# MDLC Gateway – Setting Advanced Connectivity for SCADA Control Centers

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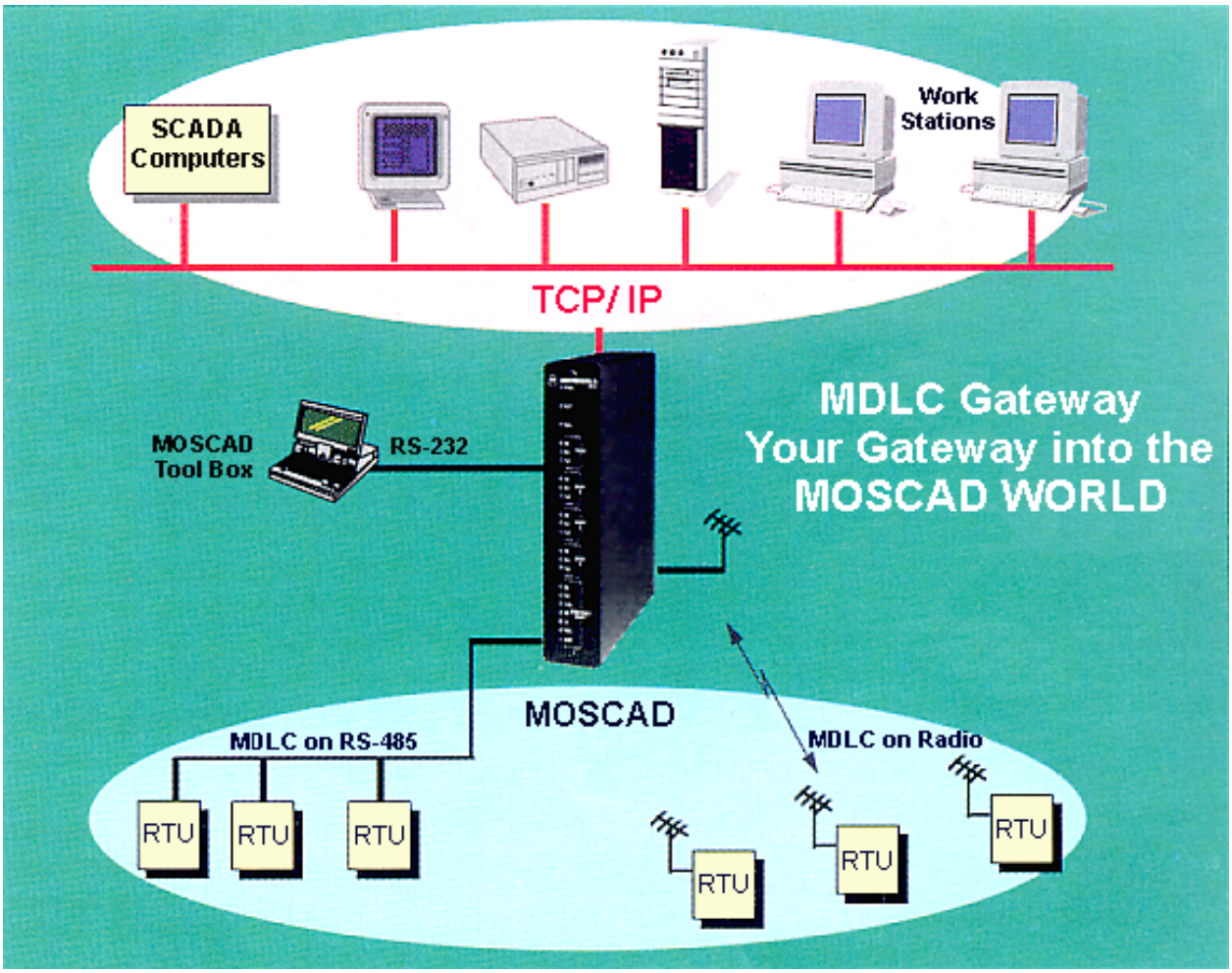
This issue of ECHO introduces one of the MOSCAD's key products – the Motorola MDLC Gateway. Through it, data is exchanged between multivendor SCADA control centers and the MOSCAD system. No name could better fit this equipment because it opens every SCADA system to the advantages of MOSCAD. If we had to describe Motorola's MDLC Gateway, in as few words as possible, we would say it is POWERFUL yet SIMPLE.

The MDLC Gateway is powerful, because it gives the control center user, total wide area coverage capability from his workstation. It can supervise, via a variety of communication media, the functioning of an entire enterprise spread out into the most remote areas of the countryside or the most congested cities. The Gateway can transmit data, in parallel, to multiple clients – to the SCADA workstation, to the control center and to the plant system. This new technology allows the control center user to obtain real-time access to MOSCAD RTU data so that all the SCADA applications can provide users with reliable, fast and accurate information *(see figure)*.



The MDLC Gateway can be reached via the global coverage power of Internet, for OPEN network interconnectivity of multivendor computers and applications, by utilizing TCP/IP, the standard and most popular protocol for LAN (Local Area Network).

A redundant MDLC Gateway feature is supported to increase the reliability of the SCADA system. Two MDLC Gateways can be configured in a Primary/Secondary mode in order to provide a “hot” backup path in case of failure.

And yet, the MDLC Gateway is simple because its hardware is self contained. During installation it does not require any RTU definitions – it simply plugs onto the office network using a standard Ethernet connector. TCP/IP protocol makes driver writing relatively simple. Its standard “Berkeley Socket Library” helps the customer write a customized driver for his specific application, without regard to his version of operating system. Like the Gateway hardware, the application software can be plug-in modules that can be “plugged” into

any computer hooked up to the LAN (Local Area Network) or to the WAN (Wide Area Network). The MDLC Gateway technology significantly simplifies the effort normally required to achieve network interconnectivity by seamlessly managing the routing of data between two network environments.

The following case studies reflect the benefits from mutual cooperation between Motorola, and its vendors. Whether it is in applications for water or electric utilities or for Gateway driver software development – everyone wins.