

**SPECIFIC PROCESSES IN EACH TERMINAL**

.....

# **HOW TO CUSTOMIZE AI WITH SCARCE DATA**

# ALLREAD



## **BASED IN BARCELONA**

*Founded in 2019*

## **REGISTERED TECHNOLOGY**

*AI Computer Vision Software*

*Benelux Office of Intellectual Property (BOIP)*

## **CUSTOMERS IN +10 COUNTRIES**

*Spain, France, Italy, Portugal, Germany, Sweden, Bulgaria, Chile, Brazil, Mexico, Argentina.*

## **25 TEAM MEMBERS**

*Experts in Cargo Logistics*

*Computer Vision and Deep Learning engineers.*

# LIGHT-WEIGHT ACCESS CONTROL

.....

*Highly Accurate*

*Low Hardware requirements*

*Fast Implementation*

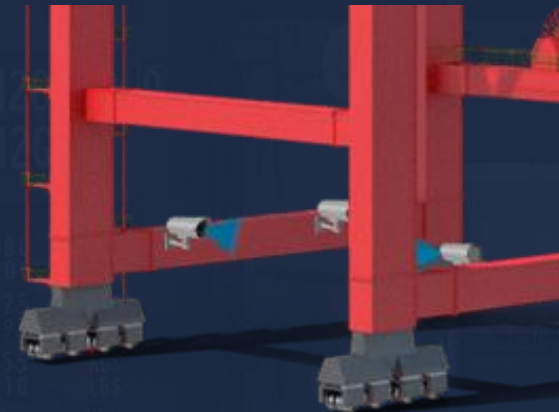
ARS<sup>©</sup> Road



ARS<sup>©</sup> Rail



ARS<sup>©</sup> Crane



# FROM LEGACY OCR TO THE BENEFITS OF DEEP LEARNING

.....



**RELY ON SOFTWARE, REDUCE HARDWARE**



# DETECTING STANDARD CODES AND OBJECTS



**BIC CODES**



**UIC CODES**



**IMDG CODES**



**LICENSE PLATES**



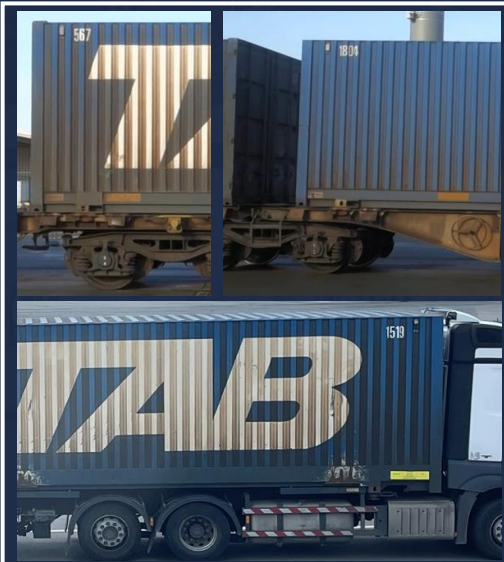
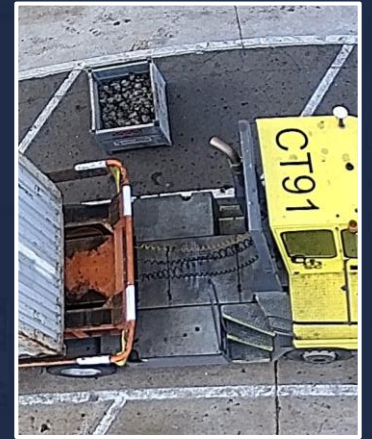
**TWISTLOCKS**

ETC...



# NUMEROUS PROCESSES IN TERMINALS STILL COUNTRY, COMPANY OR MANUFACTURER SPECIFIC

.....





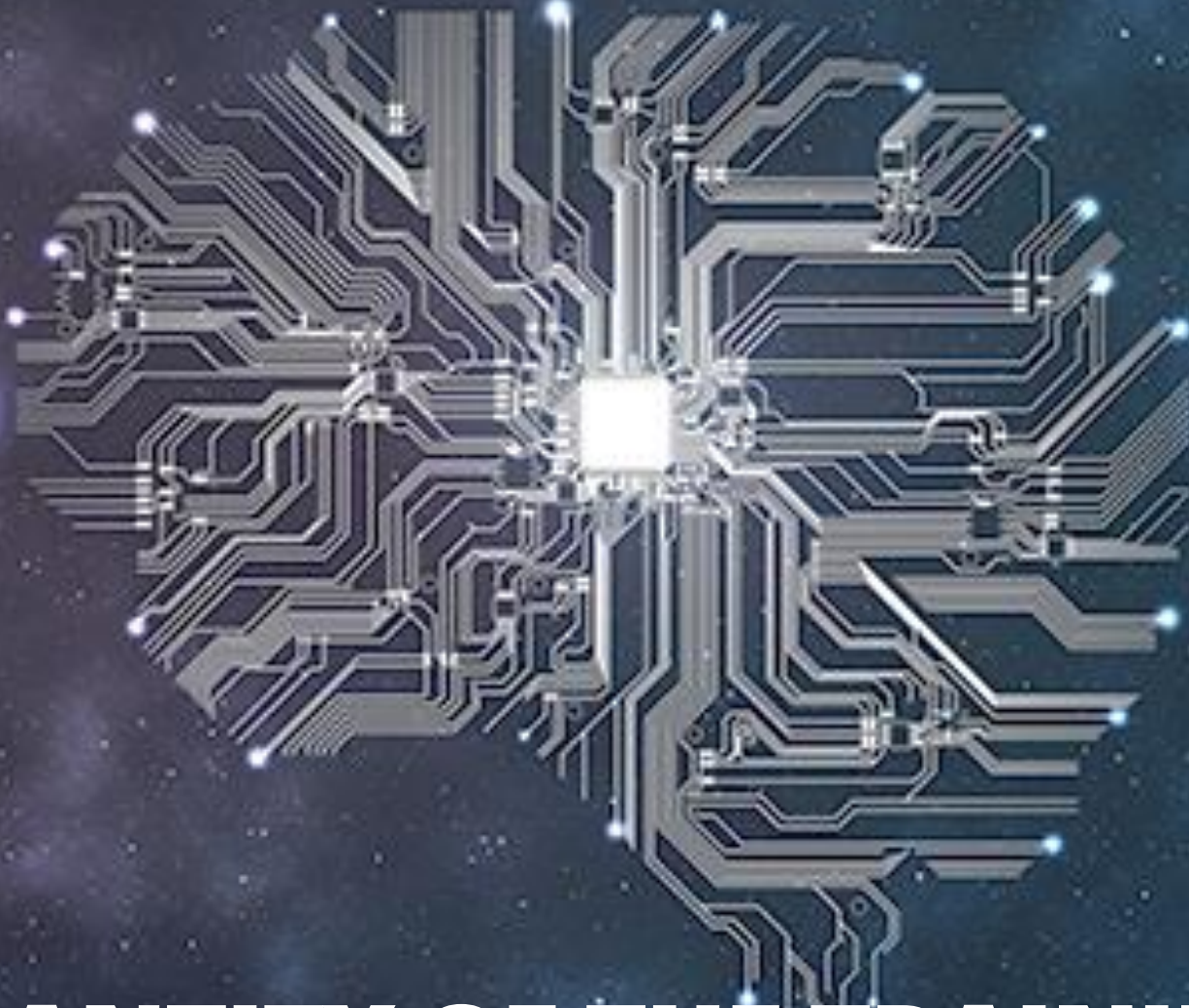


## Readings

SEAL CODES

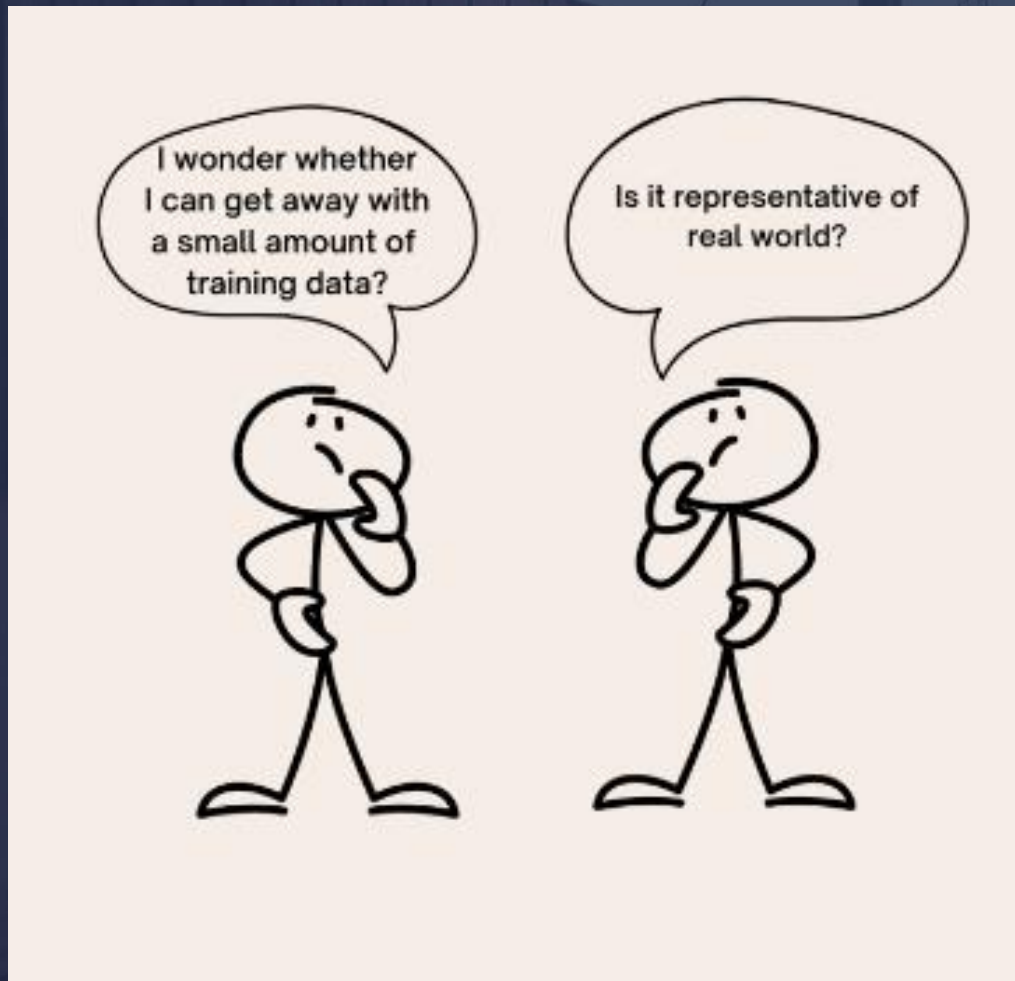
Show More ▾

**DEEP LEARNING RELIES ON THE QUALITY**



**AND QUANTITY OF THE TRAINING DATA**





YUP! YOU POUR THE DATA INTO THIS BIG PILE OF LINEAR ALGEBRA, THEN COLLECT THE ANSWERS ON THE OTHER SIDE.

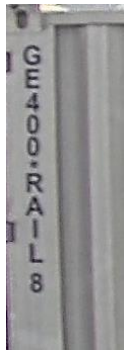
JUST STIR THE PILE UNTIL  
THEY START LOOKING RIGHT.



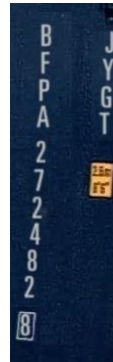
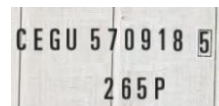
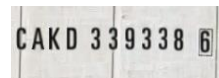
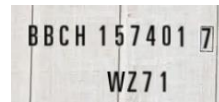
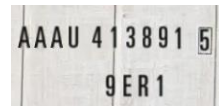
- 
- **Data collection**
  - **Synthetic data generation**
  - **Data augmentation**
  - **Transfer learning**
  - **Domain adaptation**



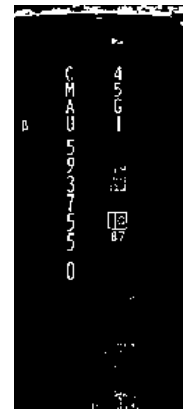
## DATA GATHERING



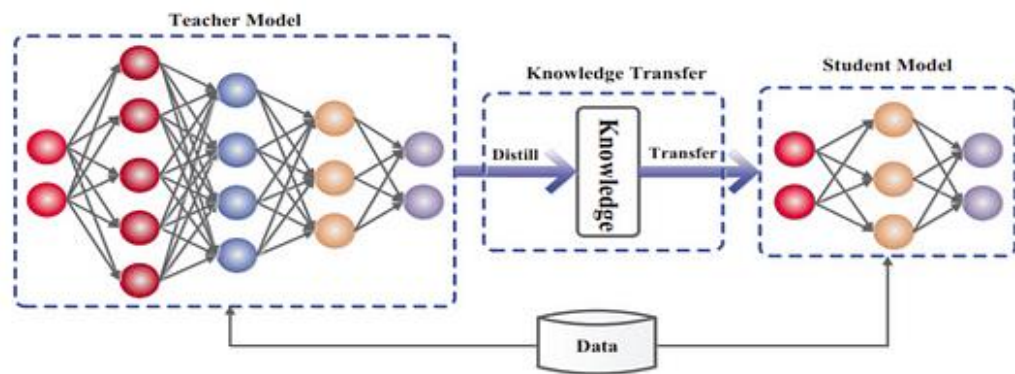
## DATA SYNTHETISATION



## DATA AUGMENTATION



# TRANSFER LEARNING & DOMAIN ADAPTATION





# CASE STUDY



ARGENTINA

# CASE STUDY



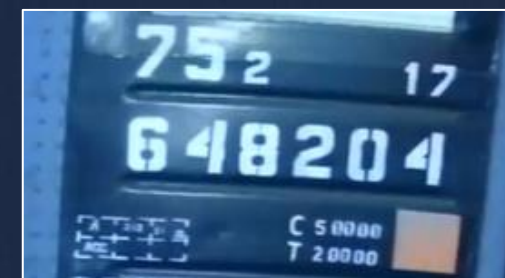
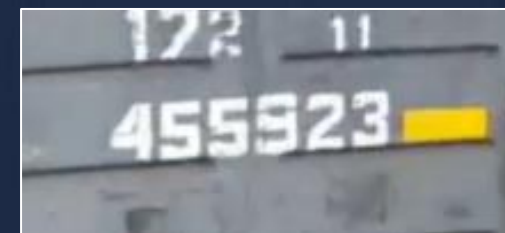
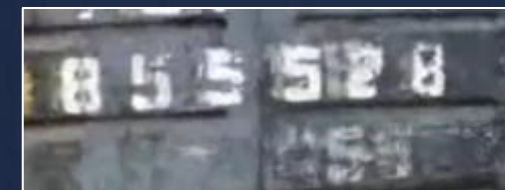
**What:** Automate and control inbound and outbound wagons by digitizing the identification numbers.

**Goal:** improve the efficiency of the wagon unloading process.



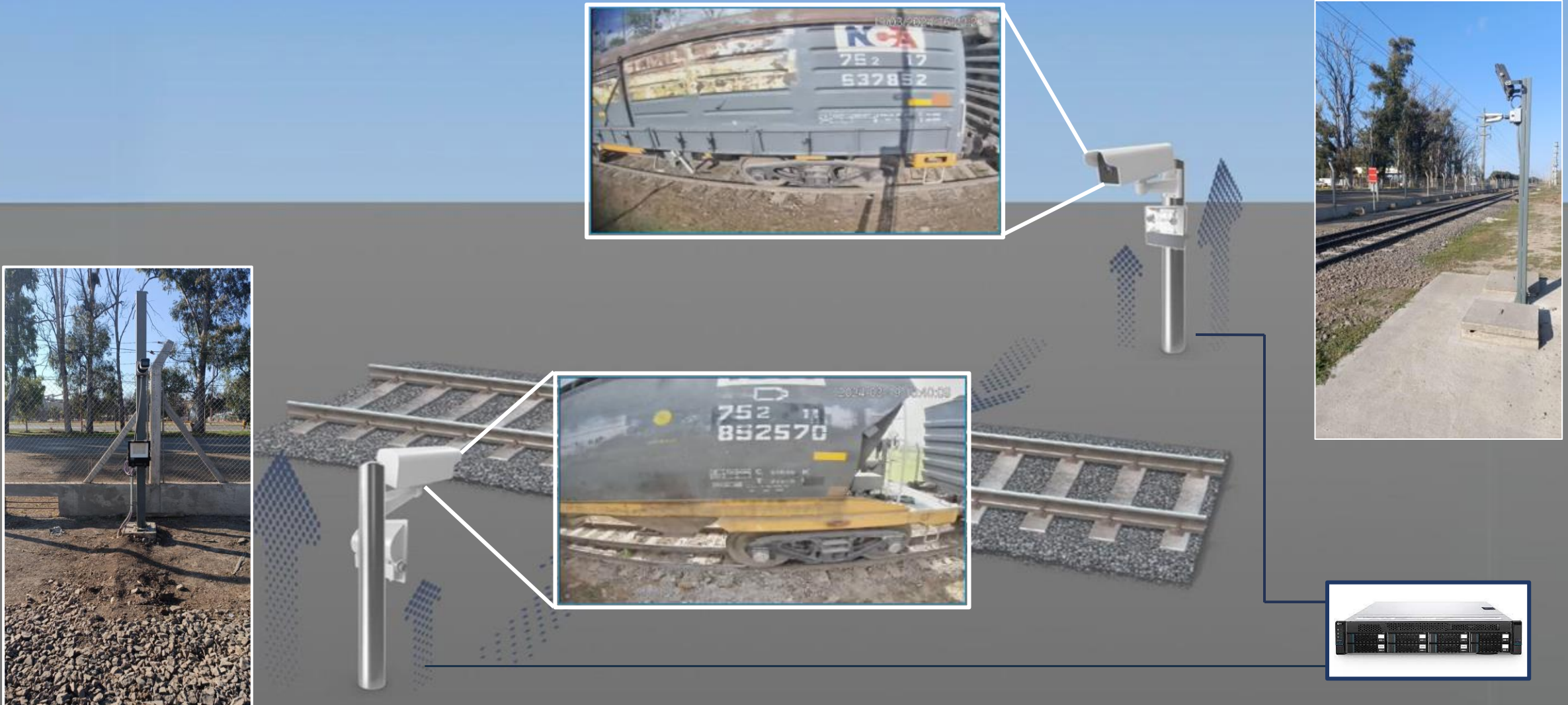
**Integration** with existing systems to register and identify in real time the wagons identification number along with their order and weight of the dynamic scale.

**Challenge:**  
No “off the shelf” solution for the **specific grain wagon** codes in T6.





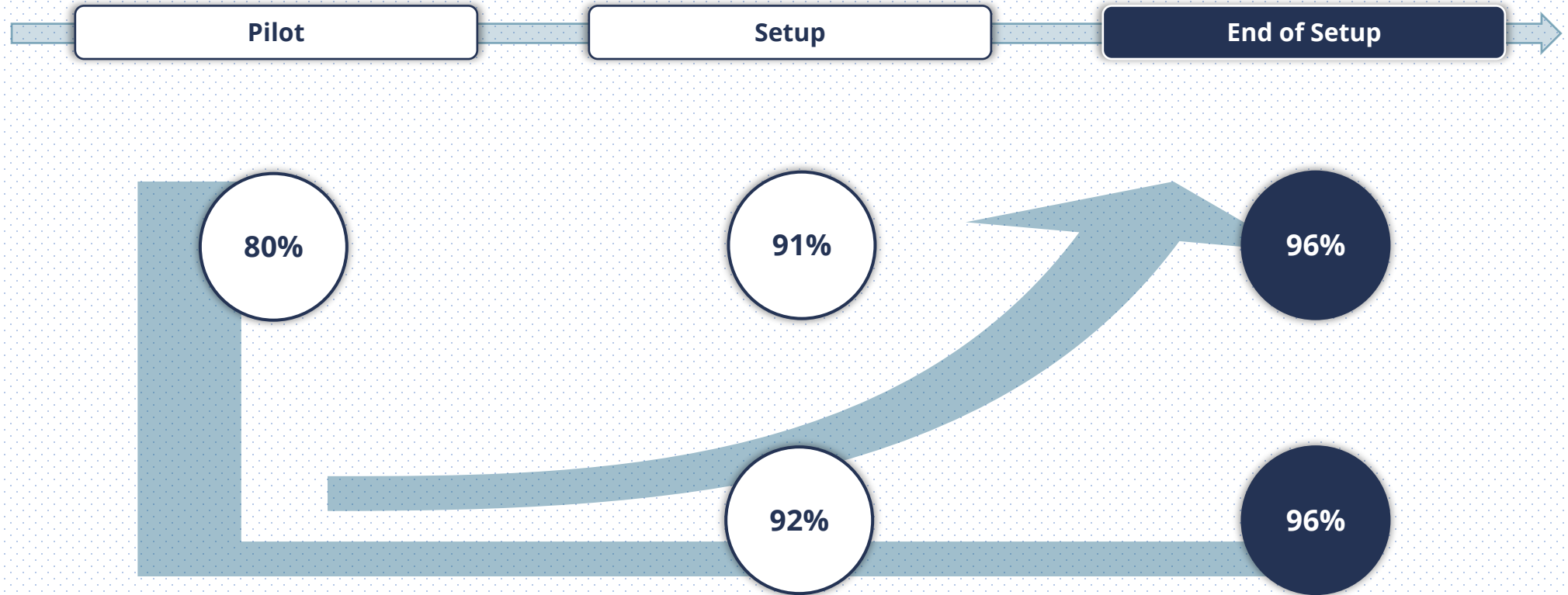
# MINIMALISTIC INFRASTRUCTURE



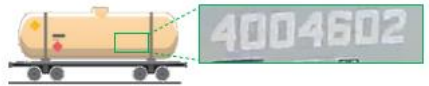
# RESULTS

.....

*From Pilot to Setup in few months. Short Time to Value.*



OCR Readings



Wagon Order







# THEY TRUST US



**30+ Active Clients**

*Port Authorities and Terminal Operators  
from 100.000 to 5.000.000 TEUs*

**70+ Completed Projects**

*For OCR Road, Rail and Cranes.*

**Active in 10+ Countries**

*in Europe and LATAM*





**Adriaan Landman**

COO & Co-Founder  
[adriaan@allread.ai](mailto:adriaan@allread.ai)  
+34 640 246 426

**TOC**  
AMERICAS

**MEET US  
AT STAND A8**