



# CaCaMat

## Match your production capabilities and capacities with the customer requirements



# Capability- and Capacity-based Supplier and Customer Matching

The project focuses on facilitating matching of Fabrication-as-a-Service providers in the metal industry with their customers requiring custom-made parts. Due to our solution, a customer in a pre-purchase

## Features

**3D pipe creator** - an application for a customer to design a required part, in particular a pipe cut and bent according to particular parameters, recorded in AAS.

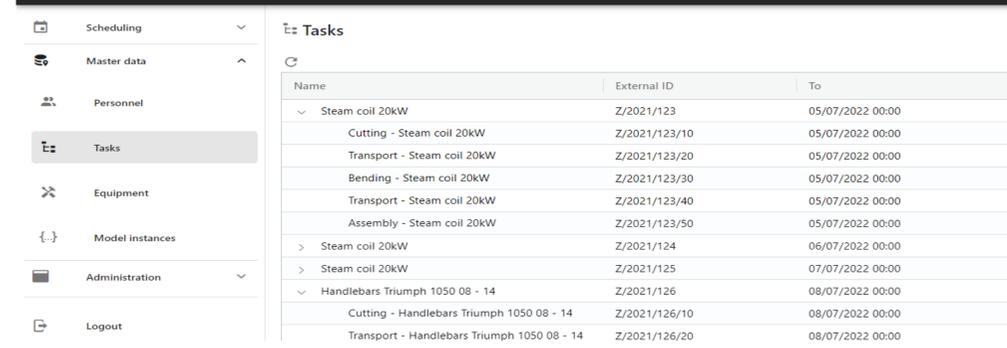
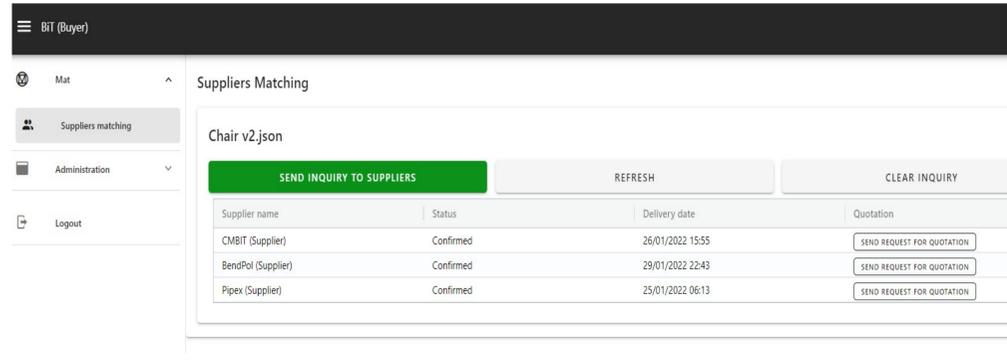
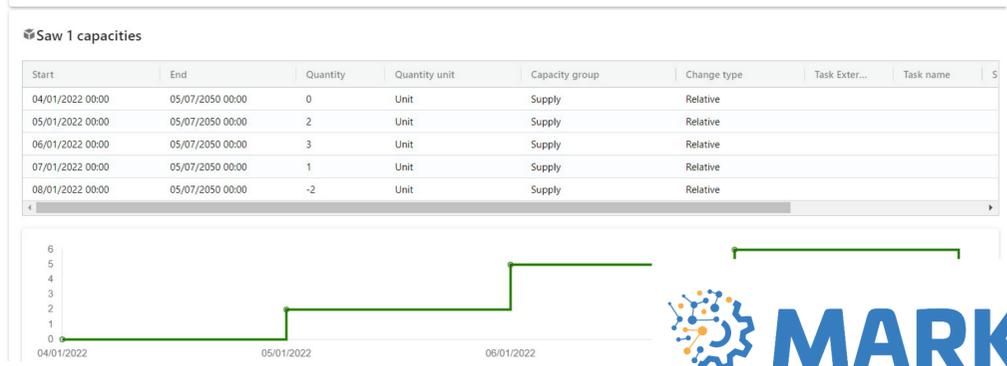
**Capability Capacity Service** - an application for the supplier to expose the technological capabilities of the machine park in AAS and the planned production schedule.

**Matching Service** - an application which, after receiving a description of a new part, transmits it via the M4.0 platform to the registered FaaS providers, collects their responses and presents them to the customer.

## Benefits

**Manufacturers** benefit from easy verification of incoming orders without investing any effort. Moreover, they can easily offer their unused capacity to the market, which reduce costs and improves efficiency. Less time spent on repetitive jobs of design validation and procurement improves job satisfaction of their **workers**. Better parts designs lead to fewer errors and less waste.

The **customers** benefit from shorter lead-time of suppliers which directly translates to reduction of their lead-time and lower effort of procurement.



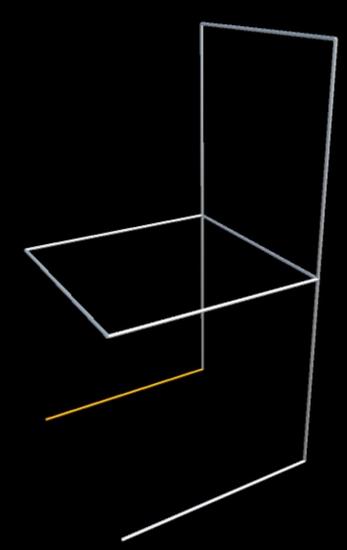
## Validation

Integration of the developed apps together with the M4.0 platform and the existing IT systems of a customer BIT and a manufacturer CMBIT was performed, ensuring their full usability. In addition mock instances of the supplier app were created to test whether the capability and capacity is properly exposed via the IDS connectors and the M4.0 platform. Both the scheduling on the side of the manufacturer and matching between the customer and suppliers were successfully validated in a **real environment**.

```

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## Acknowledgment

This work has been performed in the context of the **CaCaMat** project, an open call #1 winner of the H2020 MARKET4.0 project (market40.eu), with participation of  
➤ CMBIT: [www.cmbit.pl](http://www.cmbit.pl)  
➤ MASTA: [www.masta.solutions](http://www.masta.solutions)  
➤ BIT: [www.pphu-bit.pl](http://www.pphu-bit.pl)

The H2020 MARKET4.0 project develops an open multi-sided digital platform for enabling production equipment and service providers to connect and work together with manufacturing companies. The MARKET4.0 platform enables new business, based on value-adding interactions among the production equipment and service providers and their customers while at the same time provides an open and participative infrastructure for these interactions.