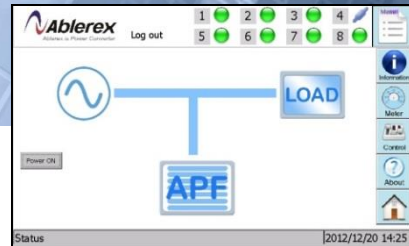
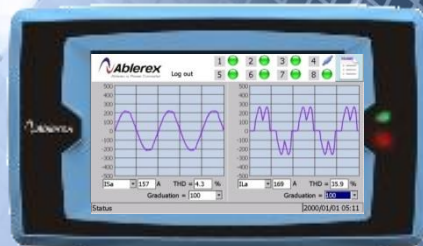
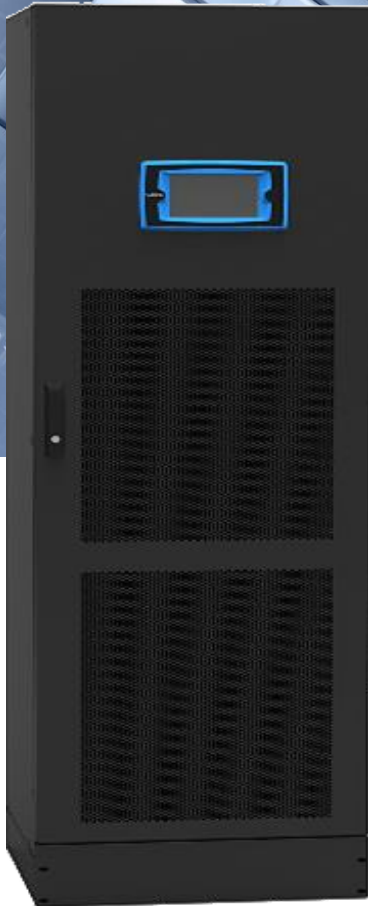
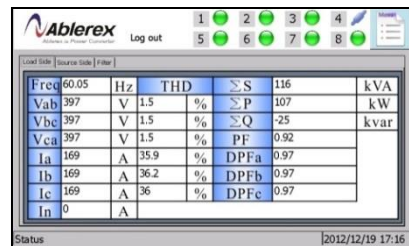


# Enersine ESD34 Active Power Filter // 100A & 150A

7" Coloured LCD Touch Screen

Load Side	Source Side	Filter			
Freq	60.05	Hz	THD	Σ S	116
Vab	397	V	1.5	% Σ P	107
Vbc	397	V	1.5	% Σ Q	-25
Vca	397	V	1.5	% PF	0.92
Ia	169	A	35.9	% DPFa	0.97
Ib	169	A	36.2	% DPFb	0.97
Ic	169	A	36	% DPFc	0.97
In	0	A			

- True Active Harmonic Compensation
- IP20 or higher IP rating
- Compact Design
- Easy integration with Switchboard
- Up to 51<sup>st</sup> harmonic attenuation
- Close / Open Loop Control
- Programmable Harmonics Compensation and Power Factor Correction
- Load Balancing Function
- Full-time DSP Control System
- Up to 8 units in parallel
- Different Capacity Can Operate in Parallel

## General Characteristics

Storage Temperature	-20°C to 70°C
Operating Temperature	+0°C to 40°C
Relative Humidity	<95%
Operating Altitude	<1000m
Reference Harmonics Standard	EN61000-3-4, IEEE 519-1992
Reference Design Standard	EN60146
Safety Standard	EN50178

## HMI & Communication

Dry Contact	3 Output Dry Contact
	1 Input Dry Contact
Communication	USB, RS-485, Ethernet
Monitoring Software (Optional)	ESD-Link34
Communication Protocol	J-Bus/Modbus RTU Protocol

## Electrical Specification

Model	ESD34-100-400	ESD34-150-400
Input Voltage	400V + 15%, -20%	
Phase/Wire	3 phase 4 wires / 3 wires	
Frequency	50/60Hz ± 3 Hz (Auto Sensing)	
Maximum Compensation Current / Phase	100 Arms	150 Arms
Maximum Compensation Current of Neutral	300 Arms	450 Arms
Compensated Harmonic Orders	From 2 <sup>nd</sup> to 51 <sup>st</sup> order. Up to 12 orders actives simultaneously (2 <sup>nd</sup> ~ 31 <sup>st</sup> ). Higher Order Compensation (32 <sup>nd</sup> ~51 <sup>st</sup> ) Disable/Enable operation	
Power Factor Correction	Compensate both lagging and leading reactive power.	
	Power factor can be programmed from 0.7 lagging to 0.7 leading.	
CT Ratio	Primary Current: 100A ~ 10000A Selectable Secondary Current: 1A (Standard)/5A (Optional)	
CT Location	Selectable: (1) Source Side: Close Loop Control (2) Load Side: Open Loop Control	
Response Time	< 20 ms	
Inrush Current	Less than rated current <In	
Current Limitation	Yes, at full correcting	
Parallel	Up to 8 units	
Maximum Heat Loss	2300 Watts	3200 Watts
Dimensions (WxHxD, mm/inch) for IP20*	600 x 1900 x 600 / 23.6 x 74.8 x 23.6	
Net Weight (kgs/lbs) for IP20*	195 / 429.8	205 / 451.8

\*Note: IP00 or Other higher IP rating available upon request.

DESIGNED AND  
ENGINEERED BY:



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