



CDN 3063A-C63_C100_C100.1

AUTOMATED 3-PHASE COUPLING / DECOUPLING NETWORK SERIES



The **CDN 3063A** series are 3 phase coupling/decoupling networks designed to offer best price performance for use as extension to NSG 3060A multifunction generator series. With the CDN 3063A, the 1-phase NSG 3060A is enhanced to a cost-effective test system to cover anyone's need for best budget. The coupler is characterized by a high level of user comfort and common safety functions. All coupling status are clear indicated on the display of the NSG 3060A generator.

Dedicated 6 mm banana safety EUT terminals allow direct and easy EUT connection.

EUT power ON and OFF can be controlled manually from the NSG 3060A front panel. EUT power will also switch OFF automatically in case of overload by heat.

The **fully automated IEC and ANSI compliant** coupling networks fulfill the requirements for EUT currents up to 63/100A (model-specific) in the surge standard IEC / EN 61000-4-5, as well special coupling modes and pulse amplitude control in the ANSI C62.45 standard, the ring wave pulse given in IEC / EN 61000-4- 12 and the EFT in IEC / EN 61000-4-4 (latest edition for all standards).

High Voltage safety plugs are used to interconnect the high voltage pulse output from NSG 3060A multifunction generator to CDN input. The HV impulse output on the front side offers a connection to additional CDN's for signal- and data lines.

The **CDN 3063A perform dynamic cooling**. Internal elements which warm up under load are equipped with thermal sensors. At standby or for lower EUT currents, when there is no need for cooling, the fans will turn at a very low speed, generating no noise. In case of intentional or unintentional overloading, there will be a point where even full speed cooling will no more be sufficient, at this moment the CDN 3063A will switch OFF EUT power through the built in EUT power contactor, and so avoid destruction of the instrument (risk of fire). The CDN 3063A control electronics will also send a message back to the NSG 3060A which will immediately stop the firing of pulses.

The **CDN 3063A is designed to cover the surge waveform** standard as per IEC 61000-4-5 and can conduct high inrush currents or peak loads. The phase synchronization is taken from the phase L1 of the 3-phase coupling / decoupling network. This important feature guaranties a correct coupling especially in synchronous mode.

CDN 3063A is available in 3 different current ranges.

- Compliant with IEC 61000-4-4, IEC 61000-4-5 & IEC 61000-4-12
- Fully automated burst, surge and Ring wave coupling
- IEC and ANSI coupling methods
- Manual/programmable EUT power ON/OFF control
- Current ranges 32 - 63 A (C63) or 63 - 100 A (C100)
- Switchable current ranges for 32, 63 and 100 A (C100.1 only)
- Output on frontside for external CDN for signal- and data lines
- Overload protection

Models	Current range
CDN 3063A-C32	0 – 32 A
CDN 3063A-C63	32 A – 63 A
CDN 3063A-C100	63 A – 100 A
CDN 3063A-C100.1	0 – 100 A (switchable current ranges for 32, 63 and 100 A)



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AUTOMATED 3-PHASE

COUPLING / DECOUPLING NETWORK SERIES

Parameter	Value
Three phase CDN	according to EN/IEC 61000-4-4, EN/IEC 61000-4-5 and EN/IEC 61000-4-12
Burst voltage	Up to 4800 V
Surge Voltage	Up to 6600 V
Ring wave Voltage	Up to 6600 V
EUT supply, 63 A-model (C63)	3 x 480 VAC rms, 32 A – 63 A, 50 / 60 Hz
EUT supply, 100 A-model (C100)	3 x 480 VAC rms, 63 A – 100 A, 50 / 60 Hz
EUT supply, 100 A-model (C100.1)	3 x 480 VAC rms, 0 – 100 A, 50 / 60 Hz
Dimension (W x H x D)	19" / 34 HU rack
Weight	Approx. 170 kg
Interfaces	
sys.link	26 pin high density connector to control external devices
connector EUT supply	Cecon-connector, rated 100 A (C63 + C100.x)
connector to EUT	Safety banana plug, 6 mm, rated 100 A (C63 + C100.x)
Mains (control)	
Supply voltage	85 to 265 VAC, 50 / 60 Hz
Power	approx. 75 W, Standby: 100 mA
Fuses	115 V: 2 x 4 A slow blow, 230 V: 2 x 2 A slow blow
Safety	
Safety Standard	IEC/EN 61010
Security circuit	Control input (24 VDC)
Warning lamp	Floating contact (max. 60 V/2 A)
Environment	
Temperature	10 °C to 35 °C
Humidity	30 % to 75 %, non condensing
Atmospheric pressure	86 kPa (860 mbar) to 106 kPa (1,060 mbar)
Included Accessories	
1 BCC 350	HV coaxial cable 350 mm for Burst, SHV – SHV connectors
1 HVS	HV cable Banana – Banana, 0.5 m, 1 x red, 1 x black
1 SLC 500	Cable, 0.5 Meter, CDN 3063A to NSG 3060A
1 Power mains cable	Cable 2 m, for the CDN supply, country coded
User manual	Delivered on USB memory stick
Calibration certificate	
Accessories	
PVF BKIT 1	Calibration set for Burst/EFT.
MD 210	Differential HV probe 7 kV
MD 300	Current probe 5 kA

AMETEK CTS GmbH
Sternenhofstrasse 15 4153 Reinach Switzerland

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