

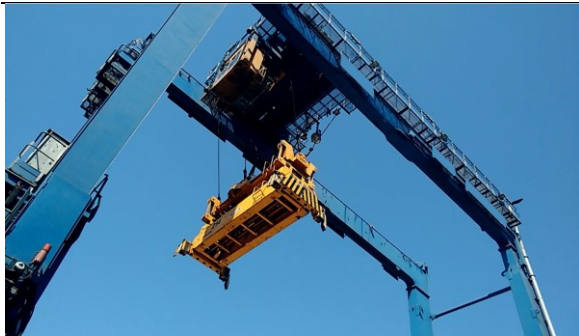
Laser Guided Container Loading and Unloading System

Shipping Port Gantry Crane Integrated Control

Dynamic Stack Profiling with Trolley & Spreader Movement

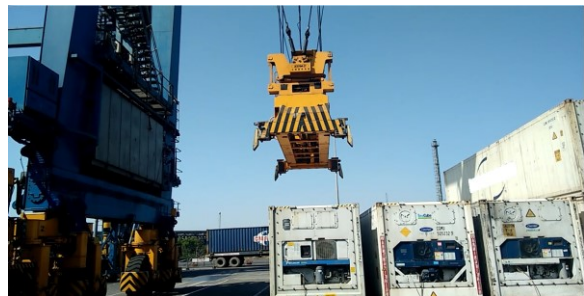
Spreader Guidance during Well Operation

Automated Truck Positioning



QLaserOn laser guided motion control system is used at shipping port terminals for container movement with efficiency. Traditional gantry cranes are operated manually with operators driving the crane sitting in the trolley at crane top. This leads to container yard inefficiencies in terms of number of operations, placement of containers in a haphazard manner and concerns for collision during container movement.

Additionally, alignment of trucks for loading and unloading the containers is a major challenge. With QLaserOn, the operator moves to control rooms operating the crane remotely. The movement of trolley and spreader is guided using laser sensors generating dynamic container stack profile and automatically locating trolley and spreader positions. This results in a self-checking highly autonomous container loading and unloading system.



High speed laser profile sensors from SICK...

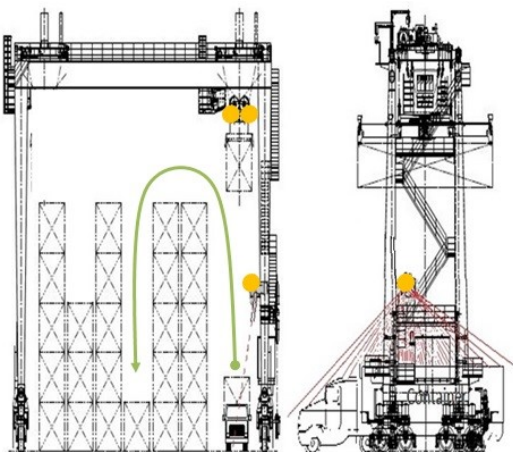
SICK
Sensor Intelligence.

Real Time Controller & DAQ Platform

National Instruments cRIO



With two laser profile sensors for trolley and spreader movement control during container loading, unloading and collision prevention; one laser profile sensor to assist in gantry operation and preventing collision against adjacent stacks; one laser profile sensor for truck position control coupled with high speed real time (RT) controllers for sensor data processing; QLaserOn controls tire as well as rail mounted gantry crane container movement and assists in truck positioning. Smaller range four laser profile sensors assist in pocket-to-pocket alignment of spreader during container pick and place operations in stack.



QLaserOn can be integrated with any existing or new crane control system. We provide complete hand holding support in system implementation. Feel free to contact us. We will be keen to assist you in making your container terminal future ready.