

Single phase to Three phase converter

Description:

Our SDT series Power Phase converter is one of the most advanced AC to AC conversion products in the world which can convert ordinary single-phase power to industrial three-phase power.

It can solve production inconvenience because of some areas with the three-phase electric power restrictions, also solved some user requirements that can't apply for the three-phase electric because of space limitation.

It has the main advantages of high quality sine wave AC output, microcomputer control, humanness design, high efficiency, low no-load loss and no pollution.

The converter can supply AC power to all kinds of electric equipment, electric motors, pump, compressor, and other industrial power supply. Applicable to all types of load.



Technical Feature:

- 1) The input voltage, output voltage, frequency and phase **can be custom made**.
- 2) Two kinds of start mode: Step Down Voltage Start and **Variable Frequency Start**. VFD is especially used for taking 3 phase inductive load more easily. This function is very convenient for users and also reduce frequency converter's usage, which reduced the cost of equipment investment, easy to connect wires and control.
- 3) Output AC Power is suitable for all types of home appliances, electric tools, electric motors etc.
- 4) Using the fifth generation efficient **IPM intelligent module from Japanese Mitsubishi**, high efficiency and stable performance. It with **powerful protection function** for short circuit, over load, over temperature. Service life can reach **15-20 years**.
- 5) **Pure sine wave output**. with good transient response, little harmonic distortion, higher conversion efficiency and stable output voltage features.
- 6) Adopted **low frequency isolated transformer**, safe and reliable, single phase input power is completely isolated from three phase output power, high conversion efficiency, high instantaneous power, **stable performance and low load loss**.
- 7) Adopts new magnetism material, largely reduce machine consumption, making **efficiency** maximum up to **98%**.
- 8) Adopts America DSP chip, safe and reliable.
- 9) Adopts black pure aluminum radiator, which confirms the best radiating performance
- 10) Converter has the function of filtering the grid disturbance and interference at the same time, which is a good performance of stabilized voltage and frequency power, to provide a more stable and pure power supply environment for the back end devices
- 11) Intelligent fan speed control system, low no-load loss
- 12) **LCD display**, high efficiency, easy installation
- 13) The **output frequency 50Hz/60Hz can be set**

1ph to 3ph/ 2ph to 3ph/ 50Hz to 60Hz Power Phase Converter

1. With low frequency transformer, 100% full power, constant voltage/frequency output.
2. Two kinds of start mode: Variable Frequency Start or Step Down Voltage Start.
3. Output frequency 50Hz/60Hz can be set, suitable for all kinds of AC load.



SANDI 1 phase to 3 phase converter is the most advanced AC-DC-AC type converter products, which is characterized by multi-function, stable and reliable performance, set up parameters flexibly, easy for maintenance and long service life 15-20 years. It can meet different user's different requirements:

SANDI 1 phase to 3 phase converter



SDT-10KW 1 phase to 3 phase converter

NW: 120kg

GW: 140kg

Product Size: 550*550*860mm(L*W*H)

Packing Size: 600*600*1000mm(L*W*H)

Inside with low frequency isolated transformer, constant voltage and constant frequency output, the harmonic and interference is very little, not only can output 1 phase 220VAC but also can output 3 phase 380VAC

Suitable for taking all kinds of electric equipment, such as: motor, pump, compressor, welding machine, home appliances and other load

Long design service life 15-20 years

Powerful function:

1. With Variable Frequency Start and Step-Down Voltage Start mode, same like with frequency converter function. Higher capacity to drive inductive load
2. The output frequency 50Hz/60Hz can be set

Technical data

Model		SDT-3KW	SDT-5KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	13.6A	22.7A
AC Output	Rated AC output power	3KW	5KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	4.5A (per phase)	7.58A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55°C	
	Using environment humidity	0~90%, No condensation	
Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.		
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	450*550*760mm	
	Weight (Kg)	65Kg	85Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-6KW	SDT-7KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	27.2A	31.8A
AC Output	Rated AC output power	6KW	7KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	9.1A (per phase)	10.6A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
	Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.	
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	450*550*760mm	
	Weight (Kg)	95Kg	105Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-8KW	SDT-10KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	36.3A	45.4A
AC Output	Rated AC output power	8KW	10KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	12.1A (per phase)	15.1A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.		
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	550*550*860mm	
	Weight (Kg)	110Kg	120Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-12KW	SDT-15KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	54.5A	68.2A
AC Output	Rated AC output power	12KW	15KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	18.18A (per phase)	22.76A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
	Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.	
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	550*550*860mm	
	Weight (Kg)	130Kg	140Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-12KW	SDT-15KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	54.5A	68.2A
AC Output	Rated AC output power	12KW	15KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	18.18A (per phase)	22.76A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
	Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.	
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	550*550*860mm	
	Weight (Kg)	130Kg	140Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-20KW	SDT-25KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	90.9A	113.6A
AC Output	Rated AC output power	20KW	25KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	30.35A (per phase)	37.94A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.		
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	550*750*1000mm	
	Weight (Kg)	180Kg	220Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-30KW	SDT-40KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	113.6A	181.8A
AC Output	Rated AC output power	30KW	40KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	37.94A (per phase)	60.6A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
	Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.	
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	650*750*1100mm	
	Weight (Kg)	260Kg	300Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		

Model		SDT-50KW	SDT-60KW
Isolation		Low Frequency Transformer	
AC Input	Input rated voltage (VAC)	Single phase 220V	
	Input rated voltage range	110/120/220/230/240Vac optional	
	Input rated current (A)	227.3A	272.7A
AC Output	Rated AC output power	50KW	60KW
	AC output waveform	Pure sine wave	
	Phases	Three phase, 4 wires	
	Output rated voltage	380VAC \pm 3%	
	Output voltage range	380/400/415/440/480Vac optional	
	Output Frequency	50Hz/60Hz \pm 0.05Hz	
	Output rated current (A)	75.75A (per phase)	90.9A (per phase)
	Power Factor (PF)	0.95	
	Overload Ability	120% - 35 seconds, 150% - 5 seconds	
	Efficiency	>94%	
	Waveform distortion rate (THD)	<3% (Linear load)	
	Crest Factor (CF)	3:1	
	Display	LCD	
	Electrical insulation properties	2500Vac, 1 Minute	
	Ambient temperature	-15~+55 $^{\circ}$ C	
	Using environment humidity	0~90%, No condensation	
Protection	Input under voltage, overvoltage, output over-current, short circuit, overheating etc.		
Structure	Cooling method	Fan-cooled	
	Noise	<40dB	
	Degree of protection	IP20 (indoor)	
	Using altitude (m)	\leq 3000	
	Depth* Width * Height	710*750*1300mm	
	Weight (Kg)	400Kg	420Kg
CE Standard	EN60950-1:2006+A11:2009, EN61000-6-4:2007+A1:2001, EN61000-6-2:2005, EN61000-3-12:2005, EN61000-3-11:2000		



SANDI ELECTRIC CO.,LTD

*Add: Lvao Industrial Zone Liushi Town, Yueqing City,
Zhejiang Province 325604, China.*

Tel:+86-577-62776918

Mobile:+86-13175696608

Fax:+86-577-61209955

E-mail: carrie@sandi.cc

Skype: carrie.rong

QQ: 1842566745

Whatsapp/wechat:+86-13175696608

Web: www.lgis.cc