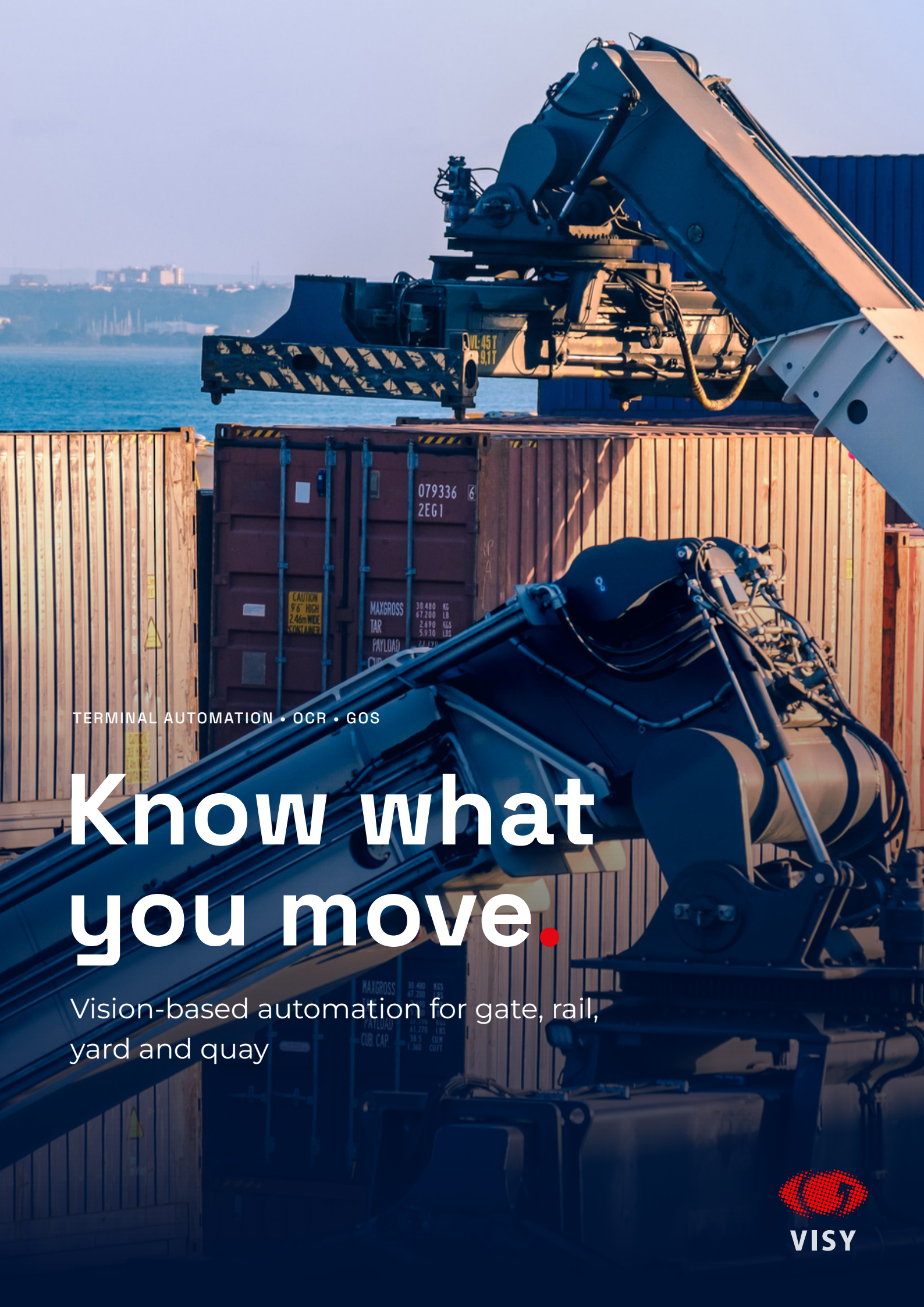


TERMINAL AUTOMATION • OCR • GOS

Know what you move.

Vision-based automation for gate, rail, yard and quay

VISY

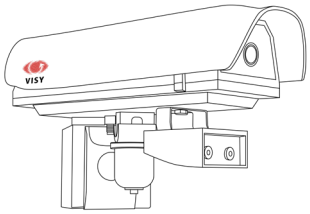
WHY VISY

Three decades in the terminal.

Since 1994 Visy has developed and delivered vision systems for ports and terminals. Our computer vision and OCR systems capture vehicle, container and cargo data automatically, and send it to your TOS the moment it's captured. Fewer manual checks, faster gates and a clear record of every move.



THE VISY OFFERING



Every truck, driver, train and container, identified automatically.

Visy systems work across gate, rail, yard and quay, and integrate seamlessly with your TOS. Start with one zone and add the next when you are ready.

WHAT VISY RECOGNIZES

- License plates
- Container IDs
- ISO codes
- Damage
- Door handle
- Dangerous goods labels
- Twistlocks
- Seal presence
- Weight markings
- Trailer IDs
- Chassis number
- Terminal tractor ID
- Vehicle location
- Trailer location
- Wagon IDs
- Tank IDs

WHAT YOU GAIN

01

Throughput

Faster truck turnaround and more moves per hour.

02

Lower operating cost

Less manual data entry and inspection work.

03

Safety and control

Fewer people in traffic areas, and a full image record of every move and traffic event.

PROVEN IN OPERATIONS

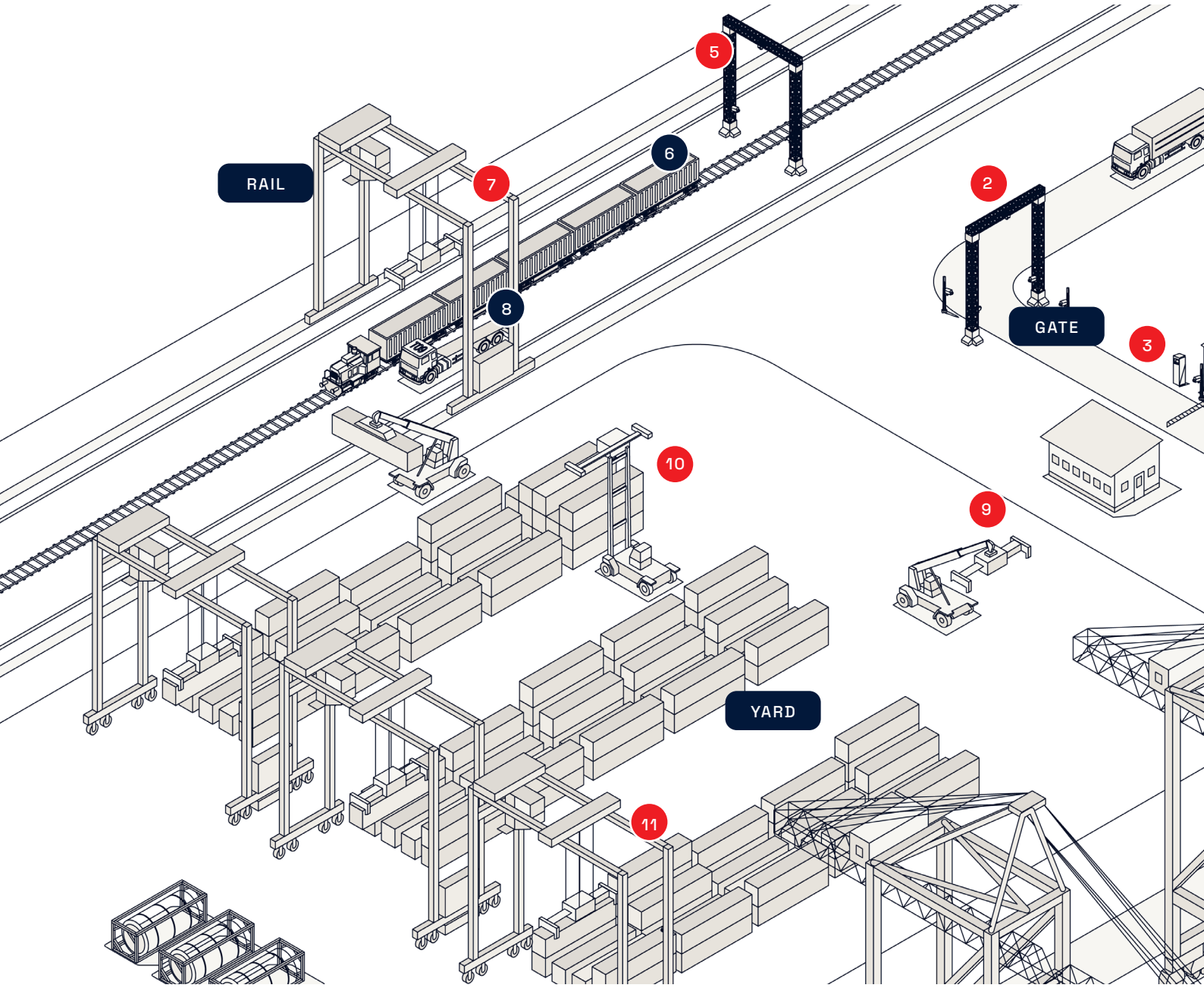
1994
developing vision technology since

30+
countries

6M+
automation tasks handled every day

500+
sites automated

One partner from gate to quay.



GATE

1 Visy Access Gate GOS

gate operating system that manages vehicle and cargo traffic, permits and exceptions.

2 Visy Truck OCR Portal

captures container IDs, plates, ISO codes and hazard labels while trucks keep moving.

3 Visy Gate Kiosks

self-service check-in for drivers at the gate.

4 Visy AREA

follows vehicles from gate to bay with high-mast cameras, and reports the final location to the TOS.

RAIL

5 Visy Rail OCR Portal

captures wagon and container data from moving trains.

6 Visy Train Gate

operator interface that turns rail events into train consist messages for your TOS.

7 Visy RMG OCR

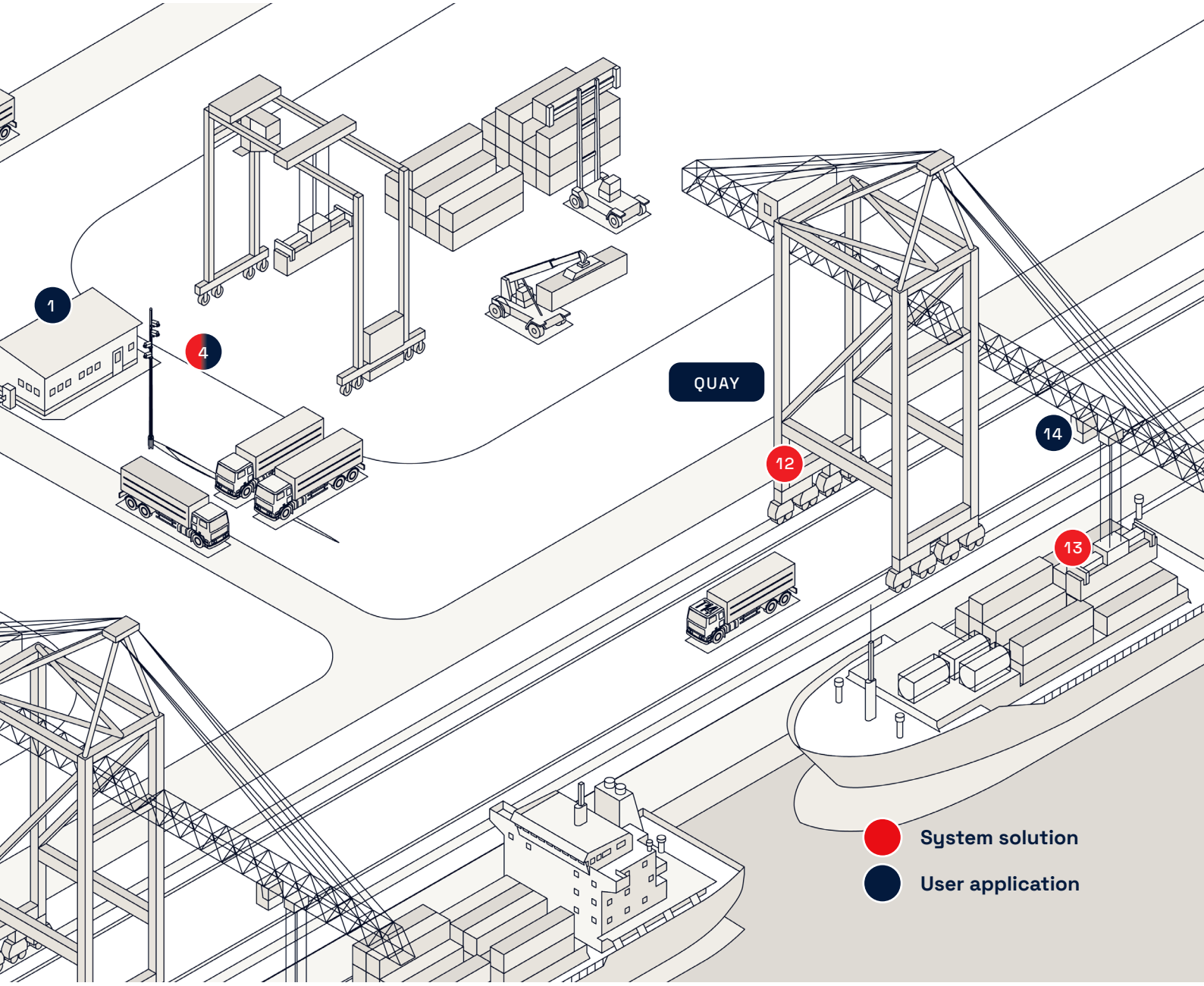
container identification, orientation and terminal tractor recognition on rail-mounted gantries at the rail interchange.

8 Visy Crane Gate

operator interface for crane operations, connected to TOS.

Copyright ©2026 Visy Oy

Every Visy system runs on the same in-house recognition software and shares data through one database platform.
Start with one zone and add more as your operations grow.



YARD

9 **Visy TopView for reach stackers**

captures container IDs before each move, creating a digital record of every lift.

10 **Visy TopView for other CHE**

captures container IDs before each move, creating a digital record of every lift.

11 **Visy RTG OCR**

container identification and twistlock checks on RTG cranes.

QUAY

12 **Visy STS OCR**

STS crane imaging and recognition during every lift.

13 **Visy TopView for crane spreaders**

spreader-mounted OCR that reads the container ID.

14 **Visy Wharf Suite**

apps that connect crane operators, lashers and coordinators during vessel operations.

AVAILABLE FOR VISY OCR SYSTEMS

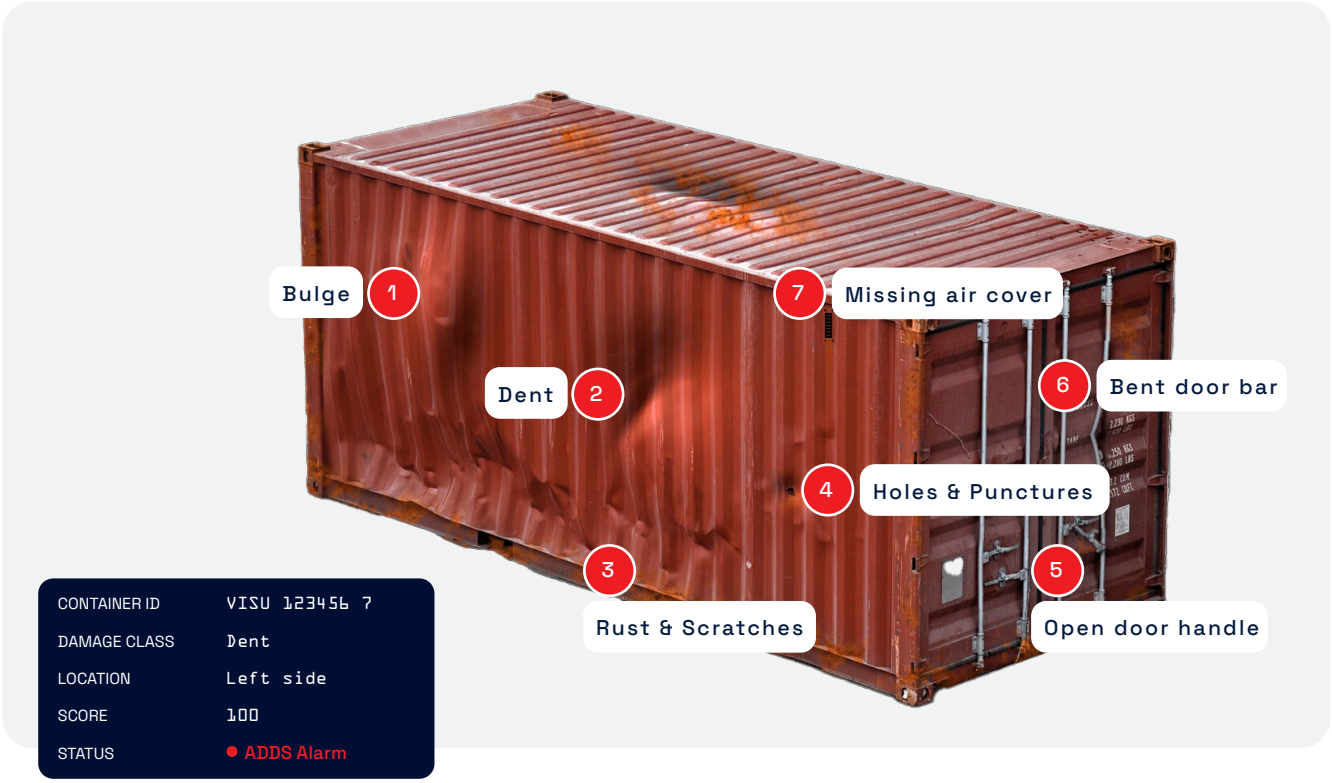
\+ **Visy ADDS 2.0**

Copyright ©2026 Visy Oy

ADDS 2.0 • AUTOMATIC CONTAINER DAMAGE DETECTION SYSTEM

Record the damage before it enters your terminal.

Visy ADDS 2.0 adds AI damage detection to your Visy OCR system, inspecting every container at the gate, crane and rail.



45 s → 27 s

reduced gate transaction time

WHAT VISY RECOGNIZES

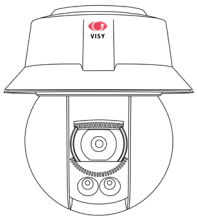
Damage

Results from a Visy customer site that previously checked container condition manually. Result achieved after combining OCR, ADDS and gate automation.

AVAILABLE FOR VISY OCR SYSTEMS

Truck OCR Portal | Rail OCR Portal | Crane OCR | TopView

Copyright ©2026 Visy Oy



1 — 2 — 3

Capture

Visy OCR cameras image every visible side of the container during operations, without stopping traffic.

Score

ADDS processes images and each detected damage gets a 0–100 score. You set the alert thresholds per damage class, per camera and per container side.

Act

Minor damage is processed automatically. When damage goes over the threshold, a clerk validates it from the images and decides on repair, denial or exception handling.

Every inspection leaves consistent, time-stamped image evidence for claims.

REAL DETECTION FROM LIVE TERMINALS

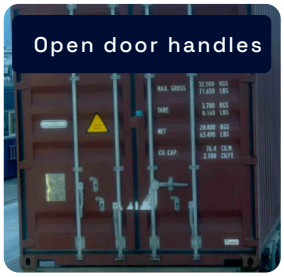




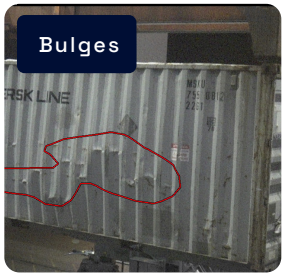




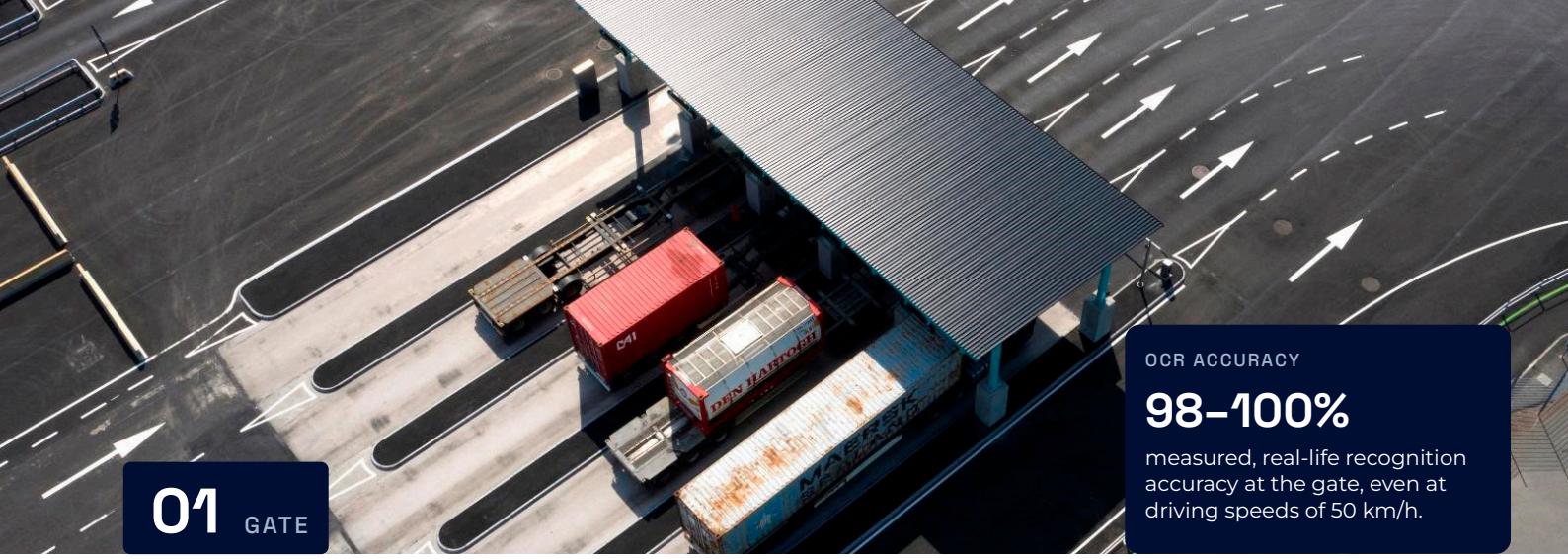












01 GATE

OCR ACCURACY

98–100%

measured, real-life recognition accuracy at the gate, even at driving speeds of 50 km/h.

SMART GATE

Gates that don’t slow you down.

Identify every truck and container on arrival, flag damage and make the gate decision automatically. Gate staff only need to step in for exceptions.

Visy Access Gate GOS 01

- Gate control
- License plate recognition
- Access permit management
- OCR result processing
- Exception handling
- All gate equipment can be supplied by Visy: RFID, traffic lights and barriers

Visy Truck OCR Portal 02

- Container ID, ISO code, license plates, seal presence, door direction, IMDG labels and trailer ILU codes
- 98–100% real-life recognition accuracy, at driving speeds of up to 50 km/h
- Works from −30 °C to +50 °C

Visy Gate Kiosks 03

- Drivers check in, confirm bookings and receive instructions without leaving the cab
- Kiosk App and interface tailored to your workflow and brand

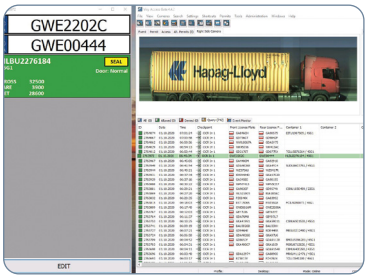
SEE ALSO

AREA vehicle tracking p. 10

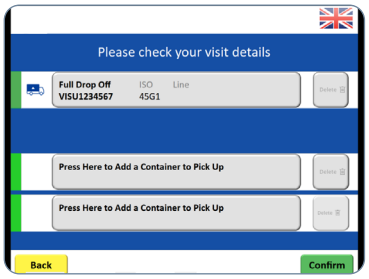
ADDS 2.0 damage detection p. 06

SOFTWARE AND DATA FLOW

The gate decision is made in Access Gate GOS. Only exceptions go to an operator.



VISY ACCESS GATE GOS



DRIVER KIOSK APP



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What the portal sees.

One drive-through produces a full image record of the truck and its container(s). Each camera has its own imaging task, and the OCR results reach your GOS and TOS as one gate transaction.

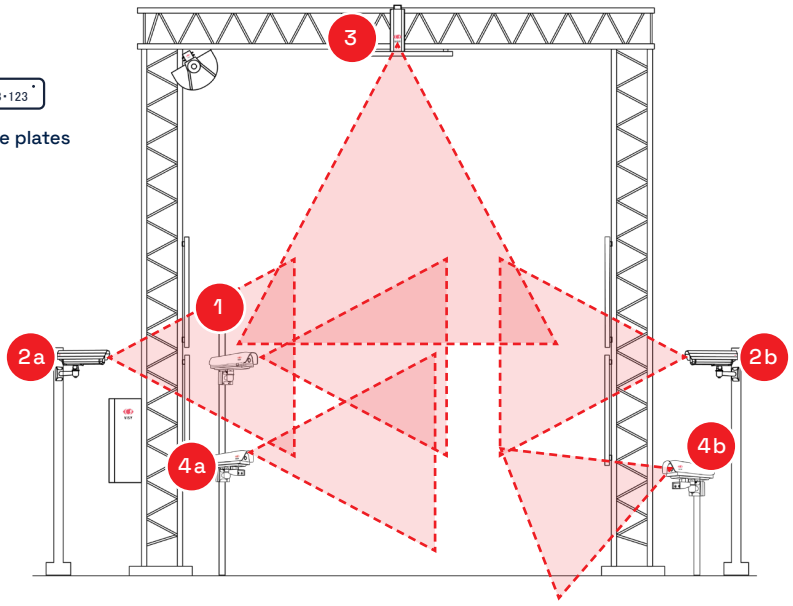
RESULT

Faster gates, more trucks through the same lanes, less idling in the queue.

MANUAL	Truck stops at the gate booth or parks, and the driver visits the gate house.	Clerk keys in the container ID and plate, and verifies the driver's ID.	Damage checked by walking around the container.	Gate decision made and recorded manually.
WITH VISY	1 Truck drives through the portal	2 IDs captured and sent to the GOS instantly	3 ADDS 2.0 flags damage automatically	4 Automatic decision; only exceptions go to an operator

WHAT VISY RECOGNIZES

- Container IDs
- Door handle
- License plates
- ISO codes
- Seal presence
- Damage
- Weight markings
- Dangerous goods labels
- Trailer IDs



TRUCK OCR PORTAL • FRONT VIEW



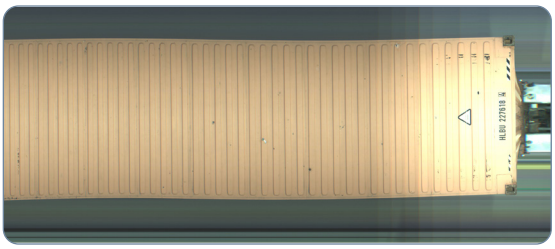
1 Rear camera



2a Right linescan camera



2b Left linescan camera



3 Top linescan camera



4a Rear license plate camera



4b Front license plate camera

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SMART GATE • VISY AREA

From the gate to the bay, one track.

Visy AREA picks up a vehicle at the gate and follows it to its bay. The plate, container and trailer IDs read at the Truck OCR Portal stay attached to the vehicle the whole way, so you know what each truck is carrying as well as where it is.

IN THE AREA USER INTERFACE



LIVE MAP: EVERY TRACKED VEHICLE ON ONE SITE MAP

WHAT VISY RECOGNIZES

Vehicle location

Trailer location



MULTIPLE CAMERAS KEEP TRACK FROM GATE TO BAY

IDs from the gate 01

The plate and container ID read at the gate stay attached to the vehicle as it moves through the yard.

One map 02

High-mast cameras, typically two to three per mast, merge their views into one GPS map.

Location to your TOS 03

When a vehicle settles in a bay, its location and IDs are sent to your TOS.

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Less waiting at the gate.
More moving through it.
Expand
Your vision

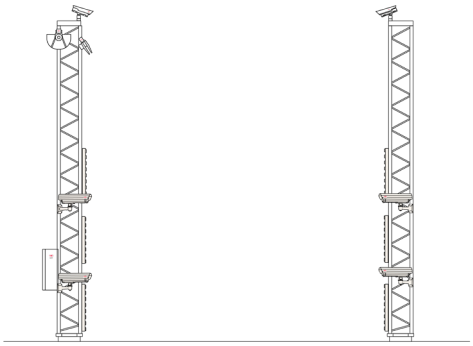


02 RAIL

SMART RAIL

Every wagon and container ID, captured on the move.

Capture full train data while the train is moving, review it in one screen and send it to your TOS without walking the track.



RAIL OCR PORTAL

01
Train passes the portal.

02
Wagon and container information are captured.

03
Operator reviews events and sends data to TOS.

04 • TOS
Train consist message goes to the TOS.

Visy Rail OCR Portal 05

- Container IDs, wagon IDs, ISO codes, hazard labels, and wagon length, weight and capacity markings
- Captures data even at train speeds of up to 70 km/h
- The image record supports retrospective damage review

Visy Train Gate 06

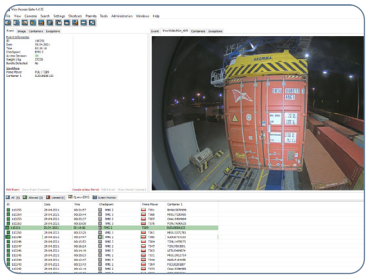
- Recognition data and images are available for review and editing
- One click sends the train consist (wagon numbers and container positions) to the TOS

SOFTWARE AND DATA FLOW

Train Gate and Crane Gate exchange train visits, consist lists and work queues with TOS.



VISY TRAIN GATE



VISY CRANE GATE



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What the rail portal sees.

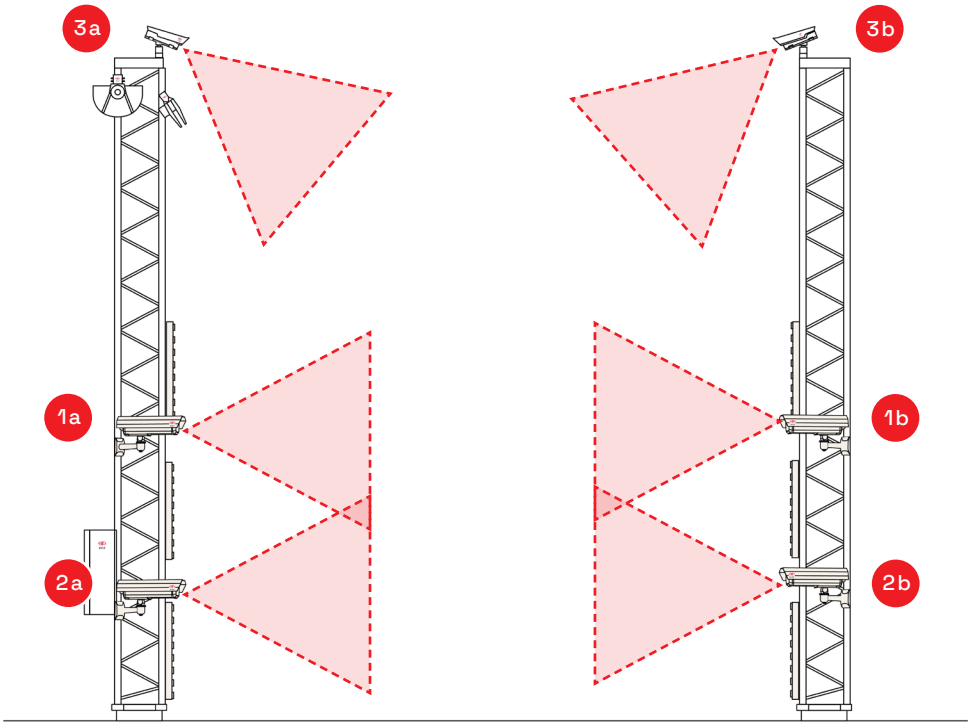
Cameras on both masts image each side of the train as it passes. Wagon and container data are combined into one train list for review.

RESULT

Trains keep moving. Inspections move to the office.

WHAT VISY RECOGNIZES

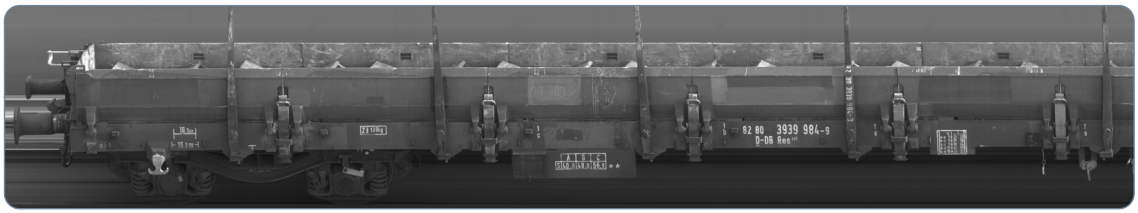
- Container IDs
- Wagon IDs
- ISO codes
- Tank IDs
- Damage
- Weight markings
- Dangerous goods labels



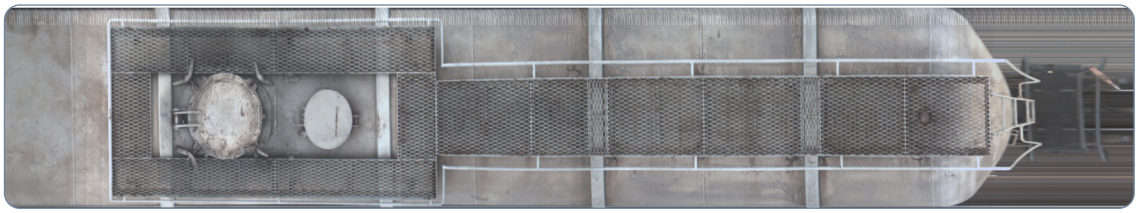
RAIL OCR PORTAL • FRONT VIEW



1 Container imaging



2 Wagon imaging



3 Imaging from top

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Captured at the crane – shared with your TOS.

RESULT

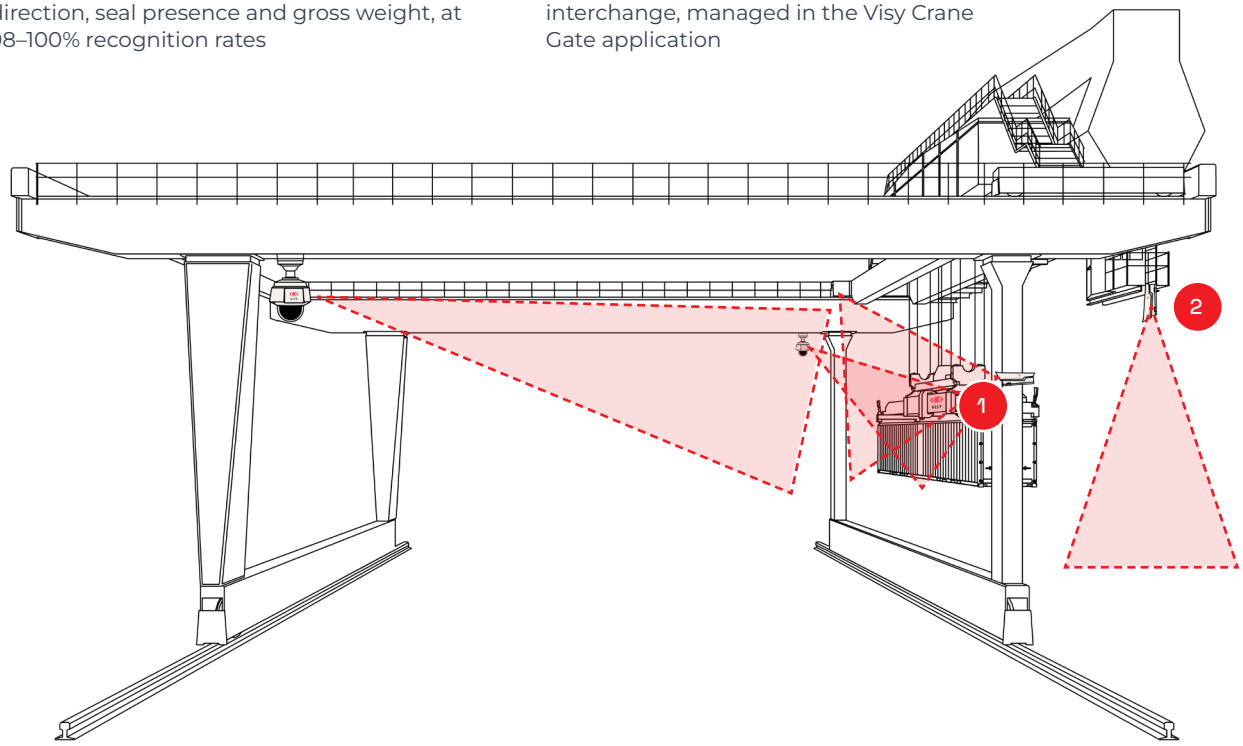
RMG OCR replaces manual container checks, so the TOS knows what was lifted and where it went.

Fixed cameras on the crane legs and beams image the container on every lift. Imaging is triggered based on the status information of the crane and the spreader received from the PLC or CCS.

Visy RMG OCR

07

- Container ID, ISO code, IMO/ADR labels, door direction, seal presence and gross weight, at 98–100% recognition rates
- Short and long side imaging at the rail interchange, managed in the Visy Crane Gate application



RMG CRANE • FRONT VIEW



1 Door side and container end imaging



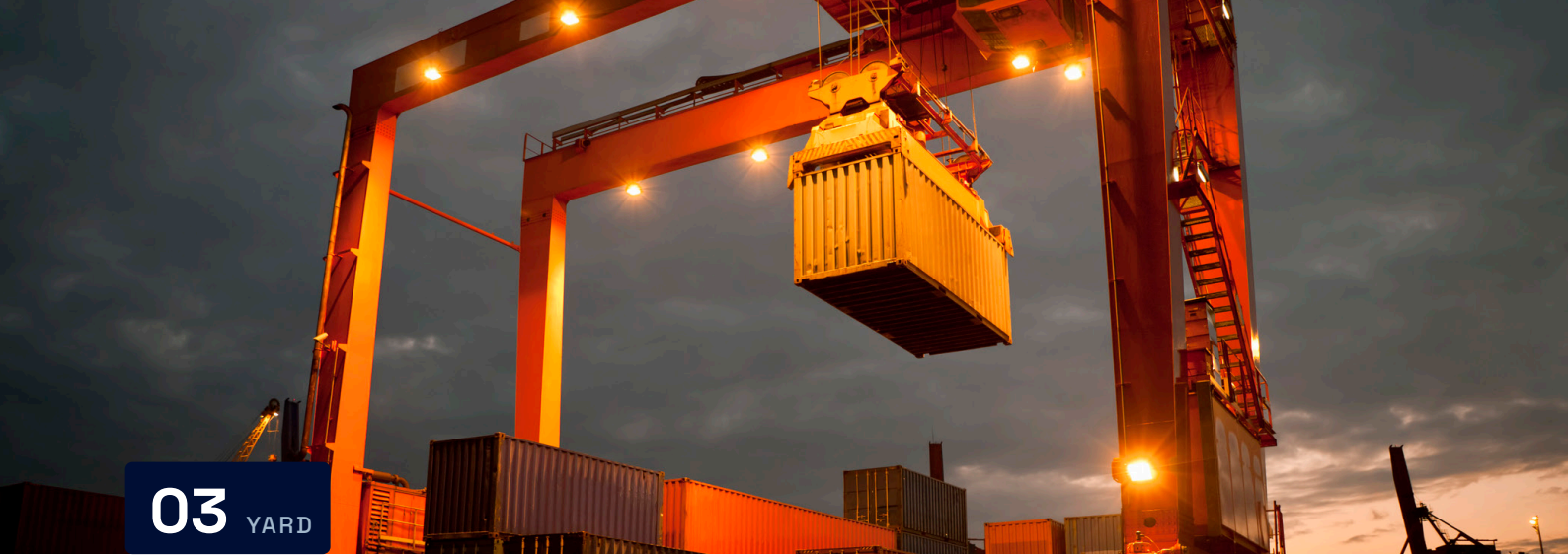
2 Terminal tractor ID recognition

WHAT VISY RECOGNIZES

- Container IDs
- Door direction
- ISO codes
- Weight markings
- Dangerous goods labels
- Terminal tractor ID

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Expand
Your vision
GCXU 553301 7
45G1
70
Every wagon number and container position, captured on arrival.

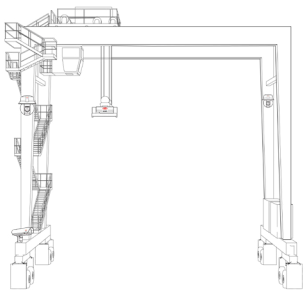


03 YARD

CONTAINER HANDLING • YARD

Get every move and stack position right.

Identify containers on yard cranes and handling equipment, prevent lift errors and keep stack positions accurate in the TOS.



RTG CRANE

Visy TopView for reach stackers and top handlers 09

- Reads the container ID from the roof and long side with cameras on the spreader
- Two cameras pointing down on the container ends and one towards the approaching long side

Visy TopView for side handlers 10

- Two cameras pointing towards the container roof to capture IDs

WHAT VISY RECOGNIZES

Container IDs

Visy RTG OCR 11

- Reads the container ID on every lift
- The ID is shared with the Position Detection System, which confirms where the box lands and updates the TOS
- Options: TopView, long-side imaging for ISO codes and IMO labels, terminal tractor recognition by OCR or RFID
- Twistlock detection stops the task through the crane control system when locks are mistakenly left on
- Also compatible with ASCs

WHAT VISY RECOGNIZES

Container IDs | ISO codes | Terminal tractor ID

SOFTWARE AND DATA FLOW

Every lift is confirmed by ID and position before the TOS is updated.

CAPTURED ON THE LIFT		CONFIRMED WITH		UPDATED
RTG OCR TopView Twistlock detection	→	RTLS PLC CCS	→	TOS stack position

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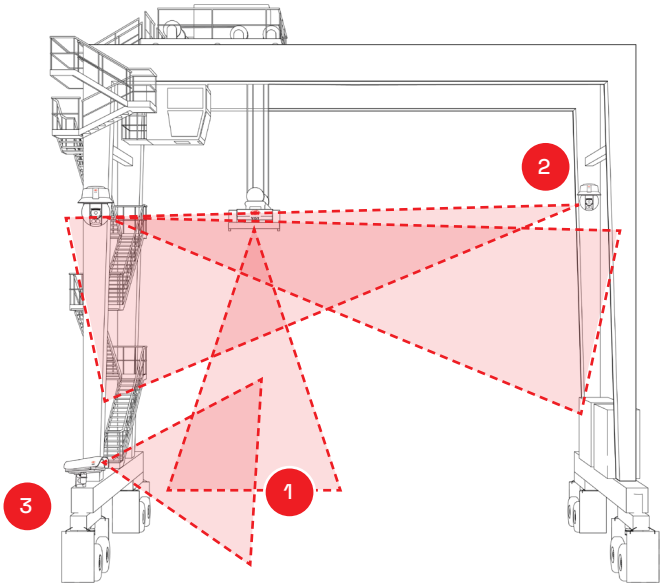
CONTAINER HANDLING • YARD • RTG & TOPVIEW

What the cameras see.

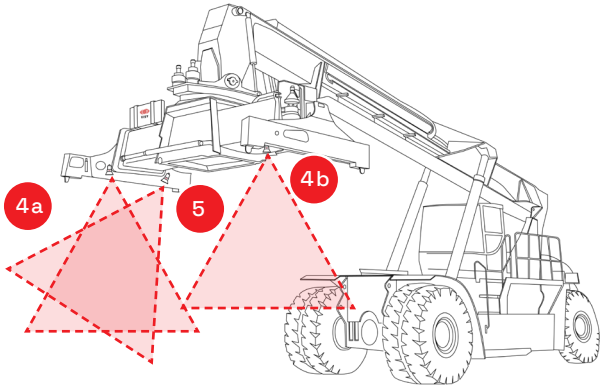
Cameras on both RTG legs image the container sides on every lift. TopView can be added to cover container roof imaging.

RESULT

An inventory that matches the yard.



RTG CRANE • FRONT VIEW



REACH STACKER • FRONT VIEW



1 TopView event image



4 Container ID from the roof



2 Longside imaging



5 Container ID from the side

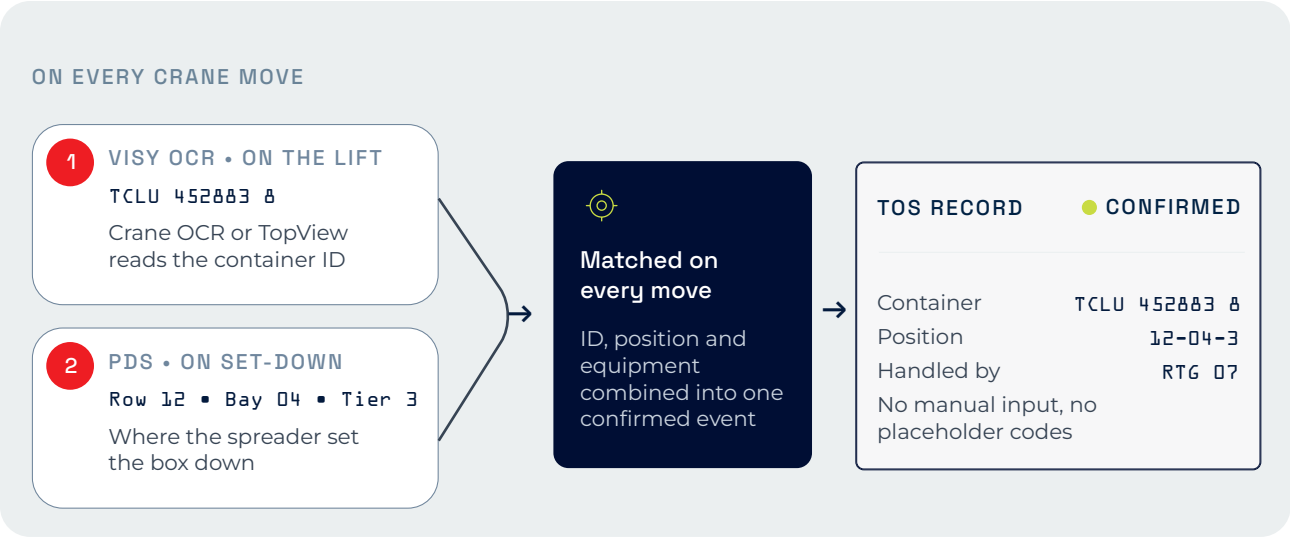


3 Twistlock detection

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Position and identity, confirmed together.

A Position Detection System (PDS) knows where a spreader set a box down, but not for certain which container it is.
Visy OCR adds the verified container ID to every lift, so each position in your TOS is confirmed by both location and identity.



POSITION DATA ALONE	POSITION CONFIRMED WITH OCR
GPS-based system picks the wrong container from a trailer carrying 2×20 ft containers	The ID read on the lift shows which of the two containers was handled
Placeholder codes created for containers that shouldn't have been there (ghosts)	Every container is recorded under its real ID
A location shows a container that is not there, or one with the wrong ID	Errors are corrected as containers are handled, instead of being found later in costly audits

WHAT CHANGES IN THE YARD

Fewer wasted moves and rehandles

No ghost containers or inventory errors

Higher equipment utilization and lifts per hour

Faster vessel turnaround

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Know every container ID before starting the move.

Expand
Your vision

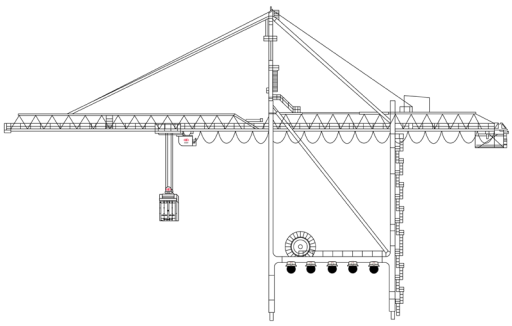


04 QUAY

CONTAINER HANDLING • QUAY

Know what's on the hook.

Identify every container during the lift, verify each move against the work order and inspect its condition. The Wharf App suite gives the crane operator clear loading instructions on every move.



STS CRANE

Visy STS Crane OCR 12

- PTZ cameras on the portal beams and legs image each side of every container, with no moving mechanical parts on the crane
- Container ID, ISO code, IMDG/ADR labels, seal presence, door direction and weight markings
- Covers single, twin, tandem, quad and tank lifts, plus backreach and platform operations
- Interfaces with the crane PLC and CCS to time each image along the spreader flight path
- Terminal tractor numbers are read with the same cameras

Visy TopView on STS spreaders 13

- Reads the container ID from the roof as soon as the twistlocks engage
- Checks the ID against the work order and shares it with the TOS in real time
- Prevents false lifts
- Captures a full roof image that can support damage claims
- Feeds early ID verification to the Visy Crane Gate Wharf apps to enable loading instructions

FROM THE CRANE







SOFTWARE AND DATA FLOW

Visy Wharf apps run on the same TOS integration as Visy Crane Gate.

CAPTURED ON THE LIFT	VISY APPLICATION	UPDATED
STS Crane OCR TopView TT number recognition →	Visy Crane Gate Visy Wharf apps →	TOS

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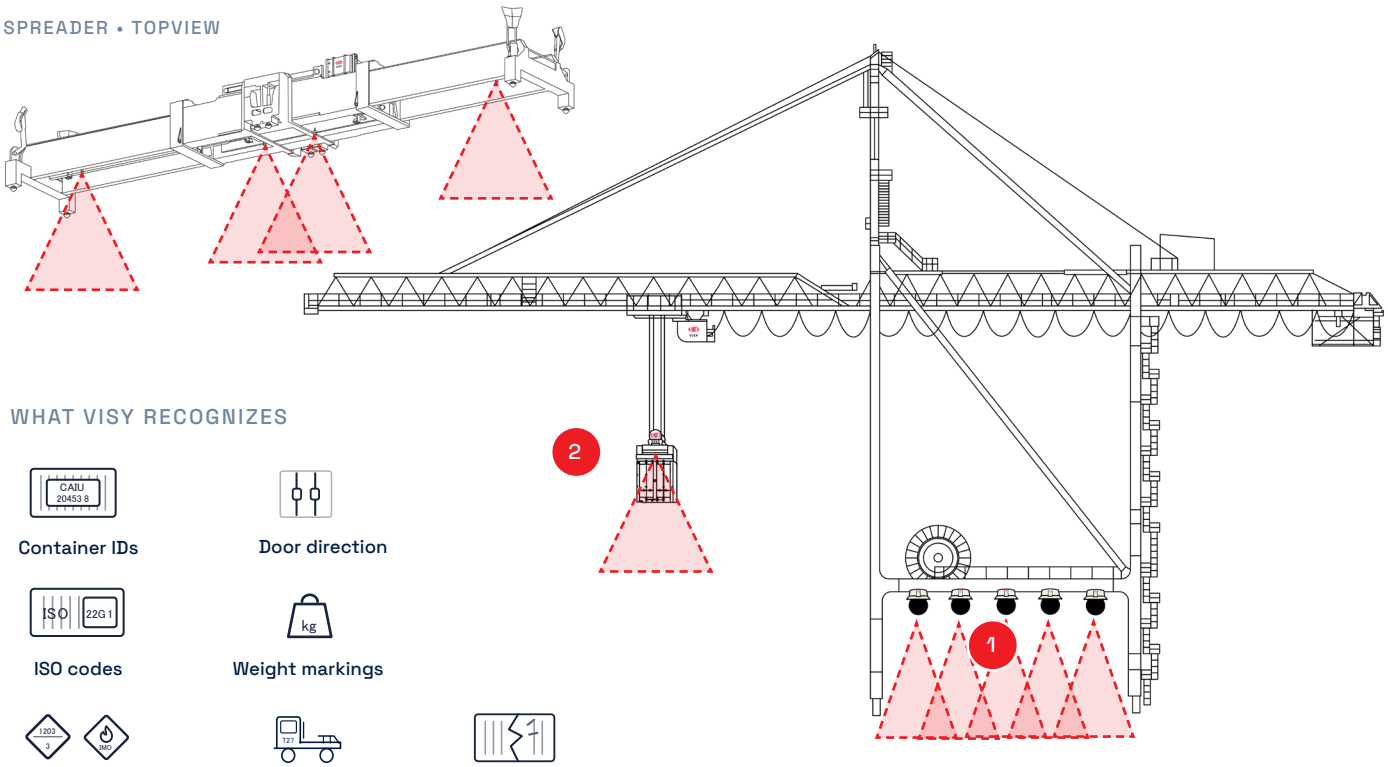
RESULT

Every box confirmed at the crane.

What is captured from the box.

PTZ cameras under the portal beam image the container sides as each box passes through the portal. TopView cameras on the spreader read the roof during the lift.

SPREADER • TOPVIEW



STS CRANE • FROM SIDE

WHAT VISY RECOGNIZES

- Container IDs
- Door direction
- ISO codes
- Weight markings
- Dangerous goods labels
- Terminal tractor ID
- Damage



1 Container sides

Complete long side captured for damage claims



2 ID from the roof

Read from the spreader on every lift



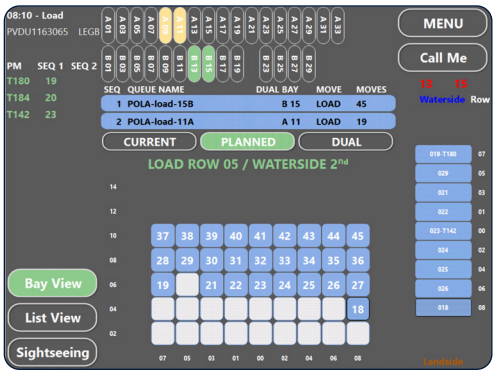
1 Door side

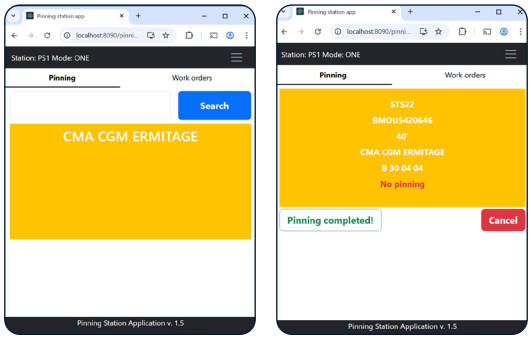
Seal presence is checked and other information is captured

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One live workflow from cab to office.

Visy Crane Gate already exchanges data with your TOS. We built the Wharf App suite on that integration, so crane operators, lashers and coordinators work from the same live information, in one shared workflow.





IN THE CRANE CAB

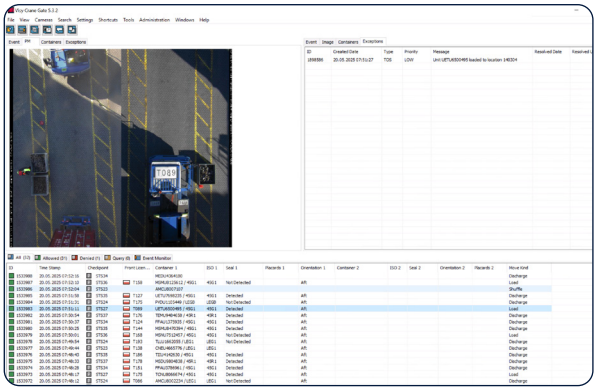
Wharf App

- Loading instructions on screen and as audio
- Containers not planned for discharge are flagged, eliminating false lifts
- Completed moves confirmed back to the TOS automatically

ON THE QUAY

Pinning App

- Precise twistlock instructions, with lock types and destination
- Container data retrieved automatically from the TOS
- Tied to the terminal tractor's task and its containers



IN THE OFFICE

Wharf Dispatcher View

- Loading sequences managed from one interface
- Every terminal tractor visible in real time
- Event images checked on the spot, exceptions handled immediately

Visy Crane Gate

Every app runs on the same TOS integration, so the cab, quay and office share one source of truth for live instructions and moves.

TOS

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CASE STUDY

Baltic Hub

Wharf optimization with STS Crane OCR, TopView and Visy Crane Gate Wharf apps. The whole container journey between quay and vessel is now digitized.

Better visibility for the people who keep the quay in motion.

Expand
Your vision

BUILD YOUR SETUP

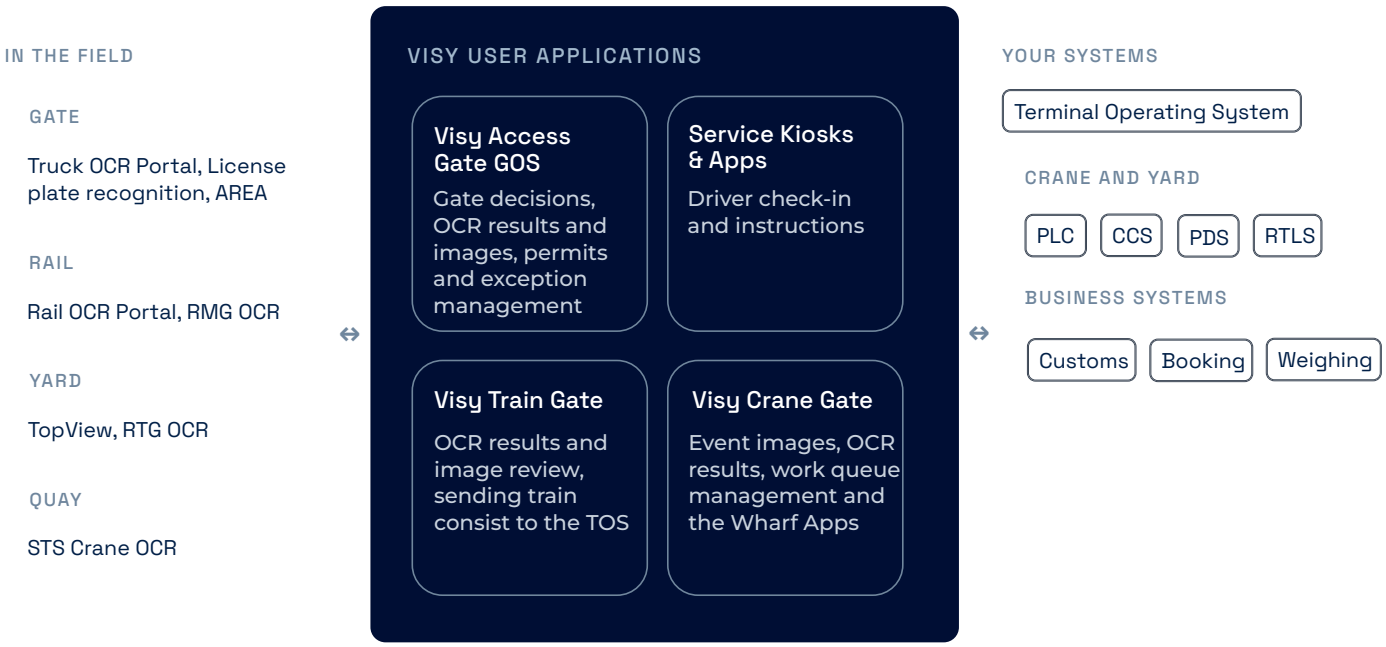
Where each system fits.

	GATE	RAIL	YARD	QUAY
Visy Access Gate GOS	● Gate lanes			
Visy Gate Kiosks	● Gate lanes			
Visy Truck OCR Portal	● Gate lanes			○ Quay lanes
Visy ADDS 2.0	● Truck portal	● Rail portal		● STS OCR Quay portal
Visy AREA	● Gate handover		● Yard tracking	
Visy Rail OCR Portal		● Rail tracks		
Visy Train Gate		● Rail operations		
Visy RMG OCR		● Rail interchange		
Visy RTG OCR			● RTG, ASC	
Visy STS OCR				● STS
Visy TopView		● RMG spreader	● RTG, reach stacker, top picks	● STS spreader ◇ Mobile harbor crane
Visy Crane Gate		● RMG at rail		● Crane operations Wharf Apps

● Standard setup ○ Alternative setup ◇ In testing

Integrated with the systems you already run

One platform holds the images, events and recognition data for every zone.



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Start where it matters most.

No need to automate everything at once. Start with your biggest bottleneck and build from there.



Want trucks through the gate faster?

Start with Visy Access Gate GOS, Gate Kiosks and Truck OCR Portals.



Want proof of container condition?

Add ADDS 2.0 to any Visy OCR system: gate, rail, yard or quay.



Want to stop lift errors in the yard?

Start with TopView on your spreaders.



Want train data without walking the track?

Start with the Rail OCR Portal and Train Gate.



Running mobile harbour cranes?

Capture container data at the quay with Truck OCR Portals or TopView.



Want the quayside team to work with one plan?

Extend Crane OCR and TopView with the Wharf App suite, giving operators full control and visibility at the quay.

A partner for the long run.





Evolving together since 1994

We have developed and delivered vision systems for ports, terminals and industrial sites for three decades.

Developed in-house

Recognition software, equipment and user applications are developed by Visy. One team answers for the whole system.





Support and maintenance

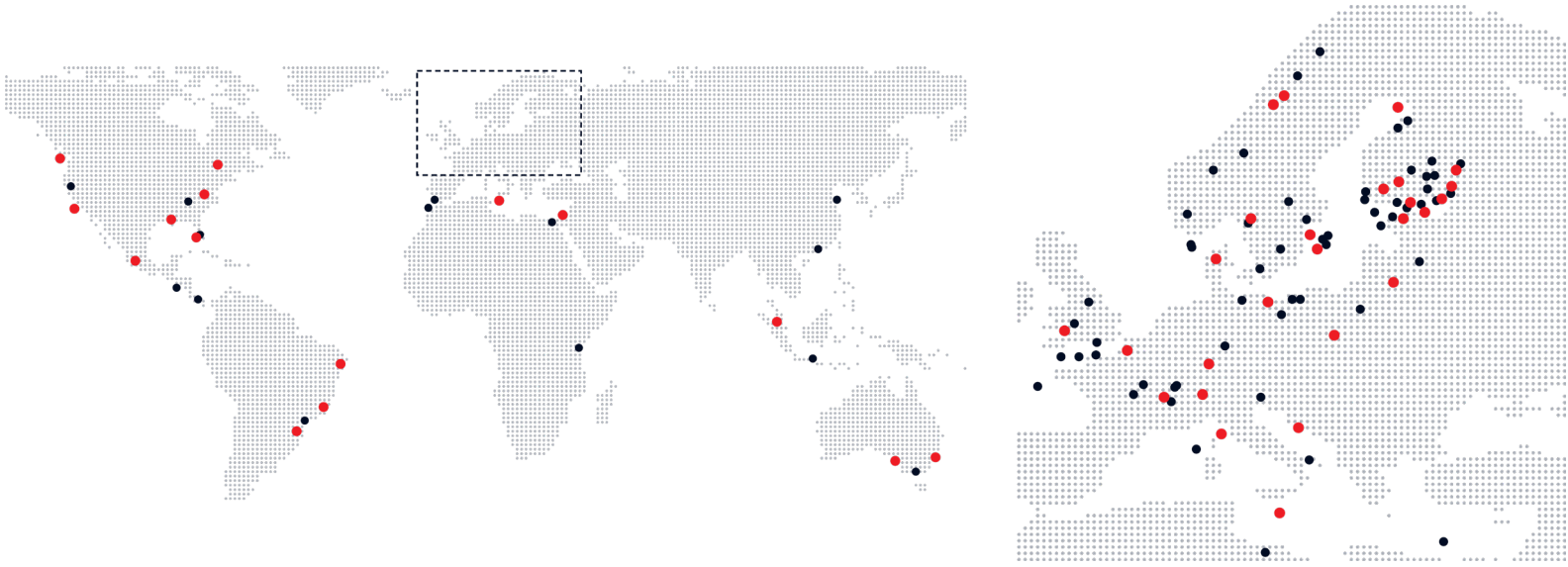
Our support team and helpdesk keep systems running after go-live, for the full lifecycle of the installation.

Local in 30+ countries

We deliver through our own team and trusted integrator and sales partners.

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Covering every region.



● Installation ongoing (2026) ● Delivered in 2021–2026

SELECTED CUSTOMERS

APM TERMINALS · DP WORLD · HHLA · PSA · International Container Terminal Services, Inc.

Port of Cork · Port of Tilbury London · Luka Koper Port of Koper · Baltic Hub · KTL Kombi-Terminal Ludwigshafen · Nachhaltig & Stark im Kombinierten Verkehr · BASF We create chemistry

P&O Ferries · Stena Line · DFDS · Bane NOR · DB InfraGO · OMV Petrom The energy for a better life.

Tanger Med Port Authority · Alexandria Port Authority · ODP October Dry Port · Santos Brasil · Ferrovalle

SSA Marine A Carrix Enterprise · MGT Société Terminaux Montréal Gateway Terminals Partnership · Termont · Westports Proven. Trusted. Friendly. · PT Prima Multi Terminal · TPS Terminal Petikemas Surabaya

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Trusted by terminals worldwide.



"After implementing the Visy Access Gate GOS, Port of Cork has experienced improved terminal performance, reduced truck waiting times, and above all, more satisfied customers."

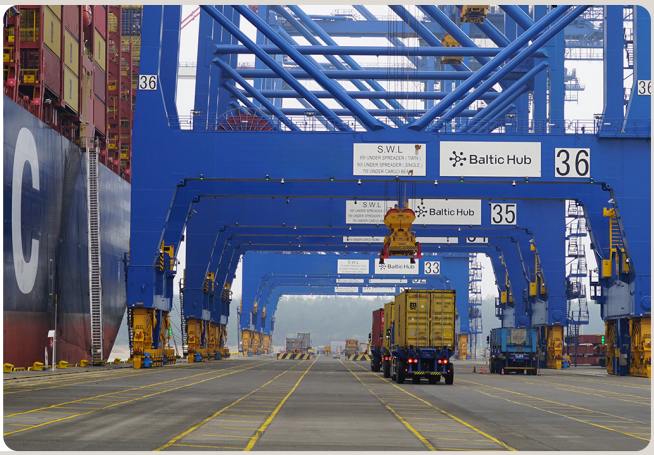
PORT OF CORK, IRELAND

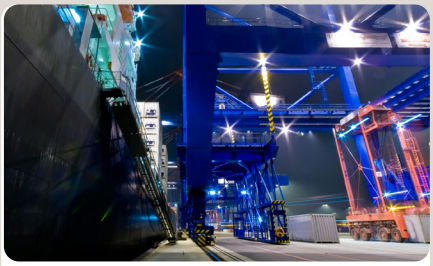
Visy Access Gate GOS
Visy Truck OCR Portals

Baltic Hub

Wharf Optimization with STS Crane OCR, TopView and Visy Crane Gate Wharf apps.

STS Crane OCR • TopView • Visy Crane Gate





FULLY AUTOMATED CONTAINER TERMINAL • QUAY

12%

moves per hour increase with a single crane, using Visy Crane OCR.



RO-RO TERMINAL • GATE

25%

shorter ship loading time, using real-time trailer location data from Visy AREA.



RAIL TERMINAL • RAIL

8.6%

higher wagon throughput: After go-live with Visy Rail OCR portals, Nuremberg set a new monthly record of 38,000 wagons, compared with its typical 35,000 per month.



Every container you handle carries more than cargo.

Clean, verified container-handling data drives better decisions. When your operations run on it, your business becomes more predictable, scalable and profitable.

Expand
Your vision

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VISY

Tell us what you want to automate.

Our experts will review your operation and suggest a setup that fits it.

www.visy.fi · sales@visy.fi

Expand Your vision