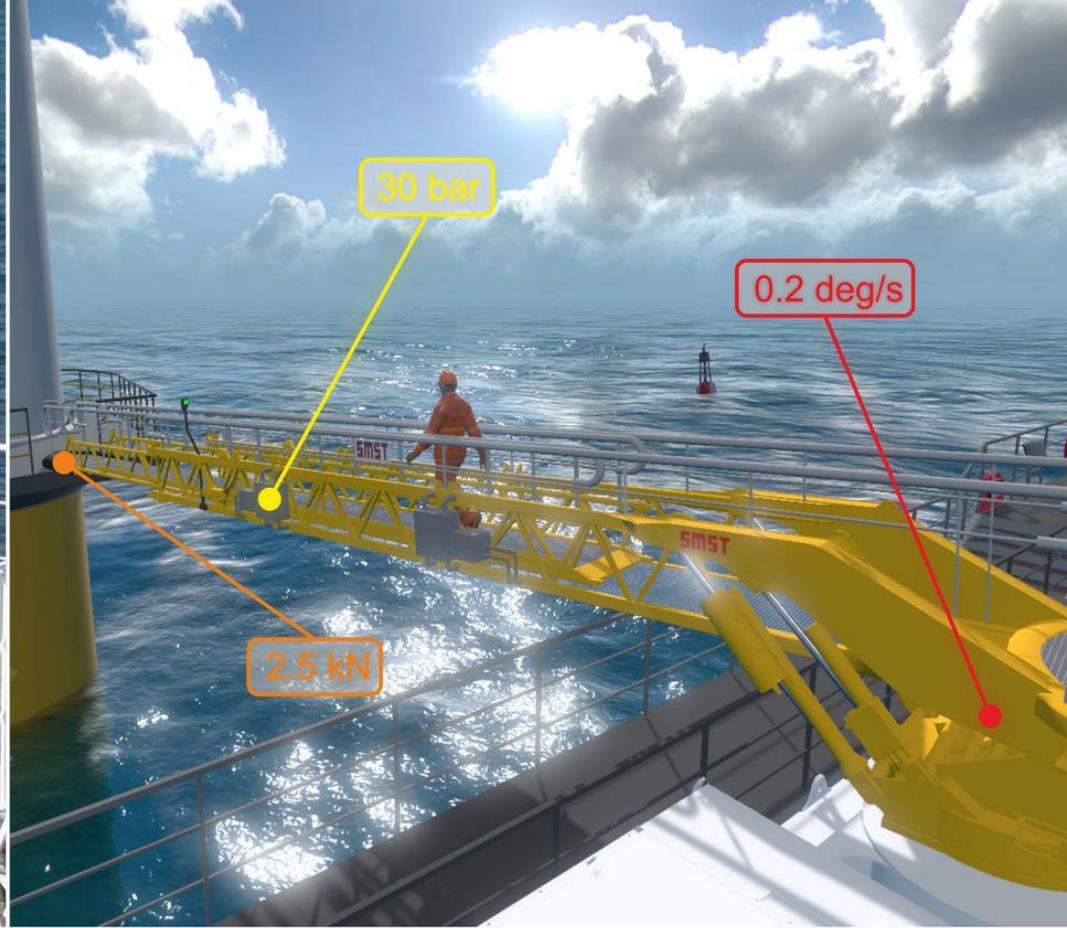




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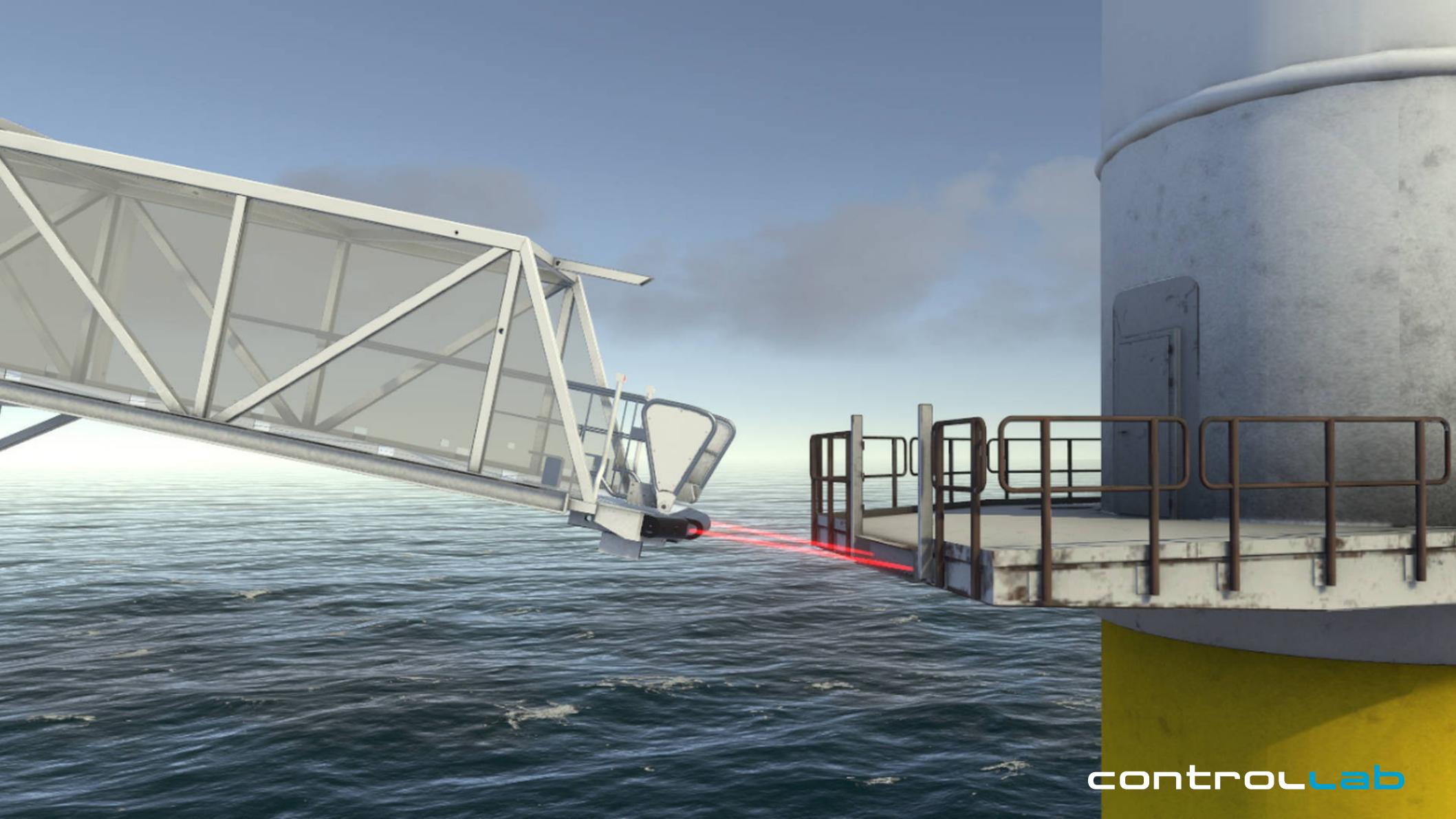


DIGITAL TWIN

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Coding standards Design patterns Modular design





CS Scenario 3 - Transferring a Full Hot Metal Ladle to the Desulph

Operator Guest

Training

Pause Stop Simulation

Alerts

Radio Outside Flight Path Collisions

Scenario Controls

In Bay In Bay

Ladle Breakout

Ladle 1 Ladle 2
No Breakout No Breakout

Upright Flare

Flare Position Up

Torpedos

East West
HM South HM North

Developed for Tata Steel Port Talbot by BLUF and Controlab Projects.

Version 1.0.0

Software



Real Plant



Digital Twin





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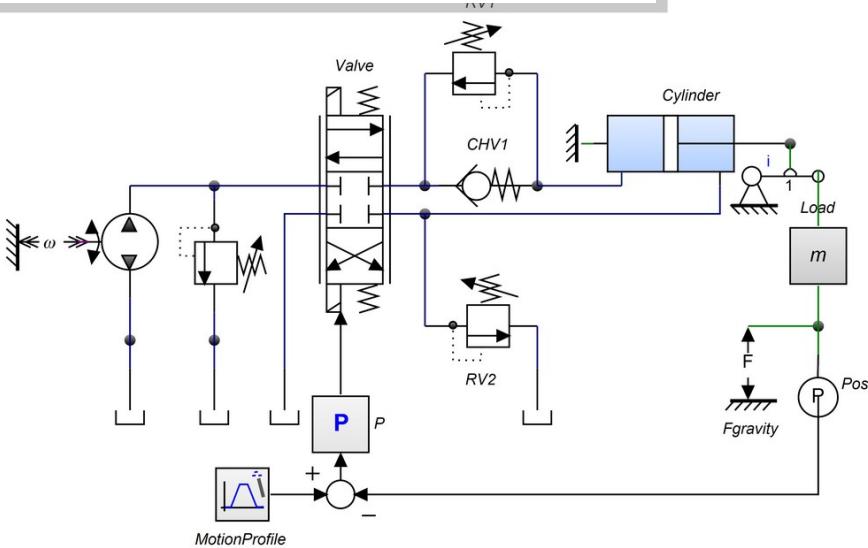
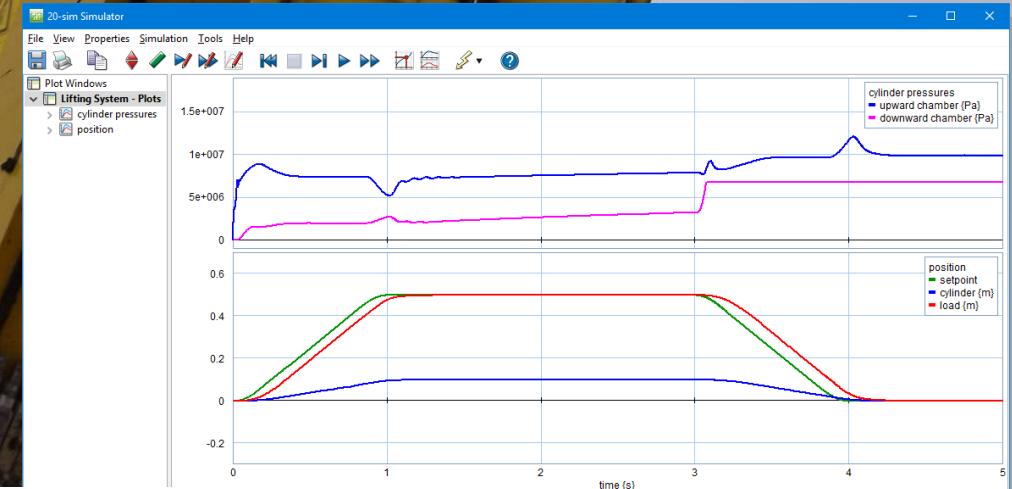
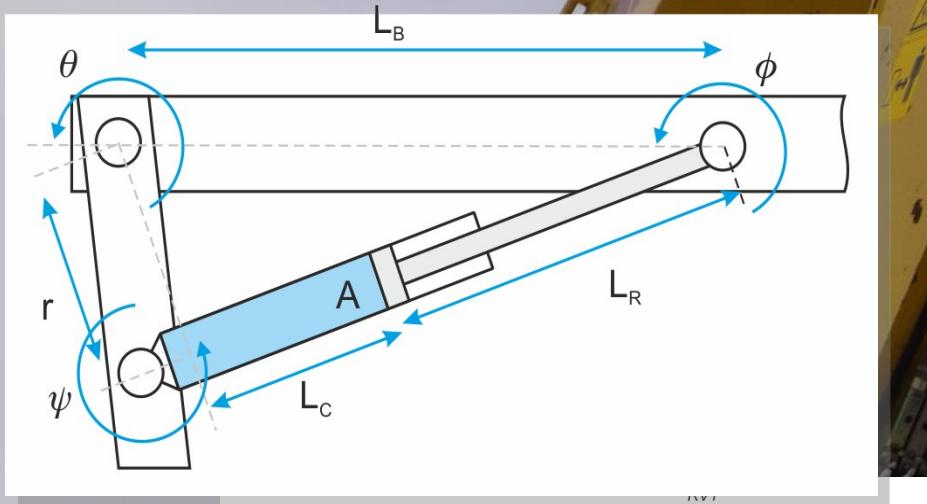


foto courtesy Jason Woodhead

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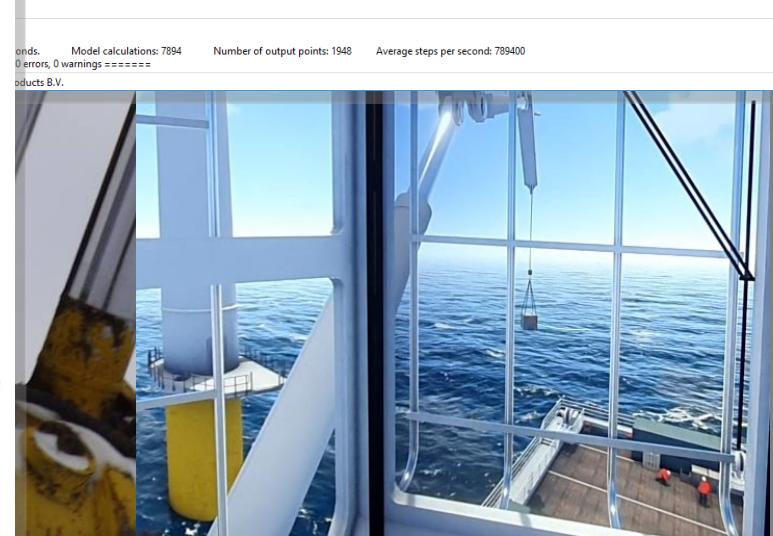
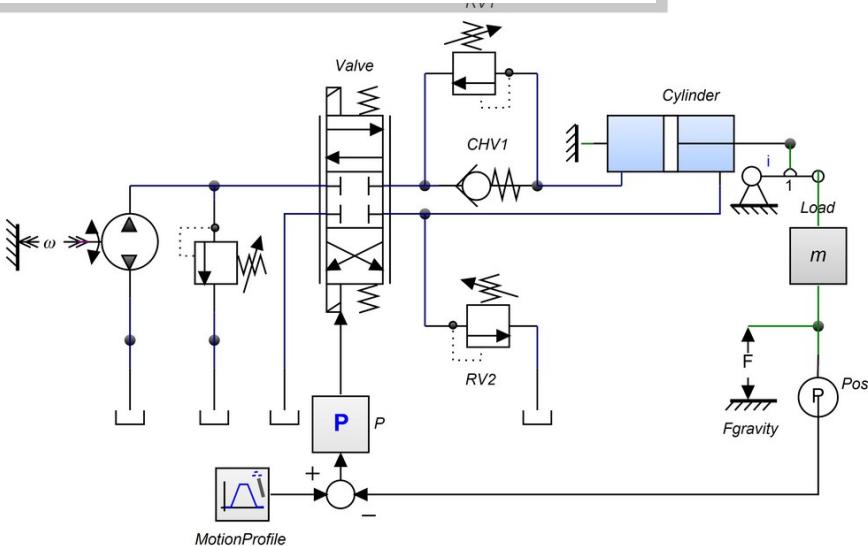
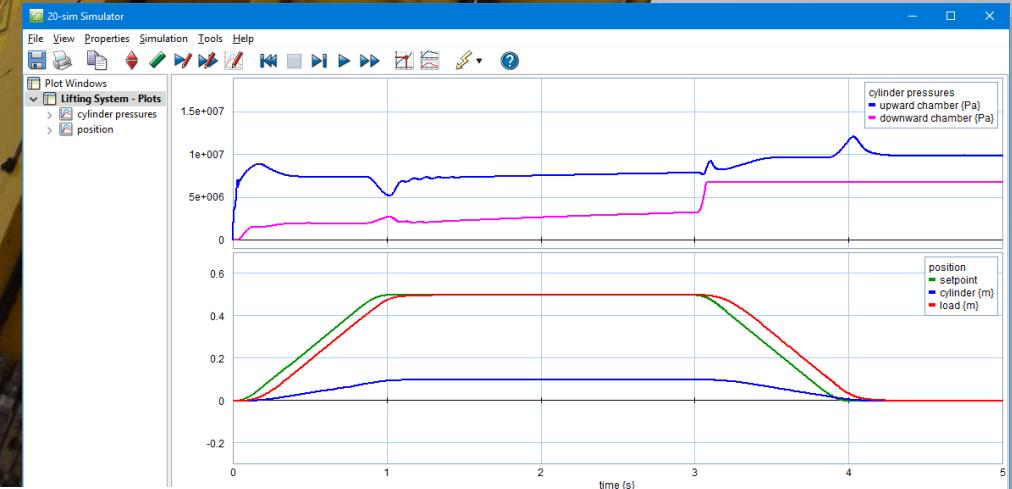
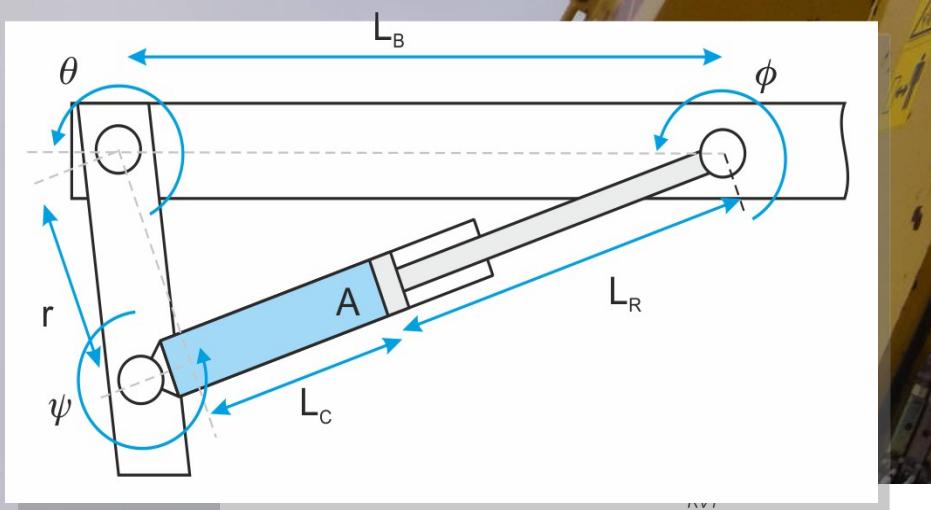
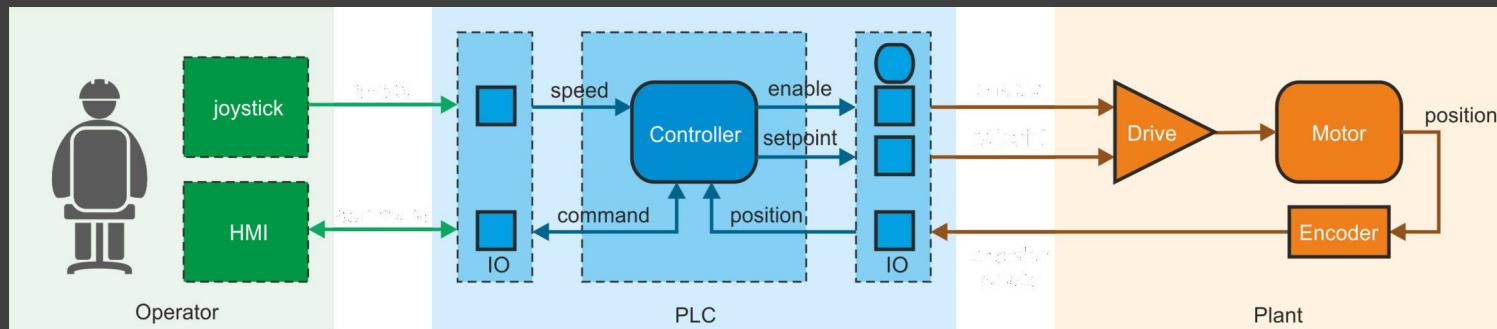


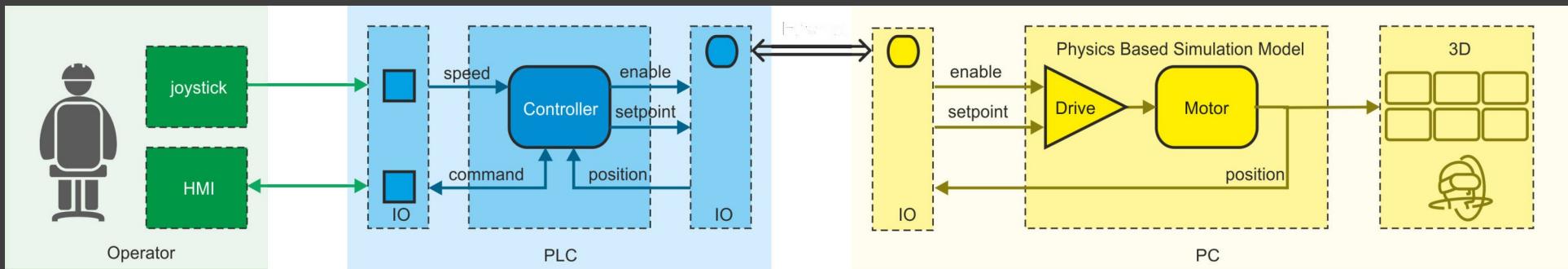
foto courtesy Jason Woodhead

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real machine

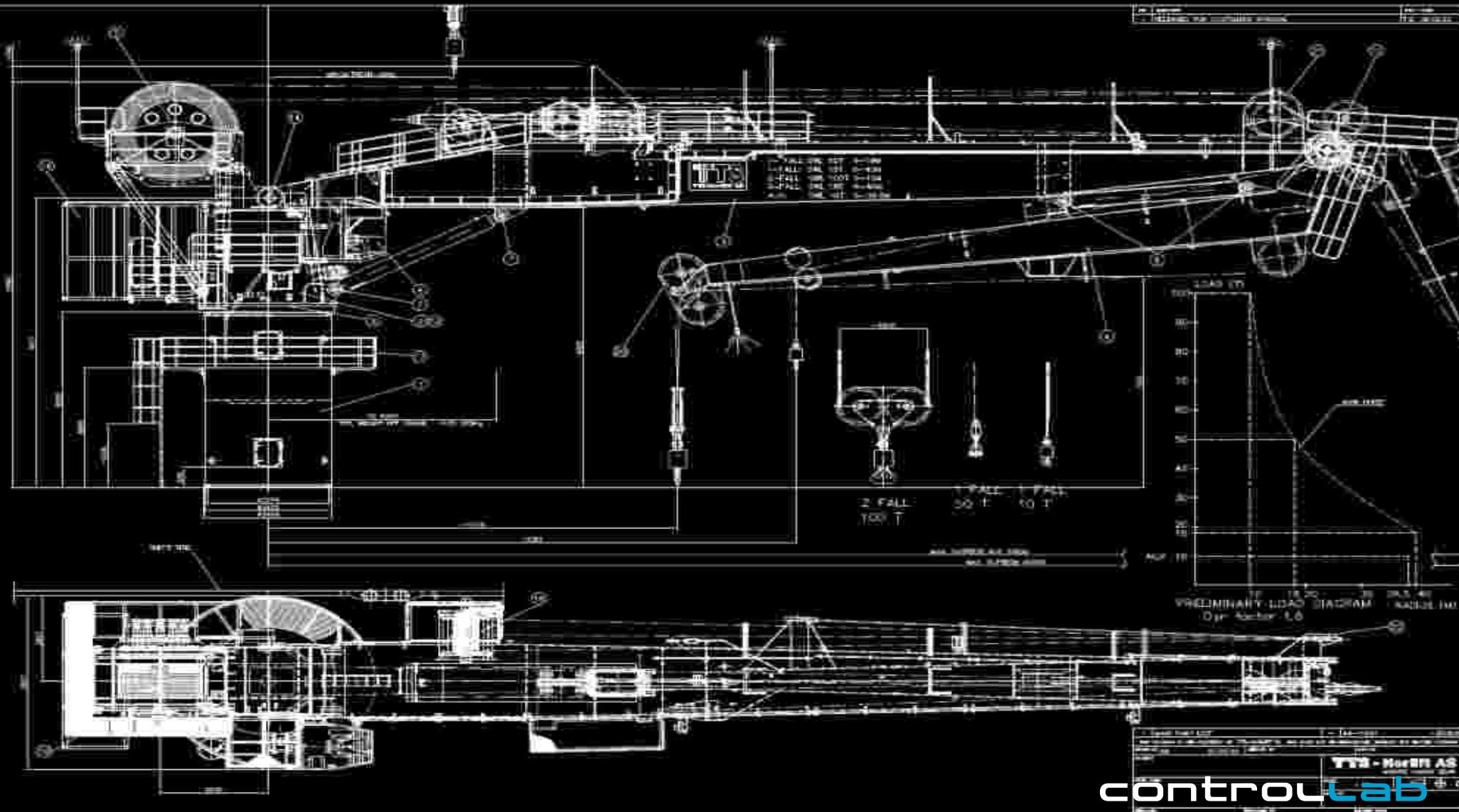


simulator

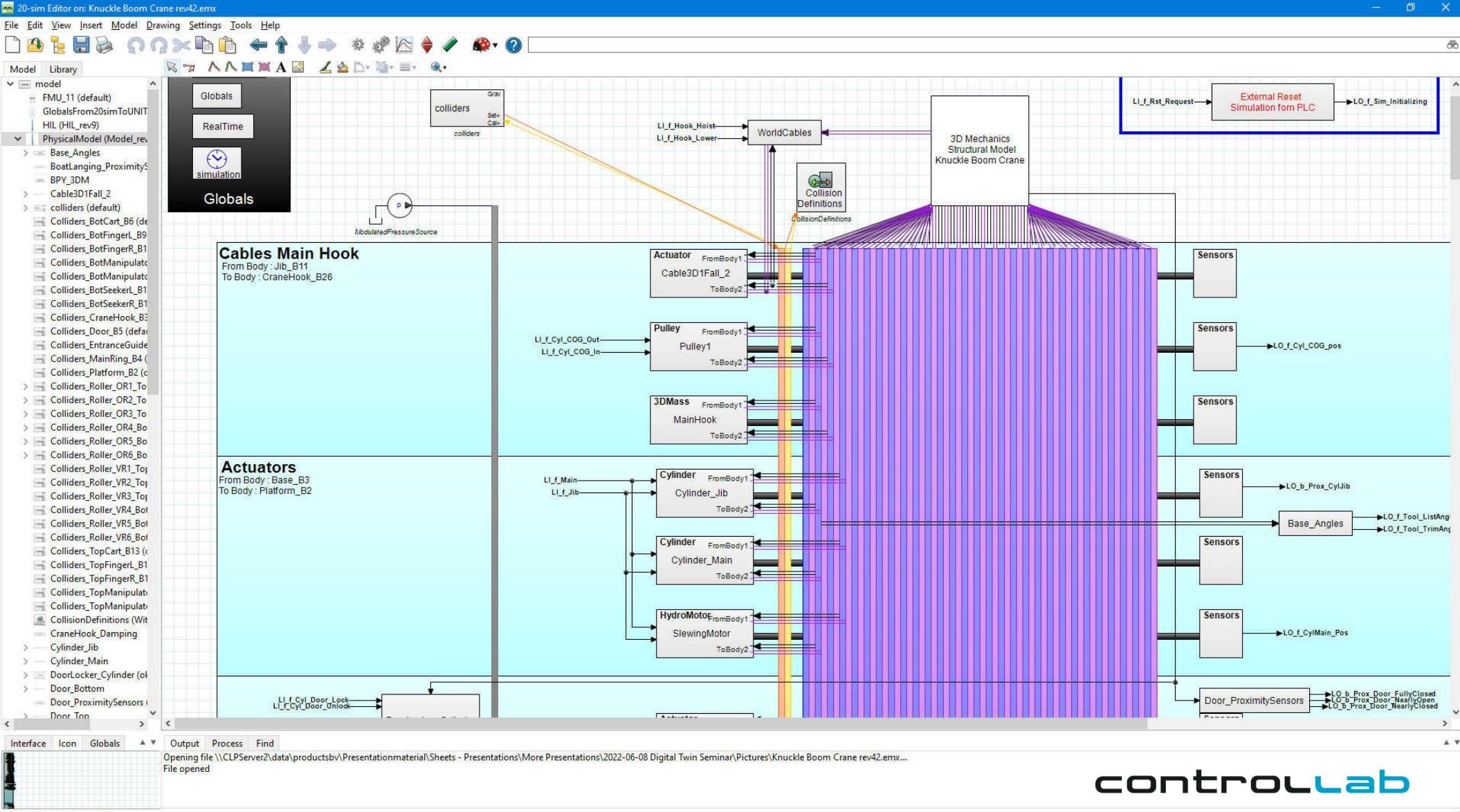


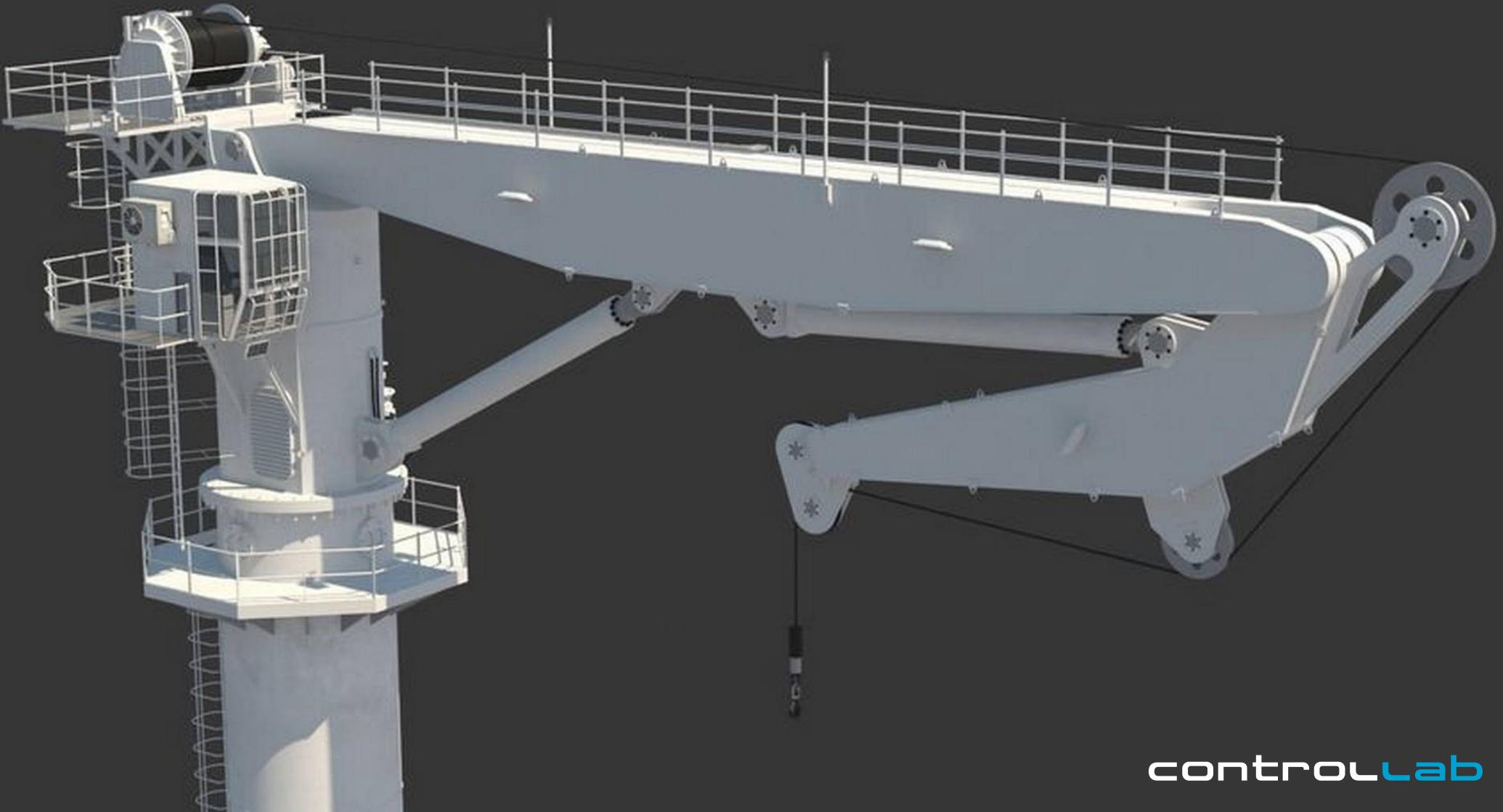


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Slewing :

Luffing :

Knuckling :

Cable Length :

Wind Speed :

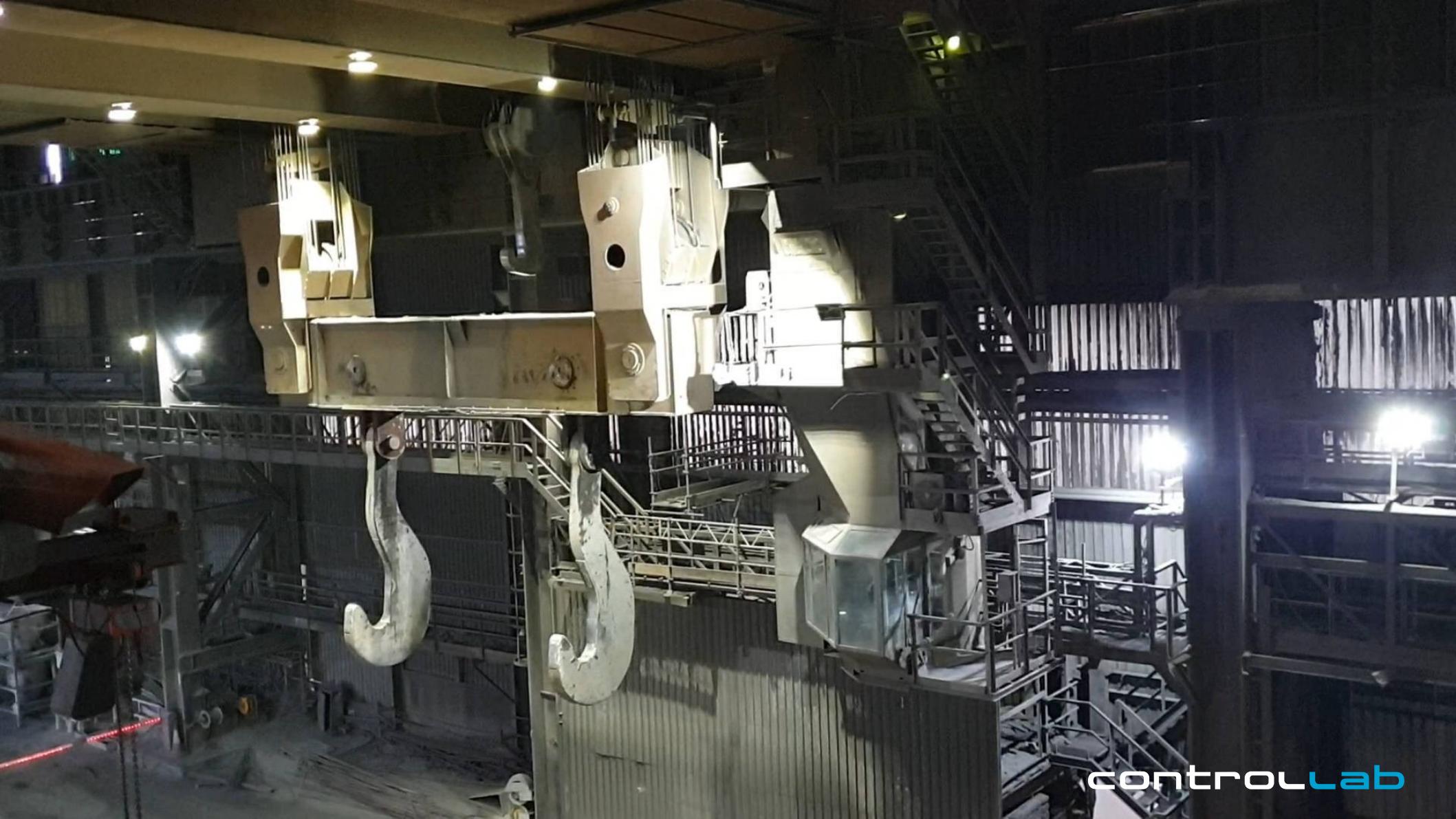
In Range :

CAM01

Motion
Compensation

Winch
DOWN

Luffing
DOWN



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CS Scenario 5 - Decanting a Hot Metal Ladle

Camera First Person Overview Task Hook engagement

Developed for Tata Steel Port Talbot by BLUF and Controlab Projects.

Training Pause Stop Simulation

Alerts Radio Outside Flight Path Collisions 3

Scenario Controls

Converter North Angle Traffic Light
Charging Iron Red

Converter South Angle Traffic Light
Charging Iron Red

Desulph North Hood Lance In

Parked Desulph South Hood

controlab





Digitale Tweelingen

betere en veiliger software

beter opgeleide mensen

kosten besparen