

IED TECHNOLOGY

DELIVERING ON THE PROMISES OF TECHNOLOGY

Sharing the learning – close cooperation enables a mutual sharing between the supplier and the end users (including their consultants and contractors) of the learning gathered on the job, as the various parties traverse what at times can be a steep learning curve.

When HV POWER were selected to supply new IED technology to two of New Zealand's largest metropolitan utilities, they not only committed to provide in-depth technical support for the products, but their people were able to stay close to the utility's engineers throughout much of the implementation and commissioning phases of the related projects.

According to HV Power's Mike Strong, "Along with technology comes the promises of efficiencies, simpler designs, with less devices on the panel and of course costs savings. However, the marketing and promotion by equipment vendors can fuel very high expectations. Just how successful a roll out of new products and technologies goes for the customer is driven by a number of factors; like the competencies of the manufacturer's local distributor, the quality and timeliness of the support they in turn get from the manufacturer, as well as the utility's initial selection and specification criteria. But more importantly success often hinges on the process used to get all the stakeholders in a project involving new technology on board".

GRASP NEW CONCEPTS

From the planning engineers through to the people doing the detailed design and managing the projects right through to the tech's installing and commissioning the gear – all parties need to take time to grasp new concepts and gain knowledge of the new technology being employed. HV Power believe empowerment of the stakeholders through training and education is an essential ingredient in delivering on the promises that technology can provide – in addition to how well the actual equipment performs.

HANDS-ON TRAINING PROGRAM

HV Power regularly work with utility customers to provide hands-on training for staff, their consultants and contractors in the set up and operation of new IED technology.

Sometimes the training is provided by the foreign manufacturer. This was the case earlier in 2005 when HV Power hosted a week long hands-on training program by Siemens AG product specialist, Marko Zaherdoust on the Siprotec 7SJ64 feeder relay and the DIGSI Configurator software tool.

This and Siemens PAS equipment is being implemented as part of a program to upgrade protection and deploy substation automation systems based on the new IEC 61850 regime, throughout a large New Zealand urban electricity distribution network.

FIBRE OPTIC CABLE BACK BONE

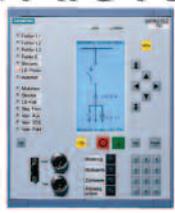
At the heart of the system is a fibre optic cable back bone which provides high speed Ethernet based IP communications between sites and a central control room. This IP Network is being used for scada, for remote access to the relays for programming and configuration changes, and for automated fault record retrieval to a centralised server.

TANGIBLE BENEFITS

According to HV Power's Managing Director Geoff Vaughan, "Having been sold substation automation technology by our company, it is critical that our customers experience the tangible benefits it's designed to deliver – that's the promise".



POWER AUTOMATION TECHNOLOGIES

<div style="text-align: center;">  <p>GarrettCom™ <i>Current at its Best!</i></p> <p>6K16V Switch</p> </div> <p>HARDENED ETHERNET DEVICES</p> <ul style="list-style-type: none"> • AC & DC Power. Rated -50 to +90°C • Media Convertors – Copper to Fibre • Supports Multi & Singlemode Fibre 10MB/100MB/1GBits • Wide range of Connectors – RJ45, MTRJ, LC, ST, etc. • Managed Switches with SSL & SNMP V3.0 • Supports IEC 61850 Goose Messaging 	<div style="text-align: center;">  <p>TERON INTERNATIONAL</p> <p>TCG 01</p> </div> <p>TIME SYNCHRONISATION</p> <ul style="list-style-type: none"> • IRIG-B Time Source for IED's & RTU's • Superb Timing Accuracy • Choice of Signal Outputs: DC, AM, Serial • Optional ST Fibre Outputs & Repeaters • Compatible with all major relay brands • NTS Network Time Server for IEC 61850 systems • Models from \$1500 +gst, includes antenna & cable 	<div style="text-align: center;">  <p>SIPROTEC</p> <p>7SJ64 Feeder Relay</p> </div> <p>PROTECTION RELAYS</p> <ul style="list-style-type: none"> • Fully IEC 61850 Compliant • Ethernet Connection – RJ45 & Fibre • Supports Multiple Sessions & multiple clients • Remote configuration using DigsI • Fault records in COMTRADE format • WEB Monitor – allows remote access using I.E. • Supports GOOSE Messaging
<div style="display: flex; justify-content: space-between; align-items: center;">  <div style="text-align: center;"> <p>P.O. Box 26-074 Epsom, Auckland, NZ</p> <p>Tel + 64 (0) 9 630 1060 • Fax + 64 (0) 9 630 0674</p> <p>Email info@hvpower.co.nz</p> </div> <div style="border: 2px solid white; padding: 5px; text-align: center; color: white;"> <p>Meet the standard</p> <p>IEC 61850</p> </div> </div>		