

WIRELESS DATA LOGGER

FEATURES

- Compatible with Aeron® and Davis® make sensors
- Selectable logging and update rates
- Serial Interface - RS485 MODBUS RTU and SDI-12
- Low power consumption, equipped with rechargeable batteries
- Industrial grade - IP65 sealed
- Device configuration over SMS & serial configuration port
- Over the air firmware update
- Data viewing via web portal & mobile app

APPLICATIONS

- Agricultural Weather Stations
- Meteorological Weather Monitoring
- Smart Agriculture
- Remote Sensing
- Process Monitoring
- Renewable Energy Monitoring

DESCRIPTION

ACE DLG88L is a rugged outdoor data logger from the Aeron family of loggers, designed for agricultural and meteorological applications. DLG88L connects with a variety of sensors for Agri/Met, takes periodic measurements, processes the acquired data, and stores in its onboard SD card memory. The acquired data is simultaneously communicated to the secured cloud server using an integrated LTE modem for real-time monitoring.

DLG88L consumes very low power allowing it to operate for weeks without charging the onboard 3.7 V Li-ion battery. The battery can be charged with a 10 W solar panel, eliminating the need for an AC power supply.

The DLG88L offers a data storage memory of 8 GB, sufficient to store data for years. It also features USB connectivity which can be used for retrieval of SD card data by connecting the device to a Computer/laptop. The LCD screen and keypad makes the configuration and device health assessment very easy on the site. Users can subscribe to Aeron's cloud portal for remotely accessing data.

ACE DLG88L



TECHNICAL SPECIFICATIONS

PARAMETER NAME	PARAMETER VALUE
	ACE DLG88L
ANALOG INPUT	
Channels	Davis® Anemometer Aeron® / Davis® Air Temperature Humidity Davis® Rain Bucket Davis® Solar Radiation Aeron® / Davis® Leaf Wetness Vegetronix Soil Moisture Soil Temperature (PT100)
On-board Sensors #	Barometric Pressure
ANALOG TO DIGITAL CONVERTER (ADC)	
Resolution	12 bit
Accuracy	±0.1% of FS
Type	Sigma - Delta
Sampling Rate	Upto 10 Hz
PARAMETERS	
Simultaneous Parameters	up to 176 parameters (including sensor and calculated parameters)
Data Rate	1minute (min.) to 24 hours (max.)
COMMUNICATION	
Network Type	LTE
Data Security	AES (128 bit)
Interfaces	RS485 MODBUS RTU & SDI-12
Micro-processor	32 bit
Display	Graphic LCD Display (128 x 64 resolution)
Indicators	LED - Power LED - Network
Keypad	3 button Keypad
Date & Time	RTC with backup battery (replaceable) Accuracy: 10 ppm/°C
Time Synchronization	Server
STORAGE	
SD Card Memory	8 GB Micro SD

- refer ordering information

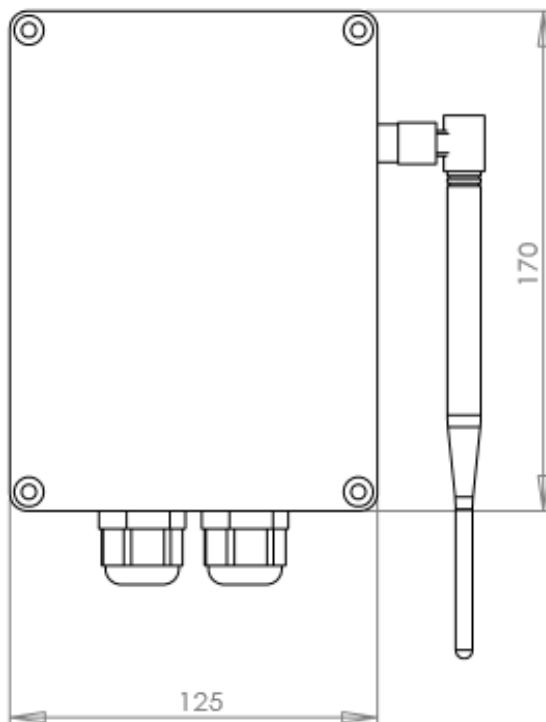
TECHNICAL SPECIFICATIONS

PARAMETER NAME	PARAMETER VALUE
	ACE DLG88L
ELECTRICAL	
Voltage Input	+9 V to +28 V DC
Charge Current	<180 mA (in operation) <50 mA (in power down mode)
Batteries	3.7 V Li-ion batteries with 5200 mAh capacity
ENVIRONMENT	
Operating Temperature	-20 °C to +70 °C
Storage Temperature	-40 °C to +80 °C
Protection	IP65
Housing	ABS UV Protected
Dimensions	125 mm (W) x 170 mm (L) x 66.5 mm (B)
Weight	<700 gms

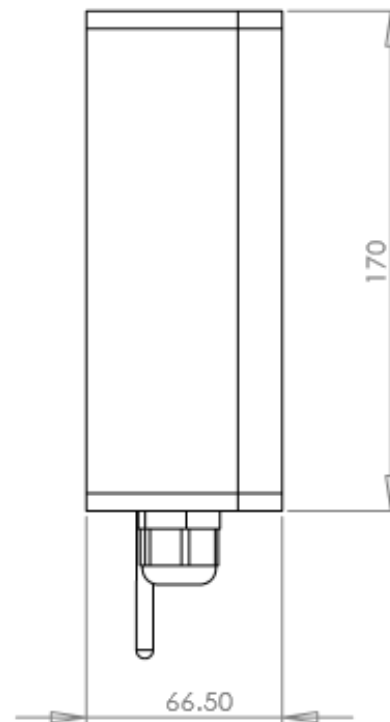
MECHANICAL DIMENSIONS

All dimensions in mm

Front View



Side View



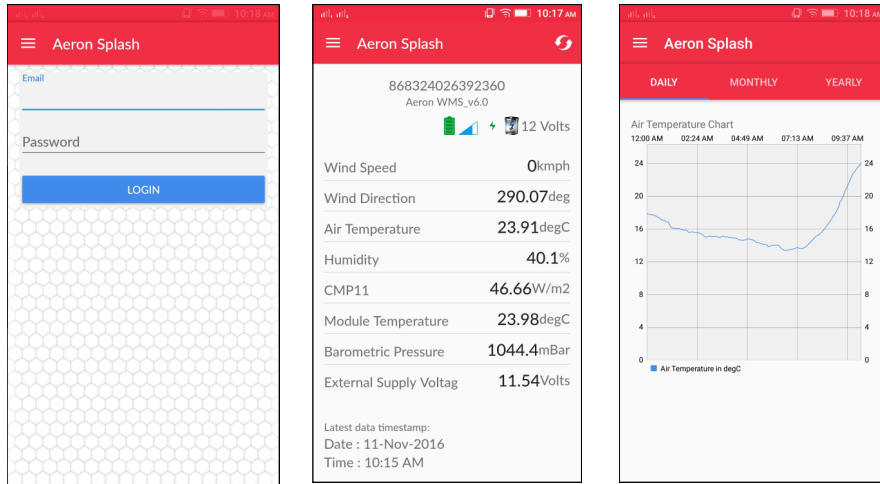
WEB PORTAL & ANDROID APPLICATION



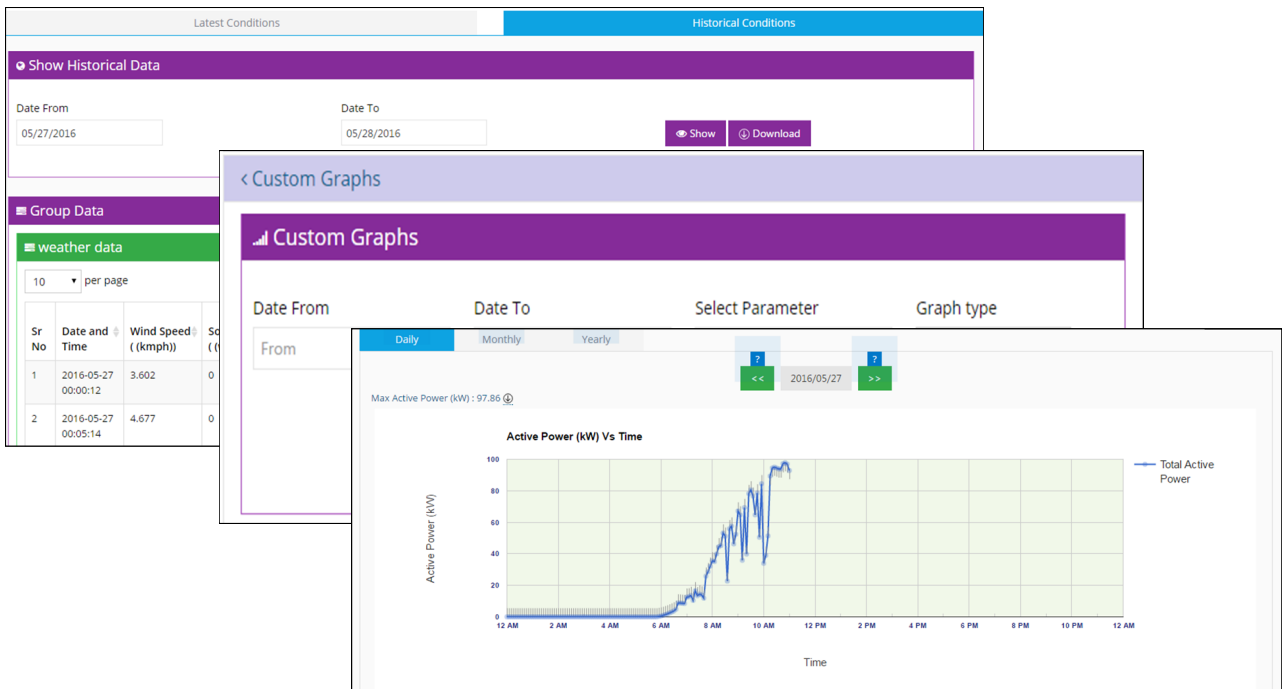
A web portal application and a user friendly Android Application is available with DLG88L. Web Portal allows configuration settings and data retrieval. The Android app allows data viewing only.

Note: The Android app is available ONLY for customers who use Aeron's Web Services.

Android Application



Web Portal



ORDERING INFORMATION

ACE - DLG88L - YY

- 10 - Without Onboard Barometer Sensor (Product Code:23005)**
- 11 - With Onboard Barometer Sensor (Product Code:23006)**
- 20 - Without Onboard Barometer Sensor, with RS485 & SDI-12 (Product Code:23007)**
- 21 - With Onboard Barometer Sensor, with RS485 & SDI-12 (Product Code:223008)**