




incosa solutions

INTELLIGENCE FOR CRANES

i·C4C

i-C4C

provides solutions for a wide range of applications related to:

- loads (overload, load indication, summing,...)
- positions
- wireless communication
- networks between cranes
- zoning
- tandem cranes
- event logging
- black box
- SWP calculation
- drive connect
- cloud connect
- cloud platform

LOAD LIMITER

SAFETY FOR CRANES



- Plug and play
- Highest safety level
- For 1001 configurations

WIFI PLATFORM

CONNECTIVITY FOR CRANES



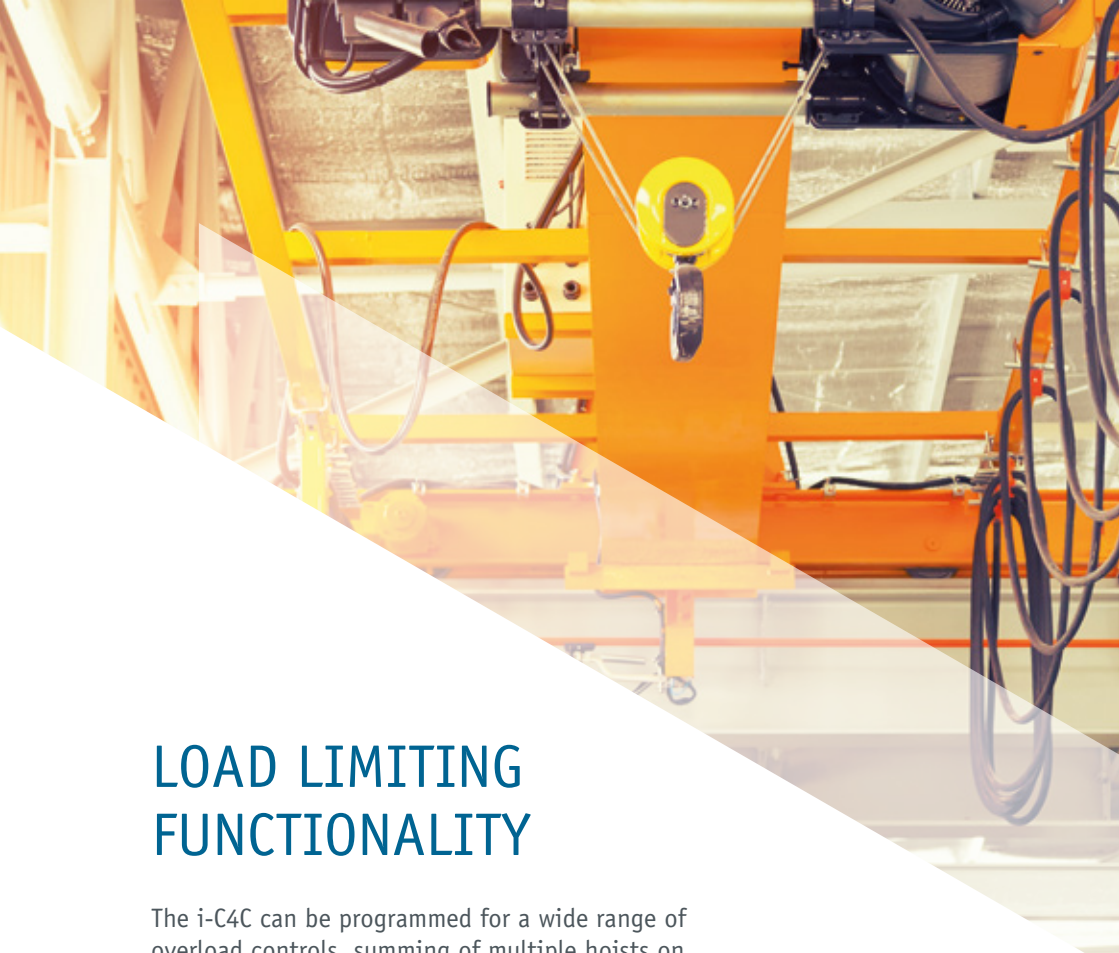
- Remote setup
- Wireless load indication
- Cranes talk to each other

CLOUD CONNECTED

INTELLIGENCE FOR CRANES



- Remote troubleshooting
- Proactive maintenance
- Safer & more efficient



LOAD LIMITING FUNCTIONALITY

The i-C4C can be programmed for a wide range of overload controls, summing of multiple hoists on a single crane or wireless crane to crane summing.

The systems are pre-calibrated and all parameters are fully digital, easy to change.

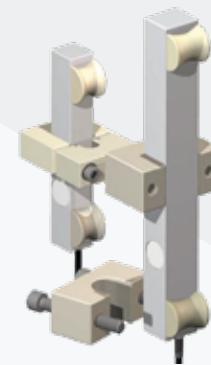
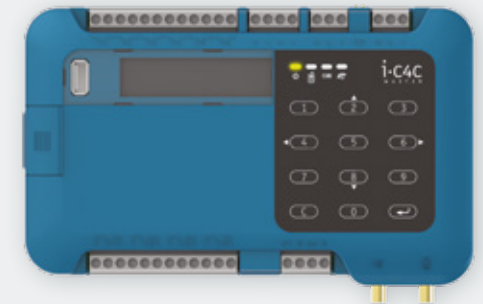
Specific functions as delay and hysteresis are standard in our load limiters.

Solutions can be configured for PLC or PLd applications.

i-C4C LOAD LIMITER

SAFETY FOR CRANES

- Plug and play
- Highest safety level
- For 1001 configurations



CLAMP ON LOAD CELL TYPE LMD

- mounted in fixed point
- integrated CAN converter
- up to 20 Tn per fall



WIDE RANGE OF LOAD PINS

- customized dimensions
- integrated CAN converter



SAFER, CONVENIENT & MORE EFFICIENT

“ Thanks to the Wi-Fi connectivity, engineers can easily set up and service cranes through their smartphone, tablet or laptop without going up to the crane.

Wi-Fi displays are linked without having to cable through the festoon.

Logging files can be downloaded without stopping the crane.”

Bob, Crane technician

i·C4C WIFI PLATFORM



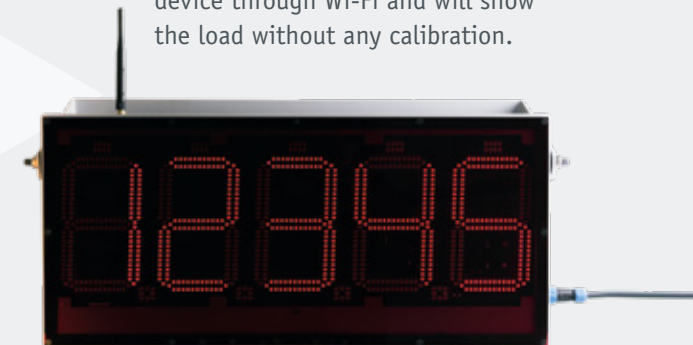
CONNECTIVITY FOR CRANES

- Remote setup
- Wireless load indication
- Cranes talk to each other



RANGE OF WIRELESS INDUSTRIAL 5-DIGIT DISPLAYS.

These will be connected to an i-c4c device through Wi-Fi and will show the load without any calibration.





The first Cloud Connected intelligence for all cranes!

Could i-C4C mean the end of unexpected crane breakdowns?

Cranes can now 'talk' to their operators through the Cloud. Incosa Solutions Belgium has launched Cloud Connect for its intelligent crane controller device, the i-c4c, which can be fitted to virtually any brand of crane to monitor and control its performance.

With Cloud Connect, crane technicians can simply link to the i-c4c device using a laptop, tablet or smartphone and download data, optimize the load and much more. Users see a dashboard that presents a wealth of information, including data that can be used to predict potential problems and resolve them at an early stage. Besides enhancing safety, this saves time and money.

i·C4C CLOUD CONNECTED

INTELLIGENCE FOR CRANES

- Remote troubleshooting
- Proactive maintenance
- Safer & more efficient



The i-c4c Cloud Connect is our interface enabling us to collect and process data from our i-c4c and to communicate these data to our online platform.



REMOTE TROUBLESHOOTING

“ Users see a dashboard that presents a wealth of information, including data that can be used to predict potential problems and resolve them at an early stage.

With your login you can access the i-c4c platform and at the homepage you will have an overview of all your cranes connected to the cloud.

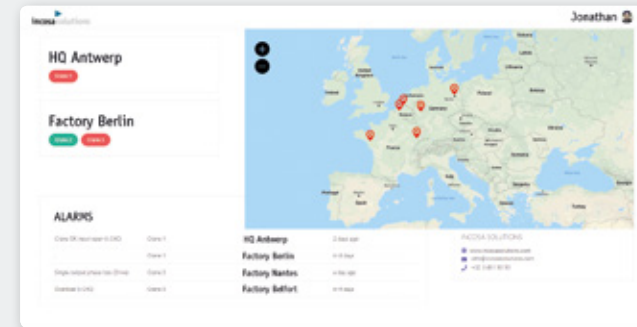
By selecting a specific crane, you can see the historic data such as number of motions, timers, overload events, load spectrum, SWP, number of jogging, drive faults, ...

Push the “live” button and you will have a live connection to the crane allowing you to see motions, load, drive status, motor current, temperature, vibrations, overload or slack rope status, ...

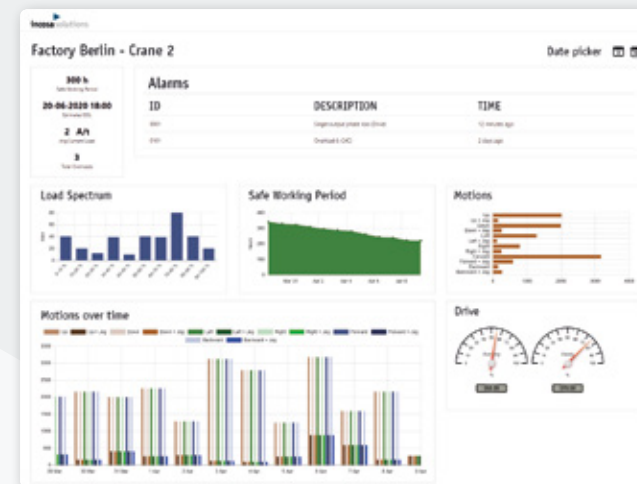
The platform continuously monitors critical parameters and will send you an email or message if a parameter exceeds a preset value.”

Jonathan, Service engineer

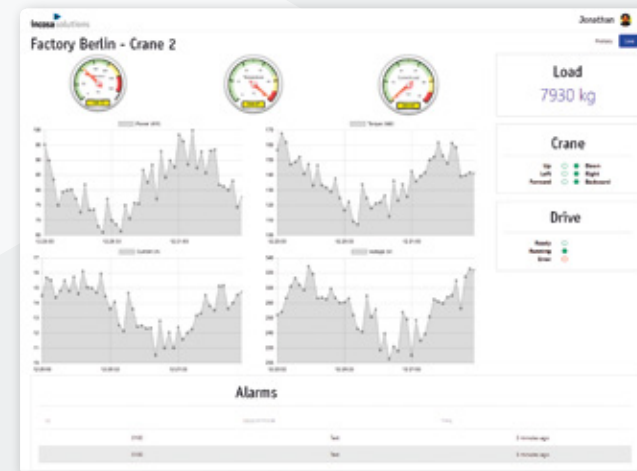
Screenshots Dashboard



Overview Page



History Page



Live Page

PROACTIVE MAINTENANCE

“I can predict problems and resolve them at an early stage!”

Peter, Operations manager



CLOUD CONNECT PRODUCTSHEET

The i-c4c Cloud Connect is our interface enabling us to collect and process data from our i-c4c and to communicate these data to our online platform.

ELECTRICAL

Connectivity: CAN, MODBUS, Ethernet
Mobile: GSM: 3G
Supply: 12 VDC to 48 VDC

MECHANICAL

Mounting: DIN-rail 35 mm
Dimensions: 110x85x40 mm (width x height x depth)
Temperature: operating: -30°C till +80°C
storage: -40°C till +85°C
Weight: 0,27kg

I-C4C PRODUCTSHEET



The i-c4c (intelligent controller for cranes) is the flexible solution for automation and safety for hoist applications. Overload detection, positioning, zone limitation, load indication, wireless communication between industrial machines, data logging are only a fraction of the capabilities of the i-c4c. This device offers an integrated solution as well for simple as for more complex problems.

The new Wi-Fi option enables the i-c4c to extend its possibilities on the level of connectivity by creating a link to devices like tablets and mobile phones. It also allows to create larger network configurations between cranes.

ELECTRICAL

Load cell inputs: through CAN interface
Digital inputs: 6 inputs for potential free contacts
Digital outputs: 4 change-over relays (max 230Vac/3A)
Analog inputs: 1 analog 0-10V
Analog outputs: 1 analog 0-10V
CAN interface: 2 CANOpen field bus modules
Wireless interface: RF or WiFi
Operator interface: display, keypad (master model only)
USB interface: backup, update firmware and configuration
Supply: 12VDC 10%
optional 100-240Vac 50/60Hz 10%

MECHANICAL

Mounting: DIN-rail 35 mm
Dimensions: 182x109x27 mm (width x height x depth)
Temperature: operating: -10°C till +60°C
storage: -40°C till + 85°C
Weight: 0,5 kg

i·C4C

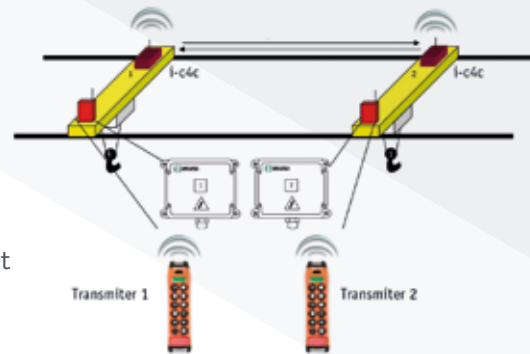
PROJECTS

TANDEM CRANES

This concept for full safety when cranes are operating in tandem, is an add-on system that can be mounted without any modification in the electric box of the cranes!

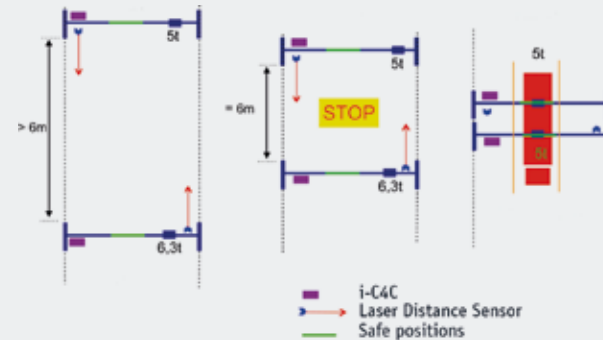
The software for the basic system provides the safety control of the limit switches (1st and 2nd speed) for travelling and takes into account the anti-collision.

Supervision of trolley and hoist motions are available as an option. Easy and fast installation!



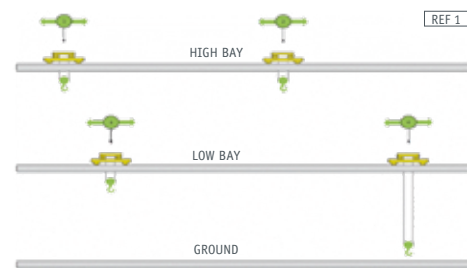
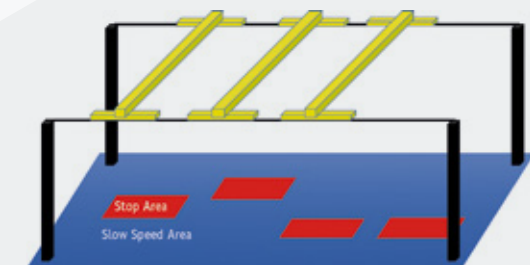
RUNWAY PROTECTION

Runways have a maximum capacity. In some configurations there is a risk of overloading the runway if different cranes are fully loaded. Our system will stop cranes to run into each other when loaded, and will stop lifting if cranes are close to each other.



ZONING

The i-c4c prevents cranes to run into zones under programmable conditions. For example, cranes cannot run over machines in operation; an i-c4c sends the machine condition wireless to the crane, the i-c4c on the crane calculates his position and decides which motions are allowed.



MULTI-LEVEL CRANES

The wireless network communicates positions of the cranes and hooks.

Our solution prevent collisions of cranes on different levels. It stops crane motions in both directions and prevents the upper cranes from lowering if there is a crane underneath.



INTELLIGENCE FOR CRANES

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