AZIMA DLI DCA-60™ DATA COLLECTOR / REALTIME ANALYZER

A NEW VIBRATION DATA COLLECTOR AND SO MUCH MORE, THE DCA-60™ OFFERS FOUR CHANNEL SIMULTANEOUS DATA ACQUISITION, WIRELESS CONNECTIVITY, 80 GB OF DATA STORAGE AND IT RUNS ALL YOUR WINDOWS APPLICATIONS.

FOUR CHANNELS AND MORE

The DCA-60 is a rugged four-channel vibration data collector specifically designed to meet the needs of today's reliability professional. It offers four-channel simultaneous data collection and onboard ALERT™ analysis software that is more powerful than most competitive PC-based condition monitoring systems.

- Fast triaxial vibration data collection, collect a suite of measurements with one click
- Perform machine condition analysis, including bearing fault detection using demodulation
- Install and run your Windows applications on DCA-60 and access your plant's network via Wi-Fi or Ethernet

EFFICIENT AND ACCURATE DATA COLLECTION

Triaxial, simultaneous data collection combined with Azima DLI's field-proven methodology means you can collect accurate and repeatable data in less time. The DCA-60 is not route based, but uses a replica of the host ALERT machine database. You don't need to load multiple routes to cover your whole plant. With the database onboard, you have access to all of your machine baseline data, machine details, machine specific instructions and diagrams, test operating conditions and more.

With optional database replication functionality, your DCA-60 is kept in tight sync with your desktop ALERT database, putting all historical data, diagnostic reports and analyst comments right on the data collector.

ONBOARD TECHNICAL SUPPORT STAFF

When DCA-60 is connected to your LAN through Ethernet or Wi-Fi, you have direct access to Azima DLI specialists to answer your questions or to help you use your DCA-60. Click on the "ask live" button and you are immediately connected.

DCA-60 GROWS WITH YOU

As your condition monitoring needs evolve, so will DCA-60. Azima DLI offers three upgrade options to add value to your instrument; make it a multi-plane balancer, advanced cross-channel analyzer or upgrade it to a full-featured DCX diagnostic data collector that includes in part, automated fault diagnostics at the machine.

STANDARD FEATURES

- Embedded ALERT analysis software
- Triaxial displays including FFT, waveforms, orbits, phase, waterfall and overall levels
- Triaxial accelerometer for efficient data collection of multiple axes/directions
- Run-up / coast-down measurements
- Detect roller bearing faults using envelope demodulation
- Orbit displays for detecting sleeve bearing faults
- Simultaneous three-channel data acquisition (4 channels with optional ALERT RTA software)
- Transfer data via USB cable or thumb-drive
- Microsoft® Windows® XP Tablet operating system
- Bright SVGA color display
- 802.11 a/b/g wireless networking
- Integrated Ethernet and USB ports
- Certified for European Market (CE)

OPTIONS

- Soft or armored integral cable for accelerometer
- Multi-plane field balancing software (ALERT Multiplane Balance)
- Advanced signal analysis software (ALERT RTA)
- Stroboscope / tachometer
- Laser or infrared optical tachometer
- Current clamp for motor current measurements
- Infrared thermometer
- 4-Channel BNC input adapter
- Foreign language support
- ALERT database replication

SPECIFICATIONS

Digital Signal Processing

- Embedded DSP for rapid data collection
- Simultaneous sampling of all four inputs up to 41 KHz
- Anti-aliasing via an analog RC filter plus a 64th order digital FIR filter
- Overall RMS amplitude detection from 10 Hz to 1 kHz

Spectral Analysis

- Four channel, simultaneous FFT up to 16 kHz fmax
- FFT Resolution up to 25,600 lines
- Spectral Windows: Hanning, Hamming, Flat-top and Uniform
- Averaging types: spectral or time-synchronous,
- Overlap processing; selectable overlaps of 0 - 75%

Time Domain Analysis

- Filtered or unfiltered orbit plots
- Crest factor
- TTL-level tachometer input

Analog Signal Processing

- Dynamic range greater than 85 dB
- Signal to noise ratio greater than 76 dB
- Selectable DC, 0.2 Hz or 10 Hz high-pass analog filtering
- Selectable single stage analog integration
- No more than -76 dB inter-channel crosstalk
- +/- 10 VAC input range (+/- 25 VDC)
- Cable fault check

Physical

- Size: 11.1" x 8.5" x 1.8"
- Weight: 5.3 lbs including battery
- Fully machined metal enclosure
- Scratch resistant display cover glass

Processor / System Memory

- Intel® Core Duo™ processor – 1.2 GHz
- 1 GB RAM

Video Display and Digitizer

- 10.4" 800x600 transmissive LCD color display
- Electromagnetic digitizer
  - More than 1000 dpi resolution
  - Proximity sensing pen with right mouse button

Mass Storage

- Standard 80-GB rotating hard drive
- Optional 16-GB solid-state hard drive
- ALERT Sybase SQL database

Power Consumption & Battery Life

- 2 1/4 hours continuous data collection
- 6 hour battery life with power management
- ACPI power management support
- Battery fast charge from empty in 2 hours
- Memory-free "smart" Li-ion batteries
- Universal AC power adapter 110-250 volts, 50-60 Hz

Environmental Specifications

- Ingress protection: IP-65 against dust and water spray
- Operating temperature: -20°C to 50°C
- Storage temperature: -40°C to 70°C
- Shock: 4-foot drop
- Vibration: MIL-STD 810F 514.5 procedure I, Category 4

Applicable International Standards

- Electrical Safety: EN 60950-1:2001 (1st Edition)
- Electromagnetic Emissions: ICES-001:2006 Class A, EN 61326-1:2006 Class A, FCC 15.109:2007 Class A
- Electromagnetic Immunity: EN 61326-1:2006

Specifications are subject to change without notice

CE