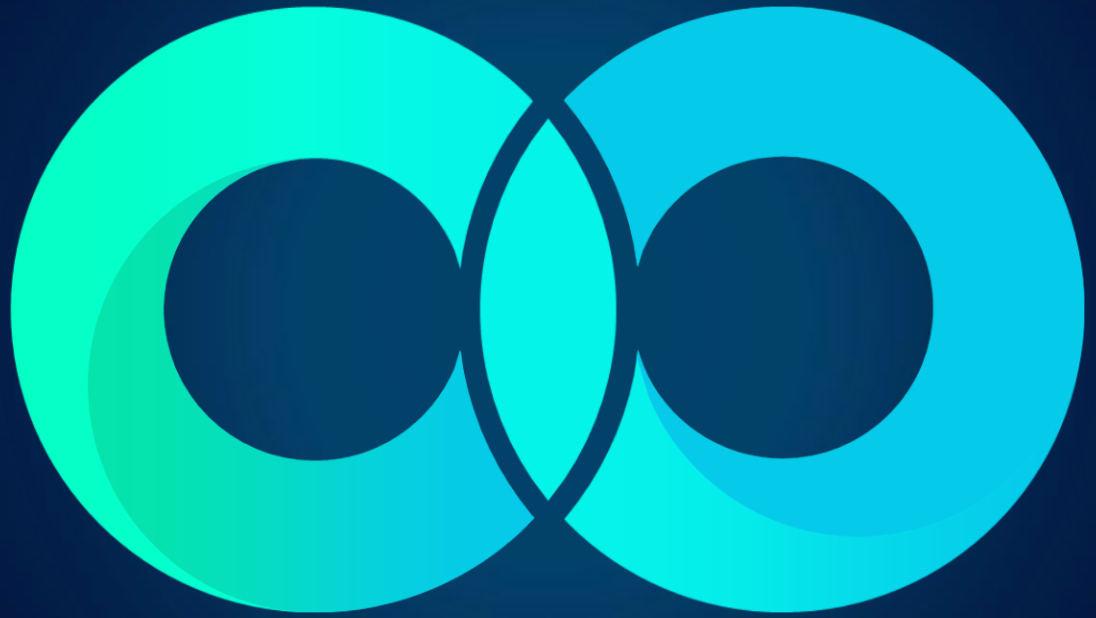

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Digital Enterprise

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DIGITAL TWIN

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DIGITAL TWIN
FOR PRODUCTS

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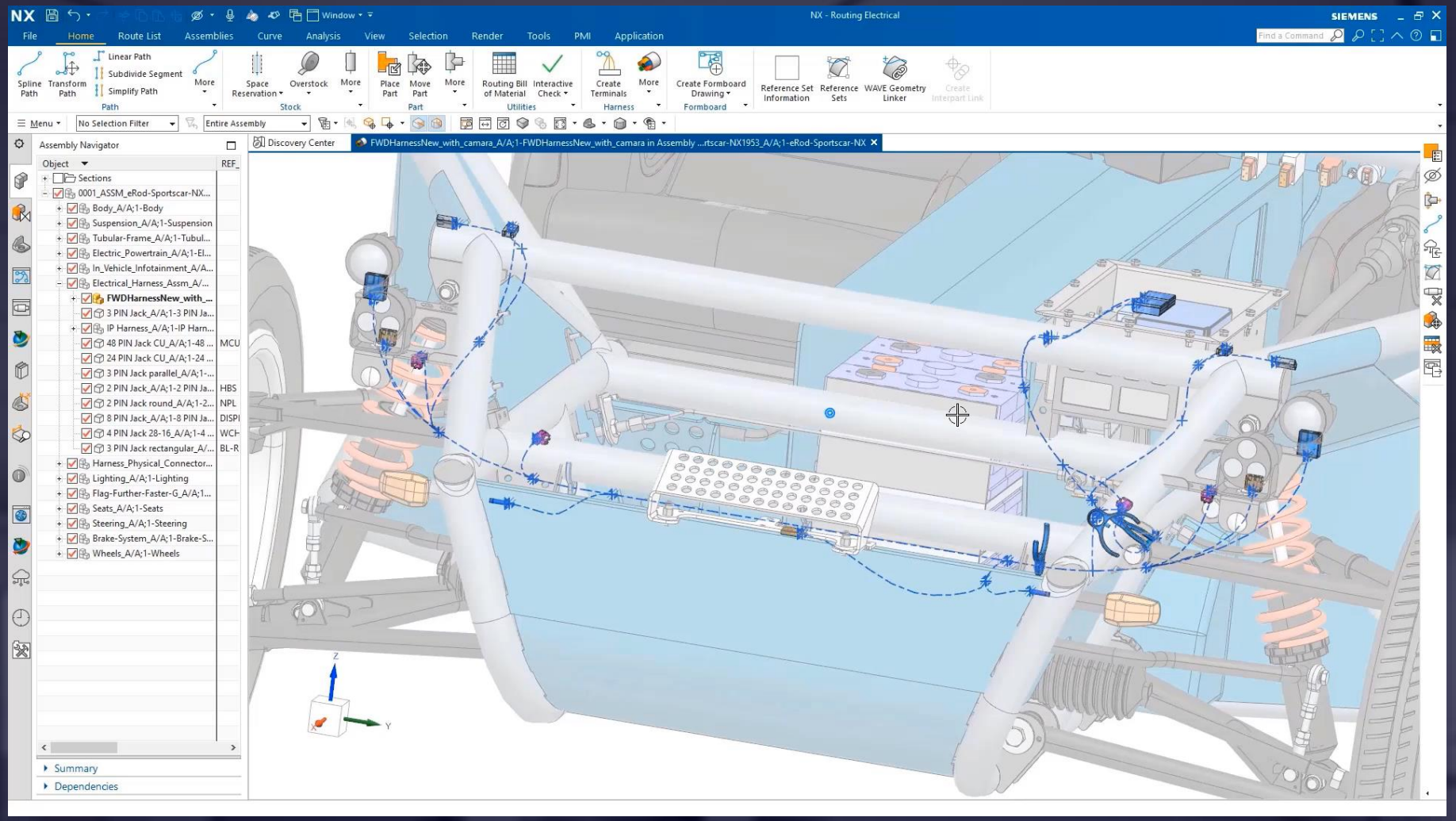

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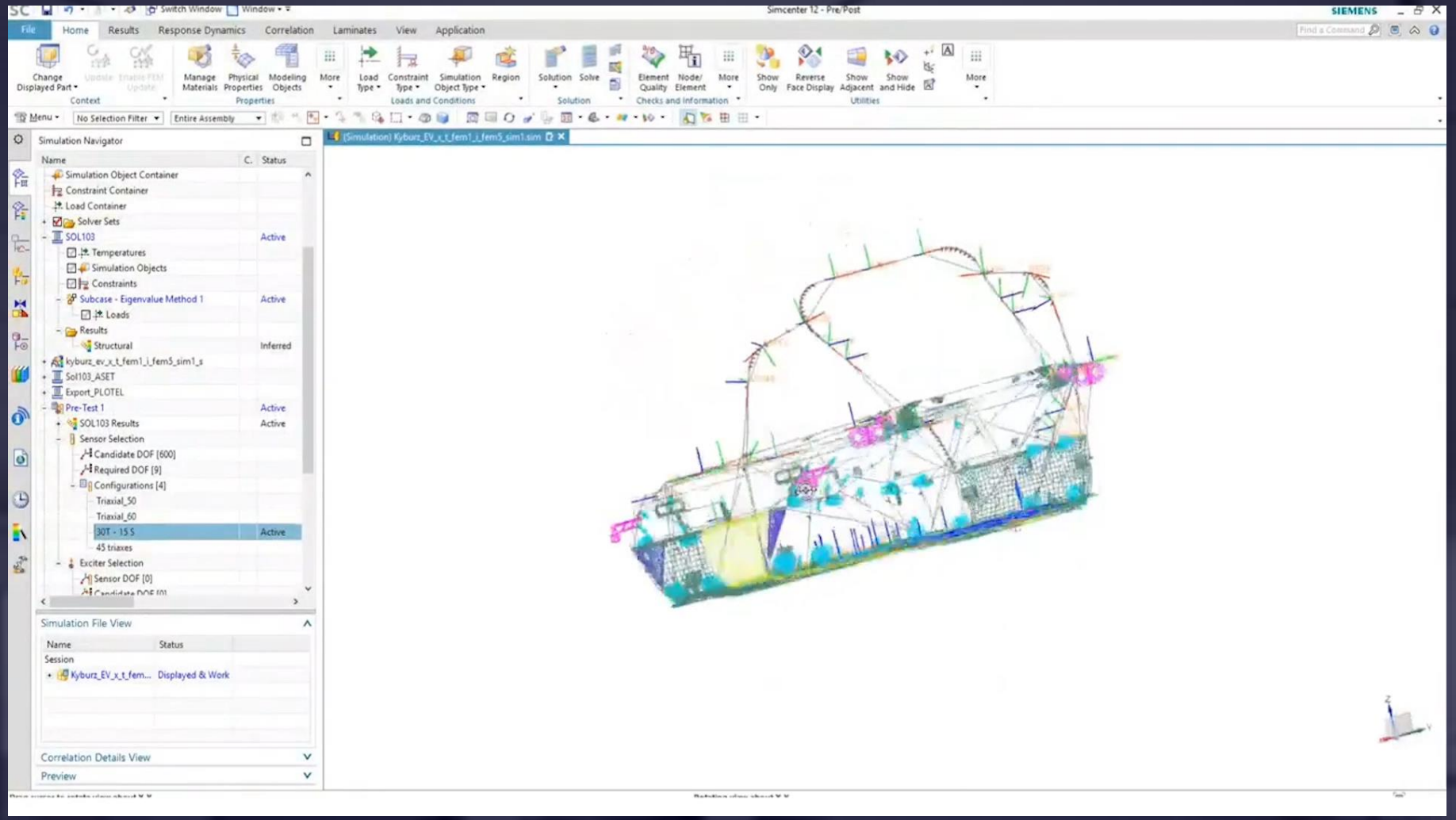

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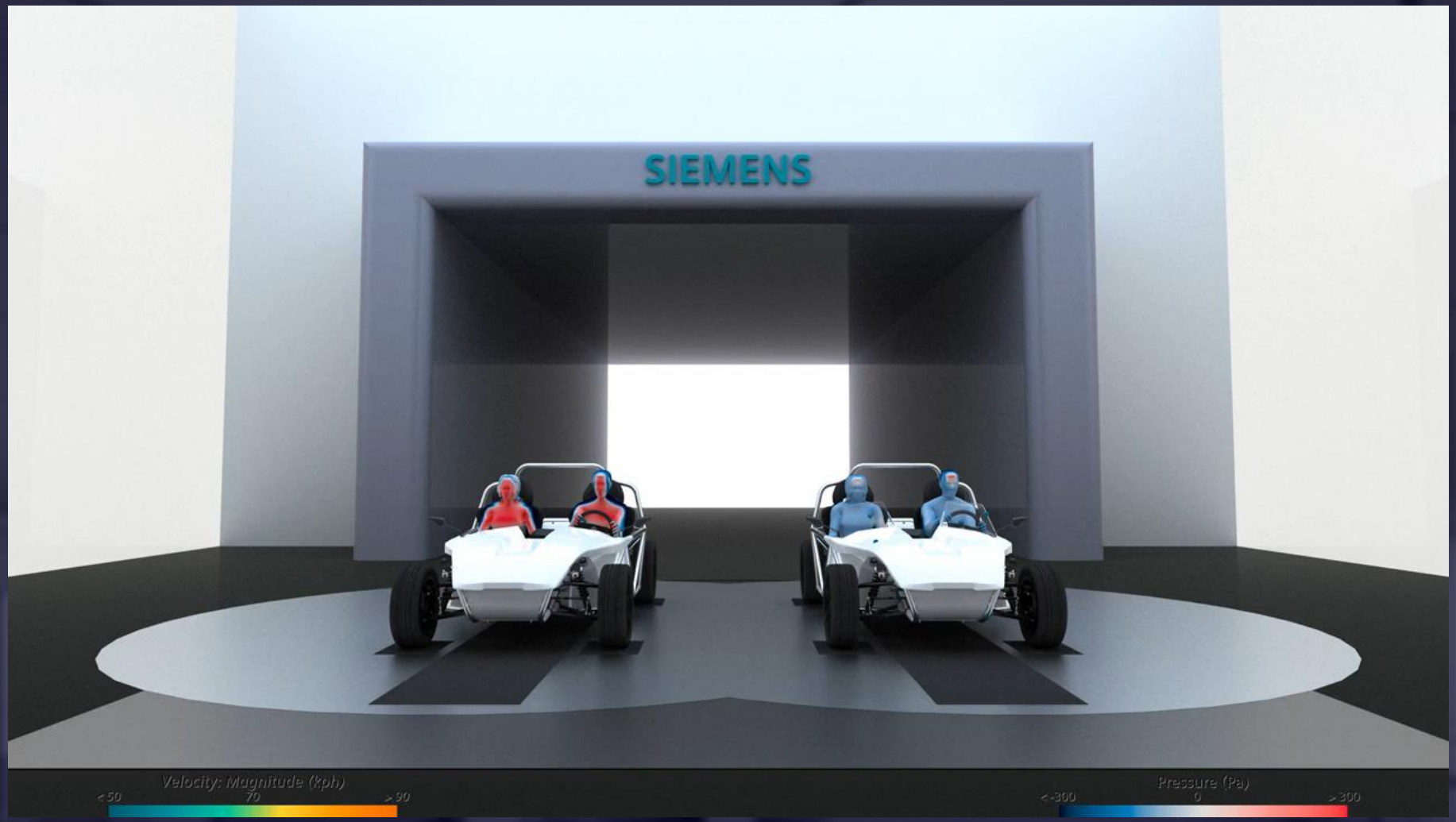

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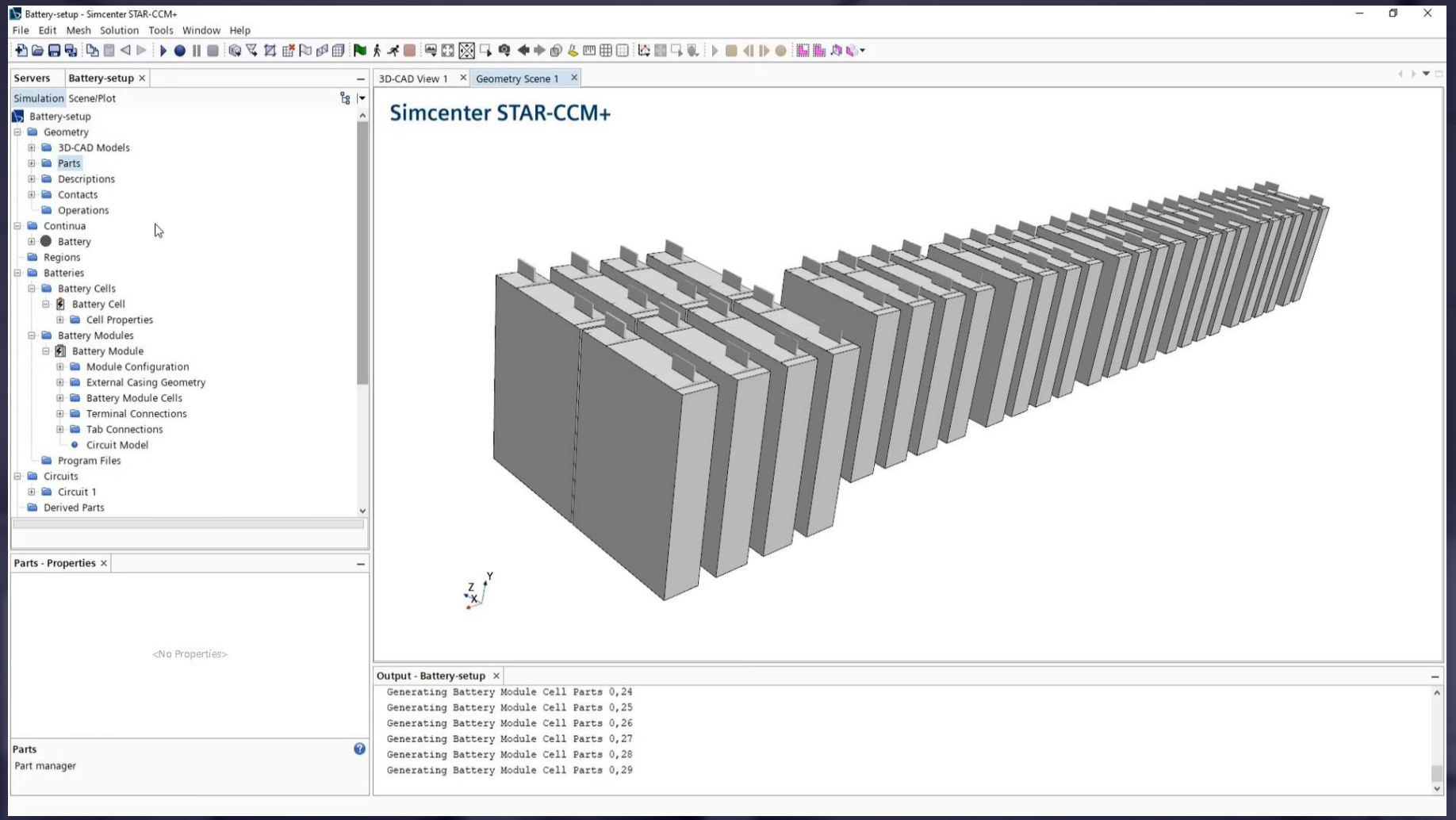

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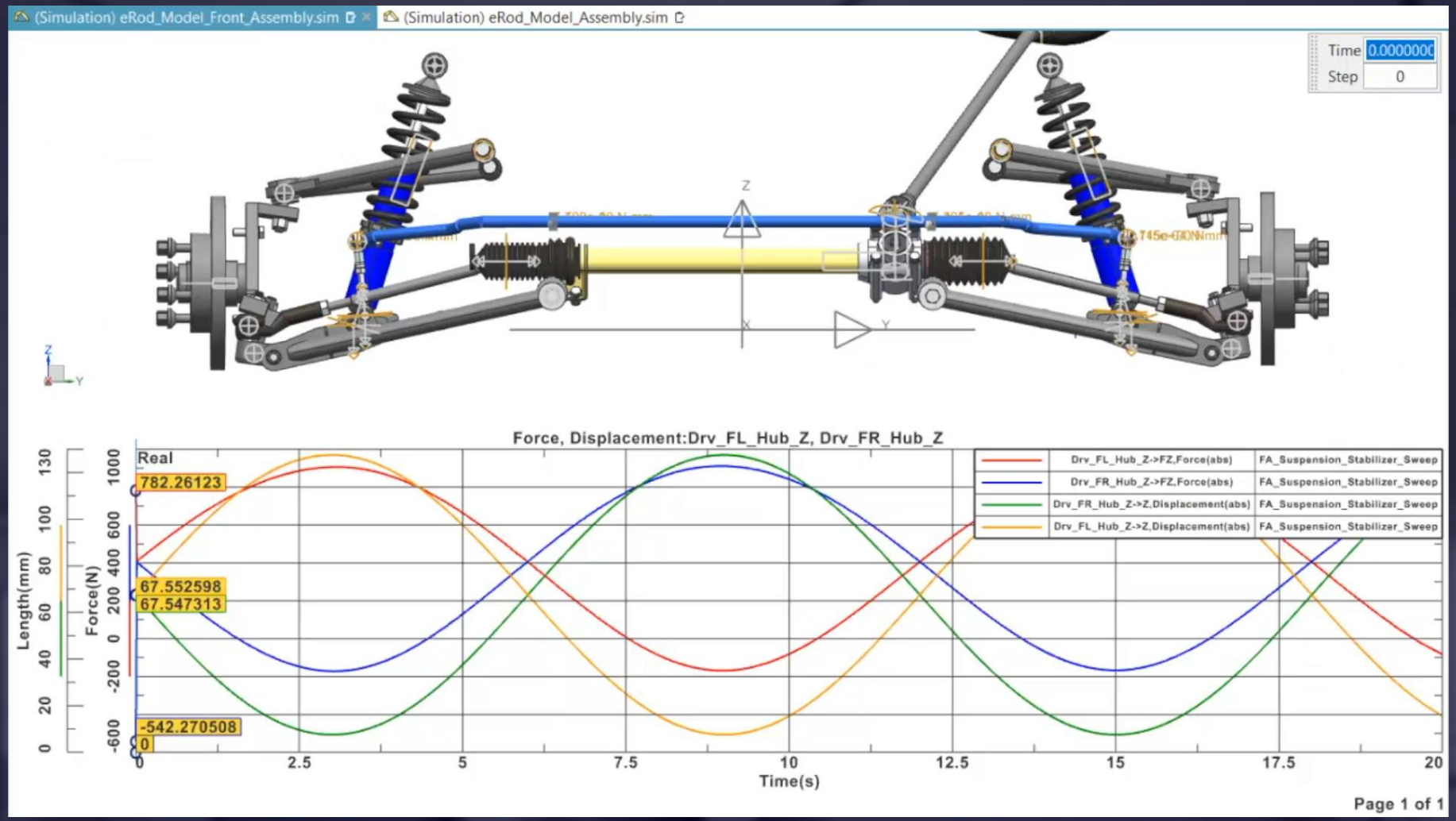

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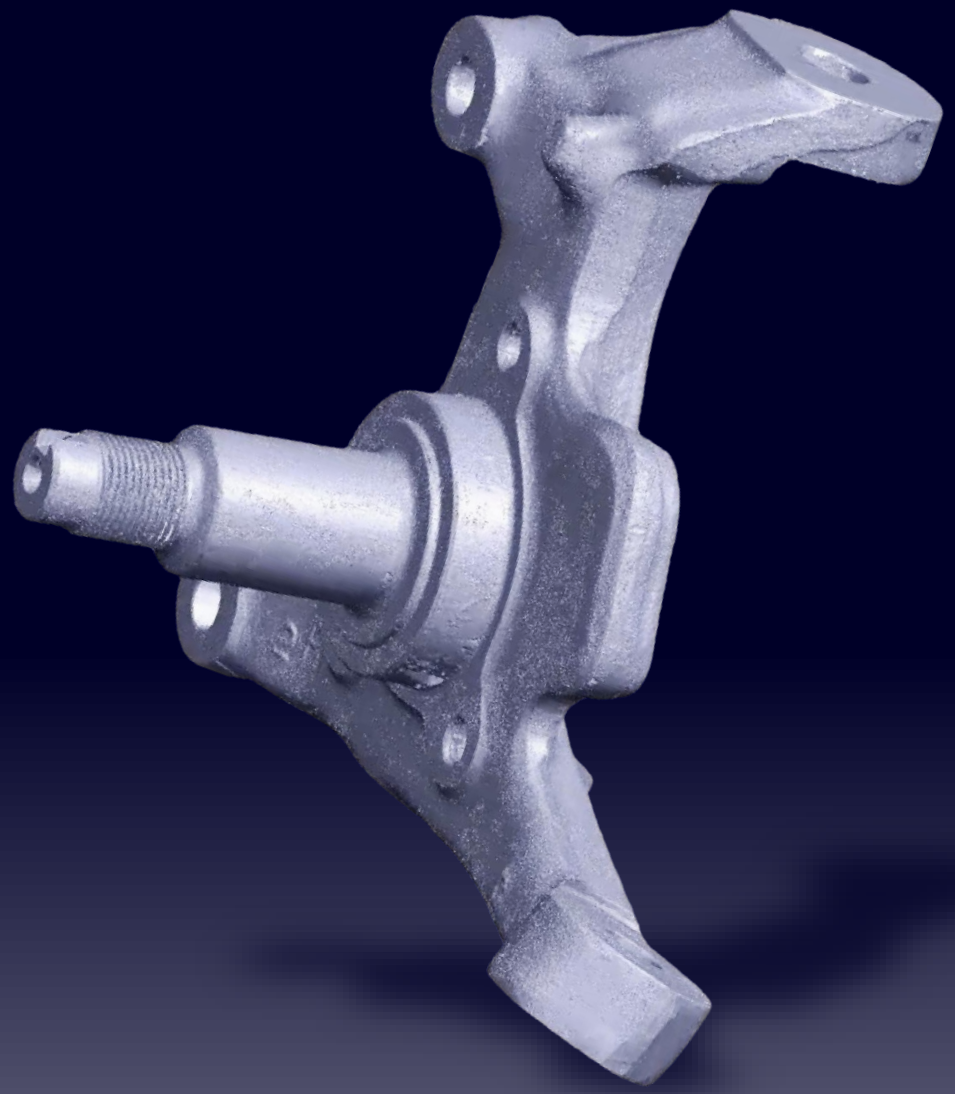

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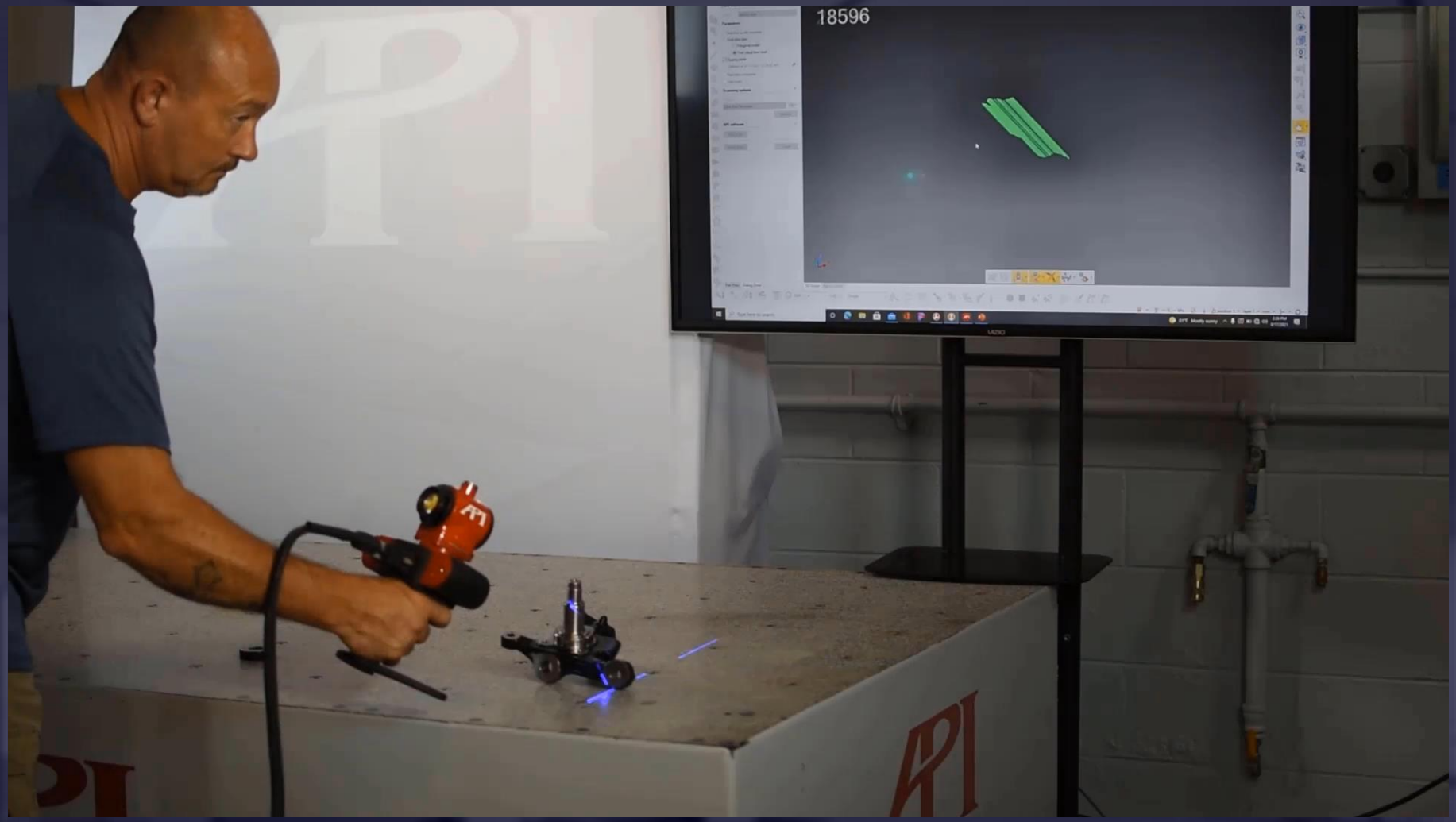

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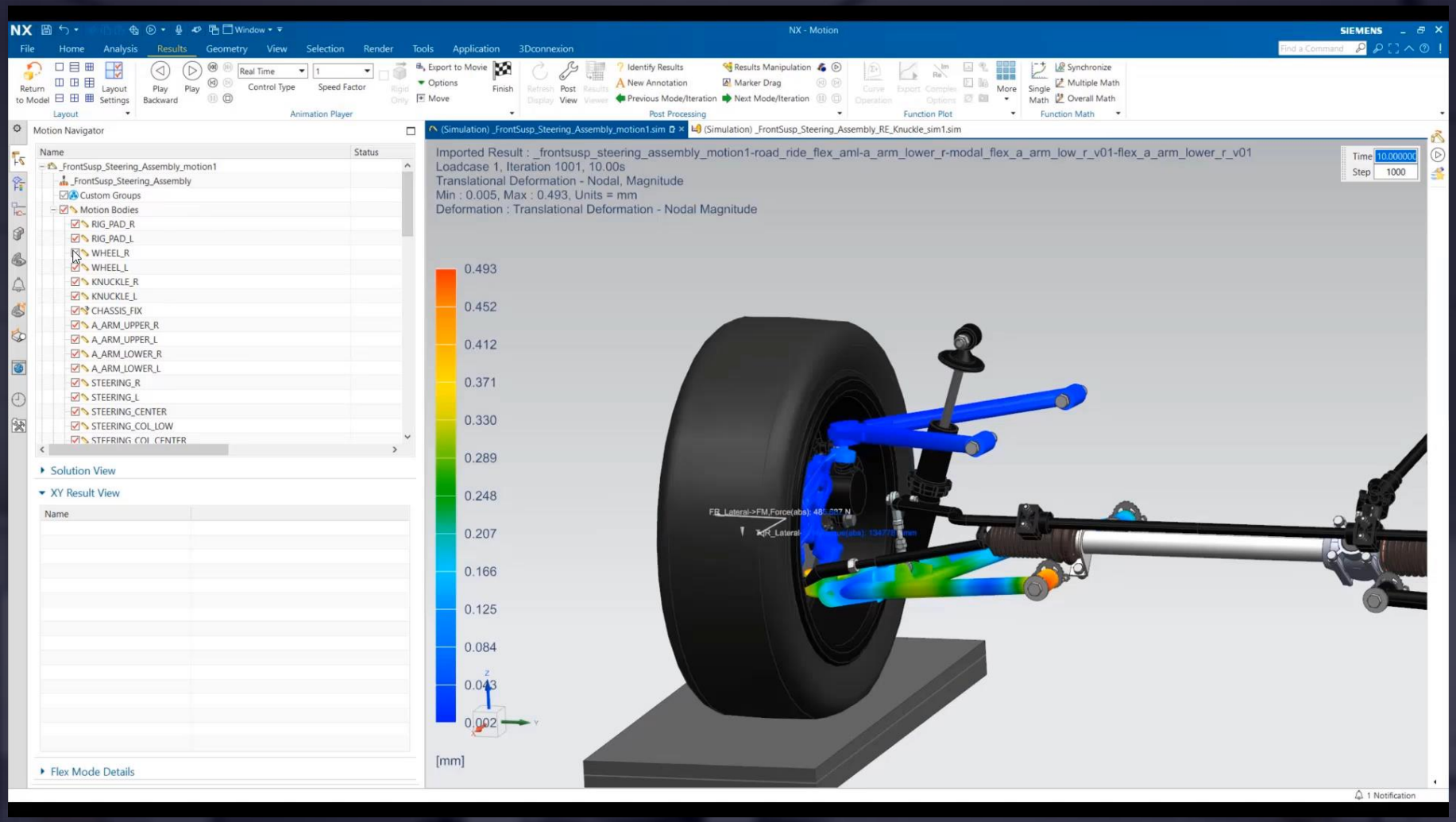

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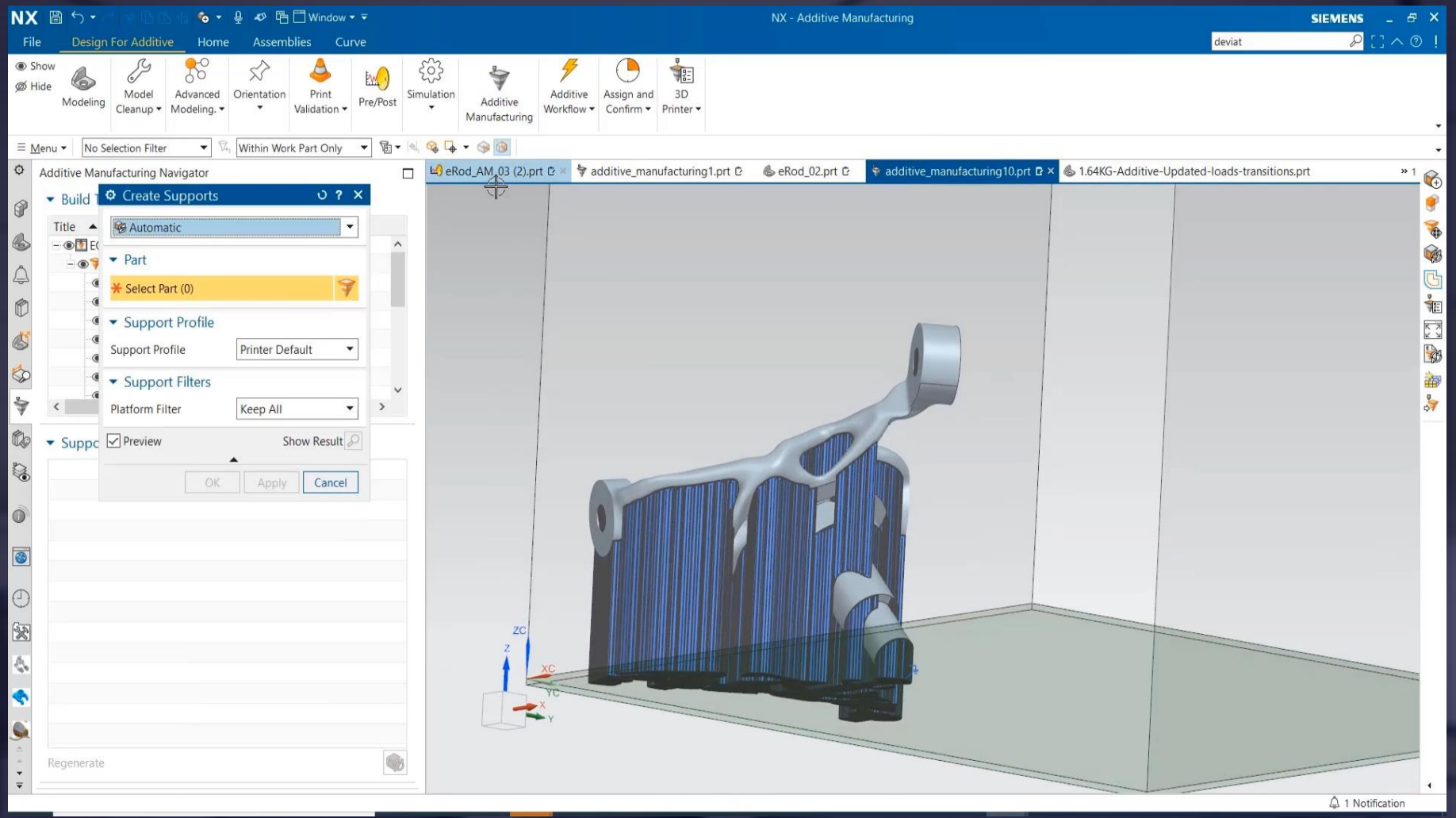

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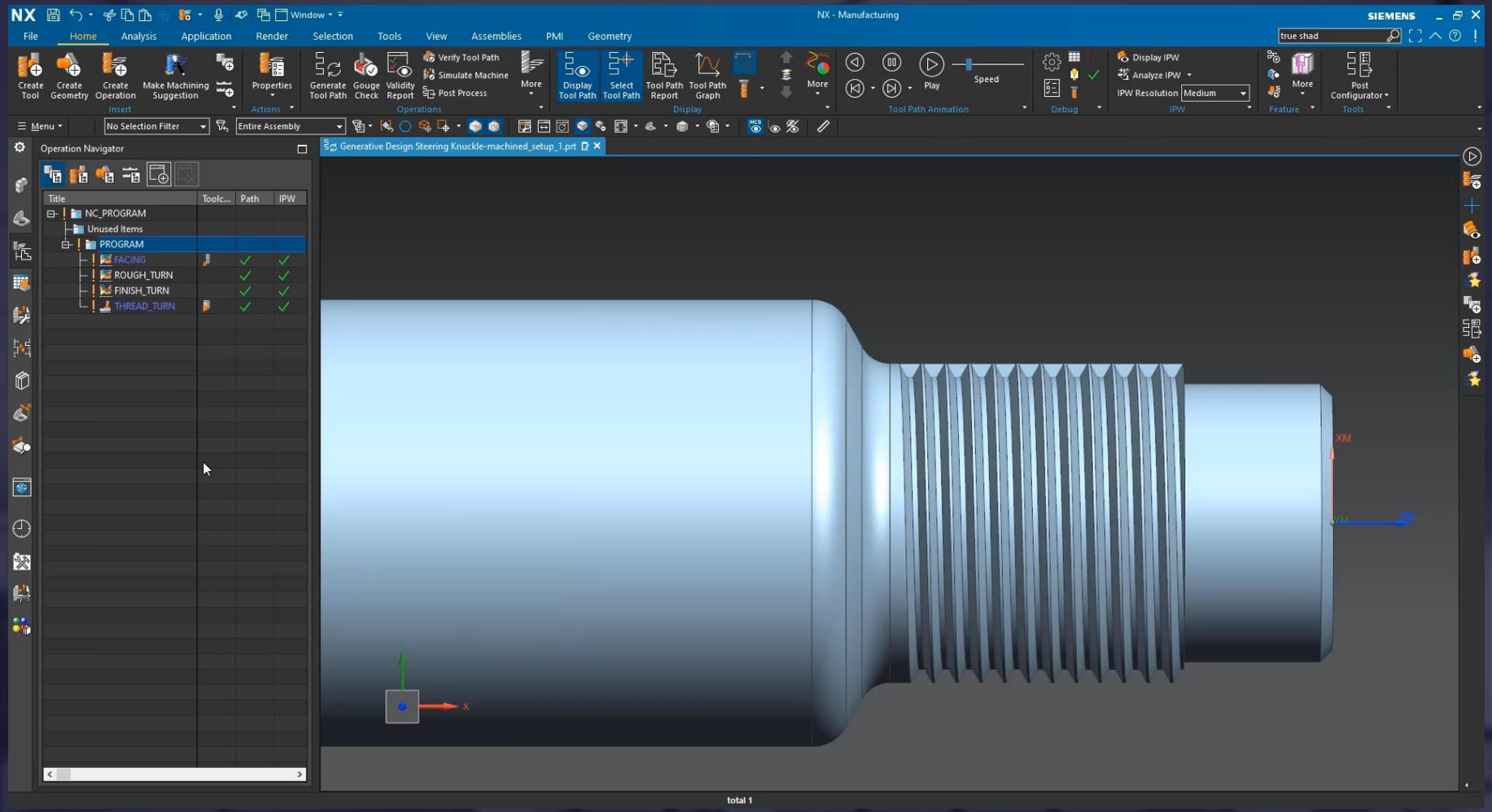
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Render
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Assemblies
PMI
Geometry
Create Tool
Create Geometry
Create Operation
Make Machining Suggestion
Properties
Generate Tool Path
Gouge Check
Validity Report
Verify Tool Path
Simulate Machine
Post Process
More
Display Tool Path
Select Tool Path
Tool Path Report
Tool Path Graph
Play
Speed
Display IPW
Analyze IPW
IPW Resolution
Medium
Post Configurator
Menu
No Selection Filter
Entire Assembly
Operation Navigator
Generative Design Steering Knuckle-machined_setup_1.prt
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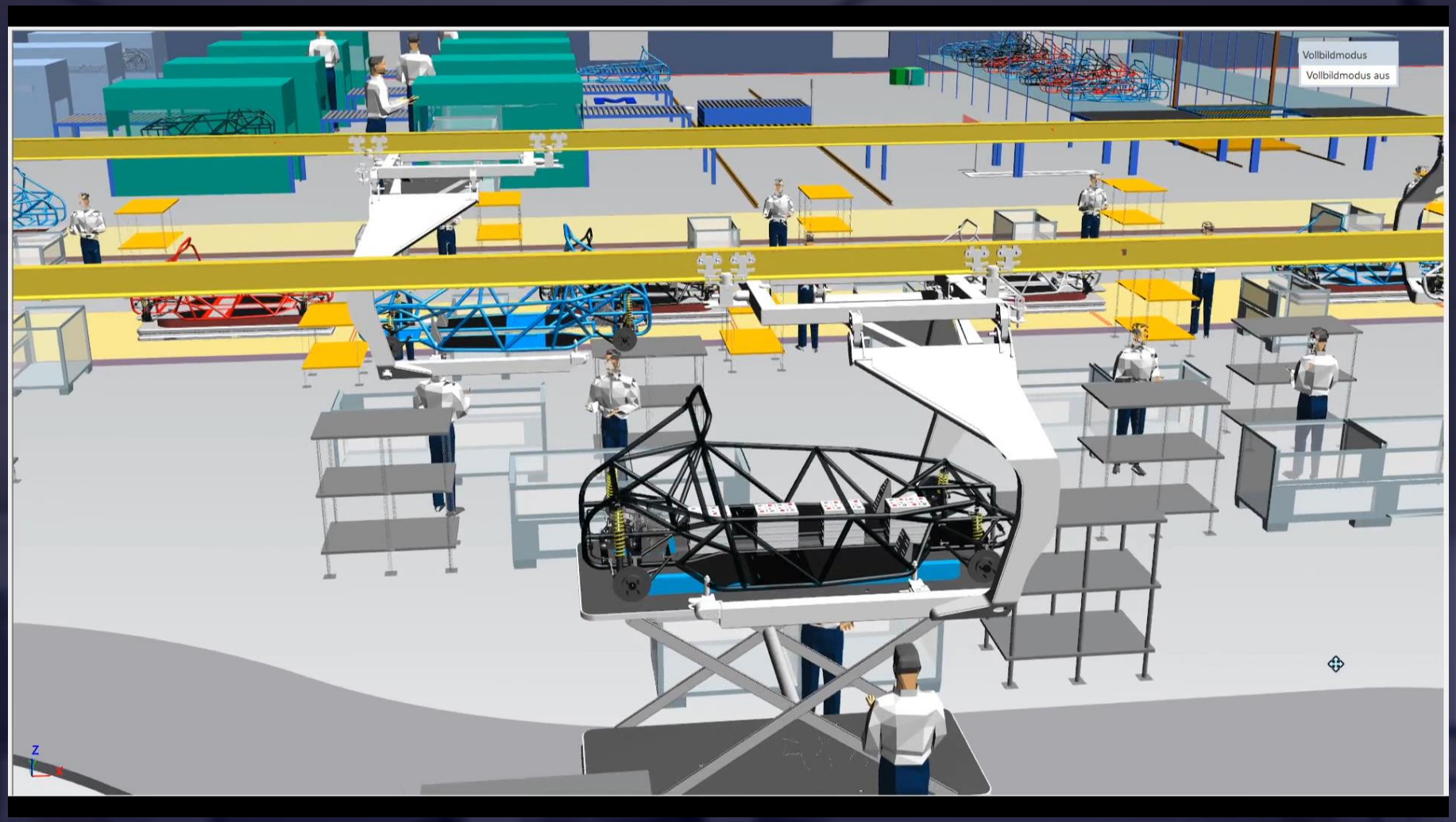

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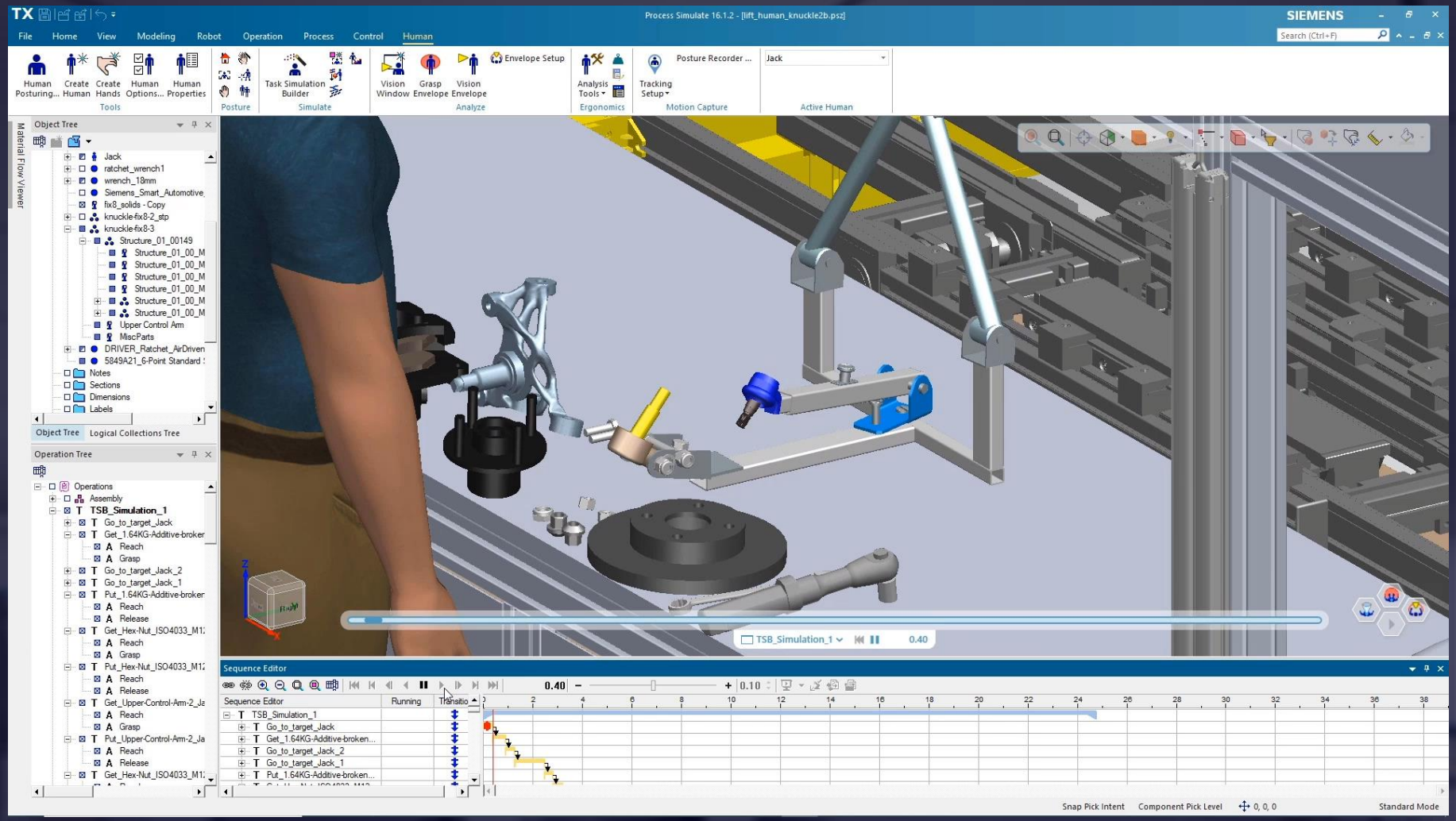

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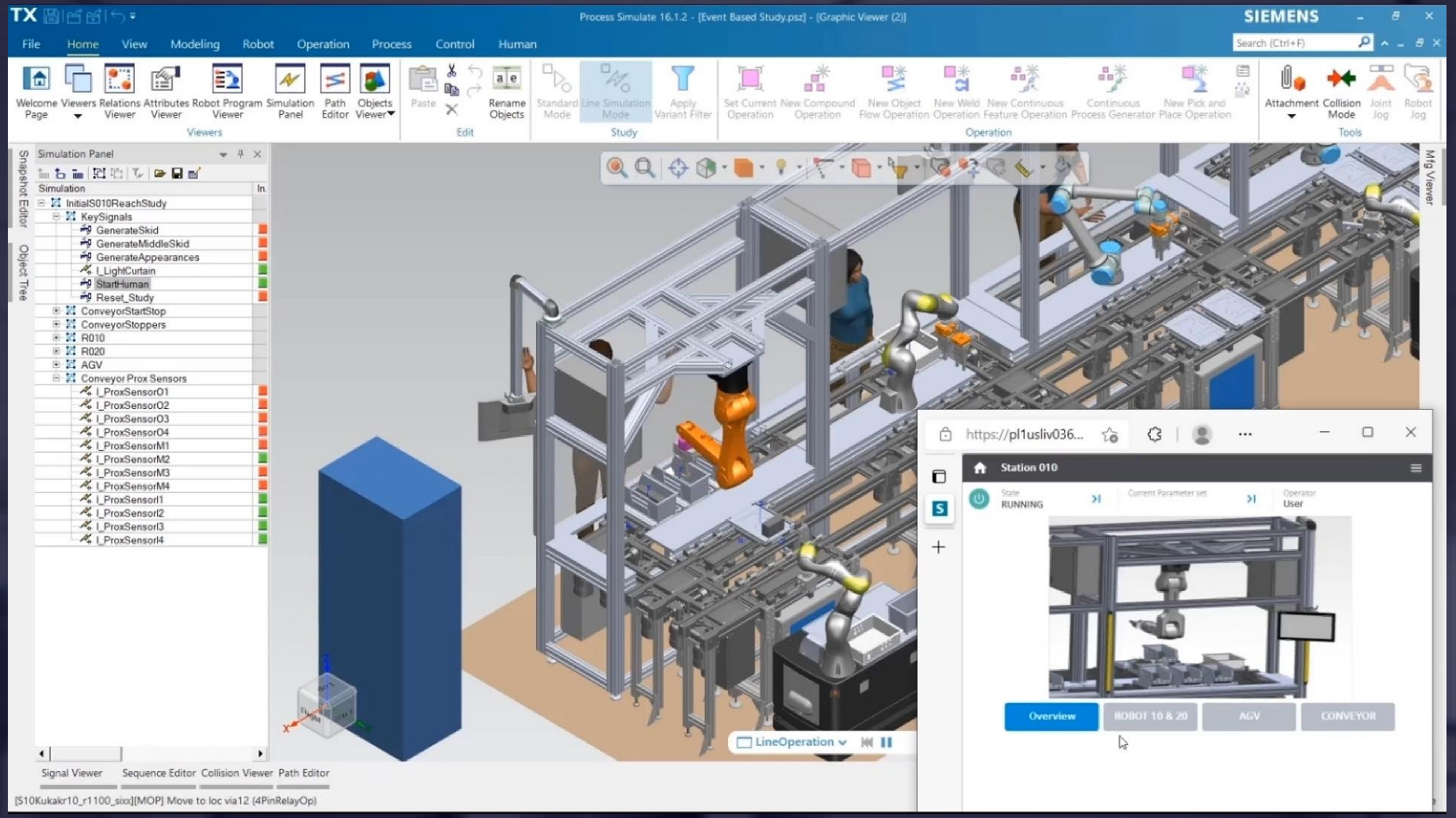

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Virtual vehicle

Virtual factory

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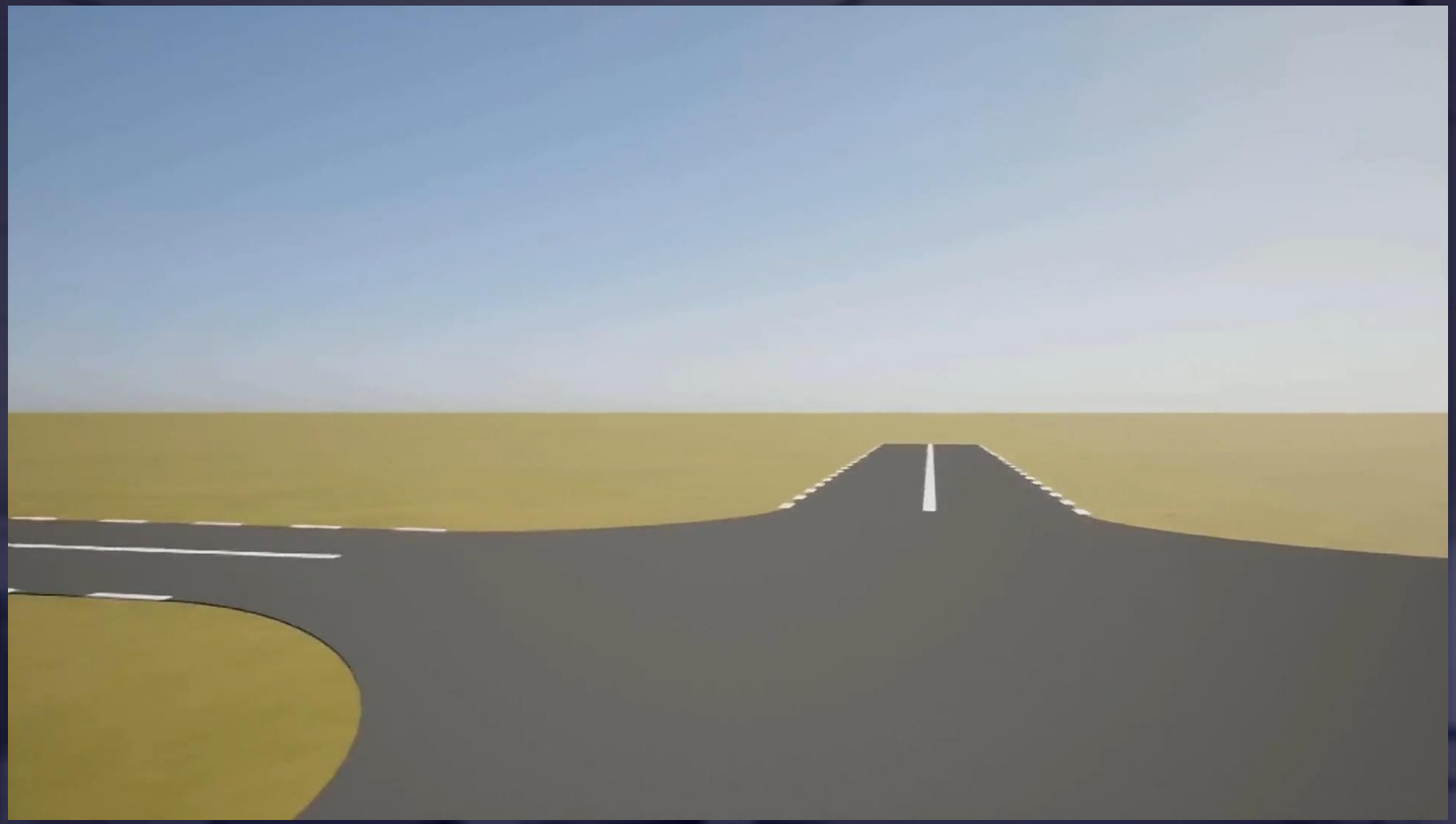

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Seamless design and simulation from chip to city

Virtual chip

Virtual vehicle

Virtual factory

Virtual city

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REAL PRODUCTION

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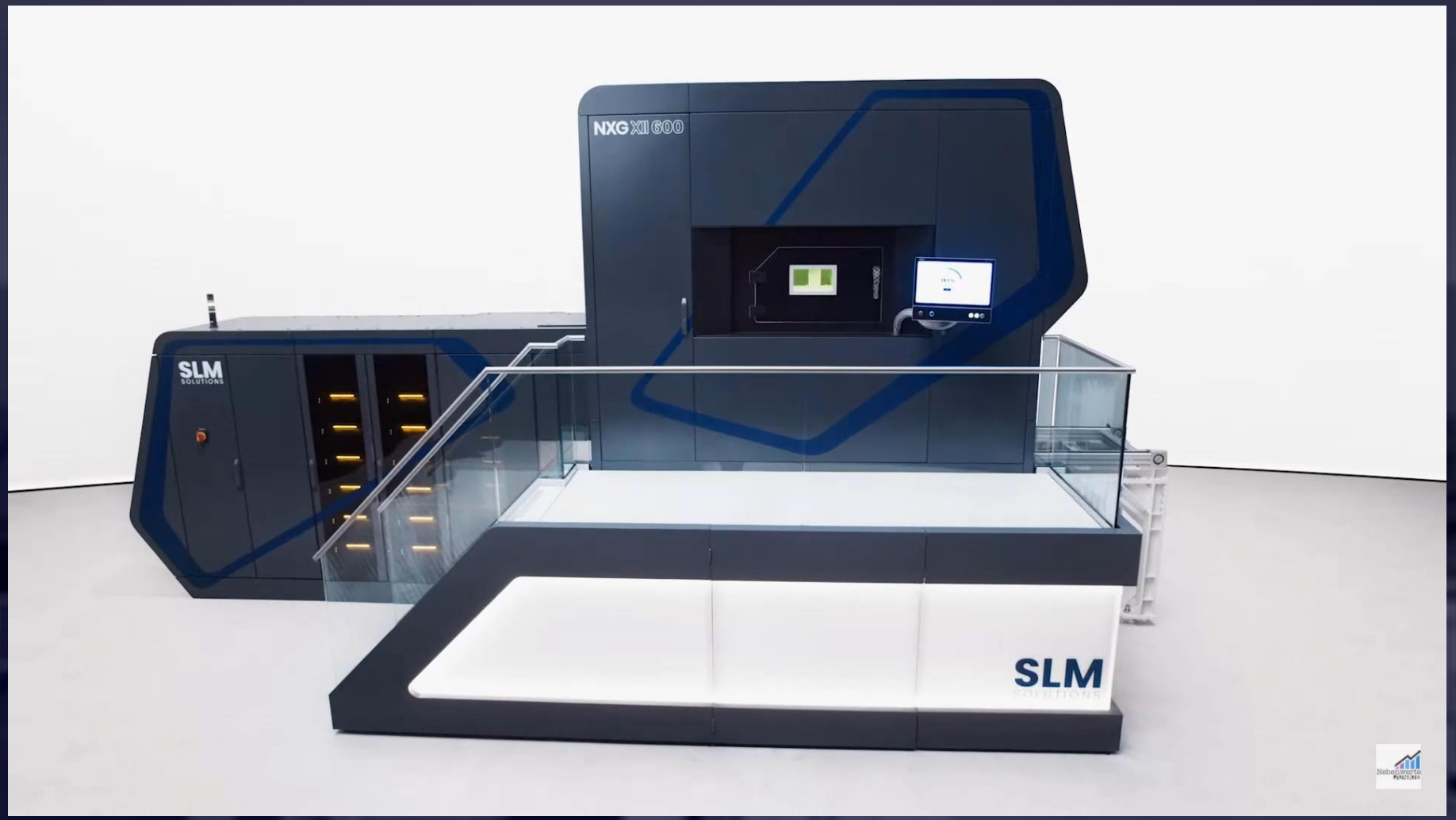

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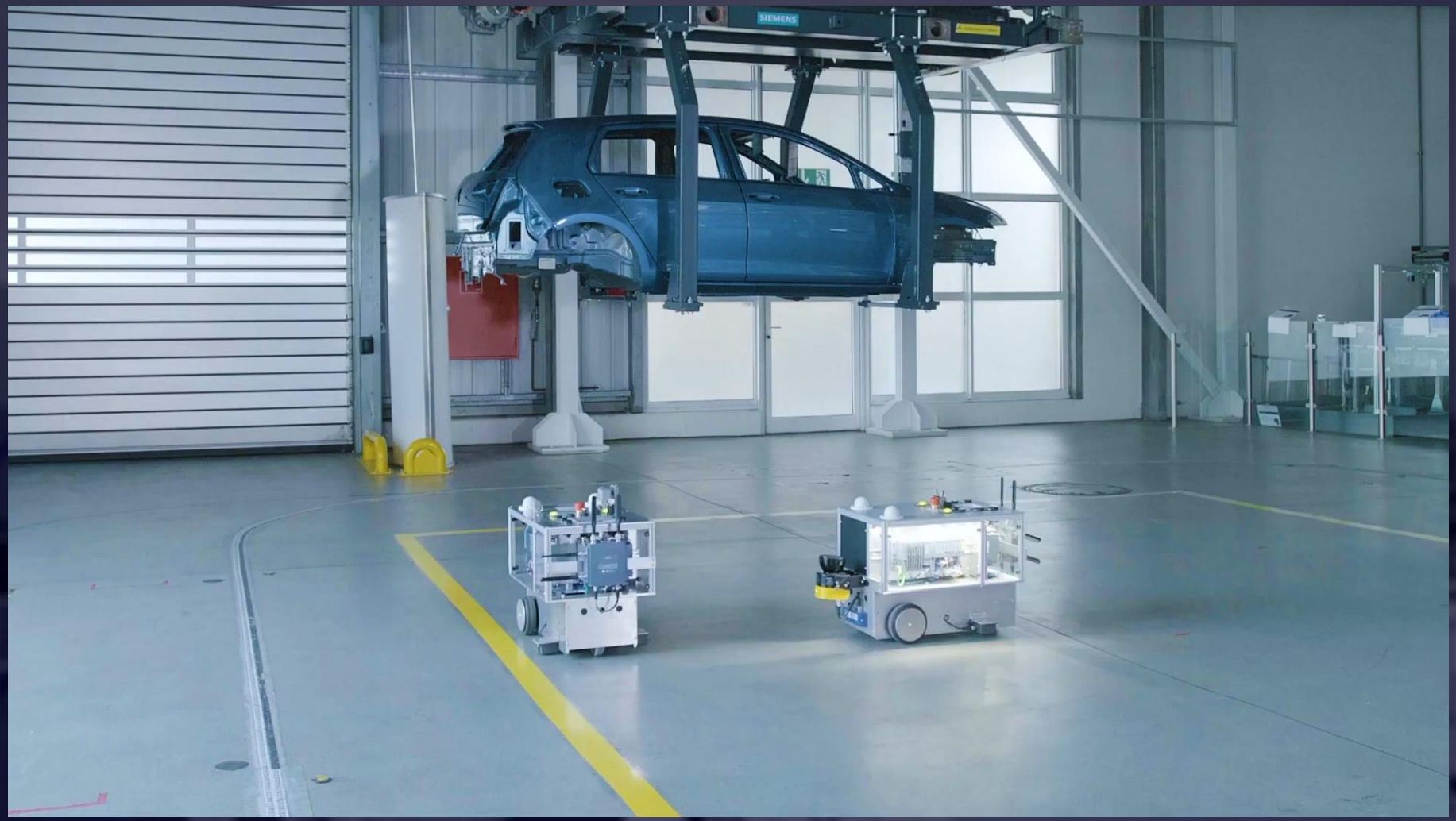

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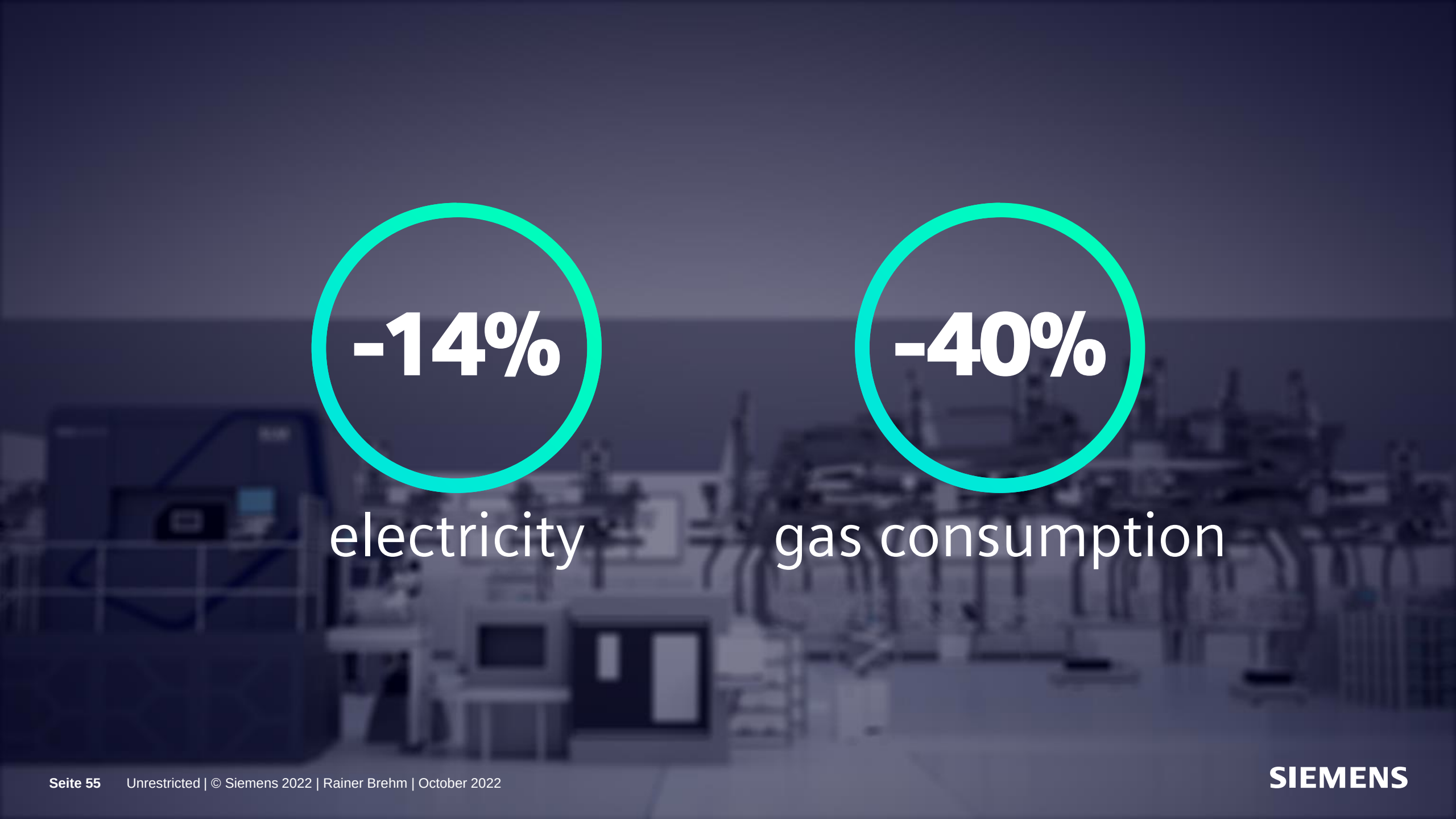

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make products better

make production better

become more sustainable

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