BAUMÜLLER

Monday, April 24, 2017

PressRelease

Secure remote maintenance solution

Baumüller supports the secure remote maintenance of machines and systems with Ubiquity

The Internet provides fast networking and is often used for private or business purposes. Humans, machines and sensors also communicate with each other in the industrial sector. The innovations promote a highly efficient, intelligent and flexible production. However, cybercrime is also on the rise and, according to a current study by PricewaterhouseCoopers (PWC), by now it occupies second place among all economic crimes. To protect industrial security, the Nuremberg-based automation company Baumüller offers a secure solution for the remote maintenance of machines and systems: Ubiquity.

Certificates and encryptions

Ubiquity is certified according to IEC 62443-3-3 and complies with the directives of the German Federal Office for Information Security (BSI) Ubiquity consists of three different components that result in secure remote maintenance: 1. The control center, an operating software that manages, monitors and updates remote maintenance systems; 2. The runtime environment that is installed on Baumüller's control panels and does not require additional hardware; 3. The server and infrastructure through which the exchange of data, certificates and encryptions takes place.

The runtime environment must be connected with the Control Center to ensure secure remote maintenance. In addition, certificates and a two-factor authentication are used. The contact with the server occurs via secure connections that are protected by means of TLS/SSL protocol with corresponding keys. Both the runtime environment as well as the Control Center must be authenticated. The integrated firewall detects outgoing connections from Ubiquity and permits them. By using existing Internet connections, no separate connection needs to be established. Ubiquity identifies existing connections and configures itself automatically.

The use of separate hardware is also superfluous. The runtime environment is already installed in Baumüller operating devices. The customer domain must be acquired once in order to fully utilize the Ubiquity solution. No additional costs are incurred. The number of connections, sessions and amount of traffic are not subject to any further restrictions. Ubiquity implements the highest security standards.

Integrated chat function

An integrated chat function enables direct contact to the customer or supervisor. Thanks to an integrated remote desktop service, it is possible to access the remote system without installing additional RDP or VNC services. A file exchange service provides the option to switch files and transfer them directly to the system (e.g. PLC or converter) connected to the HMI when the corresponding connection is in place. All of the remote accesses performed on the system are registered via an audit-trail function.

Ubiquity live in action

The use of ubiquity is presented at the Baumüller booth on the Hanover trade fair 2017. A machine located in the academy of Baumüller in Nuremberg can be operated by remote servicing from the trade fair booth. The visitors have the complete access to the machine in Nuremberg. In addition, the operation of the machine can be watched live over an implemented IP camera

With Ubiquity, Baumüller enables secure and simple remote maintenance that does not require separate hardware and offers numerous services.

Figure: The Ubiquity runtime environment is preinstalled in all Windows-based HMIs of Baumüller and can be connected to a domain

Use our RSS Feed and the latest Baumüller press releases

Baumüller is one of the leading manufacturers of innovative automation and electric drive systems. At six manufacturing locations and over 40 subsidiaries spread all over the world, 1700 employees plan, develop, produce and install intelligent system solutions for mechanical engineering and e-mobility; from operation and visualization tools to Motion Control software as per PLCopen, from software modules to controllers, also including converters, electric drives and the whole service range for ready to use automation solutions.
The areas service, installations, fitting, and relocation add to the wide range of Baumüller's services. In the mechanical engineering industry, Baumüller is one of the leading partners for automation solutions worldwide.

Press Contact:
Stefanie Lauterbach
T: +49 (0) 911 5432 – 319
E: stefanie.lauterbach@baumueller.de

http://www.baumueller.de/en/news/press
https://www.youtube.com/user/BaumuellerGroup
https://www.xing.com/companies/baumüllergruppe
https://www.linkedin.com/company/baumueller-nuernberg-gmbh