Process 4.0 - From zone 0 into the cloud: barrier-free communication with PC-based control

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The process automation offers a lot of potential for further improvement in order to create competitive solutions. In order to decrease costs one of the major trends is to integrate multi-vendor subsystems into one solution, not to forget about the potential of cloud based control systems to minimize down time, increase efficiency and raise the visibility of decentralized operations. With PC- and EtherCAT-based control technology, together with the terminals of the ELX series for direct connection of intrinsically safe field devices up to zone 0/20, Beckhoff offers all the prerequisites for the convergence of reliable process automation and modern functionality. PC-based control also represents the optimum basis for implementing networked production according to Industrie 4.0 and IoT concepts. TwinCAT features integrated specific protocols and interfaces such as NAMUR, HART and FDT/DTM. The support of OPC UA guarantees secure and vendor-independent data communication.