

# PROGRAMMABLE DC ELECTRONIC LOAD

POWER SUPPLY

TEST INSTRUMENT

EDU. INSTRUMENT

METER

MACHINE

ACCESSORY

ELD13710/ELD13711 SERIES



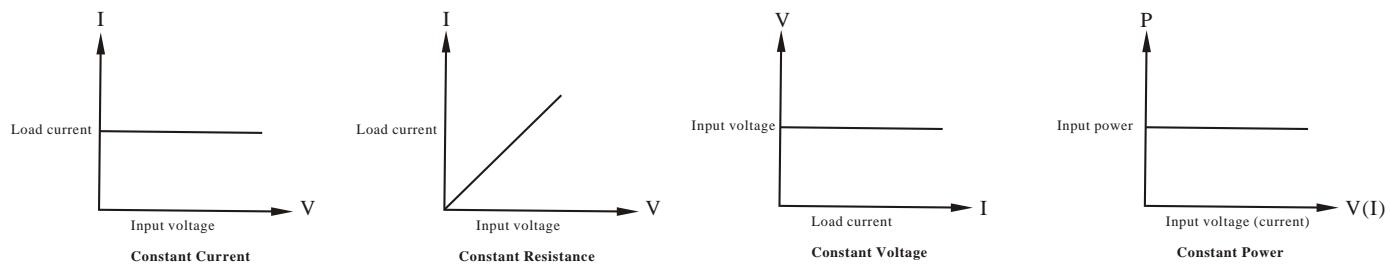
## Features

- .Over-voltage, over-current, over-power, over-heat and reverse connection of polarities protection
- .LCD back light, digital keyboard and knob
- .High resolution
- .8 groups setting memory with 32 steps each
- .Data logging keyboard when power breaks
- .Remote controlled by computer
- .Parallel using independent unit
- .Battery capacity testing



**ELD 13710**

Technical Data	ELD13710	ELD13711
Working mode	CC, CV, CR, CW	
Input voltage	0~360VDC	
Input current	0~30A	
Input power	0~150VA	0~300VA
Voltage accuracy	0.00~35.99V, $\pm(0.2\%+30mV)$ 36.0~300.0V, $\pm(0.2\%+300mV)$	
Current accuracy	0.000~2.999A, $\pm(0.2\%+3mA)$ 3.00~30.00A, $\pm(0.2\%+30mA)$	
Resolution	10mV, 1mA	
Lowest conductive resistance	<0.08 $\Omega$	
Ripple	<10mVp-p	
Program memory	8 groups, 32 steps each group	
Battery testing	0.01mAH~4000AH	
Interface	RS232, RS485, USB(optional)	
Protection	Over-voltage, over-current, over-power, over-heat and reverse connection of polarities protection	
Software	Electronic load software, VB, VC++, DELPHI, LABVIEW	
Standard accessories	User's manual, AC cable, handlebars, software CD	
Option accessories	RS232 adapter, RS485 adapter, USB adapter, Mounting rack	
Power source	115V/230VAC $\pm 15\%$ , 47~63Hz	
Dimensions(W × H × D)	225 × 105 × 340mm	
Weight	5kg	



# DC ELECTRONIC LOAD



## ELD8500N SERIES HIGH PERFORMANCE

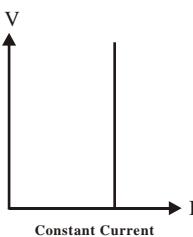
CE  
NEW

### Features

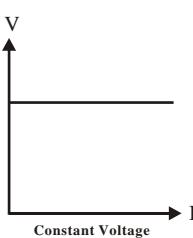
- .Four parameters, highlight VFD display
- .Resolution of voltage and current:  
0.1mV/0.1mA
- .Four working modes: CV/CC/CR/CP
- .Three dynamic test function (up to 10KHz):  
continuous load switching mode,  
pulse load mode,  
toggle load switching mode
- .Ten groups automatic testing data  
files with each file 10 steps
- .Intelligent fan cooling, coding switch,  
built-in buzzer, non-slip feet
- .Complex current sequence list test mode
- .Remote sensing function
- .Battery discharging test mode
- .All modes turn on default
- .Storage for 100sets
- .Short-circuit, CR-LED test,  
current monitoring,  
power off memory
- .RS232,USB,RS485 option



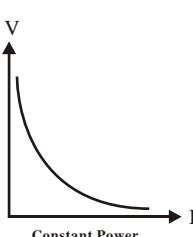
**ELD8511N**



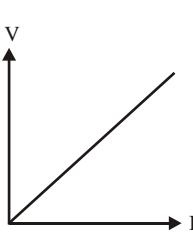
In CC mode, the electronic load will sink current according to the programmed value regardless of the input voltage



In CV mode, the electronic load will attempt to sink enough current to control the source voltage to the programmed value



In CP mode, the electronic load will dissipate power in accordance with the programmed value regardless of the input voltage



In CR mode, the electronic load will sink current linearly proportional to the input voltage in accordance with the programmed resistance

	Technical Data		ELD8511N	ELD8511AN
Rated Value ( 0°C~40°C)	Voltage	0~120V	0~150V	
	Current	0~30A	0~30A	
	Power	150W	150W	
	MOV	0.14V/3A (0~3A)	0.2V/3A	
		1.4V/30A (0~30A)	2V/30A	
CV Mode	Resolution	1mV (0~18V) 10mV (0~120V)	1mV (0~18V) 10mV (0~150V)	
	Accuracy	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~120V	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~150V	
	Resolution	0.1mA(0~3A)	0.1mA(0~3A)	
CC Mode	Resolution	1mA(0~30A)	1mA(0~30A)	
	Accuracy	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	
	Resolution	16bit	16bit	
CR Mode	Accuracy	0.01%+0.08S 0.05Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	0.01%+0.08S 0.05Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	
	Range	150W	150W	
	Resolution	10mW	10mW	
	Accuracy	0.1%+0.1%FS 50uS~3600S /Res:1 uS 5uS±100ppm	0.1%+0.1%FS 50uS~3600S /Res:1 uS 5uS±100ppm	
CW Mode	Up/down slope	0.0001~0.3A/uS 0~3A 0.001~1.5A/uS 0~30A	0.0001~0.2A/uS 0~3A 0.001~1.5A/uS 0~30A	
	Readback Voltage	0.1mV 0~18V 1mV 0~120V	0.1mV 0~18V 1mV 0~150V	
	Accuracy	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)	
	Readback Current	0.1mA 0~3A 1mA 0~30A	0.1mA 0~3A 1mA 0~30A	
Dynamic mode (CC mode)	Resolution	0.1mV 0~18V 1mV 0~120V	0.1mV 0~18V 1mV 0~150V	
	Accuracy	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	
	Range	150W	150W	
Readback Power	Resolution	10mW	10mW	
	Accuracy	±(0.1%+0.1%FS)	±(0.1%+0.1%FS)	
	OPP	≈160W	≈160W	
Protection Range	OCP	≈3.3A 0~3A ≈33A 0~30A	≈3.3A 0~3A ≈33A 0~30A	
	OVP	≈125V	≈160V	
	OTP	≈85°C	≈85°C	
Short Circuit	CC	≈3.3/3A 0~3A ≈33/30A 0~30A	≈3.3/3A 0~3A ≈33/30A 0~30A	
	CV	≈0V	≈0V	
	CR	≈45mΩ	≈60mΩ	
Input voltage	110~127VAC±10% 60Hz, 220~240±10% 50Hz		Switchable	
Input Impedance	150kΩ		150kΩ	
Dimensions	215(W) × 88(H) × 355(D)mm			

# DC ELECTRONIC LOAD

POWER SUPPLY

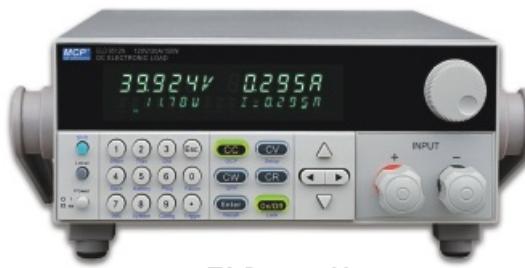
TEST INSTRUMENT

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**ELD8512N**

Technical Data		ELD8512N	ELD8512AN	ELD8512BN	ELD8512CN
Rated Value ( 0°C~40°C )	Voltage	0~120V	0~150V	0~500V	0~120V
	Current	0~30A	0~30A	0~15A	0~60A
	Power	300W	300W	300W	300W
	MOV	0.12V/3A (0~3A)	0.14V/3A	0.6V/3A (0~3A)	0.25V/6A (0~6A)
		1.2V/30A (0~30A)	1.4V/30A	3V/15A (0~15A)	2.5V/60A (0~60A)
CV Mode	Resolution	1mV (0~18V) 10mV (0~120V)	1mV (0~18V) 10mV (0~150V)	1mV (0~50V) 10mV (0~500V)	1mV (0~18V) 10mV (0~120V)
	Accuracy	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~120V	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~150V	±(0.05%+0.02%FS)/ 0~50V ±(0.05%+0.025%FS)/ 0~500V	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~120V
	Resolution	0.1mA(0~3A) 1mA(0~30A)	0.1mA(0~3A) 1mA(0~30A)	0.1mA(0~3A) 1mA(0~15A)	0.1mA(0~6A) 1mA(0~60A)
	Accuracy	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)
CC Mode	Resolution	16bit	16bit	16bit	16bit
	Accuracy	0.01%+0.08S 0.05Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	0.01%+0.08S 0.05Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	0.01%+0.08S 0.3Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	0.01%+0.08S 0.3Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ
	Resolution	300W	300W	300W	300W
	Accuracy	10mW	10mW	10mW	10mW
CW Mode	Range	300W	300W	300W	300W
	Resolution	10mW	10mW	10mW	10mW
	Accuracy	0.1%+0.1%FS	0.1%+0.1%FS	0.1%+0.1%FS	0.1%+0.1%FS
	T1&T2	50uS~3600S /Res:1 uS	50uS~3600S /Res:1 uS	50uS~3600S /Res:1 uS	50uS~3600S /Res:1 uS
Dynamic mode (CC mode)	Accuracy	5uS±100ppm	5uS±100ppm	5uS±100ppm	5uS±100ppm
	Up/down slope	0.0001~0.3A/uS 0~3A 0.001~1.5A/uS 0~30A	0.0001~0.2A/uS 0~3A 0.001~1.5A/uS 0~30A	0.0001~0.2A/uS 0~3A 0.001~0.8A/uS 0~15A	0.0001~0.2A/uS 0~6A 0.001~1.2A/uS 0~60A
	Resolution	0.1mV 0~18V 1mV 0~120V	0.1mV 0~18V 1mV 0~150V	1mV 0~50V 10mV 0~500V	0.1mV 0~18V 1mV 0~120V
	Accuracy	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)
Readback Voltage	Resolution	0.1mA 0~3A	0.1mA 0~3A	0.1mA 0~3A	0.1mA 0~6A
	Accuracy	1mA 0~30A	1mA 0~30A	1mA 0~15A	1mA 0~60A
	Resolution	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)
Readback Current	Resolution	0.1mA 0~3A	0.1mA 0~3A	0.1mA 0~3A	0.1mA 0~6A
	Accuracy	1mA 0~30A	1mA 0~30A	1mA 0~15A	1mA 0~60A
	Resolution	10mW	10mW	10mW	10mW
Readback Power	Resolution	300W	300W	300W	300W
	Accuracy	±(0.1%+0.1%FS)	±(0.1%+0.1%FS)	±(0.1%+0.1%FS)	±(0.1%+0.1%FS)
	Range	300W	300W	300W	300W
Protection Range	OPP	≈320W	≈320W	≈320W	≈320W
	OCP	≈3.3A 0~3A ≈33A 0~30A	≈3.3A 0~3A ≈33A 0~30A	≈3.3A 0~3A ≈16A 0~15A	≈6.5A 0~6A ≈65A 0~60A
	OVP	≈125V	≈160V	≈530V	≈125V
	OTP	≈85°C	≈85°C	≈85°C	≈85°C
Short Circuit	CC	≈3.3/3A 0~3A ≈33/30A 0~30A	≈3.3/3A 0~3A ≈33/30A 0~30A	≈3.3/3A ≈16/15A	≈6.5/6A ≈65/60A
	CV	≈0V	≈0V	≈0V	≈0V
	CR	≈40mΩ	≈40mΩ	≈180mΩ	≈40mΩ
	Input voltage	110~127VAC±10% 60Hz, 220~240±10% 50Hz	Switchable		
Input Impedance		150kΩ	150kΩ	1MΩ	150kΩ
Dimensions		215(W) × 88(H) × 355(D)mm			

# DC ELECTRONIC LOAD



**ELD8514CN**



**ELD8516CN**

Technical Data		ELD8513CN	ELD8514BN	ELD8514CN	ELD8516CN
Rated Value ( 0°C~40°C )	Voltage	0~120V	0~500V	0~120V	0~120V
	Current	0~120A	0~60A	0~240A	0~240A
	Power	600W	1500W	1500W	3000W
	MOV	0.2V/12A (0~12A) 2V/120A (0~120A)	0.25V/6A 2.5V/60A	0.25V/24A (0~24A) 2.5V/240A (0~240A)	0.15V/24A 1.5V/240A
CV Mode	Resolution	1mV (0~18V) 10mV (0~120V)	1mV (0~50V) 10mV (0~500V)	1mV (0~18V) 10mV (0~120V)	1mV (0~18V) 10mV (0~120V)
	Accuracy	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~120V	±(0.05%+0.02%FS)/ 0~50V ±(0.05%+0.025%FS)/ 0~500V	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~120V	±(0.05%+0.02%FS)/ 0~18V ±(0.05%+0.025%FS)/ 0~120V
	Resolution	1mA(0~12A) 10mA(0~120A)	1mA(0~6A) 10mA(0~60A)	1mA(0~24A) 10mA(0~240A)	0.1mA(0~24A) 1mA(0~240A)
	Accuracy	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.1%+0.1%FS)
CC Mode	Resolution	16bit	16bit	16bit	16bit
	Accuracy	0.01%+0.08S 0.05Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	0.02%+0.08S 0.05Ω~10Ω 0.02%+0.0008S 10Ω~7.5kΩ	0.01%+0.08S 0.05Ω~10Ω 0.01%+0.0008S 10Ω~7.5kΩ	0.01%+0.08S 0.05Ω~10Ω 0.02%+0.0008S 10Ω~7.5kΩ
	Range	600W	1500W	1500W	3000W
	Resolution	10mW	10mW	10mW	10mW
CW Mode	Accuracy	0.2%+0.2%FS	0.2%+0.2%FS	0.2%+0.2%FS	0.2%+0.2%FS
	T1&T2	100uS~3600S /Res:1 uS	100uS~3600S /Res:1 uS	100uS~3600S /Res:1 uS	100uS~3600S /Res:1 uS
	Accuracy	10uS±100ppm	10uS±100ppm	10uS±100ppm	10uS±100ppm
	Up/down slope	0.001~0.2A/uS 0~12A 0.01~1.6A/uS 0~120A	0.001~0.15A/uS 0~6A 0.01~0.8A/uS 0~60A	0.001~0.3A/uS 0~24A 0.01~3.2A/uS 0~240A	0.001~0.3A/uS 0~24A 0.01~2.8A/uS 0~240A
Readback Voltage	Resolution	0.1mV 0~18V 1mV 0~120V	0.1mV 0~50V 1mV 0~500V	0.1mV 0~18V 1mV 0~120V	0.1mV 0~18V 1mV 0~120V
	Accuracy	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)	±(0.025%+0.025%FS)
	Resolution	1mA 0~12A 10mA 0~120A	1mA 0~6A 10mA 0~60A	1mA 0~24A 10mA 0~240A	0.1mA 0~24A 1mA 0~240A
Readback Current	Accuracy	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.05%+0.05%FS)	±(0.1%+0.1%FS)
	Range	600W	1500W	1500W	3000W
	Resolution	10mW	10mW	10mW	10mW
Readback Power	Accuracy	±(0.2%+0.2%FS)	±(0.2%+0.2%FS)	±(0.2%+0.2%FS)	±(0.2%+0.2%FS)
	OPP	≈620W	≈1550W	≈1500W	≈3000W
	OCP	≈13A 0~12A ≈130A 0~120A	≈6.7A 0~6A ≈67A 0~60A	≈26.7A 0~24A ≈267A 0~240A	≈26A 0~24A ≈260A 0~240A
Protection Range	OVP	≈125V	≈530V	≈125V	≈125V
	OTP	≈95°C	≈85°C	≈85°C	≈85°C
	CC	≈13/12A 0~12A ≈130/120A 0~120A	≈13/12A 0~6A ≈130/120A 0~60A	≈26.7/24A 0~24A ≈267/240A 0~240A	≈26.7/24A 0~24A ≈267/240A 0~240A
Short Circuit	CV	≈0V	≈0V	≈0V	≈0V
	CR	≈15mΩ	≈30mΩ	≈8mΩ	≈5mΩ
	Input voltage	110~127VAC±10% 60Hz, 220~240±10% 50Hz	Switchable		
Input Impedance		150kΩ	150kΩ	150kΩ	150kΩ
Dimensions		215(W) × 88(H) × 454(D)mm (ELD8513CN) 483(W) × 195(H) × 626(D)mm (ELD8516CN)	437(W) × 88(H) × 464(D)mm (ELD8514BN) 437(W) × 88(H) × 464(D)mm (ELD8514CN)		