ENHANCING AND STREAMLINING THE SAFE FLOW OF CARGO

VISY

OCR SYSTEMS FOR QUAY OPERATIONS

Expand | your vision

ENHANCE AND STREAMLINE CONTAINER HANDLING WITH TOP-CLASS OCR

AI-based OCR solutions

The future-proof partner for all smart gate, access control, and terminal automation needs. With Visy systems, our customers identify and manage all traffic of cargo, vehicles, and people in demanding environments of container terminals all over the world.

We are dedicated to build ever better, more efficient, and easier-to-integrate system solutions with our world-leading AI-based OCR technologies.

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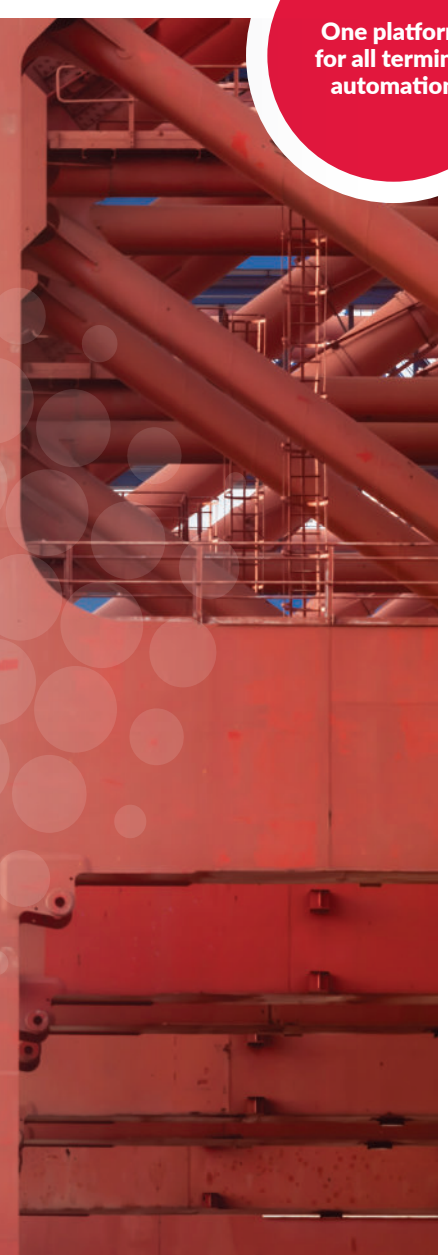

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Efficiency and Precision of OCR Technology Deployed in Container Handling

Utilizing Optical Character Recognition (OCR) technology in container handling offers significant benefits: enhancing efficiency, accuracy, and operational safety. By automatically recognizing and digitizing the characters on container labels, OCR eliminates the need for manual data entry, reducing human errors and speeding up processing times. This automation enables real-time tracking and inventory management, allowing more precise control over container movements.

OCR not only streamlines operations but also supports better logistical planning and cost management, allowing companies to meet the growing demands of global trade more effectively.

Record every container handling event with the Visy Crane OCR system

Benefits of OCR Technology in Container Handling

Increased Efficiency

- Rapidly reads container codes, reducing processing times
- Automates data collection, minimizing manual input

Enhanced Accuracy

- Eliminates human errors in data entry
- Provides reliable and consistent inventory records

Real-Time Tracking

- Offers instant updates on container locations and statuses
- Improves logistical planning and coordination with port authorities

Improved Safety

- Reduces the need for manual handling in hazardous areas

Cost Savings

- Lowers labor costs by automating data management
- Enhances turnaround times, increasing operational profitability

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Visy Crane OCR camera system records every container handling event and extracts identification data from the captured images.

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VISY CRANE OCR

OCR camera system for crane operations

Visy Crane OCR for ship-to-shore (STS) cranes automatically images all container sides and recognizes container IDs, ISO codes, dangerous goods labels (IMDG, ADR), and other targets of interest such as seal presence and door direction, while containers are being handled by cranes.

Robust system environment with exceptional performance

Due to the harsh operating environment and multiple parallel functions, the Visy Crane OCR system setup utilizes PTZ (pan-tilt-zoom) cameras mounted on the crane structure without moving parts to enhance system reliability and durability. The PTZ cameras are easily controlled to provide an optimal view for all lifting cases and an interface with PLC accurately calculates flight paths to optimize the imaging moment.

Recognition features

- Container IDs
- ISO codes
- ADR/IMO labels
- Weight / Tare / Payload
- Door direction
- Seal presence
- Door handle
- Damage
- Terminal tractors

All Visy Crane OCR applications are designed according to the operational needs of each customer. The system setup and OCR features are chosen case by case to support overall operations and different container handling cases, lifting types (twin, single, tandem, quad, tank), and spreader flying paths, as well as backreach and platform operations.

Lift type classification

- Single/Twin lift
- Container
- Tank
- Reefer container
- Others: Gearbox, cage, hatch cover
- Overheight frame

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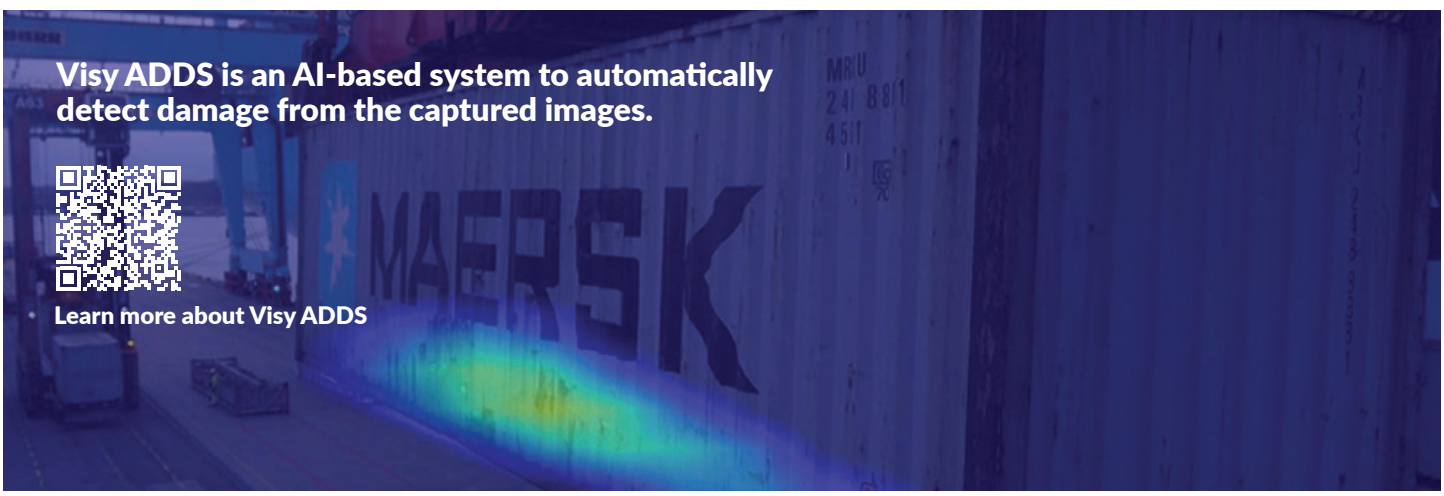

Visy ADDS is an AI-based system to automatically detect damage from the captured images.

Learn more about Visy ADDS

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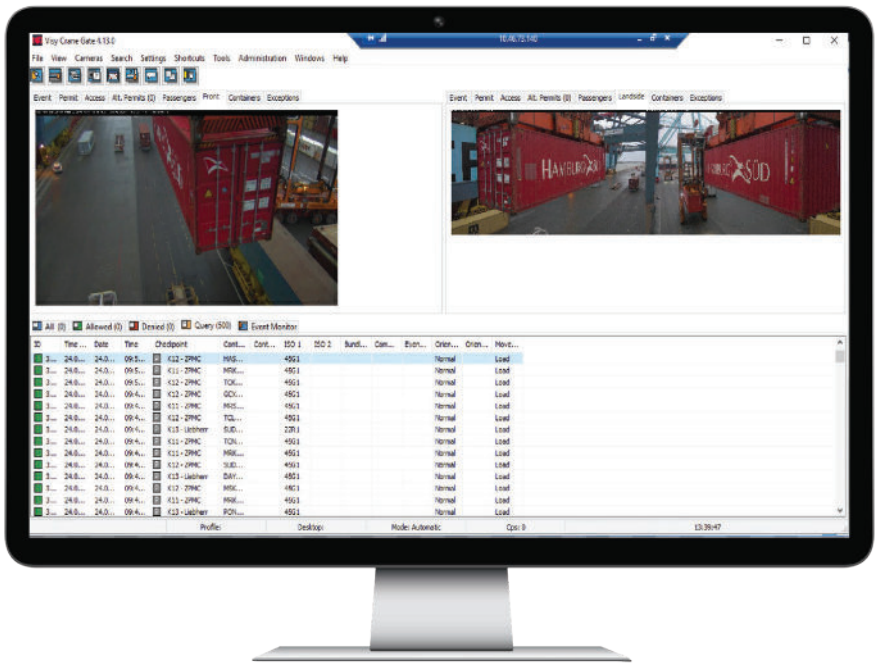
Visy utilizes durable PTZ cameras which are configured to cover multiple imaging areas. This ensures comprehensive support for all lifting cases and operation types.



Captured images are processed by the Visy OCR engine, which extracts the desired identification data. The images and event data are saved to the Visy database and they can be viewed and downloaded in the Visy Crane Gate user application that allows exception handling and report generation.

Read APMT Gothenburg case study at visy.fi

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Unlock the value of knowing exactly what you're moving at every moment, in all areas.
Expand your vision

VISY TOPVIEW – SPREADER OCR

Enhance visibility in container handling

Visy TopView transforms any spreader into a smart device. The compact camera system automatically identifies container IDs from the roofs of containers and is compatible with any CHE type and brand. Equipment is installed on the spreaders, including cameras, illuminators, cabling, and device cabinets. The recognition PC is located inside the crane's E-house.

TopView accelerates container handling processes, records every container move and prevents time-consuming false lifts, which instantly help to increase a crane's operating capacity.

TopView on STS spreaders

- **Automatically save and record every container handling event with container ID and top images**
- **Visy's in-house recognition software with high accuracy rate**
- **Smooth data exhange with TOS**
- **Robust system designed for harsh operating environments**

Visy TopView equipment and cameras have been carefully selected and developed to achieve high performance in a demanding environment.

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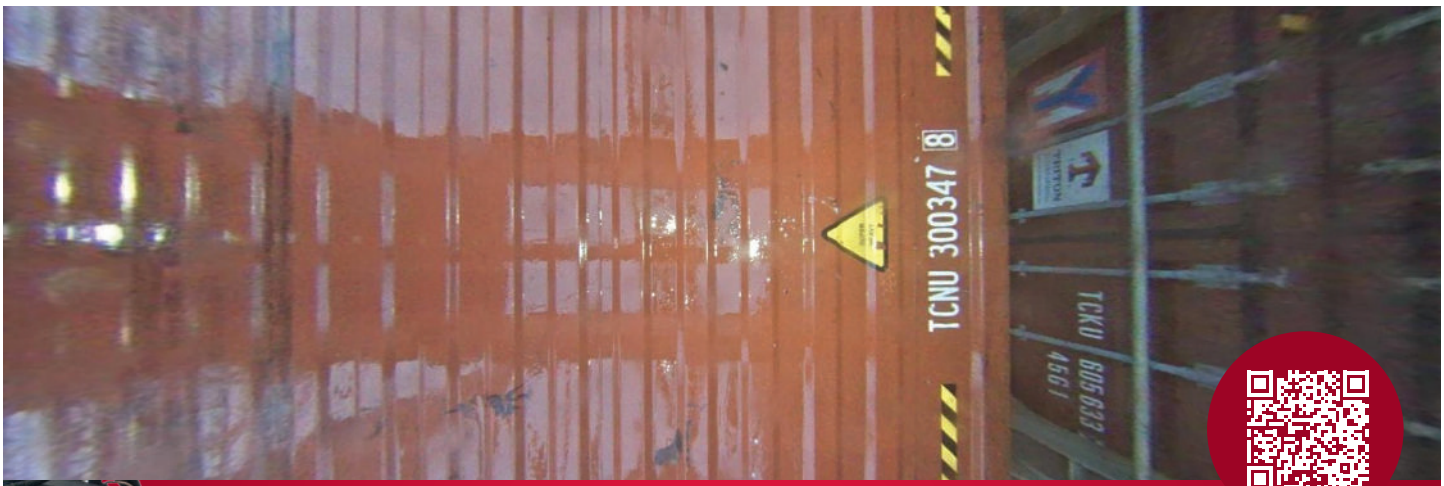
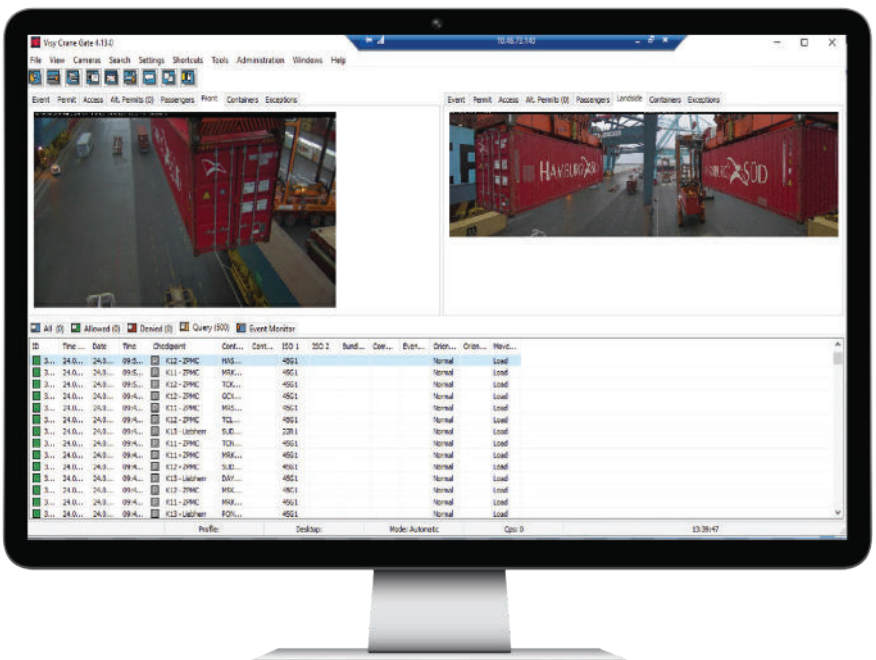


Visy TopView transforms any spreader into a smart device by automatically capturing images and container IDs from the container roofs. The system is compatible with any type and brand of CHE.



Captured images and event data can be viewed and downloaded in the Visy Crane Gate user application.

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Services

PROFESSIONAL SERVICES

Visy's global high-quality partner network minimizes response times and our experienced project management team ensures top-class solutions, delivery, and support worldwide.

- Project management
- Software customization
- Simulations
- Integrations
- Consulting

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Read Visy customer case studies at visy.fi

OPERATING WITH VISY

Visy's customers are united by their drive toward continuous development of operations and their desire to gain the benefits of advanced pioneering technologies.

MGT SOCIÉTÉ TERMINAUX MONTRÉAL GATEWAY TERMINALS PARTNERSHIP

Lifting Global Trade. APM TERMINALS

SANTOS BRASIL

PSA The World's Port of Call

SSA Marine A Carrix Enterprise

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