



#### **TESTING EQUIPMENT MANUFACTURED BY DEKAL**

DEKAL LOAD BANKS was founded in 1997 and is currently the leading manufacturer of digital portable load banks and power analyzers for testing and servicing of Ground Power Units (GPUs) for civil and military aviation. We are specialized in development and production of 400 Hz AC, 28.5 V DC and 270 V DC load banks, power analyzers, various cable testers and other testing equipment.

Since the launch of the first load bank, our development efforts are always concentrated on rethinking the simple load bank into a precise and powerful measuring instrument. Our load banks are the only products on the market of its kind to offer a complete power analysis with printout report option for every testing procedure.

Our design features are compatible with workshop and airside operations, simple-user friendly handling and rugged construction are decisive advantages of our testing equipment against similar products available on the market. Every product being manufactured comes out of our production line in a high quality aluminum transport casing; being constructed fully by our own capability.

Dekal lead times are the shortest on market, furthermore the company guarantees minimum stock levels for each load bank type in case of emergency supplies.

We are proud to be the preferred load bank supplier approved by major airlines, ground handlers and GPU manufacturers worldwide.

#### PORTABLE LOAD BANKS

Portable load banks are used to simulate an aircraft connected to the GPU. Not only for maintenance reasons, simulation is often needed to carry out adjustments and test activities/characteristics of the GPU under diverse electric load conditions. These procedures are done as part of preventive maintenance work and following service repairs.

All our 400 Hz load banks are capable of running the GPU at full-load for an extended time period (max. 600 A load for 28.5 V DC versions). In case of diesel driven GPUs, it is possible to run the GPU at full load for an extended time period, thus decarbonizing the engine. This routine maintenance operation is required to preserve and prolong the engine's original performance level and is recommended by GPU manufacturers. Decarbonization at regular time intervals is essential to help maintain the engine's original performance level.

#### LOAD BANK MODELS & CUSTOMIZATION

We are able to offer four different models for every type of our testing equipment, which clearly indicates tremendous selection of customer requests according to the specific demand. The models available are categorized as following:

- Analog Panel series (AP)
- Digital Panel series (DP)
- Digital USB series (DU)
- Digital WiFi series (DW)
- External Power (EP)

Digital models include a precise & extremely accurate measuring instrument, which allows up to 16 different measurements of electric quantities that are taken simultaneously. This transforms our load banks into very powerful simulation and analyzing device, which is capable of performing a throughout analysis of the GPU's output, unlike any other testing equipment on the market today.

With the integrated instrument itself, the data can be read out on a high brightness LED display. Our unique USB output with free DEKAL license software enclosed provides an easy solution in order to monitor the data on a PC, tablet or a smartphone. An operator may save such data and print them out as an evidence of tests being performed. Furthermore we are able to provide you with WiFi connection option which is supported by embedded load bank computer. This user friendly solution requires only an

## KEEP YOUR EQUIPMENT IN THE BEST POSSIBLE CONDITION





active web browser and you are already starting to monitor data, storage them and printout measurement reports which can be generated as an evidence of proper function.

External Power supply option (EP) is something only Dekal is able to provide you with. This feature has been developed to offer our customers an emergency option of constant data pulling no matter the condition of the tested device. In case of a sudden shut down of the GPU power supply, the load bank remains powered and thus continues to log measurements. Consequently, measurements of the GPU's overload protection can be made without interruption, which provides unique opportunity to gather important data. All of our 400 Hz AC & 28.5 V DC digital versions are capable of having external power supply as predetermined option; only Dekal is providing this solution

#### **400Hz AC MAIN FEATURES**

- Different assortment of power range from 45kW to 140kW; with customization options
- Continuous load increase and fine regulation in the range of 8 kW
- All subsequent loads in 8kW steps
- Simultaneous measurements of Volts, Amperes, kW, kVA, Hz and cosφ\*
- External power supply (option on digital versions)
- WiFi & USB plug in connection for measurement report printout\*
- Silent operation

#### **28.5 V DC MAIN FEATURES**

- Maximum power range from 300A to 2500A; with customization options
- Simultaneous measurements of Volts, Amperes and Kilowatts (digital versions only)
- preprogrammed aircraft engine start simulation (ESS)
- External power supply (option on digital versions)
- WiFi & USB plug in connection for measurement report printout\*
- Silent operation

## 270 V DC MAIN FEATURES

- Load 0-72 kVA
- Power indicator lights, E&F circuit indicator
- Specifically designed according to military specifications
- WiFi & USB plug in connection for measurement report printout\*
- Silent operation

## ANA - POWER ANALYZER DEVICE FOR AIRLINERS & MILITARY OPERATIONS

The Dekal Analyzer (ANA) is a unique product that offers a complete power consumption analysis of aircraft connected to the GPU. The Power Analyzer is available in 400 Hz AC or 28.5 V DC versions, as well as in combined configuration. It offers simultaneous measurements in volts, amperes, kilowatts, kilovolt amps, kilowatt hours, hertz and the power factor.

Our software offers measurement data logging, graph drawing and export of the data in the form of a measurement report. The Power Analyzer can be used to give accurate readings of power usage, providing airline companies with the possibility of billing ground power consumed by time and kilowatt hours.

- The only such product on the market today
- Complete power consumption analysis of the aircraft connected to the GPU
- 400 Hz AC, 28.5 V DC and combined versions available
- Simultaneous measurements of Volts, Amperes, kW, kVA, Kvar, Hz, and PF cosφ for each phase
- Possibility to measure kWh and thereafter determine the cost of ground power
- USB and WiFi connection with a PC, tablet or a smartphone
- Software offers data logging, graph drawing and printout report generation

# KEEP YOUR EQUIPMENT IN THE BEST POSSIBLE CONDITION



## OTHER DEKAL PRODUCTS

In addition to our standard product range, we offer following test equipment:

- Cable Plug Testers for 400 Hz AC (CPT-400)
- Cable Plug Testers for 28.5 V DC (CPT-028)
- GPU Cable Tester (GCT-428)
- Y-Cable Connection (YCN-400/\*Two LBs)
- Testing Receptacle / Short circuit test unit (TRE-400)

## CARRYING AND STORAGE CASES FOR LONG-LASTING DEVICE PROTECTION

All DEKAL products are shipped with a tailor-made protection case, which are specially designed to protect the apparatus during storage and transportation phases.

All our robust and long-lasting carry cases feature built-in wheels and a pull-out handle for easy handling, and their underside components are constructed to be used as a base for the load bank while in operational use.

- All our products are bundled with a tailor made protection case
- Usable for storage and transportation
- Built-in wheels and pull-out handle for easy handling
- Load bank may remain in the bottom part of the case during the operation

#### **COMPANY CONTACT DETAILS**

For more information about the company and its range of products, please contact:

USA COMPANY & CONTACT DETAILS:

**DEKAL LOAD BANKS USA L.L.C.** 2000 TECHNOLOGY DRIVE PITTSBURGH, PA 15219 \* USA

\_\_\_\_\_

PH: +1.800.323.9172 Cell:+1.954.516.4245 Skype: jernej.load.banks MAIL: <u>office@dekalloadbanks-us.com</u> WEB: www.dekalloadbanks-us.com

<u>EUROPE COMPANY & CONTACT DETAILS:</u> DEKAL AGREGATI D.O.O. / DEKAL LOAD BANKS L.L.C. ULICA LUDVIKA PLAMBERGERJA 25 SI-2204 MIKLAVZ NA DRAVSKEM POLJU PITTSBURGH, PA 15219 \* USA

PH: +386.2.320.3250 Cell: +386.30.333.357 Skype: jernej.load.banks FAX: +386.2.320.3252 MAIL: <u>info@gse-global.com</u> WEB: <u>www.gse-global.com</u>