



# Make your machines connected

Machine-specific control at low costs? Use the Machine Control Platform

# MACHINE & SYSTEMS

### CORE FOCUS

- Advanced Control-, Vision- and IIoT systems and System Integration for machine- and equipment engineering
- Client specific Machine Controllers and Camera's
- Consulting services

### CORE VALUES

Happiness

Challenge

Pride

### OUR COMPETENCES

- 120 motivated professionals
- Highly trained and with experience in Embedded, Application and Cloud
- 40+ years experience in HMI and Control software for machinery engineering

## MAKE YOUR MACHINES SMART

A huge number of changes are taking place around the operation and control of machines, for instance graphical user interfaces, remote monitoring and machine-to-machine communication (M2M). How can you take these smart industry trends into account without increasing the cost price of your machines? After all, in serial manufacturing, using market components is much costlier than developing specific control units for the machine. However, developing a specific control unit requires specialized expertise and equipment. In most cases purchasing a control unit would be more cost-efficient than developing the required knowhow yourself.

This is the reason why ICT Machine & Systems developed the Machine Control Platform. This platform allows us to realize a machine-specific control unit in a flexible manner and in a minimum of time. What's more, we can produce the units at attractively low development costs with a short time to market.

## PLC, COMMUNICATION AND VISUALIZATION IN ONE

Customer requirements for machines have changed drastically during recent years. Customers want to have remote insight into the status and production data. And they want to be able to operate the machine from

a remote location. And naturally, the data generated by the machine needs to be imported into other applications without any obstacle or additional processing. In addition, the expectations of the user interface have changed. The console of a machine should be just as attractive and easy to operate as a smartphone app.

This is exactly what the Machine Control Platform realizes. The Machine Control Platform is a PLC, including functionality for communication and visualization. In short: the Machine Control Platform takes care of the machine's operation, but it also exchanges data with other systems and visualizes the production processes and the maintenance of the machine. The platform includes a variety of connectivity options, with backoffice systems and with the cloud.

## ONE PLATFORM, THREE VERSIONS

The Machine Control Platform is available in three different versions, ranging from a simple, low-cost embedded controller to a high-end solution based on a powerful HMI-platform, full colour LCD-monitor and supported by various connectivity-options. In addition, we supply an I/O card that can be customized and configured for a variety of applications, as well as a 2D and 3D camera.

If required, the Machine Control Platform can be supplied with CODESYS, allowing you to adjust the control interface of your machine at a later stage.

## BENEFITS

The Machine Control Platform offers a number of distinct benefits:

- programmable so that the platform can be customized to individual requirements using standard programming environments;
- simple integration in a customer's industrial environment;
- full flexibility for exchanging data with other applications and systems, either on-premise or in the cloud;
- cost-efficient in comparison with standard components available on the market;
- based on open standards;
- if required, the Machine Control Platform can be configured with CODESYS, allowing you to adjust or expand the PLC with additional functionality at a later date;
- guaranteed supply: ICT Machine & Systems guarantees the availability of the control platform and ensures its obsolescence handling.

## COMPONENTS OF THE MACHINE CONTROL PLATFORM

The MCP comprises the following customer -configurable components:

- LCD, keyboard and LED
- Digital and analogue I/O
- Wireless connectivity options such as:
  - ZigBee/Z-Wave/Bluetooth
  - NFC/RFID
  - WLAN
  - GPRS/Edge/3G
- Industrial communication busses such as:
  - Profibus
  - Modbus
  - Industrial Ethernet
  - CAN
- Intelligent camera interface and image processing
- Motion control interface such as:
  - Sercos, EtherCAT
  - Analogue/digital servo control

- PWM and tacho-handling
- Stepping motor control
- Soft-PLC programming interface (IEC 61131-3) based on CoDeSys, including easy access to equipment.

Because the controller is programmable within the industrially accepted standard IEC 61131-3, it is very easy to adapt and integrate your equipment into this customer-specific environment.

## OUR EXPERIENCE

ICT Machine & Systems offers more than 40 years of experience in (embedded) software for machine construction. We have completed over 2,500 assignments for customers in the machine construction industry, with the Machine Control Platform being used by more than 200,000 machine construction companies.

More information? Please contact us using the following contact details:

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